

Iowa Electric Light and Power Company
November 4, 1992
NG-92-4540

JOHN F. FRANZ, JR.
VICE PRESIDENT, NUCLEAR

Dr. Thomas E. Murley
Director of Nuclear Reactor Regulation
U. S. Nuclear Regulatory Commission
Mail Station P1-137
Attention: Document Control Desk
Washington, D. C. 20555

Subject: Duane Arnold Energy Center
Docket No.: 50-331
Op. License No.: DPR-49
Semiannual Report for the "Plan for the
Integrated Scheduling of Plant Modifications for
the Duane Arnold Energy Center"

Reference: 1) J. Franz, Jr. letter to T. Murley dated
May 4, 1992, NG-92-1868
2) D. Mineck letter to T. Murley dated
December 23, 1991, NG-91-4093
3) J. Franz, Jr. letter to T. Murley dated
September 11, 1992, NG-92-4048

File: A-278

Dear Dr. Murley:

This letter and attachments provide the semiannual report required by Section V. A. of the "Plan for the Integrated Scheduling of Plant Modifications for the Duane Arnold Energy Center" (the Integrated Plan). This report summarizes our progress in implementing Schedule A and B items, identifies the changes since the last report, summarizes the reasons for schedule changes, and provides updated schedules.

Attachment 1 is a summary of progress in implementing the items listed in Schedules A and B. It lists the items which have been completed since the last update (Reference 1). References to NRC correspondence which describe the completion of these activities are included when available.

Attachment 2 identifies the changes since the last report. These revisions include changes to item descriptions, revision of schedule commitment dates, and the addition of Schedule B items. Attachment 3 identifies items that have been deleted since our last report. Explanations for each of these changes are included in the corresponding attachments.

9211120305 921104
PDR ADDCK 05000331
P PDR

Dr. Thomas E. Murley
November 4, 1992
NG-92-4540
Page 2

Updated Schedules A and B are included as Attachment 4. For each item listed, the specific implementation date is stated and reference is made to the NRC correspondence supporting this date. Also, brief descriptions of those Schedule B items which are not specifically described in other correspondence are included as Attachment 5.

Attachment 5 also provides plans for completion of the Individual Plant Examination of External Events (IPEEE) for Severe Accident Vulnerabilities in accordance with Supplement 4 to Generic Letter 88-20 and References 2 and 3. As described in Reference 2, our schedule for the IPEEE program is strongly dependent on the methodologies we have selected. These methodologies were described in Reference 2 and subsequently found to be acceptable by the NRC staff.

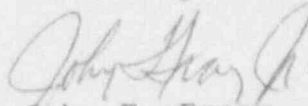
The completion date for the seismic portion of the IPEEE program is based on our schedule for resolution of USI A-46, Verification of Seismic Adequacy of Mechanical and Electrical Equipment. As described in Reference 2, the Duane Arnold Energy Center is classified as a "reduced scope" plant and, as such, the work to be performed for the seismic portions of the IPEEE program closely parallels the efforts of the USI A-46 program. Therefore, the seismic portion of the IPEEE program will be incorporated into the USI A-46 program and completed by November 21, 1995, the scheduled completion date of the USI A-46 program.

The schedule for completion of the remaining (non-seismic) portions of the IPEEE program is based on our current schedule for the next two refueling outages. A large portion of the IPEEE work involves plant walkdowns or relies upon data derived from plant walkdowns of areas not accessible during plant operations. Although we intend to complete the majority of the walkdown efforts during the next refueling outage, currently scheduled for July, 1993, the iterative nature of the IPEEE methodologies necessitates the performance of confirmatory walkdowns during the following refueling outage which is scheduled for the spring of 1995. Therefore, based on the current outage schedules and having sufficient time to review and analyze the necessary data, we intend to complete the non-seismic portions of the IPEEE by November 21, 1995.

Dr. Thomas E. Murley
November 4, 1992
NG-92-4540
Page 3

Please inform us if you have any questions or comments concerning this submittal.

Sincerely,



John F. Franz, Jr.
Vice President, Nuclear

JFF/LKM/pjv*

Attachments: 1. Summary of Progress in Implementing Schedule A and B Items
2. Revisions to the Integrated Plan Schedule
3. Deletions from the Integrated Plan Schedule
4. Updated Schedules A and B
5. Description of Selected Schedule B Items

cc: L. Mattes
L. Liu
L. Poot
R. McGaughy
R. Pulsifer (NRC-NRR)
A. Bert Davis (Region III)
NRC Resident Office
DCRC

SUMMARY OF PROGRESS IN IMPLEMENTING SCHEDULE A AND B ITEMS

The following items, as listed on the Schedules A and B transmitted with the May 4, 1992, Semi-annual Report, have been completed during this reporting period.

Schedule A

- Emergency Response Data System (ERDS) (10 CFR 50, Appendix E)

NOTE: All activities and modifications necessary for Iowa Electric to implement the Emergency Response Data System are complete. We are still, however, awaiting confirmation from the NRC regarding the successful testing of this system.

Schedule B

- Station Blackout Rule Compliance

B3-Schedule Submittal Required by 10 CFR 50.63(c)

B4-Procedure Changes

- Regulatory Guide 1.97

B6-Variable Table Update

- Individual Plant Examination

B7-Containment Performance Analysis

NOTE: The containment performance analysis portion of the Individual Plant Examination is complete. The results of this analysis, however, are to be provided to the NRC in accordance with the schedule provided in item E8 of this submittal. (11/30/92)

- Safety-Related MOV Operability/Testing (GL 89-10)

B9-Completion of Design Basis Reviews and Determination of Correct Switch Settings

- B12-Off-Site Dose Assessment Manual (ODAM) Revision Schedule

- Control Building HVAC and Chillers

B23-Phase 3: Chiller Refurbishment

- Comprehensive Procurement Initiative

B30-Implementation

- Configuration Management Plan/Digital Imaging (DI)

B32-Digital Imaging Phase 2: Establishment of Balance of
Plant Drawings on DI Platform

- Long-Term Commitment Tracking Program

B40-Phase 1: Development of Program Plan

REVISIONS TO THE INTEGRATED PLAN SCHEDULE

- Reference: 1) Letter, J. Franz (IELP) to T. Murley
 (NRC) dated July 31, 1992, (NG-92-3362)
 2) Letter, J. Franz (IELP) to T. Murley
 (NRC) dated July 31, 1992 (NG-92-3319)

<u>Item No.</u>	<u>Description of Change</u>	<u>Explanation</u>
A1	The schedule for revision of the DAEC Radiation Protection Program to reflect new 10 CFR 20 requirements has been revised from 1/1/93 to 1/1/94.	The schedule has been revised as allowed by the August 26, 1992 Federal Register/Vol. 57, No. 166.
B8	The schedule for IPE Report Submittal has been revised from 8/31/92 to 11/30/92.	The schedule has been revised per Reference 1.
B11	The schedule for resolution of USI A-46, Verification of Seismic Adequacy of Mechanical and Electrical Equipment, has been determined. The scheduled completion date is 11/21/95.	Approval of the SCUG methodology by the NRC allowed the determination of this scheduled completion date.
B14	The plans and schedules for completion of Individual Plant Examination of External Events (IPEEE) (GL 88-20) have been added to the Integrated Plan schedule. Attachment 5 provides a description of this project.	Previously, item B14 covered only submittal of plans and schedules for IPEEE.
B16	The schedule for completion of Instrument AC Modeling has been revised from 12/31/92 to 12/31/93.	Schedules for certain Integrated Plan Items related to Long-Term Electrical Enhancements (B16, B20, B21) have been modified. These changes are due to changes in responsibility from contract personnel to Iowa Electric personnel. This necessitated a redistribution of project plans and schedules within

the responsible organization
to accommodate personnel and
budgeting constraints.

- | | | |
|-----|--|---|
| B20 | The schedule for completion of Emergency Diesel Generator Model Enhancements has been revised from 12/31/94 to 12/31/95. | (See explanation for item B16) |
| B21 | The schedule for completion of Electrical Distribution System Model Enhancements has been revised from 12/31/94 to 12/31/95. | (See explanation for item B16) |
| B22 | The schedule for completion of Electrical System Configuration Management Enhancements has been determined to be 12/31/95. | This schedule was determined as part of the evaluation efforts described in item B16. |
| B27 | The schedules of certain milestones related to Technical Specification Improvements, Long-Term Enhancements, have been revised. | As described in Reference 2, the scheduled completion dates for certain milestones have been revised. However, the scheduled completion date for "Long-Term Technical Specification Improvements", 12/31/92, remains unchanged. |
| B41 | The schedule for Phase 2 of Long-Term Commitment Tracking Program, Implementation of Plan, has been determined. The scheduled completion date is 12/31/95. | The scheduled completion date of this project was determined in Phase 1 of this project (Item B40). |

DELETIONS FROM THE INTEGRATED PLAN SCHEDULE

<u>Previous Item Description</u>	<u>Explanation</u>
• B13-Core Stability Studies (BN 38-07)	Iowa Electric continues to monitor the progress of this issue through the BWR Owner's Group. Iowa Electric's plans and schedules for resolution of this issue will be evaluated for addition to the Integrated Plan after the regulatory issues are resolved.
• B25-Plant Life Extension	Plant Life Extension continues to be reviewed. If this becomes a viable option, it will be evaluated for inclusion in the Integrated Plan
• B26-Severe Accident Management	Iowa Electric continues to monitor the progress of this issue through the BWR Owner's Group. This item will be evaluated for addition to the Integrated Plan upon satisfactory resolution of the outstanding regulatory issues.
• F27-Technical Specification Improvements - Long Term Enhancements	Certain proposed changes to the Technical Specifications which are dependent upon NRC approval of generic industry guidelines or Licensing Topical Reports (RTS-187, 232, 250) have been deleted from the Integrated Plan schedule. These proposed changes will be rescheduled after regulatory approval of the various issues. Additionally, the proposed change to Technical Specifications Section 3.7 (Simplification of Appendix J requirements) has been deleted and will be rescheduled upon approval of the revised Appendix J rule.

- B36-Computer Software
Quality Assurance, Phase
3: Software retrofits
Application of software
quality assurance requirements
to existing software will be
coordinated through
department-specific schedules
developed in Phase 2 of this
program. Inclusion of these
individual schedules in the
Integrated Plan is not
appropriate.
- B38-Low Level Radioactive
Waste Storage
Modifications
This item was originally
intended to implement
modifications necessary to
ensure our ability to store
low-level radioactive waste
on-site as of 01/01/93.
However, a burial site will be
available at least until
06/94; therefore these
modifications, which are
storage-container dependent,
are being delayed until on-
site storage is necessary.

INTEGRATED PLAN SCHEDULE

		1992	1993	1994	1995	1996	1997
Item Number	Schedule A, 1991						
		Cycle 12		Cycle 13	Cycle 14		Cycle 15
A1	*Revision to DAEC Radiation Protection Program to reflect new 10 CFR 20 Requirements	R E	K E	•1/1/94	R E		R E
A2	*Revision to DAEC Maintenance Program to reflect new Maintenance Rule (10 CFR 50.65)	F	F		F		•7/10/96
	Schedule B, 1991 NRC Items	U E	U E		U E		U E
	*Security System Upgrades	L	L		L		L
B1	Security Computer System Upgrade		•6/30/93				
B2	Access Control Upgrade		•6/30/93				
	*Containment Performance Improvements	O	O		C		O
B5	Hardened Wetwell Vent (GL 89-16)	U	U		U		U
	Other Containment Performance Improvements	T (Not(1)*)	T		T		T
	*Individual Plant Examination	A	A		A		A
E8	Report Submittal (IPE)		•11/30/92 (NG-92-3362)				
	*Safety-Related MOV Operability/Testing (GL 89-10)	G	G		G		G
B10	Phase 2: Completion of Static/Dynamic Testing	-E-	E	•6/28/94	E		E
B11	*Verification of Seismic Adequacy of Mechanical and Electrical Equipment (USI A-46, GL 89-02)					•11/21/95 (NG-9	
B14	*Individual Plant Examination of External Events (IPEEE)(GL 88-20)					•11/21/95	
	Schedule B, 1991 IELF Initiative Items						
	*Long-Term Electrical Enhancements						
B15	Electrical Fuse Control Program		•12/31/92				

INTEGRATED PLAN SCHEDULE

B16	Instrument AC Modeling	- - - - -	• 12/31/93		
B17	Motor-Operated Valve Thermal Overload Upgrades	- - - - -	• 12/31/92		
B18	Electrical Breaker Coordination (AC and DC)	- - - - -	• 12/31/93		
B19	480 VAC Motor Control Center Upgrades	R - - - - -		R - - - - -	R
B20	Emergency Diesel Generator Model Enhancements	E - - - - -		E - - - - -	E
B21	Electrical Distribution System Model Enhancements	F - - - - -		F - - - - -	F
B22	Electrical System Configuration Management Enhancements	U - - - - -		U - - - - -	U
	• Design Basis Program	- E - - - - -		- E - - - - -	
B24	Phase 1 - ECCS and Selected Safety-Related Systems	L - - - - -		L - - - - -	L
	• Technical Specifications Improvement	O - - - - -	• 9/30/93	O - - - - -	O
B27	Long-term Enhancements	U - - - - -		U - - - - -	U
	• Ultrasonic Examination of Reactor Vessel Beltline Region Welds	- T - - - - -	• 12/31/92	- T - - - - -	- T - - - - -
B28	Phase 3: Vessel Weld Examination	A - - - - -		A - - - - -	A
B29	• Telemetry for Emergency Sirens	G - - - - -		G - - - - -	G
	• Service Water System Enhancements	E - - - - -	• 12/31/93	E - - - - -	E
B31	River Water Supply Pumps	- - - - -	• 12/31/93	- - - - -	
	• Scram Frequency Reduction	- - - - -		- - - - -	
B33	Turbine Electro-Hydraulic Control (EHC) System Improvements	- - - - -		- - - - -	
	• Long-term Instrument & Control Strategy	- - - - -		- - - - -	
B34	Instrument Setpoint Program	- - - - -	• 12/31/93	- - - - -	
	• Computer Software Quality Assurance	- - - - -		- - - - -	

INTEGRATED PLAN SCHEDULE

B35	Phase 2: Development of Departmental Procedures	- - - - - • 12/31/92			
		R	R	R	R
B37	•Emergency Planning Zone (EPZ) Redefinition	-E- - - - -	- E - • 12/31/93	E	E
		F	F	F	F
	•Shutdown Risk Management	J	U	U	U
		E	E	E	E
B39	Phase 2: NUMARC Shutdown Risk Management Guidelines	-L- - - - -	•Prior to Cycle 12 Refuel Outage		L
		O	O	O	O
	•Long-Term Commitment Tracking Program	U	U	U	U
		T	T	T	T
B41	Phase 2: Implementation of Plan	-A- - - - -	- A - - - - - • 12/31/95		
		C	G	C	G
B42	•Vessel Level Instrumentation Modifications	-E- - - - -	E • Prior to Cycle 12 Startup		E

Note 1: Schedule not yet certain. Potential improvements to be evaluated during Individual Plant Evaluation as requested in Generic Letter 89-16.

Description of Selected Schedule B Items

Schedule B

I. NRC Items

• Security System Upgrades

Security Computer System and Access Control Update (B1, B2)

The Physical Security Computer System (PSCS) project consists of upgrading the main security computer hardware, the Central Alarm Station/Secondary Alarm Station (CAS/SAS) operator's consoles, access control, and the Video Switching Sub-system (VSS). The major functions provided by the PSCS will be access control, alarm monitoring and annunciation, security record storage and report generation, security material issue control, and simulator/training.

The PSCS will be a real time, database management system utilizing distributed intelligent processing at both multiplexers and remote control panels.

A new video switching and control system will be provided and will interface with existing fixed and pan/tilt/zoom (PTZ) cameras. The video switching system will become a subsystem to the PSCS and will receive inputs from the host security computers. These inputs will be processed into the proper form for alarm camera/monitor call-up, Close-Circuit Television Camera (CCTV) sequencing, and provide control outputs as required to operate camera equipment and auxiliary functions.

• Safety-Related MOV Operability/Testing (GL 89-10)

This program provides for the testing, inspection and maintenance of MOVs as defined in GL 89-10 (and supplements thereto) to ensure they will function when subjected to conditions that are to be considered during both normal operation and abnormal events within the design basis of the plant.

Phase 2: Completion of Static/Dynamic Testing (B10)

This project involves the static and dynamic testing portion of the GL 89-10 program. Documentation and descriptions of

actual test methods and justifications for the applicable methodology will be included in this phase. This testing will be performed concurrent with the development of design basis documentation.

- Individual Plant Examination of External Events (GL 88-20) (B14)

SEISMIC EVENTS

The Duane Arnold Energy Center is classified by GL 88-20, Supplement 4, as "Reduced scope". The methodology we propose to utilize is the EPRI Seismic Margin Assessment consistent in scope with NUREG 1407, Section 3.2.5, with appropriate consideration of soil site vulnerabilities.

INTERNAL FIRES

In 1991, we participated in a trial application of EPRI's "FIVE" methodology. This methodology will be utilized in conjunction with the IPE Internal Events to address internal fires.

HIGH WINDS AND TORNADOES, FLOODS, AND TRANSPORTATION AND NEARBY FACILITY ACCIDENTS

The screening approach identified in GL 88-20, Supplement 4, Section 4.3 and Figure 1 will be utilized.

II. IELP INITIATIVE ITEMS

The following descriptions of IELP Initiative Items are based on preliminary evaluations of project scope and content. As these projects progress in their planning and implementation, it is expected that actual project scope for some IELP-Initiative items will deviate from the project scope described herein. Minor deviations from the following project descriptions will not be considered as deviations or changes to the Integrated Plan. We will, however, continue to advise the staff of significant changes to project scope or changes in scheduled completion dates.

• Long-Term Electrical Enhancements

Electrical Fuse Control Program (B15)

1. Develop a fuse list drawing which will contain the controller information (size, type, etc.) for fuses.
2. Perform initial walkdowns of panel and motor control center fuses to obtain "nameplate" data.

Instrument AC Modeling (B16)

This project involves the development of a computerized model of the Instrument AC buses to allow for electrical design evaluations including breaker coordination and load flow.

Motor-Operated Valve Thermal Overload Upgrades (B17)

This project involves the development of a thermal overload design standard, evaluation of as-built configurations, reconciliation of any identified discrepancies and implementation of improved configuration of controls in this area.

Electrical Breaker Coordination (AC and DC) (B18)

The Power Systems Analysis effort identified the need for implementing coordinated breaker schemes into the safety related 4160/480 VAC and 125/250 VDC systems. This project will implement these breaker schemes.

480 VAC Motor Control Center Upgrades (B19)

This project will upgrade selected 480 VAC motor control centers to currently available equipment. This project is necessary due to increasing difficulty in obtaining replacement parts for the existing equipment.

Emergency Diesel Generator Model Enhancements (B20)

Enhancements to the Power System's Analysis Emergency Diesel Generator transient model will involve test-loading of the diesel with specialized test equipment to allow for further model enhancements, and implementation of model changes identified during earlier model development.

Electrical Distribution System Model Enhancements (B21)

This project involves expanding the computer model to include the remaining lower-voltage AC circuits, motor overloads, and breaker and fuse coordination schemes.

Electrical System Configuration Management Enhancements (B22)

This project involves developing a new data base which combines the existing data with the electrical equipment data base developed in items 1 and 2 of the "Power Systems Analysis - Basic Model Development" project into a long-term configuration management program.

• Design Basis Program

Phase 1 - ECCS and Selected Safety-Related Systems (B24)

The intent of establishing a Design Basis Program is to organize and collate the design bases information with supporting design information that provides for each system, structure, or component the rationale or "whys" for their functional requirements and controlling parameters. The design bases include assumptions, numerical values, and other information used in the design of any system, structure, or component to assure that functional and regulatory goals are met. Design bases will be stated in concise terms and will focus on the specific functions or bounding parameters of each system, structure, or component. To this end, the objectives of the Design Basis Program are to assemble information concerning system, structures, and components which are important to safety through:

1. An organized review of functional requirements and controlling (bounding) parameters for each system, structure, or component.
2. A comprehensive list of references that support the DAEC's functional requirements and controlling (bounding) parameters.

• Technical Specifications (TS) Improvement Program

In response to both internal and NRC-identified concerns regarding the quality of the DAEC TS, we developed a systematic program to improve the DAEC TS. The primary

goals of our program are to correct identified problems, improve Operator usability (human factors) and to ensure consistency between requirements within the TS. This program makes use of guidance available through NRC-sponsored improvements via Generic Letters, the current Standard Technical Specifications and the Improved Standard Technical Specifications, as well as industry sponsored improvements, such as BWR Owners' Group and NUMARC initiatives.

Long-Term Enhancements (B27)

In addition to the inputs used for the short-term enhancement phase of the program, the long-term enhancements phase also incorporates the recommendations of an outside contractor, who provided an independent assessment of the quality of the DAEC TS. The remaining changes for the Long-Term Enhancement Program are as follows.

RTS-249 Adds requirements for plant shutdown when found in an unanalyzed condition in TS, similar to STS 3.0.3 and adds requirements to address prohibition on plant startup with inoperable TS equipment, similar to STS 3.0.4.

Scheduled Submittal Date: 12/31/92

RTS-197 Clarifies requirements in the Reactor Coolant Systems Chapter (3/4.6), e.g., conductivity monitoring and equilibrium I-131 (E-bar). Also includes NRC GL Line Item Improvements on snubber inspections (GL 90-02) and GL 91-01 on Reactor Vessel specimen removal schedules.

Scheduled Submittal Date: 12/31/92

RTS-243 Reformats Chapter 3/4.8 on electrical systems and revises the station battery surveillances and diesel fuel oil tank level requirements to reflect new calculations.

Scheduled Submittal Date: Complete

RTS-253 Revises the setpoints for the Reactor Protection System Electrical Protection Assemblies (EPAs) to reflect new, upgraded equipment. Also revises the surveillances on the EPAs per NRC GL 91-9.

Scheduled Submittal Date: 12/31/92

The continuation of the Long Term Enhancement program beyond 1992 is directly dependent upon our evaluation of the NRC's Improved TS (NUREG 1344).

- Ultrasonic Examination of Reactor Vessel Beltline Region Welds (B28)

Phase 3: Performance of Vessel Examination.

This 10 year ISI exam of the Reactor Pressure Vessel welds will be conducted in accordance with the governing requirements and regulations required by ASME Section XI and 10 CFR 50.55(a).

- Telemetry for Emergency Sirens (B29)

The addition of telemetry to the Emergency Planning Public Notification System sirens will provide several benefits and increase the level of system control. Some of the benefits are:

1. The status of the siren system can be determined at any time.
2. Activation of a particular siren can be determined.
3. Loss of AC power to a system sector can be identified.

In addition, this system will assist us to minimize or prevent problems similar to those described in NRC IN 90-34.

- Service Water System Enhancements

River Water Supply Pumps (B31)

The purpose of this project is to procure a replacement River Water Pump to allow on-line rebuilding of the River Water Pumps.

The spare pump will allow for systematic refurbishment of the four installed pumps on an individual basis. For example: the spare pump will replace one of the installed pumps; the pump that was replaced by the spare will be refurbished; the refurbished pump will then replace the next installed pump requiring refurbishment. This sequence of events will continue until all pumps including the spare are refurbished. This method of refurbishment will minimize the time a pump is removed from service.

- Scram Frequency Reduction

The purpose of this project is to examine and implement improvements to lower the scram rate of our plant. In 1989, we formed a Scram Frequency Reduction group to review plant operating experience and industry reports and identify improvements in equipment, communications, procedures, and personnel training that can be made to reduce our scram rate in order to be consistent with industry goals. Examples of improvements that have been implemented are the conversion of some turbine trip logic from single incidence to coincident logic (i.e. two-out-of-three logic) and installation of solenoid failure detection for MSIVs and turbine master trip solenoids. Additionally, the following modifications are planned:

Turbine Electro-Hydraulic Control (EHC) System Improvements (B33)

A review of DAEC scram history (1979 - 1990) shows that over 30% of the reactor scrams have been initiated by the turbine/generator systems. The purpose of these modifications is to reduce reactor scrams due to single failure within the EHC system electronics.

- Long-Term Instrument and Control Strategy

Instrument Setpoint Program (B34)

The purpose of this program is to reconstitute the design bases for the instrument setpoints contained in Technical Specifications, and upgrade to the extent practical to new methodology using the ISA 67.04 setpoint methodology. This effort will provide calculations that conform to the new ISA 67.04 methodology and provide the setpoint margins for applicable Technical Specification instruments. Tasks will include the formulation of detailed calculations and

development of a topical design basis document detailing the setpoint methodology used at the DAEC.

- Computer Software Quality Assurance

The purpose of this program is to ensure the quality and integrity of computer software, especially that which can impact safety-related systems, components, and structures at the DAEC. This program is being developed in three phases.

Phase 1: This phase developed and defined a division policy statement and standards for the development, maintenance, and procurement of division software. This phase is complete.

Phase 2: (B35) This project involves the development of departmental-level procedures to implement division-level software configuration management plans. Additionally, software which existed prior to the implementation of division policy and procedures developed in Phase 1 will be reviewed and schedules developed to retrofit the new software Quality Assurance requirements.

- Emergency Planning Zone (EPZ) Redefinition (B37)

The DAEC's Emergency Planning Zone is being redefined into sub-areas to provide greater assurance that adequate protective measures will be taken in the event of a radiological emergency at the DAEC. The sub-areas will be described/defined using well known geographic landmark descriptors within the 10 mile EPZ.

- Shutdown Risk Management

Phase 2: NUMARC Shutdown Risk Management Guidelines (B39)

This phase of the DAEC Shutdown Risk Management Project involves implementation of NUMARC's, "Guidelines to Enhance Safety During Shutdown." Current schedules require plants to address these guidelines prior to any 1993 refueling outage.

- Long-Term Commitment Tracking Program

- Phase 2: Implementation of Plan (B41)

This phase of the Long-Term Commitment Tracking Program will involve activities such as researching industry good-practices, determining hardware and software needs, procuring hardware and software, and refinement of the program plan.

Included in this phase of the Long-Term Commitment Tracking Program will be data compilation and entry. This involves the assembly and input of historical and ongoing commitments and endorsements.

- Vessel Level Instrumentation Modifications (LER 92-001) (B42)

During a review of the effects of high drywell temperatures on vessel level instrumentation in January, 1992, we determined that the High Pressure Coolant Injection (HPCI) and Reactor Core Isolation Cooling (RCIC) system automatic high level trips may not have functioned at high drywell temperatures. To correct for the potential loss of the HPCI and RCIC high level trips at high drywell temperatures, the setpoints on the associated instruments were reduced to ensure high level trips would occur as required. However, due to the large temperature effects on the instruments associated with the instrument lines for one condensing chamber (CC-4562), the setpoints associated with these instruments had to be reduced significantly which caused half of the RCIC and HPCI trip logic to be complete during normal plant operation. As the reduction in the setpoints was not considered to be an acceptable long-term solution, modifications to the instrument lines were planned. The proposed modifications are being implemented in two phases.

- Phase 1: Modifications to instrument lines associated with CC-4562. This phase is complete.

- Phase 2: Modifications to instrument lines associated with CC-4561.