Fast Reactor Knowledge Capture Database: Index of Key Reports in Core Physics, Thermal Hydraulics and Reactor Operations Technical Areas

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Fast Reactor Knowledge Capture Database
Index of Key Reports in Core Physics, Thermal Hydraulics and Reactor Operations Technical Areas

Introduction

The Fast Reactor report archive managed by Wood predominantly consists of the legacy NNC Fast Reactor database. This consists of 42,000 documents, of which around 32,000 are reports. The majority of these span a period from 1980 to 1999. The index to theses report was originally held on a VAX RDBMS and has subsequently been retained as an Excel spreadsheet. A subset of 24,000 of these have been digitally scanned and have undergone Optical Character Recognition (OCR) to facilitate their classification and inclusion in the high priority technical area indices.

Additional documents which were not part of the legacy NNC FR database are also held by Wood in paper form in their long term underground document storage facility. The index of these documents was also reviewed, and key identified documents were also scanned, OCR'ed and added to the appropriate indices.

Fast Reactor Knowledge Capture Database

Wood's Fast Reactor Knowledge Capture Database presents key reports from the information sources highlighted above. The index for these legacy databases were reviewed and references associated with the three high priority technical areas of Core Physics, Thermal Hydralics and Reactor Operation are included within the relevant tabs within this Workbook.

The reports obtained from the NNC Fast Reactor Database are identified using their Fiche Number; those obtained from paper copies within Wood's long term underground document storage facility have no associated Fiche Number and thus the column is defined as "N/A".

The following information associated with each report is defined:
*Title
*Date
*Ref Number
*Origination Organisation
*System
*Keywords
*Abstract (Please note: For the Core Physics Index, only the key reports contain a detailed abstract)
*Technical Value

Issue	Description of Amendment	Author	Reviewer	Approver	Date
01	Draft for Client Review	H Wiggins	D Millington	H Beaumont	Dec-18

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
105	THE CDFR CORE PHYSICS MODEL	SUNDERLAND RE;WILLIAMS DG	1983	STM/1377;PPWP/P(83)391	NNC	DFR	CDFR, Absorber Rod	This report is a key reference associated with the Calibration of Control Rods. Included in this report are details of S/A and absorber rod design in a form suitable for CDFR core physics calculations	Designs of Absorber Rods and information associated with severe accidents is also provided. The information included is suitable to be used within further calculations within the Core Physics area
109	A REVIEW OF NEUTRON FLUX INSTRUMENTATION DEVELOPMENT FOR CDFR (DECEMBER 1983)	WILSON I;GOODINGS A	1983	CNIWG/P(83)1;PPWP/P(83)399	AEE WINFRITH	DFR	Instrumentation, CDFR, Neutron Flux	This report is a key reference associated with the Miscellaneous Measurements. The requirements for neutron flux measurement for control and safety have not changed sufficiently to warrant a significant change in the broad aims of instrumentation research and development for CFRs. Experience-of work being undertaken for other reactor systems and as Underlying Research, is included in this review whenever it has a bearing on, or contributes to, the needs of CFRs ,or where the technical problems are similar. A statement of resources proposed for 1984/85 is included.	Details of instrumentation development completed within the 1980s is outlined. The information may not be directly relevant within modern times. However, key references and specific information may be acquired from the report.
219	PRELIMINARY INVESTIGATIONS INTO THE EFFECTS OF FUEL RATING ON FISSION GAS RELEASE FROM PFR FUEL PINS	CLARK BE	1982	DFMC/P(82)28;FEWP/P(82)40;FRFF/P(82)22	DNPDE	PFR	Fission Gas, PIE	This report is a key reference associated with the Miscellaneous Measurements. The review of the PIE analysis of the PFR fuel pins. The paper treats fission gas release against the Burn-up or Fuel Rating.	Fission Gas Release from PFR Pins against: Burn-up, and Fuel Rating.
417	PLANT PERFORMANCE INFORMATION FROM PFR DURING 1983	WEBSTER R;LORD DJ	1984	PPWG/P(84)19	O&ETD; DNE	PFR	Plant Performance, Run 7, Run 8	This paper describes the plant performance information obtained from PFR during the period from January 1983 to May 1984. This period covers part of Run 7, Reload 7 and first part of Run 8.	Summary of PFR Operation 83-84,
483	PROGRESS IN THE DEVELOPMENT OF FAST REACTOR NEUTRON ABSORBER MATERIALS - NOVEMBER 1982	BROCKLEHURST JE;GILCHRIST KE	1982	NDM-2025;MWP/P(82)1146;FRASG/P(82)196	UKAEA Reactor Group	PFR	Absorber Materials, PIE	This report is a key reference in the Calibration of Control Rods. The status of the development work on neutron absorber materials for use in Fast Reactors is reviewed, and the future programme described	Details on PIE of various absorber materials
542	EFFECT OF NEUTRON IRRADIATION OF THE LATTICE PARAMETER OF MoO3 STABILISED F.C.C. EUROPIA	FERGUSON IF;MOTTERSHEAD D;HUYTON A;PEARCE JH	1981	NDM-1350;MWP/P(80)1113;FRASG/P(80)163	UKAEA Reactor Group	DFR	Crystal Lattice Parameter	This report is a key reference associated with the Miscellaneous Measurements. Crystal lattice parameter measurements have been made on specimens of Mo03 stabilised (17 wt. %) face using the shielded X-ray diffractometer at WNL. After irradiation in DFR at 650 C to a fast neutron dose of 3.08 x 1022 n/cm2 a small increase (0.07%) in lattice parameter occurred but there was no measurable change in crystallite size or crystallite strain, and no phase changes were observed. The increase in crystal lattice parameters closely parallels similar measurements on uranium dioxide, which is iso-structural.	Lattice Parameter of MoO3 - both: irradiated and unirradiated
643	FUNCTIONAL SPECIFICATION OF CDFR INNER NEUTRON SHIELD ELEMENTS	SHERWOOD D	1982	TN/P(82)576	National Nuclear Corporation Limited	DFR	Inner Neutron Shield, CDFR	This note contains a brief functional specification and component description of the two types of neutron shield element contained in the CDFR inner radial shield. It is to be used as background information in a value engineering analysis.	Designs of neutron shields of different material compositions, with inspection and testing analysis. Blueprints of Steel and Steel/Graphite Inner Neutron Shield.
774	A MANUAL FOR THE TASKS SYSTEMS MANAGER AND DESCRIPTION OF THE OPERATION OF THE TASKS WITHIN THE PFR ROUTINE REACTOR PHYSICS CALCULATIONAL ROUTES ON THE RISLEY ICL 2982 COMPUTER	NEWTON TD	1983	NDR-774	UKAEA Reactor Group	PFR	PROXY System, Tasks, Reactor Physics Calculations, TOPSY	This report is a key report associated with the Methods of Calculation and their accuracy. This report describes the operation of Tasks within the PROXY System used to perform routine reactor physics calculations for PFR. A reference set of Task methods and the role of the Task Systems Manager in maintaining this reference set is also described.	Structure of TOPSY Directories
1103	CFRX DESIGN REPORT - SECTION 3 - CFRX NEUTRON SHIELDING AND NUCLEONIC INSTRUMENTATION	BROCKLEHURST PG	1979	DM/P(79)267	Nuclear Power Company Limited	CFRX	CFRX Design, Neutron Shielding, Nucleonic Instrumentation	Note containing an information on: Neutron Shielding and Nucleonic Instrumentation.	Design of CFRX Shield (schematic)
1214	THE PHOTON AND NEUTRON CALIBRATION OF THERMOLUMINESCENT DOSEMETERS FOR REACTOR MEASUREMENT	KNIPE AD	1984	AEEW-R-1748	AEE WINFRITH	PFR	Calibration, Dosemeter, Dosimetry, TLD-700	This report is a key reference associated with Miscellaneous Measurements. The absolute photon energy deposition calibration procedure and the fast neutron response of 7Li-F thermoluminescent dosemeters (TLD-700) have been studied experimentally. The results, and their application are examined in the context of the mixed radiation environment of a zero power fast reactor.	Details of experiments associated with Reactor Measurements are presented within this report. The results from the experiments are included as well as their application, thus provided valuable insight into the Core Physics area.
1276	JOINT PFR IRRADIATION PROGRAMME TO STUDY NEUTRON INDUCED VOID SWELLING FOR LMFBR APPLICATION	WATKIN JS;BROWN C;WILLIAMS TM	1984	CPN/787;DFMC/P(84)	RNL; DNE; AERE	PFR	Void Swelling, PIE, LMFBR	This report is a key reference associated with Sodium Void. The review of the objectives and implementation of the UKAEA void swelling programme is defined within this reference.	Information associated with the UKAEA void swelling programme.
1329	THE EARTHQUAKE INDUCED REACTIVITY CHANGED IN CDFR; CALCULATIONS AND PROPOSAL FOR SUPPORTING EXPERIMENTS	DUTHIE JC	1986	CFR/FEDWP/P(84)981;ND-R-1076(S)	NNC; UKAEA	DFR	Earthquake, Reactivity, CDFR	This report is a key reference associated with Reactivity and Burn-Up. The report highlights the reactivity changes resulting from seismic disturbances. The analysis is applied to the CDFR (1981) Design.	Reactivity Calculations
1345	AN OUT-OF-REACTOR STUDY OF ABSORBER ROD VIBRATION AND ITS IMPLICATIONS FOR WEAR AND REACTIVITY NOISE	RIDEALGH F;BRAMAH PJ;MELVIN G	1984	PFR/FEDWP/P(84)1009;NDR-1142;PFR/SWP/ESC	UNKNOWN	PFR	Noise, MK IV, MK III, Control Rods, Frequency	This report is a key reference associated with Reactivity noise. The report focuses on analysis of the results obtained during the experimental programme. The initial purpose of the proposed experiment was to carry out an endurance test on the MK IV control rod with spring stabilisers and was later extended to include MK III as well. The measurements showed larger than expected vibration amplitudes, and a test including restraint showed that those can be reduced significantly. stabilisers, and was later extended to include MK III as well. The measurements showed larger than expected vibration amplitudes, and a test including restraint showed that those can be reduced greatly. In addition, the calculations of reactivity noise were carried out (assuming both coherence and incoherence of the 5 rods used). Recommendations on # of rods to be used is made.	Plenty, related to MKIII and MKIV Control Rods.

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
1368	FISPIN 4 - A COMPUTER PROGRAMME TO CALCULATE THE HEAVY ISOTOPE AND FISSION PRODUCT INVENTORIES OF IRRADIATED REACTOR FUELS	RICHARDSON BL	1976	TRGM-6907;PPWP/P(75)62	UKAEA Reactor Group	None	FISPIN 4	This report is a key reference associated with Calculational Methods. This report introduces methods of calculation used by FISPIN 4, as well as data libraries. It then sets out the requirements for FISPIN 3 calculations, and finishes off with some example calculations.	Review of various calculational methods associated with the Core Physics area.
1393	THE APPLICATION OF THE VIRTUAL SOURCE ENTRAINMENT MODEL IN NUCLEAR SAFETY CALCULATIONS	BARKER CD	1980	ARPWG/P(80)43	CEGB	None	Virtual Source Building Entrainment model, discharge	This report is a key reference associated with Calculational Methods. The report introduces a mathematical model which can be used to estimate the near field air concentrations of activity due to atmospheric discharges of radionuclides from AGR and MAGNOX buildings.	Review of various calculational methods associated with the Core Physics area.
1443	EBR-2 NEUTRON SPECTRA AND DISPLACEMENT DAMAGE RATES	STANDRING J;DEAN CJ	1984	CPN/791	UKAEA Springfields	None	Conversion, dpa, fluence	In the report, conversion factors between neutron fluence and dpa (displacements per atom) are derived. This was done based on the EBR-2 neutron spectrum.	Conversion Factors.
1608	A REVIEW OF NEUTRON FLUX INSTRUMENTATION DEVELOPMENT FOR CDFR (JULY 1982)	WILSON I;GOODINGS A	1982	CNIWG/P(82)2;PPWP/P(82)354	AEE WINFRITH	DFR	Instrumentation, CDFR, Neutron Flux	Since requirements for neutron flux measurements outlined in the NNC Design Concept Status Report - CDFR (1981) appear to present no new problems, major changes in the scope of the present development programme are necessary. In reviewing the status of developments pertinent to CDFR the paper also draws on recent experience in related areas where the technical problems are similar.	Review of the development activities completed associated with Neutron Flux Instrumentation is presented within the report. This development is also compared with that for different technical areas with similar problems.
1615	ESTIMATING THE EQUIVALENT GAMMA DOSE RATE DUE TO PRIMARY SODIUM AROUND THE PENETRATION LOCATED AT THE PERIPHERY OF THE SMALL ROTATING PLUG, EdF PAPER IN FRENCH	HARRER A;LAURENT G;NIMAL JC	1984	SPX2/TA/P(84)19	EDF	Written in French	Written in French	Written in French	Written in French
1627	REMOVAL OF IRRADIATED SUB-ASSEMBLIES PRELIMINARY STUDY OF GAMMA AND NEUTRON SHIELDS OF THE TRANSFER SHUTTLE FOR THE WATER VERSION, EdF PAPER IN FRENCH	LAURENT G	1982	SPX2/TA/P(84)31	EDF	Written in French	Written in French	Written in French	Written in French
1784	ADVANCED FUEL DESIGN FOR FAST REACTORS: ASSESSMENT OF PERFORMANCE AND ECONOMICS.	SHEPHERD J; HERRICK R; HARRISON J	1985	UNREFERENCED	CTS	PFR	Fuel Design, Economics, Performance		
2186	CDFR THERMAL HYDRAULIC CODES A REVIEW OF THE CODES IN THE PLANT AREA	MITCHELL C	1983	CFR/PTWG/P(83)27;FRDCC/PPWG/P(83)4	UNSPECIFIED	DFR	Thermal Hydraulics Codes, Plant Area, Review	The note reviews the current status of plant thermal hydraulic codes and their role in the provision of data for validating and operating a commercial fast reactor plant. An objective of the review is to ensure that the utilisation of the limited project resource is maximised and unnecessary duplication avoided. It recommends continuation of the current evolutionary process with more focused overall objectives. The note should also be useful when comparing British and European codes for fast reactor applications.	Description of the hydraulic codes with recommendation as to where they can be used.
2225	COLLABORATIVE DISCUSSIONS ON CORE PHYSICS AND OPTIMISATION CADARACHE, 3-4 MAY 1984	THORNTON DEJ	1984	PPWG/P(84)17					
2332	MODELLING THE TRANSIENT BEHAVIOUR OF FISSION GAS	MATTHEWS JR;WOOD MH	1979	TP.782	AERE Harwell				
2335	COMPARISON OF EXPERIMENT AND NEFIG MODEL CALCULATIONS OF TRANSIENT FISSION GAS BEHAVIOUR	WOOD MH;MATTHEWS JR;MATTHEWS HR	1976	TP.793	AERE Harwell				
2425	CFR CORE PHYSICS CALCULATIONS	THORNTON DEJ	1976	PPWP/P(76)111;TRG MEMO 7267	CTS	CFR	Core Physics Calculations, Review	This reference is a key report associated with Calculational methods. This paper reviews work carried out in the core physics field since the previous review in June 1975. The paper focuses on already published work, neglecting the work at progress - which is described as part of this report. Finally, the paper draws attention to areas which would repay further work.	Review of various calculational methods associated with the Core Physics area.
2427	THE EFFECT OF VARIOUS MATERIAL CHANGES ON BREEDING GAIN, REACTIVITY, SODIUM VOID AND DOPPLER CONSTANT	SUNDERLAND RE	1977	PPPWP/P(76)121;TECH MEMO P & S(R)/788	NPC Ltd.	CFR	Doppler Constant, CFR Core Type 8, Sodium Void Reactivity, Breeding Gain, PE16, FV548	This report is a key reference associated with Reactivity and Sodium Voids. A number of tables and graphs give effects of wrapper materials and wrapper thickness on breeding gain, reactivity, sodium void reactivity, and Doppler Constant. The variation of breeding gain and reactivity with sub-assembly pitch, core can thickness and radial breeder can thickness; and the effect of fuel density on sodium void and Doppler constant are given. The effect of changes in position of the inner/outer core boundary have been added.	Review of various calculational methods associated with the Core Physics area.
2430	LOW VOIDING REACTIVITY DESIGNS FOR CFR	CURTIS GC	1977	PPWP/P(77)188;NDM-182	UKAEA	CFR	Breeder, Voiding Reactivity, Breeding Ratio, Doubling Time.	This report is a key reference associated with Reactivity and Sodium Voids. The two designs (The small and standard cartwheel) described are alike in having six radial 'spokes' of breeder in the core region, but differ in the arrangement of the nineteen central sub-assemblies. This brings the whole voiding reactivity down to 0.33% as compared with 2% for the reference design CFR8. The breeding gain is 0.3 compared with 0.18, while doubling time improves to 24 years from 44; however, the mean enrichment has to be raised to 0.256 from 0.194. A reactor power of 3420 MW and specific inventory of 2,7 kg Pu(E)/MW(E) are attainable, subject to an allowance for fuel management.	Review of various calculational methods associated with the Core Physics area.
2433	CFR CORE PHYSICS CALCULATIONS INFORMATION FOR COMMERCIAL FAST REACTOR DESIGN REQUIRED FROM PFR	THORNTON DEJ	1977	PPWP/P(77)163;TRG MEMO 7562	UKAEA	CFR	Core Physics Calculations, Review	This reference is a key report associated with Calculational methods. This paper reviews core physics and associated computer code development since the review in July 1976. Reference is made to committee papers and other formal documents where possible, but monthly progress reports to the Plant Performance Working Party are also used in the absence of other sources. Work in progress is outlined, and suggestions are made for further work.	Review of various calculational methods associated with the Core Physics area.
2476	A COMPARISON OF CALCULATED AND MEASURED REACTIVITIES FROM PU241 DECAY IN ZEBRA ASSEMBLY 13	STEVENSON JM	1975	DIDWG/P(75)64	AEE WINFRITH	CFR	FGL5, Reactivity Loss, Validation	This report is a key paper associated with Calculational methods. Calculations have been carried out using FGL5 to predict the loss of reactivity from Pu241 decay and Am241 production in simple representations of ZEBRA Assembly 13/1, applying various small corrections to obtain results for the actual assembly.	The reactivity loss per day as a result of Pu241 decay, and Am241 production, and Reaction Rates.
2477	COMPARISONS OF PERIOD-TO-REACTIVITY CONVERSIONS USING DIFFERENT DELAYED NEUTRON RECOMMENDATIONS	STEVENSON JM	1975	DIDWG/P(75)67					
2478	CONSIDERATION OF ERRORS IN REACTIVITY SCALES BASED ON PERIOD MEASUREMENTS IN FAST REACTORS	STEVENSON JM	1975	DIDWG/P(75)89					

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
2483	COMPARISON OF DECAY HEAT DATA FOR CDFR SUB-ASSEMBLIES USING ENDF/B-IV DATA FOR FISSION PRODUCTS AND USING A NEW UK SET	PHILLIPS AW;BAKER AR	1978	DIDWG/P(78)173		DFR			
2485	EXPERIMENTS TO DETERMINE THE RATE OF BETA ENERGY RELEASE FOLLOWING FISSION OF PU239 AND U235 IN A FAST REACTOR	MURPHY MF;TAYLOR WH;SWEETD W;MARCH MR	1977	DIDWG/P(77)147	AEE WINFRITH	DFR	FISPIN, Beta Energy, ZEBRA.	This report is a key paper associated with Calculational methods. Measurements have been made of the rate of beta energy release from Pu239 and U235 fission fragments over a period of 10^7 seconds following 10^5 second irradiation in the zero-power fast reactor ZEBRA. Results are compared with predictions using FISPIN and FISP codes and associated data.	Irradiation Details, Details of Measured Components, etc.
2486	A REVIEW OF FISSION PRODUCT DECAY HEAT DATA	JAMES ME	1978	DIDWG/P(78)174					
2487	DECAY HEAT TESTING OF THE UK-ENDF/B-IV FORMAT FISSION PRODUCT DECAY DATA FILE	TOBIAS A	1977	DIDWG/P(77)159;RD/B/N4179;CNDC/P(77)16;IMAC/P(78)23					
2489	ABSOLUTE YIELDS AND GROUP CONSTANTS OF DELAYED NEUTRONS IN THE FAST FISSION OF 235U, 238U AND 239PU	BESANT CB;CHALLEN PJ;MCTAGGART MH;TAVOURLARIDIS P; WILLIAM SJG	1976	DIDWG/P(76)115					
2490	THE CONTRIBUTION TO THE FAST REACTOR DOPPLER EFFECT FROM CROSS-SECTION CHANGES IN DIFFERENT ENERGY RANGES; ASSESSMENT OF NEW RESONANCE EVALUATIONS	BUTLAND ATD	1979	DIDWG/P(78)166	AEE WINFRITH				
2492	PROPOSED MEASUREMENT OF DELAYED NEUTRON SPECTRA	MCTAGGART MH	1979	DIDWG/P(79)192					
2502	THE EFFECT ON FAST REACTOR DESIGN OF POWER FROM FISSION PRODUCT GAS	BRINDLEY KW	1979	DIDWG/P(79)202;TN/P(79)348	Nuclear Power Company Limited	PFR	Fission Gas, FISPIN, Decay Heat, Review	This paper has been written in response to an action placed at the Specialist Meeting of DIDWG on 29th June 1978, which aimed to determine whether there are any special decay heat problems in reactor design, associated with gaseous fission products. They authors fail to identify any areas of the FR design which is unduly sensitive to the accuracy of fission product gas nuclear data.	Energy Generated in Plenum as a result of release of different Fission Gases.
2505	UKFPDD-2: A REVISED FISSION PRODUCT DECAY DATA FILE IN ENDF/B-IV FORMAT	TOBIAS A;DAVIES BSJ	1980	DIDWG/P(80)225;CNDC/P(80)6;IMAC/P(80)72					
2533	SODIUM-COOLED FAST NEUTRON BREEDER REACTORS: A REVIEW OF THE SAFETY-RELATED PHYSICS: SELECTED POINTS FOR DISCUSSION	BAKER AR	1985	FRDCC/SWG/WCASG/P(85)26	AEE WINFRITH	FR	Safety, Review	An overview of the safety related physics of FRs, and a subsequent draft written by a team headed by Dr. R. S. Pease.	Review of the Safety Concerns associated with Fast Breeder Reactor Cores. Key points are defined within the report and further reviewed.
2581	REACTOR PHYSICS INFORMATION FROM PFR DURING 1980	LORD DJ	1980	PPWP/P(81)300	AEE WINFRITH	PFR	Reactor Physics, Review, Run 4, Run 5	This paper is a key reference associated with Reactor Physics. This paper describes the physics information obtained from PFR during the year up to the end of October 1980. This period covered reload 4, and part of run 5 (which has not finished at time of writing). Limited operation prevented a portion of planned experiments from being performed. Attention is paid to: Theoretical Analysis of Natural Circulation Experiments, the assessment of thermal fluctuations in the PFR above core plenum and analysis of PIE results from fuel samples.	Summary of operation, as well as RGC Core Centre Line Composition Changes (% Atom)
2608	THE PFR REACTIVITY DISCREPANCY AFTER RELOAD 5	LORD DJ	1981	PPWP/P(81)329	AEE WINFRITH	PFR	Reactivity, Benchmark, OPEX	This report is a key reference associated with the Miscellaneous Measurements. During Reload 5 a discrepancy in the measured and calculated reactivity added during the reload was apparent. This paper describes the initial discrepancy and the results of the investigation into it. Authors conclude that the discrepancy was a result of a combination of small effects, including: use of an outdated data, not accounting for sub-assembly or pin rotation, etc.	OPEX
2620	QUALITY ASSURANCE PROCEDURES FOR THE RADIATION PHYSICS DEVELOPMENT PROGRAMME STAGE II IMPLEMENTATION OF THE REFERENCE SET OF CODES AND ARCHIVING PART 2 DETAILED SPECIFICATION OF THE REFERENCE SET DESIGN	RICKETS MCCLARY IG;CONIBEAR G	1982	PPWP/P(82)341;ARPWG/P(81)30					
2632	QUALITY ASSURANCE PROCEDURES FOR THE RADIATION PHYSICS DEVELOPMENT PROGRAMME STAGE II IMPLEMENTATION OF THE REFERENCE SET OF CODES AND ARCHIVING	BUTLAND ATD;BUTLER J;MILLER PC;RICKETS TM	1982	PPWP/P(82)340;FPWG/P(81)57;ARPWG/P(81)30;GCRMC/P(81)15					
	STATUS OF METHODS AND DATA FOR CALCULATING FAST REACTOR FISSION PRODUCT CAPTURE AND REACTIVITY EFFECTS	ROWLANDS JL	1982	PPWP/P(82)353;DIDWG/P(82)272					
2650	A NOTE ON THE EXTENSION OF THE FUEL BURNUP EQUATIONS USED IN ROUTINE REACTOR PHYSICS CALCULATIONS FOR PFR	NEWTON TD	1981	NDM-1721;PPWP/P(82)358	Dounreay Nuclear Power Development Establishment	PFR	Burnup, Reactor Physics Calculations , FISPIN	This reference is a key report associated with Calculational methods. This paper describes the changes and extensions introduced into various COSMOS Modular codes to facilitate a more accurate calculation of fuel burnup and the calculation of nuclide number densities required for the determination of subassembly neutron source.	Updated Burnup equations
2653	STATUS OF METHODS AND DATA FOR CALCULATING FAST REACTOR FISSION PRODUCT CAPTURE AND REACTIVITY EFFECTS	ROWLANDS JL	1982	PPWP/P(82)353					
2662	A STUDY OF THE PRODUCTION OF PEAK PIN SUBASSEMBLY BURNUP AND RATING DATA WITHIN THE "ROUTINE" REACTOR FOLLOWING AND PLANNING CALCULATIONAL METHODS USED FOR PFR	NEWTON TD	1983	FRCMWG/P(83)279		PFR			
2750	REACTION RATES IN AND NEAR TO TANTALUM AND BORON CONTROL RODS IN ZEBRA 7C - A COMPARISON OF CALCULATION AND EXPERIMENT	PICKERING WJ;REDMONDS BE;WHYMAN EK	1968	RPWP/P(68)52;IFRC/P(68)55	UKAEA	PFR	ZEBRA, Reaction Rates, Control Rods	This report is a key reference associated with Control Rods. Two sets of ZEBRA 7C experiments have been analysed using FD2 data together with calculation methods similar to those currently used for the PFR. The experiments consisted of boron 10 reaction rate scans in and near to simulated PFR boron control rods, tantalum reaction rate scans within a simulated PFR tantalum rod and a U235 fission rate scan between a pair of tantalum rods Comparisons have been made between theoretical predictions and the experimental results to five an indication of the accuracy of the methods used and hence some information on the uncertainty in PFR predictions using similar methods.	Comparison of experimental and calculated data associated with reactions rates in and near to tantalum and boron control rods
2752	FISSION PRODUCT DATA USED BY THE PFR PROJECT	BRINDLEY KW;MANN JE	1968	RPWP/P(68)59	AEE WINFRITH	PFR	Fission Product Data	This reference is a key report associated with Calculational methods. Sources of fission product data used in design and for physics predictions of PFR are listed. Consideration is given to whether the accuracy of this data is adequate.	Review of various calculational methods associated with the Core Physics area.

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2753	SUMMARY OF DATA, METHODS AND PROGRAMMES USED FOR PFR CALCULATIONS	MANN JE	1968	RPWP/P(68)62		PFR			Review of various calculational methods associated with the Core Physics area.
2754	THE TRANSPORT CORRECTION TO CALCULATED TANTALUM ROD WORTHS IN ZEBRA 7C	GUBBINS ME	1968	RPWP/P(68)63	AEE WINFRITH	PFR	ZEBRA 7C. Rod Worths, Tantalum Rods, WDSN, CHASE, SCRAMBLE	This report is a key reference associated with Control rods. Applying the correction to the control rod worths calculated using diffusion theory. The paper explores the origins of the transport correction for central rod using finite difference codes: WDSN and SCRAMBLE, and examines other rod configurations using SCRAMBLE with CHASE. The central rod worth was calculated using CHASE and compared with the WDSN results to give confidence in Monte Carlo results.	Review of various calculational methods associated with the Core Physics area.
2755	THE ACCURACY OF CALCULATIONS OF PFR CONTROL AND SHUT-OFF ROD WORTHS USING THE FD4 DATA	COLLINS PJ;BAKER AR;ALLON JR	1969	RPWP/P(69)4	AEE WINFRITH	PFR	Accuracy, FD4 data, ZEBRA 7C	This paper is a key reference associated with temperature and reactivity coefficients. The paper dwells on the series of measurements of the reactivity worths of simulated PFR control and shut-off rods made in the ZEBRA 7C assembly. The composition and size of the rods used in this investigation was similar to that of PFR, but the model was not exact. An additional experiments were performed to study the effects of different amount of absorber in different geometry and is discussed in this paper.	Review of various calculational methods associated with the Core Physics area.
2758	THE ACCURACY OF FD4 CALCULATIONS OF REACTION RATES WITHIN TANTALUM AND BORON CONTROL RODS	COLLINS PJ;ALLEN JR	1980	RPWP/P(69)29	AEE WINFRITH	PFR	Tantalum rods, Boron rod, FD4, FD2	This report is a key reference associated with Control Rods. Re-analysis of two experiments: fully inserted boron rod at the core edge, and fully inserted tantalum rod near the edge of the inner core using FD4 data.	Review of various calculational methods associated with the Core Physics area.
2759	CORE PERFORMANCE AND SAFETY IMPLICATIONS OF THE USE OF LIMBO FUEL	SMITH RD	1970	CPWP/P(70)57;CFR/SWP/P(70)74					Review of various calculational methods associated with the Core Physics area.
2761	COMPARATIVE STUDY OF THE PHYSICS OF A 3-ZONE CFR CORE	MOORHEAD TP;WHITE RP	1970	CPWP/P(70)63					Review of various calculational methods associated with the Core Physics area.
2764	CFR FUEL CYCLE: FLUX AND REACTIVITY PERTURBATIONS	LESLIE R;COCHRANE R	1971	TRG-M-5477;CPWP/P(71)69	CTS Risley	CFR	Fuel Cycle, Perturbations	This report is a key reference associated with Control rods. This memorandum investigates the perturbations caused by control rod movements and replacing subassemblies both individually and in groups, and also investigates the difference in flux distribution between cores with uniform fuel and those with sub-assemblies differing in irradiation. The XY SCRAMBLE with two energy groups has been used throughout.	Review of various calculational methods associated with the Core Physics area.
2765	SIMULATED MELT-DOWN EXPERIMENTS IN ZEBRA CORE 8G/3 AND A COMPARISON OF THE RESULTS WITH TURTLE CALCULATIONS	COLLINS PJ;INGRAM G;BURBIDGE BLH	1970	PFR/SWP/P(70)15;CFR/SWP/P(70)61;CPWP/P(71)71	AEE WINFRITH	PFR	ZEBRA 8G/3, Melt-down, TURTLE	This paper is a key reference associated with temperature and reactivity coefficients. A series of measurements to investigate the reactivity effects of fuel meltdown were made at the centre of the test region of ZEBRA 8G/3 Core, as an extension to measurements made in ZEBRA 7 Core (PFR Mock-up). The new features included greater compaction of fuel, and the introduction of voids. The experimental results were intended to act as a validation set for Monte Carlo codes and transport theory techniques which were used for the purposes of PFR at that time.	Review of various calculational methods associated with the Core Physics area.
2766	METHODS OF APPROXIMATING THE CFRI TYPE 2 VARIABLE PITCH FOR CORE PHYSICS CALCULATIONS WITH TRIANGULAR AND HEXAGONAL MESHES	BISHOP DC	1971	CPWP/P(71)96					Review of various calculational methods associated with the Core Physics area.
2769	STEADY STATE FLUX PERTURBATIONS AS A FUNCTION OF THE SIZE OF A FAST POWER REACTOR	ADAMSON J;GRIFFITHS DT	1971	CPWP/P(71)110;FRGN 83	AEE WINFRITH	FR	Steady State, Flux Perturbations,	This paper is a key reference associated with temperature and reactivity coefficients. This paper is concerned with the flux perturbation resulting from a localised reactivity insertion (e.g. control rod) in a fast reactor, and studies the magnitude of perturbation based on the reactor size. The calculations included are in the form of survey covering a range of sizes up to ~4 times the linear dimensions of the current CFR. The results suggest that the flux perturbations grow rapidly with linear dimension of the reactor, but is much more gradual with increasing volume.	Review of various calculational methods associated with the Core Physics area.
2775	USE OF COSMOS FOR CFR DESIGN	BISHOP DC;BRINDLEY KW	1973	CPWP/P(73)227;FRCMWP/P(73)89					Review of various calculational methods associated with the Core Physics area.
CPWP-P74-283.pdf	PROGRESS WITH ZEBRA CORE 13 EXPERIMENTS AND ANALYSIS 1974	COLLINS PJ;SANDERS JE;STEVENSON JM	1974	CPWP/P(74)283	AEE WINFRITH	PFR; CFR	ZEBRA, CORE 13	This reference is a key report associated with Calculational methods. This report summarises the state of the experimental and analytical work at a stage where the Zebra Core 13 programme is about 2/3 completed. The report discusses several basic design parameters, and several versions of the core that have been built to meet the need of the experimental programme, as well as some theoretical interpretation of the Core 13 results, within the COSMOS framework.	Review of various calculational methods associated with the Core Physics area.
2784	DELAYED NEUTRON YIELD DATA RECOMMENDED FOR FAST AND THERMAL REACTOR CALCULATIONS	ROWLANDS JL	1974	PPWP/P(74)29;RPNK/P(74)51					Review of various calculational methods associated with the Core Physics area.
2788	ESTIMATION OF THE POSSIBLE RANGES OF NEUTRON FLUX INSTRUMENTATION CFR1 - 12.6.75	GOODINGS A	1975	FREDSWG/P(75)6;CNIWG/P(75)10;PPWP/P(75)65					Review of various calculational methods associated with the Core Physics area.
2896	THE COVA PROGRAMME: COMMENTS ON THE SUGGESTION THAT THE ENERGY YIELD OF THE LDE CHARGE MAY BE SIGNIFICANTLY REDUCED IN A TEST WITH A NEUTRON SHIELD BECAUSE OF HEAT TRANSFER EFFECTS	KENDALL KC	1980	FREC/P(80)26					Review of various calculational methods associated with the Core Physics area.
2962	A REVIEW OF REACTIVITY CALCULATIONS FOR FAST REACTOR ACCIDENTS	MITCHELL B	1977	FREYWG/P(77)153	CTS Risley	FR	Point Kinetics, Reactor Physics, Reactor Dynamics	This reference is a key report associated with Calculational methods. This paper Is literature review, and offers a discussion on methods of solving time dependant Boltzmann-Transport equation (using point kinetics).	Review of various calculational methods associated with the Core Physics area.
2965	USA INFORMATION ON THE TRANSIENT RELEASE OF FISSION GASES FROM OXIDE FUEL GRAINS BEFORE MELTING	MOORHEAD TP	1977	FFWG/P(77)27;FREYWG/P(77)156;FRGN.569					Review of various calculational methods associated with the Core Physics area.

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
2972	COMMENTS ON THE POSSIBLE DAMAGING EFFECTS OF FISSION GAS RELEASE	CLARE AJ;BUTTERY NE	1977	FFWG/P(77)25;FREYWG/P(78)174					Review of various calculational methods associated with the Core Physics area.
2987	A FISSION GAS PRESSURE MODEL FOR THE SARAZEII DISASSEMBLY CODE	WALKER SP	1979	FREYWG/P(79)198					Review of various calculational methods associated with the Core Physics area.
2990	THE EFFECT ON PREDICTED EXCURSION YIELDS OF THE INCLUSION OF FISSION GAS PRESSURES INTO CFR DISASSEMBLY CALCULATIONS	WALKER SP	1979	FREYWG/P(79)202	AEE WINFRITH	CFR	Fission Gas, Excursion Yields, Disassembly Calculations, SARAZE 2	This reference is a key report associated with Calculational methods. This note presents fast reactor disassembly calculations made using a modified version of the SARAZE 2 code, which simulates a spherical reactor core, surrounded by a breeder region, and sodium. The modifications used in this version incorporate the use of fission gas pressure model, and takes into account an uneven gas distribution throughout the core and within a pin. In the paper, 5 different cases are explored, and the authors conclude that the dominant parameters affecting the extent of the reduction in accident severity obtained from the inclusion of fission gas into voided core disassembly calculations are the doppler coefficient and ramp rate.	Review of various calculational methods associated with the Core Physics area.
2996	REDUCTIONS IN PREDICTED EXCURSION YIELDS FROM INCORPORATION OF FISSION GAS PRESSURES INTO DISASSEMBLY CALCULATIONS	WALKER SP	1979	FREYWG/P(79)214					Review of various calculational methods associated with the Core Physics area.
3000	ACCURACY OF PREDICTION OF DOPPLER AND SODIUM VOID REACTIVITY FOR CDFR	BRINDLEY KW	1980	FREYWG/P(80)224;TN/P(80)389	Nuclear Power Company Limited	DFR	Sodium Void Reactivity, Doppler Constant	This paper is a key reference associated with Sodium Void. Brief overview of the papers related to the accuracy of the Doppler Constant and Sodium Void Reactivity.	Review of various calculational methods associated with the Core Physics area.
3093	TRANSPORT THEORY REACTIVITY CALCULATIONS FOR PFR MELTDOWN INCIDENTS	CURTIS GC	1971	PFR/SWP/P(71)33	AEE WINFRITH	PFR	Meltdown Incidents, Central sub-assembly core, Monte Carlo	This reference is a key report associated with Calculational methods. This paper postulates a sub-assembly fault that redistributes material axially, leaving radial displacement (from local vapour explosion) to be treated elsewhere. Here, few worst cases of a particular type are studied, and the resulting change to reactivity, in hope that it would be < 1 Dollar (<< 1%). The calculations showed an expected increase of reactivity of 0.25% in case of a meltdown of the central sub-assembly of core.	Review of various calculational methods associated with the Core Physics area.
	REPORT ON TEAM VISIT TO TOKYO FOR THE INTERNATIONAL SYMPOSIUM ON PHYSICS OF FAST REACTORS 16-23 OCTOBER 1973	CAMPBELL CG	1973	FRDC/CPWP/P(73)245					
3098	CALCULATION SCHEME DEVELOPED FOR PFR PHYSICS STUDIES	HIRST IL	1970	FRCMWP/P(70)4	AEE WINFRITH	PFR	Procedure, Scheme, Calculations	This reference is a key report associated with Calculational methods. Document presents calculation methods used in Physics Studies.	Review of various calculational methods associated with the Core Physics area.
CPWP-P73-225.pdf	THE ANALYSIS OF THE ZEBRA 12 CONTROL ROD EXPERIMENTS AND PROPOSED METHODS OF CALCULATING PFR AND CFR CONTROL ROD WORTH	BROOMFIELD AM;COLLINS PJ;CARTER MD;MARSHALL J	1973	FRCMWP/P(73)100;CPWP/P(73)225	AEE WINFRITH	PFR; CFR	ZEBRA, Control Rod Worth, MONJU, MZC	This report is a key reference associated with Control rods. Two series of control rod experiments in Zebra 12. The first was: MZC programme using the MONJU mock-up rods, and the second series used PFR/CFR natural born mock-up rods. Those are reviewed in this paper.	Review of various calculational methods associated with the Core Physics area.
3113	THE USE OF THE 2000 ENERGY GROUP REACTOR PHYSICS CODE MURAL IN THE INVESTIGATION OF SPECIAL EFFECTS IN FAST REACTORS	MACDOUGALL J	1973	FRCMWP/P(73)104	AEE WINFRITH	FR	MURALB, Guide	This reference is a key report associated with Calculational methods. The brief guide to the MURALB code. The paper dwells on the mechanics of code more than its application.	Review of various calculational methods associated with the Core Physics area.
3118	SIMULATED MELTDOWN AND VAPOUR EXPLOSION EXPERIMENTS IN ZEBRA 8G AND ZEBRA 12 AND THEIR INTERPRETATION	COLLINS PJ;INGRAM G;CODD J	1973	FRCMWP/P(73)109	AEE WINFRITH	PFR	Meltdown, Vapour Explosion, ZEBRA 8G, ZEBRA 12	This reference is a key report associated with Calculational methods. Two hypothetical accident conditions have been simulated in ZEBRA to provide data for dusting the accuracy of calculation methods. The first configuration, called the meltdown model was studied in ZEBRA 8G/3 Core. Here, the fuel in the central sub-assembly size region slumped to bottom 1/3 of core with expulsion of sodium. The case of whereby sodium remained in the core was studied in ZEBRA 12, the assembly which resembled the power reactor more closely. The second configuration tested in ZEBRA 12 was the vapour expulsion model, in which fuel was radially compacted and positioned at the core/breeder interface. The calculations were produced using RZ transport codes, and gave satisfactory results, which coincide with the experimental values.	Benchmarking RZ Transport codes, Experimental and calculated results for meltdown models in ZEBRA 8G and 12 Cores.
3123	ANALYSIS OF THE SEFOR I AND II DOPPLER EXPERIMENTS AND THEIR USE IN ASSESSING THE ACCURACY OF CALCULATED FAST REACTOR DOPPLER EFFECTS	BUTLAND ATD	1974	FRCMWP/P(74)136;DIDWP/P(74)54					
3124	THE ANALYSIS OF THE SODIUM REMOVAL EXPERIMENTS IN ZEBRA ASSEMBLY 13 (THE SECOND PFR MOCK-UP) - PART 1	HARDIMAN JP	1974	FRCMWP/P(74)144;ZTN/13/20		PFR			
3125	THE DEPENDENCE OF CONTROL ROD WORTHS AND INTERACTION EFFECTS ON CORE SIZE	BUTLAND ATD;AYLEN W;DEAN CJ	1974	FRCMWG/P(74)145	AEE WINFRITH	CFR	Rod Worths, Interaction Effects, MK9	This report is a key reference associated with Control rods. Calculations have been made to study the effect of reactor size on control rod array worths and interaction effects in order to aid decisions regarding the size of a zero Power assembly needed to study these effects for cores of CFR size. Studied in three dimensions using the UK CFR Mk9 design investigated the effect of reactor size with different combinations and enrichments, thus varying rod spacing and rod worth but retaining inner and core fuel enrichments. The effect of changes in fuel, enrichment on the conclusions drawn from these calculations have been investigated. Using one dimensional cylindrical model with axial leakage, this model being a simplification of the three dimensional model. Two types of enrichment change were considered; first ensured that was constant with core size when all control rods were withdrawn. Three core (and reactor) diameters were considered in the 3D calculations i.e. 2.4m, JM (the proposed size-of the UK CFR), 3.6m (the proposed size of the French SUPERPHENIX). A further core diameter was considered for some studies in the 1D Calculations. i.e. 1.5m (PPR and ZEBRAMZB)	Calculations performed associated with Control Rod Worth and the Irradiation Effects on the Core Size. The results are presented and analysed within the report.

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
3127	THE ANALYSIS OF THE SODIUM REMOVAL EXPERIMENTS IN ZEBRA ASSEMBLY 13 - PART II SINGLE SUB-ASSEMBLIES ADJACENT TO A FULLY-INSERTED CONTROL ROD AND TO AN INNER CORE BREEDER SUB-ASSEMBLY	HARDIMAN JP	1974	FRCMWG/P(74)150	AEE WINFRITH	PFR	ZEBRA 13/3, Sodium Voiding	This report is a key reference associated with Sodium Void. This note briefly reports the results of the analysis of two series of sodium voiding experiments carried out in ZEBRA assembly 13/3 - the second PFR mock-up. In both experiments sodium was removed from six ZEBRA pin elements (approximating in area to a PFR sub-assembly) adjacent to a singularity. In one case the singularity was a fully0inserted PFR control rod assembly and in the second six breeder elements in the inner core. The method of analysis by diffusion theory and first-order perturbation theory follows. The authors conclude that the standard method adopted is capable of predicting the worths of pin sub-assembly voiding adjacent to major singularities in the second PFR mock-up at least as accurately as they may be measured with ZEBRA techniques. It was concluded that the central leakage terms could be predicted to one sigma.	Calculated and experimental results on Removal of Sodium, C13/3, and C13/5 Loading patterns for Na removal in the central sub-assembly region.
3128	A STUDY OF SIMPLE METHODS OF CALCULATING REACTIVITY CHANGES DUE TO SUB-ASSEMBLY BOWING	KEMSHELL PB;ANTONOPOULOS-DOMIS M	1974	FRCMWG/P(74)153;FRGN/307					
3155	WORK ON FAST REACTOR SAFETY UNDERTAKEN IN THE MATHEMATICAL PHYSICS DEPARTMENT, ALDERMASTON JUNE 1976 TO MARCH 1978	HOSKIN NE	1978	AWRE/44/91/119;NDM-214	UKAEA AWRE	PFR	ASTRATE, SEURBNUK, Validation	This reference is a key report associated with Calculational methods. The report reviews the work of Aldermaston group over a period of almost two years. It highlights the advancements in code development and validation.	Review of various calculational methods associated with the Core Physics area.
3198	THE ROLE OF FISSION GAS SWELLING AND RELEASE IN FAST REACTOR ACCIDENTS	MATTHEWS JR;WOOD MH	1978	TP.757	AERE Harwell	PFR	Accidents, Fission Gas Swelling/ Release	This paper examines the assumptions used in calculating fission gas swelling and release during accidents dealing particularly with: the non-equilibrium nature of gas bubbles; the role of grain boundary bubbles during fuel melting, and the effect of different models for steady state behaviour on the subsequent evolution of the fission gas distribution.	Review of assumptions made within calculations performed.
3209	THE DISTRIBUTION OF FISSION GASES IN MIXED OXIDE FUEL PINS IN FAST REACTORS	MOORHEAD TP	1978	FRAX NOTE 59;FFWG/P(78)23;FREYWG/P(78)190;FRGN/678	AEE WINFRITH	PFR	Fission Gas, FRAX, DFR	This report is a key reference associated with Calculational Methods. The purpose of this paper is to set out the information necessary to improve FRAX modelling, with intercomparing of theory and DFR irradiations of reference fuel pins. Information on gas production is summarised. Net gas emission is estimated to be 0.144 g of gas per MWD(t). The authors successfully compare the results from DFR calculations to an experimental data on fission gas release from US.	Fission Gas Release
3211	SUBASSEMBLY BLOCKAGE WAKE OVERHEATING DUE TO ESCAPED FISSION GAS ACCUMULATION	COWKING CB	1978	FFWG/P(78)11;FRSBWG/N(78)14					
3216	FRCMWG ACTION 26.2: TYPES OF DISPLACEMENT IN REACTIVITY CALCULATIONS	BAKER AR	-	ACTION 26.2					
3226	THE EFFECTS OF SUBASSEMBLY HETEROGENEITY AND MATERIAL BOUNDARIES ON THE SODIUM VOIDING AND DOPPLER EFFECTS IN A SODIUM COOLED FAST REACTOR	BUTLAND ATD	1978	FRCMWG/P(78)220					
3228	CALCULATIONAL METHODS FOR THE PFR EQUILIBRIUM CORE PHYSICS DATASHEETS	NEWTON TD;WEBSTER EB	1978	FRCMWG/P(78)218		PFR			
3229	THE SPATIAL AVERAGING OF CROSS SECTIONS FOR USE IN TRANSPORT THEORY REACTOR CALCULATIONS, WITH AN APPLICATION TO CONTROL ROD FINE STRUCTURE HOMOGENISATION	ROWLANDS JL;EATON CR	1978	FRCMWG/P(78)217	AEE WINFRITH	PFR	Control Rods, Fine structure representation	This report is a key report associated with Control Rods. This paper discusses the derivation of spatially averaged cross sections suitable for use in transport theory whole reactor calculations.	Review of information and calculations performed prior to transport theory calculations.
PPWP-P78-216.pdf	FURTHER PROGRESS WITH THE APPLICATION OF THE ADJUSTED DIFFUSION COEFFICIENT METHOD TO GAMMA HEATING PROBLEMS IN THE PFR	NEWTON TD;WEBSTER EB	1978	FRCMWG/P(78)216;FRMCSG/WG/N(78)108	DNE	PFR	COSMOS, User Guides	This report is a key reference associated with Calculational methods. This paper describes how modules of the COSMOS compatible code scheme were used in producing the PFR equilibrium core physics datasheets. The special strategies employed in some parts of the calculation are discussed. A number of new programs were written specially for datasheets project; these are described, and user guides given. Recommendations for future methods development work are made.	Review of various calculational methods associated with the Core Physics area.
3232	COMPARISON OF NEUTRON DIFFUSION THEORY CODES IN TWO AND THREE SPACE DIMENSIONS USING A SODIUM COOLED FAST REACTOR BENCHMARK	PUTNEY J;BUTLAND ATD;SWEET DW	1978	FRCMWG/P(78)213					
3234	USE OF THE ADC METHOD FOR CALCULATING GAMMA RAY HEATING IN THE CORE OF PFR	AVERY AF	1978	FRCMWG/P(78)210	AEE WINFRITH	PFR	ADC, Error Report,, Accuracy Computing time, Source Data	This report is a key reference associated with Calculational methods. A relation of Webster and Newton using ADC method for calculating gamma-ray heating. As a result of their work several questions arise concerning accuracy, computing time, and source data, and those are raised in this report.	Error report for ADC.
3235	A DESCRIPTION OF THE COSMOS SUB ASSEMBLY BOWING TASKS IN CURRENT USE AND THE STATUS OF THE MORE ADVANCED TASKS CURRENTLY BEING PREPARED	BUTLAND ATD	1978	FRCMWG/P(78)209;THWG/P(78)142					
3236	A METHOD FOR OBTAINING FAST REACTOR CONTROL ROD CROSS SECTIONS AS A COSMOS TASK	AGAR CWJL	1978	FRCMWG/P(78)208					
3241	METHODS TO ANALYSE THE EXPERIMENTS IN ZEBRA ASSEMBLIES BZA AND BZB	STEVENSON JM	1977	FRCMWG/P(77)198					
3244	REVISION OF THE ROUTE OF THE PROXY THREE-DIMENSIONAL FLUX TASK	SYMONDS AG	1977	FRCMWG/P(77)195					
3245	THE SODIUM VOID EFFECT: THE INFLUENCE OF HETEROGENEITY	GRIMSTONE MJ;BUTLAND ATD	1977	FRCMWG/P(77)194	UKAEA		Sodium Void, resonance shielding, broad group fine structure, anisotropic diffusion	This paper is a key reference associated with Sodium Void. This paper discusses the importance of the resonance shielding effect, the broad group fine structure effect and the anisotropic diffusion effect and the importance of treating them in the calculation of sodium voids worths in fast reactors.	Calculated values and discussion of the results
3247	THE SODIUM VOID EFFECT: A REVIEW OF CALCULATIONAL METHODS AND EXPERIMENTS	BUTLAND ATD;GRIMSTONE MJ	1977	FRCMWG/P(77)193	UKAEA		Sodium void, plutonium fuelled,	This paper is a key reference associated with Sodium Void. This paper reviews the accuracy requirements for the calculated sodium removal effects in plutonium fuelled fast reactors, discusses calculational methods and accuracies and surveys some of the completed and currently planned sodium removal experiments.	Calculated and Experimental Data associated with the Sodium Void effect
3252	PROPOSALS FOR CALCULATING THE REACTIVITY EFFECT OF CORE MATERIAL DISPLACEMENTS	ROWLANDS JL	1976	FRCMWG/P(76)176					

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
3253	SKELETON JOB DECKS TO RUN VARIOUS COSMOS MODULES AND UTILITY PROGRAMS	BILES C	1977	FRCMWG/P(77)186;FRMCSG/WG/N(77)27					
3256	THE FAST REACTOR DOPPLER EFFECT: CONSIDERATION OF CALCULATIONAL METHODS AND ACCURACIES	BUTLAND ATD;SIMMONS WN	1976	FRCMWG/P(76)171;DIDWG/P(76)104	AEE WINFRITH	PFR; CFR	SEFOR, FGL5, FD5, Accuracy, materials, perturbations	This report is a key reference associated with the methods for calculations and their accuracy. The conclusions reached as a result of the analysis of the SEFOR cores are extrapolated to CFR and PFR. Various aspects are considered including: (a) the comparison of FGL5 and FD5 predictions, (b)the accuracy of calculations up to 57000K, (c)the effect of fission products and higher isotopes of plutonium, on the e-+ calculational accuracy, (d)the effect of structural materials, (e) the calculational accuracy in a sodium voided core, (f) heterogeneity effects, (g) the importance of energy group structure and spatial mesh, (h) the usefulness of perturbation methods, (i) the effect of fuel pin and core temperature profiles (j) the importance of crystalline binding in the fuel. A calculational route available in the COSMOS scheme is recommended with associated uncertainties.	Results of various calculations
3257	DETAILED SPECIFICATION OF THE SUB-ASSEMBLY WRAPPER MATERIALS, MESHES, DAMAGE AND TEMPERATURE DATA STORES AND FUNCTIONAL SPECIFICATION OF THE PROPOSED COSMOS SERVICING MODULE SLAVE	BUTLAND ATD;HUTCHISON EA	1976	FRCMWG/P(76)170;FRMCSG/WG/N(76)1;ATDB/106					
3324	SPX2 ASSESSMENT OF CORE, FUEL AND NEUTRON SHIELD	ALLBESON KF;BARNES WD;CURZON AF;EVERY DP;SHERWOOD DV	1985	CFR/FEDWP/P(85)1069					
3375	ENERGY-DEPOSITION AND SHIELDING REVIEW	BUTLER J	1980	PPWP/P(80)298	AEE WINFRITH	DFR	Shielding, Review	This report is a key reference associated with Calculational methods. This review is concerned with the progress made on sensitivity analysis and data adjustment for shielding transport calculations. It considers an implications of development in thermal reactor programmes for CDFR shielding calculations, and summarises the programme for 1981	Review of various calculational methods associated with the Core Physics area.
3379	SUBCRITICAL REACTIVITY MONITORING	COX RJ;HARRIS DWG	1980	PPWP/P(80)292					
3447	THE ROLE OF NESTS IN THE COSMOS SCHEME	BUDD C	1982	FRMCSG/WG/N(82)288					
3459	SUB-CRITICAL MONITORING FOR RELOAD 5 OF PFR	MOFFATT HS	1982	FRMCSG/P(82)266	UKAEA	PFR	Count Rates, Neutron Fluxes, Count Rates	This report is a key reference associated with the Subcritical Reactivity Measurements. The calculations reported within this note attempt to follow the low power instrument count rates which were measured during reload 5. The paper makes a comparison between the calculated neutron fluxes near the instrument positions and the measured count rates and identifies possible sources of uncertainty within the calculation.	OPEX Data associated with the low power instrument count rates.
3462	COMPARISON OF SIMPLIFIED MODELS FOR PHYSICS CALCULATIONS ON THE CDFR DESIGN	EDWARDS SP	1980	TECH MEMO P&S(R)1104		DFR			
3464	COMPARISON OF TRANSPORT AND DIFFUSION THEORY PREDICTIONS IN HETEROGENEOUS CORES PART II K-VALUES AND SODIUM VOID REACTIVITY	CURTIS RH;BUTLAND ATD	1981	FRCMWG/P(81)252					
3467	A NOTE ON THE EXTENSION OF THE FUEL BURNUP EQUATIONS USED IN ROUTINE REACTOR PHYSICS CALCULATIONS FOR PFR	NEWTON TD	1981	FRCMWG/P(81)247		PFR			
3469	CALCULATION OF HOMOGENISED CROSS SECTIONS FOR CDFR CONTROL RODS AND FOLLOWER REGIONS	ROBINSON PJ;GRIMSONE MJ	1981	FRCMWG/P(80)242	AEE WINFRITH	DFR	Cross Sections, Control Rods, Follower Regions	This report is a key report associated with Control Rods. The work described in this paper concerns the production of improved macroscopic cross sections for all axial regions of CDFR control rods. Various methods of homogenisation of fine structure cross-sections over the 'hexagonal subassembly cell were investigated for the absorber region. These methods were evaluated by comparing calculations for a heterogeneous supercell model and a homogenised super cell model. In the low density, non-absorber regions, diffusion theory overestimates neutron transport and the corresponding cross-sections have been corrected for this effect using a method described in earlier work.	Review of calculational methods associated with determining the Cross Section for Control Rods. The methods were compared using calculations performed. The compassions are described within the report as well as a review of the methods.
3470	APPROXIMATIONS TO ANISOTROPIC SCATTERING IN NEUTRON TRANSPORT CALCULATIONS	MORYS PL	1980	FRCMWG/P(80)241;RD/B/N4571					
FRCMWG-80-P238.pdf	AN ANALYSIS OF BREEDER REACTION-RATE MEASUREMENTS IN ZEBRA ASSEMBLY 13	MARSHALL J	1980	FRCMWG/P(80)238	AEE WINFRITH	PFR; CFR	ZEBRA, Breeder Reaction Rate	This report is a key reference associated with calculational methods. This paper describes the calculations (using FGL5 cross section set) which were made to predict the U235, U238, and Pu239 fission rates, and U238 capture-rate in a standard Uranium Oxide-Sodium breeder, as well as in Plutonium-enriched breeder, and carbide-sodium breeder, and compares them.	Calculated Reaction Rates, in various assemblies and sub-assemblies of ZEBRA Core 13.
3474	THE USE OF PERTURBATION THEORY WITH A CHANGING MESH TO ESTIMATE REACTIVITY CHANGES DUE TO CORE MATERIAL DISPLACEMENTS	MCCALLIEN CWJ	1979	FRCMWG/P(79)236	CCS Risley				
3477	A NOTE ON THE REACTIVITY EFFECTS OF CORE MATERIAL DISPLACEMENTS AND DISTORTIONS	BRISSENDEN RJ	1979	FRCMWG/P(79)231					
3480	EVALUATION OF A METHOD FOR CONTROL ROD HOMOGENISATION USING PERTURBATION THEORY TO GIVE REACTIVITY EQUIVALENCE	ROWLANDS JL;EATON CR	1979	FRCMWG/P(79)228					
3483	POSSIBLE DELAYED NEUTRON SPATIAL KINETICS EFFECTS IN HETEROGENEOUS CORE DESIGNS	SIMPSON M	1979	FRCMWG/P(79)223					
3488	REVISION OF IRRADIATION DATA AND FISSION GAS RELEASE RESULTS FROM PFR PINS IRRADIATED DURING RUNS 0-4 INCLUSIVE	CLARK BE;BOOTH JA	1983	DFMC/P(83)27;FEWP/P(83)44		PFR			
3512	STATUS REPORT ON THE CDFR NEUTRON SHIELD DESIGN - APRIL 1982	BRINDLEY KW	1982	TN/P(82)515;FREDSWG/P(82)2		DFR			
3558	RECOMMENDED NUCLEAR DATA FOR SHIELDING AND ENERGY-DEPOSITION CALCULATIONS	MILLER PC	1982	FREDSWG/P(82)6					
3559	THE APPLICATION OF DIFFUSION THEORY TO DEEP-PENETRATION SHIELDING CALCULATIONS (METHOD D)	CHUCAS SJ;SHUTTLEWORTH E	1982	FREDSWG/P(82)1					
3562	STATUS REPORT ON CFR NEUTRON SHIELDS	PHILLIPS A W;STEADMAN D;GRENFELL DT	1979	FREDSWG/P(79)14					
3564	THE EFFECT ON SHIELDING OF CHANGES IN THE COMPOSITION OF THE MIXER-BREEDER REGION IN THE PFR	AVERY AF	1979	FREDSWG/P(79)8;RPD/AFA/4041		PFR			

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3570	USE OF THE MARC (PN) CODE IN CALCULATING NEUTRON DOSE RATES AT THE SURFACE OF THE CFR TRANSPORT FLASK	GRENFELL DT	1977	FREDSWG/P(77)15	CTS	CFR	MARC, Neutron Dose Rates, CFR Transport Flask	This report is a key reference associated with calculational methods. In this note the calculation of the neutron flux and dose-rates radially outwards from a CFR transport container using the codes MARC (PN) for PN=1 and 3 and SCORE, a removal diffusion code, are described and compared.	Axial Activation Profile of sub-assemblies, Maximum Total Dose rates at Flask Surface, Energy distribution of Maximum dose Rates
3571	A LINK BETWEEN SCOREM AND CORE PHYSICS CODES - SEPTEMBER 1977	MOORE D	1977	FREDSWG/P(77)16					
3572	UK FAST REACTOR SHIELD DESIGN AND PERFORMANCE	BUTLER J;BRINDLEY KW	1977	FREDSWG/P(77)10;PPWP/P(77)157	UKAEA; NPC	PFR	Shield Design, ZEBRA, ASPIS	This report is a key reference associated with the methods of calculation and their accuracy. The development of new methods and data-sets for the shield design of CFR1 is described. The calculational routes are being validated using measurements made in mock-ups of large cores in ZEBRA, penetration benchmarks in the ASPIS bulk shield facility, and special thimbles irradiated in the PFR.	Calculations performed and the qualification of the calculation methods
3577	GAMMA RAY PRODUCTION IN NEUTRON CAPTURE	JAMES MF	1976	FREDSWG/P(76)9					
3579	AN INVESTIGATION OF THE NEUTRON ATTENUATION PROPERTIES OF CALCIUM HYDROXIDE FOR FAST REACTOR SHIELDS	BUTLER J; MILLER PC; PACKWOOD A	1968	FREDSWG/P(75)25;CFRWP/P(68)19	AEE WINFRITH	CFR	Shielding, CAGR, Monte Carlo, DICE , Calcium Hydroxide	This report is a key reference associated with calculational methods. The aim of the work presented in this paper was to extend the investigations relating to the CAGR internal radial shield and achieve shield designs and starting spectra appropriate to the CFR. Through the experiments and Monte Carlo Calculations, the authors have established that the penetration of neutrons below 0.5 MeV can be accurately predicted when COMPRASH code is used with the standard 16-group scheme. They recommend that 23-group scheme should be used for PFR design, and should not be used for hydrogenous shields. They recommend more thorough study should be performed before this shield design can be implemented in the CFR.	Schematic Layout of a typical Calcium Hydroxide Shield Lattice.
3580	THE CALCULATION OF ATOMIC DISPLACEMENT DOSE IN FAST REACTORS	ETHERINGTON EW	1975	FREDSWG/P(75)19	Dounreay Experimental Reactor Establishment	DFR	Dose measurements, Atomic Displacement, Uncertainties	In the UKAEA neutron induced damage in metals is estimated in terms of atomic displacements. In the fast reactor environment this parameter is calculated from the fluxes obtained from multi-group neutron diffusion theory calculations and the Half-Nelson atomic displacement model. It is found that these calculated atomic displacements are sufficiently reliable in and near to the cores of fast reactors and it is not necessary to make regular experimental checks of the flux. An assessment has been Made of the uncertainties in atomic displacements which arise from: i. The atomic displacement model; ii. The neutron cross sections of the material being damaged; iii. The neutron spectrum; iv. The relative total neutron flux, and … v. the reactor power. These uncertainties have been compared with the requirement of the materials testing programme and of last, power reactor operation and it is judged that the present accuracy of the calculations meets these requirements. Some experiments which have a bearing on atomic displacement dose but which are being done primarily for other reasons are planned for the PFR. These measurements are reviewed.	Plan view of the PFR showing positions of shielding experiments
3586	NEUTRON FLUX INSTRUMENTATION BENEATH THE SODIUM TASK	PHILLIPS AW	1974	FREDSWG/P(74)2					
3588	THE EFFECTS OF CURIUM ON THE SHIELDING REQUIREMENTS FOR IRRADIATED FUEL	AVERY AF	1972	FREDSWG/P(72)15;CNDC/P(72)7					
3589	A MODIFIED FORM OF DIFFUSION THEORY FOR USE IN CALCULATING NEUTRON PENETRATION IN PRACTICAL SHIELDS	AVERY AF	1972	FREDSWG/P(72)14					
3590	TERMS OF REFERENCE OF THE FAST REACTOR ENERGY-DEPOSITION AND SHIELDING WORKING GROUP	BUTLER J	1972	FREDSWG/P(72)1					
3598	STATISTICAL THEORIES OF BETA-DECAY AND APPLICATION TO FISSION PRODUCTS	LYNN JE	1983	DIDWG/P(83)291					
3600	NB93 (N,P) NB93M AND FE54 (N,P) MN 54 REACTION RATES IN ZEBRA - A COMPARISON BETWEEN PAST EXPERIMENTAL RESULTS AND VALUES CALCULATED USING PRESENT DATA	TAYLOR WH;MURPHY MF;MARCH MR	1983	DIDWG/P(82)287					
3601	A COMPARISON OF THE JNDC FISSION PRODUCT DECAY DATA LIBRARY WITH UKFPDD2 AND WITH INTEGRAL MEASUREMENTS	JAMES MF	1982	DIDWG/P(82)286;CNDC/P(82)8					
3602	MEASUREMENTS OF NEUTRON SOURCE STRENGTHS IN PLUTONIUM METAL AND MIXED-OXIDE FUELS IN ZEBRA	INGRAM G;MARSHALL J	1983	DIDWG/P(82)283					
3603	ENERGY RELEASED IN FISSION - A COMPARISON OF EVALUATIONS	JAMES MF	1982	DIDWG/P(82)274					
3604	MEASUREMENT OF TYPE AND ABSOLUTE INTENSITY OF X AND GAMMA RAY ACTIVITIES IN FRAGMENTS FROM THE FAST FISSION OF U235 AND PU239	TAYLOR W H;MARCH MR;MURPHY MF;ELTHAM FG	1982	DIDWG/P(82)264	AEE WINFRITH	CFR	Dose Rate, X-ray, Gamma Ray, Intensity, FISPIN, Validation	This report is a key reference associated with calculational methods. Measurements have been made of the type and absolute intensity of X and gamma ray activities in fragments from U235 and Pu239 fissions caught during a series of 8 hour irradiations, over 43 day period in Zebra. The aim of the work was to test the latest UKFPDD-2 decay data and C3I yield data that could be used by FISPIN code to predicts the gamma and X-ray energy release following shut down of a commercial fast reactor (CFR). The cooling period of 10 to 20 hours was of particular interest after shutdown when the elements would be unloaded from the core in an environment of sodium. Rate of gamma ray energy released was measured directly using large liquid scintillator, and measurements are presented in a separate paper.	Comparison of measured and experimental values.
3609	BETA ENERGY RELEASE FOLLOWING FAST FISSION OF PU239 AND U235 - A COMPARISON OF PAST EXPERIMENTAL RESULTS WITH FISPIN CALCULATIONS USING THE LATEST UKFPDD-2 AND C31 DATA	TAYLOR WH;MURPHY MF;JAMES MF	1981	DIDWG/P(81)254					

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3610	COMPARISON OF THE MEASURED AND CALCULATED NEUTRON OUTPUTS FROM ZEBRA FUELS	LEES EW	1981	DIDWG/P(81)249	AERE Harwell	PFR	ZEBRA, Fuels, Neutron Outputs	This report is a key reference associated with calculational methods. This work is continuation of studies described by Lees and West, who measured a neutron output from small, unirradiated mixed-oxide fuel pin by two independent method to an accuracy of 1%. Here, the authors measure the neutron outputs from various ZEBRA fuels, and compare them to the calculated neutron output from the nuclear data information recommended by Lees and West. Their results confirm the conclusions reached by Lees and West for samples of differing natures.	Mass Composition and physical parameters of ZEBRA fuel, Measured neutron yields for the ZEBRA fuels.
3613	DETERMINATION OF THE RATE OF BETA ENERGY RELEASE FOLLOWING FISSION OF PU239 AND U235 IN A FAST REACTOR	TAYLOR WH;MURPHY MF;JAMES MF	1981	DIDWG/P(81)245					
3614	COMPARISON OF THE MEASURED AND CALCULATED NEUTRON OUTPUT FROM A MIXED OXIDE FUEL PIN	LEES EW;WEST D	1981	DIDWG/P(81)243					
3617	SELECTION OF NATURAL IRON EVALUATIONS FOR THE EUROPEAN NEUTRON DATA LIBRARY	MOXON MC;SOWERBY MG;STORY JS	1981	DIDWG/P(81)235					
3621	FURTHER GAMMA SPECTROMETRY IN THE VAULT BENEATH PFR	JONES TL;YATES A	1978	TC/P(78)32	DNE	PFR	Corrosion, Gamma Spectrometry, Debris, Failure, OPEX	This report summarises the results of the run 2 measurements of gamma ray emissions in the vault beneath the reactor. The authors looked for evidence of solid fission products or fuel debris in the bottom of the reactor from known fuel failure during run, and looked to answer some queries which have risen from run 1 experiment. The report states that no evidence of the failed MK1A sub-assembly being deposited at the bottom of the reactor vessel, but some evidence to Co-60 active corrosion at the bottom of the vessel is provided.	Experimental data associated with PFR.
3624	EQUILIBRIUM CORE NEUTRONICS: DELAYED NEUTRON CHARACTERISTICS AND RATE OF REACTIVITY LOSS WITH BURN UP	MACGREGOR BR;WEBSTER EB	1978	NDM-417;TC/P(78)11;FRMCSG/WG/N(78)4					
3633	PFR REACTIVITY CHANGES CAUSED BY SUBASSEMBLY BOWING AND INTERFERENCE ARISING FROM THERMAL AND IRRADIATION EFFECTS	JENKINS JM	1973	TC/P(73)9;CPWP/P(73)212;THWP/P(73)48	AEE WINFRITH/ TASD	PFR	Bowing, PE15, M316	This report is a key reference associated with the Reactivity Coefficients. The present work was aimed at obtaining a more accurate and detailed estimate of the effects of thermal and swelling bow for the subassemblies comprising the core, and to derive a power coefficient of bowing for the core in the unrestrained, restrained and partially restrained conditions. Results have been calculated for the two subassembly wrapper materials: cold worked M316 stainless steel, and PE16 nimonic alloy. The results indicate that the reactivity changes caused by thermal bowing will be very small though perhaps positive for M315, and small negative for PE16 wrappers. They should have negligible effect on the safety of the reactor under thermal transient conditions.	Bowing Data
3634	PHYSICS ASPECTS OF THE PFR OSCILLATOR	TAIT D	1972	TC/P(72)15	DERE	PFR	Reactivity Perturbation, oscillator design,	This report is a key reference associated with Oscillator. This paper states the principles governing the type of reactivity perturbation that the PFR oscillator will be called on to provide. A target accuracy for feedback measurements is defined, and it is shown that in the original oscillator design, clearances in components introduced uncertainties well outside the proposed limits. The recent modifications to restore adequate accuracy for low amplitude measurements are described and justified. Finally, some comments are included on the reactivity penalty imposed by the rod, and on the effect of burn-up at the various heights at which it can be stationed.	Data associated with the PFR Oscillator.
3644	THE OPTIONS AVAILABLE FOR THE REINSTATEMENT OF THE SUB ASSEMBLY BULK DELAYED NEUTRON MONITOR	CATHRO IS;LENNOX TA	1980	TC/P(80)4					
3645	AN OVERVIEW OF THE CALCULATIONAL ROUTES USED FOR ROUTINE PFR REACTOR PHYSICS CALCULATIONS	NEWTON TD	1980	NDM-1090;TC/P(80)6	UKAEA	PFR	Reactor Physics, Tasks, Datastores	This report is a key reference associated with calculational methods. This paper presents an introduction to the routine reactor physics calculations performed for PFR. The concepts of Tasks and Datastores used to perform these calculations are introduced and a brief description of each of the calculations is given. In particular, two calculation routes are highlighted: The planning calculational route, and the Historical calculational route.	Review of various calculational methods associated with the Core Physics area.
3646	ROUTINE FLUX AND BURNUP CALCULATIONS IN THREE DIMENSIONS FOR THE PFR: AN INTRODUCTION	SYMONDS AG	1977	PFR/TC/P(77)6; FRCMWG/P(77)188	DERE	PFR	Flux, Burnup	This report is a key reference associated with calculational methods. This paper starts on page 7 of the document #03645. The purpose of this report is to describe how the calculational route is constructed, and how the problems of handling the vast quantity of data that are required to describe in detail the PFR core in 3-D have been solved.	Review of various calculational methods associated with the Core Physics area.
3655	SOME COMMENTS ON THE TRANSIENT BEHAVIOUR OF FISSION GAS IN THE PFR PRIMARY ARGON GAS BLANKET	LENNOX TA;MACLEOD DJ	1979	NDM-696;TC/P(79)7	Dounreay Experimental Reactor Establishment	PFR	Transient Behaviour, Fission Gas, Argon Gas Blanket	A simple model for the behaviour of fission gas in the PFR primary circuit is applied to the transient behaviour of the fission gas activity in the primary argon gas blanket following a reactor trip. Estimates of the associated time constants are made.	Time Constants derived from beta precipitator transients, Measured Halving times for the decay of fission product gases in the PFR gas Blanket.
3719	REACTOR PHYSICS PARAMETERS OF ALTERNATE FUELLED FAST BREEDER REACTOR CORE DESIGNS	HAFFNER DR;HARDIE RW	-						
3727	PLUTONIUM RECYCLE IN PWRS WITH RETAINED FISSION PRODUCTS AND CIVEX REPROCESSING	GIBSON IH	1978	RPSG/P(78)19;AEEW-M-1619					
3771	SHIELDING ASSESSMENT OF SWARF PLUG AND GAMMA GATES - B13, SHIELDING, PENETRATION	WATMOUGH MH	1981	SHIELDING REPORT 5982					
3776	REACTOR PHYSICS INFORMATION FROM THE PFR DURING 1978	GREGORY CV;LENNOX T;LORD DJ	1979	PPWP/P(79)237;TC/P(79)15	AEE WINFRITH	PFR	Reactor Physics, Review	This reference is a key reactor physics summary report. the paper describes physics information obtained from the PFR during 1978; because of the delay in issuing the paper, some overlap with 1979 has been included. The paper focuses on 3 major aspects: the understanding of PFR power coefficient, the measurement and understanding of BPD system signals, and the demonstration of natural circulation.	OPEX

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3777	REACTOR PHYSICS MEASUREMENTS DURING RUN 1 OF PFR	LORD DJ;CROWE DS;SUTHERLAND AJ	1979	NDM-752	UKAEA Reactor Group	PFR	Run1, Data Analysis	This reference is a key reactor physics summary report. During Run 1 of PFR a large quantity of data concerning the reactor physics performance of the reactor have been obtained. Most of these data have been obtained from monitoring normal operation, but several specific-experiments have also been completed. This report provides an analysis of these data and compares them with design predictions where appropriate.	Absorber Rod Worths, Rate of Reactivity Loss with burn-up, Reactivity Feedback, Shielding, Monitoring, Trips
3782	MEASUREMENT OF THE NEUTRON FLUX IN PFR VAULT DURING RUN 2	CROWE DS;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.89		PFR			
3786	MEASUREMENT OF REACTIVITY BURN UP FOR RUN 2	SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.93	PFR	PFR	Run 2, Data Analysis, Burnup, Reactivity,	This paper is a key reference associated with Reactivity and Burn Up. This report presents the reactivity data collected daily during Run 2 and the measurements of the rate of loss of reactivity due to burn up in PFR.	Experimental Data and Analysis, Reactivity Data
3791	SUB CRITICAL MONITORING DURING RELOAD 3 IN PFR	CROWE DS	-	PFR EXPERIMENTAL RESULTS SHEET NO.97A;OETD.TECH NOTE NO.46	PFR	PFR	Fuel Movements, Sub Criticality, Reactivity Changes	This paper is a key reference associated with the Subcritical Reactivity Measurements. The report notes that during the fuel movement of reload 3 of PFR, the opportunity was taken to obtain further data for a computer program which is being developed to monitor sub criticality during fuel reloads. This program will also be used to detect the loading of wrong sub assemblies by comparing measured and predicted reactivity changes	OPEX and Experimental Data associated with Reactivity Changes during reloading
3797	SHIELDING MEASUREMENT IN IHX IB GAMMA MONITOR THIMBLE IN PFR	CROWE DS;LORD DJ	1980	PFR EXPERIMENTAL RESULTS SHEET NO.107;OETD.TECH NOTE NO.305		PFR			
3807	PFR CONTROL ROD CALIBRATION IN SOURCE REGIME (< 1KW) TO INVESTIGATE RELOAD REACTIVITY DISCREPANCY - START OF RUN 6	CROWE DS;LORD DJ;SUTHERLAND AJ	1981	PFR EXPERIMENTAL RESULTS SHEET NO.117;OETD.TECH NOTE NO.503	PFR	PFR	Neutronics Calculations, Rod Worth, Control Rods	This paper is a key reference associated with the Calibration of Control Rods. The paper outlines that the predicted critical balance point was higher than measured by a significant amount following Reload 5. The discrepancy amounted to about 110 cents before any corrections had been applied. This discrepancy was subject to an investigation, the results of which are summarised in Reference 1. In predicting the balance point the worth of the control rod curtain was required and this was estimated from 2D core neutronics calculations with rods in and rods out. This calculation showed an increase in rod worth of about 6% from Run 5 and the purpose of the measurement was to check this under low power conditions so as to minimise irradiation of the charge machine which was not being removed at this stage of operation.	OPEX Data associated with the Calibration of Control Rods
3808	CALIBRATION OF PFR ABSORBER RODS AT START OF RUN 6	CROWE DS;SUTHERLAND AJ	1982	PFR EXPERIMENTAL RESULTS SHEET NO.118;OETD.TECH NOTE NO.517	PFR	PFR	Control Rods, Rod Calibrations, Reload 5	This paper is a key reference associated with the Calibration of Control Rods. This paper outlines the full program of control rod and shut off rod calibrations (POIs C1/04.1 and C1/04.2) made at the start of Run 6 following major changes made to the reactor loading during Reload 5. During the reload, the following control rods were changed: 1. Control Rod 4 (G09): Tantalum Absorber ACE (Type 1601/6)was replaced by Tantalum Absorber TGR (Type 1601/5) 2. Control Rod 5 (H07): Boron Absorber LJY (Type 1602/5) was replaced by Boron Absorber TED (Type 1602/6)	OPEX Data associated with the Calibration of Control Rods
3812	REACTIVITY EFFECTS OF FLOW CHANGES AT THE END OF RUN 6 OF PFR	CROWE DS;LORD DJ;SUTHERLAND AJ	1982	PFR EXPERIMENTAL RESULTS SHEET NO.122;OETD.TECH NOTE NO.553	PFR	PFR	Reactivity changes, Pin levitation, slack grids, pin axial clearance	This paper is a key reference associated with Reactivity Coefficients. This paper outlines the measurements completed in a series of checks on the reactivity changes at the beginning and end of runs where the primary flow is increased from 30% to 100% flow and then reduced to 30% again.	OPEX Data associated with Reactivity Coefficients.
3813	PERFORMANCE CURVE CHECKS ON THE PFR LOW POWER CHANNELS	SUTHERLAND AJ	1982	PFR EXPERIMENTAL RESULTS SHEET NO.123;OETD.TECH NOTE NO.557	PFR	PFR	Low Power Channels, Operating Conditions	This paper is a key reference associated with the Miscellaneous Measurements. This paper notes the several checks and modifications made on the Low Power Channels. Recommendations associated with the operating conditions are described with the report.	OPEX Data associated with the Low Power Channels prior to re-fuelling.
3814	SUB CRITICAL MONITORING DURING RELOAD 5 OF PFR	CROWE DS	1982	PFR EXPERIMENTAL RESULTS SHEET NO.124;OETD.TECH NOTE NO.565	PFR	PFR	Sub Criticality, Fuel Movements	This paper is a key reference associated with the Subcritical Reactivity Measurements. This report outlines the movement of fuel for reload 5 of PFR and the opportunity to obtain further results from a computer program which is being developed to monitor sub criticality during fuel movements.	OPEX Data associated with the Subcritical Reactivity Measurements.
3815	A COMPLETE SCAN AT 180 MW(TH) WITH THE MARK IV LOCATION LOOP DELAYED NEUTRON MONITOR	CROWE DS;SUTHERLAND AJ;LENNOX TA;MACLEOD DJ	1982	PFR EXPERIMENTAL RESULTS SHEET NO.125;OETD.TECH NOTE NO.579					
3816	REACTIVITY EFFECTS OF FLOW CHANGES AT START OF RUN 7 OF PFR	LORD DJ;SUTHERLAND AJ;CROWE DS	1982	PFR EXPERIMENTAL RESULTS SHEET NO.126	PFR	PFR	Reactivity changes, Pin levitation, slack grids, pin axial clearance	This paper is a key reference associated with Reactivity Coefficients. This paper outlines the measurements completed in a series of checks on the reactivity changes at the beginning and end of runs where the primary flow is changed.	OPEX Data associated with Reactivity Coefficients.
3818	MEASUREMENT OF THE ISOTHERMAL TEMPERATURE COEFFICIENT IN PFR AT THE START OF RUN 7	CROWE DS;LORD DJ	1982	PFR EXPERIMENTAL RESULTS SHEET NO.128;OETD TECH NOTE NO.633	PFR	PFR	Reactivity Coefficients, Isothermal Temperature coefficients	This paper is a key reference associated with Temperature and Reactivity Coefficients. Ideal conditions to obtain an accurate measurement of the isothermal temperature coefficient were achieved within PFR. Previous measurements were taken in 1976, 1977 and 1978 over smaller temperature changes and often involving significant corrections for Np-239 hold up and power variations.	Experimental data associated with the Isothermal Temperature Coefficient for PFR
3819	SUB-CRITICAL MONITORING DURING RELOAD 6 IN PFR	CROWE DS	1982	PFR EXPERIMENTAL RESULTS SHEET NO.129;OETD TECH NOTE NO.653	PFR	PFR	Sub Criticality, Fuel Movements	This paper is a key reference associated with the Subcritical Reactivity Measurements. This report outlines the movement of fuel for reload 6 of PFR and the opportunity to obtain further results from a computer program which is being developed to monitor sub criticality during fuel movements.	OPEX Data associated with the Subcritical Reactivity Measurements.

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3820	MEASUREMENT OF THE ISOTHERMAL TEMPERATURE COEFFICIENT IN PFR DURING RUN 7	CROWE DS	1983	PFR EXPERIMENTAL RESULTS SHEET NO.130;OETD TECH NOTE NO.697	PFR	PFR	Reactivity Coefficients, Isothermal Temperature coefficients	This paper is a key reference associated with the Temperature and Reactivity Coefficients. A further opportunity to measure the isothermal temperature coefficient over a large temperature range was achieved.	Experimental data associated with the Isothermal Temperature Coefficient for PFR
3825	REACTIVITY EFFECTS OF FLOW CHANGES AT THE END OF RUN 7 OF PFR	CROWE DS;LORD DJ;SUTHERLAND AJ	1983	PFR EXPERIMENTAL RESULTS SHEET NO.135;OETD TECH NOTE NO.782	PFR	PFR	Reactivity changes, Pin levitation, slack grids, pin axial clearance	This paper is a key reference associated with Reactivity Coefficients. This paper outlines the measurements completed in a series of checks on the reactivity changes at the beginning and end of runs where the primary flow is changed.	OPEX Data associated with Reactivity Coefficients.
3831	REACTIVITY EFFECTS OF FLOW CHANGES AT START OF RUN 8 OF PFR	CROWE DS;SUTHERLAND AJ;LORD DJ	1984	PFR EXPERIMENTAL RESULTS SHEET NO.141;OETD TECH NOTE NO.832	PFR	PFR	Reactivity changes, Pin levitation, slack grids, pin axial clearance	This paper is a key reference associated with Reactivity Coefficients. This paper outlines the measurements completed in a series of checks on the reactivity changes at the beginning and end of runs where the primary flow is changed.	OPEX Data associated with Reactivity Coefficients.
3835	HIGH FISSION PRODUCT ACTIVITY IN THE ARGON GAS BLANKET 16.7.78-17.7.78	LENNOX AT;CATHRO IS;MACLEOD DJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.81					
3838	THE TRANSIENT SIGNAL IN THE IHX DELAYED NEUTRON MONITOR FOLLOWING A REACTOR TRIP	CROWE DS;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.78					
3841	IRRADIATION OF FOILS FOR SHIELDING MEASUREMENTS IN DISCHARGE PORT, SODIUM LEVEL GAUGE AND VICKERS PLUG THIMBLES IN PFR	CROWE DS;LORD DJ;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.75		PFR			
3843	REACTIVITY FEEDBACK EXPERIMENTS AT THE END OF RUN 1 (FEBRUARY 1978)	LORD DJ;DICKSON AK	-	PFR EXPERIMENTAL RESULTS SHEET NO.73	PFR	PFR	Reactivity Coefficients, thermal power, KDI Computer code	This paper is a key reference associated with Reactivity Coefficients. In the note, results of experiments involving large flow changes at constant thermal power are presented together with data obtained during the early testing of a signified reactor power set-back controller. Results obtained are compared with predictions using the KDI computer code and tentative conclusions drawn as to areas of good agreement and areas where discrepancies exist.	OPEX Data associated with Reactivity Coefficients.
3851	MEASUREMENTS OF PFR ISOTHERMAL TEMPERATURE COEFFICIENT WITH PARTICULAR REFERENCE TO COMPONENT DUE TO RELATIVE MOTION OF CORE AND CONTROL RODS	CROWE DS;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.65	PFR	PFR	Reactivity Coefficients, Isothermal Temperature coefficients	This report is a key reference associated with Reactivity Coefficients. Further opportunity to accurately measure the isothermal temperature coefficient was obtained following a period of no measurements	Experimental data associated with the Isothermal Temperature Coefficient for PFR
3852	MEASUREMENT OF POWER COEFFICIENTS AND REACTIVITY BURN-UP IN PFR FOR AUGUST TO OCTOBER 1977	SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.64	PFR	PFR	Power coefficients, rate of reactivity, burn-up	This report is a key reference associated with Reactivity Coefficients. Throughout the period August to October 1977, reactivity data was collected daily and from this measurements of the power coefficients and the rate of reactivity loss due to burn-up have been made.	OPEX Data associated with Reactivity Coefficients.
3856	TESTS ON PFR LOW POWER FISSION CHAMBER	SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.60		PFR			
3859	MEASUREMENT OF POWER COEFFICIENTS AND REACTIVITY BURN-UP IN PFR FOR JUNE/JULY 1977	SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.57	PFR	PFR	Power coefficients, rate of reactivity, burn-up	This report is a key reference associated with Reactivity Coefficients. Throughout the period June/July 1977, reactivity data was collected daily and from this measurements of the power coefficients and the rate of reactivity loss due to burn-up have been made.	OPEX Data associated with Reactivity Coefficients.
3862	CALIBRATION OF PFR ABSORBER RODS AT START OF RUN ONE	DICKSON AK;LORD DJ;SMITH JC;SUTHERLAND AJ;WEBSTER EB; WILSON C	-	PFR EXPERIMENTAL RESULTS SHEET NO.54	PFR	PFR	Control Rods, Reactivity Worth, Reactivity Coefficients, Calibration of Control Rods, Shut-off rods, Burn-up, Power coefficients	This report is a key reference associated with the Calibration of Control Rods. Reactivity accounting requires accurate knowledge of the worth of the control rods and shut-off rods in the reactor; such information is also a key need in assessing the reactivity coefficients (e.g. burn-up and power coefficients)	Experimental data for the calibration of control rods. Key information in assessing the reactivity coefficients
3863	REVERSE FLOW TEST IN THE S/A BULK AND LOCATION DELAYED NEUTRON MONITORING LOOP	LENNOX TA;HOWARD RS;GIBSON DF	-	PFR EXPERIMENTAL RESULTS SHEET NO.53		PFR			
3864	CALIBRATION OF PFR ABSORBER RODS AT END OF RUN TO+	CROWE DS;DICKSON AK;LORD DJ;NEWTON TD;SMITH JC; SUTHERLAND AJ;WEBSTER EB	-	PFR EXPERIMENTAL RESULTS SHEET NO.52	PFR	PFR	Control Rods, Reactivity Worth, Reactivity Coefficients, Calibration of Control Rods, Shut-off rods, Burn-up, Power coefficients, Control Rod Interaction Model	This report is a key reference associated with the Calibration of Control Rods. Reactivity accounting requires accurate knowledge of the worth of the control rods and shut-off rods in the reactor; such information is also a key need in assessing the reactivity coefficients (e.g. burn-up and power coefficients). Data for a Control Rod configuration at the end of a reactor run was also required to test and, if required, improved the control rod interaction model	Experimental data for the calibration of control rods. Key information in assessing the reactivity coefficients. Further information can also aid with improving the control rod interaction model if required.
3867	SHIELDING MEASUREMENT IN IHX 2B GAMMA MONITOR THIMBLE IN PFR	PACKWOOD A;CROWE DS;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.49		PFR			
3868	MEASUREMENTS OF THE POWER COEFFICIENT BETWEEN AUGUST AND NOVEMBER 1976	CROWE DS;DICKSON AK;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.48	PFR	PFR	Power coefficients, rate of reactivity, burn-up	This report is a key reference associated with Reactivity Coefficients. Throughout the period August to November 1976, reactivity data was collected and from this measurements of the power coefficients and the rate of reactivity loss due to burn-up have been made.	OPEX Data associated with Reactivity Coefficients.
3869	ON THE DIFFICULTIES OF MEASURING THE INLET TEMPERATURE COEFFICIENT AT POWER	EDGE DM	-	PFR EXPERIMENTAL RESULTS SHEET NO.47	PFR	PFR	Reactivity coefficient, inlet temperature coefficient	This report is a key reference associated with the Reactivity Coefficient. The note explains that during 14th/15th October 1976, the primary sodium temperature was increased while the indicated power was held constant and ~225 MW. Measurements were taken with the aim of determining the inlet temperature coefficient at power. This paper uses these measurements to illustrate the difficulties in determining this parameter.	OPEX Data associated with Reactivity Coefficients.
3872	MEASUREMENT OF REACTIVITY HELD UP BY NEPTUNIUM	CROWE DS;DICKSON AK;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.44	PFR	PFR	Reactivity, NP-239, Fission Cross Section, Capture Cross Section	This report is a key reference associated with Miscellaneous Measurements. This report outlines the measurements of the reactivity gained after the reactor had tripped following several days at full power. These values are compared with calculated values obtained using different values of fission and capture cross sections of NP-239.	OPEX data associated with PFR. Comparison of Experimental data and calculated values.

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
3876	POWER NOISE MEASUREMENTS AT 500 MW(TH)	CROWE DS	-	PFR EXPERIMENTAL RESULTS SHEET NO.40	PFR	PFR	Reactivity, Noise, Evershed, Magnetic Tape, Power Noise	This report is a key reference associated with Reactivity Noise. This report presents further measurements made of the power noise when the reactor power was recently increased to an indicated power of ~ 500 MW(Th) on H.P channel 'A' with the three primary pumps running at ~ 865 rpm. The method of recording and analysing was similar to that used within previous versions.	Experimental Data for the Power Noise at varied power and pump rates. Clear data analysis and discussion
3878	MEASUREMENTS OF POWER NOISE AND PIN LEVITATION MADE WHEN THE P.S.P. SPEEDS AND REACTOR POWER WERE BEING RAISED (12-30 JULY 1976)	CROWE DS;MCWILLIAM D;SUTHERLAND AJ;ETHERINGTON EW	-	PFR EXPERIMENTAL RESULTS SHEET NO.38	PFR	PFR	Power Noise, Pump Speeds, Control Rod Positions, Pin Levitation	This report is a key reference associated with Miscellaneous Measurements. This report outlines the measurements of the reactor power noise at several pump speeds. Recordings of the control rod positions were also made and of the reactor temperature in order to assess the likelihood of any pin levitation during the run up of the PSP.	Experimental Data for the Power Noise at varied power and pump rates. Clear data analysis and discussion
3879	MEASUREMENT OF REACTIVITY/BURN-UP IN THE PERIOD MAY TO JULY 1976	SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.37	PFR	PFR	Data Analysis, Burnup, Reactivity,	This paper is a key reference associated with Reactivity and Burn Up. During the period May to July 1976, several weeks of relatively high power operation was achieved. This note reports the measurements made of reactivity loss due to burn-up of the fuel over this time.	Experimental Data and Analysis, Reactivity Data
3881	ISOTHERMAL TEMPERATURE COEFFICIENT (18/21 JUNE 1976)	CROWE DS;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.34	PFR	PFR	Isothermal Temperature Coefficients	This report is a key reference associated with the Reactivity Coefficients. The estimates of the isothermal temperature coefficient have been made with the inlet core temperature decreasing. These estimates were completed from measurements obtained between 18th-21st June 1976	OPEX Data associated with Reactivity Coefficients.
3883	CHECK ON REPRODUCIBILITY OF WORTH OF CONTROL ROD DROPPING FROM 100 MM	CROWE DS;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.32	PFR	PFR	Calibration of Control Rods, Rod Drop, Fast Feedback, Reactivity Worth	This report is a key reference associated with the Calibration of Control Rods. This report explains the "rod-drop" method used in DFR to measure the fast feedback. From this, a similar method is required for PFR. The first step towards developing the method is to measure the reproducibility of the worth of control rods dropped from 100 m.	Experimental data associated with the Rod Drop Method used in DFR. Similar method is required for PFR. OPEX Data
3884	ISOTHERMAL TEMPERATURE COEFFICIENT (3/4 MAY 1976)	CROWE DS;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.31	PFR	PFR	Isothermal Temperature Coefficients	This report is a key reference associated with the Reactivity Coefficients. The estimates of the isothermal temperature coefficient have been made with the inlet core temperature decreasing. These estimates were completed from measurements obtained between 2-4 May 1076	OPEX Data associated with Reactivity Coefficients.
3885	MEASUREMENT OF THE RELATIVE WORTH OF EACH SHUT-OFF ROD AT LOW POWER	CROWE DS;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.30	PFR	PFR	Calibration of Control Rods, Rod Drop, Absorber Material	This report is a key reference in the Calibration of Control Rods. This report presents the initial measurements taken in an attempt in devising a procedure to detect for any loss of absorber material from the shut-off rods (SOR).	Experimental Data associated with Calibration of Control Rods and determining loss of absorber material from SORs. OPEX Data
3887	MEASUREMENT OF THE SHUT OFF RODS SHAPE FUNCTION	CROWE DS;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.28	PFR	PFR	Calibration of Control Rods, Reactivity Worth, Reactivity, Absorber Material	This report is a key reference in the Calibration of Control Rods. This report presents measurements completed in order to determine the distance over which the worths of the shut off rods are linear. The measurement was necessary before calibrating the shut off rods at low power by monitoring them over distances which would give +/- 5 cents change in reactivity. The method is proposed as a technique in detecting any loss in absorber material from the SORs.	Experimental Data associated with Calibration of Control Rods and determining loss of absorber material from SORs. OPEX Data
3888	THE MEASUREMENT OF THE BERYLLIUM SOURCE STRENGTH	SOMERVILLE A;CROWE DS	-	PFR EXPERIMENTAL RESULTS SHEET NO.27	PFR	PFR	Beryllium Source Strength, Shutdown	This report is a key reference associated with Miscellaneous Measurements. The note describes an experiment which was designed to measure the Beryllium Source strength and to examine the way in which the source strength decayed following a shutdown.	Experimental Data for the Measurement of the Beryllium Source Strength.
3889	PRELIMINARY CONTROL ROD CALIBRATION AT LOW POWER TO MONITOR FOR LOSS OF ABSORBER	SUTHERLAND AJ;CROWE DS	-	PFR EXPERIMENTAL RESULTS SHEET NO.26	PFR	PFR	Calibration of Control Rods, Absorber Material, Control Rod Worth	This report is a key reference associated with the Calibration of Control Rods. This report presents one of the methods used in determining the loss of absorber material. The report details the procedure of one of the methods identified and the results from completing the first step in the procedure. These results are determining the Control Rod Worths at low power.	Experimental Data for the Calibration of Control Rods.
3890	MEASUREMENT OF POWER NOISE	ETHERINGTON EW	-	PFR EXPERIMENTAL RESULTS SHEET NO.25	PFR	PFR	Reactivity, Noise, Evershed, Magnetic Tape, Power Noise	This report is a key reference associated with Reactivity Noise. The reactor power noise signal was recorded on magnetic tapes using Ampex tape recorded on December 3 and 9 , 1975 and on paper chart using an Evershed Quick Reponses Recorded on December 9 and 12 1975. The magnetic tape recordings were subsequently analysed to determine the root mean square percentage power noise and the noise spectrum using the Fast Fourier Transform package on the DFR Technical Operations Group PDP8 E and using a Ubiquitous Spectrum Analyser. The Evershed recordings were analysed using some simple graphical methods. The reactor power varied between 23 and 16 M/Watts on December 3, was at 170 Mw on December 9 and was 200 Mw on December 12. The primary coolant flow was approximately 50% of full flow (i.e. 500 rpm pumps speed) on each occasion.	Experimental Data for the Power Noise at varied power and pump rates. Clear data analysis and discussion
3891	MEASUREMENT OF PU 241 DECAY IN THE PERIOD APRIL TO OCTOBER 1975	SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.24	PFR	PFR	Reactivity, Plutonium 241	This report is a key reference associated with the Miscellaneous Measurements. This note outlines the measurement of the rate of loss of reactivity as a result of the Plutonium 241 in the core. These measurements were taken between April and October 1975 and the report describes these measurements.	OPEX data associated with measurements of the loss of reactivity.
3892	ESTIMATE OF THE BURN-UP RATE FOR PERIOD 21 NOVEMBER TO 22 DECEMBER 1975	CROWE DS;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.23	PFR	PFR	Reactivity, Burn Up, Data Analysis	This report is a key reference associated with Reactivity and Burn Up. This report presents a further estimate of the Burn Up rate measured within Experimental Data Results Sheet No. 22. The period assessed within this report are between 21 November and 22 December 1975	Estimated Data for the Burn Up Rate. Previous estimates have been compared against actual data and thus further estimates have been completed. OPEX Data

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3893	MEASUREMENTS OF REACTIVITY COEFFICIENTS ASSOCIATED WITH TEMPERATURE, POWER AND BURN-UP DURING OCTOBER 1975	CROWE DS;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.22	PFR	PFR	Reactivity, Burn Up, Data Analysis, Reactivity Coefficients, Indicated Power, Thermal Balances, Power Calibrations	This report is a key reference associated with Reactivity and Burn Up. The high power run up to 200 MW(t) during October 1975 allowed a useful extension to the measurements of the important reactivity coefficients. This note reports the measurements, together with a few preliminary comments. One point which is dealt with here is the relationship between indicated power and power calibrations using thermal balances.	OPEX data associated with measurements of the reactivity coefficients.
3894	NEUTRON FLUX SCANNING IN LOW POWER INSTRUMENT THIMBLES	TELFER JCW;CROWE DS	-	PFR EXPERIMENTAL RESULTS SHEET NO.21		PFR			
3895	REACTOR TEMPERATURE COEFFICIENT	SOMERVILLE AC	-	PFR EXPERIMENTAL RESULTS SHEET NO.19	PFR	PFR	Coolant Temperature, Reactor Temperature Coefficient	This report is a key reference associated with Reactivity Coefficients. During the coolant temperature decrease on 5 and 6 August, it was possible to obtain an estimate of the reactor temperature coefficient.	OPEX Data associated with the Reactor Temperature Coefficient.
3896	INVESTIGATION OF THE DISCREPANCY IN ESTIMATING REACTIVITY CHANGES USING THE DC14 (FRTG) CHAMBER	CROWE DS;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.18	PFR	PFR	Reactivity Change, SOR	This report is a key reference associated with the Miscellaneous Measurements. This note outlines the investigation into the analysis techniques of the reactivity change. The note explains how measurements of the SOR had been completed, but the values obtained from the DC14 Chambers differed by approximately 10% than the other chamber. Thus, an investigation into the analysis technique was required.	OPEX data associated with measurements of the analysis techniques of the reactivity changes.
3897	MEASUREMENT OF SHUT OFF ROD WORTHS WITH CONTROL RODS POSITIONED TO MINIMISE AND MAXIMISE TILT	CROWE DS;SUTHERLAND AJ	-	PFR EXPERIMENTAL RESULTS SHEET NO.17	PFR	PFR	Calibration of Control Rods, SOR Worths, Rod Drop Measurements,	This report is a key reference associated with the Calibration of Control Rods. This report the individual SOR Worths measured and makes some comments on the experimental technique of rod drop measurements and the accuracy obtainable.	Experimental Data associated with the SOR Worths measured and calibration of control rods.
3898	REACTOR PHYSICS EXPERIENCE ON THE PROTOTYPE FAST REACTOR	LORD DJ;WEBSTER EB	-	IAEA-SM-244/44	IAEA	PFR	PFR Core, neutronics, core irradiation	This report is a key reference providing a reactor physics summary. This paper gives a general description of the PFR core stressing the geometrical complexity and the consequent need for automated methods of handling the large amounts of data required in neutronics to follow core irradiation.	Calculated data associated with the reactor physics of the PFR Core.
3900	PFR HEALTH PHYSICS - POINTS OF INTEREST - JULY 1978	MCDONALD W	1978	PFR/HP/M(78)43		PFR			
3904	AN EXPERIMENT TO CHECK THE REACTIVITY SCALE OF THE PROTOTYPE FAST REACTOR	LENNOX TA	-	TRG MEMO 7460	UKAEA. The Reactor Group	PFR	Reactivity Worth, Calculated Worth, Reactivity Scale, ZEBRA,	This report is one of the key references associated with Start-up Experiments. This report presents the results of an experiment to measure the reactivity worth of a small plutonium sample in the Prototype Fast Rector. The measured worth is briefly compared with the calculated worth.	Experimental Data associated with the Reactivity Scale, comparisons between measured and calculated data for Reactivity Worth
3905	REACTOR PHYSICS INFORMATION FROM THE PFR DURING 1975 AND 1976	SMITH DC G;WHEELER RC	1977	PPWP/P(77)137;CFR/SWP/P(77)2;TC/P(77)5	N/A	PFR	Reactor Physics	This reference is a key reactor physics summary report. Operation of PFR during 1975-76 has enabled reactor physics information to be obtained. Some data must still be regarded as provisional due to operational constraints preventing some plant manoeuvres which are needed for complete study. Authors note that some differences between calculated and measured data require further study. The report contains information regarding: Operating History, … etc, and overlaps significantly with the report ref. FRDC/PPWP/P(77)137.	High volume of Reactor Physics Data, similar to that displayed in report ref. TRG MEMO 7522
3907	PFR CORE PERFORMANCE - A COMPARISON BETWEEN PREDICTED AND MEASURED VALUES OF SOME IMPORTANT PARAMETERS	SMITH DCG;CROWE DS;LENNOX TA;LORD DJ;SMITH JC;HAMPSHIRE R	1978	PPWP/P(78)189;CFR/SWP/P(78)4;TC/P(78)1;FRCMWP/P(78)207	Dounreay Nuclear Power Development Establishment	PFR	PFR Core Performance, Reactivity Coefficients	This report is one of the key references associated with Reactivity Coefficients. Measured values of a number of important parameters associated with the PFR Core Performance are given and compared with calculations. Generally agreement is good but where discrepancies have been found attention is drawn to possible reasons.	OPEX Data and Calculated parameters for PFR Core Performance
PPWP-P79-269.pdf	REACTOR PHYSICS INFORMATION FROM THE PFR DURING 1979	EDMISTON G;DAWSON C;LORD D;WEBSTER R;SMITH J	1979	FRDC-PPWP-P(79)269	AEE WINFRITH	PFR	Run 4, Steam Plant, Natural Circulation, Fuel Temperature	This reference is a key reactor physics summary report. This paper describes the physics information obtained from PFR during 1979, which in practice refers to Run 4 (Feb-Sep) and amounts to 26699 MW days. An emphasis is placed on: steam plant performance, natural circulation experiments, and fuel temperature assessment and its consequences in terms of reactivity feedback.	Summary of Natural Circulation Tests, Calculated Power Coefficient for various Powers, Modes of Fuel Expansion and Fuel-Can Heat Transfer, The Schematic of PFR Steam Plant Condensate Level Control.
3909	REACTOR PHYSICS INFORMATION FROM THE PFR DURING 1975 AND 1976	SMITH DCG;WHEELER RG	-	TRG MEMO 7460	UKAEA Reactor Group	PFR	Reactor Physics	This reference is a key reactor physics summary report. Operation of PFR during 1975-76 has enabled reactor physics information to be obtained. Some data must still be regarded as provisional due to operational constraints preventing some plant manoeuvres which are needed for complete study. Authors note that some differences between calculated and measured data require further study. The report contains information regarding: Operating History, … etc, and overlaps significantly with the report ref. FRDC/PPWP/P(77)137.	High volume of Reactor Physics Data, similar to that displayed in report ref. FRDC/PPWP/P(77)137
4312	PREDICTION OF MISLOADING REACTIVITY EFFECTS IN SUPERPHENIX 1 AND COMPARISON WITH COMMISSIONING EXPERIMENTS	NEWTON TD	1985	PPWG/P(85)46		SUPERPHENIX			
4354	THE INITIAL APPROACH-TO-CRITICAL OF THE PROTOTYPE FAST REACTOR	WHEELER RC;CROWE DS;HENDERSON JDC	1976	TRG REPORT 2908	UKAEA. The Reactor Group	PFR	Reactor Physics, Critical Approach, Neutron Source, Fission Chambers, Count-Rates, Control Rod Movements, Loading Order,	This report is one of the key references associated with Start-up Experiments. This report describes the procedure used, the data obtained and the operational experience gained during the initial critical approach of the PFR. Interesting points which arose concerned the reliance on the inherent neutron source of the fuel (i.e. mainly spontaneous fission of Pu240), the use of fission chambers in a central thimble and the ranges of the observed count-rates on the different chambers. The results confirmed the usefulness of the method adopted, which not only allowed the number of control rod movements to be effectively minimised but also allowed for variations from the original loading order, e.g. owing to delays in handling fuel, without significantly affecting the predictions of the two critical loadings required.	Experimental Data relating to the Initial Critical Approach of a Power Fast Reactor, explanation of the method used and instrumentation implemented, detailed safety arguments and Data Analysis.

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4424	SUB CRITICAL MONITORING DURING RELOADS 7, 8A AND 8B OF PFR	CROWE DS;SUTHERLAND AJ	1985	PFR/OC/P(85)237;ND-M-2910	UKAEA	PFR	Fuel material, absorber material, sub critical state, control rods, breeder, decay	This report is a key reference associated with Subcritical Reactivity Measurements. The report explains that before and after each fuel and absorber material during reloads 7, 8A and 8B, counts were taken on the installed low power chambers in order to monitor the sub critical state of PFR. The measurements also included the exchange of three tantalum control rods for boron carbide rods, the decay of the reactor source over a 23 day period and a breeder subassembly movement from ring 1 position.	OPEX Data associated with the Sub Critical Monitoring during Reloads
4490	IN VESSEL HANDLING OF INNER NEUTRON SHIELDING ON CDFR	FLETCHER B	1982	DM/P(82)418		DFR			
4491	CALCULATIONS TO ESTIMATE THE EARTHQUAKE-INDUCED REACTIVITY CHANGES IN A RESTRAINED CORE FAST REACTOR	DUTHIE JC	1982	SL-CON-45					
4492	STATUS REPORT (1979) ON CFR NEUTRON FLUX INSTRUMENTATION DEVELOPMENT AT WINFRITH	WILSON I;GOODINGS A	1979	CNIWG/P(79)1;PPWP/P(79)254					
4493	PRELIMINARY STUDY OF POSSIBLE CDFR REACTIVITY TRANSIENT DUE TO SEISMIC ACTIVITY	PERKS MA;TAYLOR MJ	1982	TPSD/R(82)368		DFR			
4510	A REVIEW OF CFR NEUTRON FLUX INSTRUMENTATION DEVELOPMENT AT WINFRITH (JULY 1981)	WILSON I;GOODINGS A	1981	CNIWG/P(81)4;PPWP/P(81)319					
4529	NOTES BASED ON A PAPER BY D.E. MAHAGIN, APRIL 1979, HEDL-SA-1690-FP CALLED 'FAST REACTOR NEUTRON ABSORBER MATERIALS'	GILCHRIST KE	1982	MWP/P(81)1138;FRASG/P(81)188					
4566	CDFR FUEL COMPOSITION AND SUB-ASSEMBLY DESIGN FOR DECAY HEAT AND SHIELDING PURPOSES	BRINDLEY KW	1980	PPWP/P(80)274;PDR/15;TN/P(80)373		DFR			
4585	SPECIFICATION OF NUCLEONIC FLUX DETECTORS FOR CDFR	BRINDLEY KW	1979	CNIWG/P(79)3;PDR/4		DFR			
4699	PRELIMINARY REPORT OF THIRD SERIES OF SOURCE TESTS FOR SHIELDING EFFECTIVENESS AT THE PFR IRRADIATED FUEL CAVE	CAMPBELL DA;HAMILTON J;LEITCH J	-			PFR			
4700	SECOND SERIES OF SOURCE TESTS FOR SHIELDING EFFECTIVENESS AT THE PFR IRRADIATED FURL CAVE, AUGUST 1975	CAMPBELL DA;GOWER N;LEITCH J	-	TRG MEMO 7131		PFR			
4701	SOURCE TEST FOR SHIELDING EFFECTIVENESS AT THE PFR IRRADIATED FUEL CAVE	CAMPBELL DA;GOWER N;HIGGINSON PR	-	TRG MEMO 6877		PFR			
4707	THE IRRADIATION IN DFR OF BORON CARBIDE NEUTRON ABSORBER PELLETS CLAD IN M316 STEEL	BROCKLEHURST JE;KELLY BT;BROWN RG;MOTTERSHEAD D	-	TRG REPORT 3009	UKAEA	DFR	Boron Carbide, Fuel Pellets, Control Rod, Shut off Rod	This report is a key reference associated with Control Rods. Experiments have been performed in the DFR on boron carbide pellets clad in M316 steel to determine their performance as control and shut off rod elements in the PFR	Calculations associated with irradiation of Boron Carbide Neutron absorber pellets.
4731	POST-REACTOR FISSION PRODUCT DISPOSITIONS - AN INTERNAL COMPANY OVER-VIEW	BRADLEY N	1981	ED 614					
5352	A STUDY OF THE EFFECT ON THE PHYSICS OF FAST REACTORS OF INCREASING BURN-UP	BRINDLEY KW	1985	FRDCC/P(85)96					
5467	LONGER-TERM FAST REACTOR R&D AND POSSIBLE SUPPORT TO FURTHER ECRA STUDIES IN THE PHYSICS AREA	THORNTON DEJ	1985	PPWG/P(85)57					
5499	COMMENTS ON VAN VLIET'S FINAL REPORT TO CEC ON TRANSIENT FISSION GAS BEHAVIOUR DURING SEVERE FAST REACTOR TRANSIENTS	MATTHEWS JR	1985	WCASG/P(86)56					
5501	COVER NOTE - RECOMMENDATIONS FOR THE FUTURE OF COSMOS - REVISED	ADAMSON J;DISBURY WH;HYLAND M	1986	PPWG/P(85)56;REVISED;MCSG/P(86)381					
5590	BOWHIST: THE PFR SUBASSEMBLY BOWING HISTORY TASK.	BUTLAND ATD;RICHARDS LRP;BILES C;TULLETT JD	1984	AEEW 2072	UKAEA	PFR	BOWHIST, COSMOS, Subassembly, Wrapper, Bow Calculations	This report is a key reference associated with the methods of calculation and their accuracy. BOWHIST is a task in the current COSMOS scheme provided to calculate subassembly wrapper damage and bow effects of PFR. The BOWHIST task performs wrapper and damage bow calculations for a particular past or existing reactor loading.	Calculations associated with the BOWHIST task
5704	A PHENOMENOLOGICAL MODEL OF THE HOOP STRESS AND CREEP STRAIN INDUCED IN A PFR FUEL PIN INCORPORATING THE EFFECT OF FISSION PRODUCT CORROSION	MCLOUGHLAN D	1986	DFMC/P(86)8;NDM 3102;FEWP/P(86)13;CPN 889		PFR			
5920	A SIMPLE ASSESSMENT OF THE DIFFERENCES IN HELIUM PRODUCTION RATES AT BASE OF ABOVE CORE STRUCTURES IN PFR, CFR AND SPX1	LORD DJ	1986	FRDCC/PPWG/P(86)67		PFR			
5977	AN INVESTIGATION INTO NEUTRON SHIELD PLUG AND HANGER BAR IN A 1/2 SCALE AIR WATER RIG	FOX AH	1977	NPC(W)/R 203					
6150	TRAFFIC ANALYSIS OF FUEL STRUCTURAL AND FISSION GAS BEHAVIOUR IN VIPER EXPERIMENTS	MATTHEWS JR;JOHNSON FA;ROBINS NG	1986	AERE R 12140; FRSWG/WCASG/P(86)62					
6185	A NEUTRON DIFFRACTION STUDY OF THE RESIDUAL STRESS DISTRIBUTION IN PFR EVAPORATOR FUSION WELDS	ALLEN AJ;BOWEN PH;HUTCHINGS MT	1986	AERE-R-11978;FRDCC/MWG(85)P233;FRDCC/MWG/FSG/(85)P42;		PFR			
6223	THE THERMAL CONDUCTIVITY OF BORON CARBIDE AFTER FAST NEUTRON IRRADIATION	GILCHRIST KE	1986	ND-R-1090(S);FRDC/MWP/P(84)1156;FRASG/P(84)206;	UKAEA	DFR, PFR	Thermal Diffusivity, laser flash method, thermal conductivity	This report is a key reference associated with Control Rods. The thermal diffusivity of hot pressed boron carbide pellets has been measured between 20°C and 1000°C by the laser flash method. Thermal conductivity has been derived using measured specific heat and density values. Empirical relations have been determined for the variation in thermal conductivity with total porosity. The results show an almost temperature independent post-irradiation conductivity. It is clear that the linear increase of swelling with burn-up would be unlikely to yield a true saturation of the thermal conductivity change.	Measured values of Thermal conductivity of boron carbide after fast neutron itemization for DFR and PFR.
6238	A NEUTRON DIFFRACTION STUDY OF THE RESIDUAL STRESS DISTRIBUTION IN PFR EVAPORATOR EXPLOSIVE WELDMENTS	ALLEN AJ;BOWEN PH;HUTCHING MT;RAINEY VS	1986	AERE-R-11979; FRDCC/MWG/(85)P234; FRDCC/MWG/FSG/(85)P43		PFR			
6393	METHODS OF CONTROLLING INCREASED BURN-UP REACTIVITY VARIATIONS.	BURSTALL RF;MAXFIELD H;VIRDEE TS	1986	FRDCC/PPWG/P(86)74					
6512	EFFECTS OF UNCERTAINTIES IN PHYSICS PARAMETERS USED IN FAST REACTOR DESIGN	THORNTON DEJ	1986	FRDCC/PPWG/P(86)86					
6562	CFR RESTRAINED CORE THE INFLUENCE OF CORE DESIGN ON THERMAL BOWING INDUCED REACTIVITY FEEDBACK	BECKETT VS	1977	NPC(W)/TN303;CFR/CRSG/P(77)99					
6636	FUEL FRAGMENTATION BY FISSION GASES DURING RAPID HEATING	WORLEDGE DH	1980	NUREG/CR-1611;SAND80-0328					
6665	THE TECHNICAL BASIS OF SPECTRAL SOURCE TERMS FOR ASSESSING UNCERTAINTIES IN FISSION PRODUCT RELEASE DURING ACCIDENTS IN PWRs WITH SPECIAL REFERENCE TO SIZEWELL B	HAYNS MR;ABBEY F;CLOUGH PN;DUNBAR IH	-	SRD R256					
6825	NOTES ON A DISCUSSION ON THE REACTIVITY INSERTIONS FROM SEISMIC AND LOCAL FAULT FCI IMITATORS, 23RD SEPTEMBER 1986	DOSTAL M;VAUGHAN GJ	1986	FRDCC/SWG/P(86)34					
6828	PLANT PERFORMANCE FROM PFR DURING PERIOD MAY 1985 - JULY 1986	CROWE DS;DISBURY W;DICKSON K	1986	FRDCC/PPWG/P(86)91		PFR			
6900	REACTOR PHYSICS ASPECTS OF INCREASING FAST REACTOR (FR) FUEL PIN DIAMETER	SUNDERLAND RE	1986	STM/1552;PPWG/P(86)90;					

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7215	PLANT PERFORMANCE INFORMATION FROM PFR DURING PERIOD MAY 1984 - MAY 1985	CROWE DS;DISBURY W;DICKSON K	1985	FRDCC/PPWG/P(85)		PFR			
7397	EVIDENCE FOR DATA TRANSFER ERRORS IN THE COSMOS BOWHIST TASK	DUTHIE	1986	CRCDG/P(86)43;PFR/FEDWP/P(86)1214;FRDCC/FEWP/P(86)66					
7634	THE HELIOS ACCELERATOR AND FAST REACTOR PHYSICS IN EUROPE	THORNTON	1986	FRDCC/P(86)148					
7669	REVIEW OF FAST REACTOR SHIELDING WORK 1983-1986	BURSTALL RF	1986	FRDCC/PPWG/P(86)96;FRSWG/P(86)2;ND-M-3913					
7682	NOTES OF A ONE DAY SEMINAR ON HIGH TEMPERATURE PROPERTIES OF NUCLEAR FUEL AND PROPERTIES FOR FISSION PRODUCT ASSESSMENT 7th OCTOBER,1986 AT HARWELL	MATTHEWS JR	1986	FRDCC/SWG/WCASG/P(86)92;FRFF/P(86)56;GNSR/FNS/P(86)6;UO2BPC/P(86)211					
7737	SUBCRITICAL MONITORING STUDIES FOR RELOAD 10A OF PFR	CROAD DS;LORD DJ;TAYLOR JA	1986	PFR/ERS/156;OETD/TN/1290;FRCMWG/P(86)294;PFR/TC/P(86)32	DNPDE, RNE	PFR	Reload, Subcritical Reactivity Measurements, Count Rates	This report is a key reference associated with the Subcritical Reactivity Measurements. This report describes the results of the measurements made during the reload and the related calculations carried out. It also compares the measured and predicted count rates at the individual chambers together with averaged values over the three chambers.	OPEX Data associated with Subcritical Reactivity Measurements
7771	REACTOR PHYSICS INFORMATION FROM PFR OVER PERIOD	LORD DJ	1986	PFR/TC/P(86)1		PFR			
7772	THE INTERPRETATION OF DELAYED NEUTRON SIGNALS FROM FUEL FAILURES IN THE PFR FAST REACTOR	LENNOX TA	1986	PFR/TC/P(86)2		PFR			
7815	PFR DESIGN REVIEW 1985/86 - ABSORBER RODS, ABSORBER EXPERIMENTS, GUIDE TUBES 4" BREEDER REFLECTORS AND 4" NEUTRON ATTENUATION PLUG	BROWNE JJ	1986	FRDD/FEWP/P(86)11		PFR			
7833	WHY SHOULD ONE DO MORE PHYSICS STUDIES IN SUPPORT OF FAST BREEDER REACTORS?		1987	FRDCC/PPWG/P(87)101 DRAFT					
7843	PROPOSALS FOR AN EXPERIMENTAL PROGRAMME ON THE RELEASE OF FISSION PRODUCTS AND FUEL DURING ACCIDENTS IN A FAST REACTOR	MIGNANELLI MA; POTTER PE	1987	FRDCC/SWG/WCASG/P(87)98					
7863	WHY SHOULD ONE DO MORE PHYSICS STUDIES IN SUPPORT OF FAST BREEDER REACTORS	LORD DJ	1987	FRDCC/PPWG/P(87)101					
8214	PROPOSALS FOR AN EXPERIMENTAL SHIELDING PROGRAMME JANUS, TO BE CARRIED OUT AT NESTOR AS PART OF THE AGT3 COLLABORATION	CURL IJ;MILLER PC	1987	FRDCC/PPWG/P(87)104;FRSSG/P(87)3;RP&SG/IJC/P(86)16					
8277	THE IMPLICATIONS OF CHANGE IN SUB-ASSEMBLY DESIGN ON NEUTRON INDUCED DAMAGE TO THE ABOVE CORE STRUCTURE OF PFR	BAGLEY KQ	1987	PFR/FEDWP/P(87)1251;FRDCC/CFWG/P(87)2;PFR/TC/P(87)139		PFR			
8278	THE RELEASE OF FISSION PRODUCT AND FUEL DURING ACCIDENT IN A FAST REACTOR	MIGNANELLI MA;POTTERPE	1987	FRDCC/SWG/P(87)1					
8388	PERA TECHNICAL SERVICES DEPARTMENT VALVE ENGINEERING OF NEUTRON SHIELDING RODS	PERA	-						
8407	THE DEFINITION, CALCULATION AND STORAGE OF DISPLACEMENT DAMAGE DOSE DATA	ADAMSON J;ANDERSON R	1987	CPN 956;ND-M-3736;IDWP/P(87)1;DFMC/P(87)13	UKAEA			Elevated temperature tensile properties for wrought solution heat treated Type321steel have been collated and analysed. Recommendations are given in Data Sheet format suitable for incorporation in the Fast Reactor Data and Conventions Manual	
8410	FBR REACTIVITY FAULTS - POSITIVE VOID COEFFICIENT	BROADLEY D	1987	FRDCC/SWG/P(87)6;FRJC/SPAG/P(87)4	NNC	FBR	Positive Void Coefficient	This paper is a key reference associated with Sodium Void. This report summarises the Positive void coefficient and associated FBR Reactivity faults. The report includes assessments of the inherent characteristics and the assessments within Beyond Design Basis and whole core accident conditions	Calculations associated with positive void coefficients
8413	A NEUTRON DIFFRACTION STUDY OF THE RESIDUAL STRESS DISTRIBUTION IN PFR EVAPORATOR EXPLOSIVE WELDMENTS	ALLEN AJ;BOWEN PH;HUTCHINGS MT;RAINEY VS	1986	AERE R 11979;FRDCC/MWG/P(85)234;FRDCC/MWG/FSG/P(85)43		PFR			
8476	PRELIMINARY RESULTS OF A STUDY ON THE INFLUENCE OF HUMIDITY AND GAMMA RADIATION ON THE INTERGRANULAR CORROSION OF SENSITISED/IRRADIATED 20/25/Nb IN AIR	KNOWLES G	1987	FRDCC/MWG/CSG/P(87)109;FRDCC/MWG/P(87)436;TPRD/B/F/0319/M86;AGR/FPWG/P(86)931					
8770	LOW VOID WORTH FAST REACTOR CORE DESIGNS - THEIR PERFORMANCE AND SAFETY IMPLICATIONS	BRINDLEY KW;PERKS MA	1987	FRDCC/SWG/P(87)15;FRDCC/PPWG/P(87)113					
8836	REVIEW OF INFORMATION ON FLAT REACTIVITY CORES AND PROPOSALS FOR FURTHER WORK	BURSTALL RF-;MAXFIELD H	1987	FRDCC/PPWG/P(87)108					
8876	THE EARTHQUAKE INDUCED REACTIVITY CHANGES IN CDFR: CALCULATIONS AND A PROPOSAL FOR SUPPORTING EXPERIMENTS	DUTHIE JC	1986	ND-R-1706(S)		DFR			
8911	REVIEW OF PFR REACTIVITY FEEDBACK COEFFICIENT MEASUREMENTS 1974 -1987	LORD DJ;CROWE DS;DICKSON AK;SUTHERLAND AJ	1987	FRDCC/PPWG/P(87)110;nd-m-3827	N/A	PFR	Reactivity Coefficient, Reactivity Feedback Effects, Reactivity monitoring	This report is a key reference associated with Reactivity coefficients. A large number of experiments have been completed on PFR to study reactivity feedback effects and these have been supplemented by routine operational reactivity monitoring. Attempts have been made to separate individual components of the feedbacks and this information has been collated to produce this paper.	OPEX Data associated with Reactivity Feedback effects
	INTERIM DESIGN RULES FOR THE DIMENSIONAL STABILITY OF WROUGHT AND CAST STELLITE 6 EXPOSED TO FAST NEUTRON IRRADIATION OVER THE TEMPERATURE 380-450oC	WATKIN JS	1980	PFR/FEDWP/P(80)0747;FAGN 156					
9041	A REVIEW OF NEUTRON FLUX INSTRUMENTATION DEVELOPMENT FOR CDFR (JULY 1982)	WILSON I;GOODINGS A	1982	CFR/CNIWG/P(82);FRDC/PPWP/P(82)354		DFR			
9106	UNCERTAINTIES IN SODIUM-VOID CALCULATIONS	STEVENSON JM	1987	FRDCC/PPWG/P(87)111	N/A		Sodium Void, Diffusion Theory, ZEBRA	This paper is a key reference associated with Sodium Void and methods for calculation and their accuracy. A paper to the Fast Reactor Physics Conference, in Aix-en-Provence in 1979 (1), considered the uncertainties in sodium-void worths calculated with MURAL/FGL5 and diffusion theory. It mainly used the results of small-zone sodium voiding's in the conventional ZEBRA assemblies 12, 13 and 15. It concluded that correction factors of 1.04±0.03, 1.00±0.20 and 0.89±0.08 should be applied respectively to the central non-leakage contributions to the calculated worths of sodium voiding obtained by exact perturbation Theory. A revised analysis has been carried out in the context of the CADENZA assemblies and including results from the heterogeneous BIZET assemblies. Details of the analysis are provided by attached extracts from two sections of the text and the appropriate tables and figures rom a draft version of a Winfrith Report on the analysis of the CADENZA assemblies. The conclusions are briefly summarised below.	Calculation values for uncertainty in sodium-void worths.
9121	LIKELY COST OF ENRICHED BORON IN THE FIRST DECADE OF A DEMONSTRATION FAST REACTOR PROGRAMME	THORNTON DEG	1987	PWR/CWG/P(87)486;PPWG/EASG/P(86)24					

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
9213	STATUS REPORT ON CFR NEUTRON SHIELDS AND NUCLEONIC INSTRUMENTATION	PHILLIPS AW;BRINDLEY KW;	1977	FRDCC/PPWP/P(77)178;FREDSWG/P(77)26;CFR/CNIWG/P(77)9					
9234	INFLUENCE OF SODIUM NEUTRON IRRADIATION AND WELDMENTS - CREEP RUPTURE STRENGTH FACTORS FOR 316 MOD (1 4909) FOR SNR2	BREITLING DR	1987	FRDCC/SIWG/CBG/P(87)15					
9291	ACCURACY OF PREDICTION OF DOPPLER EFFECTS IN FAST REACTORS	ROWLANDS JL	1987	FRDCC/PPWG/P(87)112	UKAEA		Doppler Effect, ZEBRA	This report is a key reference associated with the methods of calculation and their accuracy. The report describes the accuracy of the data models, expresses the approximations required and presents experimental validation of the Doppler Effect Calculational Methods	Comparison of experimental and calculated data associated with the prediction of Doppler Effects in Fast Reactors
9292	ACCURACY OF CALCULATIONS OF THE REACTIVITY EFFECTS OF SODIUM DENSITY CHANGES MADE USING HOMOGENEOUS MODELS AND FD5 DATA	ROWLANDS JL	1987	FRDCC/PPWG/P(87)118					
9341	A PRELIMINARY STUDY OF REACTIVITY CHANGES PRODUCED BY A FUEL/COOLANT INTERACTION CORE FAST REACTOR	PALENTINE JE	1987	WCASG/P(87)114;NRL-R-2001					
9355	PHYSICS CALCULATIONS FOR PFR WITH AN AXIALLY HETEROGENEOUS CORE DESIGN	HENSHALL G	1987	FRDCC/PPWG/P(87)119		PFR			
9400	MEASUREMENTS OF FISSION PRODUCTS AND ACTIVATED CORROSION PRODUCTS IN THE PRIMARY CIRCUIT OF THE PROTOTYPE FAST REACTOR	MASON L;TREVILLION EA;MORRISON NS;STEELE KB;GREEN TH	1987	ND-M-3478(D);FRDCC/SCWG/P(87)119					
9407	LOGAX - GRAPHICAL REPRESENTATION OF RESPONSE SPECTRUM ON TEKTRONIX TERMINALS	ASHCROFT L	1987						
9650	MESURE DE L'EFFET DOPPLER SUR PHENIX COMPARISON CALCUL - EXPERIENCE	GAUTHIER JC;VANIER M;CABRILLAT JC;COULON P	1985	IAEA-SM-284/74P					
9666	DESIGN SUPPORT REPORT FOR SUBSTANTIATION OF SHIELDING AROUND THE ADDITIONAL BUFFER STORE		-	B/C89/T637/DSR011					
9675	JOB ENQUIRY SPECIFICATION FUELLING MACHINE GAMMA MONITORS		-	B/C89/0481/JES1					
9676	DESIGN SUPPORT REPORT HUNTERSON B/C96/V1205/DSR011ISSUE A SUBSTANTIATION OF SHIELDING AROUND THE ADDITIONAL BUFFER STORE	CUDLIP M	1981	B/C96/1205/DSR011					
9677	SUBSTANTIATION OF SHIELDING AROUND THE ADDITIONAL BUFFER STORE	NICHOLSON	1982	C96/1205/DSR011					
9733	HINKLEY POINT B POWER STATION SUBSTANTIATION OF SHIELDING AROUND THE PLUG UNIT MAINTENANCE FACILITY		-	B/C89/0500/DSR001					
9738	DESIGN SUPPORT REPORT SUBSTANTIATION OF SHIELDING AROUND THE STRINGER DISMANTLING CELL		-	B/C89/0501/DSR003					
9739	DESIGN SUPPORT REPORT SUBSTANTIATION OF SHIELDING AROUND THE STRINGER DISMANTLING CELL		-	B/C89/0501/DSR003					
9740	DESIGN SUPPORT REPORT SUBSTANTIATION OF SHIELDING AROUND THE STRINGER DISMANTLING CELL		-	C89/0501/DSR003					
9752	HINKLEY POINT B PUMP/SDC CHARGE MACHINE GAMMA MONITORING SHIELDING		-	CEDR/C89/0481/SDY/RM					
9812	PROPOSED MASURCA EXPERIMENTS ON MODERATED CONTROL RODS	THORNTON DEJ	1986	FRDCC/PPWG/P(86)78					
9839	PHYSICS EXPERIMENTS TO INCREASE UNDERSTANDING OF PFR REACTIVITY FEEDBACK MECHANISMS	LORD DJ;WILKES DJ	1988	FRDCC/PPWG/P(87)127;FRDCC/P(88)285;PFR/SWP/P(88)23;DPC/P(88)12		PFR			
9841	PLANT PERFORMANCE INFORMATION FROM PFR DURING PERIOD JULY 1986 - AUGUST 1987	LORD DJ	1987	FRDCC/PPWG/P(87)125		PFR			
9860	CALCULATIONS OF REACTIVITY K-FACTORS FOR 7.5 AND 8.5 MM DMSA CLUSTER PINS FOR PFR	SNAPE GP	1987	FRDCC/FEWP/P(87)54		PFR			
9952	FURTHER CONSIDERATIONS ON THE BOWING OF SUB-ASSEMBLY WRAPPERS IN PFR AND CFR	JACKSON GO	1970	FRDC/P(70)22;PFR/TC/P49;FRDC/CPWP/P(70)22		PFR			
9955	FURTHER CONSIDERATIONS ON THE BOWING OF SUB-ASSEMBLY WRAPPERS IN PFR AND CFR	JACKSON GO	1970	FRDC/P(70)22;PFR/TC/P.49;FRDC/CPWP/P(70)22		PFR			
9999	OBSERVATIONS ON THE BEHAVIOUR OF THE METALLIC FISSION PRODUCTS MO, TC,RU,PD IN CABRI TESTS	CAMERON RF	1987	FRDCC/SWG/WCASG/P(87)146					
10130	ADDENDUM TO REVIEW OF PFR REACTIVITY FEEDBACK MEASUREMENTS 1974 - 1987	DICKSON AK	1987	FRDCC/PPWG/P(87)110;FRDCC/PPWG/P(87)10	UKAEA	PFR	Reactivity Coefficient, Reactivity Feedback Effects, Reactivity monitoring	This report is a key reference associated with Reactivity coefficients. A large number of experiments have been completed on PFR to study reactivity feedback effects and these have been supplemented by routine operational reactivity monitoring. Further information is included within FRDCC/PPWG/P(87)110;nd-m-3827. This report presents a review of the calculational model to make it more representative of the experimental results.	OPEX Data associated with Reactivity Feedback effects
10166	PFR INCREASED DISCHARGE BURN-UP: THE MID-CYCLE EQUILIBRIUM CORE PHYSICS MODEL	SUNDERLAND RE;GREENE JJ	1987	STM/1567;PFR/TC/P(87)141		PFR			
10171	SCD DOCUMENT DELAYED NEUTRON KINETICS AND DECAY HEAT MODULE FOR BESBET	AHUJA S	1987						
10199	SCHEDULED DOCUMENT CALCULATIONS TO FIND NEUTRON FLUXES AT THE OUTER BOUNDARY OF THE SNR2 IN-VESSEL FUEL STORE	CHAMBERS I	1987	STM/1612					
10203	SCD DOCUMENT DELAYED NEUTRON KINETICS AND DECAY HEAT MODULE FOR BESBET	AHUJA S	1987						
10303	SCD DOCUMENT NNC SPECIFICATION AND RESULTS OF A FAST REACTOR POINT BENCHMARK MODEL FOR REACTIVITY LOSS WITH BURNUP	MOORE D;SUNDERLAND RE	1987	STM/1618					
10308	REVIEW OF THE FAST REACTOR SHIELDING STUDY GROUP 1987	BURSTALL RF;LLOYD JM	1988	FRDCC/PPWG/P(87)131;FRSSG/P(87)23					
10326	SUBCRITICAL MONITORING STUDIES FOR RELOAD 13A OF PFR	CROWE DS;LORD DJ;DISBURY W	1987	PFR/ERS165;OETD/TN1468;PFR/TC/P(87)177	UKAEA	PFR	Subcritical Reactivity, fuel changes	This report is a key reference associated with Subcritical Reactivity Measurements. This report is part of a continued series comparing the measured and calculated results of subcritical monitoring during fuel changes in PFR. This notes presents the changes made during Reload 13A.	OPEX Data and calculated data associated with Subcritical Reactivity Measurements
10327	SUBCRITICAL MONITORING STUDIES FOR RELOAD 12 OF PFR	CROWE DS;LORD DJ;DISBURY W	1987	PFR/ERS164;OETD/TN1461;PFR/TC/P(87)175	UKAEA	PFR	Subcritical Reactivity, fuel changes	This report is a key reference associated with Subcritical Reactivity Measurements. This report is part of a continued series comparing the measured and calculated results of subcritical monitoring during fuel changes in PFR. This notes presents the changes made during Reload 12.	OPEX Data and calculated data associated with Subcritical Reactivity Measurements
10328	SUBCRITICAL MONITORING STUDIES FOR RELOAD 11 OF PFR	CROWE DS;LORD DJ;DISBURY W	1987	PFR/ERS163;OETD/TN1460;PFR/TC/P(87)173	UKAEA	PFR	Subcritical Reactivity, fuel changes	This report is a key reference associated with Subcritical Reactivity Measurements. This report is part of a continued series comparing the measured and calculated results of subcritical monitoring during fuel changes in PFR. This notes presents the changes made during Reload 11.	OPEX Data and calculated data associated with Subcritical Reactivity Measurements
10366	POTENTIAL EFFECTS OF VOIDING WITHIN THE CDFR CORE AS A RESULT OF THE RELEASE OF ALL THE AVAILABLE FISSION GAS WITHIN ONE SUB-ASSEMBLY	MORRIS M	1988	FRJC/SPAG/P(88)4;FRDCC/SWG/P(88)3		DFR			
10433	LOGAX - GRAPHICAL REPRESENTATION OF RESPONSE SPECTRUM ON TEKTRONIX TERMINALS	ASHCROFT L	1987						
10538	SCD DOCUMENT LOOSE PARTS MONITORING AND NEUTRON NOISE MEASUREMENT FOR FBR'S	BUTT DFC;FERER G	1987						

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
10545	EVALUATED FISSION YIELDS FOR MASS CHAIN A-85	JAMES MF	1988	CNDC/P(88)24					
10552	REVISED DIFFERENTIAL AND INTEGRAL GAMMA ACTIVITIES FROM Pu FISSION FRAGMENTS PRODUCED IN THE ZEBRA FAST REACTOR	WHITFIELD MD	1988	DIDSG/P(88)377					
10729	THE CHOICE OF FACILITIES FOR FUTURE EUROPEAN FAST REACTOR SHIELDING EXPERIMENTS	MILLER PC;CURL IJ;GAUTHIER JC;SALVATORES M;PALAMIDESSI A	1988	FRDCC/PPWG/P(87)124;FRSSG/P(88)25					
10792	JOB ENQUIRY SPECIFICATION FOR TRANSFER CELL SUPPORT FRAMES HATCHWAY GUIDES FRAMES FOR WALL PENETRATION SHIELDING POND 5 DECANNER - BUILDING B311 WINDSCALE	HARTLY DJ	1981	POND 5/C6759/3/JES/23					
10811	PLANT SUBSTANTIATION DOCUMENT AXISYMMETRIC TEMPERATURE ANALYSIS OF THE INTERSTITIAL NOZZLE AND PERIPHERAL FLUX MEASURING NOZZLE UNDER STEADY STATE NORMAL OPERATING CONDITIONS PARTS 2 & 3		-	C93/PSD/231/009					
10871	ASSESSMENT OF THE THERMOHYDRAULIC CONSEQUENCES OF THE INSTANTANEOUS RELEASE OF THE ENTIRE FISSION GAS INVENTORY OF THE CDFR END-OF-CYCLE CORE TO THE COVER GAS	MORRIS M	1988			DFR			
10896	THE NEUTRON RESPONSE OF 7LIF THERMOLUMESCENT DOSEMETERS FOR FAST REACTOR STUDIES	KNIPE AD	1988	FRDCC/PPWG/P(88)149					
10950	THE PHYSICS OF LARGE FAST REACTOR CORES REPORT ON SEMINAR ORGANISED BY THE SOCIETE FRANCAISE d'ENERGIE NUCLEAIRE (SFEN) AT CADARACHE - 16 MARCH 1988	ROBINSON PJ	1988	FRDCC/PPWG/P(88)150					
11278	ESTIMATION OF PRESSURE INCREASE IN THE CDFR COVER GAS SYSTEM DUE TO TOTAL, INSTANTANEOUS FISSION GAS RELEASE	MORRIS M	1988	FRDCC/SWG/P(88)18		DFR			
11344	MAKING BETTER USE OF THE PFR NEUTRON SHIELD STORE	BATES PM	1987	PFR/TC/P(88)257		PFR			
11414	SIZEWELL B CONTROL ROD DRIVE SYSTEM AND FLUX MAPPING SYSTEM	BATES S;MCENTEE A;WAKELAM S	1988	PMT - TM.347;R&D/R 1180					
11421	SUBCRITICAL REACTIVITY MONITORING ON PFR - A STATUS REPORT AND REVIEW (FEB 1988)	LORD DJ;CROWE DS	1988	PFR/TC/P(88)242	Not Stated	PFR	Subcritical Reactivity, refuelling	This report is a key reference associated with Subcritical Reactivity Measurements. This paper discusses the results of a programme of work to produce a viable method of monitoring the subcritical reactivity margin of an LMFBR during refuelling.	Summary of OPEX and calculated data for monitoring the subcritical reactivity margin of an LMFBR during refuelling.
11772	THE 1988 INTERNATIONAL REACTOR PHYSICS CONFERENCE JACKSON HOLE WYOMING SEPTEMBER 18-22	THORNTON DE	1988	FRDCC/PPWG/P(88)161					
11799	A PROGRAMME OF MEASUREMENTS TO IMPROVE THE CALCULATION OF THE FAST REACTOR DOPPLER TEMPERATURE COEFFICIENT OF REACTIVITY	SOWERBY MG & COATES MS	1988	FRDCC/PPWG/P(88)159					
11839	BENCHMARKS FOR REACTIVITY LOSS WITH BURN UP FOR LARGE LMFBRs	BURSTALL RF	1989	FRDCC/PPWG/P(88)160					
11890	COMPILATION OF UK FAST REACTOR EXPERIMENTAL FACILITIES FOR THERMAL HYDRAULIC INVESTIGATIONS	BROWN GA	1988	FR/THSG/P(88)390					
11901	PLANT PERFORMANCE INFORMATION FROM PFR DURING PERIOD SEPTEMBER 1987 OCTOBER 1988 INCLUDING STUDIES OF THE SUPER PHENIX 1 EXPERIMENTAL START UP ANALYSIS AND PHENIX IHX SHIELDING MEASUREMENTS	CROWE DS;DICKSON AK;DISBURY W;EDMISTON G;SUTHERLAND AJ	1988	FRDCC/PPWG/P(88)162		PFR			
11925	THE NEW CRAFT PHYSICS MODEL	GOULD J	1988	RTS/TAD/P(88)1845;EFR/E/001075					
11964	PROGRAMME OF NNC SHIELDING WORK FOR EFR	BRINDLEY KW;DOSTAL M	1988						
11973	AN OUT-OF-REACTOR STUDY OF PFR ABSORBER ROD VIBRATION AND ITS IMPLICATIONS FOR WEAR AND REACTIVITY NOISE	RIDEALGH F;BRAMAH PJ;MELVIN GT	1988	ND-R-1142(S);PFR/FEDWP/P(84)1009		PFR			
11995	THE CABRI 1 PROGRAMME IMPORTANT INFORMATION OF RELEVANCE FOR THE ESTIMATION OF FISSION PRODUCT SOURCE TERMS FOR SEVERE ACCIDENTS IN FAST REACTORS	MIGNANELLI MA	1988	FRDCC/SWG/WCASG/P(88)196;CABRI NOTE U 88/108					
12009	A SUMMARY OF REACTIVITY BENCHMARK CALCULATIONS BY NNC INTERATOM AND BELGONUCLEAIRE	SUNDERLAND RE	1988	FRDCC/PPWG/P(88)165					
12018	COMPARISON OF CALCULATED AND MEASURED GAMMA DOSE RATES IN PHENIX HEAT EXCHANGER	DICKSON AK	1988	DNE-M-24;FRSSG/P(88)33					
12022	SECULAR VARIATION OF PEAK LINEAR FUEL PIN RATING IN FBR	THORNTON DEJ	1988	FRDCC/PPWG/P(88)168					
12106	AN ASSESSMENT OF THE PFR HOT SPOT TEMPERATURE WITH PARTICULAR REFERENCE TO PHYSICS	JACKSON GO	1967	RPWP/P(67)56;FDWP/P(67)29		PFR			
12159	THE NEW CRAFT PHYSICS MODEL		1989	FRDCC/SWG/WCASG/P(89)205					
12160	SOME COMMENTS ON THE DETECTION OF LOCAL BLOCKAGES IN FAST REACTOR SUB ASSEMBLIES BY DELAYED NEUTRON MONITORING	LENNOX TA	1989	FRSWG/SISG/P(89)2					
12293	EFFECT OF S/A VIBRATIONS IN PFR ON REACTIVITY AND PROTECTION AGAINST SPERT	BRINDLEY KW	1971	PFR/FDWP/P(71)120;PFR/TC/P(71)100		PFR			
12348	A FAST REACTOR SUB ASSEMBLY DESIGN TO REDUCE NEUTRON INDUCED VOIDAGE	LINNING DL	1972	PFR/FDWP/P(72)184;FRDC/FEWP/P(72)715;CFR/EST/P(72)129					
12420	THE EFFECT OF SUB ASSEMBLY VIBRATION ON REACTIVITY NOISE IN PFR AND CFR	LUNT AR	1974	PFR/FDWP/P(74)268		PFR			
12517	PFR IHX DELAYED NEUTRON MONITOR VALIDATION EXPERIMENTS ON A 1/5 SCALE WATER MODEL	PARDY A	1987	NRL-R-1010;PFR/TC/P(88)265		PFR			
12585	PFR WRAPPER DILATION DUE TO NEUTRON INDUCE VOIDAGE AND IRRADIATION CREEP	HAAKE N	1975	PFR/FDWP/P(75)350;PFR/TC/P(75)12		PFR			
12694	REVIEW OF FAST REACTOR SHIELDING STUDY GROUP 1988	BURSTALL RF;LLOYD JM	1989	FRDCC/PPWG/P(88)172;FRSSG/P(89)42					
12839	THE COST AND BENEFITS OF STORING COSMOS SOURCE CODING AND DOCUMENTATION OF MICROFICHE	FLETCHER JK	1989	FRDCC/PPWG/P(89)181					
12875	REVISED ESTIMATES OF THE REACTIVITY NOISE DUE TO SUB ASSEMBLY VIBRATION IN PFR AND CFR	LUNT AR	1975	PFR/FEDWP/P(75)377;FRD/P(75)54		PFR			
12902	PROPOSAL FOR THE NEUTRON SHIELD DESIGN FOR THE PFR/CFR SERIES OF CORE EXPERIMENTS AS BASED ON THE NPC 006 CFR DESIGN AND IDENTIFIED AS 0142,0143 AND 0144	FORD J	1976	PFR/FEDWP/P(76)407		PFR			
12909	BOWING OF FUEL PINS TO DIFFERENTIAL NEUTRON VOIDAGE GROWTH	MCAREAVEY G	1976	PFR/FEDWP/P(76)411;FRDC/FEWP/P(76)12					
12912	THE BEHAVIOUR OF ALTERNATIVE CFR NEUTRON SHIELD/WRAPPER JOINTS UNDER REACTOR TRIP CONDITIONS	SMITH BH	1976	PFR/FEDWP/P(76)416;FEDO/DM 76/62					
12931	NOTES OF DISCUSSION ON PFR ON THE PFR (CFR) EXPERIMENT WITH NEUTRON SHIELD (01/42) HELD ON 5/4/76	GATLEY JA;BAGLEY KQ;BETTS C;FORD J;POUNDER JO	-	FEDWP		PFR			
13060	THE CEA FAST NEUTRON REACTOR COURSE INSTN CADARACHE SEPTEMBER 1978	ANDERSON RG;GATLEY JA	1978	FAGN 85;PFR/FEDWP/P(78)629;FRDC/FEWP/P(78)38					
13096	THE COSMOS VERSION OF CRAMP A FUNCTIONAL SPECIFICATION	BUTLAND ATD	1979	PFR/FEDWP/P(79)665					
13177	A METHOD OF DETERMINING THE NEUTRON DISPLACEMENT DAMAGE FOR PFR SUB ASSEMBLY COMPONENTS	HAAKE N	1976	PFR/FEDWP/P(76)483		PFR			
13183	DISTORTION OF PFR RING 12 BREEDER SUB ASSEMBLIES DUE TO NEUTRON DAMAGE AND IRRADIATION CREEP	HAAKE N	1977	PFR/FEDWP/P(77)489		PFR			
13390	MEASUREMENT OF THE DOPPLER EFFECT ON PFR	CROWE DS;LORD DJ;SUTHERLAND AJ	1988	PFR/TC/P(88)279		PFR			
13418	PROPOSALS FOR A NEW BENCHMARK FOR REACTIVITY LOSS WITH BURN-UP	BURSTALL RF	1989	FRDCC/PPWG/P(89)188					
13518	FAST NEUTRON INDUCED VOIDS	BISHOP JFW	1969	FRFDMC/P(6901;PFR/FDWP/P(69)66					

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
13520	PFR SUB ASSEMBLY BOWING DUE TO NEUTRON INDUCED MATERIAL SWELLING	FIRTH G	1969	PFR/FDWP/P(69)69		PFR			
13531	FURTHER ESTIMATES OF PFR SUB ASSEMBLY BOWING DUE TO NEUTRON INDUCED MATERIAL SWELLING	FIRTH GF	1969	PFR/FDWP/P(69)80		PFR			
13541	THE COSMOS VERSION OF CRAMP NOTES OF A DISCUSSION HELD AT AERE HARWELL ON TUESDAY 6 NOVEMBER 1979	ANDERSON RG	1979	FAGN 127;FRCMWG/P(79)237;FRMCSG/WG/N(79)172;PFR/FEDWP/P(79)705					
	INTERIM DESIGN RULES FOR THE DIMENSIONAL STABILITY OF WROUGHT AND CAST STELLITE 6 EXPOSED TO FAST NEUTRON IRRADIATION OVER THE TEMPERATURE 380-450oC	WATKIN JS	1980	PFR/FEDWP/P(80)747;FAGN156					
13585	WATER ENDURANCE TESTS OF PFR NEUTRON SHIELD ROD GAGS AND PROPOSED MODULAR PUMP INLET FILTER UNITS	COLLINSON AE;COCHRANE JR	1981	ND-R-587;PFR/FEDWP/P(80)756		PFR			
13906	INITIAL ASSESSMENT OF THE INFLUENCE OF CURRENT REACTIVITY INSERTION RATES FOR THE CDFR CORE SUPPORT FAILURE ACCIDENT	KLINGERT B	1989	FRDCC/SWG/WCASG/P(88)122		DFR			
14048	RZ AND TRI-Z GEOMETRY CALCULATIONS OF CORE PHYSICS PARAMETERS FOR THE EFR FIRST CONSISTENT DESIGN AXIALLY HETEROGENEOUS CORE	HENSHALL G	1989	FRDCC/PPWG/P(89)194					
14050	PELLET CLAD INTERACTION CALCULATIONS FOR EFR FUEL PINS SENSITIVITY TO SOLID FISSION PRODUCT SWELLING ASSUMPTIONS	NORRIS DIR	1989	RD/B/XG/0019/M89;FRDCC/FEWP/P(89)14;FRFF/P(89)16; TARGET XL1225;BOAT DB06					
14062	CALCULATIONS TO COMPARE CDFR SUB ASSEMBLY NEUTRON SHIELD DESIGNS AND FIND THE SHIELDING REQUIREMENTS OF THE INTERMEDIATE HEAT EXCHANGERS	CHAMBERS I	1987	STM/1541;FRDCC/PPWG/P(86)80;PPWG/EASG/P(86)25		DFR			
14155	DESIGN EQUATIONS FOR CRAMP IN COSMOS PFR RUNS 0-6	BAGLEY KQ;ANDERSON RG	1982	PFR/FEDWP/P(82)875;FAGN 220		PFR			
14173	PRELIMINARY SHIELDING ASSESSMENT OF PARTS OF THE EUROPEAN FAST REACTOR ROOF DESIGN	WOOTTON TA	1989						
14176	DELAYED NEUTRON PARAMETER REQUIREMENTS FOR REACTOR PHYSICS PURPOSES	STEVENSON JM	1986	DIDSG/P(86)353					
14192	COMMENTS ON THE CALCULATION OF FAST REACTOR DOPPLER COEFFICIENTS	SOWERBY MG	1987	FRDCC/PPWG/P(87)116					
14198	A REVIEW OF NEUTRON FLUX INSTRUMENTATION DEVELOPMENT RELEVANT TO THE FAST REACTOR PROGRAMME (JANUARY 1988)	GOODINGS A	1988	FRDCC/PPWG/P(88)137;FRSWG/SISG/P(88)2					
14205	PROPOSALS FOR SAFETY RELATED EXPERIMENTS TO BE INCORPORATED IN THE CONRAD PROGRAMME	PERKS MA;FLETCHER JK	1988	FRDCC/PPWG/P(88)143					
14216	INTEGRAL MEASUREMENTS OF ACTINIDE CAPTURE CROSS SECTIONS IN PHENIX	ROWLANDS JL	1988	FRDCC/PPWG/P(88)166					
14227	A STUDY OF SODIUM VOID AND DOPPLER EFFECTS IN THE SUPER-PHENIX FAST BREEDER REACTOR	BARDEN IR	-	AEEW R 1115					
14231	DOPPLER CONSTANTS AND SODIUM VOID WORTHS FOR OXIDE AND LIMBO FUELLED CFR'S	WEST A	1974	TRG/M6455;FRDC/CPWP/P(74)265;BNDC/TN 513	UKAEA	CFR	Doppler Constant, Sodium Void Worths	This report is a key reference associated with Sodium Void. Doppler Constants and Sodium Void Worths have been calculated for oxide and limbo fuelled CFR's. MK.1 oxide and 169 pin (8.0 mm diameter) limbo fuel designs have been chosen to represent oxide and limbo fuel. The equilibrium fuel cycle physics data and fuel design parameters for both these fuel types are described.	Calculated values for Doppler Constants and Sodium Void Worths
14242	PRELIMINARY SHIELDING ASSESSMENT OF PARTS OF THE EUROPEAN FAST REACTOR ROOF DESIGN	WOOTTON TA	1989	STM/1672					
14243	CONSIDERATION OF ERRORS IN REACTIVITY SCALES BASED ON PERIOD MEASUREMENTS IN FAST REACTORS	STEVENSON JM	-	AEEW M1393					
14254	THE COST OF COVERING UNCERTAINTIES IN POWER DISTRIBUTION IN CFR.1	BRINDLEY KW	1973	FRDC/CPWP/P(73)249					
14304	DOSE-BURNUP RATIOS IN PFR AND PHENIX	THORNTON DEJ	1989	FRDCC/PPWG/P(89)198;CFWG/FPSG/P(89)16		PFR			
14310	REACTIVITY PERTURBATION INCFR CAUSED BY ESCAPE OF FISSION PRODUCT GAS FROM A SINGLE SUB-ASSEMBLY		1972	TRG/MEM/6211(R/X);CFR/SWP/P(72)50					
14313	KFK POSITION ON DOPPLER UNCERTAINTY	THORNTON DEJ	1989	FRDCC/PPWG/P(89)199					
14314	EVIDENCE FOR A DISCREPANCY IN DOSE/BURN-UP RATIOS CALCULATED FOR PHENIX AND PFR	ADAMSON J	1989	FRDCC/PPWG/(89)200		PFR			
14342	A SUMMARY OF THE CORE REACTIVITY STUDIES PERFORMED ON THE EXPERIMENTAL START-UP PROGRAMME OF SPX1 REACTOR JULY 87 TO JUNE 89	NEWTON TD	1989	FRDCC/PPWG/P(89)195					
14411	REPORT ON THE STEADY STATE CALCULATIONS OF ABOVE CORE NEUTRON DETECTOR RESPONSE IN THE SPX2 FAST REACTOR DURING NORMAL OPERATION AND ACCIDENTAL FULL WITHDRAWAL OF CONTROL ROD	BAINBRIDGE N;CHAMBERS I	1988	STM/1643					
14425	UK WORK IN THE SUPERPHENIX PHYSICS COMMISSIONING TASK FORCE	ROBINSON PJ;THORNTON DEJ	1989	FRDCC/PPWG/P(89)203					
14427	THE EVALUATION OF BOUNDARY CONDITIONS AND THE CALCULATION OF CONDENSING SPECTRA TO BE USED IN NEUTRONIC CALCULATIONS FOR THE SPX1 REACTOR	NEWTON TD	1988	FRCMSG/P(88)313					
14557	THE NEW CRAFT PHYSICS MODEL	GOULD J	1989	RTS/TAD/P(88)1845;FRDCC/PPWG/P(89)206;FRDCC/SWG /WCASG/P(89)205					
14633	COMPILATION OF FAST REACTOR EXPERIMENTAL FACILITIES FOR THERMAL HYDRAULIC INVESTIGATIONS	BROWN GA	1989	FR/THSG/P(89)390					
14706	STATEMENT FOR THE SISG ON THE REQUIREMENTS FOR THE DEVELOPMENT OF NEUTRON DETECTORS FOR EFR	LENNOX TA	1989	FRSWG/SAFSG/P(89)17					
15140	PFR NEUTRONICS DATA SHEETS PART 2 PFR SODIUM VOID DATA		1989	PFR/TC/P(89)368	AEA Technology	PFR	Sodium void, core loading	This report is a key reference associated with Sodium Void. This note presents the results from a series of sodium void calculations of PFR core. The reactor model used for these calculations has been constructed to give a close representation of a typical core loading of PFR. These results are compared with previously obtained results.	Calculations associated with Sodium Void of the PFR Core
15141	AN EXAMINATION OF THE CHANGE IN CORE REACTIVITY OF PFR DURING RUN 16C	CROWE DS;DISBURY WH;NEWTON TD	1989	PFR/TC/P(89)343	UKAEA	PFR	Reactivity Coefficients, BPOINT,	This paper is a key reference associated with Reactivity and Burn Up. This paper examines the reactivity discrepancy reported by the BPOINT program for run 16C of PFR. A review is made of the reactivity coefficients included within BPOINT and recommendations are made to improve the accuracy of E-C predictions from BPOINT.	Calculated data for Reactivity Coefficient, BPOINT Program experience
15145	AN EXPERIMENTAL EVALUATION OF THE REACTIVITY ADDITION DUE TO WITHDRAWING TWO ABSORBER RODS FROM PFR WHEN IN ITS FULLY SHUTDOWN CONFIGURATION	NEWTON T	1989	PFR/TC/P(89)378	AEA Technology	PFR	Calibration of Control Rods, Reactivity Worth, Reactivity	This paper is a key reference associated with the Calibration of Control Rods. The paper reports on the experiment performed on PFR to simulate the configuration which would result if the two worst possible handling errors were made during refuelling of the core. The experimental record is described, the method of interpretation and the results obtained. A comparison with predicted values is given along with a discussion of the implied limits on PFR Operation.	OPEX Data associated with PFR Operation. Comparison between PFR Operation and predicted values is given.

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15150	AN EXPERIMENTAL EVALUATION OF THE REACTIVITY ADDITION DUE TO WITHDRAWING TWO ABSORBER RODS FROM PFR WHEN IN ITS FULLY SHUTDOWN CONFIGURATION	CROWE D	1989	PFR/TC/P(89)378		PFR			
	UKAEA/SCUAE COLLABORATION PHYSICS TEAM VISIT OT USSR 16-23 APRIL 1989 TEAM REPORT	THORNTON DEJ	1989	FRDCC/P(89)343					
15274	3D BENCHMARK FOR EFR FLUX AND POWER CALCULATIONS	TIMM	1989	54.07889.0					
15307	REPLACEMENT OF BORON CARBIDE (B4C) WITH STEEL FOR EFR INNER AXIAL NEUTRON SHIELD	BAINBRIDGE N	1989	STM 89/101	Not Stated	EFR	Control Rods, Axial Shield, Boron Carbide, Neutron Attenuation, Shielding	This paper is a key reference associated with Control Rods. Calculations have been performed to determine the equivalent thickness of steel required for the axial shield above the inner core in comparison to the current 20 cm boron carbide shielding arrangement. These calculations show that 90 cm of steel shielding is required to achieve the equivalent neutron attenuation. Within the confines of the current proposed EFR design, this alternative shielding configuration is not acceptable.	Calculations for shielding within the EFR core
15348	COMPARISON OF PFR NEUTRON ABSORBER PIN EXPERIMENT 13/08/04 WITH COMPUTER MODEL BORON (V5B)	KELLY BT	1989	NRL-M-2162;CFWG/FPSG/P(89)24	NRL SPRINGFIELDS	PFR	Absorber pin, boron carbide, BORCON, Thermal conductivity	This report is a key reference in the Calibration of Control Rods. The results of post irradiation examination of the PFR absorber pin experiment 13/08/04 using 40% B-10 Boron carbide are compared with predictions of the computer model "BORCON". The calculations use values of thermal conductivity of boron carbide measured on pellets taken from the experiment.	Comparisons of Calculated and Experimental Data associated with the PFR Neutron Absorber pin
15388	POSSIBLE COLLABORATIVE REACTOR PHYSICS EXPERIMENTAL PROGRAMME	LORD DJ	1990	FRDCC/PPWG/P(90)210					
15524	A CALCULATION OF THE ISOTHERMAL TEMPERATURE COEFFICIENT AND THE DOPPLER COEFFICIENT IN PFR AND A COMPARISON WITH MEASUREMENT	NEWTON TD;DISBURY W	1989	PFR/TC/P(89)340;FRDCC/PPWG/P(89)190	UKAEA	PFR	Isothermal Temperature Coefficients, Doppler Coefficient	This report is a key reference associated with the Reactivity and Thermal Coefficients. In mid February 1988, a measurement of the isothermal thermal temperature coefficient was completed. The results from the experiment were sued to deduce the doppler coefficient and reviewed with calculated values. The calculation employed was that for an idealised PFR equilibrium core. It is known that some approximations associated with the compositions of the model as well as the method of temperature extrapolation were employed. This note re-examines the calculated value of both the isothermal temperature coefficient and the doppler contribution to this coefficient.	
15705	ESTIMATES OF THE LEVEL AND RATE OF REACTIVITY INSERTION IN A RESTRAINED CORE FAST REACTOR FOLLOWING A FUEL/COOLANT INTERACTION	PALENTINE JE;DUTHIE JC	1989	NRL-R-2029;WCASG/P(89)235					
15763	A STUDY OF PULSE AND PULSE CAMPBELL FISSION COUNTER DESIGN FOR HIGH TEMPERATURE OPERATION IN LMFBRS	BARDSLEY DJ;BECKETT AT	1987	AEEW M 2412					
15768	REVIEW OF FAST REACTOR SHIELDING STUDY GROUP 1989/90	BURSTALL RF	1990	FRDCC/PPWG/P(90)213;FRSSG/P(90)65					
15933	A NOTE ON THE POSSIBILITY OF PERFORMING FURTHER DOPPLER MEASUREMENTS IN PFR	NEWTON TD	1990	FRDCC/PPWG/P(90)218		PFR			
15935	CALCULATIONS OF CORE PHYSICS PARAMETERS FOR THE EFR FIRST CONSISTENT DESIGN AND AXIALLY HETEROGENEOUS VARIANTS IN RZ AND TRI-Z GEOMETRY	SMITH P	1990	FRDCC/PPWG/P(90)217					
15961	AN ANALYSIS OF REACTIVITY FEEDBACK IN SPX1 USING FGL5 CROSS-SECTIONS	NEWTON TD	1990	FRDCC/PPWG/P(90)216;FRCMSG/P(90)325					
15966	PRELIMINARY ASSESSMENT OF INSTRUMENTATION RESPONSES IN THE ABOVE CORE STRUCTURE OF THE EFR AND ASSESSMENT OF NEUTRON ACTIVATION OF THE SECONDARY SODIUM CIRCUIT	WILLIAMS P; BAINBRIDGE N	1990	STM90/122					
16007	DOSE/BURNUP RATIOS IN PFR AND PHENIX - CEA EVALUATION	THORNTON DEJ	1990	PPWG/P(90)220		PFR			
16039	A COMPARISON OF FD5 AND FGL5 DATASET EVALUATIONS OF THE DOPPLER EFFECT FOR COMMERCIAL SIZE FAST REACTORS	DISBURY W	1990	FRDCC/PPWG/P(90)219					
16098	RESULTS OBTAINED USING MARC/PN FOR THE AGT3 DOPPLER BENCHMARK	SMITH P	1990	FRDCC/PPWG/P(90)222					
16201	INVESTIGATION OF THE EFFECT OF CORE RESTRAINT SYSTEM DESIGN ON RADIAL EXPANSION REACTIVITY FEEDBACK FOR FAST REACTORS IN LOSS OF FLOW TRANSIENTS	GOULD J;PERKS MA	1989	TAD/P(89)2068					
16261	COMPARISON OF THE EFR HIGH AND NON BREEDING REACTOR CONCEPTS CONCERNING NEUTRON FLUXES BEYOND THE INTERNAL STORAGE	STOJADINOVIC	1990	54.07925.9					
16390	A REVIEW OF THE SODIUM VOID COEFFICIENT AND WAYS OF REDUCING IT TO PRODUCE SAFER FAST REACTORS	SMITH MF	-	AEEW-R951					
16392	THE FAST NEUTRON RESPONSE OF 7LIF THERMOLUMINESCENT DOSEMETERS	KNIPE AD	1990	AEEW-R2584					
16396	RESULTS OF A DOPPLER BENCHMARK	EVRARD G	1990	28333/213					
16397	NNC CONTRACT C71 FAST REACTOR DESIGN PROGRAMME SCHEDULE FOR CORE PHYSICS SAFETY AND PLANT PERFORMANCE	FROGGART K	1990						
16449	VARIATIONS IN THE RECORDED 41AR REACTIVITY IN THE PFR COVER GAS PFR RUNS 13 TO 21	MACLEOD	1990	PFR/TC/P(90)411		PFR			
16649	NNC CONTRACT C71 FAST REACTOR DESIGN PROGRAMME SCHEDULE FOR CORE PHYSICS SAFETY AND PLANT PERFORMANCE	FROGGATT K	1991						
16754	REPORT ON THE STEADY-STATE CALCULATION OF ABOVE CORE NEUTRON DETECTOR RESPONSE IN THE EFR DURING NORMAL OPERATION	WILLIAMS P;BAINBRIDGE N	1990	TSS 90/015					
16887	INFLUENCE OF THE CORE HEIGHT TO CORE DIAMETER RATIO ON THE STABILITY OF RADIAL FLUX AND POWER DISTRIBUTION	WEHMANN	1990	54.07952.4					
16962	REVISED ACCURACY PREDICTIONS FOR NEUTRON INDUCED VOIDAGE BOWING	LITHERLAND JR	1978	CFR/THWG/P(78)144					
16964	A DESCRIPTION OF THE COSMOS SUB ASSEMBLY BOWING TASKS IN CURRENT USE AND THE STATUS OF THE MORE ADVANCED TASKS CURRENTLY BEING PREPARED	BUTLAND	1978	CFR/THWG/P(78)142					
16988	PFR REACTIVITY FEEDBACK EXPERIENCE AND ITS RELATIONSHIP TO GAS GAP CONDUCTANCE VALUES	LORD DJ	1979	CFR/THWG/P(79)173	Not Stated	PFR	Feedback, Fuel, Cladding, Heat Transfer	This report is a key reference associated with the Fast component of feedback. This report reviews the understanding of the various reactivity feedback mechanisms in operation. The primary emphasis of the results is on the effects of fuel to cladding heat transfer effects.	OPEX Data for reactivity feedback mechanisms.

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17109	SUB CRITICAL MONITORING FOR RELOAD 20 OF PFR	CROWE DS	1990	PFR EXP RESULTS SHEET NO 192;ASMD TECH NOTE 1810	PFR	PFR	Subcritical Reactivity, fuel changes	This report is a key reference associated with Subcritical Reactivity Measurements. This report is part of a continued series comparing the measured and calculated results of subcritical monitoring during fuel changes in PFR. This notes presents the changes made during Reload 20	OPEX Data and calculated data associated with Subcritical Reactivity Measurements
17221	NNC CONTRACT C71 FAST REACTOR DESIGN PROGRAMME SCHEDULE FOR CORE PHYSICS SAFETY AND PLANT PERFORMANCE	FROGGATT K;BENNET J;WALKER D	1990						
17321	CORE PHYSICS CALCULATIONS PERFORMED TO PROVIDE REACTIVITY COEFFICIENTS FOR AN ANALYSIS OF WHOLE ACCIDENTS IN PFR	SMITH PJ	1991	PPWG/P(90)230;FRESD/P(90)2197;FCMSG/P(90)329	AEAFR	PFR	Reactivity Coefficients, MARC/PN, FD5, whole core accident, core loadings	This report is a key reference associated with the Reactivity and Thermal Coefficients. A need for the re-examination of the whole core accidents in PFR has arisen in connection with the recent requirement that PFR should be licensed by the NII. This paper describes a series of MARC/PN calculations with the FD5 data set intended to provide kinetics data for use with the whole-core accident analysis core FRAX in support of this work. The calculations performed are specified to obtain a model with a realistic representation of the current PFR working core and possible future core loadings, followed by the route adopted to derive the irradiated fuel compositions.	Calculation of PFR to provide further information associated with Core Physics Calculations
17322	A COMPARISON OF FD5 AND FGL5 SET EVALUATION OF THE AGT3 DOPPLER BENCHMARK USING MARC/PN		1990	PPWG/P(90)231;FRCMSG/P(90)328					
17417	REVIEW OF PHYSOR 90 INTERNATIONAL CONFERENCE ON THE PHYSICS OF REACTORS OPERATION DESIGN AND COMPUTATION	GULLIFORD	1990	PPWG/P(90)232					
17419	PERFORMANCE TESTING OF THE REPLACEMENT LOW POWER FISSION CHAMBERS IN PFR	SUTHERLAND AJ	1990	PFR EXP.RESULTS SHEET 195		PFR			
17453	REACTOR PHYSICS MEASUREMENTS DURING RUN 8 OF PFR	CROWE DS;DICKINSON AK;SUTHERLAND AJ	1986	ND-M-3280		PFR			
17463	A NOTE ON THE EFFECTS OF MISMATCHED HEAD AMPLIFIER INPUTS ON THE APPARENT WIDTH AND AMPLITUDE OF A NEUTRON DETECTOR PULSE	BARDSLEY DJ	1984	AEEW-M 2083					
17517	THE EFFECT OF VARIOUS MATERIAL CHANGES ON BREEDING GAIN,REACTIVITY,SODIUM VOID AND DOPPLER CONSTANT	SUNDERLAND RE	1976	FRDC/PPWP/P(76)121;TM/P&S/R788					
17564	TRAFFIC CALCULATIONS ON TWO EFR FUEL PIN DESIGNS USING PE16 CLADDING AND 15/15Ti CLADDING	COLE GC	1990	FDN 90/1662;CFWG/FPWG/P(90)37					
17668	NNC CONTRACT C71 FAST REACTOR DESIGN PROGRAMME SCHEDULE FOR CORE PHYSICS SAFETY AND PLANT PERFORMANCE	FROGGATT K;BENNETT JM;WALKER D	1991						
17749	INVESTIGATION OF THE AZIMUTHAL VARIATION OF NEUTRON FLUX IN THE EFR RADIAL SHIELD	WILLIAMS P;BAINBRIDGE N	1990	90/112					
17898	THE EFFECT OF SUB ASSEMBLY HETEROGENEITY CORE BURN-UP AND FD5/FGL5 CROSS SECTION DATASETS ON THE PFR DOPPLER COEFFICIENT	NEWTON TD;DISBURY WH	1990	PPWG/P(90)235;PFR/TC/P(90)436		PFR			
17903	SUMMARY REPORT OF PLANT PERFORMANCE STUDIES NOVEMBER 1988 MARCH 1990 REACTOR PHYSICS SECTION - DOUNREAY	NEWTON TD	1990	FRDCC/PPWG/P(90)234					
17950	REVIEW OF UK DESIGNS OF LARGE FAST REACTORS WITH LOW SODIUM VOID EFFECTS	BURSTALL RF	1990	PPWG/P(90)224	UKAEA		Positive Void Reactivity	This report is a key reference associated with Sodium Void. Extensive investigations have been made into reducing the positive void reactivity whilst retaining the well developed mixed oxide liquid sodium cooled fuel concept. This report surveys this work and considers the relative merits of conventional and low void cores from the points of view of safety, performance and economics.	Data analysis for large fast reactor designs with low sodium void effects
17953	AEA METHODS FOR CALCULATING THE DOPPLER EFFECT AND AN ASSESSMENT OF THE ASSOCIATED ERRORS	FLETCHER JK;ROWLANDSJL;SOWERBY M	1990	PPWG/P(90)228					
17960	EVIDENCE FOR A DISCREPANCY IN DOSE/BURN-UP RATIOS CALCULATED FOR PHENIX AND PFR	ADAMSON J	1989	FRDCC/PPWG/P(89)200		PFR			
18069	INTERCOMPARISON OF DOPPLER CONSTANT CALCULATIONS FOR A 2 DIMENSIONAL BENCHMARK	BURSTALL RF	1991	PPWG/P(91)239					
18080	EVALUATE THE REACTIVITY WORTH OF REMOVING TWO CONTROL RODS	HENDERSON JDC	1989	PFR/SWP/P(89)27					
18263	FUTURE USE OF THE EUROPEAN EXPERIMENTAL FACILITIES IN THE FIELD OF REACTOR PHYSICS		-	SC 11-7A					
18264	ASSESSMENT OF THE EXPERIMENTAL FACILITIES NEEDS FOR THE FAST FUEL ELEMENTS IN EUROPE		-	SC 11-7B					
18555	REACTIVITY FAST FEEDBACK MEASUREMENT ON PFR FEBRUARY 1991	CROWE DS	1991	206/PEI;PFR EXP RESULTS SHEET 197 ASMD TECH NOTE 1856	AEA Technology	PFR	Feedback, Control Rod, Reactivity, Control Rod	This report is a key reference associated with Fast component of feedback. The results reported in this document are from a measurement made of the fast feedback in PFR by dropping a partially inserted control rod (reactivity insertion of ~-12 cents) into the core at a reactor power of 590 MW (Thermal).	OPEX Data for fast feedback in PFR
18675	THE ESTIMATED LEVEL OF REACTIVITY INSERTION IN THE SNR2 REACTOR DESIGN FOLLOWING A FUEL/COOLANT INTERACTION	PALENTINE JE;DUTHIE JC	1991	AEA-FR-0029;SAD/D(91)1					
18729	NOTES FROM A SEMINAR ON THE FUEL PIN TRANSIENT TEST PROGRAMME IN THE HIGH FLUX REACTOR (HFR) AT PETTEN - 12-13 MARCH1991	CRITTENDEN GC;LINEKAR GAB,THETFORD R;	1991	FMPM/P(91)13;FPSG/P(91)20;PE4/453;					
18766	INFLUENCES OF BLANKET SIZE AND BURNUP ON BREEDING GAIN AND FUEL CYCLE COSTS FOR EFR CD9/90	HEINECKE J/HOLZ D	1991	54.08085;PE1/531;					
18875	NNC CONTRACT C71: FAST REACTOR DESIGN PROGRAMME SCHEDULE FOR CORE PHYSICS SAFETY AND PLANT PERFORMANCE	FROGGATT K	1990						
18953	PHYSICS EXPERIMENTS TO INCREASE UNDERSTANDING OF PFR REACTIVITY FEEDBACK MECHANICS	LORD DJ;WILKES DJ	1988	DPC/P(88)12;PFR/SWP/P(88)23;FRDCC/P(88)285		PFR			
19023	THE THERMAL CONDUCTIVITY OF BORON CARBIDE EXPOSED TO FAST REACTOR NEUTRON IRRADIATION	PRESTON SD;HODGETTS NSP;BILSBY CF;KELLY BT	1991	AEA TRS 5085;CFWG/FPSG/P(91)15;PE4/471	AEA Technology	DFR, PFR	Thermal Diffusivity, thermal conductivity	This report is a key reference associated with Control Rods. Measurements have been made of the thermal diffusivity of hot pressed boron carbide pellets at temperatures between 20°C and 2000°C after exposure in the DFR and PFR. The thermal conductivity has been derived using the density and specific heat of the samples.	Measured values of Thermal conductivity of boron carbide after fast neutron irradiation for DFR and PFR.
19133	CORE SHIELDING DESIGN CALCULATIONS FOR THE EFR CD 9/90 WITH THE PROGRAM DLS	QUADE	1991	EFR/C106/3/384A;PE1/1139;70.04897.7;1649-1207-01;					
19150	DESIGN SUBSTANTIATION REPORT SHIELDING INTEGRITY OF THE PRIMARY COLD TRAP LOOP BASKET STORAGE FACILITY AT THE DOUNREAY NUCLEAR POWER DEVELOPMENT ESTABLISHMENT	HAYES P	1991	C8406/DSR/001;TSS 91/139;91/10552/FRD;					
19740	RESPONSE OF A TYPE 0181 FUEL PIN TO A DOLLAR REACTIVITY SREP	DICKSON AK	1990	PFR/SWP/ESC/P(89)34					

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19943	THE MEASUREMENT OF FAST ACTING REACTIVITY FEEDBACK IN PFR AND A COMPARISON OF MEASURED VALUES WITH THOSE PREDICTED FROM A MODEL USED FOR SAFETY CASE STUDIES OF PFR	NEWTON TD	1991	PE1/1808;PFR/TC/P(91)482	AEA Technology	PFR	Feedback, Reactivity	This report is a key reference associated with the fast component of Feedback. This short note presents the state of the art for the measurement of fast acting reactivity feedback in PFR and highlights some problems with the measurements/interpretations of the results. The results obtained are compared to predicted values from a model of PFR used for safety studies on PFR Kinetic performance in accident scenarios.	OPEX data and calculated data for fast acting reactivity feedback.
19997	THE PFR IRRADIATED BUFFER STORE CRITICALITY CLEARANCE (1991 REVISION)	JAMES PR	1991	PE1/1943;PFR/SWP/P(91)25		PFR			
20039	PRELIMINARY STUDY OF FISSION PRODUCT BEHAVIOUR DURING SCARABEE TEST BT1	MIGNANELLI MA	1991	PE1/2020;AEA-TRS-2057					
20087	THE MECHANICAL INTERACTIONS BETWEEN SUB ASSEMBLIES AS A POSSIBLE MEANS OF STORING ENERGY AND LEADING TO REACTIVITY TRANSIENTS IN PHENIX	WHEELER RC;WASHBY V;DUTHIE JC	1991	PE1/2049;FRSWG/P(91)27					
20117	THE POSITIVE VOID COEFFICIENT IN THE FAST BREEDER REACTOR	BROADLEY D	1987	RPSC/P(87)39	Not Stated		Positive Void Coefficient	This report is a key reference associated with Sodium Void. This report define the positive void coefficient with the FBR. This is compared with alternate reactor designs, and is assessed at different operating scenarios (normal operation or accident conditions).	Data analysis for positive void coefficient within FBR
20152	A REVIEW OF NEUTRON FLUX INSTRUMENTATION DEVELOPMENT RELEVANT TO THE FAST REACTOR PROGRAMME (DECEMBER 1984)	GOODINGS A;BARTON RG	1984	FRDCC/SISG/P(84)5					
20191	THE PHYSICS OF ADVANCED LMFBR CORE DESIGN	BERGEONNEAU P;FLETCHER K;KIEFHABER E;STOJADINOVIC A;WEHMANN U	1991	PPWG/P(91)249;PE1/2152					
20296	CALCULATION OF CORE PHYSICS PARAMETERS FOR AN EFR VARIANT DESIGN WITH 3 FUEL ZONES AND AN INTERNAL AXIAL BREEDER	ROBINSON PJ;TAYLOR JA;	1991	PPWG/P(91)245;PE1/2261;					
20299	UNCERTAINTIES IN CORE PHYSICS DESIGN PARAMETERS FOR AN LMFBR AND THEIR REDUCTION. THE ROLE OF SUPER-PHENIX AND PFR EXPERIENCE	NEWTON TD;	1991	PE1/2260;PPWG/P(91)250;		PFR			
20315	CALCULATION OF CORE PHYSICS PARAMETERS FOR AN EFR VARIANT DESIGN WITH 3 FUEL ZONE AND AN INTERNAL AXIAL BREEDER	ROBINSON PJ;TAYLOR JA	1991	PE1/2261;PPWG/P(91)245					
20343	DCSR SHUTDOWN REACTIVITY MONITORING	WHEELER RC;	1984	FRSWG/SISG/P(84)6;					
20388	A REVIEW OF NEUTRON FLUX INSTRUMENTATION DEVELOPMENT RELEVANT TO THE FAST REACTOR PROGRAMME (SEPTEMBER 1986)	GOODINGS A;BARTON RG;	1986	FRDCC/PPWG/P(86)89;FRSWG/SISG/P(86)35;					
20390	A COMPARISON OF TECHNIQUES FOR ESTIMATING FISSION COUNTER PULSE CHARGE MAGNITUDES	BARDSLEY DJ;	1985	AEEW-M 2227;					
20449	DCR SHUTDOWN REACTIVITY MONITORING	WHEELER RC	1984	FRSWG/SISG/P(84)6					
20450	A REVIEW OF NEUTRON FLUX INSTRUMENTATION DEVELOPMENT RELEVANT TO THE FAST REACTOR PROGRAMME (DECEMBER 19840	GOODINGS A;BARTON RG	1984	FRSWG/SISG/P(84)5					
20544	SUB CRITICAL MONITORING FOR RELOAD 24 OF PFR	CROWE DS	1991	PE1/2407;PFR/ER/202	AEA Technology	PFR	Subcritical Reactivity, fuel changes	This report is a key reference associated with Subcritical Reactivity Measurements. This report is part of a continued series comparing the measured and calculated results of subcritical monitoring during fuel changes in PFR. This notes presents the changes made during Reload 24	OPEX Data and calculated data associated with Subcritical Reactivity Measurements
20629	A STUDY OF PROTECTION METHODS FOR SGHWR NEUTRON SHIELD TANKS DURING DECOMMISSIONING AEA TECHNOLOGY SPECIFICATION NO. 4S910032 NNC CONTRACT NO C8480	DEAN MJ;TAYLOR MF;	1991	R&D/91/147;					
20706	DESIGN SUPPORT REPORT BETA GAMMA RETRIEVABLE WASTE DRUM STORE OPEN STORE CONCEPTS AND COMPARISON TO CLOSED STORE	WHITBYU CR	1981	BGSWSWP/P(81)8;BNFL/C6830/DSR/7					
20707	DESIGN SUPPORT REPORT FOR CRANE RETRIEVAL BY WIRE ROPE AND CABLE LIMITATIONS AND CRANE TRACTIVE EFFORT BETA GAMMA RETRIEVABLE WASTE DRUM STORE		-	BNFL/C6830/DSR/9					
20708	DESIGN CONCEPT DOCUMENT FOR DRUM HANDLING MACHINE BETA GAMMA STORE	HARRISON J	1982	BGSWSWP/P(81)12;BNFL/WINDSCALE/C6830/DCD/2					
20709	SYSTEM DESIGN SPECIFICATION FOR DRUM HANDLING MACHINE BETA GAMMA STORE	HARRISON J	1981	BNFL/WINDSCALE/C6830/SDS/1;BGSWSWP/P(81)14					
20710	DESIGN CONCEPT DOCUMENT FOR PROPOSED BUILDING LAYOUT DESIGN BETA GAMMA STORE	HARRISON J	1982	BGSWSWP/P(81)15;BNFL/WINDSCALE/C6830/DCD/3					
20711	DESIGN SUPPORT REPORT FOR BETA GAMMA RETRIEVABLE WASTE DRUM STORE CAPACITY WITH ALTERNATIVE STACKING ARRANGEMENTS	WHITBY CR	1981	BGSWSWP/P(81)16;BNFL/C6830/DSR/8					
20712	DESIGN SUPPORT REPORT FOR BETA GAMMA RETRIEVABLE WASTE DRUM STORAGE OPERATING TIME ANALYSIS	HARRISON LMT	1981	BGSWSWP/P(80)17;BNFL/C6830/DSR/2					
20947	UK REQUIREMENTS FOR ERANOS DEVELOPMENT	ROBINSON PJ;MCCALLIEN CW	1992	PE1/2903;PPWG/P(91)252;FRCMSG/P(92)338					
20976	AN EXPERIMENTAL EVALUATION OF THE LIMITS OF APPLICABILITY OF THE CLOCK BUSH THERMOCOUPLE FLUX METERING METHOD	LOVEGROVE PC;QUARINI GL;STEELE A	1980	157/0/2D;AERE-G1835;HTFS/PFW208/1980					
21086	SURVEY OF SOME WAYS OF REDUCING THE POSITION SODIUM VOID COEFFICIENT IN CFR	BRINDLEY KW	1975	FRDC/PPWP/P(75)40					
21087	CALCULATIONS OF THE SODIUM VOID COEFFICIENT FOR A VARIETY OF CORE DESIGN FOR CFR	JONES DM	1975	FRDC/PPWP/P(75)76;TM/STM/711	NPC	CFR	Sodium void coefficient, sodium fractions, fuel densities, reduced height core, sandwich core, variable height core	This report is a key reference associated with Sodium Void. The sodium void coefficient has been calculated for various sodium fractions and fuel densities, and for a number of reduced height cores, sandwich cores and variable height cores. Due to simplifications made to the calculational method, the results are intended to be used only as a basis for a more detailed study.	Calculations associated with the Sodium Void Coefficient for a number of core designs for CFR
21089	SODIUM VOIDING AND DOPPLER CALCULATIONS FOR 1250MW(E) 613MW(E) AND 300MW(E) CORES USING ADVANCED OXIDE FUEL DESIGNS	JONES DM;SUNDERLAND RE	1977	FRDC/PPWP/P(77)139;TN/P&S(R)791	NPC		Sodium Void, Doppler Reactivity Worths,	This report is a key reference associated with Sodium Void. Sodium Void and Doppler reactivity worths have been calculated for 1250 MW cores based on the core 8 reference fuel design, and on two advanced oxide fuel designs. Similar calculations have also been made for 613 MW cores and 300 MW cores	Calculations associated with the Sodium Voiding and Doppler Reactivity Worths
21101	A PRELIMINARY COMPARISON OF VOID REACTIVITY EFFECTS FOR OXIDE AND CARBIDE CORES	BARRON WC;MANN JE	1976	FRDC/CFRSWP/P(76)7	Not Stated		Voiding reactivity, oxide core, carbide core	This report is a key reference associated with Sodium Void. This paper reports the results of some simple calculations carried out to investigate the difference in voiding behaviour between otherwise similar oxide and carbide models.	Calculations associated with the difference in voiding behaviour

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21103	A COMMENT ON THE SODIUM VOID COEFFICIENT MEASUREMENTS IN BN350	ETHERINGTON EW	1976	CFR/SWP/P(76)24	DERE		Sodium Void Coefficient, BN350	This report is a key reference associated with Sodium Void. One of the arguments for making sodium void coefficient measurements in PFR is that there may be some unexpected differences between the effects in zero power critical assemblies, where all previous UK measurements have been made and in a power reactor. This report presents a comparison of the calculated and experimental results for BN350 with equivalent results for a zero power reactor. The same methods have been used and the data might indicate whether any significant effects that were not accounted for in the calculations were found in the power reactor.	Comparisons of Calculated and Experimental Data associated with the Sodium Void Coefficient
21107	A PRELIMINARY INVESTIGATION OF CORE DESIGNS WITH REDUCED SODIUM VOID REACTIVITY COEFFICIENTS	BARRON WC;LESLIE R;PREKS MA	-	BIZET/TN/UK3					
21108	THE EFFECT OF ENRICHMENT AND MODERATING MATERIALS ON THE SODIUM LOSS AND DOPPLER COEFFICIENTS OF FAST REACTORS	MACDONALD RJJC	-	AEEW M 657					
21118	SPX2 UNCONTROLLED CONTROL ROD WITHDRAWAL DETECTION BY U235 FISSION CHAMBERS LOCATED IN THE CORE COVER PLUG	BOUFFIOUX	1986	NOVA X 002 420 000					
21137	PRELIMINARY CALCULATIONS OF THE SODIUM VOID AND DOPPLER EFFECT FOR A PFR SIZE CORE	BUTLAND ATD;ROWLANDS JL;	-	RPD/ATDB/142;	Not Stated	PFR	Sodium void, Doppler Effects	This report is a key reference associated with Sodium Void. This paper describes calculations of the sodium void and Doppler effects in a core of PFR Size. The calculations were performed as part of a wider study to make a preliminary assessment of the characteristics of commercial power stations consisting of a number of cores of PFR size rather than a single larger core with the same power output.	Calculations of the sodium void and Doppler effects in a core of PFR Size.
21318	PFR SAFETY REPORT OSCILLATOR MECHANISM	TAIT D	1974	PFR/SWP/P(74)47	NPG	PFR	Oscillator mechanism, safety	This report is a key reference associated with the Oscillator. This report presents information on the principal design requirements for the oscillator mechanism, mechanism details, manufacturing specifications, mechanism testing and development, the operational procedure, thermal expansion, potential operation failures, mechanical failures, mechanism repair, the oscillator rod and information upon the fire risk and containment.	Report provides key information regarding upon the Oscillator design requirements for the PFR.
21610	EXAMINATION OF PFR CENTRE PHYSICS THIMBLE AND SSD SHROUD TUBE FOR THERMAL SHOCK AND THERMAL STRIPING DAMAGE	DURSTON JG	1978	PFR/SWP/P(78)57;FRD/TN/P(78)271;PFR/ACSCM/P(78)47		PFR			
21861	TENTATIVE PROPOSALS FOR COMMON SAFETY CRITERIA AND GUIDE-LINES REFERRING TO PRIMARY REACTIVITY ACCIDENTS	BALZ W;DEPREZ G;SIEBERTZ A	1977	CCGS(77)D131					
21865	PRELIMINARY SAFETY CRITERIA AND GUIDE LINES REFERRING TO PRIMARY REACTIVITY ACCIDENTS		1978	CCGS(78)D149					
22006	A CRITICALITY CRITERION FOR FACILITIES ON PFR DIVISION	MACGREGOR BR	1986	PFR/SWP/P(86)16;OETD/TN/1320		PFR			
22030	PFR REACTIVITY AND POWER COEFFICIENTS, THE USEFULNESS OF LARGE SCALE EXPERIMENTS, AND PROCEDURES FOR CARRYING OUT PLANT EXPERIMENTS	GREGORY CV	1986	PFR/SWP/P(86)43	Not Stated	PFR	Reactivity, power coefficients, safety, procedures	This report is a key reference associated with the Reactivity and Thermal Coefficients. The report analyses the usefulness of large scale experiments following analysis of the Chernobyl incident and the actions prior to the event. The report describes the procedure and protection against such an occurrence at PFR	Key information associated with procedures for carrying out plant experiments
22033	THE PFR IRRADIATED FUEL CAVE CRITICALITY CLEARANCE	MACGREGOR BR	1986	PFR/SWP/P(86)46		PFR			
22060	PFR CRITICALITY CLEARANCE CERTIFICATION OF ACCEPTANCE OF FUEL ITEMS	HENDERSON JDC	1987	PFR/SWP/P(87)2		PFR			
22349	PRIMARY REACTIVITY ACCIDENTS FAULT TREES		1972	CCGS(72)D16					
22387	SNR 300 1 PRIMARY REACTIVITY ACCIDENTS 2 SUBASSEMBLY COOLING ACCIDENTS	SCHONSIEGEL;	1973	CCGS(73)-D33;					
22408	PHYSICS EXPERIMENTS TO INCREASE UNDERSTANDING OF PFR REACTIVITY FEEDBACK MECHANISMS	LORD DJ;WILKES DJ	1988	FRDCC/P(88)285;PFR/SWP/P(88)23;DPC/P(88)12	Not Stated	PFR	Reactivity Feedback	This report is a key reference associated with the Fast Component of Feedback. This paper makes proposal for an experimental program aimed at studying the key parameters of reactivity feedback.	Experimental Data for Reactivity Feedback
22434	EVALUATE THE REACTIVITY WORTH OF REMOVING TWO CONTROL RODS	HENDERSON JDC	1989	PFR/SWP/P(89)27					
22440	AN EXPERIMENTAL EVALUATION OF THE REACTIVITY ADDITION DUE TO WITHDRAWING 2 ABSORBER RODS FROM PFR WHEN IN ITS FULLY SHUTDOWN CONFIGURATION	CROWE DS	1990	PFR/SWP/P(89)34		PFR			
22465	A RE-ASSESSMENT OF SOME PFR CRITICALITY CLEARANCE	JAMES PR	1990	PFR/SWP/P(90)15		PFR			
22484	REVISION OF CRITICALITY CLEARANCE FOR THE PFR NEW FUEL CELL REACTOR HALL AND IRRADIATED FUEL CAVE	JAMES PR	1990	PFR/SWP/890)32		PFR			
	SUMMARY REPORT OF PLANT PERFORMANCE STUDIES MARCH 1990 - APRIL 1991 REACTOR PHYSICS SECTION - DOUNREAY	NEWTON TD;	1992	PE1/3992;FRDCC/PPWG/P(92)257;					
	PFR IFBS SEALED SOURCE STORE CRITICALITY CLEARANCE	JAMES PR	1992	RS/SWP/P(92)8;PE1/4125		PFR			
	SUMMARY REPORT OF PLANT PERFORMANCE STUDIES MAY 1991 - MARCH 1992 REACTOR PHYSICS SECTION DOUNREAY	NEWTON TD	1992	PE1/4263;FRDCC/PPWG/P(92)258					
	DEVELOPMENT OF THE DELAYED NEUTRON MONITORS FOR BURST CARTRIDGE DETECTION IN PFR	CARTWRIGHT DK	-	TRG-R-2503		PFR			
	THE EFFECT OF FAST NEUTRON IRRADIATION ON SGHWR TYPE WEAR PAD JOINTS BRAZED WITH ZIRCONIUM BERYLLIUM ALLOY(EXAMINATION OF IRRADIATION EXPERIMENT 343 FROM DFR)	GARLICK A;WOLFENDEN PD;HINDMARCH P;MCKEE G	-	TRG R 2056		DFR			
	THE RELEASE OF FISSION PRODUCTS AND FUEL DURING A FUEL HANDLING ACCIDENT IN CDFR	MIGNANELLI A;POTTER PE	1987	AERE R 12518		DFR			
23076	AN ASSESSMENT OF THE BEHAVIOUR OF FISSION PRODUCTS AND FUEL DURING A HYPOTHETICAL CORE DISRUPTIVE ACCIDENT (HCDA) IN CDFR	HARDING JH;MIGNANELLI MA;POTTER PE	1985	AERE-R-11855		DFR			
23084	A POSSIBLE REACTIVITY ACCIDENT INDUCED BY VAPOUR GENERATION	JONES AV	1974	CFR/SWP/FREYWG/P(74)79					
23095	ON THE BEHAVIOUR OF DISSOLVED FISSION GASES PRIOR TO TRANSIENT TESTING OF FUEL PINS	WOOD MH;MATTHEWS JR	-	AERE-M-2992					
23394	DESIGN STUDIES ON LMFBR CORES WITH REDUCED SODIUM VOID EFFECT AND MINOR ACTINIDE BURNING	WEHMANN	1992	PE1/5514;KWU BT7/92/0030					
23439	NNC REVIEW OF THE DELAYED NEUTRON DETECTOR SENSITIVITY STUDY FOR THE SV-FFDL CONCEPT REVIEW FOR DFBR-1 (ACTIVITY 2.3 AND 2.4)	SWAGE J;	1992						
23442	EXAMPLES OF THE DEVELOPMENT OF PFR CLAD FAILURES AT LOW, MEDIUM AND HIGH BURNUP (ACTIVITY 3.2) PLUS ADDENDUM 1	LENNOX TA;	1992			PFR			
23647	RUSSIAN FAST REACTOR DESIGNS WITH SODIUM VOID REACTIVITIES CLOSE TO ZERO	HENSHALL GJ;	1992	PE1/6259;PPWG/P(92)262;					
23648	REVIEW OF POSSIBLE DESIGN MODIFICATIONS TO REDUCE THE SODIUM VOICE REACTIVITY EFFECT	BURSTALL RF;	1992	PPWG/P(92)263;PE1/6258;					

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23662	A COMPARISON OF THE PREDICTED PERFORMANCE OF THE PFR DELAYED AND FISSION GAS LOCATION SYSTEMS	CARTWRIGHT DK;DIGGLE WR	-	TRG-M-6934		PFR			
23697	ASYMMETRIC REACTIVITY FAULT ANALYSIS OF THE EFR CD9/90 AND CD9/91 CORES	BASHIR S	1992	TSS/92/169					
23843	REVISED CRITICALITY CLEARANCES FOR MACHINING CELL AND EXPERIMENTAL CELL,D2001	TAIT D;	1992	PE1/6787;RS/SWP/P(92)28					
24074	CALCULATION TO ESTIMATE THE EARTHQUAKE-INDUCED REACTIVITY CHANGES IN A RESTRAINED CORE FAST REACTOR	DUTHIE JC	1982	SL-CON-45					
24109	THE INTERPRETATION OF DELAYED NEUTRON SIGNALS FROM CLAD FAILURES IN THE PROTOTYPE FAST REACTOR	LENNOX TA	1987	ND-M-3325					
24112	SOME COMMENTS ON THE DETECTION OF LOCAL BLOCKAGES IN FAST REACTOR SUB-ASSEMBLIES BY DELAYED NEUTRON MONITORING	LENNOX TA	1989	FRSWG/SISG/P(89)2;DNE-M-40					
24224	CORE DESIGN STUDY AND DYNAMIC BEHAVIOUR EVALUATION FOR 100 MWE HETEROGENEOUS REACTORS PART1, COMPARISON OF CORE PERFORMANCE CHARACTERISTICS OF HETEROGENEOUS REACTORS - PART2,SENSITIVITY OF POWER SHAPE CHANGE WITH FUEL BURNUP AND CONTROL ROD OPERATION - PA	OTAKE I	-						
24225	SODIUM VOID REACTIVITY EFFECT IN FAST NEUTRON CRITICAL FACILITIES UNCERTAINTIES DUE TO THE TRANSPOSITION TO POWER REACTORS	LYON F;MARTINI M;RIMPAULT G	1981						
24468	SUBCRITICAL REACTIVITY MONITORING ON PFR A STATUS REPORT AND REVIEW (FEB 88)	LORD DJ;CROWE DS	1988	FRCMWG/P(88)311		PFR			
24490	REACTOR PHYSICS MEASUREMENTS DURING RUN 7 OF PFR	CROWE DS;SUTHERLAND AJ	1984	ND-M-2704		PFR			
24491	THE REACTIVITY HISTORY OF PFR DURING PERIOD 1975 TO 1984 (RUNS 0 TO 8 INCLUSIVE)	LORD DJ	1985	ND-M-2913	UKAEA	PFR	Reactor Physics, reactivity loss, radioactive decay	This report is a key reference associated with Reactor Physics Summaries. This report summarises the reactivity history of the PFR during the 10 year period it had been operating. The report covers both reactivity loss with fuel build-up and radioactive decay during a particular reactor run and also the effect of fuel reloads. It is shown that the 3D reactor-following calculations carried out in support of PFR are capable of predicting the reactivity history of the reactor. It is also shown that no unsuspected mechanism exists for storage of reactivity which might return at a later date.	OPEX summarising the reactivity history during the 10 years PFRr had been operating.
24493	MEASUREMENT OF THE DOPPLER EFFECT ON PFR	CROWE DS;LORD DJ;SUTHERLAND AJ	1988	PFR/EXPERIMENTAL RESULTS SHEET/172		PFR			
24655	COMPARISON OF PFR NEUTRON ABSORBER PIN EXPERIMENT 13/08/04, WITH COMPUTER MODEL BORCON (V5B)	KELLY BT	1989	NRL-M-2162;CFWG/FPSG/P(89)24		PFR			
24679	RNR 1500 CORE PHYSICS VOLUME 11C PART 11	ELEC DE FRANCE	-						
24862	AN INVESTIGATION INTO FISSION GAS ABSORPTION ON ACTIVATED CHARCOAL FOR CDFR COVER GAS CLEAN UP PART 2 XENON ADSORPTION DATA	BEARE SP;ROBINSON BK	1980	FRDC/CEWP/P(80)276;AEEW M 1797		DFR			
24929	A REVIEW OF CFR NEUTRON FLUX INSTRUMENTATION DEVELOPMENT AT WINFRITH (JULY 1980)	WILSON I;GOODINGS A	1980	FRDC/PPWP/P(80)291;CFR/CNIWG/P(80)5					
24930	SUBCRITICAL REACTIVITY MONITORING	COX RJ;HARRIS DWG	1980	PPWP/P(80)292					
24942	THE PFR REACTIVITY DISCREPANCY AFTER RELOAD 5	LORSD DJ	1981	FRDC/PPWP/P(81)329		PFR			
24949	A REVIEW OF CFR NEUTRON FLUX INSTRUMENTATION DEVELOPMENT AT WINFRITH JULY 1981	WILSON I;GOODINGS A	1981	FRDC/PPWP/P(81)319;CFR/CNIWG/P(8104					
24954	AN ASSESSMENT OF THE REACTIVITY EFFECTS OF MFCI EVENTS ON THE CORE BREEDER INTERFACE OF CDFR	PERKS MA	1981	FRDC/PPWP/P(81)314		DFR			
24978	QUALITY ASSURANCE PROCEDURES FOR THE RADIATION PHYSICS DEVELOPMENT PROGRAMME STAGE 2 IMPLEMENTATION OF THE REFERENCE SET OF CODES AND ARCHIVING PART 2 DETAILED SPECIFICATION OF THE REFERENCE SET DESIGN	RICKERS TM;CLARK IG;CONIBEAR G	1982	FRDC/PPWP/P(82)341;ARPWG/P(81)30					
24986	A REVIEW OF NEUTRON FLUX INSTRUMENTATION DEVELOPMENT FORM CDFR (JULY 1982)	WILSON I;GOODINGS A	1982	FRDC/PPWP/P(82)354;CFR/CNIWG/P(82)2		DFR			
24990	A NOTE ON THE EXTENSION OF THE FUEL BURN-UP EQUATIONS USED IN POUTINE REACTOR PHYSICS CALCULATIONS FOR PFR	NEWTON TD	1981	FRDC/PPWP/P(82)358;ND-M-1721		PFR			
25152	THE EFFECT ON SHIELDING O CHANGES INTHE COMPOSITION OF THE MIXER BREEDER REGION IN THE PFR	AVERY AF	1979	FREDS/WG/P(79)8;RPD/AFA/404		PFR			
25158	235U FISSION PRODUCT GAMMA SPECTRA A COMPARISON BETWEEN EXPERIMENT AND CALCULATION	TOBIAS A	1979	FREDS/WG/P(79)15;CNDC/P(79)7;RD/B/N4667					
25160	FAST REACTOR ENERGY DEPOSITION AND SHIELDING REVIEW WORK PACKAGE 383E	BUTLER J	1979	FREDS/WG/P(79)17FRDC/PPWP/P(79)266					
25163	THE APPLICATION OF DIFFUSION THEORY TO DEEP PENETRATION SHIELDING CALCULATIONS (METHOD D)	CHUCAS SJ;SHUTTLEWORTH E	1982	FREDS/WG/P(82)1					
25166	FUNCTIONAL SPECIFICATION OF SNAPS THE SHIELDING VERSION OF THE SNAP 3D CODE	GUYLER IA;MCCALLIENT CWJ;MILLER PC;WYATT M	1981	FREDS/WG/P(82)4;ARPWGP(81)8					
25167	NUCLEAR ENERGY AGENCY COMMITTEE ON REACTOR PHYSICS SHIELDING BENCHMARK EXERCISES INFORMATION SHEET	BUTLER J	1982	FREDS/WG/P(82)5					
25168	RECOMMENDED NUCLEAR DATA FOR SHIELDING AND ENERGY DEPOSITION CALCULATIONS	MILLER PC	1982	FREDS/WG/P(82)6					
25186	STATUS REPORT (1978) OF CDFR NEUTRON FLUX INSTRUMENTATION DEVELOPMENT AT WINFRITH	WILSON I;GOODINGS A	1978	CFR/CNIWG/P(78)5;FRDC/PPWP/P(78)213		DFR			
25187	STATUS REPORT ON CFR NEUTRON FLUX INSTRUMENTATION DEVELOPMENT AT AEE WINFRITH (JULY 1977)	WILSON I;GOODINGS A	1977	CFR/CNIWG/P(77)5;FRDC/PPWP/P(77)167;CFRSWP/P(77)12					
25188	A REVIEW OF CFR NEUTRON FLUX INSTRUMENTATION DEVELOPMENT AT WINFRITH	WILSON I;GOODINGS A	1976	CFR/CNIWG/P(76)5;FRDC/PPWP/P(76)110					
25199	ESTIMATES OF THE POSSIBLE RANGES OF NEUTRON FLUX INSTRUMENTATION ON CFR1 12/6/75	GOODINGS A	1975	CFR/CNIWG/P(75)10;FREDSWG/P(75)6;FRDC/PPWP/P(75)65					
25200	STATUS REPORT ON CFR RADIAL NEUTRON SHIELD AND NUCLEONIC INSTRUMENTATION	BRINDLEY KW;PHILLIPS AW	1976	CFR/CNIWG/P(76)11;FREDSWG/P(76)17;FRDC/PPWP/P(76)133					
25201	METHODS OF MEASURING THE NEUTRON FLUX IN CFR 1	ROBINSON C	1975	FRDC/PPWP/P(75);CFR/CNIWG/P(75)66;FREDSWG/P(75)7					
25208	STATUS REPORT (1978) ON CFR NEUTRON FLUX INSTRUMENTATION DEVELOPMENT AT WINFRITH	WILSON I;GOODINGS A	1979	CFR/CNIWG/P(79)1;FRDC/PPWP/P(79)254					
25211	THE POSSIBILITY OF DETECTION OF A SINGLE SUB ASSEMBLY INCIDENT IN A CFR CORE BY MEASUREMENT OF POWER DEVIATION OR OF ANOMALOUS REACTIVITY CHANGES	MACDONALD DR	1979	CFR/CNIWG/P(79)4;TN/P(79)319;					
25228	COMPARISON OF FLOOR RESPONSE SPECTRA PRODUCED NY NNC INPUT SPECTRA 0,25G AND USNRC INPUT SPECTRA 0,2G	TROOP;GRAUBNER	1991	KWU-V422/91/E051					
25258	COMPARATIVE FLUX DISTRIBUTION AT START UP AND FULL POWER (CDWG ACTION 11.2)	FARRIER DR	1977	CFR/CDWG/P(77)43					

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25406	ASTRA CORES FOR EFFECTIVE ACTINIDE AND FISSION PRODUCT TRANSMUTATION AND WITH FAVOURABLE SAFETY ATTRIBUTES	WEBER G	1993	KWU BT71/93/0006;PE4/7606					
25553	A CONTRIBUTION TO NSSSR CHAPTER 4.2 REACTIVITY FAULTS	EVERY DP	1993						
25677	COMPARED RESULTS OF NEUTRON PHYSICS CALCULATIONS FOR EFR FIRST CONSISTENT DESIGN AND VARIANT 1 (AX-HET) WITH 1.4M FISSILE HEIGHT	WEHMANN U;WOUTERS DE R	1988	329.11/65/N/8218					
25736	PHYSICAL AND MECHANICAL PROPERTIES OF NEUTRON ABSORBER MATERIALS FOR PFR EXPERIMENTS 13/07/08 AND 13/09	MOTTERHEAD D	1982	FRDC/MWP/P(82)1142;FRASG/P(82)192;ND-M-1830		PFR			
25807	FAST REACTOR SYSTEMS DATA AND CONVENTIONS MANUAL MATERIALS DATA FOR NEUTRON ABSORBERS	KELLY BT	1976	TRG-R-4000/5;FRDC/MWP/P(76)244;FRASG/P(76)44					
25904	NOTES BASED ON A PAPER BY DE MAHAGIN APRIL 1979 HEDL-SA-1690-FP CALLED FAST REACTOR NEUTRON ABSORBER MATERIALS	GILCHRIST KE	1981	FRDC/MWP/P(81)1138;FRASG/P(81)188					
25915	THE IRRADIATION IN DFR OF BORON CARBIDE NEUTRON ABSORBER PELLETS CLAD IN M316 STEEL	BROCKLEHURST JE	1981	TRG-R-3009;FRDC/MWP/P(77)286;FRASG/P(77)86	UKAEA	DFR	Burn-up, Boron Carbide, Fuel Pellets, Control Rod, Shut-off Rod	This report is a key reference associated with Control Rods. This addendum to TRG Report 2009 gives additional data on the highest burn-up experiment in the series described in the report. The new data confirms the basic interpretation of the results.	Calculations associated with irradiation of Boron Carbide Neutron absorber pellets.
26155	THE GENERALISED ALGEBRAIC COMBINATION (GAC) AND LARGE TIME STEP INTEGRATION (LTSI) RESPONSE SPECTRUM METHODS FOR THE DYNAMIC STRUCTURAL ANALYSIS OF LINEAR AND NON LINEAR SYSTEMS	MERTENS PG	1991	PE/91/31					
26411	NOTES BASED ON A PAPER BY GW HOLLENBERG ON TRITIUM RELEASE FROM FAST NEUTRON IRRADIATED BORON CARBIDE AMERICAN CERAMIC SOCIETY BULLETIN 56 P343 (1977)	BIRCH M	1979	FRDC/MWP/P(79)341;FRASG/P(79)141					
26413	NOTES BASED ON A PAPER BY GW HOLLENBERG AND WV CUMMINGS ON EFFECT OF FAST NEUTRON IRRADIATION ON THE STRUCTURE OF BORON CARBIDE JOURNAL OF THE AMERICAN CERAMIC SOCIETY 60 NO 11-12 P520 (1977)	BIRCH M	1979	FRDC/MWP/P(79)343;FRASG/P(79)143					
26424	D EU2O3 2ND TITLE/ BURN-UP OF FAST REACTOR NEUTRON ABSORBERS IN DHR IRRADIATED EXPERIMENTS ABSORBERS IN DHR IRRADIATED EXPERIMENTS	PEARCE JH;BROCKELHURST JE	1981	FRDC/MWP/P(80)1115;FRASG/P(80)165;ND-R-549					
26538	NIVGRO A COMPUTER PROGRAM TO CALCULATE THE SWELLING DISTORTION OF FAST REACTOR COMPONENTS DUE TO NEUTRON INDUCED VOIDAGE	RIDING DJ	1981	FRDC/FEWP/P(81)46;RTD/TN(81)158					
26574	RELATIVE REACTION RATES REDUCED FROM FISSION PRODUCT DISTRIBUTION IN IRRADIATED PFR FUEL PINS	CLARK BE	1980	FRDC/FEWP/P(80)31		PFR			
26622	PRELIMINARY STUDY OF POSSIBLE CDFR REACTIVITY TRANSIENT DUE TO SEISMIC ACTIVITY	PERKS MA;TAYLOR MJ	1982	TSPD/R(82)368		DFR			
26645	CALCULATIONS ND AN IMPROVED RECOMMENDATION FOR FISSION YIELDS OF HELIUM KRYPTON AND XENON IN A FAST REACTOR	MARTIN DG	1993	PE2/7846;CFWG/P(93)17					
26654	STATEMENT FRO AGT4/SG10 ON THE DELAYED NEUTRON SOURCE TERM FOR A 1G BLOCKAGE OF FISSILE OT FERTILE MATERIAL	PLUCHERY M;LENNOX TA	1989	FRSWG/SAFSG/P(89)17					
26685	AN ASSESSMENT OF THE REACTIVITY EFFECTS OF MFCI EVENTS ON THE CORE BREEDER INTERFACE OF CDFR	PERKS MA	1981	FRDC/PPWP/P(81)314		DFR			
26836	ABN ANALYSIS OF THE SODIUM MIXING WITHIN THE NEUTRON SHIELD PIN BUNDLE OF THE EFRNCD 9/91 FUEL SUB ASSEMBLY USING THE COMPUTER CODE SABRE	COLE GC	1993	FEDR 93/2007;PE1/7914					
26857	THE DEVELOPMENT OF RESPONSE SPECTRA FROM STRONG MOTION EARTHQUAKE TIME HISTORIES	ALDERSON AHG;WINTER PW	1980	SRD R 180					
27147	AN ASSESSMENT OF THE BEHAVIOUR OF FISSION PRODUCTS AND FUEL DURING A HYPOTHETICAL CORE DISRUPTIVE ACCIDENT (HCDA) IN CDFR	HARDING JH;MIGNANELLI MA;POTTER PE	1985	AERE R 11855		DFR			
27195	THE ATTENUATION OF GAMMA RAYS AND NEUTRONS IN REACTOR SHIELDS	GOLDSTEIN H	-						
27239	COMMENTS ON VAN VLIET'S FINAL REPORT TO CEC ON TRANSIENT FISSION GAS BEHAVIOUR DURING SEVERE FAST REACTOR TRANSIENTS	MATTHEWS JR	1986	FRSWG/WCASG/P(86)56					
27293	SENSITIVITY ANALYSIS OF THE TOP DUCT BCD SYSTEM AND GAMMA SPECTROMETRY	MCDOUGALL A	1993	PE1/8141;TIN(93)5					
28012	SAFETY ASSESSMENT OF THE SODIUM VOID RIG IN THE PARTLY BURNT-UP AND EQUILIBRIUM CORES	WETHERINGTON EW	1973	PFR/SWP/ESC/P(73)94					
28016	ADDENDUM TO THE SAFETY REPORT FOR THE PFR SHIELDING EXPERIMENTS	WILLIAMS DP	1973	PFR/SWP/ESC/P(73)136		PFR			
28025	THE USE OF SCRIBE MARKS TO MONITOR NEUTRON INDUCED VOIDAGE GROWTH IN PFR DESIGN AND SAFETY REPORT	POUNDER JO	1974	PFR/SWP/ESC/P(74)15;PFR/TC/P(74)6		PFR			
28046	DESIGN AND SAFETY REPORT FOR THE LOW POWER FISSION YIELD EXPERIMENT SERIAL NO S153	HENDERSON JDC;WILLIS HH;TELFER JCW	1976	PFR/SWP/ESC/P(76)2					
28048	SAFETY REPORT FOR THE FISSION PRODUCT YIELD EXPERIMENT (0101PF OR 01/29)	GODFREY RE	1977	PFR/SWP/ESC/P(77)3					
28347	BERYLLIUM NEUTRON SOURCE FOR CDFR	BRINDLEY KW	1979	PFR/TC/P(79)20;DM/P(79)298		DFR			
28605	A LOW REACTIVITY SODIUM VOID BENCHMARK EXPERIMENT IN AN ANNULAR HETEROGENEOUS ASSEMBLY	KNIPE AD;FRANKLIN BM	1990	AEEW-R2650	UKAEA		Sodium Void, Reactivity, Pu-239 fission distribution	This report is a key reference associated with Sodium Void. This report provides a detailed specification of the BZD/1 reference and sodium-void configurations in a benchmark format suitable for independent analysis. The large scale sodium-void experimental procedures are also outlined and the use of the reactivity and Pu-239 fission distribution measurements are reported to allow comparison with prediction.	Comparisons with predictions associated with the sodium-void configurations
28692	USERS GUIDE TO THE COSMOS DATABANK INTEGRITY PROCEDURE (CODIP)	DORE ER	1980	FRMCSG/WG/N(80)210					
28695	PUBLIB XLIB AND COPYLIB A SUITE OF MACROS TO MANIPULATE LIBRARIES USED IN THE COSMOS REFERENCE SET AND THE WINFRITH ICL 2976 CONVERSION EXCERISE	BATESON WB	1981	FRMCSG/WG/N(81)222;WCCWG/P(81)36					
28696	A CONSIDERATION OF THE RICHARDSON CARTY SUGGESTION THAT COSMOS SOFTWARE SHOULD BE RE WRITTEN	BINDOM DC	1982	FRMCSG/WG/N(82)267					
28698	ALTERNATIVES TO THE EXISTING COSMOS SYSTEM COMMENTS ON THE CARTY RICHARDSON PROPOSALS	BUTLAND ATD;NEWTON TD;SUTHERLAND R;RICKETS TM	1982	FRMCSG/P(82)67;FRMCSG/WG/N(82)279					
28874	CORRELATION OF IRRADIATION CREEP DATA OBTAINED IN FAST AND THERMAL NEUTRON SPECTRA WITH DISPLACEMENT CROSS SECTION	FOSTER JP;BOLTAX A	-	CPN/586					
28920	THE BEHAVIOUR OF FISSION PRODUCT PALLADIUM IN MIXED OXIDE FUEL	SIMPSON KA	1978	FRDC/FEWP/P(78)27;FRFF/P(78)30					
29137	SUPPLY OF SHIELDING AND REFLECTION ELEMENTS FOR THE EUROPEAN FAST REACTOR	BNFL FUEL DIVISION	-						
29153	REVIEW OF THE DELAYED NEUTRON MONITOR COUNTING SYSTEM EFFICIENCY VERIFICATION FOR THE SV-FFDL CONCEPT FOR DFBR-1 (ACTIVITY 2.3.1.A.1, 2.3.1.A.2(A)+(B)	PRICE J;LENNOX TA	1994						
29341	CDFR ISI A PROPOSAL FOR VISUAL INSPECTION OF STRUCTURAL WELDS WITHIN CONCRETE RADIATION SHIELDING OF REACTOR ROOF	BOWKER LJ	1982	DM/P(82)407		DFR			

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
29420	THE USE OF FLOWING CONCRETE FOR SHIELDING INFILL TO PRIMARY CONTAINMENT ROOF AND ROTATING SHIELDS	MORGAN PLT	1982	TN/P(82)528					
29540	A COMBINED FISSION GAS RELEASE AND SWELLING MODEL FOR FUEL DURING IRRADIATION	HARRISON JW	1981	AERE-R10342					
29634	A MANUAL FOR USERS OF TASKS WITHIN THE PFR ROUTINE REACTOR PHYSICS CALCULATIONAL ROUTES ON THE RISLEY ICL 2982 COMPUTER	NEWTON TD	1982	ND-R-772		PFR			
29635	A MANUAL FOR THE DESIGNERS OF NEW TASKS TO OPERATE WITHIN THE PFR ROUTINE REACTOR PHYSICS CALCULATIONAL ROUTES ON THE RISLEY ICL 2982 COMPUTER	NEWTON TD	1982	ND-R-773		PFR			
29649	REVIEW OF THE PERFORMANCE CALIBRATION METHOD FOR THE DELAYED NEUTRON MONITOR FOR THE SV-FFDL CONCEPT FOR DFBR-1 (ACTIVITY 2.3.2.1 (A) AND (B))	PRICE J	1993						
29700	A REVIEW OF REACTIVITY FAST FEEDBACK MEASUREMENTS AT HIGH POWER IN PFR	NEWTON TD	1993	PFR/TC/P(93)546;PE1/8954		PFR			
29751	BASIC PHYSICS DATA ON NUCLIDES FOR THE PLUTONIUM MANAGEMENT DATABASE	ADAMSON NJ	1993						
29834	BASIC PHYSICS DATA ON NUCLIDES FOR THE PLUTONIUM MANAGEMENT DATABASE	ADAMSON NJ	1993						
	REACTOR PHYSICS STUDIES ON THE BORON CARBIDE POISONED CAPRA CORE	ALLEN KG;BEAUMONT HM;	1994	TCS/94/009;ARMM/P(94)3;					
30035	CALCULATION OF THE NEUTRON DETECTOR EFFICIENCY OF THE DFBR-1 SV-FFDL CONCEPT	ASLAM AA	1994	TCS/94/019;C9238/DSR/001;					
30132	CALCULATION OF THE NEUTRON DETECTOR EFFICIENCY OF THE DFBR-1 SVFFDL USING MONTE CARLO CODE (MCNP)	SHIRAKAWA SAN	1994	PE1/9874					
	A NOTE ON SODIUM VOID CALCULATIONS FOR CAPRA CORES	NEWTON TD;FRANKLIN BM	1994	PE1/9883;CAPRA/AEA/P(94)5;ARMM/P(94)14					
	REACTOR PHYSICS STUDIES ON THE HIGH BURN-UP VERSION OF THE CAPRA 04.94 CORE	ALLEN KG;BEAUMONT HM;HUNTER SN;	1994	PDP(94)028;ARMM/P(94)21					
	REACTOR PHYSICS STUDIES ON THE POOR QUALITY PLUTONIUM VERSION OF THE CAPRA 04.94 CORE	ALLEN KG;BEAUMONT HM;	1994	PDP(94)029;ARMM/P(94)22					
	REACTOR PHYSICS STUDIES ON THE HIGH BURN-UP VERSION OF THE CAPRA 04.94 CORE:VARIANT WITH MODERATOR IN UNFUELLED PINS	HUNTER SN	1994	PDP(94)039;ARMM/P(94)26					
	REACTOR PHYSICS STUDIES ON THE POOR QUALITY PLUTONIUM VERSION OF THE CAPRA 04.94 CORE:VARIANT WITH MODERATOR IN UNFUELLED PINS	HUNTER SN	1994	PDP(94)040;ARMM/P(94)27					
	DOCUMENT ISSUE RECORD: CALCULATION OF THE NEUTRON DETECTOR EFFICIENCY FOR THE REFERENCE SV-FFDL CONCEPT FOR DFBR-1	ASLAM AA	1994	C9535/DSR/001;PDP/94/041					
	CALCULATION OF TRANSIT TIMES: SV-FFDL FOR DFBR-1 ESTIMATION OF TRANSIT TIME FOR SODIUM SAMPLE FROM THE CORE OUTLET TO THE DELAYED NEUTRON COIL INLET	CHEYNE A	1994	C9535/CAL/001					
	REACTOR PHYSICS STUDIES ON THE CAPRA 04.94 REFERENCE CORE USING MODELS DEVELOPED FOR THE ASSESSMENT OF HIGH BURN-UP & POOR QUALITY Pu VARIANT CORES	HUNTER SN;BEAUMONT HM	1994	PDP(94)047;ARMM/P(94)34					
	REACTOR PHYSICS STUDIES ON THE GOOD QUALITY PLUTONIUM VERSION OF THE CAPRA 04.94 CORE:VARIANT WITH ADDITIONAL DILUTION FROM Ce02 IN THE FUEL PELLET	HUNTER SN	1994	PDP(94)048;ARMM/P(94)35					
	FIRST REFLECTIONS ON DOPPLER COEFFICIENT CALCULATIONS FOR PLUTONIUM WITHOUT URANIUM CAPRA CORES	NEWTON TD;FRANKLIN BM	1995	ARMM/P(95)7;CAPRA/AEA/P(95)2;PE1/10869					
	FURTHER CONSIDERATIONS ON THE EVALUATION OF DOPPLER COEFFICIENTS FOR THE PU WITHOUT U CAPRA CORE OPTION	NEWTON TD;FRANKLIN BM	1995	ARMM/P(95)15;CAPRA/AEA/P(95)3					
	OECD/NEA NSC TASK FORCE ON PHYSICS ASPECTS OF DIFFERENT TRANSMUTATION CONCEPTS - BENCHMARK SPECIFICATIONS	OECD NUCLEAR ENERGY AGENCY	1996	NSC/DOC(96)10;PE1/11110OECD/NEA NSC					
	DOPPLER COEFFICIENT & SODIUM VOID EVALUATIONS FOR THE MOX 55 MEC & REP33 Pu VECTOR VARIATIONS OF THE PuN FUELLED CAPRA CORE	NEWTON TD;FRANKLIN BM	1996	ARMM/P(96)10;CAPRA/AEAT/P(96)1;PE1/11108;PE1/11190; 1190					
	DOPPLER COEFFICIENT & SODIUM VOID EVALUATIONS FOR THE MEC Pu VECTOR VARIATION OF THE PuN FUELLED CAPRA CORE	NEWTON TD	1996	ARMM/P(96)16;CAPRA/AEAT/P(96)4;PE1/11281					
	CORE PHYSICS STUDIES ON Pu & MA BURNING IN THE CAPRA 04.94 CORE FOR UK STRATEGIC FUEL CYCLE STUDIES	ALLEN KG	1996	C5159/TR/016;ARMM/P(96)14;P&P(96)TN/051					
	DESIGN PLAN: FR SCENARIO STUDIES & PHYSICS STUDIES FOR THE CEC 4TH FRAMEWORK(CONTRACT NO.F141-CT95-0006)	LENNOX TA	1997	C5289/DP/002					
30999	CORE PHYSICS STUDIES ON Pu & MA BURNING IN THE EFR CD9/90 CORE FOR UK STRATEGIC FUEL STUDIES	TAYLOR SM	1997	C5159/TR/020					
31009	CORE PHYSICS STUDIES ON Pu MA BURNING IN THE CAPRA 04.94 CORE FOR CEC PARTITIONING & TRANSMUTATION STUDIES (WP3) CONTRACT F141-CT95-0006	ALLEN KG;WHYMAN EK	1998	C5289/TR/003					
31163	OVERVIEW OF PHYSICS ASPECTS OF DIFFERENT TRANSMUTATION CONCEPTS	OECD	1994	PE1/11857;NEA/NSC/DOC(94)11					
	SCOPING STUDIES: SODIUM VOID REDUCTION - CAPRA REFERENCE 4/'94 CORE	NEWTON TD	1997	PE1/12165;ARMM/P(97)20					
31252	A FRENCH VIEW ON NUCLEAR ENERGY AND FAST NEUTRON REACTORS	BARRE B	1997	PE1/11832					
31440	NOTE TECHNIQUE: DEDICATED CYCLE FOR BURNING MINOR ACTINIDES & LONG-LIVED FISSION PRODUCTS	PILLON S	1997	DER/SIS/CAPRA 97-20/1001;PE1/12419					
	EQUILIBRIUM CYCLE FUEL COMPOSITION FOR THE CAPRA HIGH BURNUP CORE	FRANKLIN BM	1998	ARMM/P(98)12;CAPRA/AEAT/P(98)3;PE1/12013					
31457	A HIGH RESOLUTION SPALLATION DRIVEN FACILITY AT THE CERN-PS TO MEASURE NEUTRON CROSS SECTIONS IN THE INTERVAL FROM 1eV TO 250MeV	RUBBIA C;ANDRIAMONJE S;CAPPI R;BUONO S	1998	CERN/LHC/98-02 (EET);PE1/12862					
31467	ACCELERATOR DRIVEN FISSION & RELATED TOPICS 23 MARCH 1998 (PRESENTATION)	INGHAM L;JUDD A;WILSON P;GARDNER I	1998	PE1/13138					
31480	NOTE TECHNIQUE: DESCRIPTIF LIVRAISON ERANOS 1.2	HONDE D;RIEUNIER JM;RIMPAULT G	1998	PE1/13291					
31521	CORE PHYSICS STUDIES ON MA BURNING IN A CAPRA 04.94M HIGH BURN-UP CORE WITH EX-CORE TARGETS	WHYMAN EK	1999	C5728/TR/016					
31560	FAST REACTOR PHYSICS & SAFETY: PRESENTATION TO BNFL STAFF 30 JUNE 1998	JUDD AM	1998	PE1/13453					
31843	POWER & TEMPERATURE REACTIVITY COEFFICIENTS FOR THE DYNAMIC ANALYSIS OF THE EFR FIRST CONSISTENT DESIGN	MORRIS M;SUNDERLAND RE	1989						
31852	ENHANCED GAS COOLED REACTORS: A COSMOS CALCULATION OF THE NEUTRONICS PERFORMANCE OF A 1670 MW(TH) GCFR WITH 7mm FUEL PELLETS , AND A COMPARISON WITH THE RESULTS OF CEGB CALCULATIONS	MACBEAN IJ	-	AEEW-M-1669					
	A DEDICATED MINOR ACTINIDE BURNING GAS COOLED FAST REACTOR: INITIAL CORE PHYSICS STUDIES	WHYMAN EK;SUNDERLAND RE	1999	C5728/TR/033;ARMM/P(99)5					

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
31915	STATUS & ASSESSMENT REPORT ON ACTINIDE & FISSION PRODUCT PARTITIONING & TRANSMUTATION	OECD(ORGANISATION FOR ECONOMIC CO-OPERATION & DEVELOPMENT)	1999	PE1/13720					
31928	NOTE TECHNIQUE: ANALYSIS OF THE EFFECT ON REACTIVITY OF SODIUM VOID	RIMPAULT G;TOUPIN MF	1999	NT SPRC/LEPH/98-234;PE1/13726					
31948	NOTE TECHNIQUE: QUALIFICATION DU FORMULAIRE ERANOS POUR LE CALCUL DE LA PERTE DE REACTIVITE DE SUPER-PHENIX	RIMPAULT G;SMITH P	1998	PE1/14125;NT SPRC/LEPh/97-239					
31965	KALIMER: PRELIMINARY EVALUATION OF FY98 KALIMER SHIELDING DESIGN	YOO JW;KANG CM (KAERI)	1999	KAERI/TR-1196/98;PE1/14366					
	A DEDICATED MINOR ACTINIDE BURNING GAS COOLED FAST REACTOR FURTHER CORE PHYSICS STUDIES	WHYMAN EK;SUNDERLAND RE	1999	C5994/TR/009;ARMM/P(99)17					
31999	TRANSACTIONS OF THE AMERICAN NUCLEAR SOC.1989 V.60 PP.307-309:HIGH BURNUP OXIDE FUEL IN EUROPEAN FAST REACTORS	SWANSON KM;LANGUILLE A;MUHLING G	-						
32059	A REVIEW OF THE INSTRUMENT LIMITATIONS WHICH GOVERN THE NEUTRON FLUX INSTRUMENTATION OF POOL TYPE FAST REACTORS	GOODINGS A;BARDSLEY DJ	-	AEEW-R 2080;R001285					
32061	SPARK A COMPUTER PROGRAM TO SOLVE THE TIME DEPENDENT MULTIGROUP NEUTRON DIFFUSION EQUATIONS IN ONE, TWO OR THREE DIMENSIONS	FLETCHER JK	1974	TRG REPORT 2707(R)					
32062	EVALUATION OF BENCHMARK CALCULATIONS ON A FAST POWER REACTOR CORE WITH NEAR ZERO SODIUM VOID EFFECT	IAEA VIENNA	1994	IAEA-TECDOC-731					
ABSTRACT.pdf	OPERATING EXPERIENCE WITH THE FAST REACTOR	GREGORY CV	1991	UNREFERENCED	UKAEA – AEA Reactor Services	DFR	OPEX, Failed Fuel, Dose, Modifications	The paper provides a summary of OPEX with PFR for period between March 1986 and March 1991 (Important as represents 80% of PFR' s generation, encompasses major material related defects associated, and is when high burn-up was achieved). The author explains that the steam generators were the major cause of availability loss, describes the progress with demonstration of high burn up, and high dose in potential fuel designs, and finally reports on the satisfactory OPEX with the fuel after clad breach. The paper reports on the lessons learned following major trip events, and highlights their consequences, including the gaseous releases due to failed fuel, or propagation of crack growth.	Measured data contained in the report, and treats: Total Dose to Operator, Outage, Fuel Failure Events, Load Factor, Electrical Generation, detailed outages, Fuel Performance and Burn-up (maximum)
ASMD-TN-1924.pdf	PFR/EFR AND 3 TRAIN SAFETY SYSTEMS - A PRELIMINARY REPORT ON THE FINDINGS OF THE STUDY	RAMSAY P; WIDDOWSON IR	1992	ASMD Tech. Note No. 1924	AEA Technology	DFR	Safety, Data Analysis	Inspection of the short, and medium term technical material collected. The report offers a detailed breakdown of the trips, guard lines, and channel inspection data, as well as the recipe for the analysis of Permanent Data Record (PDR) for a limited time frame (a month). The latter aims to show a detailed information on the PFR Automatic Protection System (APS) performance.	Safety System Test Data, Time/Sate Diagrams for Trip analysis.
B3-00-5-1832-A.pdf	GENERAL OPERATING REPORT FROM PHENIX, SUPERPHENIX, PFR, BN 600 - SECOND HALF OF 1994	BANDINI C	1994	B3-00-5-1832-A	AEE WINFRITH	PHENIX; SUPERPHENIX; PFR; BN600	OPEX	The document shows the operation of four FBR'S during the second half year of 1993, including: PHENIX, SUPERPHENIX, PFR, and BN 600 (OPEX only general, as detailed info was limited at the time). Over this period, PHENIX and SUPERPHENIX were shutdown, whilst both BN 600 and PFR were in power. The events which occurred in those plants act as a feedback to EPR and are listed in chronological order in this report.	For period of July – December 1993: PFR/BN 600 Operating Statistics, PFR Monthly Atmospheric/Liquid Effluent Discharges, and load factors, weekly electrical generation across 1993,
CEWP-P79-241.pdf	RECTOR PHYSICS INFORMATION FROM THE PFR DURING 1978	GREGORY CV; LENNOX TL; LORD TJ	1979	FRDC/C15WP/P(79)241	AEE WINFRITH	PFR	BDP, Reactor Physics, Failure System	This report is a key reference associated with Reactor Physics Summaries. Paper describes physics information obtained from the PFR during 1978/1979 and concentrates on: investigating of the PFR power coefficient, the measurement and interpretation of the BPD system signals (for fuel pin failures), demonstration of natural circulation, Primary Circuit Flow assessment, thermal noise measurement in the PFR Upper Plenum, shielding (in support of interpretation of gamma activities observed during shutdown – source unidentified), measurement of the reactivity loss with burnup, and finally the inlet temperature coefficient of reactivity, as well as temperature transients in primary circuit.	Values of various reactivity coefficients (comparison between measured and calculated data), Temperature Behaviour of PBR.
CPWP-P71-108.pdf	MEASUREMENTS AND CALCULATIONS OF THE REACTIVITY WORTHS OF LI6 ABSORBERS IN ZEBRA CORE 10	STEVENSON JM; SMITH RW	1971	FRDC/CPWP/P(71)108	AEA Technology	CFR	Reactivity Worth, ZEBRA Core 10	This report is a key reference associated with Reactivity Worth. Reactivity Measurements with Li-6 Samples at centre of Zebra Core 10 (Critical assembly with Pu, Pu-O, U-O, Graphite Plates and Uranium Metal Breeding Blanket) to predict the worth of a liquid lithium shut-off rod in CFR. The measured data includes the reactivity worth of a single 75 g Li-6 sample, as well as smaller Li-6, B-10 and Pu-239 samples (included to assist the interpretation of results).	Reactivity Excesses in large and small sample measurements, and comparison with calculated data, Section of the CIO-1A Core Element, and the layout of elements in the core (extremely faded).
CPWP-P71-82.pdf	A REVIEW OF ZEBRA PROGRAMME 1971	SANDERS JE	1971	FRDC/CPWP/P(71)82	AEA Technology	CFR; PFR; MONJU	CFR, ZEBRA, Zero Leakage Assemblies	This report is a key reference associated with Calculational Methods. The paper reviews the ZEBRA programme and describes the experiments to be carried out under the AEA/PNC Agreement. The paper contains the summary of ZEBRA 8 experiments (ZERO leakage, and 8G), simple Pu-fuelled critical assemblies 9/10/11, as well as the MOZART project (joint programme between CFR, PFR and MONJU).	Main Physical parameters of PFR, MONJU and CFR
CPWP-P72-161.pdf	PHYSICS MEASUREMENTS ON THE PFR AND THEIR RELEVANCE TO THE CFR	ETHERINGTON EW; SMITH DCG; TAIT D; WHEELER RC	1972	FRDC/CPWP/P(72)161	AEA Technology	CFR; PFR	CFR, PFR	This report is a key reference associated with Reactor Physics Summaries. Paper aims to summarise the information and to list the features which are likely to interest CPWP members including: aims of ea. Experiment in relation to the specific PFR requirements, its details, and where appropriate the method of analysis, as well as a short account to the usefulness of the data in relation to the CFR.	Description of variety of experiments including: Reaction Rate Measurements, Reactivity Measurements, Reactivity feedback and kinetic measurements, and failed fuel detection.
CPWP-P72-183.pdf	A REVIEW OF ZEBRA PROGRAMME 1972	SANDERS JE	1972	FRDC/CPWP/P(72)183	AEA Technology	CFR; PFR	ZEBRA, Review, MZA, MZB, MZC, MOZART	This report is a key reference associated with Calculational Methods. The report summarizes the experiments performed on Cores 10, and 11 (collectively known as MZA), Core 12 (MZB), and reviews the plans for experiments to be performed in Core 13 (MZC) – the final phase of AEA/PNC MOZART programme. Finally, the subsequent programme in support of the PFR operation and CFR design is introduced.	The material composition of cores 9-11, Sodium Removal Measurements in Core 11.

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
CPWP-P72-189.pdf	EXPERIMENTAL DATA FROM ZEBRA 1972	SENDERS JE	1972	FRDC/CPWP/P(72)189	AEA Technology	CFR; PFR	ZEBRA, CFR, PFR, MOZART, MZA, MZB, MTN	This report is a key reference associated with Calculational Methods. This paper lists the documents containing experimental results from Zebra cores 8,9,10,11 and 12. Information of cores 9 and 10 is in form of the so called ZERS (Zebra Experimental Results Sheets), which include detailed tables of experimental data, error assignments etc. Cores 11 (MZA) and 12 (MZB) studied under the MOZART Project are contained in 'MOZART Technical Notes (MTN).	No direct technical values has been identified from the report identified. However, relevant documents can be identified using the list available.
CPWP-P73-202.pdf	A PRELIMINARY NOTE ON FD5 DOPPLER EFFECT CALCULATIONS	ROWLANDS JL	1973	FRDC/CPWP/P(73)202	AEE WINFRITH	CFR; PFR	Doppler Effect, FD5, ZEBRA, SEFOR, ZPR	This report is a key reference associated with the Doppler Effect. Continuation of the D. Wardleworth's work with Zebra 5 Doppler Loop Measurements (FD4). The FD5 set gives a Doppler effect 10% higher compared with FD4, making its C/E eigenvalue 23% below the experimental value, and recommended PFR and CFR values. The measurements were performed with ZEBRA 5J configuration in 400-800 K temperature region, two versions of SEFOR: with BeO and Steel pins, between 680-1360 K.	FD5 Doppler calculations, with different cores.
CPWP-P73-214.pdf	PROGRESS REPORT ON THE ANALYSIS BY STANDARD METHODS OF SPATIAL PROPERTIES IN ZEBRA CORE 12		1972	FRDC/CPWP/P(72)214	AEE WINFRITH	CFR	CFR , MOZART, MONJU, MZB, MZC, MURAL, FGL5	This report is a key reference associated with Calculational Methods. This report summarises the status of comparisons of measured and calculated values using FGL5 data for spatially dependant parameters, including: reaction rate distributions, perturbation effects, absorber worths and the reactivity scale experiment (Control rod calibrations by periods, Central Pu239 worth, Uniform inner-core depletion, and edge element worth). The report does not imply any recommendations.	Comparison of calculated and measured Sodium removal reactivities, and multitude of C/E value data.
CPWP-P73-230.pdf	THE ACCURACY OF ESTIMATION OF THE NEUTRON PHYSICS PROPERTIES OF PFR AND CFR	CAMPBELL CG; ROWLANDS JL; SANDERS JE	1973	FRDC/CPWP/P(73)230	AEE WINFRITH	CFR; PFR	Neutron Physics Properties, Estimation Accuracy	This report is a key reference associated with Calculational Methods. Summary of accuracies with which different properties of PFR and CFR can be estimated is given, and target accuracies are also proposed. The uncertainties are those which arise from the Nuclear Data errors or approximations in the calculation methods and exclude the uncertainties which arise from the composition and dimensions). The uncertainties are expressed as a % standard deviation, and suitability of large core experiments in reducing the remaining uncertainties is considered.	List of uncertainties include: K-effective, fuel enrichment, peak to average power, control rod worth, Sodium Voiding, Doppler Effect, Breeding Gain, Effects of Burn-up and fuel management on Power Shape, Power in the blanket and its variation during its life, Methods to determine subcriticality, Gamma heating and energy deposition, Accident configuration, Irradiation damage to core structure, shielding problems, and Spectrum.
CPWP-P73-234.pdf	A REVIEW OF ZEBRA PROGRAMME 1973	SANDERS JE	1973	FRDC/CPWP/P(73)234	AEE WINFRITH	CFR	MOZART, MZB, ZEBRA, REVIEW	This report is a key reference associated with Calculational Methods. The report summarises the achievements and conclusions drawn from the ZEBRA experiments in 1972/73 and introduces the programme for 1973/74 and beyond, including: experimental programme, calculation methods, and time-scale.	Review of various calculational methods associated with the Core Physics area.
CPWP-P74-261.pdf	CENTRAL REACTIVITY MEASUREMENTS WITH BORON, EUROPIUM, AND OTHER ABSORBING MATERIALS IN ZEBRA CORE 12	BURBIDGE BLH; INGRAM G	1974	FRDC/CPWP/P(74)261	AEE WINFRITH	CFR; PFR	ZEBRA, Absorber Materials, Control Rods	This report is a key reference associated with Control Rods. Central reactivity measurements in ZEBRA Core 12 with number of absorbing materials, including: Eu, B and other materials, over range of different sample sizes. The authors conclude that measurements made with B_4C and Eu_2O_3 support the trend observed in calculation, and the effect per unit volume of Eu_2O_3 exceeds that for B_4C in small samples but falls below that of B_4C as the sample size approaches that of control rod. Studies with other absorbers show the superiority of Eu to other rare earths but show that both Re and Ir (by inference) would make effective absorbers in control rods (it is however uneconomical to do so).	Cm of rod data for multitude of different metals, and rare earths, as well as Eu_2O_3 and B_4C.
CPWP-P75-236.pdf	INFORMATION ON MOZART EXPERIMENTS AND THEIR ANALYSIS	SANDERS JE	1975	FRDC/CPWP/P(75)226	AEE WINFRITH	CFR; PFR	MOZART, CFR, PFR	This report is a key reference associated with Calculational Methods. List of the papers on MOZART related activities in chronological order.	Review of various calculational methods associated with the Core Physics area.
DATA-SECTION-A2.pdf	PFR PHYSICS DATA SHEETS	UNSPECIFIED	1969	UNREFERENCED	AEE WINFRITH	PFR	Data, PFR, Reactivity, Worth, Neutron Balance, Isothermal Temperature Coefficient, Sodium Voiding, Burn-up	This is a key Reactor Physics Summary Report. The document contains a summary of PFR data (the nature of which is shown within the technical value section), in 10 separate sheets marked A(2,3,5,6,7), and B(1,2,3,5,7). Here: A2 – Breeding Gain, A3 – Power Related Data, A5 – Reactivity Worths and effect of Burn-up, A7 – Reactivity changes from 200 Degrees C to Power, B1 – Reactivity Relationships, B2 – Reactivity worths of heavy isotopes and other constituents in core sub-assembly, B3 – Neutron Balance and Reaction Rates, B4 – Kinetic Parameters and Isothermal Temperature Coefficients, B5 – Effect of sodium voiding on reactivity change by region, B7 – One group cross sections.	See Summary
DBM-89-P37.pdf	A REVIEW OF PFR TRIPS AND OUTAGES	BATES PM; ADAM ER; GREGORY CB	1989	DBM(89)P37	AEA Technology	PFR	Trip, OPEX, outage	The paper sets out the PFR plant trip and outage history and attributes the cause of outages to one of the five categories: external factor, prototype plant, conventional plant, operations, or unclassified. Here, each of the categories is further sub-divided to identify the plant item or a reason for outage. The report authors conclude that the number of trips per year has been steadily reducing during the life of the station and attribute this improvement to number of reasons including: OPEX, improvements to plant, planning and maintenance.	Summary of Plant trips for each year since 1976
FRDC-CEWP-1976.pdf	LIST OF FRDC/CEWP PAPERS ISSUED ON 31ST DECEMBER 1976	BEARD JA	1976	UNREFERENCED	AEA Technology	PFR; CFR	List, Papers, Authors, Reports	List of FRDC/CEWP Papers Issued at 31 December 1976	Detailed list of key reports associated with Core Physics and the FRDC / CEWP Working Parties

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
FRDC-CEWP-1977.pdf	LIST OF FRDC/CEWP PAPERS ISSUED ON 31ST DECEMBER 1977	UNSPECIFIED	1977	UNREFERENCED	AEA Technology	PFR; CFR	List, Papers, Authors, Reports	List of FRDC/CEWP Papers Issued at 31 December 1977	Detailed list of key reports associated with Core Physics and the FRDC / CEWP Working Parties
FRDC-CEWP-1978.pdf	LIST OF FRDC/CEWP PAPERS ISSUED ON 31ST DECEMBER 1978	UNSPECIFIED	1977	UNREFERENCED	AEA Technology	PFR; CFR	List, Papers, Authors, Reports	List of FRDC/CEWP Papers Issued at 31 December 1978	Detailed list of key reports associated with Core Physics and the FRDC / CEWP Working Parties
FRDC-CEWP-1979.pdf	LIST OF FRDC/CEWP PAPERS ISSUED ON 31ST DECEMBER 1979	UNSPECIFIED	1977	UNREFERENCED	AEA Technology	PFR; CFR	List, Papers, Authors, Reports	List of FRDC/CEWP Papers Issued at 31 December 1979	Detailed list of key reports associated with Core Physics and the FRDC / CEWP Working Parties
FRDC-CEWP-1980.pdf	LIST OF FRDC/CEWP PAPERS ISSUED ON 31ST DECEMBER 1980	UNSPECIFIED	1977	UNREFERENCED	AEA Technology	PFR; CFR	List, Papers, Authors, Reports	List of FRDC/CEWP Papers Issued at 31 December 1979	Detailed list of key reports associated with Core Physics and the FRDC / CEWP Working Parties
OPERATORS-REPORT.pdf	OPERATORS REPORT	MACKAY A	1993	UNREFERENCED	R.S. SAFETY WORKING PARTY	PFR	OPEX, Safety, UNROs	The summary of OPEX fed from the operators throughout 1992 (and early 1993). Here, a descriptive list of the Unusual Occurrence Reports (UNORs) can be found, a summary of OPEX from 1992, as well as PFR OPEX notes.	Record of Unusual Occurrences (UNROs) in chronological order from 01.92 – 01.93
PEI-8481.pdf	OPERATING PERIODS AND POWER GENERATION DURING PFR RUN 0 (1974-76) ALL THE WAY THROUGH TO 24	-	-	-	-	PFR	Data, Trips, OPEX, PFR	Data relating different PFR runs, including: trip times, reasons and dates, in period between 1973 and 1991, for runs 0 – 24.	Trips, OPEX
PFR-RIGS.pdf	PHYSICS DATA FOR PFR RIGS	BRINDLEY KW	1968	UNREFERENCED	UNSPECIFIED	PFR	Gamma Heat Deposition Rates, Reaction Rates, PFR Type 3 Core	This is a key Reactor Physics Summary Report. Calculated Reaction Rates (using diffusion theory and FD2 data set) in 2-D cylindrical model of PFR Type 3 core, and gamma heat deposition rates are presented here for radially symmetrical model of PFR. Singularities such as controls rods and rigs cause perturbations up to 15% for non-threshold reactions and 50% for threshold reactions and gamma heating. In absence of data on the distribution of gamma heating in an axial direction on PFR the axial distribution measured on ZEBRA 7 is included.	Reaction Rates (Capture Rates, Fission Rates), Gamma Heat Deposition Rates (Graphs), Total Flux, Flux above 2.23 MeV.
PPWP-P74-26.pdf	A REVIEW OF THE ZEBRA CORE 13 PROGRAMME 1974	SANDERS JE; HARDIMAN JP; MARSHALL J; STEVENSON JM	1974	FRDC/PPWP/P(74)26	UNSPECIFIED	PFR	ZEBRA, Core 13, Review, ZTN	This is a key reference associated with the Calculational Methods. The report represents the summary of the ZEBRA Core 13 programme, which aimed to extend tests of data and calculation methods from simple MOZART programme to more complex situations, relevant to the power operation. The paper briefly reviews an experimental programme, the calculation method used for interpretation and the main conclusion drawn from comparison of predicted and measured performance.	Detailed information on all aspects of the Core 13 work, List of ZTNs issued until 1974.
PPWP-P74-36.pdf	REACTOR PHYSICS INFORMATION FROM THE PFR DURING 1974: A PROGRESS REPORT	SMITH DCG;WHEELER RC	1974	FRDC/PPWP/P(74)36	AEA Technology	PFR	Physics, Critical Core Loadings, Worths, Temperature	This is a key Reactor Physics Summary Report. This is a progress report which focuses on preliminary Reactor Physics checks between March and December of 1974, and contains an information on: Critical Core Loading and k-effective, Control Rod Worths and Interactions, Subassembly worths, Temperature rises across the core, Fluxes at instrument positions, Isothermal Temperature Coefficient of reactivity, Comments on Pin Levitation, Power Coefficient of Reactivity, Reactivity and Temperature noise, as well as an overall progress. Authors conclude that a good agreement has been found between calculated and measured values of k-effective for 3 core loadings, and note that there is a limited amount of discrepancy related to control rod worths.	See Summary.
PPWP-P75-37.pdf	LIST AND INDEX OF CORE PERFORMANCE WORKING PARTY AND PLANT PERFORMANCE PARTY PAPERS 1974	UNSPECIFIED	1974	FRDC/PPWP/P(75)37	UNSPECIFIED	PFR; CFR	Index, List, Papers, PPWP	List of PPWP published papers in chronological order, includes reference numbers.	Detailed list of key reports associated with Core Physics and the Plant Performance Working Party
PPWP-P75-52.pdf	PFR SHIELDING MEASUREMENTS	BUTLER J	1975	FRDC/PPWP/P(75)52	AEA Technology	PFR; CFR	Shielding, CFR, PFR	This is a key reference associated with the Calculational Methods. The objective of the paper is to consider the implications of the possible cancellation of the measurements for the CFR project.	Review of various calculational methods associated with the Core Physics area.
PPWP-P75-57.pdf	MEASUREMENTS WITH HYDROGEN MODERATED CONTROL RODS IN ZEBRA	SANDERS JE; INGRAM G; BURBIDGE BLH	1975	FRDC/PPWP/P(75)P57	AEA Technology	PRF; CFR	ZEBRA, Hydrogen, Control Rods, Worths	This is a key reference associated with Control Rods. Introduction of Hydrogenous Moderator provides a means of enhancing the reactivity worth of fast reactor control rods, as an alternative to the enriched Boron. The paper describes the experiments made in ZEBRA Core 14 which aimed at improving an understanding the basic Physics of such absorber/moderator combinations. The measurements were made with full side models of power reactor control rods (Gadolinium-Hydrite, and Hydrogen Moderated Uranium Rod). The measurements aimed to investigate the increases in reactivity worth that can be achieved by introducing Hydrogen into fast reactor control rods, and to understand the way in which the power distribution would be perturbed because of this alteration, and finally to measure their performance.	Reactivity Worths of Hydrated Rods
PPWP-P75-72.pdf	PROGRESS WITH ZEBRA EXPERIMENTS AND ANALYSIS	SANDERS JE	1975	FRDC/PPWP/P(75)72	AEA Technology	PRF; CFR	ZEBRA, Core 13, Core 14, BIZET	This is a key reference associated with the Calculational Methods. The report provides a review of the ZEBRA program until 1975, and introduces scope and objectives of the BIZET programme. The review includes an analysis of Core 13 measurements as well as Integral Data Studies in Core 14.	Activation Studies in ZEBRA Core 14, Least Square Fits to ZEBRA Sodium-Voiding Experiments (Cores 12 and 13), Accuracy of Prediction of Properties of a Conventional CFR, Calculated and Experimental Reactivity Change resulting from Removal of Sodium
PPWP-P76-116.pdf	A REVIEW OF ZEBRA FOR 1975/76	SANDERS JE	1976	FRDC/PPWP/P(76)116	AEA Technology	PRF; CFR	ZEBRA, Review, BIZET, Core 13	This is a key reference associated with the Calculational Methods. The review summarises the more important items of work of interest to the Plant Performance Working Party carried out since September 1975. The review consists of: Core 13 analysis, Integral Data Studies, description of ZEBRA Calculational Route, BIZET Programme, as well as Timescales and Long-term programme.	Review of various calculational methods associated with the Core Physics area.

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
PPWP-P76-120.pdf	A REVIEW OF PROGRESS WITH THE PFR SHIELDING EXPERIMENTS	BUTLER J	1977	FRDC/PPWP/P(76)120	AEE WINFRITH	PRF; CFR	Shielding	This is a key reference associated with the Calculational Methods. The paper has been written to set out the proposed programme for theoretical interpretation of experimental results. No analysis is discussed to limited amount of data available. The paper aims to reaffirm the key role of prototype shielding measurements for the development of CFR considering development/ changes to the CFR design, and draws some attention to those measurements in relation to ERDA Agreement, and any future agreements. Here, the status of the experiments is also stated.	Review of various calculational methods associated with the Core Physics area.
PPWP-P76-133.pdf	VERIFICATION OF CONTENT OF CFR SUB-ASSEMBLIES - REPORT OF FIRST EXPERIMENTAL INVESTIGATION	TAYLOR WH; MURPHY MF	1976	FRDC/PPWP/P(76)R113	AEE WINFRITH	PRF; CFR	Sub-Assemblies, Isotopic Content, Pu-240 Content	The investigation which aimed to verify: the isotopic content (particularly Am-241) of the outer pins in a sub-assembly using gamma ray spectroscopy, as well as the total Pu content of the entire sub-assembly. The details of experimental arrangements and the results obtained are summarised in this report.	Gamma Ray Spectra Analysis for sub-assemblies containing Type C and D pins, shuffling tests (changes to gamma ray spectra when Type C pins are replaced with Type D pins, et vice versa, and neutron counts), estimation of total neutron production in fuel from different isotopes, Gamma ray spectra for different sub-assemblies.
PPWP-P76-89.pdf	LIST AND INDEX OF PLANT PERFORMANCE WORKING PARTY PAPERS 1975	UNSPECIFIED	1976	FRDC/PPWP/P(76)89	AEE WINFRITH	PRF; CFR	Index, List, Papers	List of PPWP papers published between 1974 and 1975, in chronological order. Includes reference numbers.	Detailed list of key reports associated with Core Physics and the Plant Performance Working Party
PPWP-P77-135.pdf	LIST AND INDEX OF PLANT PERFORMANCE WORKING PARTY PAPERS 1976	UNSPECIFIED	1977	FRDC/PPWP/P(77)135	AEE WINFRITH	PRF; CFR	Index, List, Papers	List of PPWP papers published between 1975 and 1976, in chronological order. Includes reference numbers.	Detailed list of key reports associated with Core Physics and the Plant Performance Working Party
PPWP-P77-137.pdf	PHYSICS INFORMATION FROM THE PFR DURING 1975 AND 1976	SMITH DCG; WHEELER RC	1977	FRDC/PPWP/P(77)137	AEE WINFRITH	PFR	Reactor Physics, History, Calibrations, Reactivity, Pin Levitation, Isothermal Temperature Coefficient of Reactivity, Reaction Rate, Temperature, Noise, Power, Isotopes	This report is a key reference associated with Reactor Physics Progress Reports. The report treats the progress made on summarizing the results from PFR reactor physics commissioning tests made during 1975 and 1976. The topics dealt range from Pin Levitation to Power Noise, and cover reactor measurements at both: low, and high power. A section which deals with calculation method development is included.	Detailed list of key reports associated with Core Physics and the Plant Performance Working Party
PPWP-P77-172.pdf	A REVIEW OF ZEBRA FOR 1976/77	SANDERS JE	1977	FRDC/PPWP/P(77)172	AEE WINFRITH	PRF; CFR	ZEBRA, BZA, BZB, BZC, BIZET	This report is a key reference associated with Calculational methods. The report presents a review of the ZEBRA programme in period between 1976 and 1977, and focuses on BIZET programme, in particular: BZA (BIZET Core 1 – clear all-Plutonium System), BZB (4500 litre reference core, representing essential features of a commercial power reactor), and BZC (heterogenous) experimental assemblies. List of Technical Notes (BTN) is issued in Appendix 1 of this report.	Detailed list of key reports associated with Core Physics and the Plant Performance Working Party
PPWP-P77-187.pdf	THE ROLE OF THE PFR SODIUM REMOVAL EXPERIMENT	BUTLAND ATD; ROWLANDS JL; SMITH DCG	1978	FRDC/PPWP/P(77)187	AEE WINFRITH	PFR	Sodium	This report is a key reference associated with Sodium Void. This paper examines whether the proposed PFR experiment can make a useful contribution to the knowledge in light of similar experiments being carried out in low power experimental reactors in the UK, France, USA, Germany, Russia and Japan. They conclude that if such opportunity arises the measurements should be carried out, but only if no other programme gets affected.	Detailed list of key reports associated with Core Physics and the Plant Performance Working Party
PPWP-P78-191.pdf	LIST AND INDEX OF PLANT PERFORMANCE WORKING PARTY PAPERS 1977	UNSPECIFIED	1978	FRDC/PPWP/P(78)191	AEE WINFRITH	PRF; CFR	Index, List, Papers	List of PPWP papers published between 1976 and 1977, in chronological order. Includes reference numbers.	Detailed list of key reports associated with Core Physics and the Plant Performance Working Party
PPWP-P78-219.pdf	A REVIEW OF ZEBRA FOR 1977/78	SANDERS JE	1978	FRDC/PPWP/P(78)219	AEE WINFRITH	PRF; CFR	ZEBRA, BZA, BZB, BZC, BZD	This report is a key reference associated with Calculational methods. The review covers the experiments completed in BZB and BZC, plans for BZD, and progress with the corresponding theoretical analysis. It concludes with some general remarks concerning the future (post-BIZET) activities. A list of the BIZET Technical Notes (BTNs) issued so far is appended.	Detailed list of key reports associated with Core Physics and the Plant Performance Working Party
PPWP-P79-232.pdf	LIST AND INDEX OF PLANT PERFORMANCE WORKING PARTY PAPERS 1978/79	UNSPECIFIED	1979	FRDC/PPWP/P(79)232	AEE WINFRITH	PRF; CFR	Index, List, Papers	List of PPWP papers published between 1977 and 1978, in chronological order. Includes reference numbers.	Detailed list of key reports associated with Core Physics and the Plant Performance Working Party
PPWP-P79-263.pdf	A REVIEW OF ZEBRA FOR 1978/79	SANDERS JE	1979	FRDC/PPWP/P(79)263	AEE WINFRITH	PRF; CFR	ZEBRA, Annular Core, BIZET, BZA, BZB, BZC	This report is a key reference associated with Calculational methods. The review of the ZEBRA programme. This contains results and discussion relating the BIZET project. Discussion includes the BZD assembly which was proposed in the previous year (1978), as well as calculations with more conventional cores: BZA, and BZB.	Core Layout of Assembly BZD/1A and BZB/1
RMD92-236-REP.pdf	RELIABILITY DATA COLLECTION AND RELIABILITY ASSESSMENT METHODS FOR FAST REACTOR SYSTEMS - INTERIM REPORT	STEPHENSON J; GIBSON IK	1992	SRD-RMD92-236-REP(APP)	SRD	PFR; KNK II	Reliability	The appendices of the full report, and includes detailed summaries on OPEX, and Safety Cases including: Sodium Leaks and Fires, and Rod Failures for both PFR and KNK II Fast Reactors.	OPEX, Safety
ROUO-1.pdf	RECORD OF UNUSUAL OCCURRENCES	UNSPECIFIED	1993	UNREFERENCED	AEA Technology	PFR	ROUO; OPEX	Record of Unusual Occurrences from 01.01.93 – 28.06.93.	OPEX
ROUO-2.pdf	RECORD OF UNUSUAL OCCURRENCES	UNSPECIFIED	1990	PFR/SWP/P(91)24	AEA Technology	PFR	ROUO; OPEX	Record of Unusual Occurrences from 19.11.89 – 31.12.90	OPEX
ROUO-3.pdf	RECORD OF UNUSUAL OCCURRENCES	UNSPECIFIED	1991	PFR/SWP/P(92)50	AEA Technology	PFR	ROUO; OPEX	Record of Unusual Occurrences from 04.01.91 – 25.12.91	OPEX
ROUO-4.pdf	RECORD OF UNUSUAL OCCURRENCES	UNSPECIFIED	1992	RS/SWP/P(92)50	AEA Technology	PFR	ROUO; OPEX	Record of Unusual Occurrences from 04.01.92 – 21.10.92	OPEX

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
SWP-P77-46.pdf	CONTROL ROD DRIVE INCIDENT AT PFR	GRAY J; BROOMFIELD AM	1977	PFR/SWP/P(77)46	DNPDE	PFR	OPEX, Control Rod, Incident	This report is a key reference associated with Control Rods. Control Rod Drive incident report, which describes an occurrence on 31 July 1977 when Control Rods continued to Raise after the operator has taken his finger off the 'raise' button.	Incident Summary – valuable for OPEX.

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
135	CFR - DIAGRID HYDRAULIC ANALYSIS USING THE PHOENICS CODE	BROWN GA;SCRIVEN J		CTWG/P(83)34	UKAEA	CFR	Diagrid, Phoenics Code	This report is a key reference associated with the Diagrid	Calculated Analysis
279	NATURAL CONVECTION FLOW AND HEAT TRANSFER EXPERIMENTS IN THE HARWELL 1/12TH SCALE WATER-FILLED PLENUM RIG	COWAN GH	1983	HTFS/WZ/NNC/PFW248;CBG/P(83)535	NNC	CDFR	Convection, Heat Transfer, 1/12th, Plenum	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Experimental Results and analysis of results
345	CDFR 1/15TH SCALE HOT POOL MODEL: SUMMARY OF RESULTS FROM THE INITIAL TEST PROGRAMME ON THE REFERENCE DESIGN WORK PACKAGE 382M4/5	HAWKINS KS;KENWORTHY G	1983	CBG/P(83)613	NNC	CDFR	Hot Pool, 1/15th	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated Results and Analysis
646	CDFR - TRANSIENT BEHAVIOUR FOLLOWING A REACTOR TRIP FROM 75% THERMAL LOAD (STRATIFIED HOT POOL ASSUMPTIONS) T9	HADDAD H	1983	TN/P(83)583	NNC	CDFR	Transient, Trip, Thermal Load, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
647	CDFR - TRANSIENT BEHAVIOUR FOLLOWING A REACTOR TRIP FROM 75% THERMAL LOAD (SEMI-MIXED HOT POOL ASSUMPTIONS) T10	HADDAD H	1983	TN/P(83)584	NNC	CDFR	Transient, Trip, Thermal Load, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
688	CDFR - REACTOR TRIP FROM A THREE SECONDARY CIRCUIT, ONE TURBINE CONDITION (STRATIFIED HOT POOL ASSUMPTIONS) T10	HADDAD H	1983	TN/P(83)646	NNC	CDFR	Trip, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
689	CDFR - REACTOR TRIP FROM A THREE SECONDARY CIRCUIT, ONE TURBINE CONDITION (SEMI-MIXED HOT POOL ASSUMPTIONS) T11	HADDAD H	1983	TN/P(83)647	NNC	CDFR	Trip, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
1033	CDFR ROOF COOLING JET HEAT TRANSFER TEST-RIG MEASUREMENTS FOR PHASE I AND II	STEVENS AW;FITZGERALD JAG	1984	RES.INT.2740	NNC	CDFR	Roof Cooling, Jet, Heat Transfer	This report is a key reference associated with Roof Cooling	Experimental Results from specially designed rigs
1035	CDFR HOT POOL MODEL: TESTING OF MODIFIED IHX INLET CONFIGURATION	FLETCHER B	1983	RES.INT.2749	NNC	CDFR	Hot Pool, IHX	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated Results and Analysis
1041	CDFR 1/15TH SCALE HOT POOL WATERMODEL. RESULTS OF INITIAL TEST PROGRAMME ON THE REFERENCE DESIGN	FLETCHER BT;SMITH MR	1983	RES.INT.2641	NNC	CDFR	Hot Pool, 1/15th	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated Results and Analysis
1074	PFR EVAPORATOR PEAK HEAT FLUX - FURTHER CALCULATIONS	MCCRINDLE D;JUDD AM	1983	EDCC/P(83)63	DNE	PFR	Two/ Three Circuit Operation, Plugged Tubes	This report is a key reference associated with Miscellaneous Measurements. This note extends the study presented in the EDCC/P(83)55 document, using the same simplified calculation method, to investigate the output possible from two circuits, the effect of different SSP speed restrictions in	Two/ Three Circuit Operation, Plugged Tubes
1122	PRIMARY CIRCUIT THERMAL HYDRAULICS DESIGN REVIEW HOT POOL INTRODUCTORY NOTES AND EXPERIMENTAL RESULTS	FLETCHER BT;SMITH MR;MITCHELL CH	1984	FRPDC/P(84)22	NNC	CDFR	Thermal Hydraulics, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
1139	CFR DIAGRID HYDRAULIC ANALYSIS USING THE PHOENICS CODE	BROWN GA	1984	FR/THSG/P(84)17;ADDENDUM	UKAEA	CFR	Diagrid, Phoenics Code	This report is a key reference associated with the Diagrid	Calculated Analysis
1223	TURBULENT NATURAL CONVECTION HEAT TRANSFER CAVITIES WITH VARIOUS FLUIDS: WITH SPECIAL ATTENTION TO CERROBASE	QUARINI GL	1983	AERE-G-2580;HTFS/PFW227/P12/1983;PTWG/P(83)16	AERE	N/A	Convection, Heat Transfer	This report is a key reference associated with Hot Pool References and Cerrobase	Calculations and analysis of results
1551	CDFR- TRANSIENT BEHAVIOUR FOLLOWING A REACTOR TRIP FROM 60% THERMAL LOAD (SEMI MIXED HOT POOL ASSUMPTIONS) T12	HADDAD H	1984	TN/P(84)716	NNC	CDFR	Transient, Trip, Thermal Load, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
1557	CDFR 1/15TH SCALE HOT POOL WATER MODEL. RESULTS OF VELOCITY MEASUREMENTS IN THE RADIAL INLET FLOW TO THE POOL AS A FUNCTION OF ABOVE CORE STRUCTURE FLOW BAFFLE GEOMETRY	SMITH MR;FLETCHER BT	1984	RES.INT.2808	NNC	CDFR	Velocity Measurements, Radial Inlet Flow, ACS	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results for required topic
1557	CDFR 1/15TH SCALE HOT POOL WATER MODEL. RESULTS OF VELOCITY MEASUREMENTS IN THE RADIAL INLET FLOW TO THE POOL AS A FUNCTION OF ABOVE CORE STRUCTURE FLOW BAFFLE GEOMETRY	SMITH MR;FLETCHER BT	1984	RES.INT.2808	NNC	CDFR	Hot Pool, 1/15th, Radial, Above Core Structure	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
2034	CDFR HOT POOL GAS ENTRAINMENT	COLLINSON AE	1985	FR/THSG/P(85)45;ND-M 2968(R)	Nuclear Power Development Labratories	CDFR	Hot Pool, Entrainment	This report is a key reference associated with Hot Pool References and Free Surface	Calculations and analysis of results
2093	AN EVALUATION OF THE STEADY STATE FLOW EXCHANGE BETWEEN THE CDFR HOT POOL AND INTERMEDIATE PLENUM FOR A VARIETY OF PLENUM DESIGNS (PROJECT NO. C41/EB37)	DAVIDSON J	1984	RES.INT.2797	NNC	CDFR	Steady State, Hot Pool, Plenum	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
2217	CDFR THERMAL HYDRAULIC CODES IN THE CORE AREA	PEARSON JF	1983	PPWG/P(83)3	n/a	DFR	Thermal Hydraulics Codes, Core	This report is a key reference associated with Calculational Methods within the Thermal Hydraulics area	Review of calculational codes used within the Thermal Hydraulics area
2403	MEASUREMENTS OF ZINC CONCENTRATION ENHANCEMENT IN THE ROOF CONDENSATE OF A SODIUM VAPOUR TRANSPORT RIG	ROBERTS DN	1985	AERE 11502;MWG/CSG/P(85)35;MWG/P(85)123	UKAEA	LMFBR	Zinc Concentration, Sodium Vapour	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
2417	INFLUENCE OF NITROGEN IN SODIUM AND COVER GAS ENVIRONMENTS ON THE TENSILE PROPERTIES OF TYPE 300 STAINLESS STEELS	JEFFCOAT PJ;KINGHAM MC	1985	NDM-2895;FRDCC/MWG/P(85)109;MWG/CSG/P(85)31	UKAEA	N/A	Nitrogen, Sodium, Cover Gas, Tensile, Stainless Steel	This report is a key reference associated with Cover Gas Theory	Calculated Data
2548	CDFR 1/15 SCALE HOT POOL WATER MODEL. PROPOSAL FOR TEST PROGRAMME TO COMPLETE INVESTIGATION OF THE REFERENCE DESIGN THERMAL HYDRAULIC PERFORMANCE	SMITH MR	1985	FREWG/P(85)104	NNC	CDFR	Hot Pool, 1/15th, Thermal Hydraulic	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
2697	A SURVEY OF THE R&D PROGRAMME IN CONNECTION WITH HEAT AND MASS TRANSFER PHENOMENA IN THE FAST REACTOR COVER GAS AREA	DAVIDSON J		FR/THSG/P(85)78	NNC	NNC	Programme, Heat and Mass Transfer	This report is a key reference associated with Cover Gas Programme	Review of the programme and work completed
2698	EXPERIMENTS TO STUDY THE COVER GAS PERFORMANCE: 1. 60CM SODIUM RIG 2. AIR/WATER AEROSOL RIG	QUARINI G		FR/THSG/P(85)77	UKAEA	LMFBR	Cover Gas	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
2699	AEROSOL/COVER GAS WORK REPORTS			FR/THSG/P(85)76	N/A	N/A	Aerosol, Cover Gas	This report is a key reference associated with Cover Gas Programme	Summary of all related reports
2716	RADIANT HEAT TRANSFER THROUGH THE COVER GAS OF A SODIUM COOLED FAST REACTOR	TRUELOVE JS		AERE-R-9345	UKAEA	N/A	Heat Transfer, Cover gas, Sodium	This report is a key reference associated with Cover Gas Theory	Calculated Data
2717	HEAT AND MASS TRANSFER TO THE COOLED ROOF AND WALLS OF A SHORT AIR-FILLED CYLINDER FROM TWO CONCENTRIC POOLS OF WATER	AINSWORTH RW;RALPH JC;ROBERTS DM		AERE-R-9342	UKAEA	N/A	Heat and Mass Transfer, cooled roof	This report is a key reference associated with Cover Gas Theory	Calculated Data
2718	TRANSPORT OF SODIUM THROUGH THE COVER GAS OF A SODIUM COOLED FAST REACTOR	CLEMENT CF;HAWTIN P		AERE-R-7513	UKAEA	N/A	Sodium, Cover Gas,	This report is a key reference associated with Cover Gas Theory	Calculated Data
2719	FREE CONVECTION HEAT TRANSFER ACROSS GAS FILLED ENCLOSED SPACES BETWEEN A HOT LIQUID SURFACE AND A COOLED ROOF	RALPH JC;SUGARMAN P		AERE-R-8244	UKAEA	N/A	Convection, Heat Transfer, Cooled Roof	This report is a key reference associated with Cover Gas Theory	Calculated Data
2720	SODIUM AEROSOL PRODUCTION IN ARGON	CLEMENT CF;TAYLOR AJ	1984	AERE-G-3154;FR/THSG/P(85)75	UKAEA	N/A	Sodium Aerosol, Argon	This report is a key reference associated with Cover Gas Theory	Calculated Data
2721	THE DESIGN OF THE ANNULUS RIG USED TO STUDY HEAT AND MASS TRANSFER IN VERTICAL ANNULI WITH A HEATED BASE	AINSWORTH RW;HALLAS NJ;TUNSTALL L	1984	AERE-G-3346;FR/THSG/P(85)73	UKAEA	LMFBR	Heat and Mass Transfer	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
3074	THE STRATIFIED HOT POOL PLUME MODEL	ROBERTS MA	1985	TN/P(85)764	NNC	CDFR	Hot Pool, Plume	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Description of method and calculations
4044	CDFR - TRANSIENT BEHAVIOUR FOLLOWING A REACTOR TRIP FROM 51.5% THERMAL LOAD (STRATIFIED HOT POOL ASSUMPTIONS) T7	HADDAD H	1983	TN/P(83)579	NNC	CDFR	Transient, Trip, Thermal Load, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
4046	HEAT TRANSFER EXPERIMENTS IN A 10 CM ANNULUS RIG	AINSWORTH RW;HALLAS NJ	1983	CBG/P(83)514;SPS/PFW/244	UKAEA	LMFBR	Heat Transfer	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
4097	CONVECTION IN THE CDFR INTERMEDIATE PLENUM: STEADY-STATE UNIFORM HEAT FLUX EXPERIMENTS USING A 1/10TH SCALE 2D MERCURY RIG	BOOTH DA;GLOVER PA;SHERIFF N	1985	NDR-1214	UKAEA	DFR	Convection, Steady State, Plenum	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
4136	ASSESSMENT OF THERMAL STRESSES IN THE ABOVE CORE STRUCTURE	LUCK GN	1985	ANS TECHNICAL NOTE J543/4	Associated Nuclear Services	CDFR	Thermal Stresses, Above core structure	This report is a key reference associated with Above-Core Structure Calculations	Calculated Analysis and Description of Calculation Methods
4151	TENTATIVE METHODS OF PREDICTION AND PRELIMINARY EXPERIMENTS TO AID ASSESSMENT OF PLENUM FLOW AND HEAT TRANSFER IN SUPPORT OF THE CFRX DESIGN STUDY	COWAN GH;LOVEGROVE PC;QUARINI GL		HTFS/PFW/185/P16	AERE	CDFR	Plenum Flow, Heat Transfer, CFRX	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Description of experimental methods and experiments to be completed
4157	PRELIMINARY NATURAL CONVECTION HEAT TRANSFER IN VERTICAL SINGLE CERROBASE FILLED CELLS OF HIGH ASPECT RATIOS	COWAN GH;LOVEGROVE PC;QUARINI GL	1980	HTFS/PFW/209/P3;AERE-G-1768	AERE	N/A	Convection, Heat Transfer, Cerrobase, Aspect Ratio	This report is a key reference associated with Hot Pool References and Cerrobase	Calculations and analysis of results
4160	HARWELL LARGE SCALE WATER RIG STAGE 4 EXPERIMENTS: TURBULENT NATURAL CONVECTION HEAT TRANSFER MEASUREMENTS IN A CAVITY OF ASPECT RATIO 6	BIRCHENOUGH PM;COWAN GH;LOVEGROVE PC	1983	HTFS/PFW/217/P1	AERE	CDFR	Convection, Heat Transfer, Cavity, Aspect Ratio	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Experimental Results and analysis of results
4170	A REVIEW OF THE PREDICTION OF NATURAL CONVECTION FLOW AND HEAT TRANSFER IN VERTICAL SINGLE AND MULTIPLE CAVITIES USING THE HARWELL COMPUTER CODE IOTA	COWAN GH		HTFS/PFW/185/P10	AERE	CDFR	Convection, Heat Transfer, Cavities, IOTA	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Review of Calculational Methods
4171	THERMAL PERFORMANCE COMPUTATIONS ON WIDE CHANNEL FORWARD AND REVERSE FA NUMERICAL STUDY OF NATURAL CONVECTION HEAT TRANSFER IN MULTIPLE CAVITIES PART 1 AIR	JONES IP		HTFS/PFW/185/P23	AERE	CDFR	Thermal, Convection, Heat Transfer, Cavities	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
4224	THEORETICAL ANALYSIS OF THE FLOW BETWEEN THE TOP OF THE CORE AND THE ACS BAFFLE USING THE PHOENICS COMPUTER CODE	SMITH AG	1985	TN/P(85)787;THSG/P(85)122 ADDENDUM	NNC	N/A	Phoenics	This report is a key reference associated with ACS Core Outlet	Calculated Data and description of the Calculation Methods
4226	VICSEN CALCULATION OF FLOW AND TEMPERATURE FIELDS WITHIN THE CDFR ABOVE CORE STRUCTURE (PROJECT No.C49/93D/03)	HULME G	1985	RES.INT.2867;FR/THSG/P(85)124	NNC	CDFR	VICSEN, Flow, Temperature, Above Core Structure	This report is a key reference associated with Above-Core Structure Calculations	Calculated Analysis and Description of Calculation Methods
4236	THE STRATIFIED HOT POOL MODEL MASS-FLOW VERSION	ROBERTS MA	1985	TN/P(85)791	NNC	CDFR	Hot Pool, Mass, Flow	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Description of method and calculations
4400	PHOENICS CALCULATIONS OF FLOW INTERACTION BETWEEN CDFR HOT POOL AND INTERMEDIATE PLENUM	HULME G	1985	FR/THSG/P(85)136	NNC	CDFR	Phoenics, Flow, Hot Pool, Plenum	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
4426	SLOSHING MODES OF THE CDFR HOT POOL FREE SURFACE AND INTERNAL GRAVITY WAVES. PROJECT NO. C41/EB31	SINAI YL	1985	FR/THSG/P(85)146;RES INT 2745 ISSUE A	NNC	CDFR	Hot Pool, Free Surface, Gravity Waves	This report is a key reference associated with Hot Pool References and Free Surface	Calculations and analysis of results
4894	CDFR - DIAGRID HYDRAULIC ANALYSIS USING THE PHOENICS CODE.	BROWNG A;PHELPS PJ		FR/THSG/P(85)152	UKAEA	CFR	Diagrid, Phoenics Code	This report is a key reference associated with the Diagrid	Calculated Analysis
5202	VICSEN PREDICTIONS OF THE 1/15th SCALE CDFR HOT POOL USING A HIGHER-ORDER UPWIND-DIFFERENCING SCHEME. (PROJECT No.C49/93D/03	HULME G		RES INT 2894 ISSUE A;FR/THSG/P(85)158	NNC	CDFR	VICSEN, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
5310	FAST REACTOR GAS ENTRAINMENT STUDIES. PROPOSAL FOR A 1/15 SCALE HOT POOL WATER MODEL	SMITH MR	1985	FREWG/P(85)190;RES.INT 2900	NNC	CDFR	Hot Pool, Entrainment	This report is a key reference associated with Hot Pool References and Free Surface	Calculations and analysis of results. Calculational Methods
5314	PROPOSED STUDIES IN THE HARWELL ACTIVE MASS TRANSFER LOOP (AMTL) OF RADIOISOTOPE TRANSPORT FROM A HOT SODIUM POOL THROUGH A COVER GAS TO A COOLED ROOF SURFACE.	NEWSON IH	1985	FREWG/P(85)192;SCWG/P(86)63	NNC	LMFBR	Mass Transfer, Radioisotope Transport, Hot Sodium Pool, Cover Gas	This report is a key reference associated with Cover Gas Programme	Description of experiments to be performed.
5318	60 CM WATER/AIR RIG FOR STUDYING HEAT AND MASS TRANSPORT IN THE COVER GAS	QUARINI GL;TIERNEY MJ	1985	FREWG/P(85)191	UKAEA	LMFBR	Heat and Mass Transfer	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
5325	SOME COMMENTS AND GUIDELINES ON THE USE OF THE MEASURED HEAT TRANSFER COEFFICIENTS IN THE DESIGN OF THE CDFR ROOF JET COOLING SYSTEM	AYTEKIN A;STEVENS AW	1985	THSG/P(84)19 ADDENDUM 1	NNC	CDFR	Roof Cooling, Jet, Heat Transfer	This report is a key reference associated with Roof Cooling	Description of specific Coefficients used within Experimental/Calculated analysis
5510	INVESTIGATION INTO SODIUM AEROSOL GENERATION AND ITS - EFFECT ON RADIANT HEAT TRANSFER IN FAST REACTORS	JACKSON JD;AXCELL BP		FREWG/P(85)206	Nuclear Engineering Development	N/A	Sodium aerosol, Heat Transfer	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
5642	COMMENTS CONCERNING FRWG/P(85)206 (INVESTIGATION INTO SODIUM AEROSOL GENERATION AND ITS EFFECT ON RADIANT HEAT TRANSFER IN FAST REACTORS)	DAVIDSON J		FREWG/P(86)226	FREWG	N/A	Sodium aerosol, Heat Transfer	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
5653	PHOENICS CALCULATIONS OF THE INTERACTION BETWEEN HOT POOL AND INTERMEDIATE PLENUM IN A CDFR REACTOR TRIP TRANSIENT C49/93D/03/02	HULME G		THSG/P(86)190	NNC	CDFR	Phoenics, Hot Pool, Plenum, Trip, Transient	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
5671	A PROPOSAL FOR AN EXPERIMENT TO STUDY THE INTER-WRAPPER FLOW AND GAS ENTRAINMENT PROBLEMS	BETTS C;COLLINSON AE		FREWG/P(86)223	Nuclear Power Development Labratories		Inter-Wrapper	This report is a key reference associated with the Inter-Wrapper Flow Experiments	Experimental Analysis
5835	CDFR 1/15TH SCALE HOT POOL WATER MODEL (REFERENCE DESIGN) RESULTS OF TEST PROGRAMME TO DETERMINE THE THERMAL RESPONSE OF THE HOT POOL DURING SIMULATED REACTOR TRIPS FOR TWO CIRCUIT OPERATION (PROJECT NO	SMITH MR;FLETCHER BT		RES.INT 2914;FR/THSG/P(86)200	NNC	CDFR	Hot Pool, 1/15th, Reactor Trip	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
5868	CDFR 1/15 SCALEHOT POOL WATER MODEL(REFERENCE DESIGN) RESULTS OF STATIC PRESSURE MEASUREMENTS AROUND THE MAJOR STANDPIPES IN SUPPORT OF THE DEVELOPMENT OF AN HYDRAULIC LINKAGE WITH THE INTERMEDIATE	SMITH MR;FLETCHER BT		RES INT 2825;FR/THSG/P(86)201	NNC	CDFR	Hot Pool, 1/15th, Pressure, Standpipes, Hydraulics, Plenum	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
5869	CDFR 1/15 SCALE HOT POOL WATER MODEL(REFERENCE DESIGN) RESULTS OF TEST PROGRAMME TO DETERMINE THE THERMAL RESPONSE OF THE COOLANT IN THE HOT POOL DURING SIMULATED REACTOR TRIPS FROM 60% POWER(PROJECT NO	SMITH MR;FLETCHER BT		RES.INT 2913;FR/THSG/P(86)199	NNC	CDFR	Hot Pool, 1/15th, Thermal, Coolant, Reactor Trips	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
5870	CDFR 1/15 SCALE HOT POOL WATER MODEL(REFERENCE DESIGN) RESULTS OF TEST PROGRAMME TO DETERMINE THE THERMAL RESPONSE DURING SIMULATED REACTOR TRIPS FOR THREE CIRCUIT OPERATION(PROJECT NO C49/02/D3010	SMITH MR;FLETCHER BR		RES.INT 2826;FR/THSG/P(86)197	NNC	CDFR	Hot Pool, 1/15th, Thermal, Reactor Trips	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
5871	CDFR 1/15 SCALE HOT POOL WATER MODEL(REFERENCE DESIGN) RESULTS OF TEST PROGRAMME TO DETERMINE THE THERMAL RESPONSE DURING SIMULATED LOSS OF AC SUPPLIES TRIPS(PROJECT NO C49/02/D3010	SMITH MR;FLETCHER BT		RES.INT 2878;FR/THSG/P(86)198	NNC	CDFR	Hot Pool, 1/15th, Thermal, Reactor Trips	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
5877	INVESTIGATION OF FLOW PATTERN AND HEAT TRANSFER AT THE UNDER-DECKPLATE FACE IN THE COLD POOL REPORT NO B49 661			FR/THSG/P(86)193	Lucas Aerospace	CDFR	Flow Pattern, Heat Transfer, Cold Pool	This report is a key reference associated with Hot Pool References and Cold Pools	Calculated Data and Results. Analysis is also included
5922	PROPOSED PROGRAMME OF WORK ON THE 60 CMS SODIUM RIG (SONAR)FOR THE YEAR 1/4/86 TO 31/3/87	COSTIGAN G;DAVIDSON J	1986	FREWG/P(86)245	NNC	LMFBR	Programme, SONAR	This report is a key reference associated with Cover Gas Programme	Description of work to be completed

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
5934	NOTES PREPARED FOR A REVIEW OF THE ABOVE SODIUM INSULATION/COVER GAS TECHNOLOGY, SEPTEMBER 1985	MITCHELL CH	1985	FREWG/P(85)182;TN/P(85)818	NNC	N/A	Sodium Insulation, Cover Gas	This report is a key reference associated with Cover Gas Programme	Technical commentary of review
6027	EXTENDED ANALYSIS OF THE FLOW BETWEEN THE TOP OF THE CORE AND THE ACS BAFFLE USING THE PHOENICS COMPUTER CODE.	SMITH AG	1986	FRD/TN/P(86)874	NNC	N/A	Phoenics	This report is a key reference associated with ACS Core Outlet	Calculated Data and description of the Calculation Methods
6085	EXPERIMENTAL WORK ON THE 1/25-SCALE, WATER-FILLED, THREE-DIMENSIONAL MODEL OF TH INTERMEDIATE PLENUM AND HOT POOL, (OTTER), TO INVESTIGATE THE EFFECTS OF COUPLING BETWEEN THE POOL AND PLENUM ON THE THERMAL	QUARINI GL	1986	PFW/HTFS(85)07	NNC	CDFR	1/25, Plenum, Hot Pool, Coupling, Plenum, Thermal Performance	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Experimental Results and Analysis
6103	CDFR 1/15 SCALE HOT POOL WATER MODEL (REFERENCE DESIGN).RESULTS OF TEST PROGRAMME TO DETERMINE THE THERMAL RESPONSE DURING SIMULATED LOSS OF AC SUPPLIES TRIPS. (PROJECT No.C49/02/D3010)	SMITH MR;FLETCHER BT	1986	RES.INT.2878	NNC	CDFR	Hot Pool, 1/15th, Thermal, Reactor Trips	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
6152	60CM SODIUM VAPOUR TRANSPORT RIG 1)FINAL COMMISSIONING AND "DRY" HEAT TRANSFER.	ROBERTS DN	1986	AERE G 3830; FR/THSG/P(86)210.	UKAEA	LMFBR	Sodium Vapour, Heat Transfer	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
6162	CDFR HOT POOL DEVELOPMENT PROGRAMME - A SUMMARY	HAWKINS KS	1986	FREWG/P(86)259	NNC	CDFR	Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Review of the work completed and the work to be completed associated with the Hot Pool and CDFR
6178	CDFR 1/15TH SCALE HOT POOL WATER MODEL (REFERENCE DESIGN). RESULTS OF TEST PROGRAMME TO DETERMINE THE THERMAL RESPONSE OF THE COOLANT IN THE HOT POOL DURING SIMULATED REACTOR TRIPS FROM 60% POWER.(PROJECT NO	SMITH MR;FLETCHER BT	1986	2913.	NNC	CDFR	Hot Pool, 1/15th, Thermal	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
6203	TRANSIENT TEMPERATURE RESPONSE OF A FAST REACTOR ROOF, WITH OPEN ANNULUS PENETRATIONS, TO A LOSS OF ACTIVE COOLING.	HOPKINS J	1986	FR/THSG/P(86)227	NNC	N/A	Transient Temperature, open annulus	This report is a key reference associated with Roof Cooling	Calculated Data
6208	STUDIES ON AEROSOL FORMATION AND GROWTH	CLEMENT CF;COSTIGAN G	1986	THSG/P(86)219	UKAEA	N/A	Aerosol	This report is a key reference associated with Cover Gas Theory	Calculated Data
6216	STUDIES ON THE EFFECTS OF AEROSOLS ON HEAT TRANSFER THROUGH THE COVER GAS	CLEMENT CF;COSTIGAN G	1986	THSG/(86)220	UKAEA	N/A	Aerosols, Heat Transfer, Cover Gas	This report is a key reference associated with Cover Gas Theory	Calculated Data
6337	CDFR 1/15 TH SCALE HOT POOL WATER MODEL (REFERENCE DESIGN). RESULTS OF TEST PROGRAMME TO DETERMINE THE THERMAL RESPONSE OF THE HOT POOL DURING SIMULATED REACTOR (PROJECT No. C49/02D/3010).	SMITH MR;FLETCHER BT	1986	RES INT 2914	NNC	CDFR	Hot Pool, 1/15th, Thermal	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
6344	DECAY HEAT REMOVAL BY NATURAL CONVECTION: THE EFFECTS OF THE INTER-WRAPPER FLOW	LONSDALE RD	1986	FR/THSG/P(86)238	N/A	PHENIX	Decay Heat, Convection, Inter-Wrapper Flow	This report is a key reference associated with the Inter-Wrapper Flow and Natural Convection	Calculated Analysis and Description of Calculation Methods
7273	CRITICAL ANALYSIS OF THE EMISSIVITY MEASUREMENT RIG	HAQUANI	1983	RES/INT 2695	NNC	N/A	Emissivity	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7274	MEASUREMENT OF EMISSIVITY - COMPARISON TESTS WITH MANCHESTER UNIVERSITY	HAQUANI;JACKSON	1983	RES/INT 2694	NNC	N/A	Emissivity	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data. Comparison Tests
7292	DEVELOPMENT OF SODIUM EMISSIVITY RIG FINAL TEST SECTION	JACKSON;TONG	1983		Nuclear Engineering Development	N/A	Emissivity	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7295	SOME FURTHER CALORIMETRIC MEASUREMENTS OF TOTAL HEMISPHERICAL EMISSIVITY OF TYPE 316 STAINLESS STEEL	JACKSON;WHITEHEAD	1983		Nuclear Engineering Development	N/A	Calorimetric, Emissivity, Stainless Steel	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7296	MEASUREMENT OF THE EMISSIVITY OF AS-RECEIVED AND OXIDISED STAINLESS STEEL SURFACES	JACKSON;IRAVANIAN	1983		Nuclear Engineering Development	N/A	Emissivity	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7297	STAINLESS STEEL EMISSIVITY MEASUREMENTS	JACKSON;TONG;HAYDEN			Nuclear Engineering Development	N/A	Emissivity, Stainless Steel	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7298	CALORIMETRIC MEASUREMENTS OF THE TOTAL HEMISPHERICAL EMISSIVITY OF STAINLESS STEEL	JACKSON;WHITEHEAD			Nuclear Engineering Development	N/A	Calorimetric, Emissivity, Stainless Steel	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7307	EVALUATION OF SODIUM POOL EMITTANCE DATA	JACKSON;TIONG;LAM	1986		Nuclear Engineering Development	N/A	Sodium Pool, Emittance	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7308	CALORIMETRIC MEASUREMENTS OF RADIANT HEAT TRANSFER FROM FAST REACTOR FUEL CAN SAMPLES	ANDERSON;JACKSON;ROMERO;SIMMONS			Nuclear Engineering Development	N/A	Calorimetric, Heat Transfer, Fuel Can	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7309	IMPROVEMENT IN SPECTRAL DIRECTIONAL EMISSIVITY MEASUREMENT TECHNICS BY DIRECT METHODS	HEINISCH;SACADURA;QUINTO-DIEZ			Nuclear Engineering Development	N/A	Spectral, Emissivity	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Description of Experimental Methods and Improvements
7310	INFLUENCE OF OXIDATION ON THE RADIATIVE PROPERTIES OF AS A FUNCTION OF TEMPERATURE	ANE;SACADURA;STEKELOROM			Nuclear Engineering Development	N/A	Oxidation, Temperature	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7311	EXPERIMENTAL REFLECTIVITY OF MOLTEN SODIUM IN THE WAVELENGTH RANGE OF 1 TO 15 UM.	BLAKE	1981		Nuclear Engineering Development	N/A	Reflectivity, Molten Sodium, Wavelength	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7313	MEASUREMENT OF LIQUID METAL EMISSIVITY	TONG			Nuclear Engineering Development	N/A	Emissivity, Liquid Metal	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7314	DESIGN AND DEVELOPMENT OF A SODIUM POOL EMITTANCE RIG WITH FACILITIES FOR MIST REMOVAL BY A STEADY FLOW OF ARGON PURGE GAS	JACKSON;TONG			Nuclear Engineering Development	N/A	Emittance, Argon	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7323	EMISSIVITY MEASUREMENTS OF SODIUM AND SODIUM CONTAMINATED SURFACES AT MANCHESTER UNIVERSITY POSITION AS OF 31 MARCH 1984	BARNETT			Nuclear Engineering Development	N/A	Emissivity	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7325	CALORIMETRIC RIG FOR THE MEASUREMENT OF HEMISPHERICAL EMITTANCE OF CYLINDRICAL STEEL SPECIMENS				Nuclear Engineering Development	N/A	Calorimetric, Emittance, Cylindrical Steel	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7327	THE INFLUENCES OF SURFACE CONDITION ON THE TOTAL NORMAL EMISSIVITY OF STAINLESS STEEL	JACKSON;TONG;IRANIAN;HAYDEN			Nuclear Engineering Development	N/A	Emissivity, Stainless Steel	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7328	EMISSIVITY MEASUREMENTS ON TWO SODIUM CONTAMINATED FAST REACTOR FUEL PIN SAMPLES	JACKSON;LAM			Nuclear Engineering Development	N/A	Emissivity, Fuel Pin	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7329	EMISSIVITY MEASUREMENTS AT MANCHESTER UNIVERSITY	GENTRY			Nuclear Engineering Development	N/A	Emissivity, At Manchester	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7330	EMISSIVITY VALUES FROM MEASUREMENTS OF REFLECTIVITY	JACKSON;TONG		E/260/21	Nuclear Engineering Development	N/A	Emissivity, Reflectivity	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
7331	MEASUREMENTS OF THE EMITTANCE OF A SHALLOW POOL OF LIQUID SODIUM AS IT IS EVAPORATED OFF A STAINLESS STEEL SURFACE AT TEMPERATURE OF 450oC	JACKSON;LAM			Nuclear Engineering Development	N/A	Emittance, Sodium, Stainless Steel	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7332	SIMULATION OF THE EFFECT OF DROPWISE DEPOSITION OF SODIUM ON A SURFACE USING A PRESS-FORMED, ELECTROPOLISHED, ALUMINIUM SPECIMEN	JACKSON;ROMERO	1985		Nuclear Engineering Development	N/A	Dropwise, Deposition, Sodium	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7333	THE EFFECT OF SURFACE FINISH AND SURFACE CONDITION ON THE EMISSIVITY OF TYPE 316 STAINLESS STEEL	JACKSON;ROMERO; NORRIS	1985		Nuclear Engineering Development	N/A	Emissivity, Stainless Steel	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7334	THE EMISSIVITY OF TYPE 316 STAINLESS STEEL SURFACES HAVING LARGE SCALE ROUGHNESS MACHINED ON THEM	JACKSON;ROMERO;NORRIS	1985		Nuclear Engineering Development	N/A	Emissivity, Stainless Steel	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7335	COMMISSIONING TESTS ON THE MODIFIED GLOVE BOX EMISSIVITY RIG	JACKSON;LAM	1985		Nuclear Engineering Development	N/A	Glove Box, Emissivity	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7337	MEASUREMENTS OF THE EMISSIVITY OF A SHALLOW POOL OF LIQUID SODIUM PRIOR TO AND DURING EVAPORATION	JACKSON;LAM	1985		Nuclear Engineering Development	N/A	Emissivity, Sodium	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7338	MEASUREMENTS OF THE EMISSIVITY OF A SODIUM-WETTED STAINLESS STEEL SURFACE PRIOR TO AND DURING A HEATING PROCESS LEADING TO DRY OUT DUE TO EVAPORATION OF THE SODIUM	JACKSON;LAM	1986		Nuclear Engineering Development	N/A	Emissivity, Stainless Steel	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7339	MODIFICATIONS TO THE GLOVE BOX EMISSIVITY RIG	JACKSON;LAM			Nuclear Engineering Development	N/A	Emissivity, Glove Box	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7340	MEASUREMENTS OF THE DIRECTIONAL EMITTANCE AND THE RATIO OF TOTAL HEMISPHERICAL TO TOTAL NORMAL EMISSIVITY OF A PLANE MACHINED STAINLESS STEEL SURFACE BEFORE AND AFTER OXIDATION	JACKSON;ROMERO			Nuclear Engineering Development	N/A	Emittance, Emissivity, Stainless Steel	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7341	FURTHER CALORIMETRIC MEASUREMENTS OF THE TOTAL HEMISPHERICAL EMITTANCE OF PFR FUEL CAN MATERIAL	JACKSON;ROMERO			Nuclear Engineering Development	PFR	Calorimetric, Emittance	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7342	CALORIMETRIC MEASUREMENTS OF THE TOTAL HEMISPHERICAL EMITTANCE OF PFR FUEL CAN SAMPLE	JACKSON;ROMERO;ANDERSON			Nuclear Engineering Development	PFR	Calorimetric, Emittance	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7343	SOME MEASUREMENTS OF THE EMITTANCE OF A SHALLOW POOL OF LIQUID SODIUM WITH AN OXIDE LAYER FORMING ON ITS SURFACE	JACKSON;LAM			Nuclear Engineering Development	N/A	Emittance, Sodium	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7344	DIRECTIONAL EMITTANCE OF SPECULAR REFLECTING V-GROOVES BY THE IMAGE METHOD	ROMERO			Nuclear Engineering Development	N/A	Emittance	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7345	MEASUREMENTS OF THE DIRECTIONAL EMITTANCE AND THE RATIO OF TOTAL NORMAL EMISSIVITY OF A PLANE LAPPED STAINLESS STEEL SURFACE				Nuclear Engineering Development	N/A	Emittance, Emissivity, Stainless Steel	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7347	MEASUREMENTS OF THE EMISSIVITY OF CYLINDRICAL CERAMIC SPECIMENS	JACKSON;LAM;IRAVANIAN			Nuclear Engineering Development	N/A	Emissivity, Cylindrical Ceramic	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7348	MEASUREMENTS OF THE DIRECTIONAL EMITTANCE OF A SPECULAR REFLECTING V GROOVED STAINLESS STEEL SURFACE AND COMPARISONS WITH THEORETICAL PREDICTIONS	JACKSON;ROMERO			Nuclear Engineering Development	N/A	Emittance, Stainless Steel	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7351	CDFR SARI 1. MEASUREMENT OF PLATE MATERIAL EMISSIVITY IN AIR 02/D/3043	HAQUANI			Nuclear Engineering Development	N/A	Emissivity	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7353	THE INFLUENCE OF SURFACE TREATMENT ON THE EMITTANCE OF STAINLESS STEEL	HAQUANI;FURBER			Nuclear Engineering Development	N/A	Emittance, Stainless Steel	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7505	AN EXPERIMENTAL PROGRAMME OF WORK IN CONNECTION WITH THE COVER GAS REGION OF A FAST REACTOR	DAVIDSON	1986	FREWG/P(86)299;FR/THSG/P(87)306	NNC	N/A	Programme, Cover Gas	This report is a key reference associated with Cover Gas Programme	Description of work to be completed
7655	SOME COMMENTS ON THE USE OF GULLIVER FOR U.K.BASED EXPERIMENTAL COVER GAS WORK	DAVIDSON	1986	FREWG/P(86)311	UKAEA	LMFBR	Cover Gas	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
7728	THE EFFECT OF ENTRAINMENT ON THE USE OF MARTINS CORRELATION TO PREDICT MEAN HEAT TRANSFER COEFFICIENTS FOR JET COOLING ON THE CDFR ROOF	MAYNARD M	1986	ANS/TN/543-11	NNC	CDFR	Entrainment, Heat Transfer, Jet Cooling	This report is a key reference associated with Roof Cooling	Calculated Data
7811	PROPOSED PROGRAMME OF WORK FOR THE ASTER RIG FOR THE YEAR 1/4/86 TO 31/3/87	COSTIGAN G ;DAVIDSONJ	1986	FREWG/P(86)246	NNC	LMFBR	Programme, ASTER	This report is a key reference associated with Cover Gas Programme	Description of work to be completed
7857	AN ANALYTICAL PROCEDURE FOR DETERMINING THE BEHAVIOUR OF THE COVER GAS REGION OF FAST REACTOR	DAVIDSON J		FREWG/P(86)298;FR/THSG/P(87)305	UKAEA	N/A	Cover Gas	This report is a key reference associated with Cover Gas Theory	Calculated Data
7895	A SIMPLE ANALYSIS OF CORE OUTLET AND HOT POOL TEMPERATURE IN CDFR FOLLOWING LOSS OF GRID SUPPLIES	GRADDEN DA	1981	FRD/DM/(81)382	NNC	CDFR	Core Outlet, Hot Pool, Loss of Grid	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
7915	CDFR ABOVE CORE STRUCTURE FLOW BAFFLE PROPOSALS FOR EXPERIMENTAL WORK TO STUDY A THERMAL SHOCK PROTECTION SYSTEM	BELL E		RES INT 2360	NPC	CDFR	ACS, Flow, Thermal Shock	This report is a key reference associated with ACS Vibration	Description of experimental analysis to be performed
7944	CDFR 1/15 SCALE HOT POOL WATER MODEL (REFERENCE DESIGN).RESULTS OF STATIC PRESSURE MEASUREMENTS WITHIN THE POOL AND ON THE UPPER SURFACE OF THE INTERMEDIATE PLENUM ROOF.	SMITH MR;FLETCHER BT	1984	RES INT 2751	NNC	CDFR	Hot Pool, 1/15th, Static Pressure, Plenum	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
7946	CDFR 1/15 SCALE HOT POOL WATER MODEL. RESULTS OF VELOCITY MEASUREMENTS IN THE RADIAL INLET FLOW TO THE POOL AS A FUNCTION OF ABOVE BAFFLE GEOMETRY	SMITH MR; FLETCHER BT	1984	RES INT 2808	NNC	CDFR	Hot Pool, 1/15th, Radial Flow, Baffle	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
7960	SCALING/MODELLING/DIMENSIONLESS GROUPS FOR CDFR,1/15 HOT POOL AND TIGER				N/A	CDFR	1/15, Hot Pool, Tiger	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
7962	SCALING/MODELLING/DIMENSIONLESS GROUPS FOR CDFR,1/15 HOT POOL AND TIGER ADDENDUM				N/A	CDFR	1/15, Hot Pool, Tiger	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
8003	OUTLINE OF THE SCOPE OF THE PLANNED 1/8th 90o SECTOR WATER MODEL OF THE CDFR HOT POOL AND INTERMEDIATE PLENUM	ROBINSON RGJ	1982	CBG/P(81)354	NNC	CDFR	1/8th, Hot Pool, Plenum	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Description of future work for hot pools and CDFR
8019	CDFR 1/15th SCALE HOT POOL WATER MODEL (REFERENCE DESIGN)RESULTS OF TEST PROGRAMME TO DETERMINE THE THERMAL RESPONSE OF THE COOLANT IN THE HOT POOL DURING SIMULATED REACTOR TRIPS FROM 60% POWER	SMITH MR;FLETCHER BT	1986	RES INT 2913	NNC	CDFR	Hot Pool, 1/15th, Reactor Trip	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
8025	A NOTE ON THE TRANSIENT RESPONSE OF THE CDFR HOT POOL AND INTERMEDIATE PLENUM	LYALL HG	1984	TPRD/B/PS/354/M84	CEGB	CDFR	Transient, Hot Pool, Plenum	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Description of method and calculations

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
8033	TURBULENT NATURAL CONVECTION FLOW AND HEAT TRANSFER IN LARGE VERTICAL CAVITIES - HARWELL LARGE SCALE WATER RIG, STAGE 4	COWAN GH		DMC/CBG/P(81)304	NNC	CDFR	Convection, Heat Transfer, Cavities, Rig	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
8034	CDFR THERMAL HYDRAULICS - THE HARWELL LARGE SCALE WATER RIG. PROPOSAL FOR AUTOMATION OF THE TWO COLOUR LASER DOPPLER SYSTEM	COWAN GH	1981	HTFS/WS/NNC/PFW216		CDFR	Thermal Hydraulics, Laser, Doppler	This Report is a key reference associated with the Doppler Laser.	Proposal for future work associated with the LDA and further equipment
8040	TURBULENT NATURAL CONVECTION HEAT TRANSFER EXPERIMENTS IN A SINGLE VERTICAL LIQUID LEAD-BISMUTH (CERROBASE)FILLED CAVITY OF ASPECT RATIO 2:1,STAGE 1 WORK			DMC/CBG/P(81)381;HTFS/WS/NNC/PFW224	N/A	N/A	Convection, Heat Transfer, Cerrobase, Aspect Ratio	This report is a key reference associated with Hot Pool References and Cerrobase	Calculations and analysis of results
8049	USE OF THE HARWELL IOTA4 CODE TO DEVELOP TURBULENCE MODELS TO ALLOW THE PREDICTION OF TURBULENT NATURAL CONVECTION AND TURBULENT BUOYANCY INFLUENCED FLOWS AND HEAT TRANSFER IN LARGE LIQUID POOLS AND LIQUID-FILLED	COWAN G;THOMPSON C	1981	HTFS/WS/NNC/PFW219	NNC	CDFR	IOTA4, Turbulence, Convection, Buoyancy, Heat Transfer, Cavities	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
8062	TURBULENT NATURAL CONVECTION HEAT TRANSFER IN VERTICAL SINGLE WATER-FILLED CAVITIES	COWAN GH;LOVEGROVE PC;QUARINI GL			NNC	CDFR	Turbulent, Convection, Heat Transfer, Cavities	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
8080	NATURAL CONVECTION FLOW AND HEAT TRANSFER EXPERIMENTS IN THE HARWELL 1/12th SCALE WATER-FILLED PLENUM RIG	COWAN GH;LOVEGROVE PC	1982	DMC/CBG/P(82)406	NNC	CDFR	Convection, Heat Transfer, 1/12th, Plenum	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
8089	TRANSIENT RESULTS AND PLOTS. THE FOLLOWING PAGES CONTAIN TRANSIENT HOT POOL RESULTS AND PLOTS	FOSTER I	1984		NNC	CDFR	Transient, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
8090	CONVERGED HOT POOL RESULTS AND PLOTS FOR PROJECT 477(NNC LTD)	FOSTER I	1983		N/A	CDFR	Hot Pool, 477	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
8091	477:HOT POOL. COMPARISON OF RADIAL VELOCITY PROFILES AROUND CORE OUTLET WINDOW	FOSTER I	1983		N/A	CDFR	477, Hot Pool, Radial Velocity, Core Outlet	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
8094	STEADY-STATE HOT POOL RESULTS AND PLOTS FOR PROJECT 477 (NNC LTD)	FOSTER I	1984		N/A	CDFR	Hot Pool, 477	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
8105	EXPERIMENTAL WORK ON THE 1/25 SCALE, WATER-FILLED, THREE-DIMENSIONAL MODEL OF THE INTERMEDIATE PLENUM AND HOT POOL,(OTTER),TO INVESTIGATE THE EFFECTS OF COUPLING BETWEEN THE POOL AND PLENUM ON THE THERMAL	QUARINI GL	1986	HTFS/PFW/85/07	NNC	CDFR	1/25, Plenum, Hot Pool, Coupling, Plenum, Thermal Performance	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Experimental Results and Analysis
8106	HEAT TRANSFER MEASUREMENTS IN A LIQUID METAL (CERROBASE) FILLED VERTICAL CAVITY	PURSLOW B;QUARINI G;LOVEGROVE P			NNC	N/A	Heat Transfer, Cerrobase	This report is a key reference associated with Hot Pool References and Cerrobase	Experimental Results and analysis of results
8113	FOCS3D HOT POOL STUDY				NNC	CDFR	FOCS3D, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Description of method and calculations
8133	TURBULENT NATURAL CONVECTION HEAT TRANSFER IN LARGE VERTICAL CAVITIES STAGE 1	COWAN GH		DMC/CBG/P(78)149	NNC	CDFR	Turbulent, Convection, Heat Transfer, Cavities	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
8138	TURBULENT NATURAL CONVECTION HEAT TRANSFER IN LARGE VERTICAL CAVITIES	COWAN GH		DMC/CBG/P(79)179	NNC	CDFR	Turbulent, Convection, Heat Transfer, Cavities	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
8142	AN APPRAISAL OF THE LASER DOPPLER ANEMOMETER WORK AND THE PRELIMINARY PROPOSALS FOR LDA EQUIPMENT FROM THE FEASIBILITY STUDIES ON THE HARWELL LARGE SCALE WATER RIG	RICHARDS EW		HTFS/PFW187/P22/1979	N/A	N/A	Laser Doppler, Anemometer,	This Report is a key reference associated with the Doppler Laser.	Review of equipment required for the Laser Doppler Anemometer (LDA). Justification and studies included
8144	A PRELIMINARY EXPERIMENT ON THE USE OF A PROBE FOR LASER DOPPLER MEASUREMENTS IN THE HARWELL LARGE SCALE WATER RIG	RICHARDS EWT		HTFS/PFW200/P1/1979	N/A	N/A	Probe, Laser, Doppler, Water Rig	This Report is a key reference associated with the Doppler Laser.	Experimental Data from the LDA
8164	PRELIMINARY EXPERIMENTS USING THE TWO COLOUR LASER DOPPLER SYSTEM ON THE HARWELL LARGE SCALE WATER RIG	RICHARDS EWT	1980	HTFS/PFW204/P1/1980	N/A	N/A	Probe, Laser, Doppler, Water Rig	This Report is a key reference associated with the Doppler Laser.	Experimental Data from the LDA
8169	TURBULENT NATURAL CONVECTION FLOW AND HEAT TRANSFER IN LARGE VERTICAL CAVITIES	COWAN G		DMC/CBG/P(79)212	NNC	CDFR	Turbulent, Convection, Heat Transfer, Cavities	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
8185	PRELIMINARY NOTE ON THE CALIBRATION OF HEAT FLUX METERS ON THE TRANSIENT GENERIC RIG(TIGER)	BIRCHENOUGH PM	-	HTFS/PFW233/P1/1983	N/A	N/A	Heat Flux Meters, TIGER	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated Results and Analysis
8197	MODELLING OFCDFR,1/15 SCALE HOT POOL & TIGER RIGS				NNC	CDFR	1/15, Hot Pool, Tiger	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculation methods and results
8848	STUDIES ON AEROSOL FORMATION AND GROWTH	CLEMENT CF;COSTIGAN G	1986	FR/THSG/P(86)219	UKAEA	N/A	Aerosol	This report is a key reference associated with Cover Gas Theory	Calculated Data
8871	PROPOSAL FOR A 1/4 SCALE 60 DEGREES SECTOR WATER MODEL TO VALIDATE VICSEN PREDICTIONS OF ACS INTERNAL FLOWS	SMITH R;HULME G	1986	RES INT 2910 ISSUE A-; FR/THSG/P(86)181	NNC	CDFR	VISCEN, ACS Internal Flow	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results for required topic
8962	SLOSHING MODES OF THE CDFR HOT POOL FREE SURFACE AND INTERNAL GRAVITY WAVES. PROJECT NO.C41/EB31	SINAI YL	1985	RES INT 2745	NNC	CDFR	Hot Pool, Free Surface, Gravity Waves	This report is a key reference associated with Hot Pool References and Free Surface	Calculations and analysis of results
9067	THE APPLICATION OF TGSL TO SOLVING THE TRANSPORT EQUATION FOR HEAT TRANSFER ACROSS LMFBR TYPE COVER GAS SPACES	WINTERS KH	1987	FR/THSG/P(87)300	UKAEA	LMFBR	TGSL, Transport Equation, Heat Transfer	This report is a key reference associated with Cover Gas Theory	Calculated Data
9070	PRELIMINARY MEASUREMENTS OF SODIUM AEROSOL CONCENTRATION AND SIZE DISTRIBUTION IN THE COVER GAS ABOVE A SODIUM POOL SUMMARY OF RESULTS OBTAINED TO DATE ON THE MUSAC PROJECT	JACKSON JD;ANDERSON A;BURNS RA;AXCELL BP		THSG/P(86)308	Nuclear Engineering Development	N/A	Sodium Aerosol, MUSAC	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
9071	THE ANALYSIS OF ANNULAR ROOF PENETRATIONS AND THEIR RELATIONSHIP TO THE COVER GAS ENVIRONMENT	BRADLEY GE;HOPKINS J		FR/THSG/P(87)309	NNC	SUPERPHENIX	Annular Roof, Cover Gas	This report is a key reference associated with Roof Cooling	Calculated Data
9079	HARWELL EXPERIMENTS RELATING TO HEAT AND MASS TRANSFER IN THE ABOVE SODIUM REGION OF LMFBRS	COSTIGAN G	1987	FR/THSG/P(87)299	UKAEA	LMFBR	Heat and Mass Transfer	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
9412	THE ASTER RIG: PRESENT POSITION AND FUTURE PROGRAMME.	DAVIDSON J;COSTIGAN G		FREWG/P(87)368	UKAEA	LMFBR	ASTER Rig	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
10123	A PROPOSAL FOR EXPERIMENTAL AND ANALYTICAL WORK REQUIRED FOR A VIBRATION ANALYSIS OF THE SPX2 ABOVE CORE STRUCTURE GRILLE AND INSTRUMENTATION TUBES	ROBINSON RGJ;WARNEFORD IP;BOKIAN A;TILLEY D;DOSTAL M		FREWG/P(87)379	NNC	SUPERPHENIX	Vibration Analysis, ACS, Grille, Instrumentation	This report is a key reference associated with ACS Vibration	Comparison between experimental and calculated results
10234	CONVECTION IN THE CDFR INTERMEDIATE PLENUM;STEADY -STATE UNIFORM HEAT FLUX EXPERIMENTS USING A 1/10TH SCALE 2D MERCURY RIG	BOOTH DA;GLOVER PA;SHERIFF N	1977	ND-R-1214(R)	UKAEA	DFR	Convection, Steady State, Plenum	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
10339	CLOSING REPORT ON AUTHORITY AGREEMENT NO IR54894 - MARCH 1985 EMISSIVITY OF DRY SODIUM CONTAMINATED SURFACES	JACKSON JD;IRAVANIAN L			Nuclear Engineering Development	N/A	Emissivity, Dry Sodium	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data

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10344	FINAL REPORT ON AUTHORITY AGREEMENT IR55530 ASSESSMENT OF FOUR RADIATION PYROMETERS	JACKSON JD;ROMERO E;IRAVANIAN L; LAM KLA	1986		Nuclear Engineering Development	N/A	Radiation Pyrometers	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
10671	SCD DOCUMENT PREDICTION OF SPX1 NATURAL CIRCULATION TEST INCLUDING THE EFFECTS OF INTER WRAPPER FLOW	THOMSON AF	1988		NNC		Inter-Wrapper Flow, Natural Circulation	This report is a key reference associated with the Inter-Wrapper Flow and Natural Convection	Calculated Analysis and Description of Calculation Methods
10736	SCD DOCUMENT PREDICTION OF PHENIX COLTEMP 111 NATURAL CIRCULATION TEST INCLUDING THE EFFECTS OF INTER-WRAPPER FLOW	THOMSON AF	1988		NNC		Inter-Wrapper Flow, Natural Circulation	This report is a key reference associated with the Inter-Wrapper Flow and Natural Convection	Calculated Analysis and Description of Calculation Methods
10747	CDFR COLD POOL 1/11.52 SCALE MODEL AN INVESTIGATION OF HEAT TRANSFER FROM THE DESK PLATE LOWER SURFACE INTO THE COLD POOL 02/D/5006	IRWIN AN	1988	B49.804	Lucas Aerospace	CDFR	Cold Pool, Heat Transfer	This report is a key reference associated with Hot Pool References and Cold Pools	Calculated Data and Results. Analysis is also included
10770	A PRELIMINARY THERMAL STRIPING SURVEY OF THE CDFR ABOVE CORE STRUCTURE WITH A PERFORATED SKIRT	TONG DKW;BAYLEY M	1986		UKAEA	CDFR	Thermal Striping, ACS, Skirt	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results for required topic
10940	A PROPOSAL FOR A 360o HOT POOL MODEL	BETTS C;PARDY A	1988	FR/THSG/P(88)360	National Research Laboratory	EFR	Hot Pool	This report is a key reference associated with Hot Pool References and EFR	Description of proposed future work
11065	ONE EIGHT SCALE HOT POOL WATER MODEL CONTINUATION OF TEST PROGRAMME APRIL 1988 - MARCH 1989	SMITH MR	1988	FREWG/P(88)406;R&D/REPORT 1148	NNC	CDFR	Hot Pool, Water Model	This report is a key reference associated with Hot Pool References and Free Surface	Calculations and analysis of results
11070	A STRATEGY FOR VALIDATING THE COMPUTATIONAL TECHNIQUES IN THE ANALYSIS OF BULK GAS ENTRAINMENT AT THE FREE SURFACE OF THE HOT POOL OF A FAST REACTOR	SINAI YL;SMITH MR	1988	FR/THSG/P(88)335;R&D REPORT 1135	NNC	CDFR	Hot Pool, Entrainment	This report is a key reference associated with Hot Pool References and Free Surface	Calculations and analysis of results
11293	SNR2 SINGLE-PLATE ROOF INS.SCHEME HEAT FLUX ESTIMATES	JONES RH	1987	DS/210021/60	Darchem Engineering	N/A	Single Plate, Roof, Insulation, Heat Flux	This report is a key reference associated with Roof Cooling	Calculated Data
11295	LIGHTWEIGHT INSULATION SCHEME ROOF PLATE/FFC LEAKAGE FLOW AND HEAT FLUX ESTIMATES	JONES RM	1987	DS/210021/61	Darchem Engineering	N/A	Insulation, Roof Place, Leakeage Flow, Heat Flux	This report is a key reference associated with Roof Cooling	Calculated Data
11342	FAST BREEDER REACTOR ABOVE CORE STRUCTURE COMPARISON OF MEASUREMENTS OF THERMAL STRIPING	HART D ;	1988		NUCLEAR RESEARCH LABS	CDFR	ACS, Thermal Striping	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results. Comparison with Calculated data
11367	MEASUREMENTS OF THE CONCENTRATION AND SIZE OF SODIUM AEROSOL IN ARGON COVER GAS ABOVE A SODIUM POOL FOR CONDITIONS OF FAST REACTOR OPERATION	JACKSON JD;BURNS RA;ANDERSON A;NORRIS JJ;AXCELL BP	1988	FR/THSG/P(88)377	Nuclear Engineering Development	N/A	Aerosol, Argon, Cover Gas, Sodium Pool	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
11370	THEORETICAL STUDIES OF THERMAL RADIATION IN SUPPORT OF THE COVER GAS RESEARCH PROGRAM	KINGDON R;SINIA YL;SPLAWSKI BA;TIERNEY MJ	1988	FR/THSG/P(88)376	NNC	N/A	Thermal Radiation, Cover Gas	This report is a key reference associated with Cover Gas Theory	Calculated Data
11392	THE CURRENT STRATEGY OF ,AND RESULTS FROM THE FAST REACTOR COVER GAS RESEARCH PROGRAM	SINAI YL	1988	FR/THSG/P(88)367;R&D/R1140	NNC	N/A	Cover Gas	This report is a key reference associated with Cover Gas Programme	Technical commentary of review. Description of results from the experiments
11501	EMISSIVITY OF SODIUM AND SODIUM CONTAMINATED SURFACE	JACKSON JD;TONG DKW;IRAVANIAN L;LAM KLA	1988	FR/THSG/P(88)380	Nuclear Engineering Development	N/A	Emissivity, Sodium	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
11595	CDFR COLD POOL 1/11.5 SCALE PERSPEX MODEL INVESTIGATION OF FLOW PATTERN AND HEAT TRANSFER AT THE UNDER-DECKPLATE FACE IN THE COLD POOL			B/49/661	Lucas Aerospace	CDFR	Cold Pool, Flow, Heat Transfer	This report is a key reference associated with Hot Pool References and Cold Pools	Calculated Data and Results. Analysis is also included
12035	COVER/GAS ROOF HEAT AND MASS TRANSFER	DIXON M;SINAI YL	1988		NNC	N/A	Cover Gas, Heat and Mass Transfer	This report is a key reference associated with Cover Gas Theory	Calculated Data
12058	EFR HOT POOL PERFORMANCE PRELIMINARY CALCULATIONS	KENWORTHY G	1989	FR/THSG/P(89)393	NNC	EFR	Hot Pool	This report is a key reference associated with Hot Pool References and EFR	Calculations associated with EFR Hot Pool
12494	STEADY STATE THERMAL HYDRAULIC ASSESSMENT OF THE FCD EFR HOT POOL USING THE PHOENICS COMPUTER CODE	SIMPSON CP	1988		NNC	EFR	Hot Pool, Thermal Hydraulic, Phoenics	This report is a key reference associated with Hot Pool References and EFR	Calculations and analysis associated with EFR Hot Pool
12715	REVIEW OF EFR ABOVE CORE STRUCTURE CALCULATIONS AND EXPERIMENTS	HART D	1988	FR/THSG/P(89)405	NNC	EFR	Above Core Structure	This report is a key reference associated with Above-Core Structure Calculations	Experimental and Calculated Data Comparisons
13253	HYDRAULIC STUDIES OF THE UK COMMERCIAL FAST REACTOR DIAGRID USING A 1/4 SCALE WATER MODEL AND THE PHOENICS COMPUTER CODE	BROWN GA;SCRIVEN J;ROBINSON RGJ;STEVENS AW	1989	RTS-R-006;R&D/R1073	UKAEA	CFR	Diagrid, Phoenics Code	This report is a key reference associated with the Diagrid	Calculated Analysis
13939	COMPARISON OF VICSEN PREDICTIONS OF HEAT TRANSFER THROUGH UNDER-DECKPLATE CAVITIES WITH THE LUCAS WATER MODEL EXPERIMENTS	HULME G	1989	THSG/P(89)407	NNC	CDFR	VICSEN, Heat Transfer, Cavities, Lucas Water Model	This report is a key reference associated with Hot Pool References and Cold Pools	Comparison between experimental and calculated results
14016	THERMAL HYDRAULIC ASSESSMENT OF THE FCD EFR HOT POOL DURING A REACTOR TRIP USING THE PHOENICS COMPUTER CODE	SIMPSON CP	1989		NNC	EFR	Hot Pool, Thermal Hydraulic, Phoenics	This report is a key reference associated with Hot Pool References and EFR	Calculations and analysis associated with EFR Hot Pool
14084	COVER GAS THERMAL HYDRAULICS AN OVERVIEW	DIXON M	1989	FR/THSG/P(89)416	NNC	N/A	Cover Gas, Thermal Hydraulics	This report is a key reference associated with Cover Gas Theory	Calculated Data
14275	THERMAL RADIATION MODELLING THE STATUS OF A DIFFUSION APPROXIMATION OF HEAT TRANSFER THROUGH AEROSOLS	KINGDON RE;SPLAWSKI BA;TIERNEY MJ	1989	FR/THSG/P(89)422	THSG	N/A	Thermal Radiation, Diffusion, Heat Transfer, Aerosols	This report is a key reference associated with Cover Gas Theory	Calculated Data
14288	THE EFFECT OF THE INTER-WRAPPER FLOW ON EFR CORE TEMPERATURE DURING THE NATURAL CIRCULATION DHR TRANSIENT-SECOND ISSUE	THOMSON AF;THOMASSON RK	1989	FR/THSG/P(89)411	NNC	EFR	Inter-Wrapper Flow, Natural Circulation	This report is a key reference associated with the Inter-Wrapper Flow and Natural Convection	Calculated Analysis and Description of Calculation Methods
14368	SAMPLE COVER GAS AND ROOF PREDICTIONS FOR EFR WITH AN UNINSULATED ROOF AND OPEN PENETRATION ANNULI	SINAI YL;LECLERC JL	1989		NNC	EFR	Cover Gas, Roof Predictions	This report is a key reference associated with Roof Cooling	Calculated Data
14369	IMPLICATIONS ARISING FROM A DELAY OF THE SAIF EXPERIMENT	DIXON M	1989		NNC	N/A	SAIF	This report is a key reference associated with Cover Gas Programme	Technical commentary of review
14370	SAMPLE SHEEPDIP PREDICTIONS OF THERMOSYPHONS IN ECCENTRIC GAPS OF EFR ROOF PENETRATIONS	LECLERC JL;SINAI YL	1989		NNC		Sheepdip, Thermosyphons	This report is a key reference associated with Roof Cooling	Calculated Data
14634	INTERWRAPPER FLOWS -AN OVERVIEW	ASHTON MW;BETTS C	1989	FR/THSG/P(89)403			Inter-Wrapper, Hot Pool Model	This report is a key reference associated with the Inter-Wrapper Flow Experiments	Calculated Analysis. Detailed Descriptions and Explanations
14722	PROPOSED STUDIES IN THE HARWELL ACTIVE MASS TRANSFER LOOP (AMTL) OF RADIOISOTOPE, HEAT AND MASS TRANSFER IN THE ABOVE-SODIUM COVER GAS REGION	NEWSON IH	1989	FRDCC/SCWG/P(89)164	HARWELL LABORATORY	N/A	Radioisotope, Heat and Mass Transfer, Cover Gas	This report is a key reference associated with Cover Gas Programme	Description of experiments to be performed.
14821	PHOENICS PREDICTIONS OF THE EFFECTS OF HEAT LOSSES ON THE CRITICAL RICHARDSON FOR THE EFR FCD HOT POOL	SIMPSON CP	1989		NNC	EFR	Hot Pool, Phoenics, Critical Richardson	This report is a key reference associated with Hot Pool References and EFR	Calculations and analysis associated with EFR Hot Pool

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
14936	FINAL COMMISSIONING AND DRY HEAT TRANSFER DATA FROM THE SOWAT RIG	GLOCKING JLD COSTIGAN G	1989	AERE G 5088	UKAEA	LMFBR	SOWAT Rig, Heat Transfer	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
14941	TECHNICAL SPECIFICATION FOR NNC 1/4 SCALE 60o SECTOR EFR ABOVE CORE STRUCTURE WATER MODEL	SMITH MR	1989	R&D 1552	NNC	EFR	ACS, Water Model	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results for required topic
15192	THERMAL HYDRAULICS MEASUREMENTS IN A REPRESENTATIVE FAST REACTOR INTERWRAPPER AND HOT POOL MODEL FIRST RESULTS FROM THE HIPPO 0.48 SCALE WATER MODEL	ASHTON MW;BAYLEY M;DELOOZE SK	1989	NRL-M-1065	UKAEA		Inter-Wrapper	This report is a key reference associated with the Inter-Wrapper Flow Experiments	Calculated Analysis
15283	DESCRIPTION OF 2D PHOENICS MODEL OF THE NNC 1/4 SCALE 60o SECTOR EFR ABOVE CORE STRUCTURE WATER RIG	FARRAR B	1989		NNC	EFR	Phoenics, Above Core Structure	This report is a key reference associated with Above-Core Structure Calculations	Calculated Analysis and Description of Calculation Methods
15869	A NUMERICAL STUDY OF THE THERMAL HYDRAULIC CHARACTERISTICS OF THE LOWER HOT POOL OF A FAST REACTOR AND THE RELEVANCE OF WATER MODELLING EXPERIMENTS	HULM,E G	1990	R&D/REPORT 1645	NNC	EFR	Hot Pool, Thermal Hydraulic, Water Modelling	This report is a key reference associated with Hot Pool References and EFR	Calculations and analysis associated with EFR Hot Pool
15946	THE MODELLING OF THERMAL RADIATIVE TRANSFER IN THE FAST REACTOR COVER GAS	SINAI YL	1990	R&D/REPORT 1627	EFR ASSOCIATES	EFR	Thermal Radiative Transfer, Cover Gas	This report is a key reference associated with Cover Gas Theory	Calculated Data
15947	THE MODELLING OF CONVECTION THERMOSYPHONS IN THE FAST REACTOR COVER GAS REGIONS	LECLERC JL;GRAHAM SJ;SINAI YL	1990	R&D/REPORT 1630	EFR ASSOCIATES	EFR	Convection, Thermosyphons, Cover Gas	This report is a key reference associated with Cover Gas Theory	Calculated Data
15948	MASS TRANSFER AND AEROSOL EFFECTS IN THE SARI-2 RIG AND THE STRATEGY FOR IMPLEMENTATION OF AN AEROSOL MODEL IN THE CGAS CODE	SINAI YL;FORD IJ;CLEMENT CF	1990	R&D/REPORT 1632	EFR ASSOCIATES	EFR	Mass Transfer, SARI-2 Rig, Aerosol, CGAS	This report is a key reference associated with CGAS and CGAST	Calculated Data
16016	EFR UNINSULATED ROOF WITHOUT CONVECTION BARRIERS MAJOR PENETRATION HEAT FLUXES DURING NORMAL OPERATION, SHUTDOWN AND LOSSP CONDITIONS	SINAI YL;LECLERC JL	1990		NNC	EFR	Heat Flux, Uninsulated Roof	This report is a key reference associated with Roof Cooling	Calculated Data
16017	USE OF THE PHOENICS CFD CODE FOR A 3D SIMULATION OF THE EFR HOT POOL THERMAL HYDRAULIC BEHAVIOUR	FARRAR B	1990		NNC	EFR	Hot Pool, Phoenics, Thermal Hydraulic	This report is a key reference associated with Hot Pool References and EFR	Calculations and analysis associated with EFR Hot Pool
16258	DETAILS OF THERMAL CONDITIONS ON THE ROOF OF THE EFR CONSISTENT DESIGN DURING A CATEGORY 3 LOSSP	SINAI Y;LECLERC J;BROWN M	1990	R&D/90/032 ISSUE A	EFR ASSOCIATES	EFR	Thermal conditions, LOSSP	This report is a key reference associated with Roof Cooling	Calculated Data
16312	LASER DOPPLER ANEMOMETRY AND FLOW VISUALISATION MEASUREMENTS ON THE 1/5 SCALE CORMORAN WATER MODEL EXPERIMENT	POWELL WR;BERGAU N	1998	NRL-R-1066	NRL	N/A	Laser Doppler, Anemometer, Flow, 1/5 Scale, Cormoran	This Report is a key reference associated with the Doppler Laser.	Experimental Data from the LDA
16319	FREE SURFACE AND INTERNAL GRAVITY WAVES OF THE EFR HOT POOL	O'CONNER JF;SINAI YL	1990		NNC	CDFR	Hot Pool, Free Surface, Gravity Waves	This report is a key reference associated with Hot Pool References and Free Surface	Calculations and analysis of results
16456	A PRELIMINARY INTERPRETATION OF GULLIVER DATA WITH THE CGAS CODE	SINAI Y	1991	R&D/2028	NNC	EFR	Gulliver, CGAS	This report is a key reference associated with CGAS and CGAST	Calculated Data
16567	STEADY STATE THERMAL HYDRAULIC ASSESSMENT OF THE FCD EFR HOT POOL USING THE PHOENICS COMPUTER CODE	SIMPSON CP	1988		NNC	EFR	Hot Pool, Phoenics, Thermal Hydraulic	This report is a key reference associated with Hot Pool References and EFR	Calculations and analysis associated with EFR Hot Pool
16765	THE EFFECTS OF ECCENTRICITY ON NATURAL CONVECTION IN A NARROW VERTICAL ANNULUS ACE RIG MEASUREMENTS	BOLEY WE	1990	R&D/90/045 ISSUE A	EFR ASSOCIATES	EFR	Eccentricity, Convection, Vertical Annulus, ACE rig	This report is a key reference associated with Roof Cooling	Calculated Data
16868	60cm SODIUM VAPOUR TRANSPORT RIG (SONAR) ANALYSIS OF DRY HEAT TRANSFER MEASUREMENTS	ROBERTS DN		AEA-IN-TEC-0010	UKAEA	LMFBR	SONAR RIG, Heat Transfer	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
16894	PREDICTIONS OF A CDFR HOT POOL MODEL USING THE FOCS3D CODE	MARKATOS NC		FRTHDC/P(81)19	NNC	CDFR	FOCS3D, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Description of method and calculations
16899	COMPARISON OF THE NATURAL CONVECTION HEAT TRANSFER IN FLUIDS OF VARIOUS PRANDTL NUMBERS IN CAVITIES WITH HEATED AND COOLED VERTICAL FACES	QUARINI	1980	FRTHDC/P(81)35;HTFS/PFW209/P19/1980	NNC	CDFR	Convection, Heat Transfer, Prandtly, Cavities, Faces	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
16903	TURBULENT NATURAL CONVECTION FLOW AND HEAT TRANSFER IN LARGE VERTICAL SINGLE WATER FILLED CAVITIES STAGE 2 WORK	BIRCHENNOUGH MP		FRTHDC/P(81)30;HTFS/PFW197/P15/1980	AERE	CDFR	Convection, Turbulent, Heat Transfer, Cavities	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
16904	TURBULENT NATURAL CONVECTION FLOW AND HEAT TRANSFER IN LARGE VERTICAL SINGLE WATER FILLED CAVITIES STAGE ONE WORK	AYTEKIN A		FRTHDC/P(81)29;HTFS/PFW189/P6/1979;AERE-G.1496	Nuclear Engineering Development	N/A	Convection Flow, Heat Transfer	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
16904	TURBULENT NATURAL CONVECTION FLOW AND HEAT TRANSFER IN LARGE VERTICAL SINGLE WATER FILLED CAVITIES STAGE ONE WORK	AYTEKIN A		FRTHDC/P(81)29;HTFS/PFW189/P6/1979;AERE-G.1496	AERE	CDFR	Turbulent, Convection, Heat Transfer, Cavities	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
16906	NATURAL CONVECTION HEAT TRANSFER MEASUREMENTS IN THE 1/22 SCALE PLENUM RIG USING WALL THERMOCOUPLES AND A SINGLE THERMOCOUPLE TRAVERSING PROBE	BIRCHENOUGH PM	1981	FRTHDC/P(81)27;HTFS/PFW209/P13/1980;AERE-G.1765	AERE	CDFR	Convection, Heat Transfer, 1/22, Plenum, Thermocouples	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
16919	1/4 SCALE 60 SECTOR FLOW VISUALISATION MODEL OF PFR ABOVE CORE STRUCTURE	PARDY A		FRTHDC/P(78)3	Nuclear Power Development Labratories	PFR	Flow Visualisation, ACS	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results for required topic
16999	NATURAL CONVECTION HEAT TRANSFER IN A CLOSED VERTICAL SODIUM CELL	DAVIES ;SMITH		ND-M-670(R)	UKAEA	CDFR	Convection, Heat Transfer, Sodium	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
17080	PRELIMINARY MEASUREMENTS OF SODIUM AEROSOL CONCENTRATION AND SIZE DISTRIBUTION IN THE COVER GAS ABOVE A SODIUM POOL SUMMARY OF RESULTS OBTAINED TO DATE ON THE MUSAC PROJECT			FR/THSG/P(86)308	Nuclear Engineering Development	EFR	Aerosol Concentration, Sodium Pool, MUSAC	This report is a key reference associated with CGAS and CGAST	Calculated Data
17092	TH EFFECT OF THE INTER-WRAPPER FLOW ON EFR CORE TEMPERATURE DURING THE NATURAL CIRCULATION DHR TRANSIENT SECOND ISSUE	THOMSON AF;THOMMASON RK	1989	FR/THSG/P(89)431;FR/E/002091	NNC	EFR	Inter-Wrapper Flow, Natural Circulation	This report is a key reference associated with the Inter-Wrapper Flow and Natural Convection	Calculated Analysis and Description of Calculation Methods
17101	CFR DIAGRID HIGH PRESSURE PLENUM PROPOSALS FOR THE EXPERIMENTAL INVESTIGATION OF THE FLOW CONDITIONS AND GAS BUBBLE BEHAVIOUR	AYTEKIN A	1984	FR/THSG/P(84)26	AEA	CFR	Diagrid, flow conditions, gas bubble	This report is a key reference associated with the Diagrid	Experimental Analysis
17141	CGAST-A TRANSPORT CODE FOR THE COVER GAS ROOF SLAB AND ROOF COOLING SYSTEM	SINAI Y	1992	R&D/90/056A	EFR ASSOCIATES	EFR	CGAST-A Roof Slab, Roof Cooling	This report is a key reference associated with CGAS and CGAST	Calculated Data
17179	CGAST PREDICTIONS OF THE EFR ROOF THERMAL RESPONSE WITH SEALED PENETRATION ANNULI FOR CATEGORY 2, 3 AND 4 LOSS CONDITIONS	BROWN M	1990		NNC	EFR	GCAST, Roof Thermal, LOSSP	This report is a key reference associated with CGAS and CGAST	Calculated Data
17200	HEAT TRANSFER OF THE EFR ROOF CONSISTENT DESIGN WITH RE-ENTRANT FEATURE AND SIX DHX PENETRATIONS	HAYES J	1990		EFR ASSOCIATES	EFR	Heat Transfer, DHX	This report is a key reference associated with Roof Cooling	Calculated Data
17253	PRELIMINARY CGAS CALCULATIONS OF HEAT TRANSFER AND COVER GAS BEHAVIOUR WITHIN THE ACS DURING NORMAL OPERATION	SINAI Y	1990	R&D/90/067A	EFR ASSOCIATES	EFR	Heat Transfer, Cover gas, ACS	This report is a key reference associated with Cover Gas and ACS	Calculated Data and description of the Calculation Methods

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17253	PRELIMINARY CGAS CALCULATIONS OF HEAT TRANSFER AND COVER GAS BEHAVIOUR WITHIN THE ACS DURING NORMAL OPERATION	SINAI Y	1990	R&D/90/067A	EFR ASSOCIATES	EFR	CGAS, Heat Transfer, ACS, Normal Operation	This report is a key reference associated with CGAS and CGAST	Calculated Data
17325	ACE RIG PRELIMINARY RESULTS FOR A 7MM ECCENTRIC ANNULUS	BOLEY WE	1990	R&D REPORT 1633 ISSUE A	NNC	N/A	ACE Rig, Eccentric Annulus	This report is a key reference associated with Roof Cooling	Experimental Results from specially designed rigs
17706	RESPONSE OF THE EFR HOT POOL FREE SURFACE TO A SEISMIC EVENT	CONNOR'O JF	1990		NNC	CDFR	Hot Pool, Free Surface, Seismic	This report is a key reference associated with Hot Pool References and Free Surface	Calculations and analysis of results
17716	A FLOW INDUCED VIBRATION ASSESSMENT OF THE EFR ACS CONSISTENT DESIGN	TILLEY DW	1990		EFR ASSOCIATES	EFR	Flow Induced, Vibration, ACS	This report is a key reference associated with ACS Vibration	Calculations and results for required topic
17738	PRELIMINARY RESULTS FROM THE INTER-WRAPPER WATER EXPERIMENT	MORSS AG	1990	TD/STB/MEM/0077;TSSG/P990)129	Nuclear Electric		Inter-Wrapper	This report is a key reference associated with the Inter-Wrapper Flow Experiments	Calculated Analysis
17905	CGAS AND CGAST PREDICTIONS OF THE EFR ROOF THERMAL RESPONSE WITH LIGHTWEIGHT INSULATION FOR NORMAL OPERATING AND LOSSP CONDITIONS	BROWN M;SINAI YL	1990		EFR ASSOCIATES	EFR	CGAS, CGAST, Thermal Response, LOSSP, Normal Operation	This report is a key reference associated with CGAS and CGAST	Calculated Data
17977	MUSAC3 REPORT ON 550oC NA POOL TESTS	JACKSON JD;ANDERSON A	1991		Nuclear Engineering Development	N/A	MUSAC3	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
18021	SOME NOTES ON THE BEHAVIOUR OF THE EFR ROOF UNDER LOSSP CONDITIONS	SINAI YL	1991	R&D/90/137	EFR ASSOCIATES	EFR	EFR Roof, LOSSP	This report is a key reference associated with Roof Cooling	Analysis from Calculated Data
18101	A REVIEW OF WORK RELEVANT TO THE PFR ABOVE CORE STRUCTURE SINCE MAY 1977 AND THE REVISED SAFETY CASE FOR ITS CONTINUED OPERATION	ROSE RT;GREEN D	1982	FRD/TN/P(82)510;PFR/SWP/P(82)18	NNC	PFR	Above Core Structure, Safety	This report is a key reference associated with Above-Core Structure for the PFR	Review of all previous work, link to Safety Case for PFR
18195	COMMENTS ON THE AEROSOL INVENTORY WITHIN THE ACS COVER GAS	SINAI YL	1991	R&D91/021A	EFR ASSOCIATES	EFR	Aerosol Inventory, ACS, Cover Gas	This report is a key reference associated with Cover Gas Theory	Calculated Data
18201	THERMAL HYDRAULIC ASSESSMENT OF THE FCD EFR HOT POOL DURING A REACTOR TRIP USING THE PHOENICS COMPUTER CODE	PUGH KA	1991		EFR ASSOCIATES	EFR	Hot Pool, Phoenics, Thermal Hydraulic	This report is a key reference associated with Hot Pool References and EFR	Calculations and analysis associated with EFR Hot Pool
18216	EFR ROOF STRUCTURE HEAT TRANSFER CORRELATIONS FOR THE ROOF PLATE AND IN THE PENETRATION ANNULI	MADDOCKS CD	1990		EFR ASSOCIATES	EFR	Roof Structure, Heat Transfer, Penetration	This report is a key reference associated with Roof Cooling	Calculated Data
18468	SUPPRESSION OF NATURAL CONVECTION IN A NARROW VERTICAL ANNULUS BY MEANS OF A BAFFLE ACE RIG MEASUREMENTS	WARD JR	1991	R&D/91/052	NNC	N/A	Convection, Vertical Annulus, Baffle ACE Rig	This report is a key reference associated with Roof Cooling	Calculated Data
18867	C-GAS USER MANUAL	SINAI Y;	1991	R&D/91/90A;	EFR ASSOCIATES	EFR	C-GAS	This report is a key reference associated with CGAS and CGAST	User Manual for required Code
19124	MUSAC3 FACILITY - FUTURE WORK PROPOSALS	AUSTIN NM;JACKSON D;	1991	FRJC/RPSC/P(91)86	Nuclear Engineering Development	N/A	MUSAC3	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
19169	INTERWRAPPER THERMAL HYDRAULIC STUDIES IN THE 'HIPPO' 0.48 SCALE WATER MODEL OF THE SUPERPHENIX-2 HOT POOL; PART 1: HOT/COLD TEMPERATURE INTERFACE MEASUREMENTS	ASHTON MW;BAYLEY M; DELOOZE SK;	1991	PE4/1167;AEA-FR-0037(R);FMD/D(91)007;	AEA Technology	SUPERPHENIX	Inter-Wrapper, Hot Pool Model	This report is a key reference associated with the Inter-Wrapper Flow Experiments	Calculated Analysis
19215	NATURAL CONVECTION FLOW AND HEAT TRANSFER EXPERIMENTS USING THE HARWELL SMALL-SCALE WATER AND CERROBASE FILLED PLENUM RIGS (GEMINI RIGS)	COWAN PC;	1982	CBG/P(82)455;	NNC	N/A	Convection, Heat Transfer, Plenum, Cerrobase, Gemini	This report is a key reference associated with Hot Pool References and Cerrobase	Experimental Results and analysis of results
19216	NATURAL CONVECTION FLOW AND HEAT TRANSFER EXPERIMENTS USING SMALL-SCALE WATER-FILLED PERMEABLE PLATE TEST SECTIONS (SWAPPER)	COWAN GH;	1982	CBG/P(82)456;	N/A	CDFR	Convection, Heat Transfer, Swapper	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
19262	INNER POOL FLOW DISTRIBUTION (CFR/WP/TS REF 382M4/2) CDFR SCOPING TESTS PROPOSALS FRO HYDRAULIC TESTING OF TWO HOT POOL ARRANGEMENTS IN A 1/15TH SCALE WATER MODEL	KENWORTHY G		CBG/P(79)167	NNC	CDFR	Inner Pool, Hydraulic, Hot Pool, 1/15	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Proposals for further work to be completed. Description of Calculation Methods
19401	TURBULENT NATURAL CONVECTION HEAT TRANSFER IN SINGLE VERTICAL LIQUID METAL (CERROBASE) FILLED CAVITIES	COWAN G	1980	CBG/P(80)271;HTFS/WS/NPC/PFW213	Nuclear Power Company	N/A	Heat Transfer, Cerrobase	This report is a key reference associated with Hot Pool References and Cerrobase	Experimental Results and analysis of results
19469	NATURAL CONVECTION FLOW AND HEAT TRANSFER EXPERIMENTS IN A THREE-DIMENSIONAL 1/15TH SCALE PLENUM RIG	RICHARDS EWT;	1980	CBG/P(80)236;	Nuclear Power Company	CDFR	Convection, Heat Transfer, 1/15th Plenum, Rig	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
19476	NATURAL CONVECTION FLOW AND HEAT TRANSFER EXPERIMENTS RELEVANT TO CDFR USING THE HARWELL 1/22ND SCALE PLENUM RIG	COWAN G;	1980	CBG/P(80)225;	Nuclear Power Company	CDFR	Convection, Heat Transfer, 1/22nd Plenum, Rig	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
19494	CDFR THERMAL HYDRAULICS THE HARWELL LARGE SCALE WATER RIG PROPOSAL FOR LASER DOPPLER ANEMOMETER EQUIPMENT	RICHARDS EWT		CBG/P(79)211;HTFS/WS/NPC/PFW204	Harwell Large Scale Rig	CDFR	Thermal Hydraulics, Laser, Doppler	This Report is a key reference associated with the Doppler Laser.	Experimental Data from the LDA
19509	SODIUM VAPOUR AND AEROSOL PROBLEMS IN THE CFR1 COVER GAS PROPOSED R&D PROGRAMMES	DONALDSON DM;SEED G		CBG/P(77)70	N/A	CFR	Sodium Vapour, Aerosol, CFR1, Cover Gas, Programme	This report is a key reference associated with Cover Gas Programme	Technical commentary of review
19566	CALCULATION OF HEAT TRANSFER IN A PLENUM OF SODIUM WITH A HEATED VERTICAL WALL AND A COOLED FLOOR	HULME G;	1981	CBG/P(81)379;	AERE	CDFR	Heat Transfer, Plenum, Sodium, Vertical Wall, Cooled Floor	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
19568	AN EXPERIMENTAL PROGRAMME DESIGNED TO VALIDATE METHODS OF HEAT TRANSFER ANALYSIS IN THE CDFR COVER GAS INSULATION AND PENETRATION SYSTEMS	DAVIDSON J	1981	CBG/P(81)384;	NNC	CDFR	Programme, Heat Transfer, Cover Gas	This report is a key reference associated with Cover Gas Programme	Description of experiments to be performed.
19608	HEAT AND MASS TRANSFER IN A SEMI ENCLOSED ANNULUS STAGE IV EXTENSION TO C86/435/4	PHILLIPS RH	1981	CBG/P(81)333	NNC	N/A	Heat and Mass Transfer	This report is a key reference associated with Roof Cooling	Calculated Data
19617	PROPOSED DEVELOPMENT PROGRAMME TO ESTABLISH IN SODIUM VAPOUR PERFORMANCE OF PLATE TYPE INSULATION WORK PACKAGE 382H2	PROUDLOVE MJ	1981	CBG/P(81)318	N/A	CFR	Programme, Sodium Vapour, Plate Type	This report is a key reference associated with Cover Gas Programme	Description of experiments to be performed.
19717	PREDICTION OF ROOF AND PENETRATION HEAT LOADS FOR THE LIGHTLY INSULATED DESIGN DURING NORMAL OPERATION COLD SHUTDOWN, AND A CATEGORY 3 LOSSP	LEONG WUA;SINAI YL	1991	R&D/91/063;91/10650/FRD	EFR ASSOCIATES	EFR	Roof, Penetration Heat Loads	This report is a key reference associated with Roof Cooling	Calculated Data
19733	SODIUM AEROSOL FORMATION AND REMOVAL MECHANISMS IN THE FAST REACTOR COVER GAS SPACE	FORD IJ	1991	PE4/1425;AEA-INTEC-0525	AEA Technology	N/A	Sodium Aerosol, Cover Gas	This report is a key reference associated with Cover Gas Theory	Calculated Data
19915	FAST REACTOR COVER GAS THE MODELLING EMPLOYED BY THE C-GAS CODE	SINIA YL	1991	91/10843/FRD;R&D/90/087	EFR ASSOCIATES	EFR	Cover Gas, C-GAS	This report is a key reference associated with CGAS and CGAST	Calculated Data
20044	STUDIES OF AEROSOL CHARACTERISTICS HEAT TRANSFER AND MASS TRANSFER WITH APPLICATION TO THE COVER GAS REGION OF SODIUM COOLED FAST REACTOR CLOSING REPORT ON STAGE 3 OF THE MUSAC PROJECT NNC RESEARCH CONTACT	JACKSON JD;ANDERSON A;AN P;YANG H	1991		Nuclear Engineering Development	N/A	Aerosol, Heat Transfer, Mass Transfer, Cover Gas, MUSAC	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
20189	CATALOGUE OF EMISSIVITY VALUES FOR USE IN FAST REACTOR DESIGN CALCULATIONS	COSTIGAN G	1991	PE1/2175;AEA-IN TEC-0699;PE1/2972	AEA Technology	N/A	Emissivity,	This report is a key reference associated with Cover Gas Theory	Calculated Data
20488	CDFR HOT POOL SPECIFICATION OF THE DESIGN AND TEST OBJECTIVES OF THE NEW 1/15 SCALE THERMAL HYDRAULICS MODEL AT NPC FOR THE LARGE HOT POOL TYPE REACTOR	HAWKINS K	1980	TN/P(80)411	NNC	CDFR	Hot Pool, 1/15, Thermal Hydraulics	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
20490	FIRST PREDICTION OF THERMAL TRANSIENTS IN THE HOT POOL OF CDFR	HAWKINS KS	1980	TN/P(81)445	NNC	CDFR	Thermal Transients, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Description of method and calculations
20559	A SIMPLE ANALYSIS OF CORE OUTLET AND HOT POOL TEMPERATURE IN CDFR FOLLOWING LOSS OF GRID SUPPLIES	GRADDEN DA	1981	DM/P(81)382	NNC	CDFR	Core Outlet, Hot Pool, Loss of Grid	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
20594	SODIUM VAPOUR AND AEROSOL BEHAVIOUR IN THE COVER GAS ABOVE THE CORE OF A SODIUM COOLED FAST REACTOR	KLASCHKA JT;PERRING JK		CFR/EST/P(72)132	N/A	N/A	Sodium Vapour, Aerosol Behaviours, Cover Gas	This report is a key reference associated with Cover Gas Theory	Calculated Data
20618	THE HIGH CYCLE THERMAL FATIGUE OF THE ABOVE CORE STRUCTURE REML SODIUM EXPERIMENTAL WORK	LANGRIDGE EG;SHERIGG N		CFR/EST/P(76)318	N/A	CFR	Thermal Fatigue, ACS	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results for required topic
20620	NOTES ON A THERMAL SHOCK EXPERIMENT SIMULATING TURBULENCE OF SODIUM COOLANT ON THE ABOVE CORE STRUCTURE IN PFR	GILCHRIST KE;MORRIS FW		CFR/EST/P(75)292;TRG-M-6956	UKAEA	PFR	Thermal Shock, Sodium Coolant, ACS	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results for required topic
20646	CDFR TRANSIENT BEHAVIOUR FOLLOWING A REACTOR TRIP FROM 30% THERMAL LOAD (STRATIFIED HOT POOL ASSUMPTIONS) T5	HADDAD H	1982	TN/P(82)569	NNC	CDFR	Transient, Trip, Thermal Load, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
20647	CDFR TRANSIENT BEHAVIOUR FOLLOWING A REACTOR TRIP FROM 30% THERMAL LOAD (SEMI-MIXED HOT POOL ASSUMPTIONS) T6	HADDAD H	1982	TN/P(82)570	NNC	CDFR	Transient, Trip, Thermal Load, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
20980	PRELIMINARY RESULTS OF NATURAL CONVECTION HEAT TRANSFER IN VERTICAL SINGLE CERROBASE-FILLED CELLS OF HIGH ASPECT RATIOS	COWAN GH;LOVEGROVE PC;QUARINI GL;	1990	HTFS/PFW209/P3/1980;AERE-G.1768;157/0/2D;	Nuclear Power Company	N/A	Convection, Heat Transfer, Cerrobase, Aspect Ratio	This report is a key reference associated with Hot Pool References and Cerrobase	Experimental Results and analysis of results
20984	COMPARISON OF LASER DOPPLER AND HOT FILM ANEMOMETRY TECHNIQUES FOR VELOCITY MEASUREMENTS RELEVANT TO EXPERIMENTS IN THE HARWELL LARGE SCALE WATER AND SMALL SCALE CERROBASE RIGS	AYTEKIN A;COWAN GH;	1989	HTFS/PFW187/P21/1979;AERE-G.1497;157/0/2D;	N/A	N/A	Laser Doppler, Anemometer, Velocity, Rigs	This Report is a key reference associated with the Doppler Laser.	Comparison of measurement techniques and associated results
20985	THE FEASIBILITY OF LASER DOPPLER ANEMOMETRY FOR MEASUREMENT OF TURBULENT FREE CONVECTION IN A LARGE WATER FILLED CAVITY OF ASPECT RATIO 11.4	WALKLATE PJ;	1989	HTFS/PFW189/P5/1979;AERE-G1495;	N/A	N/A	Laser Doppler, Anemometer, Turbulent, Aspect Ratio	This Report is a key reference associated with the Doppler Laser.	Experimental Data from the LDA. Feasibility Calculations for further assessments
20997	INVESTIGATION OF THE THERMAL HYDRAULIC BEHAVIOUR OF THE OTTER RIG WITH A PERMEABLE ROOF - PART 4 THE EFFECTS OF COOLED PUMPS VOLUME 1	COSTIGAN G;JACKSON PS;SMITH EPR;TAYLOR D;	1988	AERE R 13165;157/0/2D;	UKAEA	LMFBR	Thermal Hydraulic, Otter Rig	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
21002	INVESTIGATION OF THE THERMAL HYDRAULIC BEHAVIOUR OF THE OTTER RIG WITH A PERMEABLE ROOF PART 3 - THE EFFECTS OF DIFFERENT ROOF DESIGNS (VOLUME 2)	COSTIGAN G;SMITH EPR;	1987	AERE R 12739;157/0/2D;	UKAEA	LMFBR	Thermal Hydraulic, Otter Rig	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
21004	INVESTIGATION OF THE THERMAL HYDRAULIC BEHAVIOUR OF THE OTTER RIG WITH A PERMEABLE ROOF - PART 2 - A DETAILED STUDY OF A 45 DEG SECTION OF THE RIG (VOLUME 1)	COSTIGAN G;SMITH EPR;	1987	AERE R 12577;157/0/2D;	UKAEA	LMFBR	Thermal Hydraulic, Otter Rig	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
21005	INVESTIGATION OF THE THERMAL HYDRAULIC BEHAVIOUR OF THE OTTEER RIG WITH A PERMEABLE ROOF - PART 2 - A DETAILED STUDY OF A 45 DEG SECTION OF THE RIG (VOLUME 2)	COSTIGAN G;SMITH EPR;	1987	AERE R 12577;157/0/2D;	UKAEA	LMFBR	Thermal Hydraulic, Otter Rig	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
21007	INVESTIGATION OF THE THERMAL HYDRAULIC BEHAVIOUR OF THE OTTER RIG WITH A PERMEABLE ROOF: PART 1 - PRELIMINARY EXPERIMENTS	COSTIGAN G;GLOCKLING J;QUARINI GL;SMITH EPR;	1986	AERE R 12402;157/0/2D;	UKAEA	LMFBR	Thermal Hydraulic, Otter Rig	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
21018	HARWELL LARGE SCALE WATER RIG STAGE 4 EXPERIMENTS TURBULENT NATURAL CONVECTION HEAT TRANSFER MEASUREMENTS INTO A CAVITY OF ASPECTS RATIO 6	BIRCHENOUGH PM;COWAN GH;LOVEGROVE PC	1983	157/0/2D;AERE-G2621;HTFS/PFW217/P1/1983	AERE	CDFR	Rig, Turbulent, Convection, Heat Transfer, Cavity, Aspect Ratio	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
21023	DESCRIPTION OF A 1/25TH SCALE MODEL OF THE INTERMEDIATE PLENUM AND HOT POOL OF THE CDFR (THE OTTER RIG)	LOVEGROVE PC	1984	157/0/2d;AERE-G3008	NNC	CDFR	1/25, Plenum, Hot Pool, Otter	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
21032	AN ESTIMATE OF THE STEADY STATE FLOW BETWEEN THE CDFR HOT POOL AND INTERMEDIATE PLENUM FOR A PLENUM WITH A POROUS ROOF	BIRCHENOUGH PM	1986	157/0/2D;AERE-G3780	NNC	CDFR	Steady State, Hot Pool, Plenum, Porous	This report is a key reference associated with Hot Pool References and the CDFR Calculations	Calculated Results and Analysis
21035	CONSTRUCTION AND OPERATION OF THE ASTER RIG	TIERNEY MJ	1988	157/0/2D;AERE-G4631	UKAEA	LMFBR	ASTER Rig	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
21036	CONSTRUCTION AND OPERATION OF THE SOWAT RIG	COSTIGAN G;GLOCKLING JLD	1988	157/0/2D;AERE-G4632	UKAEA	LMFBR	SOWAT Rig	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
21048	TURBULENT NATURAL CONVECTION HEAT TRANSFER EXPERIMENTS IN A CERROBASE FILLED CAVITY OF ASPECT RATIO 6	COWAN GH;LOVEGROVE PC;QUARINI GL;STEELE A	1982	157/0/2D;AERE-G2456;HTFS/PFW224/P8/1982	AERE	N/A	Convection, Heat Transfer, Cerrobase, Aspect Ratio	This report is a key reference associated with Hot Pool References and Cerrobase	Experimental Results and analysis of results
21052	HARWELL LARGE SCALE WATER RIG STAGE 4 EXPERIMENTS TURBULENT NATURAL CONVECTION HEAT TRANSFER MEASUREMENTS IN A CAVITY OF ASPECT RATI 1.92	BIRCHENOUGH PM;COWAN GH;LOVEGROVE PC	1982	157/0/2D;AERE-G2616;HTFS/PFW217/P1/1982	AERE	CDFR	Rig, Turbulent, Convection, Heat Transfer, Cavity, Aspect Ratio	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
21064	HARWELL GEMINI WATER-FILLED PLENUM RIG: STEADY-STATE AND TRANSIENT NATURAL CONVECTION FLOW AND HEAT TRANSFER MEASUREMENTS IN A SMALL-SCALE CUBICAL PLENUM	COWAN GH;TIERNEY MJ;	1983	AERE R 10983;157/0/2D;	UKAEA	CDFR	Gemini, Plenum, Convection, Heat Transfer	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
21066	HARWELL GEMINI CERROBASE-FILLED PLENUM RIG: TRANSIENT NATURAL CONVECTION HEAT TRANSFER MEASUREMENTS IN A SMALL-SCALE CUBICAL PLENUM	COWAN GH;TIERNEY MJ;	1983	AERE R 11125;157/0/2D;	UKAEA	CDFR	Gemini, Cerrobase, Plenum, Convection, Heat Transfer, Plenum	This report is a key reference associated with Hot Pool References and Cerrobase	Experimental Results and analysis of results
21075	NATURAL CONVECTION HEAT TRANSFER IN VERTICAL SINGLE WATER-FILLED CELLS	COWAN GH;LOVEGROVE PC;QUARINI GL;		AERE-G943;HTFS/PFW161/P12/1977;157/0/2D;	AERE	CDFR	Convection, Heat Transfer, Cells	This report is a key reference associated with Hot Pool References and Natural Convection in Cavities	Calculated Data and Results. Analysis is also included
21473	THERMAL STRESSES IN THE ABOVE CORE STRUCTURE OF THE PFR	BROADLEY D		PFR/SWP/P(76)39;PFR/TF/P(76)165	NNC	PFR	Thermal Stresses, Above core structure	This report is a key reference associated with Above-Core Structure for the PFR	Calculations and results for required topic
21616	ABOVE CORE STRUCTURE AIR THERMAL SHOCK EXPERIMENT VALIDATION OF RESULTS WITH REACTOR DATA	DIXON M		PFR/SWP/P(78)69;FRD/TN/P(78)285;ACSCM/P(78)52	NNC	PFR	Thermal Shock, ACS	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results for required topic
21775	MUSAC3 PROJECT 1991/92 ANNUAL REPORT	JACKSON JD;AN P;ANDERSON A;TOTEV T	1992	92/11854/FRD	Nuclear Engineering Development	N/A	MUSAC3	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
21808	CGAST PREDICTIONS OF THE THERMAL LOADING TO THE EFR ROOF DURING TOTAL LOSS OF ROOF COOLING	BROWN M;	1992		NNC	EFR	CGAST, Thermal Loading, Roof Cooling	This report is a key reference associated with CGAS and CGAST	Calculated Data
22292	COMPARISON BETWEEN PHOENICS PREDICTIONS AND EXPERIMENTAL MEASUREMENTS FROM THE HIPPO AND BNL RIGS OF THE INTERWRAPPER FLOW TEMPERATURES AND INTERFACE (C36/1C10314C)	YU LSL;HULME G;	1992	R&D?92/020;	NNC	EFR	Phoenics, Inter-Wrapper	This report is a key reference associated with the Inter-Wrapper Flow Experiments	Experimental and Calculated Data Comparisons

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22294	INTER-WRAPPER FLOW TEMPERATURE FLUCTUATIONS	HULME G;	1992	R&D/92/042;	NNC	EFR	Inter-Wrapper, Flow Temperature	This report is a key reference associated with the Inter-Wrapper Flow Experiments	Calculated Analysis
22299	RAD3D CALCULATIONS FOR MUSAC 3 RIG	PARR SM;	1992	R&D/92/003;	Nuclear Engineering Development	N/A	RAD3D, MUSAC	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
23001	CALCULATIONS WITH ASTEC/C-GAS SYNTHESIS FOR THE SRP AND ACS IN THE EFR WITH IMPROVED RADIATIVE HEAT TRANSFER MODELLING	PRICE G;	1992	EDC/92/093A;FR/E/004032	NNC	EFR	SRP, ACS, Heat Transfer	This report is a key reference associated with Cover Gas and ACS	Calculated Data and description of the Calculation Methods
23050	FREYJA EXPERIMENTAL DATA ON THERMAL STRIPPING AMPLITUDES AT THE CIRCUMFERENTIAL SCREEN IN THE HOT POOL	ASHTON MW;WILKINSON J;LEWIS MWJ	1992	FMD/D(92)093;PE2/5366	AEA Technology	PFR	FREYJA, Thermal Striping, Hot Pool	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results for required topic
23061	FLOW INDUCED VIBRATION OF THE PFR ABOVE CORE STRUCTURE	TAYLOR AF;FERGUSON BG		ND-M-12(R)	UKAEA	PFR	Flow Induced, Vibration, ACS	This report is a key reference associated with ACS Vibration	Calculations and results for required topic
23312	INTERWRAPPER THERMAL HYDRAULIC STUDIES IN THE 'HIPPO' 0.48 SCALE WATER MODEL OF THE SUPERPHENIX-2 HOT POOL PART 2: VELOCITY FIELD MEASUREMENTS	ASHTON MW;POWELL WR;DELOOZE SK;	1991	PE1/5457;AEA-RS-5337;AEA-FR-0038(R);FMD/D(91);	AEA Technology	SUPERPHENIX	Inter-Wrapper, Hot Pool Model	This report is a key reference associated with the Inter-Wrapper Flow Experiments	Calculated Analysis
23791	PRELIMINARY C-GAS PREDICTIONS WITH THE SEMI-TRANSPARENT COVER GAS MODEL AT NORMAL OPERATION	BROWN M;	1992		NNC	EFR	CGAS, Cover Gas, Normal Operation	This report is a key reference associated with CGAS and CGAST	Calculated Data
23893	THERMAL STRIPING EVACUATIONS IN THE FREYJA AIR MODEL SIMULATING THE FIRST-CONSISTENT-DESIGN CORE AND ABOVE-CORE-STRUCTURE CONFIGURATION	ASHTON MW;WILKINSON J;	1992	PE1/6889;FMD/D(92)110;	AEA Technology	EFR	FREYJA, Thermal Striping, ACS	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results for required topic
23981	PRELIMINARY CALCULATIONS WITH ASTEC/C-GAS SYNTHESIS FOR THE SRP AND ACS IN THE EFR	PRICE G;FUNG MTR	1992	WDC/92/051	EFR ASSOCIATES	EFR	ASTEC/C-Gas, SRP, ACS	This report is a key reference associated with Cover Gas and ACS	Calculated Data and description of the Calculation Methods
24067	SRP ANS ACS HEAT TRANSFER CALCULATIONS FOR THE SOLID ROOF DESIGN OF THE EUROPEAN FAST REACTOR WITH ASTEC/C-GAS SYNTHESIS	PRICE G	1993	EDC/92/170;FR/E/004353	EFR ASSOCIATES	EFR	SRP, ACS, Heat Transfer	This report is a key reference associated with Cover Gas and ACS	Calculated Data and description of the Calculation Methods
24071	PHOENICS CALCULATION OF THE THERMAL HYDRAULIC BEHAVIOUR OF THE IHX STANDPIPE ANNULI IN THE SPX2 REACTOR	HULME G	1987	R&D 1017	NNC	SUPERPHENIX	Phoenics, Thermal Hydraulics	This report is a key reference associated with Roof Cooling	Calculated Data
24196	PRELIMINARY CGAS PREDICTIONS WITH SOLID ROOF AT NORMAL OPERATION	BRYANT J;	1993		NNC	EFR	Solid Roof, Normal Operation	This report is a key reference associated with Roof Cooling	Calculated Data
24203	CGAST, CATEGORY 3 AND 4 LOSSP TRANSIENTS FOR EFR FABRICATED DESIGN ROOF	BRYANT J;	1993		EFR ASSOCIATES	EFR	CGAST, LOSSP	This report is a key reference associated with CGAS and CGAST	Calculated Data
24296	THE EMISSIVITY OF STAINLESS STEEL SURFACES PROMOTING DROPWISE OR FILMWISE CONDENSATION OF LIQUID SODIUM	JACKSON JD;LAM KLA	1987		Nuclear Engineering Development	N/A	Emissivity, Stainless Steel, Dropwise, Filmwise	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
24297	INVESTIGATION OF MODES OF CONDENSATION ON STAINLESS STEEL SPECIMENS	JACKSON JD;LAM KLA	1987		Nuclear Engineering Development	N/A	Condensation, Stainless Steel	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
24314	PRELIMINARY STUDIES OF SODIUM CONDENSATION AND DEPOSITION ON THE UNDERSIDE OF THE ROOF OF A SODIUM POOL	JACKSON JD;LAM KLA	1986		Nuclear Engineering Development	N/A	Sodium Condensation, Deposition, Sodium Pool	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
24315	WINDSCALE NUCLEAR POWER DEVELOPMENT LABORATORIES EMISSIVITY OF SODIUM CONTAMINATES SURFACES SUMMARY OF INFORMATION TO BE PRESENTED IN THSG/P(85)71	BARNETT PG	1985		N/A	N/A	Windscale, Emissivity, Sodium Contaminates,	This report is a key reference associated with Cover Gas Programme	Technical commentary of review
24316	STUDIES OF RADIANT HEAT TRANSFER AND THE PROCESS OF DRYOUT IN THE CASE OF A SODIUM-WETTED STAINLESS STEEL SURFACE	JACKSON JD;LAM KLA	1986		Nuclear Engineering Development	N/A	Heat Transfer, Stainless Steel, Dryout	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
24331	PENHEAT A NETWORK CODE FOR ANALYSING THE THERMOSYPHONIC BEHAVIOUR OF COVER GAS IN FAST REACTOR PENETRATION ANNULI-THEORETICAL MANUAL	LEONG WUA	1993	EDC/92/160	NNC	EFR	PENHEAT, Thermosyphonic, Cover Gas	This report is a key reference associated with Roof Cooling	Calculational Method Description
24333	RAD3D VIEW FACTOR CALCULATIONS FOR EFR COVER GAS HEAT TRANSFER	PARR SM	1993	EDC/93/002	NNC	N/A	RAD3D, Cover Gas, Heat Transfer	This report is a key reference associated with Cover Gas Theory	Calculated Data
24900	PRELIMINARY ASSESSMENT OF THE INTEGRITY OF THE CFR ABOVE CORE STRUCTURE AGAINST THERMAL TRANSIENT CONDITIONS	LLOYD GL		CFR/DCWG/P(75)71	N/A	CFR	Above Core Structure, Thermal Transient	This report is a key reference associated with Above-Core Structure Calculations	Calculated Analysis and Description of Calculation Methods
25329	THERMAL TRIPING OF THE PFR ABOVE CORE STRUCTURE	JUDD AM	1984	PFR/LLF/P(85)17;PFR/SWP/P(84)23	N/A	PFR	Thermal Triping, Above Core Structure	This report is a key reference associated with Above-Core Structure for the PFR	Calculations and results for required topic
25443	CDFR ABOVE CORE STRUCTURE NATURAL FREQUENCY ANALYSIS OF STRUCTURE	MCDONALD GM	1982	E/EDD/TN 1091	NNC	CDFR	ACS, Frequency	This report is a key reference associated with ACS Vibration	Calculations and results for required topic
25606	MAUSCA 3A PROJECT 1992/1993 CLOSING REPORT (NUCLEAR ENGINEERING LABORATORIES-UNIVERSITY OF MANCHESTER)	JACKSON JD;AN P;SANDIS JF;ALAMAR A	1993		Nuclear Engineering Development	N/A	MAUSCA	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
25609	C-GAS CALCULATIONS OF AEROSOL EFFECTS ON HEAT TRANSFER IN THE EFR ACS	HULME G	1993	EDC/93/038	EFR ASSOCIATES	EFR	Aerosol effects, Heat Transfer, ACS	This report is a key reference associated with Cover Gas and ACS	Calculated Data and description of the Calculation Methods
25609	C-GAS CALCULATIONS OF AEROSOL EFFECTS ON HEAT TRANSFER IN THE EFR ACS	HULME G	1993	EDC/93/038	EFR ASSOCIATES	EFR	CGAS, Aerosol, Heat Transfer	This report is a key reference associated with CGAS and CGAST	Calculated Data
25648	ENHANCEMENT OF THE C-GAS-T TRANSIENT CODE FOR EFR COVER GAS HEAT AND MSS TRANSFER MODELLING	PARR SM	1993	EDC/93/032	EFR ASSOCIATES	EFR	CGAST, Cover Gas, Mass Transfer	This report is a key reference associated with CGAS and CGAST	Description of Calculation Method and associated Tooling
25699	THERMAL STRIPING EVALUATION IN THE FREYJA AIR MODEL APPROXIMATION TO AN ENLARGED ABOVE CORE STRUCTURE ENCOMPASSING A CORE WITH ONE RING OF BREEDER ASSEMBLIES	ASHTON MW;WILKINSON J	1992	FMD/D(92)117	AEA Technology	EFR	FREYJA, Thermal Striping, ACS	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results for required topic
26683	PFR BREEDER TRANSIT TIMES FROM CORE OUTLET TO THE ABOVE CORE STRUCTURE	WINN RW		ACSCM/P(76)9	REML	PFR	Breeder Transit Times, Core Outlets, Above Core Structure	This report is a key reference associated with Above-Core Structure for the PFR	Calculations and results for required topic
26684	PFR ABOVE CORE STRUCTURE FLOW EXPERIMENTS ON A 1/5TH SCALE WATER MODEL PRELIMINARY RESULTS	WINN WR;CONROY PJ;TAYLOR AF		PFR/SWP/P(77)17;ACSCM/P(77)17	N/A	PFR	ACS	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results for required topic
26767	CDFR 1/15TH SCALE HOT POOL WATER MODEL. RESULTS OF INITIAL TEST PROGRAMME ON THE REFERENCE DESIGN (PROJECT NO C86/055)	FLETCHER BT;SMITH MR	1983	RES INT 2641	NNC	CDFR	1/15, Hot Pool	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis
26769	CDFR HOT POOL MODEL TESTING OF MODIFIED IHX INLET CONFIGURATION (PROJECT C86/055)	FLETCHER B	1983	RES INT 2749	NNC	CDFR	Hot Pool, IHX	This report is a key reference associated with Hot Pool References and the CDFR Experiments	Calculated/Experimental Results and Analysis

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26839	CLOSING REPORT MUSAC 3A PROJECT	JACKSON JD;SANCHIS JF;ALAMAR A	1993	PE1/7911	Nuclear Engineering Development	N/A	MUSAC	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
27142	CDFR HOT POOL GAS ENTRAINMENT	COLLINSON AE	1985	ND-M-2986;THSG/P(85)45	UKAEA	CDFR	Hot Pool, Entrainment	This report is a key reference associated with Hot Pool References and Free Surface	Calculations and analysis of results
27520	FLOW INDUCED VIBRATION OF THE ABOVE CORE STRUCTURE	TAYLOR AF;FERGUSON BG		ND-M-12	UKAEA	PFR	Flow Induced, vibration, ACS	This report is a key reference associated with ACS Vibration	Calculations and results for required topic
27522	THERMAL SHOCK IN THE PFR ABOVE CORE STRUCTURE SUPPORT FEATURE	CLAYTON AM	1980	ND-M-1026;PFR/SWP/P(80)6	UKAEA	PFR	Thermal Shock, Above Core Structure	This report is a key reference associated with Above-Core Structure for the PFR	Calculations and results for required topic
27529	THERMAL SHOCK TESTS ON PFR ABOVE CORE STRUCTURE SUPPORT REPLICAS PROGRESS TO MAY 1982	BURKE WT;DAVIES ER;BROWN J;SARGENT T	1982	ND-M-1877;LASG/P(82)107	UKAEA	PFR	Thermal Shock, ACS	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results for required topic
27568	ENGINEERING SPECIFICATION FOR A THERMAL SHOCK TEST ON A PFR ACS SUPPORT FEATURE IN THE HIGH TEMPERATURE SODIUM LOOP	MATHER B		RED 112/77	Nuclear Power Development Labratories	PFR	Thermal Shock, Above Core Structure	This report is a key reference associated with Above-Core Structure for the PFR	Calculations and results for required topic
27595	ABOVE CORE STRUCTURE AIR THERMAL SHOCK EXPERIMENT VALIDATION OF RESULTS WITH REACTOR DATA	DIXON M		PFR/SWP/P(78)69;TN/P(78)285;ACSCM/P(78)52	NNC	PFR	ACS, Thermal Shock	This report is a key reference associated with ACS Experiments	Calculations and Experimental Results for required topic. Comparison with Calculated data
27726	MUSAC 3 PROJECT REPORT OCTOBER 1991	JACKSON JD;AN P;ANDERSON A			Nuclear Engineering Development	N/A	MUSAC	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
27727	MUSAC 3 PROJECT 1991/92 ANNUAL REPORT	JACKSON JD;AN P;ANDERSON A;TOTEV T	1992		Nuclear Engineering Development	N/A	MUSAC	This Report is a key reference associated with Cover Gas and the Manchester University Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data
27733	AN ANALYSIS OF THERMAL PERFORMANCE SURFACE CONDENSATION AND AEROSOL FORMATION IN THE SONAR AND SOWAT COVER GAS EXPERIMENTS	FORD IJ	1990	AEA-INTEC-0088	AEA Technology	N/A	Thermal Performance, SONAR, SOWAT	This report is a key reference associated with Cover Gas Theory	Experimental Data, Comparison from two different datasets
27734	60CM SODIUM VAPOUR TRANSPORT RIG (SONAR) 2 ANALYSIS OF DRY HEAT TRANSFER MEASUREMENTS	ROBERTS DN	1990	AEA-INTEC-0010	UKAEA	LMFBR	SONAR RIG, Heat Transfer	This Report is a key reference associated with Cover Gas and the Harwell Experiments	Experimental Data assessing Cover Gas. Potentially not possible to be re-repeated. OPEX Data

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4	ULTRASONIC WALL THICKNESS MEASUREMENT OF THE PFR EVAPORATOR TUBES	HUDGELL RJ		NDR 808	UKAEA	PFR	Ultrasonic, Wall Thickness, Evaporator Tubes	This report is a key reference associated with Steam Generators and Fretting and Galling of the Evaporator Tubes	Operation Experience associated with the Steam Generators and Fretting and Galling of the Evaporator Tubes. Potentially unrepeatable experiments, analysis and experience
50	A STUDY OF THE CONSEQUENCES OF AN OIL LEAK FROM THE MECHANICAL PUMP ON THE RISLEY HIGH TEMPERATURE SODIUM LOOP	JONES DG	1983	CEWP/P(83)356	N/A	PFR	Oil Leak, Mechanical Pump, High Temperature, Sodium Leak	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
74	THE CRACKING OF EVAPORATOR WELDS IN PFR,MWG,CSG	VOICE E;EDGE DM;LINEKAR GA	1983	EDCC/P(83)51;NDM 2199;CCCSG/P(83)985;MWP/P(83)1085;CEWP/P(83)412	UKAEA	PFR	Cracking, Evaporator Welds	This report is a key reference associated with Steam Generators and Crack Growth and Leak-Before-Break	Operation Experience associated with the Steam Generators, Crack Growth and Leak Before Break. Also, the report has information associated with Local Post Weld Heat Treatments. Potentially unrepeatable experiments, analysis and experience
81	THE VISUAL EXAMINATION OF THE UNDER-SURFACE OF THE TUBEPLATE ON PFR EVAPORATOR TUBE BUNDLE WU3, THROUGH THE TUBE 299 ACCESS HOLE, MARCH 1982	FRASER AS;ROGER RJC	1982	NDM 1890;MWP/P(84)2002;CCCSG/P(84)1002;CEWP/P(84)423	UKAEA	PFR	Tubeplate, Evaporator Tube Bundle	This report is a key reference associated with Steam Generators and Tubeplate Washing	Operation Experience associated with the Steam Generators and Tubeplate Washing. Potentially unrepeatable experiments, analysis and experience
137	PROPOSAL FOR THE IN-CORE SECTION OF A RADIAL BREEDER BPD SYSTEM	SHERWOOD D	1983	TN/P(83)605;CTWG/P(83)36	NNC	PFR	Radial , Breeder	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
181	VOID SWELLING IN THE NIMONIC PE16 CONTROL ROD SEG FROM PFR	FULTON EJ;SINCLAIR WDJ	1983	DFMC(83)P2;CPN/740	DNPDE	PFR	Void Swelling, Nimonic, PE16, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
226	PFR DESIGN REVIEW - ABSORBER RODS, GUIDE TUBES AND 4" BREEDER REFLECTORS	BROWNE JJ		FEWP/P(84)12	NPDO	PFR	Absorber Rods, Guide Tubes, Breeder, Reflectors	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
229	PFR ABSORBER AND GUIDE TUBE DISCHARGE STRATEGY	DODD CL		FROC/P(84)99;FEWP/P(84)15	N/A	PFR	Absorber, Guides Tube, Discharge	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
416	THE VISUAL EXAMINATION OF MAGNETITE CONDITION ON SELECTED TUBES OF PFR EVAPORATOR WU3 AT PEN 28, AND THEIR BORE CONDITION AFTER CHEMICAL CLEANING	FRASER AS;ROGER RJC;PORTER JD	1983	NDM-1963;MWP/P(84)1535;MWP/FIXSG/P(84)249	UKAEA	PFR	Magnetite, Tubes, evaporator, Bore condition, Chemical Cleaning	This report is a key reference associated with Steam Generators and the Condition of the Magnetite Layer in Evaporator Tubes	Operation Experience associated with the Steam Generators and the Condition of the Magnetite Layer in the Evaporator Tubes. Potentially unrepeatable experiments, analysis and experience
445	METALLURGICAL EXAMINATION OF TUBE TO TUBE PLATE WELD NO. 408 FROM PFR EVAPORATOR CELL 2	KIRKLAND GR;DAVIES ER;HURLEY JC	1981	NDM-1488;TF/P(81)459;MWP/CCCSG/P(81)897;MWP/P(81)997	UKAEA	PFR	Metallurgical, Tube, Tube Plate Weld, Evaporator Cell	This report is a key reference associated with Steam Generators and the Metallurgical Examination of Evaporator Welds	Operation Experience associated with the Steam Generators and the Metallurgical Examination of Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
449	TUBES PLUGGED OR SLEEVED IN THE PFR EVAPORATOR TUBE BUNDLES BECAUSE OF PITTING, LEAKAGE OR OTHER DEFECTS BETWEEN SEPTEMBER 1973 AND DECEMBER 1980	FRASER AS;ROGER RJC;MCKEAGUE R	1981	NDM-1517	UKAEA	PFR	Tube, Plug, Sleeved, Evaporator Tube, Pitting, Leakage, Defects	This report is a key reference associated with Steam Generators and the State of the Evaporator Welds	Operation Experience associated with the Steam Generators and the State of Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
452	METALLURGICAL CHARACTERISATION OF PFR EVAPORATOR TYPE WELD	LINEKAR GAB;HUGHES B;ROGER RJC	1981	NDM-1610	UKAEA	PFR	Metallurgical, Evaporator Tube Weld	This report is a key reference associated with Steam Generators and the Metallurgical Examination of Evaporator Welds	Operation Experience associated with the Steam Generators and the Metallurgical Examination of Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
453	THE INSPECTION OF PFR EVAPORATOR WORKS UNIT 3 IN CIRCUIT 2, 4 TO 10 JULY 1981	FRASER AS;LEYLAND KS;SHARP RKY;ROGER RJC	1981	NDM-1613	UKAEA	PFR	Evaporator	This report is a key reference associated with Steam Generators and the Identification of Leaking Welds from the Water Side	Operation Experience associated with the Steam Generators and the Identification of Leaking Welds from the Water Side. Potentially unrepeatable experiments, analysis and experience
454	THE METALLURGICAL EXAMINATION OF TUBE-TO-TUBEPLATE WELD NUMBER 280, REMOVED FROM PFR EVAPORATOR TUBE BUNDLE WU2 IN 1977	FRASER AS;ROGER RJC;IRONS H	1983	NDM-1696	UKAEA	PFR	Metallurgical, Tube, Tube Plate Weld	This report is a key reference associated with Steam Generators and the Metallurgical Examination of Evaporator Welds	Operation Experience associated with the Steam Generators and the Metallurgical Examination of Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
455	THE INSPECTION OF PFR EVAPORATOR WU3 IN CIRCUIT 2 AUGUST 1981	FRASER AS;ROGER RJC;SHIPLEY DF	1981	NDM-17188	UKAEA	PFR	Evaporator, WU3	This report is a key reference associated with Steam Generators and the Identification of Leaking Welds from the Water Side	Operation Experience associated with the Steam Generators and the Identification of Leaking Welds from the Water Side. Potentially unrepeatable experiments, analysis and experience
457	THE METALLURGICAL EXAMINATION OF TUBE-TO-TUBEPLATE WELD NUMBER 101 FROM PFR EVAPORATOR WU3 IN CIRCUIT 2	YATES G;IRONS H	1982	NDM-1726;CCCSG/P(82)948;MWP/P(82)1048	UKAEA	PFR	Metallurgical, Tube, Tube Plate Weld	This report is a key reference associated with Steam Generators and the Metallurgical Examination of Evaporator Welds	Operation Experience associated with the Steam Generators and the Metallurgical Examination of Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
458	THE VISUAL INSPECTION OF PFR EVAPORATOR WU1 IN CIRCUIT 1 SEPTEMBER 1981	FRASER AS;MCDONALD J;LEYLAND KS;TELFORD D	1981	NDM-1734	UKAEA	PFR	Evaporator, WU1	This report is a key reference associated with Steam Generators and the Identification of Leaking Welds from the Water Side	Operation Experience associated with the Steam Generators and the Identification of Leaking Welds from the Water Side. Potentially unrepeatable experiments, analysis and experience
459	PFR SPARE EVAPORATOR UNIT - METALLURGICAL CHARACTERISATION OF A TEST WELD	LINEKAR GAB;HUGHES B	1981	NDM-1735	UKAEA	PFR	Spare, Evaporator, Metallurgical, Test Weld	This report is a key reference associated with Steam Generators and the Metallurgical Examination of Evaporator Welds	Operation Experience associated with the Steam Generators and the Metallurgical Examination of Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
460	PFR EVAPORATOR WELD FAILURES: STUDIES OF CRACKS INCLUDING GROWTH RATE, MORPHOLOGY, CORROSION AND SPACE-TIME DISTRIBUTION	BUTLER JK	1982	NDM-1753	UKAEA	PFR	Evaporator Weld, Cracks, Growth Rate, Morphology, Corrosion, Space-Time Distribution	This report is a key reference associated with Steam Generators and Crack Growth and Leak-Before-Break	Operation Experience associated with the Steam Generators, Crack Growth and Leak Before Break. Potentially unrepeatable experiments, analysis and experience
466	A REPORT ON THE SODIUM LEVEL MEASUREMENTS MADE IN THE SPARE INLET-SIDE POCKET OF EVAPORATOR WORKS UNIT 1 (MARCH 1982)	JAMES PR;LEYLAND KS;SMEDLEY JA	1982	NDM-1818	UKAEA	PFR	Sodium Level, Evaporator Works	This report is a key reference associated with Steam Generators and the Sodium Flow-Patterns affecting the Magnetite Formation	Operation Experience associated with the Steam Generators and the Sodium Flow-Patterns affecting the Magnetite Formation. Potentially unrepeatable experiments, analysis and experience
468	THE EXAMINATION OF THE UNDER SURFACE OF THE TUBEPLATE OF PFR EVAPORATOR TUBE BUNDLE WU3, OBSERVED THROUGH THE TUBE 172,241 AND 365 SAMPLE HOLES,JUNE 1981	FRASER AS;ROGER RJS;MACDONALD M	1982	NDM-1853	UKAEA	PFR	Under Surface, Tubeplate, Evaporator Tube	This report is a key reference associated with Steam Generators and Tubeplate Washing	Operation Experience associated with the Steam Generators and Tubeplate Washing. Potentially unrepeatable experiments, analysis and experience
469	THE METALLURGICAL EXAMINATION OF WELD TEST BLOCK NDT 33 AFTER EXPOSURE IN THE SMALL WATER LEAK RIG	FRASER AS; IRONS H;PORTER JD;ROGER RJC	1982	NDM-1858	UKAEA	PFR	Metallurgical, Weld Test Block, Small Water Leak Rig	This report is a key reference associated with Steam Generators and the Rig Tests to replicate After-Leak Conditions on the Sodium Side of Evaporator Welds	Operation Experience associated with the Steam Generators and the Rig Tests to replicate After-Leak Conditions on the Sodium Side of Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
470	THE VISUAL INSPECTION OF THE UNDER-SURFACE OF THE TUBEPLATE OF PFR EVAPORATOR TUBE BUNDLE WU3 THROUGH VENT LINE ACCESS HOLES, AUGUST 1981	FRASER AS;ROGER RJC;ROBERTSON D	1982	NDM-1873	UKAEA	PFR	Under Surface, Tubeplate, Evaporator Tube, WU3	This report is a key reference associated with Steam Generators and Tubeplate Washing	Operation Experience associated with the Steam Generators and Tubeplate Washing. Potentially unrepeatable experiments, analysis and experience
471	THE VISUAL EXAMINATION OF THE UNDER-SURFACE OF THE TUBEPLATE OF PFR EVAPORATOR TUBE BUNDLE WU1 THROUGH THE VENT LINE ACCESS HOLES, SEPTEMBER 1981	FRASER AS;ROGER RJC;TREVILLION EA	1982	NDM-1874	UKAEA	PFR	Under Surface, Tubeplate, Evaporator Tube, WU1	This report is a key reference associated with Steam Generators and Tubeplate Washing	Operation Experience associated with the Steam Generators and Tubeplate Washing. Potentially unrepeatable experiments, analysis and experience
472	THE VISUAL EXAMINATION OF THE INSIDE OF THE INLET HEADER REGION ON THE PFR CIRCUIT 2 EVAPORATOR CONTAINING TUBE BUNDLE WU3, THROUGH TUBE 487 ACCESS HOLE, FEBRUARY 1982	FRASER AS;ROGER RJC;MACDONALD J;LEYLAND KS	1982	NDM-1887	UKAEA	PFR	Under Surface, Inlet Header, Tube Bundle, WU3, Access Hole	This report is a key reference associated with Steam Generators and Tubeplate Washing	Operation Experience associated with the Steam Generators and Tubeplate Washing. Potentially unrepeatable experiments, analysis and experience
473	THE VISUAL EXAMINATION OF LOCALISED AREAS OF THE UNDER-SURFACE OF THE TUBEPLATE OF PFR EVAPORATOR TUBE BUNDLE WU3, THROUGH THE TUBE 235, 3 AND 396 ACCESS HOLES, APRIL 1982	FRASER AS;ROGER RJC	1982	NDM-1891	UKAEA	PFR	Under Surface, Tubeplate, Evaporator Tube, WU3	This report is a key reference associated with Steam Generators and Tubeplate Washing	Operation Experience associated with the Steam Generators and Tubeplate Washing. Potentially unrepeatable experiments, analysis and experience
474	THE EXAMINATION OF THE UNDER SURFACE OF THE TUBEPLATE ON PFR EVAPORATOR TUBE BUNDLE WU1, OBSERVED THROUGH THE TUBE 1127 ACCESS HOLE MARCH 1982	FRASER AS;ROGER RJC	1982	NDM-1918	UKAEA	PFR	Under Surface, Tubeplate, Evaporator Tube, WU1	This report is a key reference associated with Steam Generators and Tubeplate Washing	Operation Experience associated with the Steam Generators and Tubeplate Washing. Potentially unrepeatable experiments, analysis and experience
475	THE VISUAL EXAMINATION OF LOCALISED AREAS OF THE UNDER-SURFACE OF THE TUBEPLATE OF PFR EVAPORATOR TUBE BUNDLE WU3, THROUGH THE TUBE 255,268,374, AND 1261 ACCESS HOLES	FRASER AS;ROGER RJC;MACDONALD J	1982	NDM-1934	UKAEA	PFR	Under Surface, Tubeplate, Evaporator Tube, WU3	This report is a key reference associated with Steam Generators and Tubeplate Washing	Operation Experience associated with the Steam Generators and Tubeplate Washing. Potentially unrepeatable experiments, analysis and experience
476	THE LEAK EVENT IN EVAPORATOR WU2 IN CIRCUIT 3, 8-19 NOVEMBER 1981	EDGE DM;BELL AC;CURRIE R	1982	NDM-1947	UKAEA		Leak, Evaporator, WU2	This report is a key reference associated with Steam Generators and Crack Growth and Leak-Before-Break	Operation Experience associated with Steam Generators and Crack Growth and Leak-Before-Break. Potentially unrepeatable experiments, analysis and experience
477	THE VISUAL EXAMINATION OF LOCALISED AREA OF THE UNDER-SURFACE OF THE TUBEPLATE ON PFR EVAPORATOR TUBE BUNDLE WU1, THROUGH THE TUBE 16 ACCESS HOLE , JUNE 1982	FRASER AS;ROGER RJC;MCDONALD J	1982	NDM-1948	UKAEA	PFR	Under Surface, Tubeplate, Evaporator Tube, WU1	This report is a key reference associated with Steam Generators and Tubeplate Washing	Operation Experience associated with the Steam Generators and Tubeplate Washing. Potentially unrepeatable experiments, analysis and experience

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481	THE EXAMINATION OF PFR EVAPORATOR SLEEVE 16 REMOVED FROM WORKS UNIT 1	YATES G;IRONS H	1982	NDM-1998	UKAEA	PFR	Evaporator Sleeve	This report is a key reference associated with Steam Generators and Sleeving of Evaporator Welds	Operation Experience associated with Steam Generators and Sleeving of Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
486	VISUAL INSPECTIONS CARRIED OUT ON THE PFR EVAPORATOR TUBE BUNDLE WU1 IN THE CIRCUIT 1 EVAPORATOR, PLANT EVENT NUMBER 33, OCTOBER 1982	FRASER AS;ROGER RJC;MACDONALD J	1983	NDM-2073;MWP/P(84)1524;MWP/FIXSG/P(84)238	UKAEA	PFR	Evaporator Tube	This report is a key reference associated with Steam Generators and the Identification of Leaking Welds from the Water Side	Operation Experience associated with Steam Generators and the Identification of Leaking Welds from the Water Side. Potentially unrepeatable experiments, analysis and experience
487	THE VISUAL INSPECTION OF THE UNDER-SURFACE OF THE TUBEPLATE OF PFR EVAPORATOR TUBE BUNDLE WU1 THROUGH THE TUBE 6 AND 122 ACCESS HOLES, NOVEMBER/DECEMBER 1982	FRASER AS;ROGER RJC;MACDONALD J	1983	NDM-2074	UKAEA		Under Surface. Tubeplate, Evaporator Tube, WU1	This report is a key reference associated with Steam Generators and Tubeplate Washing	Operation Experience associated with the Steam Generators and Tubeplate Washing. Potentially unrepeatable experiments, analysis and experience
498	IN-SERVICE INSPECTION OF THE PFR EVAPORATOR TUBE-TO-TUBEPLATE WELDS AFTER SLEEVING	PEAT TS;TELFORD DW	1983	NDM-2300;MWP/P(84)1530;MWP/FIXSG/P(84)244	UKAEA	PFR	In-Service Inspection, Evaporator Tube to Tubeplate Weld, Sleeving	This report is a key reference associated with Steam Generators and the Identification of Leaking Welds from the Water Side	Operation Experience associated with Steam Generators and the Identification of Leaking Welds from the Water Side. Potentially unrepeatable experiments, analysis and experience
500	METALLURGICAL EXAMINATION OF FAILURES ON INLET HEADER PULLED TEE REGIONS OF THERMAL SYPHON C, JULY 1981 AND SEPTEMBER 1982	FRASER AS;ROGER RJC;IRONS H	1983	NDM-2339	UKAEA	PFR	Metallurgical, Inlet Header, Pulled Tee Regions, Thermal Syphon	This report is a key reference associated with the Decay Heat Rejection System and the Metallurgical Examination of the Failed AHX Pulled Tees	Operation Experience associated with the Decay Heat Rejection System and the Metallurgical Examination of the Failed AHX Pulled Tees. Potentially unrepeatable experiments, analysis and experience
513	AN ESTIMATE OF THE TERMINAL VELOCITY OF A PFR Mk IIIa CONTROL ROD DROPPED FROM THE CHARGE MACHINE	PARDY A;TAYLOR AF	1983	NDM-2516;DRAFT;PFR/FEDWP/P(83)0965	NPDL	PFR	Terminal Velocity, MK 111a, Control Rod, Charge Machine	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
536	ANALYSIS OF H2D SIGNALS LEADING TO IDENTIFICATION OF AN INLET GAS SPACE LEAK IN PFR EVAPORATOR IN CIRCUIT 2 - NOVEMBER 1980	BELL AC;EDGE DM	1980	NDM-1368;DRAFT;TF/P(80)444	UKAEA	PFR	H2D Signal, Inlet Gas Space Leak, Evaporator	This report is a key reference associated with Steam Generators and Hydrogen Detection Systems	Operation Experience associated with Steam Generators and the Hydrogen Detection Systems. Potentially unrepeatable experiments, analysis and experience
537	THE APPLICATION OF THE DNE INSPECTION PROCEDURE TO THE IDENTIFICATION OF DEFECTS IN PFR EVAPORATOR BUNDLES TUBE TO TUBE PLATE WELDS IN PREPARATION FOR CARRYING OUT SHOT-PEENING OPERATIONS	MCKEAGUE R;LEYLAND KS	1980	NDM-1365;DRAFT;TF/P(80)443	UKAEA	PFR	DNE Inspection, Defects, Evaporator Tube - Tube Plate Welds, Shotpeening	This report is a key reference associated with Steam Generators and the State of the Evaporator Welds	Operation Experience associated with Steam Generators and the State of the Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
540	COMMENTS ON THE DETECTION OF FAILED FUEL ELEMENTS IN CDFR	CARTWRIGHT DK	1980	NDM-1357;DRAFT;CFR/SWP/P(80)20;FFWG/P(80)11	UKAEA	CDFR	Failed, Fuel Elements	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
543	PROGRAMME FOR THE POST-IRRADIATION EXAMINATION OF PFR CONTROL ROD SEG (BORON CARBIDE0	GILCHRIST KE	1980	NDM-1349;MWP/P(80)1116;FRASG/P(80)166	NPDL	PFR	Post Irradiation, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
567	THE DESIGN OF A SHORTENED EXTENSION ROD FOR USE WITH A PFR MkIV CONTROL ROD IN VIBRATION EXPERIMENTS	DUTHIE JC	1982	NDR-716;PFR/FEDWP/P(81)0833	UKAEA	PFR	Extension Rod, Control Rod, Vibration	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
579	RNL RESULTS FOR THE ULTRASONIC EXAMINATION OF PFR EVAPORATOR WU 1 TUBE TO TUBEPLATE WELDS BETWEEN SEPTEMBER 1981 AND JUNE 1982	HUDGELL C	1983	NDR-965	UKAEA	PFR	Ultrasonic, Evaporator Tube, Tubeplate, Welds	This report is a key reference associated with Steam Generators and the State of the Evaporator Welds	Operation Experience associated with Steam Generators and the State of the Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
607	TUBE GALLING ON EVAPORATOR WU2	BAINBRIDGE H	1984	OC/P(84)135	NNC	PFR	Tube Galling, Evaporator WU2	This report is a key reference associated with Steam Generators and Fretting and Galling of the Evaporator Tubes	Operation Experience associated with Steam Generators and Galling of the Evaporator Tubes. Potentially unrepeatable experiments, analysis and experience
618	A QUALITATIVE ASSESSMENT OF FLOW INDUCED VIBRATION OF THE PFR Nak-AIR HEAT EXCHANGER WITH FAILED BRACING CLEATS	COLLINSON AE;FRANCE NJ	1983	NDM-2126;DRAFT;OC/P(83)50	UKAEA	PFR	Flow Induced Vibration, NaK - Air, Heat Exchanger, Bracing Cleats	This report is a key reference associated with the Decay Heat Rejection System and the Condition of the AHX Tube Cleats	Operation Experience associated with the Decay Heat Rejection System and the Metallurgical Examination of the Failed AHX Pulled Tees. Potentially unrepeatable experiments, analysis and experience
650	THE EFFECT OF PRESSURE PULSES ON THE INTEGRITY OF PARTIAL PENETRATION WELDS IN THE PFR IHX OUTER SHELL	GREEN D	1983	TN/P(83)588;PFR/SWP/P(83)10;ADD 1.	NNC	PFR	Pressure Pulse, Partial Penetration Welds, IHX, Outer Shell	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
676	PFR IHX TOP: STRESS ANALYSIS SUMMARY REPORT	CHURCH A;CLARK JS	1983	TN/P(83)625	NNC	PFR	IHX, Stress, Analysis	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
681	PFR IHX REMOVAL - AN INITIAL ASSESSMENT OF PRIMARY CIRCUIT FLOWS AND HYDRAULIC LOADS DURING PLUG INSERTION	SMITH AG	1983	TN/P(83)638	NNC	PFR	IHX, Primary Circuit, Hydraulic, Plug insertion	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
697	REASSESSMENT OF THE CRACK GROWTH LIFE UNDER THERMAL STRIPING CONDITIONS OF THE PFR IHX LOWER TUBE PLATE/SHELL WELD	GREEN D	1984	PFR/SWP/P(84)1;TN/P(84)662	NNC	PFR	Crack Growth, Thermal Striping, IHX, Tube Plate, Shell Weld	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
708	INVESTIGATION OF AC FAILURE TRANSIENT WHEN ONLY TWO DHR'S OPERATE WITH A SINGLE FAN EACH	THOMSON AF	1984	TN/P(84)682	NNC	PFR	AC Failure, DHR	This report is a key reference associated with the Decay Heat Rejection System and the Reliability of Decay Heat Rejection	Operation Experience associated with the Decay Heat Rejection System and the Metallurgical Examination of the Failed AHX Pulled Tees. Potentially unrepeatable experiments, analysis and experience
726	PFR ROOF ROTATING SHIELD COMPARISON OF PENETRATION THERMOCOUPLE READINGS WITH COMPUTER CALCULATED TEMPERATURE DISTRIBUTION	WALE RJ	1983	DM/P(83)447	NPC	PFR	Roof, Rotating Shield, Thermocouple, Temperature Distribution	This report is a key reference associated with Roof and Roof Cooling	Comparison between experimental and calculated values.
740	THE WELD CRACKING TESTS - A SERIES OF TESTS IN THE DOUNREAY SMALL WATER LEAK RIG TO INVESTIGATE SODIUM-SIDE INITIATION OF TUBE-TO-TUBEPLATE WELD FAILURE MECHANISMS	EDGE DM		CCCSG/P(82)938;MWP/P(82)1038	N/A	PFR	Weld Cracking, Small Water Leak Rig, Sodium Side, Weld Failure, Tube, Tubeplate	This report is a key reference associated with Steam Generators and the Rig Tests to replicate After-Leak Conditions on the Sodium Side of Evaporator Welds	Operation Experience associated with Steam Generators and the Rig Tests to replicate After-Leak Conditions on the Sodium Side of Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
768	METALLURGICAL EXAMINATION OF PFR BRAZED STEAM TUBE ASSEMBLY (TUBE 365, EVAPORATOR CELL 2)	JOHNSON R	1983	NDR-722;RWP/P(83)140;MWP/P(83)1503;FIXSG/P(83)234	UKAEA	PFR	Metallurgical, Blazed, Steam Tube	This report is a key reference associated with Steam Generators and the Identification of Leaking Welds from the Water Side	Operation Experience associated with Steam Generators and the Identification of Leaking Welds from the Water Side. Potentially unrepeatable experiments, analysis and experience
771	METALLURGICAL EXAMINATION OF TUBE TO TUBE PLATE WELD NO. 480 FROM PFR EVAPORATOR WORKS UNIT 3 CELL 2	KIRKLAND GR;DAVIES ER;HURLEY JC	1982	NDR-741;OC/P(82)4;MWP/P(82)1030;CCCSG/P(82)930;FIXSG/P(84)237	UKAEA	PFR	Metallurgical, Tube, Tubeplate, Weld, Evaporator	This report is a key reference associated with Steam Generators and the Metallurgical Examination of Evaporator Welds	Operation Experience associated with Steam Generators and the Metallurgical Examination of Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
776	METALLURGICAL EXAMINATION OF TUBE PLATE WELD NO. 365 FROM PFR EVAPORATOR UNIT 3 CELL 2	KIRKLAND GR;DAVIES ER;HURLEY JC	1982	NDR-812	UKAEA	PFR	Metallurgical, Tube, Tubeplate, Weld, Evaporator	This report is a key reference associated with Steam Generators and the Metallurgical Examination of Evaporator Welds	Operation Experience associated with Steam Generators and the Metallurgical Examination of Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
778	THE EXPERIMENTAL DETERMINATION OF THE VIBRATION MODES OF A PFR MkIV CONTROL ROD WITH A DYNAMICALLY SIMULATED EXTENSION ROD	WOLSTENHOLME JFR	1984	NDR-827;PFR/FEDWP/P(83)0951	UKAEA	PFR	Vibration, MKIV, Control Rod, Extension	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
851	ENDORSEMENT OF PFR EVAPORATOR SLEEVES	NETTLEY PT	1983	EDCC/P(83)30;RWP/P(83)119;MWP/P(83)1494;MWP/FIXSG/P(83)227	NNC	PFR	Evaporator Sleeves	This report is a key reference associated with Steam Generators and the Identification of Leaking Welds from the Water Side	Operation Experience associated with Steam Generators and the Identification of Leaking Welds from the Water Side. Potentially unrepeatable experiments, analysis and experience
893	INVESTIGATION OF SCTL BASKET NUMBER 6	HUMPHRIES J;MORRISON N		OC/P(82)10	N/A	N/A	SCTL, Basket	This report is a key reference associated with Secondary Cold Trap Loops	Experimental Results associated with SCTL
904	A REVIEW OF THE PFR EVAPORATOR TUBE TO TUBEPLATE WELD PROBLEM	BROOMFIELD AM	1982	OC/P(82)24;PODG/P(82)34;MWP/P(82)1046;CCCSG/P(82)946	DNE	PFR	Evaporator Tube, Tubeplate, Weld	This report is a key reference associated with Steam Generators and the Review of Evaporator Leaks	Operation Experience associated with Steam Generators and the Review of Evaporator Leaks. Potentially unrepeatable experiments, analysis and experience
911	PFR-IHX REMOVAL SCHEME - STATUS AT NOVEMBER 1982	HAYDEN O	1981	OC/P(82)34	NNC	PFR	IHX Removal Scheme	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
928	REPLACEMENT IHX FOR THE PFR	HAYDEN O	1983	OC/P(83)57	NNC	PFR	IHX, Replacement	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
933	A REVIEW OF EQUIPMENT NEEDED FOR REPAIR TO AN IHX - PFR DOUNREAY	WEBB J	1983	OC/P(83)62	UKAEA	PFR	Equipment, Repair, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
934	PFR IHX REPLACEMENT	HAYDEN O	1983	OC/P(83)63	N/A	PFR	IHX, Replacement	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
935	A REVIEW OF EQUIPMENT NEEDED FOR INSPECTION OF AN IHX, PFR DOUNREAY	WEBB J;HUNTER D	1983	OC/P(83)64	UKAEA	PFR	Equipment, Repair, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
939	SCTL BASKET LIFE	HUMPHRIES J;MORRISON N	1983	OC/P(83)69	N/A	N/A	SCTL, Basket	This report is a key reference associated with Secondary Cold Trap Loops	Experimental Results associated with SCTL
951	REMOVAL OF AN IHX - FURTHER ASPECTS	WEBB J;HUNTER D	1983	OC/P(83)80	UKAEA	PFR	Removal, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
973	SCTL COLD TRAP VESSEL EXCHANGE	MARSHALL W;GRAY J	1983	OC/P(83)99	N/A	N/A	SCTL, Cold Trap, Vessel, Exchange	This report is a key reference associated with Secondary Cold Trap Loops	Experimental Results associated with SCTL
983	STATUS OF THE AIR HEAT EXCHANGERS DECAY HEAT REMOVAL SYSTEM, PFR DOUNREAY	WEBB J	1984	OC/P(84)109	UKAEA	PFR	Air Heat Exchangers, Decay Heat	This report is a key reference associated with the Decay Heat Rejection System and the Gas Locks in Horizontal Pipe Runs	Operation Experience associated with the Decay Heat Rejection System and the Metallurgical Examination of the Failed AHX Pulled Tees. Potentially unrepeatable experiments, analysis and experience
1044	WATERSIDE AND SODIUM SIDE CORROSION OF PFR EVAPORATOR TUBING REMOVED FROM WORKS UNITS 1 AND 3 BETWEEN MAY 1981 AND NOVEMBER 1982 - WATERSIDE CORROSION SODIUM SIDE CORROSION - STEAM GENERATORS	ASHMORE CB;TOMLINSON L;HURDUS MH	1984	AERE-R-11134;EDCC/P(83)96	AEA TECHNOLOGY	PFR	Waterside, Sodium Side, Evaporator Tubing, Corrosion, Steam Generator	This report is a key reference associated with Steam Generators and the Condition of the Magnetite Layer in Evaporator Tubes	Operation Experience associated with Steam Generators and the Condition of the Magnetite Layer in Evaporator Tubes. Potentially unrepeatable experiments, analysis and experience
1054	THE DETECTION OF FRETTING WEAR FOR PFR SGU TUBING	GRAY BS;HUDGELL RJ;NETTLEY PT	1983	EDCC/P(83)45	RNL	PFR	Fretting, SGU, Tubing	This report is a key reference associated with Steam Generators and Fretting and Galling of the Evaporator Tubes	Operation Experience associated with Steam Generators and Galling of the Evaporator Tubes. Potentially unrepeatable experiments, analysis and experience
1057	NON-DESTRUCTIVE EXAMINATION OF EVAPORATOR TUBES FOR FRETTING WEAR AND GALLING DAMAGE	WALFORD JD	1983	EDCC/P(83)40	RNL	PFR	Non-Destructive Examination, Evaporator Tube, Fretting, Galling	This report is a key reference associated with Steam Generators and Fretting and Galling of the Evaporator Tubes	Operation Experience associated with Steam Generators and Galling of the Evaporator Tubes. Potentially unrepeatable experiments, analysis and experience
1061	NOTES ON EVAPORATOR WELD CORROSION AND EMBRITTLEMENT,MWG,CSG	BUTLER JK	1982	EDCC/P(82)19	RNL	PFR	Evaporator Weld, Corrosion, Embrittlement	This report is a key reference associated with Steam Generators and Crack Growth and Leak-Before-Break	Operation Experience associated with Steam Generators and Crack Growth and Leak-Before-Break. Potentially unrepeatable experiments, analysis and experience
1063	EVAPORATOR WU1 RE-INSPECTION: JUNE 1982	WALFORD JD	1982	EDCC/P(82)10	RNL	PFR	Evaporator, WU1	This report is a key reference associated with Steam Generators and the State of the Evaporator Welds	Operation Experience associated with Steam Generators and the State of the Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
1064	WORKS UNIT 3 - COMPARISON OF DNE ULTRASONIC INSPECTION RESULTS - AN UPDATE	LEYLAND KS	1982	EDCC/P(82)9	RNL	PFR	DNE, Ultrasonic, WU3	This report is a key reference associated with Steam Generators and the State of the Evaporator Welds	Operation Experience associated with Steam Generators and the State of the Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
1144	EXAMINATION OF THE HYDROGEN INGRESS RATES TO CIRCUIT 1 SODIUM DURING START-UP PERIODS FROM 1980 TO 1983	WALLACE DM		EDCC/P(84)117;OC/P(84)113;OPS/N782;MWG/P(84)2;CSG/P(84)1;CEWP/P(84)431	RNL	PFR	Hydrogen Ingress, Sodium, Start-Up	This report is a key reference associated with Steam Generators and Hydrogen Detection Systems	Operation Experience associated with Steam Generators and Hydrogen Detection Systems. Potentially unrepeatable experiments, analysis and experience
1146	A SUMMARY OF THE POSITION ON THE ASSESSMENT OF POTENTIAL THERMAL STRIPING TO THE BOTTOM TUBEPLATE OF THE PFR IHX DURING SINGLE CIRCUIT OPERATION	BROADLEY D	1984	PFR/SWP/P(84)47;TN/P(84)702	NNC	PFR	Thermal Striping, Tubeplate, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
1179	PEBBLE - A COMPUTER CODE TO STUDY THE ABSORBER ROD INTERACTIONS WITH GUIDE TUBES DESCRIPTIVE NOTE	RIDING DJ	1981	FEWP/P(81)47;TN/P(81)188	RTDO	PFR	PEBBLE, Absorber Rod, Guide Tubes	This report is a key reference associated with the Core Support Structure	Review of Calculational Methods.
1188	IHX CLEAN-UP PROCEDURE FOLLOWING A MAJOR SODIUM/WATER REACTION	WEBB J	1984	OC/P(84)119	UKAEA	PFR	IHX, Sodium, Water, Reaction	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
1192	IMPROVEMENTS TO THE AVAILABILITY OF THE STEAM GENERATOR UNIT GAS PHASE HYDROGEN DETECTION SYSTEM	WILLIAMS R	1982	OC/P(82)29	DNE	PFR	Steam Generator, Hydrogen Detection	This report is a key reference associated with Steam Generators and Hydrogen Detection Systems	Operation Experience associated with Steam Generators and Hydrogen Detection Systems. Potentially unrepeatable experiments, analysis and experience
1230	WORK PACKAGE 322 N4: BPD	LAMBERT B;BARROWMAN G	1984	FREWG/P(84)028	NNC	PFR, CDFR	ISI, Instrumentation, Secondary Circuit	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
1377	LEAKAGE FLOW PAST CLOSED IHX VALVES	HENDERSON JDC;WILLIAMS DP		OPS/N.308	N/A	PFR	Leakage, IHX, Valves	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
1387	AVAILABILITY OF THE PFR THERMAL SYPHON EDHR SYSTEM FOLLOWING LOSS OF GRID SUPPLIES	BLAND PS		TECH.MEMO P&S(R)927;PFR/SWP/P(79)10	NPC	PFR	Thermal Syphon, EDHR, Loss of Grid	This report is a key reference associated with the Decay Heat Rejection System and the Reliability of Decay Heat Rejection	Operation Experience associated with the Decay Heat Rejection System and the Metallurgical Examination of the Failed AHX Pulled Tees. Potentially unrepeatable experiments, analysis and experience
1400	TESTS ON THERMAL SYPHON C NAK/AIR HEAT EXCHANGER	HERRICK AR;MCCRINDLE D		OPS NOTE 732	N/A	PFR	Thermal Syphon, NaK-Air, Heat Exchanger	This report is a key reference associated with the Decay Heat Rejection System and the Diagnosis of NaK Flow Conditions in AHX Tubes	Operation Experience associated with the Decay Heat Rejection System and the Metallurgical Examination of the Failed AHX Pulled Tees. Potentially unrepeatable experiments, analysis and experience
1401	REPORT ON THE PERFORMANCE CHECKS ON PFR DECAY HEAT REMOVAL LOOPS (PROJECT NO.RES/C87/41)	AUSTIN NM;BLAND PS	1983	RES.INT.2697;PFR/SWP/P(82)19	NNC	PFR	Decay Heat, Removal Loops	This report is a key reference associated with the Decay Heat Rejection System and the Overall DHR Loop Performance Tests	Operation Experience associated with the Decay Heat Rejection System and the Metallurgical Examination of the Failed AHX Pulled Tees. Potentially unrepeatable experiments, analysis and experience
1406	METALLURGICAL EXAMINATION OF A FAILURE ON PFR THERMAL SYPHON B	FRASER AS;PORTER JD;ROGER RJC		PFR/SWP/P(75)23;REV.1	DERE	PFR	Metallurgical, Thermal Syphon B	This report is a key reference associated with the Decay Heat Rejection System and the Metallurgical Examination of the Failed AHX Pulled Tees	Operation Experience associated with the Decay Heat Rejection System and the Metallurgical Examination of the Failed AHX Pulled Tees. Potentially unrepeatable experiments, analysis and experience
1408	VISUAL INSPECTION OF NAK AIR HEAT EXCHANGER IN PFR THERMAL SYPHON LOOP "A" OCTOBER 1983	CASTLE P	1983	OETD TECH NOTE.789	N/A	PFR	Thermal Syphon, NaK-Air, Heat Exchanger	This report is a key reference associated with the Decay Heat Rejection System and the Condition of the AHX Tube Cleats	Operation Experience associated with the Decay Heat Rejection System and the Metallurgical Examination of the Failed AHX Pulled Tees. Potentially unrepeatable experiments, analysis and experience
1419	PERFORMANCE TESTS ON PFR DECAY HEAT REMOVAL SYSTEM - CIRCUITS B AND C UPTO 400 C PRIMARY SODIUM TEMPERATURE	SEDDON F;GRUNDY I		FRD/5643/DN179	N/A	PFR	Decay Heat, Removal System, Primary Sodium Temperature	This report is a key reference associated with the Decay Heat Rejection System and the Overall DHR Loop Performance Tests	Operation Experience associated with the Decay Heat Rejection System and the Overall DHR Loop Performance Tests. Potentially unrepeatable experiments, analysis and experience
1431	RECOMMENDED CONSTRAINTS ON THE USE OF PFR DECAY HEAT REMOVAL LOOPS	WILKES DJ		PFR/SWP/P(78)45;TN/P(78)252	NPC	PFR	Decay Heat, Removal Loops	This report is a key reference associated with the Decay Heat Rejection System and the Reliability of Decay Heat Rejection	Operation Experience associated with the Decay Heat Rejection System and the Reliability of Decay Heat Rejection. Potentially unrepeatable experiments, analysis and experience
1442	THE NEED FOR DHR COILS ON IHX REPLACEMENT (DUMMY) PLUGS	HENDERSON JDC	1983	PFR/SWP/P(83)29	N/A	PFR	DHR, Coils, IHX, Plugs	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
1550	PFR SINGLE SECONDARY CIRCUIT OPERATION: ANALYSIS OF FLOW AND TEMPERATURE DISTRIBUTIONS UNDER THE INTERMEDIATE HEAT EXCHANGER (IHX) BOTTOM TUBEPLATE BY MEANS OF THE PHOENICS CODE - PART 1 2-DIMENSIONAL ANALYSIS. PART 2 3-DIMENSIONAL ANALYSIS	BROWN GA;SANDERSON S;SCRIVEN J		FR/THSG/P(84)8	RNPD	PFR	Flow, Temperature, IHX, Tubeplate, Phoenics	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
1560	THE DEVELOPMENT OF EXPLOSIVE WELDING TECHNOLOGY FOR PFR	HAMER AN	1984	ND-R-1166(R);FRPDC/P(84)66;FRDCC/MWG/P(84)40;FRDCC/MWG/FSG/P(84)3;FRDCC/MWG/MPSG/P(84)29;FRDCC/MWG/I	UKAEA	PFR	Explosive Welding	This report is a key reference associated with Steam Generators and the Identification of Leaking Welds from the Water Side	Operation Experience associated with Steam Generators and the Identification of Leaking Welds from the Water Side. Potentially unrepeatable experiments, analysis and experience

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
1564	AN INVESTIGATION INTO THE JETTING OF SODIUM ONTO THE UNDERSIDE OF THE TUBEPLATE OF PFR EVAPORATOR WORKS UNIT 3	MACKENZIE M	1984	NDM-2597	UKAEA	PFR	Jetting, sodium, Underside, Tubeplate, Evaporator, WU3	This report is a key reference associated with Steam Generators and the Sodium Flow-Patterns affecting the Magnetite Formation	Operation Experience associated with Steam Generators and the Sodium Flow-Patterns affecting the Magnetite Formation. Potentially unrepeatable experiments, analysis and experience
1580	LOCAL POST-WELD HEAT TREATMENT OF WU2 TUBE-TO-TUBEPLATE WELDS	YATES G;ARMSTRONG M;HUGHES B;IRONS HW;ROGER RJC	1984	NDM-2582	UKAEA	PFR	Post Weld, Heat Treatment, Tube to Tubeplate	This report is a key reference associated with Local Post Weld Heat Treatments	Operation Experience associated with Local Post Weld Heat Treatments. Potentially unrepeatable experiments, analysis and experience
1724	FUEL ELEMENT FAILURE DATA	TAYLOR AF;NUTTER NR	1981	MWP/P(81)1353;FIXSG/P(81)189	UKAEA	PFR	Fuel Element	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
1732	EXPLOSIVE WELDING OF TUBE-TUBEPLATE JOINTS FOR PFR EVAPORATOR TUBE BUNDLES	JACKSON PW;COMBE G;FRYER D;GRAHAM BL;SHAW MP		MWP/P(79)881;FIXSG/P(79)141	International Research and Development	PFR	Explosive Welding, Tube-Tubeplate, Evaporator Tube	This report is a key reference associated with Steam Generators and the Identification of Leaking Welds from the Water Side	Operation Experience associated with Steam Generators and the Identification of Leaking Welds from the Water Side. Potentially unrepeatable experiments, analysis and experience
1784	PFR REPLACEMENT IHX ISI SUMMARY	FENEMORE P;BOWKER LJ	1984	ED.751	NNC	PFR	Replacement, IHX, ISI	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
1798	PFR GUIDE TUBES AND ABSORBERS: ORDERING STRATEGY	STILLWELL JC		FROC/P(84)135	N/A	PFR	Guide Tubes, Absorbers	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
1800	PFR BREEDER REFLECTORS - DESIGN AND SUPPLY	DODD CL	1984	FROC/P(84)137	N/A	PFR	Breeder, Reflectors	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
1807	PROPOSED MODIFICATIONS TO THE PFR MKIV CONTROL RODS AND GUIDE TUBES	BROWNE JJ;FORD J	1984	FROC/P(84)124	NPDO	PFR	MKIV, Control Rods, Guide Tubes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
1807	PROPOSED MODIFICATIONS TO THE PFR MKIV CONTROL RODS AND GUIDE TUBES	BROWNE JJ;FORD J	1984	FROC/P(84)124	NPDO	PFR	MKIV, Control Rods, Guide Tubes	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
1808	PROPOSED MODIFICATIONS TO FLOWMETER LOCATION TUBE SPIKES	RIDING DJ	1984	PFRSWP/ESC/P(84)13;FROC/P(84)123	NPDO	PFR	Flowmeter, Tube Spikes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
1809	SAMPLES FROM JO5 FOR THERMAL STRIPING DAMAGE ASSESSMENT	BATES PM	1984	FROC/P(84)122;PFRESC/P(84)17	N/A	PFR	JO5, Thermal Striping, Damage	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
1817	A FORECAST OF REQUIREMENTS FOR PFR GUIDE TUBES AND CONTENTS	BROWNE JJ		FROC/P(84)113;PFR/FS/P(84)1	NPDO	PFR	Guide Tubes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
1818	POLICY FOR PFR CORE COMPONENT MEASUREMENT AND ROTATION	DODD CL	1984	FROC/P(84)112	NPDO	PFR	Core, Measurement, Rotation	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
1820	CHANGING THE CENTRAL GUIDE TUBE PFR, DOUNREAY	WEBB J	1984	FROC/P(84)109	UKAEA	PFR	Central Guide Tube	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
1830	PFR DESIGN REVIEW - ABSORBER RODS, GUIDE TUBES AND 4" BREEDER REFLECTORS	BROWNE JJ	1984	FEWP/P(84)12;FROC/P(84)102	NPDO	PFR	Absorber Rods Guide Tubes, Breeder, Reflector	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
1832	PFR ABSORBER AND GUIDE TUBE DISCHARGE STRATEGY	DODD CL		FROC/P(84)99	N/A	PFR	Absorber, Guide Tube	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
1847	BRITTLE LATCH GUIDE TUBES - A NOTE FOR THE RECORD	WEBB J	1982	FROC/P(82)14	RTDO	PFR	Brittle, Latch, Guide Tube	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
1900	DEVELOPMENT WORK FOR AN ULTRASONIC SYSTEM FOR IDENTIFICATION OF PFR CORE COMPONENTS	MCKNIGHT JA;WILLIS P;CARTWRIGHT DK		TRG/R/2313;EST/P(74)190	UKAEA	PFR	Ultrasonic, Core Components	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
2016	TUBE INSPECTION OF WORKS UNIT 3 - JULY-AUGUST 1982	TELFORD D;GREGORY CV		EDCC/P(82)14	N/A	PFR	Tube Inspection, WU3	This report is a key reference associated with Steam Generators and Fretting and Galling of the Evaporator Tubes	Operation Experience associated with Steam Generators and Galling of the Evaporator Tubes. Potentially unrepeatable experiments, analysis and experience
2019	SUMMARY REPORT ON THE ULTRASONIC EXAMINATION OF THE TUBE TO TUBEPLATE WELDS IN EVAPORATOR WORKS UNIT 1	NETTLEY PT;HUDGELL RJ;GRAY BS	1982	EDCC/P(82)3	N/A	PFR	Ultrasonic Examination, Tube, Tubeplate, Welds, Evaporator, WU1	This report is a key reference associated with Steam Generators and the State of the Evaporator Welds	Operation Experience associated with Steam Generators and the State of the Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
2025	NON DESTRUCTIVE TESTING OF THE TUBE TO TUBE PLATE WELDS IN PFR EVAPORATORS	GRAY BS;NETTLEY PT	1982	EDCC/P(82)1	N/A	PFR	Non-Destructive Testing, Tube, Tubeplate, Welds	This report is a key reference associated with Steam Generators and the State of the Evaporator Welds	Operation Experience associated with Steam Generators and the State of the Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
2067	SUMMARY OF THE OVERALL ANALYSIS OF SEVEN CDFR AND PFR AIR-COOLED HEAT EXCHANGER FINNED TUBE BUNDLES TESTED AT NEL	LEISHMAN P	1985	FREWG/P(85)082	NNC	CDFR	Air Cooled, Heat Exchangers, Finned Tube	This report is a key reference associated with the Decay Heat Rejection System and the Laboratory AHX Tests	Operation Experience associated with the Decay Heat Rejection System and the Laboratory AHX Tests. Potentially unrepeatable experiments, analysis and experience
2098	PFR REPLACEMENT IHX ISI SUMMARY	FENEMORE P;BOWKER LJ	1984	ED 751	NNC	PFR	Replacement, IHX, ISI	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
2182	THE SODIUM-SIDE THERMAL HYDRAULICS OF THE PFR EVAPORATORS AND THE WATER-SIDE DEPOSITION OF MAGNETITE	WEBSTER R;DAWSON C;FOLEY J		PTWG/P(83)18	UKAEA	PFR	Sodium Side, Thermal Hydraulics, Water Side, Deposition, Magnetite	This report is a key reference associated with Steam Generators and the Sodium Flow-Patterns affecting the Magnetite Formation	Operation Experience associated with Steam Generators and the Sodium Flow-Patterns affecting the Magnetite Formation. Potentially unrepeatable experiments, analysis and experience
2183	THE VALIDATION OF THE ANTHEA COMPUTER CODE USING DATA FROM THE PFR-IHX	BROWN GA	1983	PTWG/P(83)19	CTS	PFR	Anthea, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Validation of Calculated Results
2184	AN ANALYSIS OF THE FLOW AND TEMPERATURE DISTRIBUTIONS UNDERNEATH THE PFR-IHX BOTTOM TUBE-PLATE USING THE PHOENICS CODE	BROWN GA;SCRIVEN J	1983	PTWG/P(83)23	CTS	PFR	Flow, Temperature, Distribution, IHX, Tube Plate, Phoenics	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
2187	AN ANALYSIS OF THE FLOW AND TEMPERATURE DISTRIBUTIONS UNDERNEATH THE PFR/IHX BOTTOM TUBEPLATE USING THE PHOENICS CODE WHEN PFR IS OPERATING WITH ONE SECONDARY CIRCUIT	BROWN GA;SANDERSON MRS S;SCRIVEN J	1983	NDM-2409;PTWG/P(83)30	CTS	PFR	Flow, Temperature, Distribution, IHX, Tube Plate, Phoenics	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
2199	PROVISIONAL RESULTS FROM THE METALLOGRAPHIC EXAMINATION OF WELD 235 FROM PFR EVAPORATOR, WORKS UNIT 3, CIRCUIT 2	JAMES G;CHATWIN WH	1982	FTD EVAP.PROV.REPORT NO.16	N/A	PFR	Metallurgical, Weld, Evaporator, WU3	This report is a key reference associated with Steam Generators and the Metallurgical Examination of Evaporator Welds	Operation Experience associated with Steam Generators and the Metallurgical Examination of Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
2202	EXAMINATION OF A LOCALISED AREA OF THE UNDER SURFACE OF THE TUBEPLATE OF WU1 THROUGH THE TUBE 1127 ACCESS HOLE	FRASER AS;ROGER RJC	1982	FTD.EVAP.PROV.REPORT NO.12	N/A	PFR	Under surface, Tubeplate, WU1	This report is a key reference associated with Steam Generators and Tubeplate Washing	Operation Experience associated with the Steam Generators and Tubeplate Washing. Potentially unrepeatable experiments, analysis and experience
2203	EXAMINATION OF LOCALISED AREAS OF THE UNDER SURFACE OF THE TUBEPLATE OF WU3 THROUGH THE TUBE 235, 3 AND 296 ACCESS HOLES	FRASER AS;ROGER RJC	1982	FTD.EVAP.PROV.REPORT NO.11	N/A	PFR	Under surface, Tubeplate, WU3	This report is a key reference associated with Steam Generators and Tubeplate Washing	Operation Experience associated with the Steam Generators and Tubeplate Washing. Potentially unrepeatable experiments, analysis and experience

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
2204	A REVIEW OF EVAPORATOR WU1 - JUNE 1982	BUTLER JK	1982	FTD.EVAP.PROV.REPORT NO.10	N/A	PFR	Evaporator, WU1	This report is a key reference associated with Steam Generators and Crack Growth and Leak-Before-Break	Operation Experience associated with Steam Generators and Crack Growth and Leak-Before-Break. Potentially unrepeatable experiments, analysis and experience
2206	A REVIEW OF THE PFR SPARE EVAPORATOR'S FITNESS FOR SERVICES	BUTLER KJ	1982	FTD.EVAP.PROV.REPORT NO.5	N/A	PFR	Spare, Evaporator	This report is a key reference associated with Steam Generators and Crack Growth and Leak-Before-Break	Operation Experience associated with Steam Generators and Crack Growth and Leak-Before-Break. Potentially unrepeatable experiments, analysis and experience
2209	STRESSES IN HEAT EXCHANGER WELDS	BUTLER JK	1982	FTD.EVAP.PROV.REPORT NO. 2	N/A	PFR	Stress, Heat Exchanger, Welds	This report is a key reference associated with Steam Generators and Crack Growth and Leak-Before-Break	Operation Experience associated with Steam Generators and Crack Growth and Leak-Before-Break. Potentially unrepeatable experiments, analysis and experience
2210	CRACK GROWTH RATE INFERRED FROM FAILURES IN SERVICE	BUTLER JK	1982	FTD.EVAP.PROV.REPORT NO. 1	N/A	PFR	Crack Growth Rate, Failure, In-service	This report is a key reference associated with Steam Generators and Crack Growth and Leak-Before-Break	Operation Experience associated with Steam Generators and Crack Growth and Leak-Before-Break. Potentially unrepeatable experiments, analysis and experience
2229	PFR EVAPORATORS : ON-LOAD CORROSION BY ACID SULPHATE AND SUGGESTED METHODS OF PREVENTION	TOMLINSON L	1984	EDCC/P(84)108	N/A	PFR	On Load, Corrosion, Acid Sulphate	This report is a key reference associated with Steam Generators and the Condition of the Magnetite Layer in Evaporator Tubes	Operation Experience associated with Steam Generators and the Condition of the Magnetite Layer in Evaporator Tubes. Potentially unrepeatable experiments, analysis and experience
2231	COMPARISON BETWEEN PFR/CFR IHX DESIGNS	ROYDEN R	1983	PFR/SWP/P(83)25	NNC	PFR, CFR	IHX Design	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
2302	EXAMINATION OF TUBE 470/1470 REMOVED FROM PFR EVAPORATOR WORKS UNIT 2 PART 2 INVESTIGATION OF OXIDE DEPOSITION AND METAL CORROSION ON THE WATER AND SODIUM SIDES	ASHMORE CB;TOMLINSON L;HURDUS MH	1984	AERE-R-11323;FRDCC/MWG/P(84)26;MWG/CSG/P(84)8	AEA TECHNOLOGY	PFR	Evaporator, WU2, Oxide Deposition, Corrosion, Water, Sodium Sides	This report is a key reference associated with Steam Generators and the Condition of the Magnetite Layer in Evaporator Tubes	Operation Experience associated with Steam Generators and the Condition of the Magnetite Layer in Evaporator Tubes. Potentially unrepeatable experiments, analysis and experience
2318	TESTS ON THE EFFICACY OF REMOVAL OF SODIUM HYDROXIDE FROM CRACKS IN STEAM GENERATOR MATERIAL BY SODIUM WASHING	BUXTON K;MACKINNON DJ	1983	NDM-2487;FRDCC/MWG/P(85)34;FRDCC/MWG/P(85)114	UKAEA	PFR	Sodium Hydroxide, Cracks, Steam Generator, Sodium Washing	This report is a key reference associated with Steam Generators and Tubeplate Washing	Operation Experience associated with the Steam Generators and Tubeplate Washing. Potentially unrepeatable experiments, analysis and experience
2528	EXAMINATION OF TUBE 470/1470 REMOVED FROM PFR EVAPORATOR WORKS UNIT 2. PART 1. GENERAL SURVEY OF THE TUBE SURFACE AND INVESTIGATION OF SPALLED OXIDE REGIONS - WATERSIDE CORROSION - STEAM GENERATORS 2.1/4CR1MO	HURDUS MH;TOMLINSON L;ASHMORE CB	1984	AERE-R-11374;FRDCC/MWG/CSG/P(84)10;FRDCC/MWG/P(84)28	AEA TECHNOLOGY	PFR	Evaporator, WU2, Tube Surface, Spalled Oxide Regions, Waterside Corrosion, Steam Generators	This report is a key reference associated with Steam Generators and the Condition of the Magnetite Layer in Evaporator Tubes	Operation Experience associated with Steam Generators and the Condition of the Magnetite Layer in Evaporator Tubes. Potentially unrepeatable experiments, analysis and experience
2543	NEL AIR-COOLED HEAT EXCHANGER TESTS - SUMMARY OF CONCLUSIONS	LEISHMAN P	1985	FREWG/P(85)098	NNC	PFR	Air Cooled, Heat Exchangers	This report is a key reference associated with the Decay Heat Rejection System and the Laboratory AHX Tests	Operation Experience associated with the Decay Heat Rejection System and the Laboratory AHX Tests. Potentially unrepeatable experiments, analysis and experience
2555	SIMULATION OF FLOW IN THE PFR COLD TRAP	HICKMOTT S	1985	FR/THSG/P(85)68	CEGB	PFR	Simulation, Flow, Cold Trap	This report is a key reference associated with Secondary Cold Trap Loops	Summary of PFR Operations associated with Cold Trap Development
2556	COMMENTS ON LARGE COLD TRAP DEVELOPMENT AND OPERATION	HUMPHRIES J	1984	FR/THSG/P(85)69;FRDCC/SCWG/P(84)9	CEGB	PFR	Cold Trap	This report is a key reference associated with Secondary Cold Trap Loops	Summary of PFR Operations associated with Cold Trap Development
2695	CURRENT STATUS OF THEORETICAL MODELLING OF COLD TRAPS USING THE VICSEN CODE	HULME G		FR/THSG/P(85)66	CEGB	PFR	Cold Trap, VICSEN	This report is a key reference associated with Secondary Cold Trap Loops	Evolution of Calculational Methods
2722	THE STRESS RELIEF OF PFR EVAPORATOR FUSION WELDS BY RF INDUCTION HEATING	CROAD JP;AYRES CF;EDWARDS BC	1984	AERE-R-11470;FRDCC/MWG/P(84)63;MWG/FSG/P(84)7	AEA TECHNOLOGY	PFR	Stress Relief, Evaporator Fusion Welds, Induction Heating	This report is a key reference associated with Local Post Weld Heat Treatments	Operation Experience associated with Steam Generators and Local Post Weld Heat Treatments. Potentially unrepeatable experiments, analysis and experience
2726	RNL RESULTS FOR THE ULTRASONIC EXAMINATION OF THE TUBE-TO-TUBEPLATE WELDS IN PFR WU2 EVAPORATOR (JULY-SEPTEMBER 1982)	BIRCHALL PD;TURNER NA;HUDGELL RJ	1985	NDR-1122	UKAEA	PFR	Ultrasonic Examination, Tube, Tubeplate, Welds, Evaporator, WU2	This report is a key reference associated with Steam Generators and the State of the Evaporator Welds	Operation Experience associated with Steam Generators and the State of the Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
2755	THE ACCURACY OF CALCULATIONS OF PFR CONTROL AND SHUT-OFF ROD WORTHS USING THE FD4 DATA	COLLINS PJ;BAKER AR;ALLON JR		RPWP/P(69)4	N/A	PFR	Control, Shut-Off Rods	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
2756	PFR CONTROL AND SHUT-OFF RODS	SANDISON A;SMITH JC		RPWP/P(69)5	N/A	PFR	Control, Shut-Off Rods	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
2758	THE ACCURACY OF FD4 CALCULATIONS OF REACTION RATES WITHIN TANTALUM AND BORON CONTROL RODS	COLLINS PJ;ALLEN JR		RPWP/P(69)29	N/A	PFR	FD$, Reaction Rates, Tantalum, Boron, Control Rods	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
2980	A PRELIMINARY ANALYSIS OF A HYPOTHETICAL CONTROL ROD RUNAWAY ACCIDENT IN PFR USING THE FRAX 2 COMPUTER CODE	NEWTON TD		NDM-421;FREYWG/P(78)187	UKAEA	PFR	Control Rod, Runaway, FRAX2	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3016	METALLURGICAL EXAMINATION OF DEFECTS DETECTED ON THE SURFACES OF PULLED TEE 20 FROM THE OUTLET HEADER OF PFR DHR THERMAL SYPHON A, JULY/AUGUST 84	FRASER AS ;IRONS H;ROGER RJC;MACDONALD GJ	1985	NDM-2950;PFR/SWP/P(84)73;FRDCC/MWG/P(84)89;FRDCC/MWG/MPSG/P(84)52	UKAEA	PFR	Metallurgical, Defects, Pulled Tee, Outlet Header, Thermal Syphon	This report is a key reference associated with the Decay Heat Rejection System and the Metallurgical Examination of the Failed AHX Pulled Tees	Operation Experience associated with the Decay Heat Rejection System and the Failed AHX Pulled Tees. Potentially unrepeatable experiments, analysis and experience
3037	THE MANUFACTURE AND INSPECTION OF PE16 PFR MK 4 CONTROL ROD WRAPPERS	PARRY P		FR/FMDC/P(85)66;NDM-2928	UKAEA	PFR	Manufacture, Inspection, PE16, MK4, Control Rods, Wrappers	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3111	THE MOZART CONTROL ROD EXPERIMENTS AND THEIR INTERPRETATIONS	BROOMFIELD AM;COLLINS PJ;CARTER MD;MARSHALL J		FRCMWP/P(73)99	UKAEA	PFR	MOZART, Control Rods	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3112	THE ANALYSIS OF THE ZEBRA 12 CONTROL ROD EXPERIMENTS AND PROPOSED METHODS OF CALCULATING PFR AND CFR CONTROL ROD WORTH	BROOMFIELD AM;COLLINS PJ;CARTER MD;MARSHALL J		FRCMWP/P(73)100;CPWP/P(73)225	N/A	PFR	ZEBRA, Control Rods, Worth	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3127	THE ANALYSIS OF THE SODIUM REMOVAL EXPERIMENTS IN ZEBRA ASSEMBLY 13 - PART II SINGLE SUB-ASSEMBLIES ADJACENT TO A FULLY-INSERTED CONTROL ROD AND TO AN INNER CORE BREEDER SUB-ASSEMBLY	HARDIMAN JP		FRCMWG/P(74)150	N/A	PFR	ZEBRA, Sodium Removal, Sub-Assemblies,	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3200	FISSION GAS ESCAPE FROM FAILED FUEL PINS	HILL DJ		FFWG/P(77)13;FRAX NOTE 45;FRGN/528	N/A	PFR	Fission, Fuel Pins	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3204	THE PRINCIPLES OF FAILED FUEL DETECTION IN FAST REACTORS (LMFBRS)	DIGGLE WR;CARTWRIGHT DK		FFWG/P(77)24;FRSBWG/N(77)34	N/A	LMFBR	Fuel Detection	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3208	FISSION-PRODUCT MEASUREMENTS IN THE SCARABEE MONO AND SEVEN-PIN LOSS-OF-COOLANT EXPERIMENTS	CARTWRIGHT DK		FFWG/P(78)17	N/A	PFR	Fission Product, Loss of Coolant	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3223	AN ASSESSMENT OF BPD SIGNALS FROM THE FIRST FUEL FAILURES IN PFR	CARTWRIGHT DK DINGTON P		NDM-897;FFWG/P(79)10	UKAEA	PFR	BDP Signal, Fuel Failure	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3236	A METHOD FOR OBTAINING FAST REACTOR CONTROL ROD CROSS SECTIONS AS A COSMOS TASK	AGAR CWJL		FRCMWG/P(78)208	N/A	PFR	Control Rod, Cross Section, COSMOS	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3491	LENGTH CHANGES IN PFR GUIDE TUBES	WASHINGTON ABG	1983	DFMC/P(83)22;FEWP/P(83)41	DNPDE	PFR	Guide Tube, Length	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
3620	THE CALCULATIONAL BASIS FOR THE CALIBRATION OF THE PFR BCD SYSTEM	CARTWRIGHT DK;DIGGLE WR		TRG MEMO 6153	UKAEA	PFR	Calibration, BCD	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3637	AN EXAMINATION OF THE ABILITY OF THE PFR CONTROL AND SHUT-OFF RODS TO MEET THE SAFETY CRITERIA	HENDERSON JDC		TC/P(69)42	N/A	PFR	Control, Shut-Off Rods, Safety	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3639	DIFFERENTIAL EXPANSION BETWEEN PFR CORE AND CONTROL SUPPORTS	MATTHEWS JD		TC/P(69)7;TASD/FRPG/P(69)7	N/A	PFR	Expansion, Core, Control Support	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3664	PFR IHX BOTTOM TUBEPLATE THERMAL STRIPING DURING SINGLE CIRCUIT OPERATION	PURSLOW B		TN/P(85)779;FR/THSG/P(85)103	NNC	PFR	IHX, Tubeplate, Thermal Striping, Single Circuit	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
3680	SODIUM AEROSOL DEPOSITION ON CONTROL ROD AND SHUT OFF ROD MAGNET FACES	MASON L	1985	OC/P(85)207;PFR/OPS/N828	N/A	PFR	Sodium Aerosol Deposition, Control, Shut-off Rods, Magnet	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3783	HIGH SIGNAL LEVELS IN THE PFR BURST PIN DETECTION EQUIPMENT: 23.8.78-17.10.78	LENNOX TA;MACLEOD DJ;CATHRO IS;CARTWRIGHT DK		PFR EXPERIMENTAL RESULTS SHEET NO.90	PFR	PFR	Signal, Burst Pin, Detection, Equipment	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3788	CALIBRATION OF PFR CONTROL RODS AT START OF RUN 4	CROWE DS;SUTHERLAND AJ		PFR EXPERIMENTAL RESULTS SHEET NO.95	PFR	PFR	Calibration, Control Rods, Run 4	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3791	SUB CRITICAL MONITORING DURING RELOAD 3 IN PFR	CROWE DS		PFR EXPERIMENTAL RESULTS SHEET NO.97A;OETD.TECH NOTE NO.46	PFR	PFR	Sub-Critical, Reload 3	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3792	THE HISTORY OF SIGNALS IN THE PFR BPD EQUIPMENT DURING RUN 3	LENNOX TA;MACLEOD DJ;CATHRO IS		PFR EXPERIMENTAL RESULTS SHEET NO.101;OETD.TECH NOTE NO.96	PFR	PFR	Signal, BPD, Run 3	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR
3793	TEMPERATURE VARIATIONS ON IHX PRIMARY SODIUM INLET AND OUTLET THERMOCOUPLES WHILST OPERATING ONLY ON SECONDARY CIRCUITS 1 AND 3	CROWE DS		PFR EXPERIMENTAL RESULTS SHEET NO.102;OETD.TECH NOTE NO.102	N/A	PFR	Temperature, IHX, Sodium, Thermocouples, Secondary Circuits	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
3794	FURTHER RESULTS FROM THE THERMOCOUPLE PROBES ADJACENT TO THE ANTI VIBRATION GRID BAFFLE ATTACHMENT IN PFR	CROWE DS;SUTHERLAND AJ		PFR EXPERIMENTAL RESULTS SHEET NO.103;OETD.TECH NOTE NO.175	PFR	PFR	Thermocouple, Anti-Vibration, Baffle	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
3795	CALIBRATION OF PFR CONTROL RODS AT END OF RUN 4	CROWE DS;LORD DJ	1980	PFR EXPERIMENTAL RESULTS SHEET NO.104;OETD.TECH NOTE NO.181	PFR	PFR	Calibration, Control Rods, Run 4	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3796	CALIBRATION OF PFR ABSORBER RODS AT START OF RUN 5	CROWE DS;LORD DJ	1980	PFR EXPERIMENTAL RESULTS SHEET NO.106;OETD.TECH NOTE NO.245	PFR	PFR	Calibration, Absorber Rods, Run 5	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3797	SHIELDING MEASUREMENT IN IHX IB GAMMA MONITOR THIMBLE IN PFR	CROWE DS;LORD DJ	1980	PFR EXPERIMENTAL RESULTS SHEET NO.107;OETD.TECH NOTE NO.305	N/A	PFR	Shielding, IHX, Gamma, Thimble	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
3798	THERMAL NOISE ON IHX PRIMARY SODIUM INLET AND OUTLET THERMOCOUPLES FOR ONE CIRCUIT OPERATION ON 22.8.80	CROWE DS;LORD DJ	1980	PFR EXPERIMENTAL RESULTS SHEET NO.108;OETD.TECH NOTE NO.312	N/A	PFR	Thermal Noise, IHX, Sodium, Thermocouples,	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
3799	CHECK ON CONTROL ROD CURTAIN WORTH DURING RUN 5 OF PFR	CROWE DS;LORD DJ	1980	PFR EXPERIMENTAL RESULTS SHEET NO.109;OETD.TECH NOTE NO.325	PFR	PFR	Control Rod, Worth, Run 5	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3801	CONTROL ROD WORTHS AT CURTAIN HEIGHT OF 581MM DURING RUN 5 OF PFR	SUTHERLAND AJ;CROWE DS	1981	PFR EXPERIMENTAL RESULTS SHEET NO.111;OETD.TECH NOTE NO.393	PFR	PFR	Control Rod, Worth, Run 5	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3802	CONTROL ROD WORTHS AT CURTAIN HEIGHT OF 652MM DURING RUN 5 OF PFR	SUTHERLAND AJ;CROWE DS	1981	PFR EXPERIMENTAL RESULTS SHEET NO.112;OETD.TECH NOTE NO.437	PFR	PFR	Control Rod, Worth, Run 5	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3803	CONTROL ROD WORTHS AT CURTAIN HEIGHT OF 722MM DURING RUN 5 OF PFR	SUTHERLAND AJ;CROWE DS	1981	PFR EXPERIMENTAL RESULTS SHEET NO.113;OETD.TECH NOTE NO.452	PFR	PFR	Control Rod, Worth, Run 5	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3804	PFR ZERO POWER FLOW COEFFICIENT AT START OF RELOAD 5	CROWE DS;LORD DJ	1981	PFR EXPERIMENTAL RESULTS SHEET NO.114;OETD.TECH NOTE NO.466	PFR	PFR	Flow Coefficient, Reload 5	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3805	CONTROL ROD AND SHUT OFF ROD WORTHS AT END OF RUN 5 OF PFR	CROWE DS;LORD DJ	1981	PFR EXPERIMENTAL RESULTS SHEET NO.115;OETD.TECH NOTE NO.468	PFR	PFR	Flow Coefficient, Reload 5	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3806	PFR ZERO POWER FLOW COEFFICIENT MEASUREMENTS AT THE END OF RELOAD 5	CROWE DS;LORD DJ;SUTHERLAND AJ	1981	PFR EXPERIMENTAL RESULTS SHEET NO.116;OETD.TECH NOTE NO.487	PFR	PFR	Flow Coefficient, Reload 5	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3807	PFR CONTROL ROD CALIBRATION IN SOURCE REGIME (< 1KW) TO INVESTIGATE RELOAD REACTIVITY DISCREPANCY - START OF RUN 6	CROWE DS;LORD DJ;SUTHERLAND AJ	1981	PFR EXPERIMENTAL RESULTS SHEET NO.117;OETD.TECH NOTE NO.503	PFR	PFR	Control Rod, Calibration, Reload, Reactivity, Run 6	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3808	CALIBRATION OF PFR ABSORBER RODS AT START OF RUN 6	CROWE DS;SUTHERLAND AJ	1982	PFR EXPERIMENTAL RESULTS SHEET NO.118;OETD.TECH NOTE NO.517	PFR	PFR	Calibration, Absorber Rods, Run 6	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3809	BIAS CURVES FOR PFR LOW POWER CHAMBERS	CROWE DS	1982	PFR EXPERIMENTAL RESULTS SHEET NO.119;OETD.TECH NOTE NO.530	PFR	PFR	Bias Curve, Power Chambers	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3811	CONTROL ROD AND SHUT OFF ROD WORTHS AT END OF RUN 6 OF PFR	CROWE DS;SUTHERLAND AJ	1982	PFR EXPERIMENTAL RESULTS SHEET NO.121;OETD.TECH NOTE NO.552	PFR	PFR	Control Rod, Shut off Rod, Worth, Run 6	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3812	REACTIVITY EFFECTS OF FLOW CHANGES AT THE END OF RUN 6 OF PFR	CROWE DS;LORD DJ;SUTHERLAND AJ	1982	PFR EXPERIMENTAL RESULTS SHEET NO.122;OETD.TECH NOTE NO.553	PFR	PFR	Reactivity, Flow Change, Run 6	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3813	PERFORMANCE CURVE CHECKS ON THE PFR LOW POWER CHANNELS	SUTHERLAND AJ	1982	PFR EXPERIMENTAL RESULTS SHEET NO.123;OETD.TECH NOTE NO.557	PFR	PFR	Performance Curve, Low Power Channels	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3814	SUB CRITICAL MONITORING DURING RELOAD 5 OF PFR	CROWE DS	1982	PFR EXPERIMENTAL RESULTS SHEET NO.124;OETD.TECH NOTE NO.565	PFR	PFR	Sub Critical, Reload 5	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3815	A COMPLETE SCAN AT 180 MW(TH) WITH THE MARK IV LOCATION LOOP DELAYED NEUTRON MONITOR	CROWE DS;SUTHERLAND AJ;LENNOX TA;MACLEOD DJ	1982	PFR EXPERIMENTAL RESULTS SHEET NO.125;OETD.TECH NOTE NO.579	PFR	PFR	Delayed Neutron	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
3816	REACTIVITY EFFECTS OF FLOW CHANGES AT START OF RUN 7 OF PFR	LORD DJ;SUTHERLAND AJ;CROWE DS	1982	PFR EXPERIMENTAL RESULTS SHEET NO.126	PFR	PFR	Reactivity, Flow Change, Run 7	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3817	CALIBRATION OF PFR ABSORBER RODS AT START OF RUN 7	CROWE DS;SUTHERLAND AJ	1982	PFR EXPERIMENTAL RESULTS SHEET NO.127;OETD TECH NOTE NO.628	PFR	PFR	Calibration, Absorber Rods, Run 7	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3818	MEASUREMENT OF THE ISOTHERMAL TEMPERATURE COEFFICIENT IN PFR AT THE START OF RUN 7	CROWE DS;LORD DJ	1982	PFR EXPERIMENTAL RESULTS SHEET NO.128;OETD TECH NOTE NO.633	PFR	PFR	Isothermal Temperature Coefficient, Run 7	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3819	SUB-CRITICAL MONITORING DURING RELOAD 6 IN PFR	CROWE DS	1982	PFR EXPERIMENTAL RESULTS SHEET NO.129;OETD TECH NOTE NO.653	PFR	PFR	Sub Critical, Reload 6	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3820	MEASUREMENT OF THE ISOTHERMAL TEMPERATURE COEFFICIENT IN PFR DURING RUN 7	CROWE DS	1983	PFR EXPERIMENTAL RESULTS SHEET NO.130;OETD TECH NOTE NO.697	PFR	PFR	Isothermal Temperature Coefficient, Run 7	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3821	INTERCALIBRATION OF POWER CHANNELS IN PFR	SUTHERLAND AJ	1982	PFR EXPERIMENTAL RESULTS SHEET NO.131;OETD TECH NOTE NO.702	PFR	PFR	Intercalibration, Power Channels	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3822	A PFR DECAY HEAT (LOOP A) REMOVAL TEST AT 250C PRIMARY POOL TEMPERATURE	CROWE DS;DICKSON AK;DISBURY WH;GRAHAM DK;LORD DJ; SUTHERLAND AJ	1983	PFR EXPERIMENTAL RESULTS SHEET NO.132;OETD TECH NOTE NO.773	PFR	PFR	Decay Heat, Removal Loops	This report is a key reference associated with the Decay Heat Rejection System and the Measurements of Flow on the Air Side of the AHXs	Experimental Results from PFR
3823	TEMPERATURE FLUCTUATIONS ON IHX PRIMARY SODIUM OUTLET THERMOCOUPLES FOR ONE CIRCUIT OPERATION ON 23.3.83	CROWE DS;SUTHERLAND AJ	1983	PFR EXPERIMENTAL RESULTS SHEET NO.133;OETD TECH NOTE NO.733	N/A	PFR	Temperature, IHX, Sodium, Thermocouples	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
3824	CONTROL ROD AND SHUT OFF ROD WORTHS AT END OF RUN 6 OF PFR	CROWE D S;SUTHERLAND AJ	1983	PFR EXPERIMENTAL RESULTS SHEET NO.134;OETD TECH NOTE NO.781	PFR	PFR	Control Rod, Shut off Rod, Worth, Run 6	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3825	REACTIVITY EFFECTS OF FLOW CHANGES AT THE END OF RUN 7 OF PFR	CROWE DS;LORD DJ;SUTHERLAND AJ	1983	PFR EXPERIMENTAL RESULTS SHEET NO.135;OETD TECH NOTE NO.782	PFR	PFR	Reactivity, Flow Changes, Run 7	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3826	PERFORMANCE CHECKS ON PFR DECAY HEAT REMOVAL LOOPS AT END OF RUN 7	CROWE DS	1983	PFR EXPERIMENTAL RESULTS SHEET NO.136;OETD TECH NOTE NO.790	PFR	PFR	Decay Heat, Removal Loops, Run 7	This report is a key reference associated with the Decay Heat Rejection System and the Measurements of Flow on the Air Side of the AHXs	Experimental Results from PFR
3827	MONITORING OF THE FAILED FUEL DETECTION SIGNALS AT THE RUN 7 SHUTDOWN	LENNOX TA;MACLEOD DJ;STEELE KB;MORRISON NS	1983	PFR EXPERIMENTAL RESULTS SHEET NO.137;OETD TECH NOTE NO.798	PFR	PFR	Failed, Fuel Detection, Signal, Run 7	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR
3828	GAMMA SPECTROSCOPY MEASUREMENTS ON THE MK IV LOCATION LOOP DN COIL AT THE END OF RUN 7	MACLEOD DJ;LENNOX TA;SUTHERLAND AJ	1983	PFR EXPERIMENTAL RESULTS SHEET NO.138;OETD TECH NOTE NO.799	PFR	PFR	Gamma Spectroscopy, MK IV, Run 7	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR
3829	INITIAL MEASUREMENT OF CONTROL ROD CURTAIN WORTH OF PFR AT START OF RUN 8	SUTHERLAND AJ;LORD DJ	1984	PFR EXPERIMENTAL RESULTS SHEET NO.139;OETD TECH NOTE NO.825	PFR	PFR	Control Rod, Curtain Worth, Run 8	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR
3830	CALIBRATION OF PFR ABSORBER RODS AT START OF RUN 8	CROWE DS;SUTHERLAND AJ	1984	PFR EXPERIMENTAL RESULTS SHEET NO.140;OETD TECH NOTE NO.826	PFR	PFR	Calibration, Absorber Rod, Run 8	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR
3831	REACTIVITY EFFECTS OF FLOW CHANGES AT START OF RUN 8 OF PFR	CROWE DS;SUTHERLAND AJ;LORD DJ	1984	PFR EXPERIMENTAL RESULTS SHEET NO.141;OETD TECH NOTE NO.832	PFR	PFR	Reactivity, Flow Changes, Run 8	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR
3833	CALIBRATION OF PFR ABSORBER RODS AT START OF RUN 2	CROWE DS;SUTHERLAND AJ;LORD DJ	PFR EXPERIMENTAL RESULTS SHEET NO.83	PFR	PFR	Calibration, Absorber Rod, Run 2	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR
3835	HIGH FISSION PRODUCT ACTIVITY IN THE ARGON GAS BLANKET 16.7.78-17.7.78	LENNOX AT;CATHRO IS;MACLEOD DJ	PFR EXPERIMENTAL RESULTS SHEET NO.81	PFR	PFR	Fission Product, Argon, Gas Blanket	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR
3837	RESULTS FROM SIGNALS RECORDED ON MAGNETIC TAPES FOR REACTOR TRIP ON 20 FEBRUARY 1978	CROWE DS;SUTHERLAND AJ	PFR EXPERIMENTAL RESULTS SHEET NO.79	PFR	PFR	Signals, Magnetic Tapes, Reactor Trips	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR
3838	THE TRANSIENT SIGNAL IN THE IHX DELAYED NEUTRON MONITOR FOLLOWING A REACTOR TRIP	CROWE DS;SUTHERLAND AJ	PFR EXPERIMENTAL RESULTS SHEET NO.78	PFR	PFR	Transient Signal, IHX, Delayed Neutron, Reactor Trip	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR
3840	CHECKS ON THE IHX DNM COUNTING STACK	LENNOX TA	PFR EXPERIMENTAL RESULTS SHEET NO.76	PFR	PFR	IHX, Counting Stack	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR
3842	CALIBRATION OF PFR ABSORBER RODS AT END OF RUN 1	CROWE DS;LORD DJ;SUTHERLAND AJ	PFR EXPERIMENTAL RESULTS SHEET NO.74	PFR	PFR	Calibration, Absorber Rods, Run 1	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3843	REACTIVITY FEEDBACK EXPERIMENTS AT THE END OF RUN 1 (FEBRUARY 1978)	LORD DJ;DICKSON AK	PFR EXPERIMENTAL RESULTS SHEET NO.73	PFR	PFR	Reactivity Feedback, Run 1	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3844	RESULTS FROM SIGNALS RECORDED ON MAGNETIC TAPE FOR REACTOR TRIP ON 23 JANUARY 1978	CROWE DS;SUTHERLAND AJ	PFR EXPERIMENTAL RESULTS SHEET NO.72	PFR	PFR	Magnetic Tape, Reactor Trip	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3849	MEASUREMENTS OF PFR POWER COEFFICIENT TO INVESTIGATE COMPONENT DUE TO EXPANSION OF CONTROL ROD SUPPORTS	LORD DJ	PFR EXPERIMENTAL RESULTS SHEET NO.67	PFR	PFR	Power Coefficient, Expansion, Control Rod Support	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3851	MEASUREMENTS OF PFR ISOTHERMAL TEMPERATURE COEFFICIENT WITH PARTICULAR REFERENCE TO COMPONENT DUE TO RELATIVE MOTION OF CORE AND CONTROL RODS	CROWE DS;SUTHERLAND AJ	PFR EXPERIMENTAL RESULTS SHEET NO.65	PFR	PFR	Isothermal Temperature Coefficient, Core, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3852	MEASUREMENT OF POWER COEFFICIENTS AND REACTIVITY BURN-UP IN PFR FOR AUGUST TO OCTOBER 1977	SUTHERLAND AJ	PFR EXPERIMENTAL RESULTS SHEET NO.64	PFR	PFR	Power Coefficient, Reactivity, Burn-Up	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3867	SHIELDING MEASUREMENT IN IHX 2B GAMMA MONITOR THIMBLE IN PFR	PACKWOOD A;CROWE DS;SUTHERLAND AJ	PFR EXPERIMENTAL RESULTS SHEET NO.49	N/A	PFR	Shielding, IHX, Gamma, Thimble	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
3871	NOTES ON BPD TESTS AUGUST-DECEMBER 1976	WHEELER RC;LENNOX TA	PFR EXPERIMENTAL RESULTS SHEET NO.45	PFR	PFR	BPD	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR
3875	PRELIMINARY DATA FROM BPD BULK AND LOCATION THIMBLE TESTS	LENNOX TA;SOMERVILLE AC	PFR EXPERIMENTAL RESULTS SHEET NO.41	PFR	PFR	BPD, Thimble Tests	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR

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3877	ANALYSIS OF PFR GAS BLANKET BETA PRECIPITATOR SIGNAL FOLLOWING A REACTOR TRIP	SOMERVILLE AC		PFR EXPERIMENTAL RESULTS SHEET NO.39	PFR	PFR	Gas Blanket, Precipitator Signal, Reactor Trip	This report is a key reference associated with Failed Fuel Detection	Experimental Results from PFR
3885	MEASUREMENT OF THE RELATIVE WORTH OF EACH SHUT-OFF ROD AT LOW POWER	CROWE DS;SUTHERLAND AJ		PFR EXPERIMENTAL RESULTS SHEET NO.30	PFR	PFR	Relative Worth, Shut-off Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3887	MEASUREMENT OF THE SHUT OFF RODS SHAPE FUNCTION	CROWE DS;SUTHERLAND AJ		PFR EXPERIMENTAL RESULTS SHEET NO.28	PFR	PFR	Shut-off Rod, Shape, Function	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3889	PRELIMINARY CONTROL ROD CALIBRATION AT LOW POWER TO MONITOR FOR LOSS OF ABSORBER	SUTHERLAND AJ;CROWE DS		PFR EXPERIMENTAL RESULTS SHEET NO.26	PFR	PFR	Control Rod, Calibration, Absorber	This report is a key reference associated with Absorber Rods and Mechanisms	Experimental Results from PFR
3901	STEADY STATE SIGNALS IN THE PFR BPD EQUIPMENT DURING RUN 1 (OCTOBER 1977)	LENNOX TA;MACLEOD DJ		TC/P(77)22	N/A	PFR	Steady State, BPD, Run 1	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3910	STRESS DISTRIBUTION IN THE PFR VAULT ROOF STEELWORK, MODEL INVESTIGATION USING PHOTO ELASTICITY AND STRAIN GAUGES	CLABBURN EJ		PFR/SWP/P(70(4;FPR 3/70	UKAEA	PFR	Stress, Roof, Steelwork, Photo elasticity, Strain Gauges	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3911	AN EXAMINATION OF THE STRESS DISTRIBUTION AT THE CONNECTION OF THE PFR VESSEL SKIRT TO THE ROOF GIRDER	CLABBURN EJ		GRO/44/86/37	UKAEA	PFR	Stress, Vessel Skirt, Roof Girder	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3912	AN EXAMINATION OF STRESS LEVELS OF A PFR ROOF MODEL USING STRAIN GAUGES	CLABBURN EJ		PROGRESS REPORT NO.1/69	UKAEA	PFR	Stress, Roof, Strain Gauges	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3914	A MODEL INVESTIGATION OF THE STRESS DISTRIBUTION IN THE PFR VAULT ROOF TEST 1 THE STEELWORK UNDER DEAD WEIGHT LOADING	CLABBURN EJ		FPR 1/72	UKAEA	PFR	Stress, Vault Roof, Steelwork, Loading	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3915	A MODEL INVESTIGATION OF THE STRESS DISTRIBUTION IN THE PFR VAULT ROOF TEST 1 THE STEELWORK UNDER THE INCIDENT LOAD CONDITION	CLABBURN EJ		FPR 3/71	UKAEA	PFR	Stress, Vault Roof, Steelwork, Load	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3917	A MODEL INVESTIGATION OF THE STRESS DISTRIBUTION IN THE PFR VAULT ROOF TEST 3 THE STEELWORK LINE - LOADED AT THE TUNING FORK POSITION	CLABBURN EJ		FPR 8/72	UKAEA	PFR	Stress, Vault Roof, Steelwork, Load, tuning Fork	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3945	SYSTEMS RELIABILITY SERVICE - PROTECTION OF THE PFR AGAINST CONTROL-ROD RUNAWAY - A RELIABILITY ANALYSIS	UKAEA		SRS/ASG/2007/1	UKAEA	PFR	Reliability, Control Rod, Runaway	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3957	ASSESSMENT OF THE CONSEQUENCES OF PRIMARY TANK FAILURE			R.S.W/P70/21	N/A	PFR	Primary Tank, Failure	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3958	AN ASSESSMENT OF PFR SUB-ASSEMBLY PROTECTION	MAIDMENT L		PFR/SWP/P(73)66	ASRD	PFR	Sub-Assembly	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
3959	RELIABILITY OF THE PFR DECAY HEAT REJECTION SYSTEM USING STEAM DUMPING	MARSHALL F		PFR/SWP/P(71)38	N/A	PFR	Reliability, Decay Heat, Steam Dumping	This report is a key reference associated with the Decay Heat Rejection System and the Reliability of Decay Heat Rejection	Operation Experience associated with the Decay Heat Rejection System and the Reliability of Decay Heat Rejection. Potentially unrepeatable experiments, analysis and experience
3960	RELIABILITY ASSESSMENT OF THERMAL-SYPHON DECAY HEAT REJECTION SYSTEM FOR PFR	DAVIES FM		SRD M 5	UKAEA	PFR	Reliability, Thermal Syphon, Decay Heat	This report is a key reference associated with the Decay Heat Rejection System and the Reliability of Decay Heat Rejection	Operation Experience associated with the Decay Heat Rejection System and the Reliability of Decay Heat Rejection. Potentially unrepeatable experiments, analysis and experience
3961	PFR SAFETY ASSESSMENT - DECAY HEAT REJECTION	DAVIES FM		SRD M 16	UKAEA	PFR	Safety, Decay Heat Rejection	This report is a key reference associated with the Decay Heat Rejection System and the Reliability of Decay Heat Rejection	Operation Experience associated with the Decay Heat Rejection System and the Reliability of Decay Heat Rejection. Potentially unrepeatable experiments, analysis and experience
4009	PROPOSALS TO USE A SODIUM RIG TO INVESTIGATE THE PFR IHX THERMAL STRIPING PROBLEM	ANDERSON R	1983	OETD/SHG/P(83)27	N/A	PFR	Sodium Rig, IHX, Thermal Striping	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
4011	MATERIAL SELECTION FOR REPLACEMENT PFR IHX'S	BESTWICK RDW	1983	MTU.R.3027	N/A	PFR	IHX, Material	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
4012	PFR INTERMEDIATE HEAT EXCHANGER SPARE UNITS	MITCHELL C;ROYDEN R	1983	TN/P(83)616	NNC	PFR	IHX, Spare	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
4066	MEASUREMENTS OF BPD PIPE GROWTH RELATIVE TO GUIDE-TUBE WRAPPERS FOR GUIDE-TUBES FROM RELOADS 6,7 AND 8	LILLEY RJ;CARFRAY J	1985	DFMC/P(85)17;PFR/FEDWP/P(85)1077	N/A	PFR	BPD, Pipe Growth, Guide Tube, Wrapper, Reload 6 7 8	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
4224	THEORETICAL ANALYSIS OF THE FLOW BETWEEN THE TOP OF THE CORE AND THE ACS BAFFLE USING THE PHOENICS COMPUTER CODE	SMITH AG	1985	TN/P(85)787;THSG/P(85)122 ADDENDUM	NNC	PFR	Flow, ACS, Baffle, Phoenics	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
4301	CRACK PROPAGATION IN PFR ABOVE CORE STRUCTURE SHROUD TUBES DUE TO THERMAL STRIPING	PEARCE JHB		DCWG/P(82)335;ACSCM/P(77)32	N/A	PFR	Crack, ACS, Shroud Tubes, Thermal Striping	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
4304	THE EFFECT OF TEMPERATURE WAVE SHAPE ON SURFACE STRAIN RANGE UNDER HIGH FREQUENCY THERMAL STRIPING CONDITIONS	PEARCE JHB		DCWG/P(82)334;ACSCM/P(77)27	N/A	PFR	Temperature Wave, Strain, Thermal Striping	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
4339	CONTROL OF SODIUM VAPOUR PENETRATION INTO THE PFR CONTROL AND SHUT-OFF MECHANISM	HIGSON J		TRG REPORT 1939	UKAEA	PFR	Sodium Vapour, Control, Shut-off Mechanism	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
4343	SIMPLE STRESS ANALYSIS OF THE BORON CARBIDE CONTROL RODS IN PFR	KELLY BT		TRG REPORT 2834;MWP/P(76)245;FRASG/P(76)45	UKAEA	PFR	Stress, Boron Carbide, Control Rods	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
4344	DEFECTED PIN EXPERIMENTS IN SCARABEE, 1973 AND 1974	CARTWRIGHT DK;DIGGLE WR;MANENT G		TRG REPORT 2835	UKAEA	PFR	Pin Experiments	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
4345	THE VARIATION OF REACTION RATES AND SUBASSEMBLY POWERS WITH CONTROL ROD CURTAIN POSITION IN THE PFR	WEBSTER EB		TRG REPORT 2838	UKAEA	PFR	Reaction Rates, Subassembly, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
4484	THE MARK IV LOCATION LOOP FOR THE PFR BPD SYSTEM	COOKE B		TN/P(78)225;TF/P(78)288;PFR/SWP/P(78)1	NPC	PFR	Mark IV, Location Loop, BPD	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
4512	FAST REACTOR ABSORBERS/CONTROL RODS - EXPERIMENTAL PROGRAMME STATUS REPORT - APRIL 1983	GILCHRIST KE	1983	FRASG/N(83)47	UKAEA	PFR	Absorbers, Control Rods	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience

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4513	THE PIE OF THE PFR TANTALUM MINI-ROD EXPERIMENT (13/01)	MOTTERSHEAD D	1983	NDM-1079;MWP/P(83)1148;FRASG/P(83)198	UKAEA	PFR	Tantalum, Mini-Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
4514	EXAMINATION OF BORON CARBIDE PINS FROM THE PFR MK2 CONTROL ROD SEG AFTER OPERATION FOR 180 E.F.P.D.	MOTTERSHEAD D;GILCHRIST KE;BROCKLEHURST JE;KELLY BT	1983	NDR-944;MWP/P(83)147;FRASG/P(83)197	UKAEA	PFR	Boron carbide, Pins, MK2 Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
4515	THE IRRADIATION BEHAVIOUR OF BORON CARBIDE ABSORBER PINS IN PFR EXPERIMENT 13/06	MOTTERSHEAD D;GILCHRIST KE;KELLY BT	1983	NDR-711;MWP/P(81)1132;FRASG/P(81)182	UKAEA	PFR	Irradiation, Boron Carbide, Absorber Pins	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
4571	A REVIEW OF BPD EQUIPMENT FOR CDFR	SUKER JH	1980	TN/P(80)405;PDR/22;ASDSWP/P(80)11	NPC	CDFR	BPD, Equipment	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
4637	A REVIEW OF EQUIPMENT NEEDED FOR REPAIR TO AN IHX PFR DOUNREAY PFR IHX TOP: STRESS ANALYSIS SUMMARY REPORT	CHURCH A;CLARK JS	1983	FRD/P(83)625	NNC	PFR	Equipment, Repair, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
4651	ROAMING MONITOR FOR LOCATING SUB-ASSEMBLY FAILURES	BURTON EJ;SMITH DCG	1982	PPWP/P(82)355;CFR/SWP/P(82)7	N/A	PFR	Sub-Assembly Roaming, Failures	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
4672	MODIFICATIONS REQUIRED TO ABSORBER RODS AND GUIDE TUBES IN PREPARATION FOR RELOAD 7	BROWNE JJ	1983	FROC/P(83)58;PFR/SWP/ESC/P(83)20	NPDO	PFR	Absorber Rods, Guide Tubes, Reload	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
4772	EXAMINATION OF THE SODIUM SIDE OF PFR EVAPORATOR TUBES	LONGSON B	1985	ND-R-1161(R);FRDCC/MWG/P(85)200	UKAEA	PFR	Sodium Side, Evaporator Tubes	This report is a key reference associated with Steam Generators and Fretting and Galling of the Evaporator Tubes	Operation Experience associated with Steam Generators and Galling of the Evaporator Tubes. Potentially unrepeatable experiments, analysis and experience
4823	PFR EVAPORATOR 1 INLET LEAK ON 1490479	CURRIE R		PFR/TF/P(79)370;EST/P(79)447	N/A	PFR	Evaporator, Inlet Leak	This report is a key reference associated with Steam Generators and the Evolution of a leak in LU1	Operation Experience associated with Steam Generators and the Evolution of a leak in LU1. Potentially unrepeatable experiments, analysis and experience
4900	A PROPOSED FAST REACTOR PROGRAMME FOR FAILED FUEL DETECTION AND LOCATION	LENNOX TA;GREGORY CV	1985	FREWG/P(85)169	DNPDE	CDFR	Fuel Detection, Failed	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
4933	THOUGHTS ON THE RAMIFICATIONS OF THE FIRST LEAK IN PFR EVAPORATOR TUBE BUNDLE 2 ORIGINALLY IN CIRCUIT 2.	SMEDLEY JA;HALE JC;FOLEY J;BUXTON K	1980	NDM 1125	UKAEA	PFR	Leak, Evaporator Tube	This report is a key reference associated with Steam Generators and the Pure Water Stress-Corrosion Cracking	Operation Experience associated with Steam Generators and the Pure Water Stress-Corrosion Cracking. Potentially unrepeatable experiments, analysis and experience
4934	REVIEW OF EARLY TUBE TO TUBEPLATE LEAK BEHAVIOUR IN THE PFR EVAPORATORS, OCT74-FEB77.	SMEDLEY JA	1980	NDM 1128	UKAEA	PFR	Tube to Tubeplate, Leak, Evaporators	This report is a key reference associated with Steam Generators and the Pure Water Stress-Corrosion Cracking	Operation Experience associated with Steam Generators and the Pure Water Stress-Corrosion Cracking. Potentially unrepeatable experiments, analysis and experience
4976	VIEWGRAPHS USED FOR SPARE PFR IHX PRESENTATION AT DOUNREAY ON 20TH NOVEMBER 1984	MITCHELL CH;GREEN D;DEARDEN GL	1984	FRD/TN/(84)727	NNC	PFR	Viewgraphs, Spare, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
4977	PROTOTYPE FAST REACTOR - DOUNREAY SPARE INTERMEDIATE HEAT EXCHANGER	LOMAS S	1984	FRD224/SDS/001	NNC	PFR	Spare, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
5009	RNL RESULTS FOR THE ULTRASONIC EXAMINATION OF PFR EVAPORATOR WU1 TUBE TO TUBEPLATE WELDS BETWEEN SEPTEMBER 1981 AND JUNE 1982	HUDGELL RJ;BIRCHALL PD;TURNER NA	1983	NDR 965	UKAEA	PFR	Ultrasonic Examination, Evaporator, WU1, Tube to Tubeplate, Welds	This report is a key reference associated with Steam Generators and the Identification of Leaking Welds from the Water Side	Operation Experience associated with Steam Generators and the Identification of Leaking Welds from the Water Side. Potentially unrepeatable experiments, analysis and experience
5137	RNL VOTE-FUNDED WORK IN SUPPORT OF PRIMARY CIRCUIT AND IHX - OCTOBER 1985	EICKHOFF KG		FREWG/P(85)179	RNL	PFR	Primary Circuit, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
5253	THEORETICAL ANALYSIS OF THE FLOW BETWEEN THE TOP OF THE CORE AND THE ACS BAFFLE USING THE PHOENICS COMPUTER CODE	SMITH AG		THSG/P(85)122	NNC	PFR	Flow, ACS, Baffle, Phoenics	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
5343	A SAFETY CASE FOR THE CONTINUED OPERATION OF THE PFR AFTER TO' IN VIEW OF THE CURRENT POSITION OF THE ASSESSMENT OF THE ABOVE CORE STRUCTURE MARCH, 1977	BROADLEY D;ROSE RT;DURSTON JG		SWP/P(77)18;ACSCM/P(77)24;TF/P(77)235	NPC	PFR	Safety, ACS	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
5350	PFR REACTOR JACKET/IHX POD DAMAGE ASSESSMENT AS OF JUNE 1981	BROADLEY D	1981	SWP/P(81)33	NPC	PFR	Reactor Jacket, IHX Pod, Damage	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
5366	AN APPROXIMATE METHOD FOR ASSESSING SECONDARY CIRCUIT START UP CYCLIC DAMAGE TO THE PFR IHX TUBEPLATE	GREEN D	1982	FRD/TN/P(82)502;SWP/P(82)14	NPC	PFR	Secondary Circuit, Cyclic Damage, IHX, Tubeplate	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
5367	ELEMENTARY STRESS ANALYSIS OF THE PFR CENTRAL SHROUD TUBE	GREEN D		FRD/TN/P(78)289	NNC	PFR	Stress, Central Shroud	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
5556	X-RADIOGRAPHIC EXAMINATION OF SHUT-OFF RODS VVX,TYX,JWS,JHD AND CONTROL ROD CXH	McLOUGHLAN D;LILLEY RJ		PFR/FEDWP/P(85)1128;PFR/TC/P(86)5;DFMC/P(85)28;IFC REPORT 87	UKAEA	PFR	X-Radiographic, Shut-Off Rods, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
5709	FAILED FUEL PIN MODELLING	MATTHEWS JR		AERE 3532;FEWP/P(86)3;FRSWG/SAFSG/P(86)1	UKAEA	PFR	Failed, Fuel Pin	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
6027	EXTENDED ANALYSIS OF THE FLOW BETWEEN THE TOP OF THE CORE AND THE ACS BAFFLE USING THE PHOENICS COMPUTER CODE.	SMITH AG	1986	FRD/TN/P(86)874	NNC	PFR	Flow, ACS, Baffle, Phoenics	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
6028	CONTROL AND DYNAMICS REVIEW 1985/86	BUTTERFIELD MH	1986	FRDCC/PPWG/P(86)65	N/A	PFR	Control, Dynamic	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
6185	A NEUTRON DIFFRACTION STUDY OF THE RESIDUAL STRESS DISTRIBUTION IN PFR EVAPORATOR FUSION WELDS	ALLEN AJ;BOWEN PH;HUTCHINGS MT	1986	AERE-R-11978;FRDCC/MWG(85)P233;FRDCC/MWG/FSG/(85)P42;	AEA TECHNOLOGY	PFR	Neutron Diffraction, Stress, Evaporator Fusion Welds	This report is a key reference associated with Steam Generators and the Metallurgical Examination of Evaporator Welds	Operation Experience associated with Steam Generators and the Metallurgical Examination of Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
6250	PROPOSAL FOR A 1/4 SCALE 60 SECTOR WATER MODEL TO VALIDATE VICSEN PREDICTIONS OF ACS INTERNAL FLOWS	SMITH MR;HULME G	1986	FREWG/P(86)217	NNC	PFR	Water, VICSEN, ACS	This report is a key reference associated with Above Core Structure	Comparison between experimental and calculated values.
6327	STRATEGY AND PROPOSALS FOR REQUALIFYING A DAMAGED IHX REMOVED FROM PFR	PREECE GE;DONNELLY LF;CLEMENTS R;FORD JV	1986	C86/606/ED 803	NNC	PFR	Damage, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
6468	THE LOCAL SUB-ASSEMBLY ACCIDENT AND FAILED FUEL BEHAVIOUR IN PFR	BURTON EJ	1986	FRSWG/SAFSG/P(86)22	UKAEA	PFR	Sub Assembly, Accident, Failed Fuel	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
6715	THE COMPUTER CODE PEBBLE AND A REVIEW OF ITS USE IN PREDICTING ABSORBER ROD EXERCISING LOADS	LIGHTOWLERS RJ	1986	PFR/FEDWP/P(86)1204;EPD/TN(86)270	EPDO	PFR	PEBBLE, Absorber Rod, Loads	This report is a key reference associated with Absorber Rods and Mechanisms	Review of Calculational Methods.

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6819	THE MANUFACTURE AND INSPECTION OF PE16 PFR MK4 CONTROL ROD WRAPPERS	PARRY P	1986	ND-M-2928(S)	UKAEA	PFR	Manufacture, Inspection, PE16, MK4, Control Rods, Wrappers	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
7252	PROPOSAL TO CARRY OUT CAVITATION TESTS ON A PFR SECONDARY SODIUM PUMP	PREECE	1986	FREWG/P(86)287	NNC	PFR	Cavitation Test, Secondary Sodium Pump	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
7489	PFR IHX REMOVAL AND INSPECTION AND REPAIR. PARTS 1 TO 15, AND APPENDICES.			PFR/TF/P(80)422	NPC	PFR	IHX, Removal, Repair, Inspection	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
7492	A NOTE FOR DISCUSSION ON PFR-IHX REPLACEMENT PROPOSALS	SEED;BOWKER;BOLTON		FRD/DM/P(78)221	NPC	PFR	IHX, Replacement	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
7513	CAVITATION TESTS ON A PFR SECONDARY SODIUM PUMP	PREECE	1986	PFR/TC/P(86)106	NNC	PFR	Cavitation Test, Secondary Sodium Pump	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
7537	JOINT PROGRAM FOR TESTING A PROTOTYPE LARGE IHX IN PFR AT DOUNREAY	BILLURIS;SEED		JPD-1	NPC	PFR	Prototype, Large IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
7549	PFR REPLACEMENT ROOF PLUG FINITE ELEMENT OF THE DECAY HEAT COIL THERMAL SLEEVE	HIBBS	1980	TR 2035;SR 5199	Head Wrightson Teesdale Ltd	PFR	Replacement, Roof Plug, Heat Coil, Thermal Sleeve	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
7583	PFR-IHX INSPECTION. PROJECT NO. 4.3 - IMPROVED INSTRUMENTATION	SHAW		DM 108;265/HW	Head Wrightson Teesdale Ltd	PFR	IHX, Instrumentation	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
7584	RATCHETTING DUE TO DIFFERENCE IN RESPONSE OF TUBEPLATE AND BOTTOM GRID			266/HW;DM 112	Head Wrightson Teesdale Ltd	PFR	Tubeplate, Bottom Grid	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
7585	COMPUTER ANALYSIS OF PFR IHX GRID REFERENCE DESIGN			267/HW;DM 113	Head Wrightson Teesdale Ltd	PFR	IHX, Grid, Reference Design	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
7589	PFR-IHX REDESIGN. PFR-IHX DEVELOPMENT.			TR 2013;262/HW	Head Wrightson Teesdale Ltd	PFR	IHX, Redesign, Development	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
7614	PROPOSAL FOR A 1/4 SCALE 60o SECTOR ACS WATER MODEL	BOLEY	1986	FREWG/P(86)305	NNC	PFR	ACS, Water	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
7656	CIRCUIT ACTIVITY LEVELS WHEN OPERATING WITH FAILED FUEL	EVANS	1986	FRDCC/SCWG/P(86)90	N/A	PFR	Activity, Operating, Failed Fuel	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
7747	PFR FAILED FUEL AND GASEOUS DISCHARGES	GRIFFITHS JH		PFR/TC/P(86)40	N/A	PFR	Failed Fuel, Gaseous Discharge	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
7758	REVIEW OF ABSORBER ROD EXERCISING DURING RUNS 8,9, AND 10	MELHUISH KR		PFR/TC/P(86)9	N/A	PFR	Absorber Rod, Runs 8 9 10	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
7759	REVIEW OF MK1V BURST PIN DETECTION SYSTEM	HODGSON D	1986	PFR/TC/P(86)10	SEDO	PFR	NK1V, Burst Pin	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
7876	THE INSPECTION OF PFR EVAPORATOR WORKS UNIT 3 IN CIRCUIT 2 16 AND 17 FEBRUARY 1981	FRASER AS; ROGER RJC;McKEAGUE R;LEYLAND KS	1981	ND-M-1519(D)	UKAEA	PFR	Evaporator, WU3	This report is a key reference associated with Steam Generators and the Identification of Leaking Welds from the Water Side	Operation Experience associated with Steam Generators and the Identification of Leaking Welds from the Water Side. Potentially unrepeatable experiments, analysis and experience
7887	PFR PRIMARY CIRCUIT-DETERMINATION OF THE SODIUM TEMPERATURE AT THE INTERMEDIATE HEAT EXCHANGER TOP TUBE PLATES SUBSEQUENT TO A SIMULATED REACTOR TRIP USING A 1/5 SCALE WATER MODEL	WINN WR;FRANCE J	1980	ND-M-1083(R)	UKAEA	PFR	Sodium, temperature, IHX, Tubeplate, Reactor Trip	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
8274	BORON CARBIDE CONTROL ROD PIN DEVELOPMENT	KELLY BT	1986	FRDCC/P(86)202	UKAEA	PFR	Boron Carbide, Rod, Pin	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
8322	UNDERSODIUM ULTRASONIC VIEWING IN PFR. AN OUTLINE OF A METHOD FOR ASSESSING DIAGRID SETTING TILT IN -SERVICE	CROAD A	1987		NNC	PFR	Undersodium. Diagrid, Tilt	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
8322	UNDERSODIUM ULTRASONIC VIEWING IN PFR. AN OUTLINE OF A METHOD FOR ASSESSING DIAGRID SETTING TILT IN -SERVICE	CROAD A	1987		NNC	PFR	Undersodium, Diagrid, Tilt	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
8353	PFR WORKS UNIT 2 EVAPORATOR BUNDLE OPERATING HISTORY	HAWKSLEY C	1986	OETD/TN 1359	OETD	PFR	Evaporator, Bundle, Operating	This report is a key reference associated with Steam Generators and the Destructive Examination of WU2	Operation Experience associated with Steam Generators and the Destructive Examination of WU2. Potentially unrepeatable experiments, analysis and experience
8360	PFR EVAPORATOR TUBE BUNDLE WU2 CLEANING AND DISMANTLING: STAGE 1	HAWKSLEY C	1987	OETD/TN 1411	OETD	PFR	Evaporator, Tube, Bundle, Cleaning, Dismantling	This report is a key reference associated with Steam Generators and the Destructive Examination of WU2	Operation Experience associated with Steam Generators and the Destructive Examination of WU2. Potentially unrepeatable experiments, analysis and experience
8378	PFR IHX 'MINIMUM CHANGE' DESIGN STUDY	MAPPLEDECK C;SHAW JB	1983	TR 2057 ;SR 5495 R	Head Wrightson Teesdale Ltd	PFR	INH, Minimum Change, Design	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
8381	PROTOTYPE FAST REACTOR, DOUNREAY INTERMEDIATE HEAT EXCHANGER STRAIN SURVEY ON No 6 TUBE BUNDLE	LYONS GA		TN/R&D 40	Head Wrightson Teesdale Ltd	PFR	IHX, Strain, Tube, Bundle	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
8386	A REVIEW OF EQUIPMENT NEEDED FOR REPAIR TO AN IHX PFR DOUNREAY	WEBB J;HUNTER D	1983	PFR/0C/P(83)62	UKAEA	PFR	Equipment, Repair, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
8419	PFR DESIGN REVIEW - ABSORBER RODS,GUIDE TUBES AND ABSORBER DMSA EXPERIMENTS. CD FOILS	FORD J	1987	FRDCC/FEWP/P(87)10	N/A	PFR	Absorber, Guide Tube	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
8419	PFR DESIGN REVIEW - ABSORBER RODS,GUIDE TUBES AND ABSORBER DMSA EXPERIMENTS. CD FOILS	FORD J	1987	FRDCC/FEWP/P(87)10	N/A	PFR	Absorber, Guide Tube	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
8419	PFR DESIGN REVIEW - ABSORBER RODS,GUIDE TUBES AND ABSORBER DMSA EXPERIMENTS. CD FOILS	FORD J	1987	FRDCC/FEWP/P(87)10	N/A	PFR	Absorber Rods, Guide Tubes, DMSA, BCD Foils	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
8464	PFR EVAPORATOR UNIT WELDS - METALLURGICAL CHARACTERISATION OF A SHOT-PEENED TEST WELD	LINEKAR GAB;HUGHES B;IRONS HW	1981	ND-M-1671	UKAEA	PFR	Evaporator, Welds, Shot-peened	This report is a key reference associated with Steam Generators and Shot-Peening	Operation Experience associated with Steam Generators and Shot-Peening. Potentially unrepeatable experiments, analysis and experience

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8871	PROPOSAL FOR A 1/4 SCALE 60 DEGREES SECTOR WATER MODEL TO VALIDATE VICSEN PREDICTIONS OF ACS INTERNAL FLOWS	SMITH R;HULME G	1986	RES INT 2910 ISSUE A-; FR/THSG/P(86)181	N/A	PFR	ACS, Water, VISCEN	This report is a key reference associated with Above Core Structure	Comparison between experimental and calculated values.
8988	PEBBLE*: A COMPUTER PROGRAM FOR ANALYSING STRUCTURAL INTERACTIONS BETWEEN FAST REACTOR ABSORBER COMPONENTS	RIDING DJ	1985	NPD/TN(84)200	N/A	PFR	PEBBLE, Structural Interaction, Absorber	This report is a key reference associated with Absorber Rods and Mechanisms	Review of Calculational Methods.
9056	IMPROVING THE PERFORMANCE OF B4C CONTROL ROD PINS	BROCKLEHURST JE;GILCHRIST KE		ND-M-3066;FRASG/N(85)50	N/A	PFR	B4C, Control Rod, Pins	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
9203	EXTENDED ANALYSIS OF THE FLOW BETWEEN THE TOP OF THE CORE AND THE ACS BAFFLE USING THE PHOENICS COMPUTER CODE	SMITH AG	1986	FR/THSG/P(87)321;FRD/TN(86)874	NNC	PFR	Flow, ACS, Baffle, Phoenics	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
9284	IHX CORROSION PROBLEMS FOLLOWING SODIUM/WATER REACTIONS	WALTERS J	1987	FRDCC/MWG/CSG/P(87)121;FRDCC/MWG/P(87)472	NNC	PFR	Corrosion, Sodium, Water, Reaction	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
9408	NNC REVIEW OF PFR IHX DESIGN FOR JAPCO	LOMAS S	1987		NNC	PFR	IHX Design, JAPCO	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
9543	A PROPOSED FAST REACTOR PROGRAMME FOR FAILED FUEL DETECTION AND LOCATION	LENNOX TA;GREGORY CV	1984	DPC/P(84)22;ND-M-2396;FRDCC/FEWP/P(84)31;FRSWG/SISG/P(84)4	DNE	PFR	Failed Fuel	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
9756	ULTRASONIC TECHNIQUES FOR THE ISI OF PFR EVAPORATOR TUBE TO TUBE PLATE WELDS	HUDGELL RJ;BIRCHALL PD	1982	ND-R-886(R)	UKAEA	PFR	Ultrasonic Techniques, ISI, Evaporator Tube, Tube Plate, Welds	This report is a key reference associated with Steam Generators and the Identification of Leaking Welds from the Water Side	Operation Experience associated with Steam Generators and the Identification of Leaking Welds from the Water Side. Potentially unrepeatable experiments, analysis and experience
9764	PFR IHX TOP: STRESS ANALYSIS UNDER TRANSIENT THERMAL LOADING CONDITIONS C87/803	GILROY JE;RITSON DJ	1987	PFR/TC/P(87)200;PFR/LLF/P(87)66	NNC	PFR	Stress, Transient, Thermal Loading	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
9952	FURTHER CONSIDERATIONS ON THE BOWING OF SUB-ASSEMBLY WRAPPERS IN PFR AND CFR	JACKSON GO		FRDC/P(70)22;PFR/TC/P49;FRDC/CPWP/P(70)22	N/A	PFR, CFR	Bowing, Wrappers	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
9953	OPERATIONAL IMPLICATIONS OF STEEL SWELLING ON PFR	EVANS AD		FRDC/P(70)32	N/A	PFR	Steel, Swelling	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
9954	SUGGESTED REQUIREMENTS FOR A NEW PARAMETRIC OPTIMISATION PROGRAMME	JACKSON GO		FRDC/P(70)23	NPDO	PFR	N/A	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
9955	FURTHER CONSIDERATIONS ON THE BOWING OF SUB-ASSEMBLY WRAPPERS IN PFR AND CFR	JACKSON GO		FRDC/P(70)22;PFR/TC/P.49;FRDC/CPWP/P(70)22	N/A	PFR, CFR	Bowing, Wrappers	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
9956	THE EFFECTS OF STEEL SWELLING IN THE PFR CORE	JACKSON GO		FRDC/P(70)19;FRDC/CPWP/P(70)17	N/A	PFR	Steel, Swelling	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
10091	PFR HALIP BPD MK 1V - STATUS	CLARE A	1987	FRDCC/P(87)251	N/A	PFR	BPD, MK1V	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
10158	PFR ABSORBER ROD EXERCISING A STATUS REPORT FROM THE WORKING GROUP - FEBRUARY 1987	LORD DJ;HENDERSON JDC		PFR/TC/P(87)158	N/A	PFR	Absorber Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
10388	SGU'S AND IHX'S FOR PFR - PROVISION IN VOTE FUNDS	SMITH GEI	1983	FRJC/P(83)22	N/A	PFR	SGU, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
10428	CAVITATION TESTS ON A PFR SECONDARY SODIUM PUMP	CROAD A	1988	FREWG/P(88)387	NNC	PFR	Cavitation Test, Secondary Sodium Pump	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
11058	COMMENTS ON CONTROL AND DYNAMICS REVIEW 1986/7 PPWG/P(87)115	BUTTERFIELD MH	1988	PFR/TC/P(87)203	N/A	PFR	Control, Dynamic	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
11136	CORROSION OF PFR ROOF MATERIALS	GERRARD JF		TRG MEMO 7095 (R);FRDCC/MWG/CSG/P(88)150;FRDCC/MWG/P(88)587	UKAEA	PFR	Corrosion, Roof, Materials	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
11183	NNCs ASSESSMENT ON UKAEA DESIGN PROPOSAL FOR THE OPERATIONAL REACTOR CLOSURE PLUG - PFR IHX REMOVAL	BOWKER L;JACKSON P;GAMBLE K;BARLOW D	1983	ED 726	NNC	PFR	Closure Plug, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
11211	PRELIMINARY COMMENTS ON THE UKAEA DUMMY IHX PLUG DESIGN PROPOSAL DRAWING OAE 475809 REFERS			ED 715	N/A	PFR	IHX, Plug	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
11452	TEMPERATURE DATA FROM A PFR EVAPORATOR DURING PLANT TRIP CONDITIONS	INNES NJ;WIDDOWSON IR	1980	ND-M-1176	UKAEA	PFR	Temperature, Evaporator, Plant Trip	This report is a key reference associated with Steam Generators and the Sodium Flow-Patterns affecting the Magnetite Formation	Operation Experience associated with Steam Generators and the Sodium Flow-Patterns affecting the Magnetite Formation. Potentially unrepeatable experiments, analysis and experience
11735	RECOMMENDED LIFE LIMITS FOR PFR ABSORBER RODS AND GUIDE TUBES BASED ON THE MATERIAL 54 SWELLING RULE	LIGHTOWLERS RJ	1988	FRDCC/CFWG/P(88)7;PFR/TC/P988)234;PFR/SWP/ESC/P(88)4	N/A	PFR	Absorber Rods, Guide Tubes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
12225	RECOMMENDED LIFE LIMIT FOR MK 111E CONTROL RODS BASED ON A 70 DPA NFE DOSE LIMIT FOR AUSTENITIC COMPONENTS	NELLIGAN DJ		PFR/FEDWP/P(89)1443;PFR/TC/P(89)316	UKAEA	PFR	Life Limit, MK 111E Control Rod, 70 DPA, Dose Limit, Austenitic	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
12267	THE PROPOSED MODIFICATION TO THE PFR CORE SUPPORT ARRANGEMENT	HACKNEY S		PFR/FEDWP/P(70)115	UKAEA	PFR	Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
12306	PFR WATER COMMISSIONING TESTS DETERMINATION OF DUMMY CORE PAD REACTION LOADS	HACKNEY S;HOLMES JAG		PFR/FDWP/P(71)135	N/A	PFR	Dummy Core, Reaction Loads	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
12309	AXIAL MISALIGNMENT OF THE BPD TAKE OFF	MITCHELL CH		PFR/FDWP/P(71)139	N/A	PFR	Axial, BPD	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
12328	MEASUREMENT OF THE FRICTION FORCES WITHIN THE PFR CONTROL GEAR SYSTEM DUE TO MISALIGNMENT BETWEEN THE MECHANISM AND CORE	KNOWLES PJ		PFR/FDWP/P(72)162	N/A	PFR	Friction Forces, Control Gear System, Misalignment, Core	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
12341	THERMAL STABILITY TESTING OF FAST REACTOR FUEL ELEMENT AND CONTROL ROD COMPONENTS	ROSE KM;BENTLEY JW		PFR/FDWP/P(72)178	RFEL	PFR	Thermal Stability, Fuel Element, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience

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12342	PROGRAMME FOR THERMAL STABILITY TESTING PFR ABSORBER ROD COMPONENTS	BENTLEY JW;ROSE KM		PFR/FDWP/P(72)179	RFEL	PFR	Thermal Stability, Absorber Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
12364	ENDORSEMENT OF PFR MkIV CONTROL ROD DESIGN	GATLEY JA		PFR/FDWP/P(73)236	RFEL	PFR	MKIV Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
12369	PFR MK 1V CONTROL ROD DESIGN EVALUATION OF THERMAL STABILITY	BENTLEY JW		PFR/FDWP/P(73)231	RFEL	PFR	MKIV Control Rod, Thermal Stability	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
12383	THE PFR MK 1V CONTROL ROD DESIGN	GATLEY JA		PFR/FDWP/P(73)214	RFEL	PFR	MKIV Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
12411	PROGRAMME FOR ENDORSEMENT OF PFR MK1V CONTROL ROD DESIGN	GATLEY JA		PFR/FDWP/P(74)258	RFEL	PFR	MKIV Control Rod, Design	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
12440	THERMAL AND IRRADIATION RELAXATION OF PE 16 SPRINGS FOR PFR MK 1V CONTROL RODS	GATLEY JA		PFR/FDWP/P(74)289	RFEL	PFR	Thermal, Irradiation, Relaxation, PE16 Springs, MKIV Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
12444	PRELIMINARY DESIGN OF A EUROPIA CONTROL ROD	GATLEY JA		PFR/FDWP/P(73)192	RFEL	PFR	Europia, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
12517	PFR IHX DELAYED NEUTRON MONITOR VALIDATION EXPERIMENTS ON A 1/5 SCALE WATER MODEL	PARDY A	1987	NRL-R-1010;PFR/TC/P(88)265	NRL	PFR	IHX, Delayed Neutron, Validation, 1/5 Scale	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
12519	THE HISTORY OF SIGNALS IN THE PFR CLAD FAILURE DETECTION SYSTEMS DURING RUNS 13A AND 13B	MACLEOD DJ	1988	PFR/TC/P(88)261;DFMC/P(88)18	UKAEA	PFR	Signals, Clad Failure, Runs 13A, 13B	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
12583	REVISED PROGRAMME FOR PFR MK 1V CONTROL RODS	GATLEY JA		PFR/FDWP/P(75)352	RFEL	PFR	MKIV Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
12854	PAD ARRANGEMENT FOR CFR 8 SUB-ASSEMBLIES/LEANING POST CLUSTER	SMITH BH;LUNT AR		PFR/FEDWP/P(75)363LFEDO/DM 75/57;FRD/P(75)45	N/A	CFR	Pad, Sub-Assemblies, Leaning Post Cluster	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
12861	PFR CONTROL ROD MK11 WRAPPER ASSEMBLY - THERMAL STABILITY TEST	BENTLEY JW		PFR/FDWP/P(75)369	RFEL	PFR	Control Rod, MK11, Wrapper, Thermal Stability	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
12904	IRRADIATED TESTING OF CFR1 LEANING POST DESIGN FEATURES	BAGLEY KQ;STANDRING J		PFR/FEDWP/P(76)409	N/A	CFR	Leading Post	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
12985	EVALUATION TEST PROGRAMME ON FAST REACTOR ABSORBER RODS AND GUIDE TUBES	BENTLEY JW		PFR/FEDWP/P(77)563	NPDO	PFR	Absorber Rods, Guide Tubes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
13027	PFR ABSORBER RODS AND GUIDE TUBES STATEMENT FOR PFR/FEDWP	DODD JA		RTD/TECH NOTE(78)6	N/A	PFR	Absorber Rods, Guide Tubes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
13100	THERMAL STABILITY TESTING OF A PFR MK111 CONTROL ROD SHELL AND A SIMULATED PFR MK 1V CONTROL ROD	BENTLEY JW		ND M 820;FR/FEDWP/P(79)669	UKAEA	PFR	Thermal Stability, MK111, Control Rod, MK1V Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
13160	PRELIMINARY EXAMINATION OF THE BOWING OF THE PFR CONTROL AND SHUT OFF RODS AND THEIR ASSOCIATED GUIDE TUBES	SIMPSON A		PFR/FEDWP/P(77)529	NPDO	PFR	Bowing, Control Rods, Shut off Rods, Guide Tubes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
13252	EXTENDING THE LIFE OF PFR CONTROL ROD PINS	OAKDEN MML;HARRISON WR	1988	NRL-M-2055;FRASG/P(88)230	UKAEA	PFR	Control Rod, Pins	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
13255	RECOMMENDED LIFE LIMITS FOR PFR CONTROL RODS BASED ON BORCON PREDICTIONS OF ABSORBER PIN BEHAVIOUR	OAKDEN MM;HARRISON WR		NRL-M-2053;FRASG/P(88)229	UKAEA	PFR	Life Limit, Control Rod, BORCON, Absorber Pin	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
13294	ANALYSIS OF AN ACS BAFFLE PLATE TO SHROUD TUBE CONNECTION	SINCLAIR EG	1989		NNC	PFR	ACS, Baffle, Shroud	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
13398	PFR IHX CORROSION ASSESSMENT FOR RUN SIXTEEN	JONES K		PFR/TC/P(88)288;OETD/TC 1642	N/A	PFR	IHX, Corrosion	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
13489	PFR CONTROL RODS A PRELIMINARY ASSESSMENT OF ROD GUIDE C0NE SWELLING	TRIGGS GW		FEDWP/P(79)692	RTDO	PFR	Control Rod, Core Swelling	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
13490	MHD SHOCK ABSORBER FOR PFR AUXILIARY SHUT -OFF RODS FEASIBILITY STUDY AND DEVELOPMENT PROPOSAL	THATCHER G;DAVIDSON DF		FEDWP/P(79)691	N/A	PFR	Shock Absorber, Shut-off Rods	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
13558	ENDURANCE TEST AT RNL ON PFR MKIV CONTROL ROD EXPERIMENTAL SPECIFICATION	MEREDITH BE	1980	ND-M-1180;PFR/FEDWP/P(80)725	UKAEA	PFR	Endurance, MKIV Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
13594	A DISTORTION ANALYSIS OF THE PFR MK4 CONTROL ROD AND GUIDE TUBE	SIMMERS DA	1981	CFR/FEDWP/P(81)767;RTD/TN/P(81)150	RTDO	PFR	MK4 Control Rod, Guide Tune	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
13616	THE DESIGN OF A SHORTENED EXTENSION ROD FOR USE WITH A PFR MKIV CONTROL ROD IN VIBRATION EXPERIMENTS	DUTHIE JC	1981	ND-R-716;PFR/FEDWP/P(81)833	UKAEA	PFR	Extension Rod, Control Rod, Vibration	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
13649	PFR ABSORBER ROD GUIDE TUBE BPD PIPE BUSH PULL OUT TEST	RIDEALGH F	1983	PFR/FEDWP/P(83)957	UKAEA	PFR	Absorber Rod, Guide Tube, BPD, Pipe Bush, Pull Out	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
13859	SINGLE POINT INELASTIC ANALYSIS OF AN ACS BAFFLE PLATE	SINCLAIR EG	1989		NNC	PFR	Single Point, Inelastic, ACS, Baffle	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
14075	OPERATIONAL LIFE OF PFR MK111 C CONTROL ROD PINS	KELLY BT	1989	NRL-M-2149(S);PFR/SWP/ESC/P(89)22;FRASG/P(89)236	UKAEA	PFR	Operational, MK111 Control Rod, Pins	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
14297	AN INVESTIGATION INTO POSSIBLE LEANING POST BOLT YIELDING FROM THE HIGH BOW OF SUB-ASSEMBLY JRA	NELLIGAN	1989	PFR/FEDWP/P(89)1453	NPDO	PFR	Leaning, Bow, Sub-Assembly	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience

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14401	BORCON PREDICTIONS FOR THE PFR MKIIIE CONTROL ROD PINS AT 650MW REACTOR POWER	KELLY BT	1989	NRL-M-2027(S);CFWG/FPSG/P(89)3	UKAEA	PFR	BORCON, MK111E Control Rod, Pins, Reactor Power	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
14874	CLAD FAILURE DETECTION AND THE SINGLE SUBASSEMBLY FAULT A PROPOSED PROGRAMME OF WORK	LENNOX TA		FRSWG/SAFSG/P(87)7;FRSSG/N 316	DNE	PFR	Clad Failure, Subassembly	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
15242	COMPARISON OF BORCON VERSION V5A WITH POST IRRADIATION EXAMINATION OF PFR CONTROL RODS SEG AND DKA	KELLY BT	1989	NRL-R-2035	UKAEA	PFR	BORCON, Post Irradiation, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Comparison between experimental and calculated values.
15912	SPECIFICATION FOR THE INSPECTION OF THE PFR ROOF COOLING/GAS BLANKET LUTE SYSTEM	SMALL J	1990		NNC	PFR	Roof, Cooling, Gas Blanket, Lute	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
15912	SPECIFICATION FOR THE INSPECTION OF THE PFR ROOF COOLING/GAS BLANKET LUTE SYSTEM	SMALL J	1990		NNC	PFR	Roof Cooling, Gas Blanket Lute	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
15913	SPECIFICATION FOR THE INSPECTION OF THE PFR VAULT ROOF AND ROTATING SHIELD TO THE MAINTENANCE INSPECTION AND TEST SCHEDULE				NNC	PFR	Vault Roof, Rotating Shield, Inspection	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
16046	INVESTIGATION OF STEP CHANGE IN CORE FLOW RELATED TO STEP CHANGE IN PRIMARY PUMP MOTOR CURRENT	MCCRINDLE D;HILL R		PFR/TN/P(90)962	AEA	PFR	Step Change, Core Flow, Primary Pump, Motor Current	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
16047	INVESTIGATION INTO A SECOND STEP CHANGE IN REACTOR CORE FLOW RELATED TO A STEP CHANGE IN PRIMARY PUMP MOTOR CURRENT	MCCRINDLE D	1990	PFR TECH NOTE NO(90)970	AEA	PFR	Step Change, Reactor Core, Primary Pump, Motor Current	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
16048	PFR IHX CORROSION ASSESSMENT RUN 17 AUGUST 1988 TO APRIL 1989	JONES K	1989	PFR/TC/P(89)380;PIDG TMNO 21	AEA	PFR	IHX, Corrosion	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
16822	CORE SUPPORT INTEGRITY PROGRAMME	SEED G;MITCHELL C;ASPDEN G		FRDCC/SIWG/DASG/P(79)7	NPC	PFR	Core Support, Integrity	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
16840	EXAMINATION OF DESIGN AND CONSTRUCTION OF VESSEL AND STRONGBACK AND PREPARATION OF SPECIFICATION FOR STRUCTURAL TESTS	LEGGATT RH;OGLE MH		SIWG/P(80)33;FRDCC/SIWG/DASG/P(80)33	N/A	PFR	Vessel, Strongback, Structural Tests	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
17045	AN ANALYSIS OF THE FLOW AND TEMPERATURE DISTRIBUTIONS UNDERNEATH THE PFR-IHX BOTTOM TUBE-PLATE USING THE PHOENICS CODE	BROWN GA;SCRIVEN J	1983	CFR/PTWG/P(83)23	CTS	PFR	Flow, Temperature, IHX, Tubeplate, Phoenics	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
17048	THE VALIDATION OF THE ANTHEA COMPUTER CODE USING DATA FROM THE PFR-IHX	BROWN GA	1983	CFR/PTWG/P(83)19	CTS	PFR	ANTHEA, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Validation of Calculated Results
17078	AN ANALYSIS OF THE FLOW AND TEMPERATURE DISTRIBUTIONS UNDERNEATH THE PFR/IHX BOTTOM TUBEPLATE USING THE PHOENICS CODE WHEN PFR IS OPERATING WITH ONE SECONDARY CIRCUIT	BROWN GA	1983	CFR/PTWG/P(83)30	CTS	PFR	Flow, Temperature, IHX, Tubeplate, Phoenics	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
17124	THEORETICAL ANALYSIS OF THE FLOW BETWEEN THE TOP OF THE CORE AND THE ACS BAFFLE USING THE PHOENICS COMPUTER CODE	SMITH AG	1985	FR/TN(85)787;FR/THSG/P(85)122	NNC	PFR	Flow, ACS, Baffle, Phoenics	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
17339	STATEMENT OF THE PRESENT SAFETY CASE REGARDING FAILURE OF THE PFR CORE SUPPORT STRUCTURE	HENDERSON JDC	1990	PFR/SWP/P(90)39	PFR	PFR	Safety, Failure, Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Safety Assessment of the PFR following a potential failure of Core Supports.
17347	THE POST IRRADIATION EXAMINATION OF BORON CARBIDE PINS FROM THE PFR MK111 CONTROL ROD DKA	OAKDEN MM;ADAM RW;MUNRO B;HARRISON WR;HANLEY D;BROCKLEHURST JE		NRL-M-2133;FRDCC/FRASG/P(89)234;FRDCC/FEWP/P(89)22	UKAEA	PFR	Post Irradiation, Boron Carbide, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
17449	PRELIMINARY INVESTIGATION OF METHODS OF LOCATING FAILED FUEL SUB ASSEMBLIES IN CDFR AFTER SHUTDOWN	CARTWRIGHT DK	1982	ND-M-1838	UKAEA	CDFR	Failed Fuel, Sub Assemblies, Shutdown	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
17510	OPERATIONAL EXPERIENCE OF BPD SYSTEMS WITH IMPLICATIONS FOR CDFR DESIGN	SHAW SG	1980	TC/P(80)401	NPC	CDFR	Operational, BPD	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
17628	RECOMMENDED LIFE LIMITS OF PFR CONTROL ROD PINS AND ABSORBER MATERIALS CLUSTERS	KELLY BT	1990	AEA-TRS-5041;CFWG/FSPG/P(90)36	AEA	PFR	Life Limits, Control Rod, Absorber	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
17925	SPECIAL SAFETY EXPERIMENTS IN PFR	TAIT D;LORD DJ;LENNOX TA		FRSWG/SAFSG/P(88)25	N/A	PFR	Safety	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
18080	EVALUATE THE REACTIVITY WORTH OF REMOVING TWO CONTROL RODS	HENDERSON JDC	1989	PFR/SWP/P(89)27	AEA	PFR	Reactivity, Worth, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
18084	LEAK-BEFORE-BREAK PROCEDURE FOR SODIUM BOUNDARY COMPONENTS DCRC CONCLUDING REPORT DRAFT REPORT - REVISION 0	HOOTON DG	1991	FR/SIWG/CBG/P(91)162	NNC	PFR	Leak before Break, Sodium, Boundary	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
18094	AN INVESTIGATION INTO THE EFFECTS OF IHX LEAKAGE FLOW DURING SINGLE CIRCUIT OPERATION OF PFR USING A 1/6TH SCALE WATER PERSPEX MODEL	PURSLOW B	1983	PFR/SWP/P(83)43;FRD/TN/P(83)578	NNC	PFR	IHX, Leakage Flow, Single Circuit, 1/6 scale,	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
18095	PFR OUTER POOL TEMPERATURE EXCURSION 2ND FEBRUARY 1981 COLD POOL MODEL TESTS AND TOP STRAKE DAMAGE ASSESSMENT	PURSLOW B;DIXON M	1982	PFR/SWP/P(82)3;FRD/TN/P(82)498	NPC	PFR	Outer Pool, Temperature Excursion, Cold Pool, Top Strake	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
18096	PFR PRIMARY TANK TEMPERATURE AND DAMAGE ASSESSMENT POST TRIP 19TH MARCH 1981	DIXON M	1982	PFR/SWP/P(82)8;FRD/TN/P(82)501	NPC	PFR	Primary Tank, Temperature, Damage, Post Trip	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
18097	THE RELEVANCE OF THE SACLAY SODIUM LEVEL EXPERIMENT TO PFR TOP STRAKE	HOOTON DG;ROSE RT	1982	PFR/SWP/P(82)32;FRD/TN/P(82)535	NPC	PFR	Saclay Sodium, Top Strake	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
18098	ADDENDUM TO PFR SAFETY REPORT PRIMARY VESSEL TOP STRAKE	DURSTON JG;ROSE RT	1981	PFR/SWP/P(81)6;FRD/TN/P(81)438;PFR/LLF/P(85)7	NPC	PFR	Safety, Primary Vessel, Top Strake	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
18100	COVER NOTE TO LIVERPOOL UNIVERSITY REPORT ON THERMAL BUCKLING OF THE PFR TOP STRAKE	ROSE RT	1981	PFR/SWP/P(81)40	NPC	PFR	Thermal Buckling, Top Strake	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
18101	A REVIEW OF WORK RELEVANT TO THE PFR ABOVE CORE STRUCTURE SINCE MAY 1977 AND THE REVISED SAFETY CASE FOR ITS CONTINUED OPERATION	ROSE RT;GREEN D	1982	FRD/TN/P(82)510;PFR/SWP/P(82)18	NNC	PFR	Above Core Structure, Safety	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
18102	COVER NOTE TO REPORT ON THE SACLAY SODIUM LEVEL EXPERIMENT	ROSE RT	1981	PFR/SWP/P(81)39	NPC	PFR	Saclay Sodium Level	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
18103	PFR ANNUAL SAFETY SUMMARY (MAY 1984)	HENDERSON JDC		PFR/SWP/P(84)25	N/A	PFR	Safety	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
18103	PFR ANNUAL SAFETY SUMMARY (MAY 1984)	HENDERSON JDC		PFR/SWP/P(84)25	N/A	PFR	Safety	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
18527	INITIAL DATA ASSUMPTIONS FOR THE FAILED FUEL DETECTION LOOP (FFDL) - DESIGN STUDY	LENNOX T	1991		NNC	PFR	Failed Fuel, Loop, FFDL	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
18774	THE PROPOSED ABSORBER ROD EXERCISING PROGRAMME FOR RUN 22	WASHINGTON A	1991	PFR/SWP/P(91)1;	PFR	PFR	Absorber Rod, Run 22	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
19196	DRAFT 1 PFR EXPERIMENTS DEMONSTRATION OF CONTROL ROD ENHANCED EXPANSION DEVICE (CREED) IN PFR	DOSTAL M;HARTLEY DJ;SHERLOCK P;	1991		NNC	PFR	Control Rod, Expansion, Creed	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
19214	CDFR BURST PIN DETECTION (BPD) SYSTEM SAMPLE SELECTOR. PROPOSAL FOR A WATER TEST MODEL. (PROJECT NO. C93/40/41)	BOUABDALLAH S;	1982	CBG/P(82)454; RES.INT. 2670;	NNC	CDFR	Burst Pin Detection, BPD	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
19379	CFR BPD SYSTEM SAMPLE SELECTOR PROPOSAL FOR A WATER TEST MODEL	BARROWMAN GR	1982	CBG/P(82)434	NNC	CFR	BPD, Water Test	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
19668	PRIMARY PUMP 3 PERFORMANCE. RUN 22.	MCCRINDLE D;	1991	PFR/TECH/N1017;PE4/1339;	PFR	PFR	Primary Pump	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
19837	STATEMENT ON THE SAFETY CASE REGARDING FAILURE OF THE PFR CORE SUPPORT STRUCTURE (CSS)	GREGORY CV	1990	PFR/SWP/P(90)44	PFR	PFR	Safety, Failure, Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
19838	THE CONSEQUENCES OF CORE SUPPORT STRUCTURE FAILURE	GREGORY CV		PFR/SWP/P(90)45	N/A	PFR	Consequence, Core Support, Failure	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Safety Assessment of the PFR following a potential failure of Core Supports.
19940	APPLICATION FOR A SUSPENSION OF MITS ITEM DEALING WITH PFR MAGNET SCREW ASSEMBLIES	SANDISON A	1991	PE1/1843;DNSC/P(91)65		PFR	Magnet Screw Assemblies	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
19942	PFR/IHX CORROSION ASSESSMENT RUNS 19,20 AND 21 AND AA REASSESSMENT OF PREVIOUS DATA	MORGAN DJ	1991	PE1/1807;PFR/TC/P(91)449;PIDD/TM(91)3	AEA	PFR	IHX, Corrosion	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
19945	PFR IHX CORROSION ASSESSMENT RUNS 22 AND 24	MORGAN DJ	1991	PE1/1806;PFR/TC/P(91)476;PIDD/TM(91)12	AEA	PFR	IHX, Corrosion	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
19947	THE PRESENT STATE OF THE SAFETY CASE FOR THE PFR CORE SUPPORT STRUCTURE	HENDERSON JDC	1991	PE1/1466;PFR/TC/P(91)17	PFR	PFR	Safety, Core Support	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
19947	THE PRESENT STATE OF THE SAFETY CASE FOR THE PFR CORE SUPPORT STRUCTURE	HENDERSON JDC	1991	PE1/1466;PFR/TC/P(91)17	PFR	PFR	Safety, Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Safety Assessment of the PFR following a potential failure of Core Supports.
19996	APPLICATION FOR A SUSPENSION ON MITS ITEM DEALING WITH PFR MAGNET SCREW ASSEMBLIES	SANDISON A	1991	PE1/1843;DNSC/P(91)65	PFR	PFR	Magnet Screw Assemblies	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
20150	FAILED FUEL DETECTION CALIBRATION TECHNIQUES	LENNOX TA	1985	FRDCC/SISG/P(85)19	N/A	PFR	Failed Fuel, Calibration	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
20214	A PROPOSED FAST REACTOR PROGRAMME FOR FAILED FUEL DETECTION AND LOCATION	LENNOX TA;GREGORY CV	1984	FRSWG/SAFSG/P(84)9	N/A	PFR	Failed Fuel, Detection, Location	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
20384	PFR IHX'S DESIGN OF INSPECTION EQUIPMENT ADDITIONAL INSTRUMENTATION REPLACEMENT ROOF PLUGS & HANDLING FRAME SUMMARY PAPER	BOWKER LJ;BARLOW D	1980	PFR/TF/P(80)438	NPC	PFR	IHX, Inspection, Equipment, Instrumentation, Roof Plug, Handling Frame	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
20510	SOME ASPECTS OF HEAT TRANSFER AFFECTING THE THERMAL STRIPING PROBLEM	DAWSON CW		ND-M-426	UKAEA	PFR	Heat Transfer, Thermal Striping	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
20512	COMPARISON OF PFR ABOVE CORE TEMPERATURE FLUCTUATIONS WITH RNL 1/9TH SCALE AIR MODEL DATA	BETTS C;ASHTON MW;SPANTON JH		ND-M-608;PFR/SWP/P(78)86	UKAEA	PFR	Above Core Temperature	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
20546	A MEASUREMENT OF THE PFR CONTROL ROD S-CURVE AT THE END OF PFR RUN 22	NEWTON TD	1991	PE1/2408;PFR/TC/P(91)490;PFR/ER/203	AEA	PFR	Control Rod, S-Curve, Run 22	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
20640	FAILED FUEL DETECTION CALIBRATION TECHNIQUES	LENNOX TA;WEBSTER R	1985	FRSWG/SISG/P(85)19	N/A	PFR	Failed Fuel, Detection, Calibration	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
20952	PFR CONTROL ROD ENHANCED EXPANSION DEVICE (CREED) CONCEPT PAPER FOR EFR END-OF-LIFE EXPERIMENTS	BARROWMAN GR	1992		EFR ASSOCIATES	PFR	Control Rod, Expansion, Creed	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
20955	PFR IHX REMOVAL AND INSPECTION (PAPER NO 2)	FRD&SRD		PFR/TF/P(77)257	N/A	PFR	IHX, Removal, Inspection	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21210	A REVIEW OF OIL INGRESS INTO THE PFR PRIMARY CIRCUIT FROM THE PRIMARY PUMPS	HARTLEY DJ;PURSLOW B;BRYANT S	1992		NNC	PFR	Oil Ingress, Primary Circuit, Primary Pump	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21220	MANAGEMENT OF THE PRIMARY SODIUM PUMP UPPER BEARING LUBRICATING OIL SYSTEMS	SHIPLEY DF	1992	PE1/3234;PFR/TN 1059;PE1/3615	PFR	PFR	Primary Sodium Pump, Upper Bearing, Lubricating Oil	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21267	PFR PRIMARY CIRCUIT FLOW DURING PRIMARY PUMP VALVE ASSEMBLY REMOVAL	MCCRINDLE D;CRUICKSHANK A;	1992	RS/SWP(92)5;PE1/3326;	PFR	PFR	Primary Circuit, Flow, Primary Pump, Valve, Removal	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21319	ADDENDUM TO PFR SAFETY REPORT SUB-SECTION H5 REVISED VAULT ROOF COOLING SYSTEM	GLASS JAF;BROADLEY D		PFR/SWP/P(74)62	N/A	PFR	Safety, Vault Roof Cooling	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience

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21321	PFR REACTOR JACKET/IHX POD DAMAGE ASSESSMENT AS OF JUNE 1981	BROADLEY D	1981	PFR/SWP/P(81)33	NPC	PFR	Reactor Jacket, IHX Pod, Damage	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21468	ADDITIONAL THEORETICAL RESULTS FOR PFR TOP STRAKE INSULATION AT FULL POWER INCLUDING EFFECTS OF COOLING FLOW DIVERTOR VALVES	DIXON M;HOOTON DG;GREEN D		PFR/SWP/P(76)28;PFR/TSPC/P(76)48	NPC	PFR	Top Strake, Insulation, Cooling Flow, Divertor Values	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21469	PFR PRIMARY VESSEL TOP STROKE TEMPERATURE PROFILES	DURSTON JG		PFR/SWP/P(76)15;PFR/PCR/P(76)4	NPC	PFR	Primary Vessel, Top Strake, Temperature	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21470	PFR PRIMARY VESSEL TOP STRAKE STRUCTURAL INTEGRITY UNDER THERMAL STRESSING	ROSE RT;WOOD DS		PFR/SWP/P(76)16;PFR/PCR/P)76)5	NPC	PFR	Primary Vessel, Top Strake, Structural Integrity, Thermal Stressing	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21471	DEPENDENCE OF PFR TOP STRAKE TEMPERATURE PROFILE ON ROOF COOLING FLOW	DURSTON JG		PFR/SWP/P(76)33;PFR/TSPC/P(76)47	NPC	PFR	Top Strake, Temperature Profile, Roof Cooling, Flow	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21471	DEPENDENCE OF PFR TOP STRAKE TEMPERATURE PROFILE ON ROOF COOLING FLOW	DURSTON JG		PFR/SWP/P(76)33;PFR/TSPC/P(76)47	N/A	PFR	Top Strake, Temperature Profile, Roof Cooling, Flow	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21472	PFR ROOF COOLING SYSTEM ROTATING SHIELD PENETRATION FLOW REVERSAL TESTS	LUNT AR		PFR/PCR/P(76)38;PFR/SWP/P(76)29	NPC	PFR	Roof Cooling, Rotating Shield	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21472	PFR ROOF COOLING SYSTEM ROTATING SHIELD PENETRATION FLOW REVERSAL TESTS	LUNT AR		PFR/PCR/P(76)38;PFR/SWP/P(76)29	N/A	PFR	Roof Cooling, Rotating Shield	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21473	THERMAL STRESSES IN THE ABOVE CORE STRUCTURE OF THE PFR	BROADLEY D		PFR/SWP/P(76)39;PFR/TF/P(76)165	NPC	PFR	Thermal Stresses, ACS	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21474	A REVIEW OF STRUCTURAL VALIDATION FOR THE PFR PRIMARY VESSEL TOP STRAKE FOLLOWING U.S. DISCUSSIONS	ROSE RT		PFR/SWP/P(76)40;PFR/TF/P(76)169;PFR/PCR/P(76)44	NPC	PFR	Structural Validation, Primary Vessel, Top Strake	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21476	PFR PRIMARY VESSEL TOP STRAKE REPORT BY PROF. F.A. LECKIE	ROSE RT		PFR/SWP/P(76)42	NPC	PFR	Primary Vessel, Top Strake	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21477	TOP STRAKE DT-PFR	BROADLEY D		PFR/TSPC/P(76)53;PFR/SWP/P(76)44	NPC	PFR	Top Strake	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21479	STRATEGY FOR THE ASSESSMENT OF THE PFR ABOVE CORE STRUCTURE AND THE SAFETY CASE FOR CONTINUED POWER OPERATION	BROADLEY D		PFR/SWP/P(76)54;PFR/ASCM/P(76)8;PFR/TF/P(76)184	NPC	PFR	ACS, Safety	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21480	THERMAL FLUCTUATIONS IN PFR ABOVE CORE STRUCTURE A REVIEW OF FLOW AND HEAT TRANSFER EXPERIMENTS	BETTS C		ACSCM/P(77)13;PFR/SWP/P(77)1	REML	PFR	Thermal, ACS, Flow, Heat Transfer	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21481	PFR THERMAL STRIPING PROBLEM SIGNIFICANCE OF DEFECTS ARISING FROM THERMAL STRESSING AND/OR OTHER STRESS CYCLES	COWAN A;WOOD DS		PFR/TF/P(77)206;PFR/SWP/P(77)9;PFR/ACSM/P(77)8	N/A	PFR	Thermal Striping, Defects, Thermal Stress	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21483	TEMPERATURE FLUCTUATIONS WITHIN PFR CONTROL ROD SHROUD TUBES REML WATER TEST RESULTS	FEWSTER J		ACSCM/P(77)14;PFR/SWP/P(77)14	REML	PFR	Temperature, Control Rod, Shroud, Water	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21483	TEMPERATURE FLUCTUATIONS WITHIN PFR CONTROL ROD SHROUD TUBES REML WATER TEST RESULTS	FEWSTER J		ACSCM/P(77)14;PFR/SWP/P(77)14	REML	PFR	Temperature Fluctuations, Control Rod, Shroud	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21484	SODIUM MIXING TEE EXPERIMENT (SoMITE) THERMAL CYCLING OF 316 STAINLESS STEEL	LANGRIDGE EG;BROMIDGE NAC;SCOTT R		ACSCM/P(77)15;PFR/SWP/P(77)15	REML	PFR	Sodium, SoMITE, Thermal Cycling, Stainless Steel	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21485	AIR MODEL MEASUREMENTS OF PFR ABOVE CORE TEMPERATURE FLUCTUATIONS	COCHRANE SJR		PFR/SWP/P(77)16;ACSCM/P(77)16	REML	PFR	Above Core, Temperature, Fluctuations	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21486	SODIUM TEMPERATURE VARIATIONS OBSERVED ABOVE THE CORE OF THE PFR BY AN INDUCTIVE PROBE	DEAN SA		ACSM/P(77)20;PFR/SWP(77)23	REML	PFR	Sodium, Temperature, Core, Inductive	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21490	CONTROL ROD DRIVE INCIDENT IN PFR	GRAY J;BROOMFIELD AM		PFR/SWP/P(77)46	DNPDE	PFR	Control Rod, Incident	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21491	CASE FOR A POSSIBLE FURTHER DELAY IN SAFETY ROD COMMISSIONING	HENDERSON JDC		PFR/SWP/P(77)51	N/A	PFR	Safety Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21492	SAFETY REQUIREMENTS FOR AN ALTERNATIVE SHUT-DOWN DEVICE FOR PFR	BROADLEY D;McDONALD DR		PFR/SWP/P(77)62	NPC	PFR	Safety, Shut-down	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21495	METHODS FOR ASSESSMENT OF DAMAGE TO THE ABOVE CORE STRUCTURE	DIXON M		PFR/SWP/P(77)69;PFR/ACSCM/P(77)37;FRD/TN/P(78)250	NPC	PFR	Damage, ACS	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21605	PFR ABOVE-CORE TEMPERATURE FLUCTUATIONS PRELIMINARY RESULTS FROM THE 1/9TH SCALE AIR MODEL FEBRUARY 1978	BETTS C;ASHTON MW		PFR/SWP/P(78)16;ACSCM/P(78)45	UKAEA	PFR	Above Core, Temperature, 1/9th, Model	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21606	A BRIEF DISCUSSION OF SOME FACTORS AND ASSUMPTIONS USED TO CALCULATE THE FATIGUE DAMAGE TO SHROUD TUBE P09	DURSTON JG		PFR/SWP/P(78)24;PFR/ACSCM/P(78)41;FRD/DM(78)211	NPC	PFR	Fatigue, Shroud Tube	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21607	COVER NOTE ON CURRENT STRUCTURAL TESTS FOR THE ASSESSMENT OF DAMAGE TO THE PFR ABOVE CORE STRUCTURE			PFR/SWP/P(78)35;PFR/ACSCM/P(78)43	N/A	PFR	Structural, Damage, ACS	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21608	MECHANICAL PROPERTIES WORK RELEVANT TO THE PFR ABOVE CORE STRUCTURE STATUS OF WORK AND RELEVANCE TO MAY 1977 SAFETY CASE	WOOD DS;SANDERSON SJ		PFR/ACSCM/P(78)44;PFR/SWP/P(78)36	N/A	PFR	Mechanical, ACS, Safety	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21610	EXAMINATION OF PFR CENTRE PHYSICS THIMBLE AND SSD SHROUD TUBE FOR THERMAL SHOCK AND THERMAL STRIPING DAMAGE	DURSTON JG		PFR/SWP/P(78)57;FRD/TN/P(78)271;PFR/ACSCM/P(78)47	NPC	PFR	Centre Physics Thimble, SSD, Shroud, Thermal Shock, Thermal Striping, Damage	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21613	A PROGRAMME OF THERMAL STRIPING MEASUREMENTS ON THE RNL 1/9 SCALE AIR MODEL	BETTS C		PFR/SWP/P(78)62;ACSCM/P(78)48	N/A	PFR	Thermal Striping, 1/9 Scale	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience

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21615	PFR AVG AND BAFFLE ATTACHMENT LIFE PREDICTIONS AS A FUNCTION OF REACTOR TRIP TEMPERATURE TRANSIENT SHAPES	DURSTON JG		PFR/SWP/P(78)68;PFR/ACSCM/P(78)50;FRD/TN/P(78)279	NPC	PFR	AVG, Baffle, Reactor Trip, Temperature Transient	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21616	ABOVE CORE STRUCTURE AIR THERMAL SHOCK EXPERIMENT VALIDATION OF RESULTS WITH REACTOR DATA	DIXON M		PFR/SWP/P(78)69;FRD/TN/P(78)285;ACSCM/P(78)52	NPC	PFR	ACS, Thermal Shock	This report is a key reference associated with Above Core Structure	validation of Calculated Results
21617	ASSESSMENT OF THE STEADY-STATE AND TRIP TRANSIENT TEMPERATURES EXPERIENCED BY THE AVG SUPPORT COLUMN BAFFLE ATTACHMENT FOR USE IN THE THERMAL SHOCK EXPERIMENT	DIXON M		PFR/ACSCM/P(78)42;PFR/SWP/P(78)73;PFR/TN/P(78)246	NPC	PFR	Steady State, Trip Transient, AVG, Support, Baffle, Thermal Shock	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21618	FURTHER INVESTIGATION OF THE PFR ANTI-VIBRATION GRID ENDURANCE	PEARCE JHB		PFR/SWP/P(78)74;ACSCM/P(78)55	N/A	PFR	Anti Vibration, Grid, Endurance	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21619	PFR ABOVE CORE FLOW STUDIES USING A 1/4 SCALE SECTOR WATER MODEL	CONROY PJ;ROBINSON RGJ		PFR/SWP/P(78)75;FRTHDC/P(78)8	NPDL	PFR	Above Core, Flow, 1/4 Scale	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21620	COMPARISON OF PFR ABOVE-CORE TEMPERATURE FLUCTUATIONS WITH RNL 1/9TH SCALE AIR MODEL DATA	BETTS C;ASHTON MW;SPANTON JH		ND-M-608(R);PFR/SWP/P(78)86	UKAEA	PFR	Above Core, Temperature, 1/9th, Model	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21621	ELEMENTARY STRESS ANALYSIS OF THE PFR CENTRAL SHROUD TUBE	GREEN D		FRD/TN/P(78)289;PFR/SWP/P(79)1	NPC	PFR	Stress, Central Shroud, Tub e	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21623	LINEAR ELASTIC FRACTURE MECHANICS ASSESSMENT OF THE ANTIVIBRATION GRID SUPPORT TUBE ATTACHMENT	GREEN D		FRD/P(79)14;PFR/SWP/P(79)19	NPC	PFR	Linear, Elastic, Antivibration, Grid, Support Tube	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21624	AIR THERMAL SHOCK EXPERIMENT	WARDLE PS		PFR/SWP/P(79)29;ACSCM/P(79)61	NPDL	PFR	Thermal Shock	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21625	THERMAL STRIPING OF AVG SUPPORT FEATURE	BOORMAN C		PFR/SWP/P(79)36;ACSCM/P(79)62	N/A	PFR	Thermal Striping, AVG, Support	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21626	SAFETY REPORT FOR THE LOADING OF THE ABOVE CORE STRUCTURE SUPPORT	STACEY J		PFR/SWP/P(79)7;PFR/SWP//P(79)33	N/A	PFR	Safety, Loading, ACS	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21628	ADDITIONAL NOTES FOR DRAFT ND-M-789(R) ABOVE CORE STRUCTURE AIR THERMAL SHOCK EXPERIMENT	LIOYD GJ;KENNETT E		PFR/SWP/P(79)38;ACSCM/P(79)64	NPDL	PFR	Thermal Shock	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21629	A REVIEW OF CREEP/FATIGUE DAMAGE ASSESSMENT OF THE PFR BAFFLE ATTACHMENT DETAIL	ROSE RT;DURSTON JG;EICKHOFF KG		PFR/SWP/P(79)42;FRD/TN/P(79)344	NPC	PFR	Creep, Fatigue, Baffle	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21630	METHODS FOR ASSESSMENT OF DAMAGE TO THE ABOVE CORE STRUCTURE BAFFLE ATTACHMENT	DIXON M		PFR/SWP/P(79)45;PFR/ACSCM/P(79)65;FRD/TN(79)352	NPC	PFR	Damage, ACS, Baffle	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21633	TEMPERATURE DISTRIBUTIONS AROUND BAFFLE ATTACHMENT IN PFR	DIXON M		PFR/SWP/P(79)61;PFR/ACSCM/P(79)66;FRD/TN(79)358	NPC	PFR	Temperature, Baffle	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21634	PFR ABOVE-CORE TEMPERATURE FLUCTUATIONS MEASUREMENT OF THERMAL STRIPING PREDICTION PARAMETERS AND REACTOR/RIG COMPARISON	SPANTON JH	1980	ND-M-1009(R);PFR/SWP/P(79)66	UKAEA	PFR	Above Core, Temperature, Thermal Striping	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21636	A REVIEW OF TEMPERATURE LIMITS FOR TWO CIRCUIT OPERATION OF PFR	EVANS AD;BROADLEY D	1980	PFR/SWP/P(80)17;PFR/LFF/P(85)44	NPC	PFR	Temperature Limits, Two Circuit	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21637	FRACTURE MECHANICS RE-ASSESSMENT OF THE ANTIVIBRATION GRID SUPPORT TUBE ATTACHMENT	GREEN D	1980	PFR/SWP/P(80)18;FRD/TN(80)383	NPC	PFR	Fracture Mechanics, Antivibration, Grid, Support Tube	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21639	PFR IHX LEAKAGE TESTS APRIL AND MAY 1980	GALLIE P	1980	PFR/SWP/P(80)30	N/A	PFR	IHX, Leakage	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21640	PFR REACTOR JACKET - IHX LEAKAGE TEST	PURSLOW B	1980	PFR/SWP/P(80)44;FRD/TN(80)404	NPC	PFR	Reactor Jacket, IHX, Leakage	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21641	THERMAL FATIGUE ENDURANCE ASSESSMENT OF PFR-IHX POD-JACKET WELD	BELL RT;CORNWALL WS;LINNING DL	1980	PFR/SWP/P(80)45	CTS	PFR	Thermal Fatigue, Endurance, IHX, Pod Jacket Weld	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21642	NON-LINEAR STRESS ANALYSIS WITH KINEMATIC HARDENING OF THE ATTACHMENT OF THE ABOVE CORE STRUCTURE SUPPORT TUBE TO THE ROTATING SHIELD BAFFLE	GREEN D	1980	PFR/SWP/P(80)47;FRD/TN(80)406	NPC	PFR	Non-Linear, Stress, Kinematic Hardening, ACS, Baffle	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21655	RECOMMENDED LIFE LIMITS FOR ABSORBER RODS AND GUIDE TUBES IN PFR RINGS 4 AND 10	LIGHTOWLERS RJ	1986	PFR/SWP/ESC/P(86)31;PFR/TC/P(86)84	EDPO	PFR	Absorber Rods, Guide Tubes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
21698	MEASUREMENTS AND ESTIMATES OF SHOULDER BOW FOR FLOW METER LOCATION TUBES AND ASSOCIATED GUIDE TUBES	LILLEY RJ	1987	PFR/SWP/ESC/P(87)38;DFMC/P(87)81	DNDPE	PFR	Shoulder Bow, Flow Meter, Location Tubes, Guide Tubes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
21756	FATIGUE LIFE OF THE PFR IHX INLET/OUTLEY DUCT FLANGE	MICHIE D;	1988	RTS/TAD/P(88)1766;SIC/260/P(88)15;PFR/TC/P(88)277	TAD	PFR	Fatigue, IHX, Inlet/Outlet Duct, Flange	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21803	MANAGEMENT OF THE PRIMARY SODIUM PUMP SUPPER BEARING LUBRICATING OIL SYSTEMS	SHIPLEY DF;	1992	PE1/3716;1059;	PFR	PFR	Primary Sodium Pump, Upper Bearing, Lubricating Oil	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21921	RUNNING ON WITH EXPOSED FUEL FAILURES IN PFR	LENNOX TA	1984	PFR/SWP/P(84)39;OETD TEC NOTE NO 891	DNE	PFR	Exposed, Fuel Failure	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
21929	A SUMMARY OF THE POSITION ON THE ASSESSMENT OF POTENTIAL THERMAL STRIPING TO THE BOTTOM TUBEPLATE OF THE PFR IHX DURING SINGLE CIRCUIT OPERATION	BROADLEY D	1984	PFR/SWP/P(84)47;FRD/TN(84)702	NNC	PFR	Thermal Striping, Tubeplate, IHX, Single Circuit	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
21947	INTRODUCTION OF MK111G 11TH AND 111J GUIDE TUBES	BROWNE JJ	1986	PFR/SWP/ESC/P(86)8	NPDO	PFR	MK111G, MK111J, Guide Tubes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
21962	RECOMMENDED LIFE LIMITS FOR PFR ABSORBER RODS AND GUIDE TUBES BASED ON THE MATERIAL 54 SWELLING RULE	LIGHTOWLERS RJ	1988	PFR/SWP/ESC/P(88)4;FRDCC/CFWG/P(88)7;PFR/TC/P(88)234	EDPO	PFR	Absorber Rods, Guide Tubes, Swelling	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience

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21997	OPERATIONAL LIFE OF PFR MK111 C CONTROL ROD PINS	KELLY BT	1989	NRL-M-2149(S);PFR/SWP/ESC/P(89)22;FRASG/P(89)236	UKAEA	PFR	Operational, MK111 Control Rod, Pins	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
22022	REVIEW OF ABSORBER ROD EXERCISING RESULTS FROM RUNS 8 TO 11 (INCL) AND PROPOSALS FOR RUN 12	HENDERSON JDC;MELHUISH KR	1986	PFR/SWP/P(86)34	N/A	PFR	Absorber Rod, Run 8 9 10 11 12	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
22036	RATIONALISATION OF OPERATING RULES CONCERNING IHX OUTLET TEMPERATURES	HENDERSON JDC;McCRINDLE D	1986	PFR/SWP/P(86)49	N/A	PFR	Operating Rules, IHX, Outlet Temperatures	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
22046	A SAFETY SUMMARY FOR ACSNI	HENDERSON JDC	1985	PFR/SWP/P(85)28	N/A	PFR	Safety, ACSNI	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
22051	PFR OPERATING LIMITS WITH FAILED FUEL	GREGORY CV	1985	PFR/SWP/P(85)33	N/A	PFR	Operating Limits, Failed Fuel	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
22055	A PROPOSED ALARM LEVEL FOR THE BULK IHX DN SIGNAL FROM A DMSA IN THE PFR CORE	GREGORY CV		PFR/SWP/P(85)37	N/A	PFR	Alarm Level, IHX, DMSA	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
22057	PROPOSED ABSORBER ROD EXERCISING DURING RUN 10	MELHUISH KR	1985	PFR/SWP/P(85)40	N/A	PFR	Absorber Rod, Run 10	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
22065	PFR ABSORBER ROD EXERCISING A STATUS REPORT FROM THE WORKING GROUP	LORD DJ;HENDERSON JDC	1987	PFR/SWP/P(87)7	N/A	PFR	Absorber Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
22090	PFR ABSORBER ROD EXERCISING A FINAL REPORT FROM THE WORKING GROUP	LORD D;HENDERSON JDC	1988	PFR/SWP/P(88)1	N/A	PFR	Absorber Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
22092	ROD EXERCISING - RUNS 15 AND 16A	HENDERSON JDC	1988	PFR/SWP/P(88)3	N/A	PFR	Rod, Run 15 16A	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
22246	INSPECTION OF PRIMARY PUMP VALVE NO 3 FILTERS	SANDISON A;	1992	PE1/3790;PFR TECH NOTE 1070;	PFR	PFR	Primary Pump Valve	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
22247	PROPOSAL FOR IRRADIATION OF PFR PUMP OIL SAMPLES IN CONJUNCTION WITH SODIUM AT TEMPERATURE IN THE IFC	HIGGINSON PR;	1992	PE1/3785;IPSC/P(92)10;	AEA	PFR	Irradiation, Pump Oil, Sodium, IFC	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
22248	PROPOSALS TO STUDY THE COMBINED EFFECT OF RADIATION AND TEMPERATURE ON THE DEGRADATION OF OIL	BURNAY SG;	1992	PE1/3784;AEMD/P1026;	InTec	PFR	Radiation, Temperature, Degradation, Oil	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
22418	REVIEW OF PFR SAFETY AT AUGUST 1989	WASHINGTON ABG	1989	PFR/SWP/P(89)9	NPC	PFR	Safety	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
22434	EVALUATE THE REACTIVITY WORTH OF REMOVING TWO CONTROL RODS	HENDERSON JDC	1989	PFR/SWP/P(89)27	N/A	PFR	Reactivity, Worth, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
22435	SHORT-TERM CONCESSION ON OPERATING DIRECTIVE ON SHUTDOWN MARGIN	HENDERSON JDC	1989	PFR/SWP/P(89)28	N/A	PFR	Operating, Shutdown, Margin	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
22452	PFR SAFETY WORKING PARTY STRENGTH OF THE PFR/IHX	TOMINS B	1988	PFR/SWP/P(88)39	N/A	PFR	Safety, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
22471	EVIDENCE OF SEVERE OVERHEATING DURING THE PFR SUPERHEATER 2 EVENT	LINEKAR GAB;FRASER AS;YATES G	1990	PFR/SW/P(90)21	DNE	PFR	Overheating, Superheater 2	This report is a key reference associated with Steam Generators and Crack Growth and Leak-Before-Break	Operation Experience associated with Steam Generators and Crack Growth and Leak-Before-Break. Also information associated with High Temperatures caused by the Under-Sodium Steam Leak is presented. Potentially unrepeatable experiments, analysis and
22472	ARK CALCULATIONS TO ESTABLISH THE EFFECTS OF MULTIPLE TUBE RUPTURE INCIDENTS ON THE IHX PRESSURE IN THE PFR CIRCUIT	WRIGHT PJ	1989	PFR/SWP/P(90)23;PFR/SGSG/P(90)68	AEA	PFR	ARK Calculations, Tube Rupture, IHX Pressure	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
22478	RE-EVALUATION OF THE PFR SUPERHEATER 2 EVENT AND ITS IMPLICATIONS IN THE LIGHT OF RESULTS FROM THE FOLLOW-UP DEVELOPMENT PROGRAMME	TOMKINS B	1990	PFR/SWP/P(90)30	DNE	PFR	Overheating, Superheater 2	This report is a key reference associated with Steam Generators and the Escalation of an Under-Sodium Leak in a Steam Generator	Operation Experience associated with Steam Generators and the Escalation of an Under-Sodium Leak in a Steam Generator. Potentially unrepeatable experiments, analysis and experience
22493	THE SAFETY CASE FOR THE PFR CORE SUPPORT STRUCTURE	TOMKINS B		PFR/SWP/P(90)42	N/A	PFR	Safety, Core Support	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
22493	THE SAFETY CASE FOR THE PFR CORE SUPPORT STRUCTURE	TOMKINS B		PFR/SWP/P(90)42	N/A	PFR	Safety, Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Safety Assessment of the PFR following a potential failure of Core Supports.
22494	COMMENTS ON INSPECTION SUPPLEMENTARY SUPPORT AND MONITORING	HENDERSON JDC	1990	PFR/SWP/P(90)43	N/A	PFR	Inspection, Support, Monitoring	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
23047	ASSESSMENT OF PRIMARY SODIUM PUMP UPPER BEARING LUBRICATION OIL SYSTEM AND PUMP TANK COVER GAS MODIFICATION	SHIPLEY DF	1992	PE2/5400;PFR/TN/N1074	PFR	PFR	Primary Sodium Pump, Upper Bearing, Lubricating Oil	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
23048	LEAK DETECTIONS AND DECONTAMINATION PROCESS OF IHX'S	SCHINDLER P	1991	PE4/5354;SCC/LGVE/91-16	CEA	PFR	Leak Detection, Decontamination, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
23067	ABSORBER ROD EXERCISING PLANS	HENDERSON JDC	1988	PFR/SWP/P(88)22	N/A	PFR	Absorber Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
23069	DESIGN OF THE PFR MK6 GUIDE TUBE	BROWNE JJ	1986	PFR/SWP/ESC/P(86)11	NPDO	PFR	MK6, Guide Tube	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
23163	THE DEFECT TOLERANCE OF PFR IHX	PICKER C;GREEN D;	1992	PE1/4906;PFR/SIAG/P(92)99;	AEA	PFR	Defect, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
23164	THE CALCULATION OF CRITICAL CRACK LENGTH OF THE PFR IHX SHELL	GREEN D;	1992	PFR/SIAG/P(92)101;PE1/4907;	AEA	PFR	Critical Crack Length, IHX, Shell	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
23166	ASSESSMENT OF CARBURIZATION FOLLOWING AN OIL LEAK IN THE PFR PRIMARY CIRCUIT	THORLEY AW;SKELDON P;PICKER C;HAMER AN;	1992	PFR/SIAG/P(92)118;PE1/4905;PR/MWG/P(92)814;MSD/26/0031;PE1/5684;	AEA	PFR	Carburization, Oil Leak, Primary Circuit	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience

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23179	PROJECT INSTRUCTION OR PFR PRIMARY SODIUM PUMP NO 2 WORK FOR AEA TECHNOLOGY	MADDOCKS CD	1992	C8583/PI	NNC	PFR	Primary Sodium Pump	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
23203	THE PFR PRIMARY SODIUM PUMP OIL MANAGEMENT SYSTEM, HISTORY AND STRATEGY FOR THE FUTURE	SHIPLEY D F	1992	PE1/4962;UN 150 810 R	AEA	PFR	Primary Sodium Pump	This report is a key reference associated with Pumps	Full History and overview of PFR Sodium Pump
23398	THE PFR PRIMARY SODIUM PUMP OIL MANAGEMENT SYSTEM HISTORY AND STRATEGY FOR THE FUTURE	SHIPLEY DF	1992	PE1/5555;UN 150810R	N/A	PFR	Primary Sodium Pump	This report is a key reference associated with Pumps	Full History and overview of PFR Sodium Pump
23527	EXAMINATION OF PRIMARY PUMP VALVE FILTERS AFTER REMOVAL FROM PFR	MCKIDDIE R;MUNRO B;PUNNI JS;GOWER SM;HIGGINSON PR;	1992	PE1/5924;UN150906R;pe15969	AEA	PFR	Primary Pump, Valve, Filters, Removal	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
23569	THE SAFETY CASE FOR THE PFR IHX DEFECT TOLERANCE AND THE RESPONSE TO ITS PEER REVIEW	HERRICK AR;	1992	PE1/6085;RS/SWP/P(92)43;PE1/6378	AEA	PFR	Safety, IHX, Defect	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
23661	ASSESSMENT OF THE INITIAL SIGNALS FORM THE PFR MARK 4 BPD LOCATION LOOP	CATWRIGHT DK;POVEY V	1983	ND-M-1845	UKAEA	PFR	Signals, Mark 4, BPD, Location Loop	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
23662	A COMPARISON OF THE PREDICTED PERFORMANCE OF THE PFR DELAYED AND FISSION GAS LOCATION SYSTEMS	CARTWRIGHT DK;DIGGLE WR		TRG-M-6934	UKAEA	PFR	Delayed, Fission, Gas Location	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
23739	PEER REVIEW OF UN150810R THE PFR PRIMARY SODIUM PUMP OIL MANAGEMENT SYSTEM, HISTORY AND STRATEGY FOR THE FUTURE	GREGORY CV;	1992	SDG/S079999/92;	AEA	PFR	UN150810R, Primary Sodium Pump, Oil,	This report is a key reference associated with Pumps	Review of PFR equipment including history of sodium pump and future strategy
23818	BURS TEST ON THE FILTER MESH USED IN THE PRIMARY PUMP VALVE	WALTON A;COLLINSON AE;	1992	FMD/D(92)112;PE1/6678;	N/A	PFR	Filter Mesh, Primary Pump, Valve	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
23894	BURST TEST ON THE FILTER MESH USED IN THE PRIMARY PUMP VALVE	WALTON A;COLLINSON AE;	1992	PE1/6891;PE1/6863;UN150955R;	AEA	PFR	Filter Mesh, Primary Pump, Valve	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
23895	OBSERVATIONS ON THE DEPOSITS FOUND ON THE CLADDING SURFACE OF PINS FROM SUB ASSEMBLIES MAG SNF DKR (IN SUPPORT OF THE OIL INGRESS SAFETY CASE	GREGORY CV;	1992	PE1/6890;UN 151025N;PE1/6862;	AEA	PFR	Deposits, Cladding, Pins, Sub assemblies, Oil ingress, Safety	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
23915	THE DEFECT TOLERANCE OF THE PFR IHXS	HENDERSON JDC;PICKERC;	1992	PE1/4900;RS/SWP/P(92)22;	AEA	PFR	Defect, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
23941	REPLACEMENT FILTERS PRIMARY PUMP VALVES PFR	WARD T;	1992	AEAE/TN(92)562;PE1/6958;PE1/6996;	AEAE	PFR	Filters, Primary Pump, Valves	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
24108	THE PROTOTYPE FAST REACTOR FAILED FUEL PIN DETECTION SYSTEMS	MASON L;TREVILLION EA	1987	ND-M-3477	UKAEA	PFR	Failed, Fuel Pin, Detection	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
24249	OPERATIONAL MOVEMENTS OF PFR BORON CARBIDE CONTROL RODS 1979 - 1980	MOTTERSHEAD D	1982	ND-M-1835	UKAEA	PFR	Operational, Boron Carbide, Control Rods	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
24251	OPERATIONAL MOVEMENTS OF PFR BORON CARBIDE CONTROL RODS 1974-1978	MOTTERSHEAD D	1980	ND-M-1070	UKAEA	PFR	Operational, Boron Carbide, Control Rods	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
24463	CONSIDERATION OF AXIAL AND CIRCUMFERENTIAL SURFACE DEFECTS IN THE PFR/IHX SHELL	GREEN D;GREEN VR	1993	PFR/SIAG/P(93)149	AEA	PFR	Axial, Circumferential Surface Defects, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
24464	THE PROPOSED ABSORBER ROD EXERCISING PROGRAMME FOR RUN 29	WASHINGTON A	1993	RS/SWP/(93)2	PFR	PFR	Absorber Rod, Run 29	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
24465	FOLLOW UP ITEMS CONCERNING THE SAFETY CASES FOR THE PFR IHX'S AND SECONDARY SODIUM CIRCUITS	HENDERSON JDC	1993	PE1/7568;DNSC/P(93)166	AEA	PFR	Safety, IHX, Secondary Sodium Circuit	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
24467	EXPERIMENT TO INVESTIGATE NOISE IN PFR EVAPORATORS 1&2 AT HIGH PUMP SPEED (SAPEX 627)	HENDERSON JDC	1993	RS/SWP/P(93)8;PE1/7531;PE1/7730	PFR	PFR	Noise, Evaporators, Pump Speed	This report is a key reference associated with Steam Generators and the Rattling Tubes and Tie-Rods	Operation Experience associated with Steam Generators and the Rattling Tubes and Tie-Rods. Potentially unrepeatable experiments, analysis and experience
24657	BORCON (V5B) CONTROL ROD PIN MODEL CALCULATIONS FOR THE PFR MK111 F DESIGN	KELLY BT	1989	NRL-M-2039;CFWG/FPSG/P(89)8	UKAEA	PFR	BORCON, Control Rod, Pin Model, MK111 Design	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
24659	COMPARISON OF BORCON VERSION V5A WITH POST-IRRADIATION EXAMINATION OF PFR CONTROL RODS SEG AND DKA	KELLY BT	1989	NRL-M-2035	UKAEA	PFR	BORCON, Post-Irradiation, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
24660	RECOMMENDED LIFE LIMITS FOR PFR SHUT OFF RODS BASED ON BORCON PREDICTIONS OF ABSORBER STACK BEHAVIOUR	OAKDEN MM	1989	NRL-M-2134;FRDC/FRASG/P(89)235;FRDCC/FEWP/P(89)21;PFR/ESC/P(89)25	UKAEA	PFR	Life Limits, Shut off rods, BORCON, Absorber Stack	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
24699	FLUIDIC BPD SYSTEM FOR FAST REACTORS SINGLE-STAGE TESTS AND CIRCUIT ANALYSIS	TIPPETTS JR		HIC 288	University of Sheffield	PFR	Fluidic, BPD, Single State	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
24734	STRESS ANALYSIS OF A SECTION OF THE PFR REACTOR JACKET INCLUDING AN IHX POD PHASE 2 REPORT ISSUE A	ATKINE RESEARCH & DEVELOPMENT	1980	AAD/R27.10.80	Atkins	PFR	Stress, Reactor Jacket, IHX Pod,	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
24737	STRESS ANALYSIS OF A SECTION OF THE PFR REACTOR JACKET INCLUDING AN IHX POD PHASE 3 REPORT	ATKINE RESEARCH & DEVELOPMENT	1981	AAD/R10.12.81	Atkins	PFR	Stress, Reactor Jacket, IHX Pod,	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
24754	STRESS ANALYSIS OF A SECTION OF THE PFR REACTOR JACKET INCLUDING AN IHX POD	ATKINE RESEARCH & DEVELOPMENT		AAD/R9.11.77	Atkins	PFR	Stress, Reactor Jacket, IHX Pod,	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
24758	DRAFT THE MANAGEMENT FOR ANALYSIS OF COMPLEX REACTOR COMPONENTS	ATKINE RESEARCH & DEVELOPMENT;PLATT R			Atkins	PFR	Complex, Reactor, Components	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
24891	A REVIEW OF THE REQUIREMENTS OF THE PFR REPLACEMENT IHX STRUCTURAL INTEGRITY ACTIVITIES	GREEN D	1984	TN/P(84)672	NNC	PFR	IHX, Structural Integrity	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
24974	DESIGN SUBSTANTIATION REPORT PROTOTYPE FAST BREEDER DOUNREAY SPARE INTERMEDIATE HEAT EXCHANGER	LOMAS S;MITCHELL CH;ROYDEN R;DEARDE G;GREEN D	1985	FRD224/DSR/001	NNC	PFR	Spare, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience

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25135	REVISED DAMAGE ASSESSMENT CURVES FOR PFR TOP STRAKE	HOOTON DG		PFR/SWP/P(78)27;TN/P(78)243	NPC	PFR	Damage, Curves, Top Strake	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25137	METHODS FOR ASSESSMENT OF DAMAGE TO THE ABOVE CORE STRUCTURE BAFFLE ATTACHMENTS	DIXON M		PFR/SWP/P(79)45;PFR/ACSCM/P(79)65;TN/P(79)352	NPC	PFR	Damage, ACS, Baffle	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
25138	DAMAGE ASSESSMENT OF THE PFR ANTIVIBRATION GRID SUPPORT TUBE ATTACHMENT BASED ON CRACK GROWTH CONSIDERATIONS	GREEN D	1981	TN/P(81)437;PFR/SWP/P(81)10	NPC	PFR	Damage, Antivibration, Grid Support, Crack Growth	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
25153	THE PRESSURE STRENGTH OF THE SECONDARY CIRCUIT BELLOWS UNITS IN THE PFR IHX ASSEMBLIES	FOLEY J		PFR/SWP/P(83)20	N/A	PFR	Pressure, Secondary Circuit, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
25165	EXTRACTS FROM THE PFR DESIGN SAFETY REPORT FOR THE DIAGRID, FUEL ELEMENT CARRIERS AND CORE SUPPORT STRUCTURE			PFR/LLF/P(85)6	N/A	PFR	Safety, Diagrid, Fuel Element Carrier, Core Support	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
25165	EXTRACTS FROM THE PFR DESIGN SAFETY REPORT FOR THE DIAGRID, FUEL ELEMENT CARRIERS AND CORE SUPPORT STRUCTURE			PFR/LLF/P(85)6	N/A	PFR	Safety, Diagrid, Fuel Element Carrier, Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Safety Assessment of the PFR following a potential failure of Core Supports.
25177	RATE OF DAMAGE ACCUMULATION IN PFR IHX PODS DURING 2 AND 1 CIRCUIT OPERATION	ROSE RT	1981	PFR/LLF/P(85)38;PFR/SWP/P(81)33	NPC	PFR	Accumulation. IHX Pods	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
25178	EXTRACTS FROM THE PFR DESIGN SAFETY REPORT RELEVANT TO LAMELLAR TEARS IN THE ROOF STRUCTURE			PFR/LLF/P(85)35	N/A	PFR	Safety, Lamellar Tears, Roof	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25181	THE PRESSURE STRENGTH OF THE SECONDARY CIRCUIT BELLOWS UNITS IN THE PFR IHX ASSEMBLIES	FOLEY J		PFR/LLF/P(85)23;PFR/SWP/P(83)20	N/A	PFR	Pressure, Secondary Circuit, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
25182	THE EFFECT OF PRESSURE PULSES ON THE INTEGRITY OF PARTIAL PENETRATION WELDS IN THE PFR IHX OUTER SHELL	BUCHTHORPE DE	1983	PFR/LLF/P(85)22;PFR/SWP/P(83)10;TN/P(83)588;	NNC	PFR	Pressure, Integrity, Partial Penetration Weds, IHX Outer Shells	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
25189	AN APPROXIMATE METHOD FOR ASSESSING SECONDARY CIRCUIT START UP CYCLIC DAMAGE TO THE PFR IHX TUBEPLATE	GREEN D	1982	PFR/LLF/P(85)19;PFR/SWP/P(82)14;TN/P(82)502;	NNC	PFR	Approximate Method, Secondary Circuit, Cyclic Damage, Start-Up, IHX Tube Plate	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
25197	DESIGN SUBSTANTIATION REPORT PROTOTYPE FAST BREEDER DOUNREAY SPARE INTERMEDIATE HEAT EXCHANGER STRUCTURAL INTEGRITY ASSESSMENT OF THE THERMAL SYPHON COIL AND SUPPORT BRACKETS	GREEN D	1985	PFR/LLF/P(85)25;FRD/224/DSR/013	NNC	PFR	Spare, IHX, Structural Integrity, Thermal Syphon Coil, Support Brackets	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
25202	DESIGN SUBSTANTIATION REPORT PROTOTYPE FAST BREEDER DOUNREAY SPARE INTERMEDIATE HEAT EXCHANGER STRUCTURAL INTEGRITY ASSESSMENT OF THE THERMAL SYPHON SLEEVE	GREEN D	1985	PFR/LLF/P(85)26;FRD/224/DSR/014	NNC	PFR	Spare, IHX, Structural Integrity, Thermal Syphon, Sleeve	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
25218	WRAPPER DILATION AND LEANING POST BOLTS	DODD JA		PFR/LLF/P(85)33	RRDO	PFR	Wrapper, Dilation, Leaning Post	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
25236	DISTORTION OF THE PFR DIAGRID SUPPORT STRUCTURE FOLLOWING POSTULATED FAILURE OF THE SUPPORT STRAPS	JUDGE RCB	1989	SIC/220/P(88)17;PFR/LLF/P(88)79	UKAEA	PFR	Diagrid, Support, Structure, Straps	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
25252	AN UPDATE OF THE INCREDIBILITY OF FAILURE ARGUMENT FRO THE PFR CORE SUPPORT STRUCTURE	PICKER C	1990	PFR/SWP/P(90)49	PFR	PFR	Failure, Core Support, Structure	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
25252	AN UPDATE OF THE INCREDIBILITY OF FAILURE ARGUMENT FRO THE PFR CORE SUPPORT STRUCTURE	PICKER C	1990	PFR/SWP/P(90)49	PFR	PFR	Failure, Core Support, Structure	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Safety Assessment of the PFR following a potential failure of Core Supports.
25283	PFR SECONDARY PUMP POST-TRIP RUNDOWN CHARACTERISTICS	BUTTERFIED MH;WOFFINDEN J	1980	CFR/CDWG/P(80)82	N/A	PFR	Secondary Pump, Trip, Rundown	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25285	PFR SECONDARY SODIUM PUMP RUNDOWN CHARACTERISTICS FURTHER COMPARISON WITH INCIDENT RECORDER DATA	BUTTERFIED MH	1982	CFR/CDWG/P(82)84	N/A	PFR	Secondary Pump, Sodium, Rundown, Incident Recorder	This report is a key reference associated with Pumps	Comparison of predicted behaviour with operational experience of Sodium Pumps
25361	FAILURE MODES OF THE PFR LEAK JACKET FOLLOWING A SODIUM LEAK FROM THE PRIMARY TANK	GREEN D	1987	SIC/226/P(87)12;TAD/RTS/P(87)1703;PFR/LLF/P(87)70;	NPC	PFR	Failure, Leak Jacket, Sodium Leak, Primary Tank	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25362	STRUCTURAL ASSESSMENT OF THE PFR LEANING POST TO SUBASSEMBLY CARRIER BOLTS	MICHIE D	1987	SIC/220/P(87)1;TPSD/P(87)1538	UKAEA	PFR	Structural, Leaning, Subassembly	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
25428	EMPA EXAMINATION OF FILTER MESH SAMPLES FROM PRIMARY PUMP VALVES AND FUEL/BREEDER SUB-ASSEMBLIES	PUNNI JS	1993	FMPM/P(93)6;CFWG/P(93)11;PE4/7706	AEA	PFR	EMPA, Filter Mesh, Primary Pump, Valves, Fuel, Breeder, Sub assemblies	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25452	TUBE EXCITATION BY JOGGLE-GAP FLOW IN PFR EVAPORATORS	COLLINSON AE	1992	FMD/D(92)104	N/A	PFR	Tube Excitation, Joggle-Gap, Flow, Evaporators	This report is a key reference associated with Steam Generators and the Rattling Tubes and Tie-Rods	Operation Experience associated with Steam Generators and the Rattling Tubes and Tie-Rods. Potentially unrepeatable experiments, analysis and experience
25453	ANALYSIS AND INTERPRETATION OF A ACOUSTIC SIGNALS ROM PFR CELL 2 EVAPORATOR FEBRUARY/APRIL 1992	ROWLEY R;RICHARDSON K;COLLINSON AE	1992	PFR/TN 1083	N/A	PFR	Acoustic, Cell, Evaporator	This report is a key reference associated with Steam Generators and the Rattling Tubes and Tie-Rods	Operation Experience associated with Steam Generators and the Rattling Tubes and Tie-Rods. Potentially unrepeatable experiments, analysis and experience
25471	LEAK BEFORE BREAK IN EVAPORATOR TUBE/TUBEPLATE WELD FAILURE	BUTLER KJ;BELL AC		PFR/SWP/P(81)55	N/A	PFR	Leak Before Break, Evaporator, Tube, Tubeplate	This report is a key reference associated with Steam Generators and Crack Growth and Leak-Before-Break	Operation Experience associated with Steam Generators and Crack Growth and Leak-Before-Break. Potentially unrepeatable experiments, analysis and experience
25474	THERMAL FATIGUE CRACK ARREST IN THE PFR ABOVE CORE STRUCTURE	PEARCE JHB		DCWG/P(82)333;ACSCM/P(76)6	N/A	PFR	Thermal Fatigue, Crack, ACS	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
25476	BOUNDARY LAYER ATTENUATION OF SODIUM TEMPERATURE FLUCTUATION NEAR THE BOTTOM OF THE CONTROL ROD GUIDE TUBES	BELL RT		DCWG/P(82)337;CFR/EST/P291;CFR/THWG/P(75)114	N/A	PFR	Attenuation, Sodium, Control Rod, Guide Tubes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
25476	BOUNDARY LAYER ATTENUATION OF SODIUM TEMPERATURE FLUCTUATION NEAR THE BOTTOM OF THE CONTROL ROD GUIDE TUBES	BELL RT		DCWG/P(82)337;CFR/EST/P291;CFR/THWG/P(75)114	N/A	PFR	Attenuation, Sodium, Control Rod, Guide Tubes	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
25477	INVESTIGATION OF A PFR SHROUD TUBE UNDER THERMAL SHOCK AND THERMAL STRIPING CONDITIONS	PEARCE JHB		DCWG/P(82)338;ACSCM/P(78)40	N/A	PFR	Shroud, Thermal Shock, Thermal Striping	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
25479	AMELIORATION OF THERMAL STRIPING DAMAGE IN PFR SHROUD TUBES DUE TO INCOMPLETE SPATIAL COHERENCE	LILLER AG		ND-M-554;ACSCM/P(78)51	UKAEA	PFR	Amelioration, Thermal Striping, Shroud Tubes, Spatial Coherence	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience

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25490	SPECIFICATION FOR PROTOTYPE CONTROL ROD MECHANISM			UKAEA (EG)47045A	UKAEA	PFR	Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25491	SPECIFICATION OR THE CONTROL ROD MECHANISMS			UKAEA (EG)47053A	UKAEA	PFR	Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25492	SPECIFICATION OR THE OSCILLATOR AND SECONDARY SHUT DOWN MECHANISM			UKAEA (RG)47060A	UKAEA	PFR	Oscillator, Secondary Shut Down	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25493	SPECIFICATION FOR MAGNET AND WEIGHT SENSING DEVICE FOR CONTROL ROD MECHANISM			UKAEA (EG)14917	UKAEA	PFR	Magnet, Weight Sensing, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25495	THE PFR PROTOTYPE MAGNET TESTS (ENGLISH ELEC WHETSTONE REPORT)	SAAGI R		W/AT 1632;	English Electric Company	PFR	Magnet Tests	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25520	THE PROPOSED ABSORBER ROD EXERCISING FOR RUN 29	WASHINGTON A	1993	RS/SWP/P(93)2;PE1/7732	PFR	PFR	Absorber Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25704	EXPLORATORY STUDY OF POSSIBLE EFFECTS ON CIRCUMFERENTIAL TEMPERATURE VARIATION ON THE PFR PRIMARY VESSEL TOP STRAKE	OSE RT		PFR/SWP/P(77)24	NPC	PFR	Circumferential Temperature, Primary Vessel, Top Strake	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25705	PFR PRIMARY TANK TOP STRAKE DAMAGE COMPARISON OF TANK DAMAGE IN THE AVERAGE OF THE WORST 3 SECTORS WITH THE WORST SECTOR	BROOMFIELD AM;HICKS JL		PFR/SWP/P(77)3	NPC	PFR	Primary Tank, Top Strake, Tank Damage, Sectors	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25706	A SAFETY CASE FOR THE CONTINUED OPERATION OF PFR IN VIEW OF THE PRIMARY TANK TOP STRAKE TEMPERATURE GRADIENT (PLUS NOTES AND CALCULATIONS)	BROADLEY D;ROSE RT		PFRSWP/P976)17;PFR/TF/P(76)128	NPC	PFR	Safety, Primary Tank, Top Strake, Temperature Gradient	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25801	PFR PRIMARY VESSEL TOP STRAKE CHANGES IN THERMAL CHARACTERISTICS	HUMPHRIES J;DURSTON JG		TN/P(77)221;PFR/OPS/N473	NPC	PFR	Primary Vessel, Top Strake, Thermal Characteristics	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25802	A REVIEW OF PFR TOP STRAKE DAMAGE ASSESSMENT NOVEMBER 1977	HOOTON DG;ROSE RT		PFR/SWP/P(77)70	NPC	PFR	Top Strake, Damage	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25808	REVISED DAMAGE ASSESSMENT CURVES FOR PFR TOP STRAKE	HOOTON DG		PFR/SWP/P(78)27;TN/P(78)243	NPC	PFR	Damage, Curves, Top Strake	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25809	PFR PRIMARY VESSEL TOP STRAKE TELL TALE REFERENCE READINGS	HOOTON DG		PFR/SWP/P(77)34	NPC	PFR	Primary Vessel, Top Strake	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25810	ADDITIONAL RESULTS TO THE RE ANALYSIS OF THE CRITICAL DEFECT SIZE AND CRACK GROWTH RATE OF THE PFR SUPERHEATER TUBEPLATE	GREEN D	1980	PFR/SWP/P(80)7;TN/P(80)367	NPC	PFR	Defect, Crack, Growth Rate, Superheater, Tubeplate	This report is a key reference associated with Steam Generators and the Safety Case for Operating Superheater 2 in its Cracked State	Operation Experience associated with Steam Generators and the Safety Case for Operating Superheater 2 in its Cracked State. Potentially unrepeatable experiments, analysis and experience
25811	THERMAL ANALYSIS OF SUPERHEATER NUMBER 2 TUBEPLATE DURING A TRIP TRANSIENT	DIXON M	1980	PFR/SWP/P(80)7;TN/P(80)367	NPC	PFR	Thermal Analysis, Superheater, Tubeplate, Trip, Transient	This report is a key reference associated with Steam Generators and the Safety Case for Operating Superheater 2 in its Cracked State	Operation Experience associated with Steam Generators and the Safety Case for Operating Superheater 2 in its Cracked State. Potentially unrepeatable experiments, analysis and experience
25833	A REPEAT INSPECTION OF THE DAMAGED REGION OF THE INNER TOROID OF PFR SUPERHEATER 2 NOVEMBER 1979	BIRCHALL PD;HUDGELL RJ;HALE JC;SARGENT TH	1980	FRDC/MWP/P(80)1266;FRDC/MWP/FIXSG/P(80)169;ND-M-1252	UKAEA	PFR	Damaged, Toroid, Superheater	This report is a key reference associated with Steam Generators and the Superheater 2 Tubeplate Cracks	Operation Experience associated with Steam Generators and the Superheater 2 Tubeplate Cracks. Potentially unrepeatable experiments, analysis and experience
25858	A REVISED METHOD FOR PFR PV TOP STRAKE DAMAGE ASSESSMENT	BROADLEY D;DURSTON JG;HOOTON DG		PFR/SWP/P(78)4;TN/P(78)227	NPC	PFR	Top Strake, Damage	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25860	FAILURE OF ANTI VIBRATION GRID SUPPORTS PFR SAFETY IMPLICATIONS	WEBB J		NRD/R(78)62	NPDO	PFR	Anti Vibration, Grid, Safety	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
25863	PROBABILITY OF SHUTDOWN FAILURE DUE TO ABSORBER ROD BOWING IN THE PROTOTYPE FAST REACTOR	HOLLOWAY NJ	1984	NJH 84/12	N/A	PFR	Shutdown Failure, Absorber Rod, Bowing	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
25863	PROBABILITY OF SHUTDOWN FAILURE DUE TO ABSORBER ROD BOWING IN THE PROTOTYPE FAST REACTOR	HOLLOWAY NJ	1984	NJH 84/12	N/A	PFR	Shutdown Failure, Absorber Rod, Bowing	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25871	PRELIMINARY THOUGHTS ON PFR ROD FAILURES DUE TO CHANGE IN GEOMETRY	HOLLOWAY NJ	1984	NJH 84/5	N/A	PFR	Rod, Failure, Geometry	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
25873	PFR PRIMARY VESSEL POGO STICK READINGS	DURSTON JG	1981	PFR/SWP/P(80)61;TN/P(80)426	NPC	PFR	Primary Vessel, POGO	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25876	TOP STRAKE INSTRUMENTATION	HUMPHRIES J	1983	PFR/OPS/N727	NPC	PFR	Top Strake, Instrumentation	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25877	ADDENDUM TO PFR SAFETY REPORT PRIMARY VESSEL TOP STRAKE	DURSTON JG;ROSE RT	1981	PFR/SWP/P(81)6;TN/P(81)438	NPC	PFR	Safety, Primary Vessel, Top Strake	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25893	FUEL ELEMENT FAILURE DATA	TAYLOR AF;NUTTER NR	1981	FRDC/MWP/P(81)1353;FRDC/MWP/FIXSG/P(81)189	UKAEA	PFR	Fuel Element, Failure	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
25935	A RE ASSESSMENT OF TOP STRAKE DAMAGE ACCUMULATION PRIOR TO SODIUM LEVEL FIXING ON 11/3/76	HOOTON DG		PFR/SWP/P(78)72	NPC	PFR	Top Strake, Damage, Sodium Level	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26000	ABSROD A COMPUTER CODE FOR CALCULATING WRAPPER TEMPERATURES IN CONTROL RODS AND GUIDE TUBES IN PFR AND CFR DESCRIPTION AND USERS GUIDE	WILLIAMS BD;MCAREAVEY G	1980	ND-M-1121	UKAEA	PFR	Code, Wrapper, Temperature, Control Rods, Guide Tube	This report is a key reference associated with the Core Support Structure	Calculation Methods and Computer Code Review
26000	ABSROD A COMPUTER CODE FOR CALCULATING WRAPPER TEMPERATURES IN CONTROL RODS AND GUIDE TUBES IN PFR AND CFR DESCRIPTION AND USERS GUIDE	WILLIAMS BD;MCAREAVEY G	1980	ND-M-1121	UKAEA	PFR	ABSROD, Wrapper, Temperature, Control Rod, Guide Tubes,	This report is a key reference associated with Absorber Rods and Mechanisms	Review of Calculational Methods.
26002	PFR CONTROL AND SHUT OFF RODS (MK3) DROP TESTS IN WATER	BARRETT WI		TRG-M-5087	UKAEA	PFR	Control, Shut-Off Rods	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
26002	PFR CONTROL AND SHUT OFF RODS (MK3) DROP TESTS IN WATER	BARRETT WI		TRG-M-5087	UKAEA	PFR	Control Rod, Shut-off rod, Drop Test	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience

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26021	THE IHX OUTLET TEMPERATURE TRIP PFR	BROADLEY D		PFR/TF/P(75)90		PFR	IHX, Outlet Temperature, Trip	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
26175	THE MAGNITUDE AND MECHANISM OF DN EMISSION FROM FAST REACTOR FUEL PINS WITH PARTICULAR REFERENCE TO ENDURANCE FAILURES	CARTWRIGHT DK;DIGGLE WR	1982	FFWG/P(82)12	N/A	PFR	Magnitude, Mechanism, Emission, Fuel Pins, Endurance Failures	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26383	A PROGRAMME TO STUDY THE LOSS OF ABSORBER MATERIAL FROM FAILED PINS IN FAST REACTOR CONTROL RODS	KELLY BT		FRDC/P(78)305;FRASG/P(78)103;ND-M-235	UKAEA	PFR	Absorber, Failed Pins, Control Rods	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26387	PROGRAMME FOR THE POST IRRADIATION EXAMINATION OF PFR CONTROL ROD TET (BORON CARBIDE)	KELLY BT		FRDC/MWP/P(78)310;FRASG/P(78)110;ND-M-330	UKAEA	PFR	Post Irradiation, Control Rod, Boron Carbide	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26388	PROGRAMME FOR THE POST IRRADIATION EXAMINATION OF PFR CONTROL ROD LWG (TANTALUM)	KELLY BT		FRDC/MWP/P(78)311;FRASG/P(78)111;ND-M-328	UKAEA	PFR	Post Irradiation, Control Rod, Tantalum	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26389	EXAMINATION PROGRAMME FOR PFR IRRADIATIONS 13/01-06	KELLY BT		FRDC/MWP/P(78)312;FRASG/P(78)112;ND-M-329	UKAEA	PFR	Irradiations	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26390	BORCON CALCULATIONS OF THE LIFE OF PFR MK11 AND MK111 CONTROL ROD PINS	KELLY BT;PRSTON SD		FRDC/MWP/P(78)313;FRASG/P(78)113;ND-M-510	UKAEA	PFR	BORCON, MK11, MK111, Control Rod Pins	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26391	STORAGE AND WASTE DISPOSAL ASPECTS OF ALTERNATIVE FAST REACTOR ABSORBER MATERIALS	SIMPSON KA		FRDC/MWP/P(78)316;FRASG/P(78)116;RD/B/N4319	UKAEA	PFR	Storage, Waste, Absorber	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26400	PROPOSALS TO INCLUDE 40% ENRICHED BORON CARBIDE PINS IN MKIV PFR CONTROL RODS	KELLY BT		FRDC/MWP/P(78)327;FRASG/P(78)127;ND-M-577	UKAEA	PFR	Enriched, Boron, Carbide, Pins, MKIV, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26417	COMPUTER MODELLING OF THE PERFORMANCE OF FAST REACTOR CONTROL ROD PINS BORCON MK3	KELLY BT;HOY CJ		FRDC/MWP/P(79)1130;FRASG/P(79)153;ND-M-1053	UKAEA	PFR	Control Rod, Pins, BORCON, MK3	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26519	THE EFFECT OF TEMPERATURE ON THE ENDURANCE ASSESSMENT OF PFR ABOVE CORE STRUCTURE	PEARCE JHB		PFR/SWP/P(77)37;ACSCM/P(77)28	N/A	PFR	Temperature, Endurance Assessment, ACS	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
26520	CREEP FATIGUE DAMAGE ASSESSMENT IN PFR ABOVE CORE STRUCTURE BY THE ELASTIC ROUTE OF CODE CASE 1592	JOBSON DA;PEARCE JHB		ACSCM/P(77)36	N/A	PFR	Creep, Fatigue, ACS, Elastic Route	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
26539	PEBBLE A COMPUTER CODE TO STUDY ABSORBER ROD INTERACTION WITH GUIDE TUBES DESCRIPTION NOTE	RIDING DJ	1981	FRDC/FEWP/P(81)47;RTD/TN(81)188	RTDO	PFR	PEBBLE, Absorber Rod, Guide Tubes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
26604	FOULNESS SAFEX COMMITTEE STATIC TESTS ON 1/16TH SCALE MODEL OF THE PFR VAULT ROOF	WOOD AJ;CARTER HM		SAFEX/P68	UKAEA	PFR	SAFEX, 1/16 Scale, Vault Roof	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26661	RAISING OF SECONDARY SODIUM PUMP SPEED RESTRICTIONS (PFR SAM 467)	HENDERSON JDC	1993	PE1/7792;RS/SWP/P(93)21	PFR	PFR	Secondary Pump, Sodium, Speed Restrictions	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26662	PFR EVAPORATOR TUBE BUNDLE NOISE PROBLEMS	COLLINSON A	1993	PE1/7799;PFR/TN 1123	PFR	PFR	Evaporator, Tube, Bundle, Noise	This report is a key reference associated with Steam Generators and the Rattling Tubes and Tie-Rods	Operation Experience associated with Steam Generators and the Rattling Tubes and Tie-Rods. Potentially unrepeatable experiments, analysis and experience
26683	PFR BREEDER TRANSIT TIMES FROM CORE OUTLET TO THE ABOVE CORE STRUCTURE	WINN RW		ACSCM/P(76)9	REML	PFR	Breeder, Transit Time, Core Outlet, ACS	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26684	PFR ABOVE CORE STRUCTURE FLOW EXPERIMENTS ON A 1/5TH SCALE WATER MODEL PRELIMINARY RESULTS	WINN WR;CONROY PJ;TAYLOR AF		PFR/SWP/P(77)17;ACSCM/P(77)17	REML	PFR	ACS, Flow, 1/5 scale, water model	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
26719	DESIGN REPORT ON PFR CONTROL RODS SHUT-OFF RODS AND THE SAFETY ROD	STAMFORD S		PFR/SWP/P(71)36	AEA	PFR	Control Rod, Shut-Off Rod, Safety Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26768	ASSESSMENT OF PRIMARY SODIUM PUMP UPPER BEARING LUBRICATION OIL SYSTEM AND PUMP TANK COVER GAS MODIFICATIONS	SHIPLEY DF	1992	PFR/TN 1074;PE2/5400	PFR	PFR	Primary Pump, Sodium, Lubrication, Oil, Pump Tank, Cover Gas	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
26957	AN EXPERIMENTAL STUDY OF BUOYANCY EFFECTS AND MIXING IN A 1/17 SCALE WATER MODEL OF THE ABOVE CORE PLENUM OF PFR	BOOTH DA;POWELL WR	1982	ND-M-786	UKAEA	PFR	Buoyance, Mixing, 1/17 scale, Plenum	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
26959	PFR REPLACEMENT SUPERHEATER TUBE BUNDLES HALF SCALE AIR MODELS OF INLET/BEND AND OUTLET REGIONS PRESSURE LOSS MIXING AND FLOW DISTRIBUTION TESTS ON THE OUTLET REGION AIR MODEL FITTED WITH BUSHED TYPE TUBE SUPPORT GRIDS	LITTLE AJ	1981	RD/P/996	NNC	PFR	Superheater, Tube, Pressure Loss, Mixing, Flow, Outlet Region	This report is a key reference associated with Steam Generators and the RTB Design Tests	Operation Experience associated with Steam Generators and the RTB Design Tests. Potentially unrepeatable experiments, analysis and experience
27075	PFR IHX TOP STRESS ANALYSIS UNDER TRANSIENT THERMAL LOADING CONDITIONS	RITSON DJ;CLARK JS	1984	TN/P(84)709		PFR	IHX, Stress, Under Transient, Thermal Loading	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27124	PFR SUPERHEATER 2 LEAK	GREGORY CV	1987	AGT7(87);AGT8(87)P1	UKAEA	PFR	Superheater, Leak	This report is a key reference associated with Steam Generators and presents an account of the Superheater 2 Under-Sodium Leak Event and its consequences	Operation Experience associated with Steam Generators and presents an account of the Superheater 2 Under-Sodium Leak Event and its consequences. Potentially unrepeatable experiments, analysis and experience
27172	SUMMARY OF TEM INFORMATION ON TUBES IN TUBE BUNDLE WU3 FROM THE PFR CIRCUIT 2 SUPERHEATER TUBE 1	GOWER SM		SH2/TEM8	N/A	PFR	Tube bundle, WU3, Superheater	This report is a key reference associated with Steam Generators and High Temperatures caused by the Under-Sodium Steam Leak	Operational Experience for Superheaters and Tube bundles
27174	SUMMARY OF TEM INFORMATION ON TUBES IN TUBE BUNDLE WU3 FROM THE PFR CIRCUIT 2 SUPERHEATER TUBE 18	GOWER SM		SH2/TEM4	N/A	PFR	Tube bundle, WU3, Superheater	This report is a key reference associated with Steam Generators and High Temperatures caused by the Under-Sodium Steam Leak	Operational Experience for Superheaters and Tube bundles
27175	SUMMARY OF TEM INFORMATION ON TUBES IN TUBE BUNDLE WU3 FROM THE PFR CIRCUIT 2 SUPERHEATER TUBE 27	GOWER SM		SH2/TEM1	N/A	PFR	Tube bundle, WU3, Superheater	This report is a key reference associated with Steam Generators and High Temperatures caused by the Under-Sodium Steam Leak	Operational Experience for Superheaters and Tube bundles
27176	SUMMARY OF TEM INFORMATION ON TUBES IN TUBE BUNDLE WU3 FROM THE PFR CIRCUIT 2 SUPERHEATER TUBE 124	GOWER SM		SH2/TEM2	N/A	PFR	Tube bundle, WU3, Superheater	This report is a key reference associated with Steam Generators and High Temperatures caused by the Under-Sodium Steam Leak	Operational Experience for Superheaters and Tube bundles
27177	SUMMARY OF TEM INFORMATION ON TUBES IN TUBE BUNDLE WU3 FROM THE PFR CIRCUIT 2 SUPERHEATER TUBE 152	GOWER SM		SH2/TEM9	N/A	PFR	Tube bundle, WU3, Superheater	This report is a key reference associated with Steam Generators and High Temperatures caused by the Under-Sodium Steam Leak	Operational Experience for Superheaters and Tube bundles
27178	SUMMARY OF TEM INFORMATION ON TUBES IN TUBE BUNDLE WU3 FROM THE PFR CIRCUIT 2 SUPERHEATER TUBE 200	GOWER SM		SH2/TEM5	N/A	PFR	Tube bundle, WU3, Superheater	This report is a key reference associated with Steam Generators and High Temperatures caused by the Under-Sodium Steam Leak	Operational Experience for Superheaters and Tube bundles

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27179	SUMMARY OF TEM INFORMATION ON TUBES IN TUBE BUNDLE WU3 FROM THE PFR CIRCUIT 2 SUPERHEATER TUBE 325	GOWER SM		SH2/TEM6	N/A	PFR	Tube bundle, WU3, Superheater	This report is a key reference associated with Steam Generators and High Temperatures caused by the Under-Sodium Steam Leak	Operational Experience for Superheaters and Tube bundles
27180	SUMMARY OF TEM INFORMATION ON TUBES IN TUBE BUNDLE WU3 FROM THE PFR CIRCUIT 2 SUPERHEATER TUBE 363	GOWER SM		SH2/TEM7	N/A	PFR	Tube bundle, WU3, Superheater	This report is a key reference associated with Steam Generators and High Temperatures caused by the Under-Sodium Steam Leak	Operational Experience for Superheaters and Tube bundles
27181	SUMMARY OF SEM INFORMATION ON TUBES IN TUBE BUNDLE WU3 FROM THE PFR CIRCUIT 2 SUPERHEATER TUBE 17	MURRAY AL		SH2/SEM2	N/A	PFR	Tube bundle, WU3, Superheater	This report is a key reference associated with Steam Generators and High Temperatures caused by the Under-Sodium Steam Leak	Operational Experience for Superheaters and Tube bundles
27182	SUMMARY OF SEM INFORMATION ON TUBES IN TUBE BUNDLE WU3 FROM THE PFR CIRCUIT 2 SUPERHEATER TUBE 27	MURRAY AL		SH2/SEM3	N/A	PFR	Tube bundle, WU3, Superheater	This report is a key reference associated with Steam Generators and High Temperatures caused by the Under-Sodium Steam Leak	Operational Experience for Superheaters and Tube bundles
27183	SUMMARY OF SEM INFORMATION ON TUBES IN TUBE BUNDLE WU3 FROM THE PFR CIRCUIT 2 SUPERHEATER TUBE 124	MURRAY AL		SH2/SEM4	N/A	PFR	Tube bundle, WU3, Superheater	This report is a key reference associated with Steam Generators and High Temperatures caused by the Under-Sodium Steam Leak	Operational Experience for Superheaters and Tube bundles
27184	SUMMARY OF SEM INFORMATION ON TUBES IN TUBE BUNDLE WU3 FROM THE PFR CIRCUIT 2 SUPERHEATER TUBE 325	MURRAY AL		SH2/SEM5	N/A	PFR	Tube bundle, WU3, Superheater	This report is a key reference associated with Steam Generators and High Temperatures caused by the Under-Sodium Steam Leak	Operational Experience for Superheaters and Tube bundles
27185	SUMMARY OF SEM INFORMATION ON TUBES IN TUBE BUNDLE WU3 FROM THE PFR CIRCUIT 2 SUPERHEATER TUBE 363	MURRAY AL		SH2/SEM6	N/A	PFR	Tube bundle, WU3, Superheater	This report is a key reference associated with Steam Generators and High Temperatures caused by the Under-Sodium Steam Leak	Operational Experience for Superheaters and Tube bundles
27347	PROPOSED DEVELOPMENT WORK ON HARDFACING AT RFL SPRINGFIELDS (FAST REACTOR FUEL ASSEMBLY AND LEANING POST COMPONENTS)	ROSS E		FMDC/P(75)21	RFEL	PFR	Hardfacing, Fuel Assembly, Leaning Components	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
27408	PFR OPERATIONS CASCADE TRIPPING OF SECONDARY SODIUM PUMPS AND THE REACTOR	BAINBRIDGE A;CANEY V		PFR/SUWP/46	N/A	PFR	Cascade, Trip, Secondary Sodium Pump	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27410	PFR PLANT OPERATING CONSTRAINTS	BAINBRIDGE A;CANEY V		PFR/SUWP/44	NPC	PFR	Operating, Constraints	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27464	EFFECT OF SECONDARY SODIUM CIRCUIT TRIP ON THE PFR IF THE REACTOR IS NOT TRIPPED BT THE IHX OUTLET TEMPERATURE THERMOCOUPLES	BROADLEY D;THOMASSON RK		PFR/SUWP/15;PFR/TC/P(72)26	N/A	PFR	Secondary Sodium Circuit, IHX, Outlet Temperature, Thermocouples	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27521	CREEP DAMAGE IN THE BOTTOM TUBE PLATE OF PFR INTERMEDIATE HEAT EXCHANGERS DURING SECONDARY SODIUM PUMP TRIP TRANSIENTS	BELL RT		ND-M-385;PFR/IHX/P(78)16;DCWG/P(78)162	UKAEA	PFR	Creep, Damage, Tube plate, IHX, secondary sodium pump	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27522	THERMAL SHOCK IN THE PFR ABOVE CORE STRUCTURE SUPPORT FEATURE	CLAYTON AM	1980	ND-M-1026;PFR/SWP/P(80)6	UKAEA	PFR	Thermal Shock, ACS	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27523	ENDURANCE TESTING OF REPLICA ABOVE CORE STRUCTURE SUPPORT FEATURES IN AIR	WADLE PS;SARGENT TH;KIRKLAND GR	1980	ND-M-1231	UKAEA	PFR	Endurance, ACS, Air	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27565	A CASE FOR THE PROCUREMENT AND INSTALLATION OF GAS DIVERTER VALVES IN THE ARGON ROOF COOLING SYSTEM OF PFR TO REDUCE THE TOP STRAKE TEMPERATURE GRADIENT	BROADLEY D;DURSTON JG;SEED G;COOKE B		PFR/PCR/P(76)36	NPC	PFR	Procurement, Installation, Gas Diverter Valve, Argon, Roof Cooling, Top Strake, Temperature Gradient	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27565	A CASE FOR THE PROCUREMENT AND INSTALLATION OF GAS DIVERTER VALVES IN THE ARGON ROOF COOLING SYSTEM OF PFR TO REDUCE THE TOP STRAKE TEMPERATURE GRADIENT	BROADLEY D;DURSTON JG;SEED G;COOKE B		PFR/PCR/P(76)36	N/A	PFR	Procurement, Installation, Gas Diverter Valve, Argon, Roof Cooling, Top Strake, Temperature Gradient	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27567	PFR PRIMARY CIRCUIT THERMAL STRESSES	DAYLOR D;HARDINGHAM RP;		PFR/PCR/P(76)2	NPC	PFR	Primary Circuit, Thermal Stress	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27568	ENGINEERING SPECIFICATION FOR A THERMAL SHOCK TEST ON A PFR ACS SUPPORT FEATURE IN THE HIGH TEMPERATURE SODIUM LOOP	MATHER B		RED 112/77	RNPDL	PFR	Thermal Shock, ACS, High Temperature, Sodium Loop	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27575	A SAFETY CASE FOR THE CONTINUED OPERATION OF PFR IN VIEW OF THE PRIMARY TANK TOP STRAKE TEMPERATURE GRADIENT	BROADLEY D		PFR/SWP/P(76)17;PFR/PCR/P(76)28	NPC	PFR	Safety, Primary Tank, Top Strake, Temperature Gradient	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27577	A SAFETY CASE FOR THE CONTINUED OPERATION OF THE PFR AFTER TO IN VIEW OF THE CURRENT POSITION OF THE ASSESSMENT OF THE ABOVE CORE STRUCTURE MARCH 1977	BROADLEY D;ROSE RT;DURSTON JG		PFR/SWP/P(77)18;PFR/TF/P(77)235;ACSCM/P(77)24	NPC	PFR	Safety, Operation, ACS	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27581	OPERATION OF PFR SUPERHEATER 2 WITH A CRACKED TUBE PLATE FUTURE OPERATION OF ALL PFR STAINLESS STEEL; STEAM GENERATOR	SMEDLEY JA		PFR/SWP/P(76)22;PFR/TF/P(76)142	N/A	PFR	Superheater, Cracked, Tube Plate, Stainless Steel, Steam Generator	This report is a key reference associated with Steam Generators and the Safety Case for Operating Superheater 2 in its Cracked State	Operational Experience associated with Superheaters and cracking of Tube Plates.
27588	CHANGES TO THE PFR ROOF COOLING SYSTEM OPERATION TO ALLOW HIGHER CORE OUTLET TEMPERATURE AND TO AMELIORATE TOP STRAKE THERMAL GRADIENTS	LUNT AR		PFR/SWP/P(76)27;PFR/PCR/P(76)27	NPC	PFR	Roof Cooling, Outlet Temperature, Ameliorate, Top Strake, Thermal Gradients	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27588	CHANGES TO THE PFR ROOF COOLING SYSTEM OPERATION TO ALLOW HIGHER CORE OUTLET TEMPERATURE AND TO AMELIORATE TOP STRAKE THERMAL GRADIENTS	LUNT AR		PFR/SWP/P(76)27;PFR/PCR/P(76)27	N/A	PFR	Roof Cooling, Outlet Temperature, Ameliorate, Top Strake, Thermal Gradients	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27589	ENDURANCE OF PFR ABOVE CORE STRUCTURE RELEVANCE OF DFR MK2 SUPPORT STOOL	ROSE RT		PFR/SWP/P(78)33;TN/P(78)248	NPC	PFR, DFR	Endurance, ACS, MK2, Support Stool	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27589	ENDURANCE OF PFR ABOVE CORE STRUCTURE RELEVANCE OF DFR MK2 SUPPORT STOOL	ROSE RT		PFR/SWP/P(78)33;TN/P(78)248	NPC	PFR	Endurance, ACS, MK2, Support Stool	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27590	HIGH PRESSURE TESTING & OPERATION OF PFR SUPERHEATER NO 2	ABLITT JF		PFR/SWP/P(75)36	N/A	PFR	High Pressure, Superheater 2	This report is a key reference associated with Steam Generators and the Safety Case for Operating Superheater 2 in its Cracked State	Operational Experience associated with Superheaters and cracking of Tube Plates.
27591	ASSESSMENT OF DAMAGE TO PFR PRIMARY VESSEL TOP STRAKE	BROAWN C;MALCOLM PN;HICKS JL		PFR/SWP/P(76)46	NPC	PFR	Damage, Primary Vessel, Top Strake	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27592	RECONSIDERATION OF THE SAFETY CASE TO RUN PFR SUPERHEATERS WITH CRACKED TUBE PLATES FOLLOWING THE FINDING OF CRACKING IN PFR REHEATER 3	SMEDLEY JA		PFR/SWP/P(76)48	N/A	PFR	Safety, Superheaters, Cracked, Tube plate	This report is a key reference associated with Steam Generators and the Safety Case for Operating Superheater 2 in its Cracked State	Operational Experience associated with Superheaters and cracking of Tube Plates.
27593	EXTERNAL PRESSURE BUCKLING OF PFR PRIMARY TANK STAGE 2	GALLETLY GD;AYLWARD RW		PFR/SWP/P(76)49	NPC	PFR	Pressure Buckling, Primary Tank	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27594	PFR ABOVE CORE STRUCTURE SUPPORT TUBE ATTACHMENT PROPOSED THERMAL SHOCK EXPERIMENTS	EICKHOFF KG		PFR/SWP/P(77)54;PFR/TF/P(77)270	NPC	PFR	ACS, Support Tube, Thermal Shock	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience

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27595	ABOVE CORE STRUCTURE AIR THERMAL SHOCK EXPERIMENT VALIDATION OF RESULTS WITH REACTOR DATA	DIXON M		PFR/SWP/P(78)69;TN/P(78)285;ACSCM/P(78)52	NPC	PFR	ACS, Thermal Shock, Air,	This report is a key reference associated with Above Core Structure	Validation of Calculated Results
27596	SUMMARY OF RESULTS FROM CTS/HARWELL EXPERIMENTS ON THIN CYLINDERS SUBJECTED TO AXIALLY MOVING TEMPERATURE RAMPS	BELL RT		PFR/SWP/P(77)71	NPC	PFR	Thin Cylinders, Axially Moving, Temperature Ramps	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27597	REVIEW OF THE SAFETY CASE FOR CONTINUED OPERATION OF PFR SUPERHEATER 2 FOLLOWING TUBE PLATE EXAMINATION OCTOBER/NOVEMBER 1979	SMEDLEY JA		PFR/SWP/P(79)73	N/A	PFR	Safety, Superheaters, Tube plate	This report is a key reference associated with Steam Generators and the Safety Case for Operating Superheater 2 in its Cracked State	Operational Experience associated with Superheaters and cracking of Tube Plates.
27604	PFR TOP STRAKE ADDITIONAL INSTRUMENTATION	LAYCOCK W		PFR/TS/P(76)167	RRDO	PFR	Top Strake, Instrumentation	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27611	ASSESSMENT OF THE STEADY STATE AND TRIP TRANSIENT TEMPERATURES EXPERIENCED BY THE AVG SUPPORT COLUMN BAFFLE ATTACHMENTS FOR USE IN THE THERMAL SHOCK EXPERIMENT	DIXON M		TN/P(78)246;ACSCM/P(78)42	NPC	PFR	Steady State, Trip Transient, AVG, Support, Baffle, Thermal Shock	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27612	SPECIFICATION OF STRESS AND STABILITY CALCULATIONS FOR PFR PRIMARY VESSEL	ROSE RT		TN/P(78)255	NPC	PFR	Stress, Stability, Calculation, Primary Vessel	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27614	THE FEASIBILITY OF COOLING IHX LEAKAGE FLOW WITH DHR LOOPS OPERATING UNDER FORCED FLOW CONDITIONS	WILKES DJ		TN/P(78)268;PFR/TF/P(78)332	NPC	PFR	Cooling, IHX, Leakage, DHR Loops, Flow	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27616	OUTLINE SPECIFICATION FOR STRESS ANALYSIS OF PFR ANTIVIBRATION GRID	ROSE RT	1980	TN/P(80)369	NPC	PFR	Antivibration Grid	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27622	ABOVE CORE STRUCTURE INVESTIGATION SUMMARY OF THE FABRICATION DETAILS OF THE ANTI-VIBRATION GRID STRUCTURE	STACEY J		RRD(77)REPORT 43;ACSCM/P77	N/A	PFR	ACS, Fabrication, Anti-vibration grid	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27624	AN INVESTIGATION OF CRACK DEVELOPMENT UNDER THERMAL FATIGUE CYCLING CONDITIONS WITH ALLOWANCE FOR REDUCING SECTION THICKNESS AND ELLIPTICAL CRACK SHAPE	PEARCE JHB		ACSCM/P(76)11	N/A	PFR	Crack, Thermal Fatigue, Section Thickness, Elliptical Crack	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27625	CRACK INITIATION OF STAINLESS STEEL UNDER THERMAL STRIPING	WOOD DS		ACSCM/P(77)19;PFR/TF/P(77)212	N/A	PFR	Crack, Stainless Steel, Thermal Striping	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27626	A SUMMARISED ASSESSMENT OF THE CRITICAL STRESS CONDITIONS OCCURRING INTHE PFR ABOVE CORE STRUCTURE	PEARCE JHB		ACSCM/P(77)22	N/A	PFR	Critical Stress, ACS	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27627	PFR PRIMARY VESSEL TENTATIVE SPECIFICATION FOR AN EXPERIMENTAL INVESTIGATION OF TOP STRAKE THERMAL STRESSES	ROSE RT		TSPC/P(76)24	NPC	PFR	Primary Vessel, Top Strake, Thermal Stresses	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27634	STRESS MODEL FOR THE PFR PRIMARY TANK	TAYLOR D		TSPC/P(76)29	NPC	PFR	Stress, Primary Tank	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27635	PFR PRIMARY VESSEL TOP STRAKE ANALYSIS OF THERMAL STRESS PERFORMANCE ATTAINABLE BY 1/10TH SCALE MODEL TANK	BUCKLEY FI;FEWSTER J;KNOWLES PJ		TSPC/P(76)35	NPC	PFR	Primary Vessel, Top Strake, Thermal Stress, 1/10 Scale Model	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27636	FURTHER INVESTIGATION OF THE STRESS CONDITIONS OCCURRING IN THE PFR ABOVE CORE STRUCTURE	PEARCE JHB		ACSCM/P(77)35	N/A	PFR	Critical Stress, ACS	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
27638	ADDITIONAL STEADY STATE RESULTS OBTAINED FROM PFR SODIUM LEVEL CHANGE EXPERIMENT 6 - 11 APRIL 1976 (ADDENDUM 1)	DURSTON JG;GRAHAM D;HUMPHRIES J;LOMAS J;SARGENT		TSPC/P(76)22	NPC	PFR	Steady State, Sodium Level	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27639	PFR TEMPERATURE PROFILES DURING SODIUM FILL	DURSTON JG;WORTH B		TSPC/P(76)33	NPC	PFR	Temperature Profile, Sodium Fill	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27640	PFR VESSEL THERMAL STRAINS CAUSED BY MOVING AXIAL TEMPERATURE RAMP PROGRAMME OF TESTS ON SMALL SCALE CYLINDERS AT HARWELL (JULY/AUGUST 1976)	LINNING DL		TSPC/P(76)44	NPC	PFR	Thermal Strains, Axial Temperatures, Cylinders	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27641	PFR PRIMARY VESSEL TOP STRAKE TRANSIENT TEMPERATURE PROFILES	BELL RT		PFR/CTS/TS(1)	NPC	PFR	Primary Vessel, Top Strake, Transient Temperature	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27642	PFR PRIMARY VESSEL TOP STRAKE DEPENDENCE OF TRANSIENT TEMPERATURE PROFILES ON SODIUM AND GAS HEAT TRANSFER COEFFICIENTS	BELL RT		PFR/CTS/TS(2)	NPC	PFR	Primary Vessel, Top Strake, Transient Temperature, Sodium, Heat Transfer Coefficients	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27643	PFR PRIMARY VESSEL THERMAL STRESSES MODEL EXPERIMENTAL WORK AT HARWELL INITIAL TEST RESULTS	LOVE JB		PFR/CTS/TS(4)	NPC	PFR	Primary Vessel, Thermal Stresses	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27644	PFR PRIMARY VESSEL THERMAL STRESSES CAUSED BY MOVING AXIAL TEMPERATURE RAMPS PRELIMINARY PROGRAMME OF TESTS ON SMALL SCALE MODEL CYLINDERS	LINNING DL		PFR/CTS/TS(5)	NPC	PFR	Primary Vessel, Thermal Stresses, Axial Temperatures, Cylinders	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27645	COMPARISON OF EXPERIMENTAL AND THEORETICAL TRANSIENT TEMPERATURES IN THE PFR PRIMARY VESSEL TOP STRAKE	BELL RT		PFR/CTS/TS(6)	NPC	PFR	Transient Temperatures, Primary Vessel, Top Strake	This report is a key reference associated with the Primary Vessel	Comparison between experimental and calculated values.
27647	OPERATIONAL ASPECTS PERTAINING TO PFR ROOF COOLING PROBLEMS	LUNT AR		PFR/OC/P(74)3	TNPC	PFR	Operational, Roof Cooling	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27648	PFR FAULT ROOF COOLING AN ASSESSMENT OF THE EXISTING SYSTEM AND PROPOSALS FOR A NEW SYSTEM	LUNT AR		PFR/OC/P(73)32	N/A	PFR	Fault, Roof Cooling	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27780	PFR HOLDING MAGNET DESIGN DATA CONTROL ROD MECHANISMS	ENGLISH ELECTRIC COMPANY			English Electric Company	PFR	Holding Magnet, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27781	4TH DRAFT DESCRIPTIVE MANUAL CONTROL ROD & SHUT OFF ROD MECHANISMS	FRDO RISLEY		G.1.2	UKAEA	PFR	Control Rod, Shut-off rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27809	DETERMINATION OF MAXIMUM STRESS IN NEUTRON SHIELD AREA OF DIAGRID PLATE	LACEY DR	1981	E/EDD/TECH NOTE 1075	N/A	PFR	Stress, Neutron Shield, Diagrid	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
27963	BOW LIMITS FOR PFR MK1A SHUT-OFF RODS AND GUIDE TUBES	SIMMERS DA		RTD/TN(79)40	N/A	PFR	Bow, MK1A, Shut off Rods, Guide Tubes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience

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27963	BOW LIMITS FOR PFR MK1A SHUT-OFF RODS AND GUIDE TUBES	SIMMERS DA		RTD/TN(79)40	RTDO	PFR	Bow, MK1A, Shut off Rods, Guide Tube	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27964	THERMAL STRESSES IN THE EXTENSION ROD OF A PFR CONTROL ROD	PRICE JWH		PFR/SWP/P(79)14;TN/P(79)312	NPC	PFR	Thermal Stress, Extension Rod, Control Rod	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27965	AN EXAMINATION OF THE POSSIBILITY OF THREE POINT CONTRACT BETWEEN PFR SHUT-OFF RODS AND GUIDE TUBES	TRIGGS GW		RTD/TN(79)41	RTDO	PFR	Three point Contract, Shut off Rods, Guide Tubes	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27970	BOW LIMITS FOR PFR MK1A SHUT OFF RODS AND MK3 CONTROL RODS IN A MK 3 GUIDE TUBE	SIMMERS DA		RTD/TN(79)66	RTDO	PFR	Bow, MK1A, Shut off Rods, Guide Tubes, MK3	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
27970	BOW LIMITS FOR PFR MK1A SHUT OFF RODS AND MK3 CONTROL RODS IN A MK 3 GUIDE TUBE	SIMMERS DA		RTD/TN(79)66	RTDO	PFR	Bow, MK1A, Shut off Rods, Guide Tube, MK3	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27971	THE EFFECT OF IRRADIATION CREEP ON PFR MK1A SHUT OFF RODS	RIDING DJ		rtd/tn(79)70	RTDO	PFR	Irradiation, Creep, MK1A, Shut Off Rods	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
27971	THE EFFECT OF IRRADIATION CREEP ON PFR MK1A SHUT OFF RODS	RIDING DJ		rtd/tn(79)70	RTDO	PFR	Irradiation, Creep, MK1A, Shut Off Rods	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27973	PFR ABSORBER RODS GUIDE TUBES AND ASSOCIATED ITEMS APPROACHING LIMITS AT RELOAD 4 DURING RUN 5	SIMMERS DA		RTD/TN(79)73	RTDO	PFR	Absorber Rods, Guide Tubes, RELOAD	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
27973	PFR ABSORBER RODS GUIDE TUBES AND ASSOCIATED ITEMS APPROACHING LIMITS AT RELOAD 4 DURING RUN 5	SIMMERS DA		RTD/TN(79)73	RTDO	PFR	Absorber Rod, Guide Tube, Reload 4, Run 5	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
27974	AS ASSESSMENT OF IN CORE BOW MEASUREMENTS USING THE PFR CHARGE MACHINE	SIMMERS DA		RTD/TN(79)91	RTDO	PFR	Bow, Charge Machine	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
27975	NOTES ON THE EFFECT OF SHORTENING THE GUIDE TUBE REMOVAL TOOL SPIKE	DIXON JS		RTD/TN(79)92	RTDO	PFR	Guide Tube, Removal	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
27978	PFR ABOVE CORE FLOWMETER LOCATION TUBES HANDLING AND DISTORTION CONSIDERATIONS	SIMMERS DA	1980	RTD/TN(80)102	RTDO	PFR	Above Core, Flow Meter, Tube Handling	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
28020	SAFETY REPORT FOR THE HARWELL CARBON METER	HENDERSON JDC		PFR/SWP/ESC/P(74)9	N/A	PFR	Safety, Carbon, Meter	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
28053	REACTIVITY NOISE LEVELS IN PFR DUE TO CONTROL ROD VIBRATIONS	LORD DJ		PFR/SWP/ESC/P(79)12	FRTG	PFR	Reactivity Noise, Control Rod, Vibration	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
28057	REACTIVITY NOISE LEVELS IN PFR DUE TO CONTROL ROD VIBRATIONS	LORD DJ		PFR/SWP/ESC/P(79)12	FRTG	PFR	Reactivity Noise, Control Rod, Vibration	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
28079	PFR CONTROL AND SHUT OFF RODS FUNCTIONAL RELIABILITY AND COMMISSIONING TESTS	HENDERSON JDC		PFR/OC/P(72)11;PFR/CP/16	N/A	PFR	Control Rod, Shut off Rod, Reliability, Commissioning	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
28087	CALIBRATION OF PUMP PRESSURE MEASUREMENT INSTRUMENTATION	HILL EA;DUNCOMBE E		PFR/OC/P(73)8;PFR/CP/12	DERE	PFR	Calibration, Pump, Pressure, Instrumentation	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
28274	B ASSEMBLIES AND GUIDE TUBES MAY 1982 PART 1 LENGTH CHANGE MEASUREMENTS IN EN58B-CW E MEASUREMENTS IN EN58B-CW	ILLEY RJ;WILLIAMS DP;BROOK AJ; ILLEY RJ;WILLIAMS DP;BROOK AJ;	1982	DFMC/P(82)11;FRDC/FEWP/P(82)28	NPDO	PFR	Assemblies, Guide Tubes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
28301	PREPARATIONS FOR RELOAD 5 INITIAL GUIDE TUBE AND GUIDE TUBE REMOVAL TOOL TESTING	ALLCOCK CC		PFR/OPS/N637;FRTF/P(81)76	N/A	PFR	Guide Tube, removal	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
28437	IHX REMOVAL STRATEGY	HAYDEN O	1981	PFR/TF/P(81)499	NNC	PFR	IHX, Removal	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
28487	PFR ROOF COOLING SYSTEM FLOW CHARACTERISTICS	LUNT AR		TSPC/P(76)27	N/A	PFR	Roof Cooling, Flow	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
28493	A STUDY OF THE PFR PRIMARY VESSEL TOP STRAKE TEMPERATURE DISTRIBUTION	LUNT AR;MCSWEENEY RN		TSPC/P(76)37	NPC	PFR	Primary Vessel, Top Strake, Temperature	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
28501	A COMPARISON OF PREDICTED AND MEASURED DIAMETRAL GROWTH DUE TO TEMPERATURE RAMPS WHICH MOVE AXIALLY	JOBSON DA		TSPC/P(76)46	NPC	PFR	Diametral, Temperature Ramps, Axially	This report is a key reference associated with the Primary Vessel	Comparison between experimental and calculated values.
28503	AN EXAMINATION OF THE FACTORS INVOLVED IN THE RADIAL RATCHETTING OF A CYLINDER SUBJECTED TO TRAVELLING AXIAL TEMPERATURE RAMP	LINNING DL		TSPC/P(76)50	NPC	PFR	Radial Ratchetting, Axial Temperature	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
28504	RADIAL RATCHETTING OF A CYLINDER SUBJECTED TO A MOVING AXIAL TEMPERATURE RAMP	LINNING DL		TSPC/P(76)51	NPC	PFR	Radial Ratchetting, Axial Temperature	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
28505	JET INFRINGEMENT COOLING FOR THE PFR TOP STRAKE 1/10TH SCALE MODEL	FEWSTER J		TSPC/P(76)52	NPC	PFR	Jet Impingement, Top Strake, 1/10 scale	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
28538	BRITTLE LATCHES MODIFICATION OF MK2 IN CORE GUIDE TUBES FOR RE-USE IN PFR	WEBB J;ROUMPH E	1981	FRTF/P(81)89	NPDO	PFR	Brittle, Latches, MK2, Guide Tubes	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
28582	GUIDE TUBES WITH BRITTLE LATCHES	DODD JA	1981	FRTF/P(81)92;RTD/TN(81)193	NPDO	PFR	Guide Tubes, Brittle Latches	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
28587	A REVIEW OF SUPPORT FOR PFR	WEBB J	1982	FROC/P(82)3	NPDO	PFR	Support	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
28589	A REVIEW OF PFR SUPPORT WORK	WEBB J	1982	FROC/P(82)8	NPDO	PFR	Support	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
28728	ESTIMATION OF THE ENDURANCE OF PFR ABOVE CORE STRUCTURE ANTI-VIBRATION GRID	PEARCE JHB		ACSCM/P(78)46	N/A	PFR	Endurance, ACS, Anti-Vibration Grid	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
28732	PFR ABOVE CORE STRUCTURE THERMAL SHOCK PRELIMINARY HYDRAULICS CONSIDERATIONS ON ALTERNATIVE BAFFLING	TAYLOR AF;BETTS C;FRANCE J		ACSCM/P(78)49;PFR/SWP/P(78)63;ND-M-508	N/A	PFR	ACS, Thermal Shock, Hydraulics, Baffling	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
28737	SUMMARY OF RNL EXPERIMENTAL FLOW MODEL WORK RELATED TO THERMAL SHOCK PROBLEMS IN PFR	TAYLOR AF		ACSCM/P(79)56	N/A	PFR	RNL, Flow, Thermal Shock	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
28738	SUMMARY OF THE THERMAL SHOCK EXPERIMENTAL; PROGRAMME IN RELATION TO THE ACS MOUNTING FIXTURE	BUCKLEY FI		ACSCM/P(79)57	N/A	PFR	Thermal Shock, ACS, Mounting	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
28739	NOTE ON THE CURRENT STATUS OF PFR THERMAL STRIPING WORK	BETTS C		ACSCM/P(79)58	N/A	PFR	Thermal Striping	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
28740	HEAT TRANSFER ASPECTS RELATED TI THERMAL STRIPING	SHERIFF N		ACSCM/P(79)59	N/A	PFR	Heat Transfer, Thermal Striping	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
28741	ANALYSIS OF THE PFR ANTI-VIBRATION GRID A REVIEW OF CTS WORK TO MAY 1979	PEARCE JHB		ACSCM/P(79)60;ND-M-808	N/A	PFR	Anti-Vibration, CTS	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
28744	A PRELIMINARY LOOK AT THE MECHANICS OF A LOW LEVEL BAFFLE FOR PFR ABOVE CORE STRUCTURE	BADDLEY AH		ACSCM/P(79)63	N/A	PFR	Mechanics, Baffle, ACS	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
28746	RE ASSESSMENT OF THE PFR ANTI VIBRATION GRID ENDURANCE OCTOBER 1979	PEARCE JHB		ACSCM/P(79)68	N/A	PFR	Anti-Vibration, Grid Endurance	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
28747	DESIGN CRITERIA FOR THERMAL STRIPING A REVIEW	PEARCE JHB		ACSCM/P(79)67;DCWG/P(79)201;ND-M-706	N/A	PFR	Thermal Striping	This report is a key reference associated with Above Core Structure	Operation Experience associated with the Above Core Structure of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
29432	PFR ROOF COOLING AN ASSESSMENT ON THE FEASIBILITY OF CHANGING THE COOLING GAS FROM ARGON TO NITROGEN AND THE PROBABLE REDUCTION IN RUNNING COSTS	BEECH DJ	1983	TN/P(82)577	NNC	PFR	Roof Cooling, Cooling Gas, Argon, Nitrogen, Running Costs	This report is a key reference associated with Roof and Roof Cooling	Operation Experience associated with Roof and Roof Cooling within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
29608	THE INGRESS OF SODIUM INTO MK 2 PFR VENTED CONTROL ROD PINS	WALKER DEY;MURGATROYD RA;BLAND JT	1982	ND-R-584;FRDC/MWP/P(80)1118;FRASG/P(80)168	UKAEA	PFR	Ingress, Sodium, Control Rod, Pins	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
29868	DETERMINATION OF SAMPLE TRANSIT TIMES FOR THE PFR IHX BULK MONITOR BURST PIN DETECTION SYSTEM-USING A 1/5 SCALE WATER MODEL	FRANCE J;WINN WR;ELLABY GM	1980	ND-M-1051 (R)	UKAEA	PFR	Transit Times, IHX, Bulk Monitor, Burst Pin Detection, 1/5 Scale	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
29869	PRELIMINARY EXPERIMENTS ON THE PFR INTERMEDIATE HEAT EXCHANGER BURST PIN DETECTION SYSTEM-USING A 1/5 SCALE WATER MODEL	ROBINSON RGJ;PARDY A;HILES RIW;TAYLOR AF	1982	ND-M-1681 (R)	UKAEA	PFR	IHX, Burst Pin Detection, 1/5 scale	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
30598	COMPARISON BETWEEN EFR & PFR MAIN SODIUM PUMPS & INTERMEDIATE HEAT EXCHANGERS	FIRTH GF	1995	C9809/TR/022	EFR ASSOCIATES	EFR, PFR	Sodium Pumps, IHX	This report is a key reference associated with Pumps	Comparison between reactor types
31120	PFR REPLACEMENT IHX PISTON RING SEALS	BOOTH R	1997	C5426/TR/010	EFR ASSOCIATES	PFR	Replacement, IHX Piston Ring	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31169	PFR CORE SUPPORT STRUCTURE WORK PROGRAMME AND OTHER WORK ITEMS	LOVE,JB	1990	PFR/SIAG/P(90)24	AEA TECHNOLOGY	PFR	Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31171	COMMENTS ON THE ANTICIPATED QUALITY OF A NUMBER OF WELDS IN THE PFR CORE SUPPORT STRUCTURE	GORE,AW	1990	PFR/SIAG/P(90)28/FR/ESD/P(90)2165	AEA TECHNOLOGY	PFR	Welds, Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31172	CRITICAL CRACK LENGTH IN THE PFR CORE SUPPORT STRUCTURE	GREEN,D; BATE,SK	1991	PFR/SIAG/P(91)44	N/A	PFR	Crack, Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31173	PRIMARY STRESSES IN THE PFR CORE SUPPORT STRUCTURE	CLARKE,PW	1991	PFR/SIAG/P(91)60	AEA TECHNOLOGY	PFR	Core Support, Stresses	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31174	STRESS ANALYSIS OF THE PFR PRIMARY TANK AND LEAK JACKET WITH CONSIDERATION AND DEFECT TOLERANCE ON THE BASIS OF TEARING INITIATION AND COVER GAS PRESSURE FOR BUCKLING	GREEN D	1993	PFR/SIAG/P(92)102	AEA TECHNOLOGY	PFR	Stress, Primary Tank, Leak Jacket, Tearing, Cover Gas, Buckling	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31174	STRESS ANALYSIS OF THE PFR PRIMARY TANK AND LEAK JACKET WITH CONSIDERATION AND DEFECT TOLERANCE ON THE BASIS OF TEARING INITIATION AND COVER GAS PRESSURE FOR BUCKLING	GREEN D	1993	PFR/SIAG/P(92)102	AEA	PFR	Stress, Primary Tank, Leak Jacket, Tearing, Cover Gas, Buckling	This report is a key reference associated with the Primary Vessel	Operation Experience associated with the Primary Vessel within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
31175	INTEGRITY ASSESSMENT OF THE PFR CORE SUPPORT STRUCTURE TRANSITION WELD	DANIELS,BD	1993	PFR/SIAG/P(93)176	AEA REACTOR SERVICES	PFR	Integrity, Core Support, Transition, Weld	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31176	STRUCTURAL PERFORMANCE DEPARTMENT AEA TECHNICAL SERVICES RISLEY	DANIELS,BD;BROADHOUSE,BJ;GREEN,D	1994	PFRDMA/P228;D/108/9.1	AEA	PFR	Structural Performance	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31594	PFR CORE SUPPORT STRUCTURE DEGRADATION	KNOWLES JA	1991	PFR/SIAG/P(90)42	AEA TECHNOLOGY	PFR	Core Support, Degradation	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31597	A STRUCTURAL ASSESSMENT OF A PFR IHX SCALE MODEL TEST VESSEL	DANIELS BD	1991	PFR/SIAG/P(91)52	AEA	PFR	Structural Assessment, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31598	PFR IHX 0.4 SCALE MODEL PRESSURE TESTS	HARRISON M;DAVENPORTF	1991	PFR/SIAG/P(91)53	AEA	PFR	IHX, Scale Model, Pressure	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31599	FURTHER CONSIDERATION OF MAXIMUM FLAW SIZES IN PFR CORE SUPPORT STRUCTURE (CSS) AT BEGINNING OF LIFE	PICKER C	1991	PFR/SIAG/P(91)56	AEA	PFR	Flaw, Core Support, Beginning of Life	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31599	FURTHER CONSIDERATION OF MAXIMUM FLAW SIZES IN PFR CORE SUPPORT STRUCTURE (CSS) AT BEGINNING OF LIFE	PICKER C	1991	PFR/SIAG/P(91)56	AEA	PFR	Flaw Size, Core Support Structure	This report is a key reference associated with Failed Fuel Detection	Operation Experience associated with Failed Fuel Detection within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
31601	PROPOSED PROGRAMME FOR HIGH TEMPERATURE CRACK GROWTH STUDIES OF RELEVANCE TO PFR CORE SUPPORT STRUCTURE	CURBISHLEY I	1991	PFR/SIAG/P(91)55	HTMD	PFR	high Temperature, Crack, Core Support	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience

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31601	PROPOSED PROGRAMME FOR HIGH TEMPERATURE CRACK GROWTH STUDIES OF RELEVANCE TO PFR CORE SUPPORT STRUCTURE	CURBISHLEY I	1991	PFR/SIAG/P(91)55	HTMD	PFR	high Temperature, Crack, Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31602	ASSESSMENT OF RECTANGULAR PATCH PRESSURE TEST AND IMPLICATIONS FOR PATCH PLATE DESIGN	DANIELS BD	1991	PFR/SIAG/P(91)57	AEA	PFR	Rectangular, Patch, Pressure, Patch, Plate	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31603	PFR CORE SUPPORT STRUCTURE MONITORING OPTIONS FOR CORE SUPPORT MOVEMENTS-AN INITIAL REVIEW	MELHUISH D	1991	PFR/SIAG/P(91)59	AEA TECHNOLOGY	PFR	Core Support	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
31603	PFR CORE SUPPORT STRUCTURE MONITORING OPTIONS FOR CORE SUPPORT MOVEMENTS-AN INITIAL REVIEW	MELHUISH D	1991	PFR/SIAG/P(91)59	AEA	PFR	Core Support, Movements	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Safety Assessment of the PFR following a potential failure of Core Supports.
31610	PEER REVIEW OF THE PFR CORE SUPPORT STRUCTURE SAFETY CASE INPFR/SWP/P(90)49 AND SUPPORTING DOUMENTS+RESPONSE TO PEER REVIEW	PICKER P;GREEN D	1991	PFR/SIAG/P(91)68	AEA	PFR	Core Support, Structure, Safety	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Safety Assessment of the PFR following a potential failure of Core Supports.
31611	COMBINED PROGRAMME OF HIGH TEMPERATURE CRACK GROWTH STUDIES FOR PFR CORE SUPPORT STRUCTURE	CURBISHLEY I;HIPPSLEY CA	1991	PFR/SIAG/P(91)69	AEA	PFR	high Temperature, Crack, Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31612	REVIEW OF THE INSPECTION POTENTIAL OF THE PFR CORE SUPPORT STRUCTURE (CSS)	THOMAS G	1991	PFR/SIAG/P(91)70	AEA	PFR	Inspection, Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31614	RESULTS OF PFR CORE SUPPORT STRUCTURE MONITORING	HENDERSON JDC	1991	PFR/SIAG/P(91)72	AEA	PFR	Core Support, Monitoring	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31615	PFR CORE SUPPORT FRACTURE TOUGHNESS PROGRAMME	O'DONNELL IJ	1991	PFR/SIAG/P(91)73	AEA	PFR	Core Support, Fracture, Toughness	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31637	THE DEFECT TOLERANCE OF PFR IHX	PICKER C;GREEN D	1992	PFR/SIAG/P(92)99	AEA	PFR	Defect, Tolerance, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31638	DESIGN AND MANUFACTURING STANDARDS FOR PFR INTERMEDIATE HEAT EXCHANGERS (IHX)	MAIR A	1992	PFR/SIAG/P(92)100	N/A	PFR	Design, Manufacture, Standards, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Design and Manufacturing Standards review
31639	THE CALCULATION OF CRITICAL CRACK LENGTH OF THE PFR IHX SHELL	GREEN D	1992	PFR/SIAG/P(92)101	AEA	PFR	Critical Crack Length, IHX, Shell	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31651	ASSESSMENT OF CARBURIZATION FOLLOWING AN OIL LEAK IN THE PFR PRIMARY CIRCUIT	THORLEY AW;SKELDON PPICKER C;HAMER AN	1992	PFR/SIAG/P(92)118	AEA	PFR	Carburization, Oil Leak, Primary Circuit	This report is a key reference associated with Pumps	Operation Experience associated with the Pumps within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
31656	A CODE ASSESSMENT OF 0.14G SEISMIC LOADING ON THE PFR CORE SUPPORT STRUCTURE	CLARKE PW	1992	PFR/SIAG/P(92)126	AEA	PFR	Code, Seismic, Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31657	A CODE ASSESSMENT OF 0.14G SEISMIC LOADING ON THE PFR CORE SUPPORT STRUCTURE	CLARKE PW;O'GARA DM	1993	PFR/SIAG/P(92)126	AEA	PFR	Code, Seismic, Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31658	MINIMUM FRACTURE TOUGHNESS REQUIREMENT OF THE PFR IHX SHELL TO RESIST THROUGH WALL CRACK GROWTH OF A 4mm DEEP x200mmLONG SURFACE CRACK	DANIELS BD	1992	PFR/SIAG/P(92)127	AEA	PFR	Fracture, Toughness, IHX, Shell, Crack	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31675	ESTIMATION OF CONDITIONAL FAILURE PROBABILITIES OF PFR IHX'S AND SECONDARY CIRCUIT PIPEWORK	GREEN VR LIDBURY DPG	1992	PFR/SIAG/P(92)145	AEA	PFR	Conditional Failure Probabilities, IHX, Pipework	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31681	MECHANICAL TESTS IN SUPPORT OF THE SAFETY CASE FOR PFR CORE SUPPORT STRUCTURE HEAT EXCHANGERS	PICKER C;ORTNER SR	1993	PFR/SIAG/P(93)150	AEA TECHNOLOGY	PFR	Mechanical, Safety, Core Support, Heat Exchangers	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
31681	MECHANICAL TESTS IN SUPPORT OF THE SAFETY CASE FOR PFR CORE SUPPORT STRUCTURE HEAT EXCHANGERS	PICKER C;ORTNER SR	1993	PFR/SIAG/P(93)150	AEA	PFR	Mechanical, Safety, Core Support, Heat Exchangers	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31682	MECHANICAL TESTS IN SUPPORT OF THE SAFETY CASE FOR PFR CORE SUPPORT STRUCTURE HEAT EXCHANGERS	PICKER C;ORTNER SR	1992	PFR/SIAG/P(93)150	AEA TECHNOLOGY	PFR	Mechanical, Safety, Core Support, Heat Exchangers	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
31682	MECHANICAL TESTS IN SUPPORT OF THE SAFETY CASE FOR PFR CORE SUPPORT STRUCTURE HEAT EXCHANGERS	PICKER C;ORTNER SR	1992	PFR/SIAG/P(93)150	AEA	PFR	Mechanical, Safety, Core Support, Heat Exchangers	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31683	MECHANICAL TESTS IN SUPPORT OF THE SAFETY CASE FOR PFR CORE SUPPORT STRUCTURE + REVIEW OF PFR/SIAG/P(92)150 ISSUE 3 HEAT EXCHANGERS	PICKER C;ORTNER SR	1993	PFR/SIAG/P(93)150	AEA TECHNOLOGY	PFR	Mechanical, Safety, Core Support, Heat Exchangers	This report is a key reference associated with the Core Support Structure	Operation Experience associated with the PFR Core Structure. Potentially unrepeatable experiments, analysis and experience
31683	MECHANICAL TESTS IN SUPPORT OF THE SAFETY CASE FOR PFR CORE SUPPORT STRUCTURE + REVIEW OF PFR/SIAG/P(92)150 ISSUE 3 HEAT EXCHANGERS	PICKER C;ORTNER SR	1993	PFR/SIAG/P(93)150	AEA	PFR	Mechanical, Safety, Core Support, Heat Exchangers	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31686	PFR IHX POD DAMAGE ASSESSMENT HEAT EXCHANGERS	DANIELS BD	1993	PFR/SIAG/P(93)154	AEA	PFR	IHX Pod, IHX	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31691	EXAMINATION OF THE CREEP-FATIGUE TESTS ON THE PFR ABOVE CORE SUPPORT REPLICAS USING THE R5 ASSESSMENT PROCEDURE	MAY KA;CURBISHLEY I	1993	PFR/SIAG/P(93)158	AEA	PFR	Creep, Fatigue, Above Core, R5	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31692	THE SIGNIFICANCE OF THE SINUSOIDAL STRESS VARIATION ON THE CRITICAL CRACK LENGTH AT WELD M IN THE PFR CORE SUPPORT STRUCTURE	GREEN D;DANIELS B	1993	PFR/SIAG/P(93)159	AEA	PFR	Sinusoidal, Stress, Crack, Weld, Core Support	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31693	THE POSSIBILITY OF BUCKLING IN THE PFR CORE SUPPORT STRUCTURE	GREEN D	1993	PFR/SIAG/P(93)160	AEA	PFR	Buckling, Support Structure	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31694	THE POSSIBILITY OF BUCKLING IN THE PFR CORE SUPPORT STRUCTURE	GREEN D	1993	PFR/SIAG/P(93)160	AEA	PFR	Buckling, Support Structure	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
31696	FRACTURE TOUGHNESS TESTS IN SUPPORT OF THE SAFETY CASE FOR PFR CORE SUPPORT STRUCTURE	O'DONNELL IJ	1993	PFR/SIAG/P(93)163	AEA	PFR	Fracture, Safety, Core Structure	This report is a key reference associated with the Strongback	Operation Experience associated with the Strongback of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
00464b	PFR EVAPORATOR WORKS UNIT 3 TUBE BORE MEASUREMENTS TO ASSESS THE LEAKAGE OF INLET SODIUM INTO THE INLET HEADER REGION (JANUARY-FEBRUARY 1982)	LEYLAND KS;GUNN T	1983	NDM-1812;MWP/P(84)1532;MWP/FIXSG/P(84)246	UKAEA	PFR	Evaporator, tube Bore, Leakage, Inlet Header, Inlet Sodium	This report is a key reference associated with Steam Generators and the Condition of the Magnetite Layer in Evaporator Tubes	Operation Experience associated with the Steam Generators and the Condition of the Magnetite Layer in the Evaporator Tubes. Potentially unrepeatable experiments, analysis and experience

Fiche Number	Title	Author(s)	Date	Ref. Number(s)	Originating Organisation	System	Keywords	Abstract	Technical Value
00495b	THE PFR Mk2 AND Mk3 CONTROL RODS: LIMITATION OF PIN LIFETIMES BY AXIAL INTERACTION BETWEEN THE PELLET STACK AND CLADDING	MOTTERSHEAD D	1983	NDM-2274;MWP/P(83)1152;FRASG/P(83)202	N/A	PFR	MK2, MK3, Control Rod, Pin, Axial Interaction, Pellet Stack, Cladding	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience
00583a.docx	PFR EVAPORATOR WU 1 : A FINAL REPORT ON THE RESULTS OF THE RNL ULTRASONIC ISI CARRIED OUT AT PLANT EVENT NUMBER 33, NOVEMBER 1982	LEYLAND KS;HUDGELL RJ;WILLETTS AJ;BIRCHALL PD;TURNER NA	1983	NDR-1008;MWP/P(84)1527;MWP/FIXSG/P(84)241;MWP/MPSG/P(84)427;EDCC/P(84)110	UKAEA	PFR	Evaporator, WU1, Ultrasonic, ISI	This report is a key reference associated with Steam Generators and the State of the Evaporator Welds	Operation Experience associated with Steam Generators and the State of the Evaporator Welds. Potentially unrepeatable experiments, analysis and experience
00678b	ESTIMATED CRACK GROWTH LIFE AT THE LOWER TUBEPLATE/SHELL JOINT OF THE PFR IHX UNDER THERMAL STRIPING CONDITIONS	GREEN D	1983	TN/P(83)628;PFR/SWP/P(83)39	NNC	PFR	Crack, Tubeplate, Shell Joint, IHX, Thermal Striping	This report is a key reference associated with Intermediate Heat Exchangers IHX, IHX Pods and Reactor Jacket	Operation Experience associated with the Heat Exchangers and Reactor Jackets of a Fast Reactor. Potentially unrepeatable experiments, analysis and experience
13160	PRELIMINARY EXAMINATION OF THE BOWING OF THE PFR CONTROL AND SHUT OFF RODS AND THEIR ASSOCIATED GUIDE TUBES	SIMPSON A		PFR/FEDWP/P(77)529	NPDO	PFR	Bowing, Control, Shut-off Rod, Guide Tubes	This report is a key reference associated with Absorber Rods and Mechanisms	Operation Experience associated Absorber Rods and associated mechanisms within Fast Reactors. Potentially unrepeatable experiments, analysis and experience