ATTACHMENT 2

BVY 12-080

VERMONT YANKEE
SEISMIC WALKDOWN SUBMITTAL REPORT

Entergy

ENTERGY NUCLEAR
Engineering Report Cover Sheet

Engineering Report Title:

VERMONT YANKEE
Seismic Walkdown Submittal Report
for Resolution of Fukushima Near-Term Task Force Recommendation 2.3: Seismic

Engineering Report Type:

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1.0 SCOPE AND OBJECTIVE

The Great Tohoku Earthquake of March 11, 2011 and the resulting tsunami caused an accident at the Fukushima Dai-ichi nuclear power plant in Japan. In response to this accident, the Nuclear Regulatory Commission (NRC) established the Near-Term Task Force (NTTF), tasked with conducting a systematic and methodical review of NRC processes and regulations and determining if the agency should make additional improvements to its regulatory system. On March 12, 2012 the NRC issued a 10CFR50.54(f) letter (Ref. 10.1) requesting information from all licensees to support the NRC staff's evaluation of several of the NTTF recommendations. To support NTTF 2.3, Enclosure 3 to the 50.54(f) letter requested that all licensees perform seismic walkdowns to gather and report information from the plant related to degraded, non-conforming, or unanalyzed conditions with respect to its current seismic licensing basis.

The Electric Power Research Institute (EPRI), with support and direction from the Nuclear Energy Institute (NEI), published industry guidance for conducting and documenting the seismic walkdowns which represented the results of extensive interaction between NRC, NEI, and other stakeholders. This industry guidance document, EPRI Report 1025286 (Ref. 10.2), hereafter referred to as "the Guidance," was formally endorsed by the NRC on May 31, 2012. Entergy Vermont Yankee Nuclear Power Station (VYNPS) has committed to using this NRC-endorsed guidance as the basis for conducting and documenting seismic walkdowns for resolution of NTTF Recommendation 2.3: Seismic.

The objective of this report is to document the results of the seismic walkdown effort undertaken for resolution of the Fukushima Near Term Task Force (NTTF) Recommendation 2.3, Seismic.

This report summarizes the basis, planning, preparation, execution and findings of the seismic walkdowns and constitutes the "Submittal Report" as described in Section 8 of the Guidance dated June 2012. The objective of the walkdown effort was to provide responses to the 10 CFR 50.54(f) letter issued by the NRC on 3/12/12 (Ref. 10.1). This included walkdowns of a sample of components and walk-bys of associated areas of the plant to identify potentially adverse seismic conditions within the parameters provided in EPRI Report 1025286 (Ref. 10.2). Adverse seismic conditions included those that could, due to a seismic event:

- interfere with/prevent the proper functioning of the subject component
- create the possibility of flood of the subject area
- potentially cause spray on equipment
- potentially cause/enable fires in the subject area and
- cause unanticipated, rapid drain down of the spent fuel pool(s)

A sample population of components for inspection was developed as discussed in Section 6.0. This component sample constituted the Seismic Walkdown Equipment List (SWEL) which satisfies the requirements for sampling as outlined in EPRI Report 1025286.

Using the SWEL, walkdown teams consisting of two Seismic Walkdown Engineers (SWEs) per team walked down the subject components. Results of the walkdowns were recorded on Seismic Walkdown Checklists (SWCs). All accessible items on the SWEL were walked down. Inaccessible items are listed in Section 6.4 and will be walked down when the specific equipment or area is operationally accessible. In addition, an area walk-by (AWB) was performed for each room/area of the plant containing a component listed in the SWEL. Results of the area walk-bys were recorded on Area Walk-by Checklists (AWCs).

Area Walk-bys supplemented the seismic walkdowns and provided for inspections of general areas in the vicinities of the subject equipment. This eliminated tunnel-vision and allowed a vehicle to report other potentially adverse conditions. In cases where multiple SWEL items were located in the same room/area of the plant, a single AWB was conducted. Plant rooms/areas were generally found to be sufficiently compact to allow for robust AWBs under these conditions. In the cases where a component was located in a very large area/room, the walk-by was limited to an area with a radius of approximately 35 feet around the component on the SWEL. The limits of the walk-by for these cases are defined on the Area Walk-by Checklist.

The intent of the walkdowns/walk-bys was to identify potentially adverse seismic conditions with a focus on anchorage and seismic spatial interactions. Potentially adverse seismic conditions were noted on the SWCs and AWCs, and were ultimately entered into the plant's Corrective Action Program (CAP) for documentation, evaluation and resolution.

Results of the component walkdowns and area walk-bys are discussed and summarized in Section 7.0. Copies of the walkdown and walk-by checklists are provided in Attachments C and D.

Section 8.0 contains a discussion of potentially adverse seismic conditions identified during the field inspections. A list of potentially adverse seismic conditions is provided in Attachment E.

Licensing basis evaluations (LBEs) were performed as part of the resolution of the CRs that were initiated to document potentially adverse seismic conditions. The results of the LBEs are discussed in Section 8.0 and additional information is provided in Attachment F.

2.0 SEISMIC LICENSING BASIS SUMMARY

Vermont Yankee Nuclear Power Station (VYNPS) is a boiling water reactor (BWR) located in Vernon, Vermont. The Nuclear Steam Supply System (NSSS) was originally designed by GE and VYNPS began commercial operation in November of 1972, and is currently rated at 1912 MWt power. This section summarizes the seismic licensing basis of structures, systems and components (SSCs) at VYNPS which bound the context of the NTTF 2.3 Seismic Walkdown program.

2.1 Safe Shutdown Earthquake

In accordance with Draft Criterion 2, "Design Bases for Protection Against Natural Phenomena", of 10 CFR 50, Appendix A, structures, systems, and components important to safety are designed to withstand the effects of natural phenomena such as earthquakes without loss of the capability to perform those safety functions necessary to cope with appropriate margin to account for uncertainties in the historical data. Appendix C of the original Final Safety Analysis Report (FSAR) documents that the plant satisfies the earthquake principal design criteria described in draft AEC Criterion 2.

The Safe Shutdown Earthquake (SSE) for VYNPS is based on a recurrence of the largest historical earthquake in the region applied at the closest known location of faulting. It is specifically characterized by a Housner spectral shape anchored at 0.14g (SSE) peak horizontal ground acceleration with vertical accelerations equal to 2/3 of the horizontal ground acceleration (Ref. 10.14).

The damping factors used in the dynamic seismic analysis are given in the Updated Final Safety Analysis Report (UFSAR).

Additionally, the UFSAR Section 1.6.1.1.7 states:

"Based on a three-fold seismic evaluation, the site was found to be relatively quiescent from a seismic standpoint. From these studies the design earthquake has been established at 0.07g horizontal ground acceleration and the maximum hypothetical earthquake at 0.14g horizontal ground acceleration. The seismic evaluation consisted of a review of historical data from the New England area, an analysis of instrument and historical records for the Vermont area, and a study of earthquake intensity attenuation with distance for the northeast United States."

2.2 Design Codes, Standards and Methods

Seismic Input to Structures and Equipment:
VYNPS was designed to withstand the effects of seismic events applicable to Class I systems. The Updated Final Safety Analysis Report (UFSAR) (Ref. 10.14) describes Class I SSCs as those structures, equipment, and components whose failure or malfunction might cause or increase the severity of an accident which would endanger the public health and safety. This category includes those structures, equipment, and components required for safe shutdown and isolation of the reactor. Both the vertical and either of the responses of the two horizontal seismic motions are considered to be applied simultaneously and in combination with all other applicable design loads. The larger combination controls the design.

Structures, Equipment and Components:
Seismic Class I structures applicable to the scope of the NTTF 2.3 Seismic Walkdown Program include the Reactor Building, Control Building, Intake Structure and Emergency Diesel Generator Rooms including day tank enclosures located in the Turbine Building. Seismic design of Class I SSCs is in accordance with Section 12.2 of the UFSAR and Topical Design Basis Document for External Events (Ref 10.15).

Class I equipment analysis considers vertical and horizontal ground motions. The horizontal motion accounts for the equipment elevation above grade and also considers the stiffness of equipment supports. Appendix C to the UFSAR provides the Seismic Class I criteria for equipment and piping design. Appendix A to the UFSAR provides the description, scope and design methodologies for Class I piping systems.

Methodology based on earthquake experience data developed by the Seismic Qualification Utility Group (SQUG) and documented in the Generic Implementation Procedure (GIP), Revision 2, plus any addition to the GIP reviewed and accepted by the NRC for resolving Unresolved Safety Issue (USI) A-46 in response to NRC Generic Letter 87-02, was used to verify the seismic adequacy of equipment included within the scope USI A-46.

An extensive list of design codes, standards, methods, studies and tests utilized for seismic design is provided in the VYNPS UFSAR. A summary of the more relevant references for the design of Seismic Category I structures, systems and components is provided here.

2.2.1 ASME Boiler and Pressure Vessel Code, various sections

2.2.2 American Concrete Institute (ACI) Building Code Requirements for Reinforced Concrete

2.2.3 American Welding Society (AWS) Standard Code for Arc and Gas Welding in Building Construction

2.2.4 American Institute of Steel Construction (AISC) Specification for the Design, Fabrication, and Erection of Structural Steel for Buildings

2.2.5 Uniform Building Code (UBC)

3.0 SEISMIC WALKDOWN PROGRAM IMPLEMENTATION APPROACH

Entergy VYNPS has committed to conduct and document seismic walkdowns for resolution of NTTF Recommendation 2.3: Seismic in accordance with the EPRI Seismic Walkdown Guidance (Ref. 10.2). Entergy developed procedure EN-DC-168, "Fukushima Near-Term Task Force Recommendation 2.3 Seismic Walk-down Procedure" (Ref. 10.13), outlining the guidelines, processes and required documentation generated during the walkdowns. The approach provided in the guidance for addressing the actions and information requested in Enclosure 3 to the 50.54(f) letter includes the following activities, the results of which are presented in the sections shown in parenthesis:

- Assignment of appropriately qualified personnel (Section 4.0)
- Reporting of actions taken to reduce or eliminate the seismic vulnerabilities identified by the Individual Plant Examination of External Events (IPEEE) program (Section 5.0)
- Selection of structures, systems and components (SSCs) to be evaluated (Section 6.0)
- Performance of the seismic walkdowns and area walk-bys (Section 7.0)
- Evaluation and treatment of potentially adverse seismic conditions with respect to the seismic licensing basis of the plant (Section 8.0)
- Performance of peer reviews (Section 9.0)

The coordination and conduct of these activities was initiated and tracked by Entergy corporate leadership, which provided guidance to each Entergy site throughout the seismic walkdown program, including VYNPS. Entergy contracted with an outside nuclear services company to provide engineering and project management resources to supplement and assist each individual site. VYNPS had dedicated engineering contractors, supported by their own project management and technical oversight, who worked closely with plant personnel.

4.0 PERSONNEL QUALIFICATIONS

The NTTF 2.3 Seismic Walkdown Program involved the participation of numerous personnel with various responsibilities. This section identifies the project team members and their project responsibilities, and provides brief experience summaries for each person. Training certificates of those qualified as Seismic Walkdown Engineers are included in Attachment H.

The following table summarizes the names and responsibilities of personnel used to conduct the seismic walkdowns. Experience summaries of each person follow.

Table 4-1

Name	Equipment Selection Personnel	Seismic Walkdown Engineer	Licensing Basis Reviewer	IPEEE Reviewer
Steven Buckley (Vermont Yankee)	X[2]		X	X
Mark Palionis (Vermont Yankee)	X			X
Ed Harms (Vermont Yankee)	X[1]			
Scott Goodwin (Vermont Yankee)			X	
Marcus Hecht-Nielsen (ENERCON/ARES)		X		
Randall Stephens (ENERCON/ARES)		X		
Raymond Tworek (ENERCON/ARES)		X		
Kirit Parikh (ENERCON)		X		
Michael Rose (Vermont Yankee)		X		
David Grimes (Vermont Yankee)		X		

Notes:

1. Plant Operations representative
2. Designated lead SWE

Mr. Steven Buckley

Mr. Buckley is a Professional Engineer (Structural) with over 25 years of seismic design experience in the nuclear power industry. He holds a Bachelor of Science degree in Civil/Structural Engineering from the University of Massachusetts (Lowell MA). Mr. Buckley has completed the "SQUG Walkdown Screening and Seismic Evaluation" training course. He was part of a two man team that performed all the walkdowns required by the USI-A46 and Seismic IPEEE programs at Vermont Yankee Nuclear Power Station.

Mr. Buckley is currently a Senior Civil/Structural/Mechanical Design Engineer for Vermont Yankee, serving as the Lead Engineer for the response to Fukushima-related seismic issues. His primary duties at Vermont Yankee include technical oversight of contracted design projects and serving as lead design engineer for civil/structural/mechanical projects developed in-house. He has performed design related work for Vermont Yankee Nuclear Power Station for more than 20 years.

He provided technical oversight and direction to the SWE teams during performance of the Seismic walkdowns and was the lead engineer responsible for addressing issues documented in the Correct Action Program.

Mr. Mark Palionis

Mr. Palionis is an engineer with over 30 years of experience in the nuclear power industry. He holds a Bachelor of Science degree in Mechanical Engineering from the Polytechnic Institute of Brooklyn, as well as holding Senior Reactor Operator & Shift Technical Advisor Certifications.

Currently, Mr. Palionis is working as a Senior Engineer at Vermont Yankee Nuclear Power Station (Entergy), serving as the Lead Probabilistic Safety Analysis (PSA) Engineer for Vermont Yankee. His primary duties include maintenance and update of the Vermont Yankee PRA model, providing risk assessments as required in support of licensing initiatives (e.g., Tech Spec amendments for changes in system AOT, Operating License changes, etc.), in support of the NRC reactor oversight process (e.g., SDP – Significance Determination Process), and in support of risk-based engineering programs (i.e., ISI, IST, MOV/AOV programs, etc.).

Prior to transitioning to the PSA Engineering Group, Mr. Palionis worked in both the Vermont Yankee System Engineering Department and in the Operations Department. While working in the Operations Department, Mr. Palionis served as a Shift Technical Advisor as well as Senior Operations Engineer, responsible for development and maintenance of the Emergency Operating Procedures and providing oversight of the ISI/IST, E-plan and Fire Protection program functions provided by the Operations Department.

Mr. Palionis also worked for the General Electric Company as a field engineer, providing support for the installation and servicing of GE/Boiling Water Reactors and of GE/Large Steam Turbines and Generators, with principal work experience in the areas of installation and repair of RPV internals and NSS systems for GE/BWRs.

Mr. Ed Harms

Mr. Harms is the Assistant Operations Manager – Support for Vermont Yankee Nuclear Power Station. He has over 18 years of experience in Vermont Yankee Operations Department since joining the Operation Department as an Assistant Ops Manager. He has a Senior Reactor Operator license since 2003. His previous position was Assistant Operations Manager – Training. His current Operations responsibilities include oversight of the budget, procedures, scheduling, hiring process and Correction Action Program issues.

Mr. Scott Goodwin

Mr. Goodwin holds a B.S. Degree in Civil Engineering (Structural) from Lowell Technological Institute. He has over 30 years of nuclear experience both in the field and office at/for numerous utilities, AEs, and consulting firms. Included within this experience, he has held positions in technical supervision and management for 23 years. He was the lead individual for Vermont Yankee as the participating representative to the SQUG organization for development of resolution of USI A-46 under GL 87-02. He has completed the "SQUG Walkdown Screening and Seismic Evaluation" training course. Mr. Goodwin was the manager for implementation of Vermont Yankee's SQUG program and the seismic portion of the IPEEE program.

Marcus Hecht-Nielsen
Mr. Marcus Hecht-Nielsen is a licensed professional engineer with over 7 years experience. He has a B.S degree in Structural Engineering from University of California at San Diego and an M.S. in Structural Engineering also from University of California at San Diego. He is a qualified Seismic Walkdown Engineer who is trained to EPRI Near-Term Task Force (NTTF) 2.3 requirements for performing seismic verification walkdowns of equipment and distribution systems at nuclear power plants and facilities. He is employed by Tobolski Watkins Engineering and has provided seismic qualifications for the US Mixed Oxide Fuel Fabrication Facility for Flanders Corporation. His experience includes many other structural design related projects.

Randall Stephens
Mr. Randy Stephens is a degreed mechanical engineer with nuclear design experience. He is a qualified Seismic Walkdown Engineer who is trained to EPRI Near-Term Task Force (NTTF) 2.3 requirements for performing seismic verification walkdowns of equipment and distribution systems at nuclear power plants and facilities. His experience includes supporting design tasks and special engineering efforts associated with general mechanical systems and components. This includes preparing and/or assisting in the preparation of design drawings, specifications and calculations, and participating on design teams for projects involving the design of equipment, systems, buildings, and facilities.

Raymond Tworek
Mr. Ray Tworek is a degreed mechanical engineer and a qualified Seismic Walkdown Engineer trained to EPRI Near-Term Task Force (NTTF) 2.3 requirements for performing seismic verification walkdowns of equipment and distribution systems at nuclear power plants and facilities. He supports mechanical design activities related to both facilities and specialty hardware for ARES clients across the United States. This support encompasses engineering, design, analysis, fabrication, and testing of structures, systems, and components in the energy, aerospace, and oil & gas industries.

Kirit Parikh
Mr. Kirit Parikh is a degreed Mechanical Engineer with over 30 years experience, most in the nuclear field. He has successfully completed EPRI Training on Near Term Task Force Recommendation 2.3 Plant Walkdowns. He has worked for various companies including many nuclear utilities in United States and abroad. His experience includes pipe support design, plant modifications, as well as home office and field assignments.

David F. Grimes
Mr. Grimes is a Civil engineer with over 29 years of experience in the nuclear power industry. He holds a Bachelor of Science and Masters of Science degrees in Civil Engineering from the Northeastern University (Boston MA). Mr. Grimes is currently a Senior Civil/Structural/Mechanical Design Engineer for Vermont Yankee. His primary duties at Vermont Yankee include technical oversight of contracted design projects and serving as design engineer for Civil/Structural/Mechanical projects developed in-house. He has performed design related work for Vermont Yankee Nuclear Power Station for more than 25 years. He is also responsible for the programmatic monitoring of structures to meet the requirements of the Maintenance Rule Inspection Program.

For this project Mr. Grimes completed walkdowns for the Spent Fuel Pool SWEL 2 items as part of a two man team.

Michael Rose
Mr. Rose has over 2 years experience working for Entergy Vermont Yankee. He holds a Bachelor's degree in Civil/Structural Engineering from the University of Massachusetts. Mr. Rose is currently a Civil/Structural/Mechanical Design Engineer for Vermont Yankee. Major tasks while at Vermont Yankee have included Seismic scaffold package preparation and inspections, Structural portions of Engineering Changes, and calculation preparation.

For this project Mr. Rose assisted in preparation of the Base Lists and SWELs, provided project oversight for the walkdown teams, and completed walkdowns for the Spent Fuel Pool SWEL 2 items as part of a two man team.

4.1 Equipment Selection Personnel

A total of 3 individuals served as Equipment Selection Personnel – see Table 4-1.

4.2 Seismic Walkdown Engineers

A total of 6 individuals served as Seismic Walkdown Engineers – see Table 4-1.

4.3 Licensing Basis Reviewers

A total of 2 individuals served as Licensing Basis Reviewers – see Table 4-1.

4.4 IPEEE Reviewers

A total of 2 individuals served as IPEEE Reviewers – see Table 4-1.

The IPEEE review was performed by plant personnel led by Mr. Steven Buckley with support from Mark Palionas (PRA Group), both from Vermont Yankee.

4.5 Peer Review Team

Table 4-2 summarizes the names and responsibilities of personnel used to conduct peer reviews of the seismic walkdown program. Experience summaries of each person follow.

Table 4-2

Name	SWEL Peer Reviewer	Walkdown Peer Reviewer	Submittal Report Peer Reviewer
Julien Abramovici (ENERCON)	X[1]	X[1]	
Juan Vizcaya (ENERCON)		X	X[2]
Laura Maclay (ENERCON)	X		
Jeffrey Horton (ENERCON)			X

Notes:
1. SWEL and Walkdown Peer Review Team Leader
2. Submittal Peer Review Team Leader

Peer Review Team Leader

Mr. Julien Abramovici

P.E. has over 39 years of nuclear power plant experience. He held various positions such as component engineer, system engineer, manager of mechanical components and many others. Presently Mr. Abramovici is employed by ENERCON where he is a consulting engineer. During his career, Mr. Abramovici was involved with many aspects related to seismic adequacy of components and structures, such as IEB 80-11, component seismic qualifications, 3rd party reviews of seismic stress reports and seismic qualification testing, piping analysis, etc. Mr. Abramovici also performed and reviewed many 50.59 evaluations as well as Root Cause Evaluations.

SWEL Peer Reviewer

Laura Maclay

Ms. Maclay has over three years of experience as a structural engineer with Enercon Services and holds a Bachelor's degree in Structural Engineering from Drexel University. Her tasks have ranged from assisting with the development and preparation of design change packages to performing design calculations and markups, comment resolutions, and drawing revisions. She spent a year on site at Turkey Point Nuclear Plant preparing structural evaluations of SSC's for an Extended Power Uprate (EPU). She designed safety related supports for computer and electrical equipment for the Turbine Digital Controls Upgrade package and other similar packages. Her responsibilities also included the review of calculations, drawings and vendor documentation for the seismic evaluation of the Unit 3 Palfinger Crane inside containment and new platforms in the High Pressure Turbine enclosure.

Recent work includes Fukushima flooding walkdowns at Limerick Generating Station and seismic walkdowns at Plant Farley. As a member of a two person team, she was responsible for evaluating equipment anchorage, special interactions and any other potentially adverse conditions.

Walkdown Peer Reviewer

Mr. Juan Vizcaya

Mr. Vizcaya has over 30 years of structural engineering and design experience. He has significant experience being the structural lead engineer on ISFSI projects and overall nuclear plant modifications and has a wide range of design/engineering experience. Projects range from the seismic analysis and design of concrete and steel structures and concrete pads to the analysis and design and restraint systems for a vertical cask vendor stack-up configurations. Other projects include heavy load drop assessments and the analysis and design of protective structures, foundations and various mechanical and structural modifications using sophisticated finite element models. Mr. Vizcaya is skilled at using finite element analyses in the design process, and at the practical design of mechanical components, along with concrete and steel structures. He leads a group structural staff on issues involving structures, stress analysis, and site work such as layout, excavation, roads, drainage and subterranean structures.

Licensing Basis Peer Reviewers
Seismic Licensing Peer Reviewers were Mr. Steven Buckley and Mr. Scott Goodwin.

Submittal Peer Reviewer

Mr. Jeffrey Horton P.E

Mr. Jeffrey Horton P.E. served as report reviewer. Mr. Horton is a Register Professional Engineer with over 39 years' experience in the nuclear industry doing structural design. He holds a B.S. in Aerospace Engineering from Parks College of St Louis University in Missouri and a M.S. in Material Science specializing in Solid Mechanics from Rutgers University in New Jersey. Mr. Horton leads a group structural staff on issues involving pipe stress analysis, pipe support analysis and vessel analysis.

Submittal Report peer reviewers were Mr. Juan Vizcaya and Mr. Jeffrey Horton P.E. Mr. Vizcaya bio is presented above, as he served also as a Walkdown Peer Reviewer.

5.0 IPEEE VULNERABILITIES REPORTING

During the IPEEE program in response to NRC Generic Letter 88-20 (Ref. 10.3), plant-specific seismic vulnerabilities were identified at many plants. In this context, "vulnerabilities" refers to conditions found during the IPEEE program related to seismic anomalies, outliers, or other findings.

The IPEEE final report (Ref. 10.10) and supporting documentation was reviewed to identify items determined to present a seismic vulnerability. The IPEEE Reviewers then reviewed additional plant documentation to identify the eventual resolutions to those seismic vulnerabilities not resolved when the IPEEE report was submitted.

The seismic vulnerabilities identified for VYNPS during the IPEEE program are reported in Attachment A. A total of five seismic vulnerabilities were identified by the VYNPS IPEEE program. For each identified seismic vulnerability, the table in Attachment A includes three pieces of information requested by Enclosure 3 of the 50.54(f) Letter:

- A description of the action taken to eliminate or reduce the seismic vulnerability
- Whether the configuration management program has maintained the IPEEE action (including procedural changes) such that the vulnerability continues to be addressed
- When the resolution actions were completed.

The list of IPEEE vulnerabilities provided in Attachment A was used to ensure that some equipment enhanced as a result of the IPEEE program were included in SWEL 1. Documents describing these equipment enhancements and other modifications initiated by identification of IPEEE vulnerabilities were available and provided to the SWEs during the NTTF 2.3 Seismic Walkdowns.

6.0 SEISMIC WALKDOWN EQUIPMENT LIST DEVELOPMENT

This section summarizes the process used to select the SSCs that were included in the Seismic Walkdown Equipment List (SWEL) in accordance with Section 3 of the Guidance. A team of equipment selection personnel with extensive knowledge of plant systems and components was selected to develop the SWEL. The SWEL is comprised of two groups of items:

- SWEL 1 consists of a sample of equipment required for safe shutdown of the reactor and to maintain containment integrity (i.e., supporting the five safety functions)
- SWEL 2 consists of items related to the safety related spent fuel pool system

The final SWEL is the combination of SWEL 1 and SWEL 2. The development of these two groups is described in the following sections.

Sample of Required Items For The Five Safety Functions

Safe shutdown of the reactor involves four safety functions:

- Reactor reactivity control (RRC)
- Reactor coolant pressure control (RCPC)
- Reactor coolant inventory control (RCIC)
- Decay heat removal (DHR)

Maintaining containment integrity is the fifth safety function:

- Containment function (CF)

The overall process for developing a sample of equipment to support these five safety functions is summarized in Figure 1-1 of the Guidance. Figure 1-1 of the Guidance provides a screening method for selecting SSCs, starting with all of the plant SSCs and reducing the number based on a series of screening criteria. The equipment coming out of Screen #3 and entering Screen #4 is defined as Base List 1. The equipment coming out of Screen #4 is the first Seismic Walkdown Equipment List, or SWEL 1. Development of these lists is described separately in the following sections:

6.1 Base List

A spreadsheet was developed to tabulate the total number of equipment for each of the twenty two (22) GIP equipment classes. The total equipment number was approximately 750 items. The target number of equipment for the SWEL 1 list is approximately 100 to 110 items. Therefore, approximately 15 % of the original A46/IPEEE equipment will be used to develop the SWEL 1 list to perform seismic verification of the equipment.

Based on Figure 1-1 and Section 3 of the Guidance, Base List 1 should represent a set of Seismic Category (SC) I equipment or systems that support the five safety functions. The IPEEE program was intended to address the seismic margin of SSCs associated with each of the five safety functions. At Vermont Yankee Nuclear Station, the EPRI Seismic Margin Assessment (EPRI SMA) method was used to complete the seismic IPEEE program, based on EPRI Report NP-6041 titled "A Methodology for assessment of Nuclear Power Plant Seismic Margin." As described in Section 3.2.2.1 of the Vermont Yankee Nuclear Station IPEEE report (Ref. 10.10), an equipment list was developed representing the SSCs necessary for one preferred and one alternate "success path" capable of achieving and maintaining a safe shutdown condition for at least seventy-two hours following a SSE event. This equipment list of SSCs on the success paths is consistent with the requirements of Screens #1 through #3 of the Guidance. Therefore, the IPEEE equipment list of SSCs on the success paths is used as a starting point for the NTTF 2.3 Seismic Walkdown Base List 1.

Base List 1 is presented in Table 9.4.1 of Attachment B, and has 736 total items.

6.2 SWEL 1

Based on the target of 105 items, each equipment class total was factored down by 15% to obtain an idealized number of equipment in each equipment class to be selected to maintain the same equipment diversity as the original A46/IPEEE equipment list.

In parallel with the above, a risk ranking assessment was performed to determine the most risk significant equipment from the A46/IPEEE list. This assessment method (see Attachment J) resulted in the assignment of risk value to A46/IPEEE SSEL equipment. The equipment was sorted to identify all equipment that exceeded a pre-determined risk threshold.

The above equipment sort for equipment risk ranking fulfills the risk ranking requirement shown in Reference 10.2, Figure 1-1 graphic that defines the process to develop the SWEL 1 list. This risk ranking fulfills the requirement to select equipment that supports the 5 required safety functions

The resultant risk ranking listing contained redundant trains of multiple systems. Each equipment type on the risk ranking list was selected to cover the maximum amount of building areas where the system are located. For example, both A & B EDG components were selected to cover all areas of each room and any unique features such as the EDG B penthouse louvers located on the roof of the EDG B room. The RHR equipment in the corner rooms of the Reactor Building was selected to minimize dose exposure for the walkdown personnel and have equipment on each level of each corner room. Once the risk significant equipment was represented the "Sample Considerations screen was applied. Throughout the application of this screen, dose surveys for the equipment areas were reviewed to ensure equipment in the lower dose areas were selected if there was an option.

During application of the above screens the overall GIP equipment class percentages were maintained to ensure equipment diversity and representation of the makeup of the original A46/ IPEEE equipment list.

Equipment with anchorage modifications as a result of the A46/IPEEE programs were selected whenever possible to complete the target number in each equipment classification. These modifications were designed to IPEEE seismic levels and thereby are considered an IPEEE enhancement. In addition, two new components were added that were not on the original A46/IPEEE lists. One component is a new inverter that replaces a battery & charger system and the other is a new nitrogen bottle system used to support Safety Relief Valve (SRV) actuation from outside the primary containment. Equipment was also selected to ensure adequate representation from various environments. Specifically, Based on Figure 1-1 and Section 3 of the Guidance, SWEL 1 should represent a diverse population of items on Base List 1 including representative items from some of the variations within each of five sample selection attributes. Additionally, the selection of SWEL 1 items includes consideration of the importance of the contribution to risk for the SSCs. Equipment Selection Personnel developed SWEL 1 using an iterative process. The following paragraphs describe how the equipment selected for inclusion on the final SWEL 1 are representative with respect to each of the five sample selection attributes while also considering risk significance. In general, preference for inclusion on SWEL 1 was given to items that are accessible and have visible anchorage while still maintaining the sample selection attributes.

SWEL 1 is presented as Table 9.4.2 in Attachment B, and has 102 total items.

Variety of Types of Systems

Items were selected from Base List 1 ensuring that each of the five safety functions was well represented. Additionally, components from a variety of frontline and support systems, as listed in Appendix E of the Guidance, were selected. The system type of each item on SWEL 1 is listed on Table 9.4.2 of Attachment B.

Major New and Replacement Equipment

With assistance from Plant Operations, Equipment Selection Personnel identified items on Base List 1 which are either major new or replacement equipment installed within the past 15 years, or have been modified or upgraded recently. These items are designated as such on Base List 1 in Table 9.4.1 of Attachment B. A robust sampling of these items is represented on SWEL 1.

Variety of Equipment Types

According to Appendix B of the Guidance, there are 22 classes of mechanical and electrical equipment. The items on Base List 1 were classified accordingly and the total number from each class was determined. Items were then selected from Base List 1 ensuring that each of the equipment classes represented there was also represented on SWEL 1 in approximately the same ratios. The equipment class of each item on SWEL 1 is listed on Table 9.4.2 of Attachment B.

Variety of Environments

Items were selected from Base List 1 located in a variety of buildings, rooms, and elevations. These item locations included environments that were both inside and outside, as well as having high temperature and/or elevated humidity and within containment. The location and environment of each item on SWEL 1 is listed on Table 9.4.2 of Attachment B.

IPEEE Enhancements

With assistance from IPEEE Reviewers, Equipment Selection Personnel identified items on Base List 1 which were enhanced as a result of seismic vulnerabilities identified during the IPEEE program. These items are designated as such on Base List 1 in Table 9.4.1 of Attachment B. Several of these items are represented on SWEL 1.

Risk Significance

Information from the plant Probabilistic Risk Analysis (PRA) model was used to determine whether items were risk significant (see Attachment J for details). Where otherwise comparable items could be chosen relative to the sample selection attributes, the item with higher risk significance was chosen.

6.3 Spent Fuel Pool Items

The overall process for developing a sample of SSCs associated with the spent fuel pool (SFP) is similar to that of the screening process for SWEL 1 and is summarized in Figure 1-2 of the Guidance. The equipment coming out of Screen #2 and entering Screen #3 is defined as Base List 2. The items coming out of Screen #4 are the items that could potentially cause the SFP to drain rapidly. The items coming out of either Screen #3 or Screen #4 are the second Seismic Walkdown Equipment List, or SWEL 2. Development of these lists is described separately in the following sections.

The process for selecting spent fuel pool related items is illustrated in Figure 1-2 of Reference 10.2. This process produces the second Seismic Walkdown Equipment List (SWEL 2).

6.3.1 Base List 2

The following drawings were reviewed to determine the scope of systems and equipment associated with the SWEL 2 development:

G-191173 Sheet 1, Rev. 40, "Flow Diagram Fuel Pool Cooling & Clean Up System"

G-191173 Sheet 2, Rev. 10, "Flow Diagram Fuel Pool Cooling & Clean Up System"

G-191218, Rev. 12, "Reactor Fuel Storage Pool Piping Plan"

5920-00280, Rev. 11, "Arrangement Refueling Facilities"

G-191688, Rev. 10, "Reactor Building Pool Liner & Gates – SH 1"

G-191689, Rev. 7, "Reactor Building Pool Liner & Gates – SH 2"

G-191690, Rev. 3, "Reactor Building Pool Liner & Gates – SH 3"

G-191691, Rev. 9, "Reactor Building Pool Liner & Gates – SH 4"

5920-06889, Sheet 1 of 3, "Fuel Storage Rack Arrays – Sheet 1"

Base List 2 is presented in Table 9.4.3 of Attachment B.

6.3.2 Rapid Drain Down

A review of spent fuel pool drawings was performed to assess any potential rapid drain down paths. One determination was to review these drawings to identify any Spent Fuel Pool (SFP) penetrations below about 10 feet above the top of fuel assemblies. The result of the review confirmed there are no penetrations meeting the above criteria in the SFP.

It was noted that during refueling operations when the SFP is communicating with the flooded reactor cavity there is a potential drain path from the reactor cavity drain lines.

Yankee Atomic Electric Company (YAEC) Report #1493, "Vermont Yankee Nuclear Power Plant Evaluation of Potential Failures of the Spent Fuel Pool Storage System", was prepared in response to IE Bulletin 84-03, "Refueling Cavity Water Seal". This report evaluates the potential for, and consequences of, a cavity seal failure. It considered the potential drain paths through attached piping for the fuel pool, refueling cavity and dryer separator storage pit. The

"Seismic Event" section evaluates this piping. The seismic piping is concluded to be adequate and the failure of the non-seismic piping is considered a "very unlikely scenario and conservative assumption". The postulated failure of all non-seismic drain lines was addressed by evaluating inventory loss rate and available makeup source rates. It was concluded this connected piping failure would drain the top 6 feet of the SPF in 54 minutes with no Operator action and the makeup capacity exceeds the leak rate capacity

6.3.3 SWEL 2

The first screen of Seismic Category I (SCI) equipment limits the scope to the Standby Fuel Pool Cooling System and associated SCI support equipment. A review of G-191173 flow diagrams provided the source for the identification of SCI equipment. Using sampling considerations defined in Reference 10.2, the resulting equipment is a pump, valve, heat exchanger, control panel and instrument rack and associated indicating instruments. A total of eleven (11) components were selected. SWEL 2 is presented in Table 9.4.5 of Attachment B.

6.4 Deferred, Inaccessible Items on SWEL

Each item on the SWEL shall be walked down as part of the NTTF 2.3 Seismic Walkdown program. In order to perform the seismic walkdowns of these items, it is necessary to have access to them and to be able to view their anchorage. In some cases, it was not feasible to gain access to the equipment or view its anchorage because Vermont Yankee Nuclear Station was at power during the entire 180-day response period of Enclosure 3 to the 50.54(f) letter. For these cases, walkdowns of these items have been deferred until the next refueling outage (RFO 30) in March of 2013. An updated submittal report incorporating these deferred walkdowns will be provided within 90 days from the end of RFO 30.

Deferred items are summarized in the table below. A total of 13 items are deferred due to lack of access (high radiation areas). Eight (8) items are in the Steam Tunnel and five (5) items are in the Drywell.

SWEL#	Equipment ID	Description	Location	Reason
SWEL-1-029	V23-15	HPCI/STEAM SUPPLY MOV	DRYWELL 266'	High rad.
SWEL-1-041	TE-16-19-030A	DW TEMPERATURE INDICATION	DRYWELL 268'	High rad.
SWEL-1-052	V2-80D	MAIN STEAM/INBOARD MSIV	DRYWELL 254'	High rad.
SWEL-1-055	RV-2-71C	MAIN STEAM/RELIEF VALVE	DRYWELL 275'	High rad.
SWEL-1-057	S-2-13A	SAFETY RELIEF VALVE/NITROGEN SUPPLY ACCUMULATOR	DRYWELL 275'	High rad.
SWEL-1-030	V23-16	HPCI/STEAM SUPPLY MOV	STEAM TUNNEL 251'	High rad.
SWEL-1-053	V2-86A	MAIN STEAM/IOUTBOARD MSIV	STEAM TUNNEL 251'	High rad.
SWEL-1-054	S-2-6A	MAIN STEAM/IOUTBOARD MSIV INSTRUMENT AIR SUPPLY ACCUMULATOR	STEAM TUNNEL 251'	High rad.

SWEL#	Equipment ID	Description	Location	Reason
SWEL-1-073	TS-23-101A	HPCI/STEAM LEAK DETECTOR	STEAM TUNNEL 251'	High rad.
SWEL-1-074	TS-23-102A	HPCI/STEAM LEAK DETECTOR	STEAM TUNNEL 251'	High rad.
SWEL-1-075	TS-23-103A	HPCI/STEAM LEAK DETECTOR	STEAM TUNNEL 251'	High rad.
SWEL-1-076	TS-23-104A	HPCI/STEAM LEAK DETECTOR	STEAM TUNNEL 251'	High rad.
SWEL-1-077	SE-2-86A-1	MS/OUTBOARD MSIV SOLENOID AC/DC	STEAM TUNNEL 251'	High rad.

7.0 SEISMIC WALKDOWNS AND AREA WALK-BYS

The NTTF 2.3 Seismic Walkdown Program, conducted in accordance with the Guidance, involves two primary walkdown activities: Seismic Walkdowns and Area Walk-Bys. These activities were conducted at VYNPS by teams of two trained and qualified Seismic Walkdown Engineers (SWEs) (see Section 4.0). Each team included one engineer with at least several years of experience in seismic design and qualification of power plant SSCs. A total of three SWE teams were used. Each walkdown team was accompanied by at least one plant representative to assure personnel and equipment safety, and support maximum application of ALARA principles.

The seismic walkdowns and area walk-bys were conducted over the course of 3 weeks during October of 2012. Each morning, a pre-job brief with all personnel involved was conducted. This pre-job brief was used to outline the components and areas that would be walked down that day, to ensure consistency between the teams, to reinforce expectations, to identifying potential personnel safety issues specific to that day, and to allow team members to ask questions and share lessons learned in the field. The SWE teams brought cameras, tape measures, flashlights and, mirrors, as well as the required forms and supporting drawings into the field to assist with the seismic walkdowns and area walk-bys.

7.1 Seismic Walkdowns

Seismic walkdowns were performed in accordance with Section 4 of the Guidance for all items on the SWEL (SWEL 1 plus SWEL 2), except for those determined to be inaccessible and deferred. To document the results of the walkdown, a Seismic Walkdown Checklist (SWC) with the same content as that included in Appendix C of the Guidance was created for each item. Additionally, photographs were taken of each item and included on the corresponding SWC.

The SWE teams conducted preliminary "scouting" walkdowns to get a general understanding of plant layout and to identify items on the draft SWEL that were inaccessible. One item that was identified to be inaccessible on these "scouting" walkdowns was a valve covered in insulation. After discussion with the Equipment Selection Personnel, the valve was replaced with another valve in similar environment while ensuring that the overall integrity of the final SWEL was not compromised.

Prior to performance of the walkdowns, documentation packages were developed that contained the pre-filled SWC and other pertinent information including the location drawings, response spectra information, previous A-46 and IPEEE seismic walkdown documentation, and anchorage drawings where applicable. These documentation packages were brought with the

SWE teams into the plant during the seismic walkdowns.

Walkdown inspections focused on anchorages and seismic spatial interactions, but also included inspections for other potentially adverse seismic conditions. Anchorage, in all cases, was considered to specifically mean anchorage of the component to the structure. This included anchor bolts to concrete walls or floors, structural bolts to structural steel and welds to structural steel or embedded plates. For welds, the walkdown team looked for cracks and corrosion in the weld and base metal. Other bolts or connections, such as flange bolts on in-line components were not considered as equipment anchorage. These bolts and connections were evaluated by the SWEs and any potential adverse seismic concerns were documented under "other adverse seismic conditions" rather than under "anchorage". Thus, components with no attachments to the structure are considered as not having anchorage. Nevertheless, the attachment of these components to other equipment was evaluated and inspected for potentially adverse seismic conditions.

Cabinets/panels on the SWEL that could be reasonably opened without presenting safety or operational hazards were opened during the walkdown. This allowed visual observation of internal anchorage to the structure (where present), as well as inspection for "other adverse seismic conditions" related to internal components if it could be observed without breaking the plane of the equipment being opened. Where opening the cabinet/panel required extensive disassembly (e.g., doors or panels were secured by more than latches, thumbscrews, or similar), justification for how the inspection met the program goal without opening the cabinet/panel was included on the SWC and the walkdown of that item is considered complete.

In addition to the general inspection requirements, at least 50% of the SWEL items required confirmation that the anchorage configuration was consistent with plant documentation. Of the 100 SWEL items inspected, 53 anchorage inspections were conducted and documented which is greater than the 50% requirement. When anchorage configuration verification was conducted, the specific plant documentation used for comparison to the as-found conditions was referenced on the SWC.

The SWC for each SWEL item where a seismic walkdown has been initiated is included in Attachment C. A total of 100 SWCs are attached; 100 with completion status marked "Y" and 0 with completion status marked "N". Therefore, the 100 completed SWCs represent the completed walkdowns of each SWEL item accessible during the walkdown period.

A total of eighty-nine (89) items were walked down for SWEL 1 and eleven (11) for SWEL 2. Thirty nine (39) Area Walk-By were also performed.

It should be noted that SWEL 1 contains 102 items with 13 out of the 102 items (8 in the Steam Tunnel and 5 in the Drywell) deferred to the next refueling outage due to access and ALARA considerations. Seven of these 13 deferred SWEL 1 items will include an anchorage configuration verification. There were no deferred items for SWEL 2.

Area Walk-Bys

Seismic area walk-bys were performed in accordance with Section 4 of the Guidance for all plant areas containing items on the SWEL (SWEL 1 plus SWEL 2) except for those SWEL items located in plant areas inaccessible during the walkdown period. A separate Area Walk-

By Checklist (AWC) with the same content as that included in Appendix C of the Guidance was used to document the results of each area walk-by performed. Photographs were taken of each area, and included on the corresponding SWC.

Area walk-bys were conducted once for plant areas containing more than one SWEL item. In cases where the room or area containing a component was very large, the extent of the area encompassed by the area walk-by was limited to a radius of approximately 35 ft. around the subject equipment. The extent of the areas included in the area walk-bys is described on the AWC for that area. Because certain areas contained more than one SWEL item, there are fewer total area walk-bys conducted than seismic walkdowns. A total of 39 area walk-bys were necessary to cover all plant areas containing at least one accessible SWEL item.

The AWC for each area walk-by completed is included in Attachment D. A total of 39 AWCs are attached, which represent all of the areas containing a SWEL item that were accessible during the walkdown period. An additional 5 estimated area walk-bys of areas inside the Drywell and Steam Tunnel will be completed together with the deferred walkdowns for those inaccessible items.

8.0 LICENSING BASIS EVALUATIONS

During the course of the seismic walkdowns and area walk-bys, the objective of the SWE teams was to identify existing degraded, non-conforming, or unanalyzed plant conditions with respect to its current seismic licensing basis. This section summarizes the process used to handle conditions identified, what conditions were found, and how they were treated for eventual resolution.

Condition Identification

When an unusual condition was observed by a SWE team in the field, the condition was noted on the SWC or AWC form and briefly discussed between the two SWEs to agree upon whether it was a potentially adverse seismic condition. These initial conclusions were based on conservative engineering judgment and the training required for SWE qualification.

For conditions that were reasonably judged as insignificant to seismic response, the disposition was included on the SWC or AWC checklist and the appropriate question was marked "Y", indicating that no associated potentially adverse seismic condition was observed. Unusual or uncertain conditions were reported to site personnel for further resolution through the Corrective Action Program (CAP). A total of 131 seismically insignificant conditions were identified. These conditions were generally related to either housekeeping or minor non-consequential degradation. No seismically significant conditions were found.

Unusual conditions that were potentially seismically significant were entered into the CAP directly. Further resolution of these conditions is not tracked or reported as part of the NTTF 2.3 Seismic Walkdown program, except by noting the CR numbers generated on the applicable SWCs and AWCs.

8.1 Licensing Basis Evaluations

There were no Licensing Basis Evaluations required. All unusual conditions were entered into the CAP system immediately and dispositioned for operability, with no operability issues identified.

8.2 Corrective Action Program Entries

The following CRs were generated:

CR-VTY-2012-04979:
MCC-8B panels have loose/missing screws; Condition: During Fukushima seismic walkdowns in the Reactor Building 280' Elevation, the inspection team noted two loose panel screws and one missing cubicle screw on MCC-8B. Requirement not met: All available panel fasteners need to be secured.

CR-VTY-2012-04816:
Two loose panel screws (2 OF 3) on MCC-9A and EDG A Voltage Regulator Cabinet panel door screw (1 of 4) not engaged.

CR-VTY-2012-04870:
Junction box B679 SII (EDG A Day Tank room) missing two of four cover screws and EDG A skid has a ¾" drain line from SR-24-1A relief valve to the floor drain with a disengaged support clip.

CR-VTY-2012-05006:
Junction Box B-666 has missing cover screws
Condition: During Fukushima seismic walkdowns in the Reactor Building 252 Elevation, the inspection team noted four of eight cover screws are missing on Junction Box B-666. Requirement not met: All fasteners should be installed

CR-VTY-2012-05007:
During Fukushima seismic walkdowns on Reactor Building floor elevation 303', an interior panel inspection was performed on the 24V DC-ECCS panel mounted on column line (10,11z), south side of the column. One of the four nuts that secure the interior mounting panel was engaged only half the depth of the nut. Requirement: Full thread engagement of nut

CR-VTY-2012-05008:
Nitrogen supply tanks CYL-72-1A and CYL-72-1B have loose nuts on mounting U-bolts
Condition: During Fukushima seismic walkdowns in the Reactor Building 252 Elevation, the inspection team noted three loose nuts on CYL-72-1A and CYL-72-1B mounting system. Requirement not met: All nuts should be securely fastened.

CR-VTY-2012-5091:
During Fukushima seismic walkdowns on the HPCI Turbine skid located on the Reactor Building floor elevation 213'-9", it was identified that some of the ten anchorage locations have grout between the bottom of the skid support (channel shaped steel attachment) and the surface of the foundation and some do not. Grout is not required under the channel steel per the attached Operability Recommendation.

CR-VTY-2012-5097:
During Fukushima seismic walkdowns in the Control Room, the inspection team noted 4 missing panel screws on CRP-9-46 during the area walk-by.

CR-VTY-2012-5099:
During Fukushima seismic walkdowns surface corrosion was observed on Valve CV-3-126-10-27 associated with HCU 10-27 (north bank) at the bonnet and yoke body interface area. Corrosion in a tapped hole of the yoke body was identified as a source.

CR-VTY-2012-5118:
During Fukushima seismic walkdowns in the Reactor Building, HPCI Room for Rack 25-50B, the inspection team noted one of four screws attaching the PI-23-81 mounting plate to the rack was missing. The three remaining screws are securely fastened.

CR-VTY-2012-5126:
During Fukushima seismic walkdowns in the Cable Vault, the inspection team noted two of 15 cover screws are missing on the west edge of Junction Box B-638.

CR-VTY-2012-5369:
During Fukushima seismic walkdowns in the West Switchgear Room, the inspection team noted that the ladder support mounted on the south block wall (G-191627-22) is starting to pull away from the wall.

CR-VTY-2012-5371:
During Fukushima seismic walkdowns in the Fuel Pool Cooling Heat Exchanger Room, the inspection team noted poor housekeeping including; ladders stored on the floor that are not tagged per Procedure AP-0019, multiple bags of RAD trash, empty tool bucket, and other out of place small work tools in the room.

All above CRs were evaluated immediately for operability and determined to be operable. All CRs are closed and have been rolled-up to CR-VTY-2012-5021 Rollup Condition Report for "Minor" Equipment Issues Identified during Tier 1 Seismic Walkdown.

CR-VTY-2012-5021:
Rollup Condition Report for "Minor" Equipment Issues Identified during Tier 1 Seismic Walkdown

This CR provides a roll-up of minor equipment issues identified during the NRC Tier 1 (2.3) Seismic Walkdowns. The CAs identified requires performance of minor maintenance. The CAs that are initiated ensure that the required Work Orders are properly prioritized and executed.

8.3 Plant Changes

There are no changes required as a result of this effort.

9.0 PEER REVIEW

This section summarizes the process and results of each peer review activity.

9.1 Peer Review Process

The peer review for the NTTF Recommendation 2.3 Seismic Walkdowns was performed in accordance with Section 6 of the Guidance. The peer review included an evaluation of the following activities:

- review of the selection of the structures, systems, and components, (SSCs) that are included in the Seismic Walkdown Equipment List (SWEL);
- review of a sample of the checklists prepared for the Seismic Walkdowns and area walk-bys;
- review of licensing basis evaluations and decisions for entering the potentially adverse conditions in to the plant's Corrective Action Plan (CAP); and
- review of the final submittal report.

At least two members of the peer review team (see Section 4.5) were involved in the peer review of each activity, the team member with the most relevant knowledge and experience taking the lead for that particular activity. A designated overall Peer Review Team Leader provided oversight related to the process and technical aspects of the peer review, paying special attention to the interface between peer review activities involving different members of the peer review team.

9.2 Peer Review Results Summary

9.2.1 Seismic Walkdown Equipment List Development

The selection of items for the SWEL underwent peer review according to the guidance in Section 3 of the Guidance. The SSCs to be evaluated during the seismic walkdown were selected as described in Section 6.0. The list of components was provided to the members of the peer review team listed in Section 4.5. The peer review members independently provided comments to the personnel who selected the components. All comments were addressed and the peer review team reviewed the changes made to the SWEL and the final SWEL, to ensure all recommendations from the Guidance were met. Specific considerations for the peer review process are described below for SWEL 1 and SWEL 2.

For SWEL 1, the peer review team verified that the list of SSCs represented a diverse sample of the equipment required to perform the following five safety functions, as specified in the Guidance:

- Reactor Reactivity Control;
- Reactor Coolant Pressure Control;
- Reactor Coolant Inventory Control;
- Decay Heat Removal; and
- Containment Function.

For SWEL 1, the peer review also verified that the SSCs included an appropriate representation of items having the following sample selection attributes:

- Various types of systems;
- Major new and replacement equipment;
- Various types of equipment;
- Various environments;
- Equipment enhanced based on the findings of the IPEEE; and

- Risk insight consideration.

The final SWEL 1 contains a number of items that perform each of the five safety functions specified in the Guidance. Numerous components perform more than one of the safety functions and all five safety functions are well represented by the components on the list. SWEL 1 contains components from all the classes of equipment listed in Appendix B of the Guidance, except for cases where there are no Safety Related components at the plant that fall into that specific equipment class. The list contains major new and replacement items, and items enhanced based on the IPEEE as well as equipment located in various environments and areas of the plant. All major safety related systems are represented and risk factors were considered in development of the list.

For SWEL 2, the peer review team determined that the process to select spent fuel pool related items complied with the Guidance. Portions of the spent fuel pool cooling system at Vermont Yankee are safety related Seismic Category I and all different types of components associated with the safety-related system are represented on the SWEL 2. No items that could cause rapid drain down of the Spent Fuel Pool for Vermont Yankee were identified. Therefore, SWEL 2 does not contain any components associated with potential rapid drain down of the pool. The peer review team concluded that the bases for including/excluding items associated with the spent fuel pool were well documented and that the final SWEL 2 complies with the Guidance.

All of the peer review comments made during development of SWEL 1 and 2 were resolved by the team that prepared the SWELs. The resolutions were reviewed by the peer review team and it was determined that all comments were adequately addressed.

9.2.2 Seismic Walkdowns and Area Walk-Bys

Peer review of the seismic walkdowns and area walk-bys was conducted by two peer reviewers, each of whom is a qualified SWE and has broad knowledge of seismic engineering applied to nuclear power plants. One of the peer reviewers participated in the seismic walkdown program for a different utility. The peer reviews were conducted at the VYNPS concurrent with the conduct of walkdowns, at approximately 50% completion. The peer review was performed as follows:

- The peer review team reviewed the walkdown packages (including checklists, photos, drawings, etc.) for SWEL items already completed to ensure that the checklists were completed in accordance with the Guidance. A total 19 SWC and 11 AWC forms were reviewed, each representing approximately 20% of their respective totals. In the context of the Guidance, the peer review team considered the number of walkdown packages reviewed to be appropriate. The packages reviewed represent a variety of equipment types in various plant areas. While reviewing the walkdown packages, the peer reviewers conducted informal interviews of the SWEs and asked clarifying questions to verify that they were conducting walkdowns and area walk-bys in accordance with the Guidance.
- The peer review team held a meeting with the SWE teams to provide feedback on the walkdown and walk-by packages reviewed and the informal interviews, and discuss potential modifications to the documentation packages in the context of the Guidance.
- Each peer reviewer accompanied each SWE team into the field and observed them perform a walkdown of a SWEL component and its associated area walk-by. During

these observations, the peer reviewers asked clarifying questions to verify the walkdown and walk-by process being followed was in accordance with the Guidance. The items walked down under the observation of a peer reviewer are listed below. The associated area walk-bys performed under the observation of a peer reviewer are listed below.

- The peer review team held a meeting with the SWE teams to provide feedback on the walkdown and walk-by observations, and discuss how lessons learned from review of the walkdown packages had been incorporated into the walkdown process.

As a result of the peer review activities, the SWE teams modified their documentation process to include additional clarifying details, particularly related to checklist questions marked "N/A" and where conditions were observed but judged as insignificant. The peer review team felt these modifications would be of benefit for future reviews of checklists incorporated into the final report. These modifications were recommended following review of the walkdown and area walk-by packages, and the observation walkdowns and area walk-bys demonstrated that the SWEs understood the recommendations and were incorporating them into the walkdown and area walk-by process. Previously completed checklists were revised to reflect lessons learned from the peer review process.

Based on completion of the walkdown and walk-by peer review activities described, the peer review team concludes that the SWE teams are familiar with and followed the process for conducting seismic walkdowns and area walk-bys in accordance with the Guidance. The SWE teams adequately demonstrated their ability to identify potentially adverse seismic conditions such as adverse anchorage, adverse spatial interaction, and other adverse conditions related to anchorage, and perform anchorage configuration verifications, where applicable. The SWEs also demonstrated the ability to identify seismically-induced flooding interactions and seismically-induced fire interactions such as the examples described in Section 4 of the Guidance. The SWEs demonstrated appropriate use of self-checks and peer checks. They discussed their observations with a questioning attitude, and documented the results of the seismic walkdowns and area walk-bys on appropriate checklists.

One of the Peer Reviewers was present on site for two out of the three weeks of the walkdowns. SWELs and AWCs documentation was randomly reviewed and discussed with the respective team.

The SWEL items included the following:

1. SWEL-102 CYl-72-1A N2 cylinder
2. SWEL-079 NG-13A CAD SOV
3. SWEL-032 RRV-8
4. SWEL-058 P-10-1D RHR Pump
5. SWEL-059 V-10-65B RHR Bypass valve
6. SWEL-005 P-46-1A CS Pump
7. SWEL-061 P-8-1C RHRSW Pump
8. SWEL-062 V-10-89A RHR Supply MOV

9. SWEL-027 P44-1A HPCI Pump
10. SWEL-068 TU-1-1A HPCI Turbine
11. SWEL-094/095 HPCI Instrument Rack
12. SWEL-001 CRD HCU (Both banks)
13. SWEL-004 CV-3-26 (inlet valves)
14. SWEL-003 PCV-3-32B
15. SWEL-020 MCC-9D

In addition, as the Peer Reviewer walked to the selected SWEL, a survey of the area to the respective SWEL was also performed.

The AWC items reviewed were in the Reactor Building as follows:

1. AWC-014
2. AWC-027
3. AWC-029
4. AWC-030
5. AWC-034
6. AWC-032
7. AWC-007
8. AWC-009
9. AWC-031
10. AWC-003
11. AWC-013

In all the above SWEL and AWC walkdowns no seismic issues were identified. Housekeeping items identified are captured in CRs listed above.

A second Peer Reviewer checked all SWEL and AWC forms for completeness, checked AWC –SWEL relationship and selected some SWELs to walkdown. The SWEL selected were:

1. SWEL1-007
2. SWEL1-040
3. SWEL1-043
4. SWEL1-092

9.2.3 Licensing Basis Evaluations

There were no Licensing Basis Evaluations required. Operability determinations were

performed as part of the CAP process.

The method used to perform Licensing Bases Evaluations (LBEs) for the Vermont Yankee effort was more conservative than recommended in the Walkdown Guidance document. The Guidance discussed performing an LBE to first determine if a reported condition complies with the plant licensing bases prior to entering the condition in the plant CAP. Then, if the LBE concluded the condition was in compliance with plant licensing bases, it would be so documented and no further effort would be required.

Instead, all potentially adverse seismic conditions identified during the walkdowns and AWBs were immediately entered into the CAP (within several hours of discovery). LBEs performed to establish compliance with the plant licensing bases were included in the dispositions of the CRs.

This approach was preferred by Vermont Yankee since it provided immediate notification to the Main Control Room of all potential adverse impacts. This was reasonable and justifiable since the Vermont Yankee CAP requires immediate assessment of potentially adverse conditions for plant operability, which by definition, required review and understanding of the design and licensing bases of the subject components.

9.2.4 Submittal Report

The peer review team was provided with an early draft of this submittal report for peer review. The peer review team verified that the submittal report met the objectives and requirements of Enclosure 3 to the 50.54(f) Letter, and documented the NTTF 2.3 Seismic Walkdown program performed in accordance with the Guidance. The peer review team provided the results of review activities to the SWE team for consideration. The SWE team satisfactorily addressed all peer review comments in the final version of the submittal report. The signature of the Peer Review Team Leader provides documentation that all elements of the peer review as described in Section 6 of the Guidance were completed.

10.0 REFERENCES

10.1 10CFR50.54(f) Letter, Request for Information Pursuant to Title 10 of the Code of Federal Regulations 50.54(f) Regarding Recommendations 2.1, 2.3 and 9.3 of the Near-Term Task Force Review of Insights from the Fukushima Dai-Ichi Accident, dated March 12, 2012

10.2 EPRI 1025286, Seismic Walkdown Guidance for Resolution of Fukushima Near-Term Task Force Recommendation 2.3: Seismic, June 2012

10.3 Generic Letter No. 88-20, Supplement 4, "Individual Plant Examination of External Events (IPEEE) for Severe Accident Vulnerabilities – 10CFR50.54(f)", June 1991

10.4 Generic Letter No. 87-02, "Verification of Seismic Adequacy of Mechanical and Electrical Equipment in Operating Reactors, Unresolved Safety Issue (USI) A-46"

10.5 Seismic Qualification Utility Group (SQUG) Procedure: Generic Implementation Procedure (GIP) for Seismic Verification of Nuclear Power Plant Equipment, Revision 3A, December 2001

10.6 USNRC NUREG 1407 "Procedural and Submittal Guidance for Individual Plant Examination of External Events (IPEEE) for Severe Accident Vulnerabilities" June 1991

10.7 EPRI NP-6041-SL Rev.1, "A Methodology for Assessment of Nuclear Power Plant Seismic Margin (Revision 1)", August 1991

10.8 Seismic Qualification Utility Group (SQUG) Rev. 2, "Generic Implementation Procedure (GIP) for Seismic Verification of Nuclear Power Plant Equipment", dated February 1992, corrected February 14, 199210.9 NRC Letter to Vermont Yankee NVY 99-23, dated February 26, 1999, "Request for additional Information on Vermont Yankee Nuclear Power Station Individual Plant Examination of External Events (IPEEE) Submittal (TAC No. M83689)"

10.10 NRC Letter to Vermont Yankee NVY 01-23, dated March 22, 2001, "Vermont Yankee Nuclear Power Station Individual Plant Examination of External Events (IPEEE) Submittal (TAC No. M83689)"

10.11 NRC Letter to Vermont Yankee NVY 2001-124, dated December 14, 2001, "Vermont Yankee Nuclear Power Station – Correction to Individual Plant Examination of External Events (IPEEE) Staff Evaluation Report (TAC no. MB3290)"

10.12 Vermont Yankee Letter to NRC BVY 01-75, dated October 4, 2001, "Vermont Yankee Nuclear Power Station License No. DPR-28 (Docket No. 50-271), IPEEE Staff Evaluation Report Comments"

10.13 Entergy Procedure EN-DC-168, Rev. 0, "Fukushima Near-Term Task Force Recommendation 2.3 Seismic Walk-down Procedure"

10.14 Vermont Yankee Nuclear Power Station Updated Final Safety Analysis Report (UFSAR)

10.15 Vermont Yankee Nuclear Power Station Topical Design Basis Document for External Events Rev. 5

11.0 ATTACHMENTS

ATTACHMENT A – IPEEE VULNERABILTIES TABLE
ATTACHMENT B – SEISMIC WALKDOWN EQUIPMENT LISTS
ATTACHMENT C – SEISMIC WALKDOWN CHECKLISTS (SWCs)
ATTACHMENT D – AREA WALK-BY CHECKLISTS (AWCs)
ATTACHMENT E – POTENTIALLY ADVERSE SEISMIC CONDITIONS
ATTACHMENT F – LICENSING BASIS EVALUATION FORMS
ATTACHMENT G – PEER REVIEW CHECKLIST FOR SWEL
ATTACHMENT H – SEISMIC WALKDOWN ENGINEER TRAINING CERTIFICATES
ATTACHMENT I – PEER REVIEW COMMENTS FOR SWCs AND AWCs
ATTACHMENT J – SWEL1 RISK RANKING PROCESS

Attachment A

IPEEE Vulnerabilities Table

ATTACHMENT 9.3 **IPEEE VULNERABILITIES TABLE FORM AND INSTRUCTIONS**

#	IPEEE VULNERABILITY	COMMITMENT	RESOLUTION	CMP	RESOLVED
V-01	A-46 Program outliers.	Complete A-46 program and resolve all outliers. Modifications designed to IPEEE seismic levels. IPEEE submittal Table 3.4.1 defined modifications made for A46 and IPEEE. Table 3.4.2 documented A46/ IPEEE outliers to be resolved.	Vermont Yankee calculation, VYC-2068, "Final Summary of USI A-46 Outlier Resolution" and VYC-2119, "IPEEE Seismic Component HCLPF Evaluations Summary. Associated modifications are referenced within these documents. Per NRC Letter NVY 01-023, dated March 22, 2001, all A46/ IPEEE outliers described in Table 3.4.2 have been resolved to meet 46 criteria and to assure a HCLPF > 0.3g.	Y	NRC Letter NVY 01-023, dated March 22, 2001
V-02	Condensate Storage Tank (CST) has a HCLPF of 0.25g.	To further evaluate for possible modification or upgrade of seismic capacity, and its associated risk to total CDF using PRA methods.	Vermont Yankee concluded that no simple cost effective enhancement could be identified that would improve CST seismic capacity.	Y	Accepted per conclusions presented in NVY 01-023, dated March 22, 2001
V-03	Diesel Fire Pump Fuel Tank is weak at the tank shell to saddle interface and potential seismic loads could cause crimping of the fuel supply tubing. Also a potential seismic interaction with an adjacent masonry wall.	Tubing will be rerouted to accommodate span flexibility to account for seismic displacement of the tank relative to the saddle supports. Review seismic capacity of the wall.	Tubing reroute eliminated the potential crimping concern during a seismic event. The adjacent masonry wall reviewed in comparison the masonry wall sampling that was performed for the IPEEE program and determined to be enveloped by the seismic capacity of the masonry wall evaluated and documented in Table 3.2.4 of the VY IPEEE submittal.	Y	Vermont Yankee Work Order 99-011585-000; Complete 7/14/2000
V-04	The support of the fire system northwest standpipe in the Reactor Building requires more robust support.	Proposed improvements to enhance the support of the fire system northwest standpipe in the Reactor Building.	Vermont Yankee calculation, VYC-2136, documents the design of enhanced deadweight supports and additional lateral supports for the Reactor Building northwest standpipe.	Y	Minor Modification (MM) 2000-27 implemented the modification; Complete 11/21/2000
V-05	Seismic resistance of the hydrogen piping in the Turbine Building could be improved.	Proposed improvements to the Turbine Building hydrogen piping seismic resistance capacity.	No cost effective improvements could be identified.	Y	Accepted per conclusions presented in NVY 01-023, dated March 22, 2001

Prepared by: Steven M Buckley Date: 11-14-2012

Attachment B

Seismic Walkdown Equipment List

ATTACHMENT 9.4 **SEISMIC WALKDOWN EQUIPMENT LISTS FORM AND INSTRUCTIONS**

Seismic Walkdown Equipment List Approval (Final SWEL1 & SWEL2)**

Prepared by: Steven M Buckley (ENVY) Date: 10/25/12

Equipment Selection Personnel

Reviewed by: Julien Abramovici (ENERCON) Date: 10-24-12

Peer Reviewer

Concurrence by: Edward Harms Date: 11/5/12

Operations Personnel

** During implementation of the Seismic Walkdowns SWEL-065 was determined to be inaccessible for inspection. This SWEL number was valve FCV-104-17D, SW/D TRAVELLING SCREEN CONTROL VALVE. It was replaced with Valve LCV-108-3 which is located in the Fuel Oil Pump House. This valve is a similar GIP 07 class valve and is also located in a humid environment as was FCV-104-17D. No other SWEL1 & SWEL2 items have been changed since the original SWEL approval prior to Seismic Walkdowns.

	UNIT	SQUG EQUIPMENT CLASS	CURRENT EQUIPMENT ID	SSEL EQUIPMENT ID	EQUIPMENT DESCRIPTION	SCREEN1	SCREEN 2	SCREEN 3	SCREEN 4					Reactivity Control	Pressure Control	Inventory Control	Decay Heat Removal	Containment
											Environment							
						Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)	Borated System?					
x	1	0		HCU-	CRD/HYDRAULIC CONTROL UNITS (89)	YES	NO	YES	NO		I		NO	X				
	1	21			CRD/NORTH SDV INSTRUMENT VOLUME	YES	NO	YES	NO		I		NO	X				
	1	07	LCV-3-33A	LCV-3-33A	CRD/SCRAM DISCHARGE VOLUME DRAIN VALVE	YES	NO	YES	NO		I		NO	X				
	1	07	LCV-3-33B	LCV-3-33B	CRD/SCRAM DISCHARGE VOLUME DRAIN VALVE	YES	NO	YES	NO		I		NO	X				
x	1	07	LCV-3-33C	LCV-3-33C	CRD/SCRAM DISCHARGE VOLUME DRAIN VALVE	YES	NO	YES	NO		I		NO	X				
	1	07	LCV-3-33D	LCV-3-33D	CRD/SCRAM DISCHARGE VOLUME DRAIN VALVE	YES	NO	YES	NO		I		NO	X				
	1	07	PCV-3-32A	PCV-3-32A	CRD/SCRAM DISCHARGE VOLUME VENT VALVE	YES	NO	YES	NO		I		NO	X				
x	1	07	PCV-3-32B	PCV-3-32B	CRD/SCRAM DISCHARGE VOLUME VENT VALVES	YES	NO	YES	NO		I		NO	X				
x	1	07	CV-3-126-	CV-3-126-	CRD/SCRAM VALVES (89) INLET	YES	NO	YES	NO		I		NO	X				
	1	07	CV-3-127-	CV-3-127-	CRD/SCRAM VALVES (89) OUTLET	YES	NO	YES	NO		I		NO	X				
	1	21			CRD/SOUTH SDV INSTRUMENT VOLUME	YES	NO	YES	NO		I		NO	X				
x	1	06	P-46-1A	P-46-1A	CS/"A" CORE SPRAY PUMP	YES	NO	YES	NO		I		NO			X		
	1	06	P-46-1B	P-46-1B	CS/"B" CORE SPAY PUMP	YES	NO	YES	NO		I		NO			X		
	1	08A	V14-11A	V14-11A	CS/CS INJECTION MOV	YES	NO	YES	NO		I		NO			X		
	1	08A	V14-11B	V14-11B	CS/CS INJECTION MOV	YES	NO	YES	NO		I		NO			X		
	1	08A	V14-12A	V14-12A	CS/CS INJECTION MOV	YES	NO	YES	NO		I		NO			X		
	1	08A	V14-12B	V14-12B	CS/CS INJECTION MOV	YES	NO	YES	NO		I		NO			X		
	1	08A	V14-26A	V14-26A	CS/FULL FLOW TEST MOV	YES	NO	YES	NO		I		NO			X		
	1	08A	V14-26B	V14-26B	CS/FULL FLOW TEST MOV	YES	NO	YES	NO		I		NO			X		
	1	08A	V14-5A	V14-5A	CS/MIN-FLOW MOV	YES	NO	YES	NO		I		NO			X		
	1	08A	V14-5B	V14-5B	CS/MIN-FLOW MOV	YES	NO	YES	NO		I		NO			X		
	1	08A	V14-7A	V14-7A	CS/PUMP SUCTION MOV	YES	NO	YES	NO		I		NO			X		
	1	08A	V14-7B	V14-7B	CS/PUMP SUCTION MOV	YES	NO	YES	NO		I		NO			X		
	1	21	TK-80-1A	TK-80-1A	DG START AIR/AIR RECEIVER TANK A	YES	NO	NO	NO	YES	I		NO					
	1	21	TK-80-1B	TK-80-1B	DG START AIR/AIR RECEIVER TANK B	YES	NO	NO	NO	YES	I		NO					
	1	21	TK-80-1C	TK-80-1C	DG START AIR/AIR RECEIVER TANK C	YES	NO	NO	NO	YES	I		NO					
	1	21	TK-80-1D	TK-80-1D	DG START AIR/AIR RECEIVER TANK D	YES	NO	NO	NO	YES	I		NO					
	1	18	PS-24-1A	PS-24-1A	DG START AIR/COMP CONT	YES	NO	NO	NO		I		NO					
	1	18	PS-24-1B	PS-24-1B	DG START AIR/COMP CONT	YES	NO	NO	NO		I		NO					
x	1	12	C-3-1A	C-3-1A	DG START AIR/COMPRESSOR A	YES	NO	NO	NO		I		NO					
	1	12	C-3-1B	C-3-1B	DG START AIR/COMPRESSOR B	YES	NO	NO	NO		I		NO					
	1	08B	AS-24-1A	AS-24-1A	DG START AIR/DG AIR SUPPLY	YES	NO	NO	NO		I		NO					
	1	08B	AS-24-1B	AS-24-1B	DG START AIR/DG AIR SUPPLY	YES	NO	NO	NO		I		NO					
	1	08B	AS-24-2A	AS-24-2A	DG START AIR/DG AIR SUPPLY	YES	NO	NO	NO		I		NO					
	1	08B	AS-24-2B	AS-24-2B	DG START AIR/DG AIR SUPPLY	YES	NO	NO	NO		I		NO					
	1	18	PI-24-SAP-1A	PI-24-SAP-1A	DG START AIR/PRESS BOUND	YES	NO	NO	NO		I		NO					
	1	18	PI-24-SAP-1B	PI-24-SAP-1B	DG START AIR/PRESS BOUND	YES	NO	NO	NO		I		NO					
	1	18	PS-24-APLA-1A	PS-24-APLA-1A	DG START AIR/PRESS BOUND	YES	NO	NO	NO		I		NO					
	1	18	PS-24-APLA-1B	PS-24-APLA-1B	DG START AIR/PRESS BOUND	YES	NO	NO	NO		I		NO					
	1	17	DG-1A	DG-1A	DIESEL GENERATOR A	YES	NO	NO	NO		I		NO					
x	1	17	DG-1B	DG-1B	DIESEL GENERATOR B	YES	NO	NO	NO		I		NO					
	1	18	LSH-108-2A	LSH-108-2A	FUEL OIL/DAY TANK A HIGH/PRESS B	YES	NO	NO	NO		I		NO					
	1	18	LSL-108-3A	LSL-108-3A	FUEL OIL/DAY TANK A LOW/PRESS B	YES	NO	NO	NO		I		NO					
	1	18	LSH-108-2B	LSH-108-2B	FUEL OIL/DAY TANK B HIGH/PRESS B	YES	NO	NO	NO		I		NO					
	1	18	LSL-108-3B	LSL-108-3B	FUEL OIL/DAY TANK B LOW/PRESS B	YES	NO	NO	NO		I		NO					
x	1	07	LCV-108-2A	LCV-108-2A	FUEL OIL/DAY TANK FILL	YES	NO	NO	NO		I		NO					
	1	07	LCV-108-2B	LCV-108-2B	FUEL OIL/DAY TANK FILL	YES	NO	NO	NO		I		NO					
	1	21	TK-42-1A	TK-42-1A	FUEL OIL/DIESEL OIL DAY TANK A	YES	NO	NO	NO	YES	I		NO					
x	1	21	TK-42-1B	TK-42-1B	FUEL OIL/DIESEL OIL DAY TANK B	YES	NO	NO	NO	YES	I		NO					
x	1	21	TK-40-1A	TK-40-1A	FUEL OIL/FUEL OIL STORAGE TANK	YES	NO	NO	NO		O		NO					

	UNIT	SQUG EQUIPMENT CLASS	CURRENT EQUIPMENT ID	SSEL EQUIPMENT ID	EQUIPMENT DESCRIPTION	SCREEN1	SCREEN 2	SCREEN 3	SCREEN 4					Reactivity Control	Pressure Control	Inventory Control	Decay Heat Removal	Containment
											Environment							
						Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)	Borated System?					
x	1	05	P-92-1A	P-92-1A	FUEL OIL/FUEL OIL TRANSFER PUMP A	YES	NO	NO	NO		I	H	NO					
	1	05	P-92-1B	P-92-1B	FUEL OIL/FUEL OIL TRANSFER PUMP B	YES	NO	NO	NO		I	H	NO					
	1	07	LCV-108-3	LCV-108-3	FUEL OIL/HEAT TK BOILER TANK FILL	YES	NO	NO	NO		I	H	NO					
	1	14	VAC-A	VAC-A	120 VAC VAC-A VITAL SUBPANEL 100AMP	YES	NO	NO	NO		I		NO					
	1	14	IAC-1	IAC-1	120/240V AC INSTRUMENTATION DISTR PNL 200AMP	YES	NO	NO	NO		I		NO					
	1	14	VAC-1	VAC-1	120/240V UNINTERRUPTIBLE (VITAL) AC DISTR PNL 225AMP	YES	NO	NO	NO		I		NO					
x	1	13	MG-2-1A	MG-2-1A	120/240V VITAL AC MG SET	YES	NO	NO	NO	YES	I		NO					
x	1	16	BC-1-1A	BC-1-1A	125V DC MAIN STATION BATTERY CHARGER A ON DC-1	YES	NO	NO	NO		I		NO					
	1	16	BC-1-1B	BC-1-1B	125V DC MAIN STATION BATTERY CHARGER B ON DC-2	YES	NO	NO	NO		I		NO					
	1	16	BC-AS-2	BC-AS-2	125V DC NORMAL BATTERY CHARGER ON BUS DC-2AS	YES	NO	NO	NO		I		NO					
	1	16	BC-AS-2-1	BC-AS-2-1	125V DC ALTERNATE BATTERY CHARGER ON BUS DC-2AS	YES	NO	NO	NO		I		NO					
x	1	15	B-AS-2	B-AS-2	125V DC STATION BATTERY ON BUS DC-2AS	YES	NO	NO	NO		I		NO					
	1	15	B-1-1A	B-1-1A	125V DC BATTERY ON DC-1	YES	NO	NO	NO	YES	I		NO					
x	1	15	B-1-1B	B-1-1B	125V DC STATION BATTERY ON DC-2	YES	NO	NO	NO	YES	I		NO					
	1	14	DC-3	DC-3	125V DC DISTR PNL DC-3 600AMP	YES	NO	NO	NO		I		NO					
x	1	14	DC-1	DC-1	125V DC DISTR PNL DC-1 1600AMP	YES	NO	NO	NO	YES	I		NO					
	1	14	DC-1C	DC-1C	125V DC DISTR PNL DC-1C 100AMP	YES	NO	NO	NO	YES	I		NO					
x	1	14	DC-2	DC-2	125V DC DISTR PNL DC-2 1600AMP	YES	NO	NO	NO	YES	I		NO					
	1	14	DC-2AS	DC-2AS	125V DC DISTRIBUTION PANEL	YES	NO	NO	NO		I		NO					
	1	14	DC-2C	DC-2C	125V DC DISTR PNL DC-2C 100AMP	YES	NO	NO	NO		I		NO					
	1	01	MCC-DC-2A	MCC-DC-2A	125V DC MCC DC-2A 600AMP	YES	NO	NO	NO		I		NO					
	1	01	MCC-DC-1A	MCC-DC-1A	125V DC MCC DC-1A (HPCI) 600AMP	YES	NO	NO	NO	YES	I		NO					
	1	01	MCC-DC-1B	MCC-DC-1B	125V DC MCC DC-1B (HPCI) 600AMP	YES	NO	NO	NO	YES	I		NO					
	1	14	DC-ECCS-A	DC-ECCS-A	24 VDC ECCS PNL (A)	YES	NO	NO	NO		I		NO					
x	1	14	DC-ECCS-B	DC-ECCS-B	24 VDC ECCS PNL (B)	YES	NO	NO	NO		I		NO					
	1	15	B-UPS-1A	B-UPS-1A	UPS-1A BATTERY BANK	YES	NO	NO	NO		I		NO					
	1	15	B-UPS-1B	B-UPS-1B	UPS-1B BATTERY BANK	YES	NO	NO	NO		I		NO					
	1	01	MCC-9A	MCC-9A	480V AC MCC-9A - SWITCHGEAR ROOM (SII)	YES	NO	NO	NO	YES	I		NO					
x	1	01	MCC-9C	MCC-9C	480V ESS AC MCC-9C - DIESEL 1A ROOM (SII)	YES	NO	NO	NO	YES	I		NO					
	1	01	MCC-8C	MCC-8C	480V ESS MCC-8C - DIESEL 1B ROOM (SI)	YES	NO	NO	NO	YES	I		NO					
	1	01	MCC-8E	MCC-8E	480V ESS AC MCC-8E - REACTOR BLDG	YES	NO	NO	NO	YES	I		NO					
x	1	01	MCC-9D	MCC-9D	480V ESS AC MCC-9D - REACTOR BLDG	YES	NO	NO	NO	YES	I		NO					
	1	01	MCC-89B	MCC-89B	480V ESS AC MCC-89B - REACTOR BLDG (SI)	YES	NO	NO	NO		I		NO					
x	1	01	MCC-8B	MCC-8B	480V ESS AC MCC-8B - REACTOR BLDG (SI)	YES	NO	NO	NO	YES	I		NO					
	1	01	MCC-89A	MCC-89A	480V ESS AC MCC-9A - REACTOR BLDG (SII)	YES	NO	NO	NO		I		NO					
x	1	01	MCC-9B	MCC-9B	480V ESS AC MCC-9B - REACTOR BLDG (SII)	YES	NO	NO	NO	YES	I		NO					
	1	01	MCC-8A	MCC-8A	480V ESS AC MCC-8A - SWITCHGEAR ROOM (SI)	YES	NO	NO	NO	YES	I		NO					
	1	02	BUS-8	BUS-8	480V AC SWITCHGEAR BUS NO.8 1600AMP (SI)	YES	NO	NO	NO		I		NO					
x	1	02	BUS-9	BUS-9	480V AC SWITCHGEAR BUS NO.9 1600AMP (SII)	YES	NO	NO	NO		I		NO					
x	1	03	BUS-3	BUS-3	4KV - 4160V SWITCHGEAR BUS NO.3 1200AMP (SI)	YES	NO	NO	NO		I		NO					
	1	03	BUS-4	BUS-4	4KV - 4160V SWITCHGEAR BUS NO.4 1200AMP (SII)	YES	NO	NO	NO		I		NO					
	1	20	CP-82-2	CP-82-2	ALTERNATE SHUTDOWN PANEL	YES	NO	NO	NO		I		NO					
x	1	04	T-8-1A	T-8-1A	STATION SERVICE TRANS 4160/480 BUS NO.8	YES	NO	NO	NO		I		NO					
	1	04	T-9-1A	T-9-1A	STATION SERVICE TRANS 4160/480 BUS NO.9	YES	NO	NO	NO		I		NO					
x	1	21	TK-4-1A	TK-4-1A	CONDENSATE STORAGE TANK	YES	NO	YES	NO		O		NO		X	X		
	1	07	LCV-23-53	LCV-23-53	HPCI/COND DRAIN TO CONDENSER	YES	NO	YES	NO		I		NO		X	X		
	1	07	LCV-23-39	LCV-23-39	HPCI/COND PUMP TO RW	YES	NO	YES	NO		I		NO		X	X		
	1	07	LCV-23-40	LCV-23-40	HPCI/COND PUMP TO RW	YES	NO	YES	NO		I		NO		X	X		
	1	18	LS-23-98	LS-23-98	HPCI/EXHAUST STEAM DRAIN POT LEVEL SWITCH/LSO-23-54	YES	NO	YES	NO		I		NO		X	X		
	1	08A	V23-21	V23-21	HPCI/FULL FLOW TEST MOV	YES	NO	YES	NO		I		NO		X	X		

	UNIT	SQUG EQUIPMENT CLASS	CURRENT EQUIPMENT ID	SSEL EQUIPMENT ID	EQUIPMENT DESCRIPTION	SCREEN1	SCREEN 2	SCREEN 3	SCREEN 4					Reactivity Control	Pressure Control	Inventory Control	Decay Heat Removal	Containment
											Environment							
						Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)	Borated System?					
	1	08A	V23-24	V23-24	HPCI/FULL FLOW TEST MOV	YES	NO	YES	NO		I		NO		X	X		
	1	21	E-18-1A	E-18-1A	HPCI/GLAND SEAL CONDENSER	YES	NO	YES	NO	YES	I		NO		X	X		
	1	09	FN-2-1A	FN-2-1A	HPCI/GLAND SEAL EXHAUSTER	YES	NO	YES	NO	YES	I		NO		X	X		
	1	18	DPIS-23-76	DPIS-23-76	HPCI/HIGH STEAM FLOW TRIP	YES	NO	YES	NO		I		NO		X	X		
	1	18	DPIS-23-77	DPIS-23-77	HPCI/HIGH STEAM FLOW TRIP	YES	NO	YES	NO		I		NO		X	X		
	1	0	LSH-23-1	LSH-23-1	HPCI/HOT WELL LEVEL SWITCH HIGH	YES	NO	YES	NO		I		NO		X	X		
	1	0	LSL-23-2	LSL-23-2	HPCI/HOT WELL LEVEL SWITCH LOW	YES	NO	YES	NO		I		NO		X	X		
x	1	05	P-44-1A	P-44-1A	HPCI/HPCI PUMP	YES	NO	YES	NO		I		NO		X	X		
	1	07	PCV-23-50	PCV-23-50	HPCI/LO COOLING	YES	NO	YES	NO		I		NO		X	X		
	1	07	V23-50A	V23-50A	HPCI/LO/GS COOLING	YES	NO	YES	NO		I		NO		X	X		
	1	21	E-19-1A	E-19-1A	HPCI/LUBE OIL COOLER	YES	NO	YES	NO		I		NO		X	X		
	1	08A	V23-25	V23-25	HPCI/MIN-FLOW MOV	YES	NO	YES	NO		I		NO		X	X		
	1	08A	V23-17	V23-17	HPCI/PUMP CST SUCTION MOV	YES	NO	YES	NO		I		NO		X	X		
	1	18	FT-23-82	FT-23-82	HPCI/PUMP DISCHARGE FLOW TRANSMITTER	YES	NO	YES	NO		I		NO		X	X		
	1	08A	V23-19	V23-19	HPCI/PUMP DISCHARGE MOV	YES	NO	YES	NO		I	T	NO		X	X		
	1	08A	V23-20	V23-20	HPCI/PUMP DISCHARGE MOV	YES	NO	YES	NO		I		NO		X	X		
x	1	18	PS-23-84-1	PS-23-84-1	HPCI/PUMP SUCTION PRESSURE SWITCH	YES	NO	YES	NO		I		NO		X	X		
	1	08A	V23-57	V23-57	HPCI/PUMP TORUS SUCTION MOV	YES	NO	YES	NO		I		NO		X	X		
	1	08A	V23-58	V23-58	HPCI/PUMP TORUS SUCTION MOV	YES	NO	YES	NO		I		NO		X	X		
	1	08A	V23-14	V23-14	HPCI/STEAM SUPPLY MOV	YES	NO	YES	NO		I		NO		X	X		
x	1	08A	V23-15	V23-15	HPCI/STEAM SUPPLY MOV	YES	NO	YES	NO		I	T	NO		X	X		
x	1	08A	V23-16	V23-16	HPCI/STEAM SUPPLY MOV	YES	NO	YES	NO		I	T	NO		X	X		
	1	08	LCV-23-54	LCV-23-54	HPCI/TURBINE DRAINPOT	YES	NO	YES	NO		I		NO		X	X		
	1	18	PS-23-97A	PS-23-97A	HPCI/TURBINE EXHAUST PRESSURE SWITCH	YES	NO	YES	NO		I		NO		X	X		
	1	18	PS-23-97B	PS-23-97B	HPCI/TURBINE EXHAUST PRESSURE SWITCH	YES	NO	YES	NO		I		NO		X	X		
	1	10	SAC-1A	SAC-1A	CRHVAC/SAC-1 AIR HANDLING UNIT/FAN	YES	NO	NO	NO		I		NO					
	1	09	SAC-1B	SAC-1B	CRHVAC/SAC-1 AIR HANDLING UNIT/FAN	YES	NO	NO	NO		I		NO					
	1	10	SAC-1	SAC-1	CRHVAC/AIR HANDLING UNIT	YES	NO	NO	NO		I		NO					
	1	10	SAC-2	SAC-2	CRHVAC/AIR HANDLING UNIT	YES	NO	NO	NO		I		NO					
	1	11	SCH-1	SCH-1	CRHVAC/CHILLER MASTER UNIT	YES	NO	NO	NO		I		NO					
	1	11	SCH-2	SCH-2	CRHVAC/CHILLER MASTER UNIT	YES	NO	NO	NO		I		NO					
	1	05	SP-1	SP-1	CRHVAC/CHILLER PUMP	YES	NO	NO	NO		I		NO					
	1	05	SP-2	SP-2	CRHVAC/CHILLER PUMP	YES	NO	NO	NO		I		NO					
	1	10	SACC-1A	SACC-1A	CRHVAC/CONDENSER CHILLERS	YES	NO	NO	NO		I		NO					
	1	10	SACC-1B	SACC-1B	CRHVAC/CONDENSER CHILLERS	YES	NO	NO	NO		I		NO					
	1	09	TEF-2	TEF-2	DG A ROOM VENTILATION/EXHAUST FAN	YES	NO	NO	NO		I		NO					
x	1	09	TEF-3	TEF-3	DG B ROOM VENTILATION/EXHAUST FAN	YES	NO	NO	NO		I		NO					
	1	10	RRU-5	RRU-5 COOLING	SW/ECCS RM COOLING	YES	NO	NO	NO		I		NO					
	1	10	RRU-6	RRU-6 COOLING	SW/ECCS RM COOLING	YES	NO	NO	NO		I		NO					
	1	10	RRU-7	RRU-7 COOLING	SW/ECCS RM COOLING	YES	NO	NO	NO		I		NO					
x	1	10	RRU-8	RRU-8 COOLING	SW/ECCS RM COOLING	YES	NO	NO	NO		I		NO					
	1	18	LT-3-231A	LT-3-231A	CRD/SDV LEVEL TRANSMITTER (NORTH)	YES	NO	NO	NO		I		NO					
	1	18	LT-3-231B	LT-3-231B	CRD/SDV LEVEL TRANSMITTER (NORTH)	YES	NO	NO	NO		I		NO					
	1	18	LT-3-231C	LT-3-231C	CRD/SDV LEVEL TRANSMITTER (NORTH)	YES	NO	NO	NO		I		NO					
	1	18	LT-3-231D	LT-3-231D	CRD/SDV LEVEL TRANSMITTER (NORTH)	YES	NO	NO	NO		I		NO					
	1	18	LT-3-231E	LT-3-231E	CRD/SDV LEVEL TRANSMITTER (SOUTH)	YES	NO	NO	NO		I		NO					
	1	18	LT-3-231F	LT-3-231F	CRD/SDV LEVEL TRANSMITTER (SOUTH)	YES	NO	NO	NO		I		NO					
	1	18	LT-3-231G	LT-3-231G	CRD/SDV LEVEL TRANSMITTER (SOUTH)	YES	NO	NO	NO		I		NO					
	1	18	LT-3-231H	LT-3-231H	CRD/SDV LEVEL TRANSMITTER (SOUTH)	YES	NO	NO	NO		I		NO					
x	1	18	PT-2-3-52C	PT-2-3-52C	CS, RHR PERMISSIVE	YES	NO	YES	NO		I		NO			X		

	UNIT	SQUG EQUIPMENT CLASS	CURRENT EQUIPMENT ID	SSEL EQUIPMENT ID	EQUIPMENT DESCRIPTION	SCREEN1	SCREEN 2	SCREEN 3	SCREEN 4					Reactivity Control	Pressure Control	Inventory Control	Decay Heat Removal	Containment
						Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Environment							
											Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)	Borated System?					
	1	18	PT-2-3-52D	PT-2-3-52D	CS, RHR PERMISSIVE	YES	NO	YES	NO		I		NO			X		
x	1	18	LT-107-5A	LT-107-5A	CST/LEVEL TRANSMITTER	YES	NO	YES	NO		I	H	NO			X		
x	1	18	LT-107-5B	LT-107-5B	CST/LEVEL TRANSMITTER	YES	NO	YES	NO		I	H	NO			X		
x	1	18	PT-10-101A	PT-10-101A	DW PRESSURE ECCS	YES	NO	NO	NO		I		NO					
	1	18	PT-10-101B	PT-10-101B	DW PRESSURE ECCS	YES	NO	NO	NO		I		NO					
x	1	18	PT-10-101C	PT-10-101C	DW PRESSURE ECCS	YES	NO	NO	NO		I		NO					
	1	18	PT-10-101D	PT-10-101D	DW PRESSURE ECCS	YES	NO	NO	NO		I		NO					
x	1	18	PT-16-19-29A	PT-16-19-29A	DW PRESSURE INDICATION	YES	NO	NO	NO		I		NO					
	1	18	PT-16-19-29B	PT-16-19-29B	DW PRESSURE INDICATION	YES	NO	NO	NO		I		NO					
	1	18	PT-5-12A	PT-5-12A	DW PRESSURE SCRAM	YES	NO	NO	NO		I		NO					
	1	18	PT-5-12B	PT-5-12B	DW PRESSURE SCRAM	YES	NO	NO	NO		I		NO					
x	1	18	PT-5-12C	PT-5-12C	DW PRESSURE SCRAM	YES	NO	NO	NO		I		NO					
x	1	18	PT-5-12D	PT-5-12D	DW PRESSURE SCRAM	YES	NO	NO	NO		I		NO					
x	1	19	TE-16-19-30A	TE-16-19-30A	DW TEMP INDICATION	YES	NO	NO	NO		I	T	NO					
	1	19	TE-16-19-30B	TE-16-19-30B	DW TEMP INDICATION	YES	NO	NO	NO		I	T	NO					
	1	20	TI-16-19-30B	TI-16-19-30B	DW TEMP. IND.	YES	NO	NO	NO		I		NO					
	1	20	TR-16-19-45	TR-16-19-45	DW TEMP. RECORDER	YES	NO	NO	NO		I		NO					
	1	18	PS-23-68A	PS-23-68A	HPCI/PCIS ON LOW STEAM PRESSURE	YES	NO	YES	NO		I		NO		X	X		
	1	18	PS-23-68B	PS-23-68B	HPCI/PCIS ON LOW STEAM PRESSURE	YES	NO	YES	NO		I		NO		X	X		
	1	18	PS-23-68C	PS-23-68C	HPCI/PCIS ON LOW STEAM PRESSURE	YES	NO	YES	NO		I		NO		X	X		
	1	18	PS-23-68D	PS-23-68D	HPCI/PCIS ON LOW STEAM PRESSURE	YES	NO	YES	NO		I		NO		X	X		
	1	18	PS-2-128B	PS-2-128B	REACTOR PRESS (HI) FOR RHR INTERLOCK	YES	NO	NO	NO		I		NO					
	1	18	PS-2-128A	PS-2-128A	REACTOR PRESS (HI) FOR RHR INTERLOCK	YES	NO	NO	NO		I		NO					
	1	18	FT-2-110A	FT-2-110A	REACTOR RECIRC FLOW FOR RPS	YES	NO	NO	NO		I		NO					
	1	18	FT-2-110B	FT-2-110B	REACTOR RECIRC FLOW FOR RPS	YES	NO	NO	NO		I		NO					
	1	18	FT-2-110C	FT-2-110C	REACTOR RECIRC FLOW FOR RPS	YES	NO	NO	NO		I		NO					
	1	18	FT-2-110D	FT-2-110D	REACTOR RECIRC FLOW FOR RPS	YES	NO	NO	NO		I		NO					
x	1	18	LT-2-3-72A	LT-2-3-72A	RV LEVEL FOR RHR, DG, HPCI, RCIC, ADS, CS	YES	NO	YES	NO		I		NO			X		
	1	18	LT-2-3-72B	LT-2-3-72B	RV LEVEL FOR RHR, DG, HPCI, RCIC, ADS, CS	YES	NO	YES	NO		I		NO			X		
x	1	18	LT-2-3-72C	LT-2-3-72C	RV LEVEL FOR RHR, DG, HPCI, RCIC, ADS, CS	YES	NO	YES	NO		I		NO			X		
	1	18	LT-2-3-72D	LT-2-3-72D	RV LEVEL FOR RHR, DG, HPCI, RCIC, ADS, CS	YES	NO	YES	NO		I		NO			X		
	1	18	LT-2-3-57A	LT-2-3-57A	RV LEVEL SCRAM & PCIS	YES	NO	YES	NO		I		NO					X
	1	18	LT-2-3-57B	LT-2-3-57B	RV LEVEL SCRAM & PCIS	YES	NO	YES	NO		I		NO					X
x	1	18	LT-2-3-58A	LT-2-3-58A	RV LEVEL SCRAM & PCIS	YES	NO	YES	NO		I		NO					X
x	1	18	LT-2-3-58B	LT-2-3-58B	RV LEVEL SCRAM & PCIS	YES	NO	YES	NO		I		NO					X
	1	20	PI-2-3-56A	PI-2-3-56A	RV PRESS. IND.	YES	NO	NO	NO		I		NO					
	1	20	PI-2-3-56B	PI-2-3-56B	RV PRESS. IND.	YES	NO	NO	NO		I		NO					
x	1	18	PT-2-3-56A	PT-2-3-56A	RV PRESSURE ECCS	YES	NO	NO	NO		I		NO					
	1	18	PT-2-3-56B	PT-2-3-56B	RV PRESSURE ECCS	YES	NO	NO	NO		I		NO					
x	1	18	PT-2-3-56C	PT-2-3-56C	RV PRESSURE ECCS	YES	NO	NO	NO		I		NO					
	1	18	PT-2-3-56D	PT-2-3-56D	RV PRESSURE ECCS	YES	NO	NO	NO		I		NO					
	1	18	PT-2-3-55A	PT-2-3-55A	RV PRESSURE SCRAM	YES	NO	NO	NO		I		NO					
	1	18	PT-2-3-55B	PT-2-3-55B	RV PRESSURE SCRAM	YES	NO	NO	NO		I		NO					
x	1	18	PT-2-3-55C	PT-2-3-55C	RV PRESSURE SCRAM	YES	NO	NO	NO		I		NO					
x	1	18	PT-2-3-55D	PT-2-3-55D	RV PRESSURE SCRAM	YES	NO	NO	NO		I		NO					
x	1	18	LT-2-3-73A	LT-2-3-73A	RV SHROUD LEVEL, CONT SPRAY PERMISSIVE	YES	NO	NO	NO		I		NO					
	1	18	LT-2-3-73B	LT-2-3-73B	RV SHROUD LEVEL, CONT SPRAY PERMISSIVE	YES	NO	NO	NO		I		NO					
	1	20	LI-2-3-91A	LI-2-3-91A	RV WTR LEVEL IND.	YES	NO	NO	NO		I		NO					
	1	20	LI-2-3-91B	LI-2-3-91B	RV WTR LEVEL IND.	YES	NO	NO	NO		I		NO					
x	1	18	PS-104-53A	PS-104-53A	SW/PUMP A PRESSURE SWITCH	YES	NO	NO	NO		I	H	NO					

	UNIT	SQUG EQUIPMENT CLASS	CURRENT EQUIPMENT ID	SSEL EQUIPMENT ID	EQUIPMENT DESCRIPTION	SCREEN1	SCREEN 2	SCREEN 3	SCREEN 4					Reactivity Control	Pressure Control	Inventory Control	Decay Heat Removal	Containment
						Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Environment							
											Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)	Borated System?					
	1	18	PS-104-53B	PS-104-53B	SW/PUMP B PRESSURE SWITCH	YES	NO	NO	NO		I	H	NO					
	1	18	PS-104-53C	PS-104-53C	SW/PUMP C PRESSURE SWITCH	YES	NO	NO	NO		I	H	NO					
	1	18	PS-104-53D	PS-104-53D	SW/PUMP D PRESSURE SWITCH	YES	NO	NO	NO		I	H	NO					
	1	20	PI-16-19-36A	PI-16-19-36A	TORUS PRESSURE INDICATION	YES	NO	NO	NO		I		NO					
	1	20	PI-16-19-36B	PI-16-19-36B	TORUS PRESSURE INDICATION	YES	NO	NO	NO		I		NO					
	1	18	PT-16-19-36A	PT-16-19-36A	TORUS PRESSURE INDICATION	YES	NO	NO	NO		I		NO					
	1	18	PT-16-19-36B	PT-16-19-36B	TORUS PRESSURE INDICATION	YES	NO	NO	NO		I		NO					
	1	20	LI-PI-16-19-12A	LI-PI-16-19-12A	TORUS WTR LEVEL/DW PRESS. IND.	YES	NO	NO	NO		I		NO					
	1	19	TE-16-19-33A	TE-16-19-33A	TORUS WTR TEMP. IND.	YES	NO	NO	NO		I		NO					
	1	18	LT-16-19-10A	LT-16-19-10A	TORUS WTR. LEVEL	YES	NO	NO	NO		I		NO					
	1	18	LT-16-19-10B	LT-16-19-10B	TORUS WTR. LEVEL	YES	NO	NO	NO		I		NO					
	1	20	LI-PI-16-19-12B	LI-PI-16-19-12B	TORUS WTR. LEVEL/DW PRESS. IND.	YES	NO	NO	NO		I		NO					
	1	19	TE-16-19-33C	TE-16-19-33C	TORUS WTR. TEMP. IND.	YES	NO	NO	NO		I		NO					
	1	20	TI-16-19-33A	TI-16-19-33A	TORUS WTR. TEMP. IND.	YES	NO	NO	NO		I		NO					
	1	20	TI-16-19-33C	TI-16-19-33C	TORUS WTR. TEMP. IND.	YES	NO	NO	NO		I		NO					
	1	08A	V2-74	V2-74	MAIN STEAM/DRAIN VALVE MOV	YES	NO	YES	NO		I	T	NO					X
	1	08A	V2-77	V2-77	MAIN STEAM/DRAIN VALVE MOV	YES	NO	YES	NO		I		NO					X
	1	07	V2-80A	V2-80A	MAIN STEAM/INBOARD MSIV	YES	NO	YES	NO		I	T	NO					X
	1	07	V2-80B	V2-80B	MAIN STEAM/INBOARD MSIV	YES	NO	YES	NO		I	T	NO					X
	1	07	V2-80C	V2-80C	MAIN STEAM/INBOARD MSIV	YES	NO	YES	NO		I	T	NO					X
x	1	07	V2-80D	V2-80D	MAIN STEAM/INBOARD MSIV	YES	NO	YES	NO		I	T	NO					X
	1	21	S-2-5A	S-2-5A	MAIN STEAM/INBOARD MSIV NITROGEN SUPPLY ACCUMULATOR	YES	NO	YES	NO		I	T	NO					X
	1	21	S-2-5B	S-2-5B	MAIN STEAM/INBOARD MSIV NITROGEN SUPPLY ACCUMULATOR	YES	NO	YES	NO		I	T	NO					X
	1	21	S-2-5C	S-2-5C	MAIN STEAM/INBOARD MSIV NITROGEN SUPPLY ACCUMULATOR	YES	NO	YES	NO		I	T	NO					X
	1	21	S-2-5D	S-2-5D	MAIN STEAM/INBOARD MSIV NITROGEN SUPPLY ACCUMULATOR	YES	NO	YES	NO		I	T	NO					X
x	1	07	V2-86A	V2-86A	MAIN STEAM/OUTBOARD MSIV	YES	NO	YES	NO		I	T	NO					X
	1	07	V2-86B	V2-86B	MAIN STEAM/OUTBOARD MSIV	YES	NO	YES	NO		I	T	NO					X
	1	07	V2-86C	V2-86C	MAIN STEAM/OUTBOARD MSIV	YES	NO	YES	NO		I	T	NO					X
	1	07	V2-86D	V2-86D	MAIN STEAM/OUTBOARD MSIV	YES	NO	YES	NO		I	T	NO					X
x	1	21	S-2-6A	S-2-6A	MAIN STEAM/OUTBOARD MSIV INST AIR SUPPLY ACCUMULATOR	YES	NO	YES	NO		I	T	NO					X
	1	21	S-2-6B	S-2-6B	MAIN STEAM/OUTBOARD MSIV INST AIR SUPPLY ACCUMULATOR	YES	NO	YES	NO		I	T	NO					X
	1	21	S-2-6C	S-2-6C	MAIN STEAM/OUTBOARD MSIV INST AIR SUPPLY ACCUMULATOR	YES	NO	YES	NO		I	T	NO					X
	1	21	S-2-6D	S-2-6D	MAIN STEAM/OUTBOARD MSIV INST AIR SUPPLY ACCUMULATOR	YES	NO	YES	NO		I	T	NO					X
	1	07	RV-2-71A	RV-2-71A	MAIN STEAM/RELIEF VALVE	YES	NO	YES	NO		I	T	NO		X			
	1	07	RV-2-71B	RV-2-71B	MAIN STEAM/RELIEF VALVE	YES	NO	YES	NO		I	T	NO		X			
x	1	07	RV-2-71C	RV-2-71C	MAIN STEAM/RELIEF VALVE	YES	NO	YES	NO		I	T	NO		X			
	1	07	RV-2-71D	RV-2-71D	MAIN STEAM/RELIEF VALVE	YES	NO	YES	NO		I	T	NO		X			
	1	0	E-1000-3	E-1000-3	MAKE-UP GAS TRIM HEATER	YES	NO	YES	NO		I		NO		X			
x	1	21	TK-55-1A	TK-55-1A	N2 AIR RECIEVER	YES	NO	YES	NO		I		NO		X			
	1	07	PCV-1-156-75	PCV-1-156-75	N2 PRESSURE REGULATOR	YES	NO	YES	NO		I		NO		X			
x	1	21	S-2-13A	S-2-13A	SAFETY RELIEF VALVE/NITROGEN SUPPLY ACCUMULATOR	YES	NO	YES	NO		I	T	NO		X			
	1	21	S-2-13B	S-2-13B	SAFETY RELIEF VALVE/NITROGEN SUPPLY ACCUMULATOR	YES	NO	YES	NO		I	T	NO		X			
	1	21	S-2-13C	S-2-13C	SAFETY RELIEF VALVE/NITROGEN SUPPLY ACCUMULATOR	YES	NO	YES	NO		I	T	NO		X			
	1	21	S-2-13D	S-2-13D	SAFETY RELIEF VALVE/NITROGEN SUPPLY ACCUMULATOR	YES	NO	YES	NO		I	T	NO		X			
	1	21	E-14-1A	E-14-1A	RHR/A RHR HEAT EXCHANGER	YES	NO	YES	NO		I		NO				X	
	1	06	P-10-1A	P-10-1A	RHR/A RHR PUMP	YES	NO	YES	NO		I		NO				X	
	1	21	E-14-1B	E-14-1B	RHR/B RHR HEAT EXCHANGER	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-26A	V10-26A	RHR/CONT SPRAY MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-26B	V10-26B	RHR/CONT SPRAY MOV	YES	NO	YES	NO		I		NO				X	

	UNIT	SQUG EQUIPMENT CLASS	CURRENT EQUIPMENT ID	SSEL EQUIPMENT ID	EQUIPMENT DESCRIPTION	SCREEN1	SCREEN 2	SCREEN 3	SCREEN 4					Reactivity Control	Pressure Control	Inventory Control	Decay Heat Removal	Containment
						Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Environment							
											Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)	Borated System?					
	1	08A	V10-31A	V10-31A	RHR/CONT SPRAY MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-31B	V10-31B	RHR/CONT SPRAY MOV	YES	NO	YES	NO		I		NO				X	
x	1	06	P-10-1D	P-10-1D	RHR/D RHR PUMP	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-65A	V10-65A	RHR/HEAT XC BYPASS MOV	YES	NO	YES	NO		I		NO				X	
x	1	08A	V10-65B	V10-65B	RHR/HEAT XC BYPASS MOV	YES	NO	YES	NO		I		NO				X	
x	1	08A	V10-27A	V10-27A	RHR/LPCI INJECTION MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-27B	V10-27B	RHR/LPCI INJECTION MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-16A	V10-16A	RHR/MIN-FLOW MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-16B	V10-16B	RHR/MIN-FLOW MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-15A	V10-15A	RHR/RECIRC SUCTION MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-15C	V10-15C	RHR/RECIRC SUCTION MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-15B	V10-15B	RHR/SDC SUCTION MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-15D	V10-15D	RHR/SDC SUCTION MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-34A	V10-34A	RHR/TORUS COOLING MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-34B	V10-34B	RHR/TORUS COOLING MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-39A	V10-39A	RHR/TORUS COOLING MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-39B	V10-39B	RHR/TORUS COOLING MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-38A	V10-38A	RHR/TORUS SPRAY MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-38B	V10-38B	RHR/TORUS SPRAY MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-13A	V10-13A	RHR/TORUS SUCTION MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-13D	V10-13D	RHR/TORUS SUCTION MOV	YES	NO	YES	NO		I		NO				X	
	1	07	PCV-104-69A	PCV-104-69A	RHRSW/RHRSW A PRESSURE CONTROL VALVE	YES	NO	NO	NO		I		NO					
	1	07	PCV-104-69B	PCV-104-69B	RHRSW/RHRSW B PRESSURE CONTROL VALVE	YES	NO	NO	NO		I		NO					
	1	06	P-8-1A	P-8-1A	RHRSW/A RHRSW PUMP	YES	NO	YES	NO		I		NO				X	
	1	06	P-8-1B	P-8-1B	RHRSW/B RHRSW PUMP	YES	NO	YES	NO		I		NO				X	
x	1	06	P-8-1C	P-8-1C	RHRSW/C RHRSW PUMP	YES	NO	YES	NO		I		NO				X	
	1	06	P-8-1D	P-8-1D	RHRSW/D RHRSW PUMP	YES	NO	YES	NO		I		NO				X	
x	1	08B	V10-89A	V10-89A	RHRSW/SW SUPPLY MOV	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-89B	V10-89B	RHRSW/SW SUPPLY MOV	YES	NO	YES	NO		I		NO				X	
x	1	07	SP-70-3A	SP-70-3A	BACKWASH FLOW CONTROL	YES	NO	NO	NO		I	H	NO					
	1	07	SP-70-3B	SP-70-3B	BACKWASH FLOW CONTROL	YES	NO	NO	NO		I	H	NO					
	1	06	P-7-1A	P-7-1A	SW/A SW PUMP	YES	NO	NO	NO		I	H	NO					
	1	07	FCV-104-17A	FCV-104-17A	SW/A TRAVELLING SCREEN CONTROL VALVE	YES	NO	NO	NO		I	H	NO					
	1	06	P-7-1B	P-7-1B	SW/B SW PUMP	YES	NO	NO	NO		I	H	NO					
	1	07	FCV-104-17B	FCV-104-17B	SW/B TRAVELLING SCREEN CONTROL VALVE	YES	NO	NO	NO		I	H	NO					
x	1	06	P-7-1C	P-7-1C	SW/C SW PUMP	YES	NO	NO	NO		I	H	NO					
	1	07	FCV-104-17C	FCV-104-17C	SW/C TRAVELLING SCREEN CONTROL VALVE	YES	NO	NO	NO		I	H	NO					
	1	06	P-7-1D	P-7-1D	SW/D SW PUMP	YES	NO	NO	NO		I	H	NO					
x	1	07	FCV-104-17D	FCV-104-17D	SW/D TRAVELLING SCREEN CONTROL VALVE	YES	NO	NO	NO		O	H	NO					
x	1	07	FCV-104-28A	FCV-104-28A	SW/DG COOLING	YES	NO	NO	NO		I		NO					
	1	07	FCV-104-28B	FCV-104-28B	SW/DG COOLING	YES	NO	NO	NO		I		NO					
	1	21	TK-67-1A	TK-67-1A	SW/DG-A EXPANSION TANK	YES	NO	NO	NO		I		NO					
	1	21	TK-67-1B	TK-67-1B	SW/DG-B EXPANSION TANK	YES	NO	NO	NO		I		NO					
	1	07	FCV-104-17E	FCV-104-17E	SW/E TRAVELLING SCREEN CONTROL VALVE	YES	NO	NO	NO		I	H	NO					
	1	08A	V70-19A	V70-19A	SW/TURB BLDG ISOL MOV	YES	NO	NO	NO		I		NO					
	1	08A	V70-19B	V70-19B	SW/TURB BLDG ISOL MOV	YES	NO	NO	NO		I		NO					
x	1	08A	V70-20	V70-20	SW/TURB BLDG ISOL MOV	YES	NO	NO	NO		I		NO					
	1	12	C-3-1A	C-3-1A	DG START AIR/COMPRESSOR A MOTOR	YES	NO	NO	NO		I		NO					
	1	12	C-3-1B	C-3-1B	DG START AIR/COMPRESSOR B MOTOR	YES	NO	NO	NO		I		NO					
	1	0	F-24-1A	F-24-1A	DG START AIR/FILTER A	YES	NO	NO	NO		I		NO					

	UNIT	SQUG EQUIPMENT CLASS	CURRENT EQUIPMENT ID	SSEL EQUIPMENT ID	EQUIPMENT DESCRIPTION	SCREEN1	SCREEN 2	SCREEN 3	SCREEN 4					Reactivity Control	Pressure Control	Inventory Control	Decay Heat Removal	Containment
						Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Environment							
											Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)	Borated System?					
	1	05	P-85-1A	P-85-1A	HPCI/AUX OIL PUMP	YES	NO	YES	NO		I		NO		X	X		
	1	08B	LSO-23-53	LSO-23-53	HPCI/COND DRAIN TO COND	YES	NO	YES	NO		I		NO		X	X		
	1	05	P-87-1A	P-87-1A	HPCI/CONDENSATE PUMP	YES	NO	YES	NO		I		NO		X	X		
x	1	05	TU-1-1A	TU-1-1A	HPCI/HPCI TURBINE	YES	NO	YES	NO		I		NO		X	X		
	1	07			HPCI/TURBINE CONTROL VALVE	YES	NO	YES	NO		I		NO		X	X		
	1	07			HPCI/TURBINE STOP VALVE	YES	NO	YES	NO		I		NO		X	X		
	1	0	AOD-113-1	AOD-113-1	CRHVAC/ISOLATION DAMPER FOR SAC-1A	YES	NO	NO	NO		I		NO					
	1	11			CRHVAC/LOW AMBIENT TEMP COND PRESS CONTROL PACK SACC-1A	YES	NO	NO	NO		I		NO					
	1	11			CRHVAC/LOW AMBIENT TEMP COND PRESS CONTROL PACK SACC-1B	YES	NO	NO	NO		I		NO					
	1	10			CRHVAC/SAC-1A COOLING COIL	YES	NO	NO	NO		I		NO					
	1	10			CRHVAC/SAC-1A FILTER SECTION	YES	NO	NO	NO		I		NO					
	1	10			CRHVAC/SAC-1A HEATING COIL	YES	NO	NO	NO		I		NO					
	1	0	DG-1A-INTAKE	DG-1A-INTAKE	DG ROOM VENTILATION/DG ROOM A LOUVER	YES	NO	NO	NO		I		NO					
	1	0	POS-113-2011	POS-113-2011	DG ROOM VENTILATION/DG ROOM A LOUVER OPERATOR	YES	NO	NO	NO		I		NO					
	1	0	POS-113-20XXX	POS-113-20XXX	DG ROOM VENTILATION/DG ROOM B LOUVER OPERATORS(6 TOTAL)	YES	NO	NO	NO		I		NO					
X	1	0	DG-1B-INTAKE-X	DG-1B-INTAKE-X	DG ROOM VENTILATION/DG ROOM B LOUVERS (6 TOTAL)	YES	NO	NO	NO		O		NO					
	1	10	RRU-5 FAN	RRU-5 FAN	SW/RRU-5 FAN	YES	NO	NO	NO		I		NO					
	1	10	RRU-5 MOTOR	RRU-5 MOTOR	SW/RRU-5 MOTOR	YES	NO	NO	NO		I		NO					
	1	10	RRU-6 FAN	RRU-6 FAN	SW/RRU-6 FAN	YES	NO	NO	NO		I		NO					
	1	10	RRU-6 MOTOR	RRU-6 MOTOR	SW/RRU-6 MOTOR	YES	NO	NO	NO		I		NO					
	1	10	RRU-7 FAN	RRU-7 FAN	SW/RRU-7 FAN	YES	NO	NO	NO		I		NO					
	1	10	RRU-7 MOTOR	RRU-7 MOTOR	SW/RRU-7 MOTOR	YES	NO	NO	NO		I		NO					
	1	10	RRU-8 FAN	RRU-8 FAN	SW/RRU-8 FAN	YES	NO	NO	NO		I		NO					
	1	10	RRU-8 MOTOR	RRU-8 MOTOR	SW/RRU-8 MOTOR	YES	NO	NO	NO		I		NO					
	1	06	P-8-1A COOL COIL	P-8-1A COOL COIL	RHRSW/P-8-1A MOTOR COOLING COIL	YES	NO	YES	NO		I		NO				X	
	1	06	P-8-1B COOL COIL	P-8-1B COOL COIL	RHRSW/P-8-1B MOTOR COOLING COIL	YES	NO	YES	NO		I		NO				X	
	1	06	P-8-1C COOL COIL	P-8-1C COOL COIL	RHRSW/P-8-1C MOTOR COOLING COIL	YES	NO	YES	NO		I		NO				X	
	1	06	P-8-1D COOL COIL	P-8-1D COOL COIL	RHRSW/P-8-1D MOTOR COOLING COIL	YES	NO	YES	NO		I		NO				X	
	1	08B	SE-3-31A	SE-3-31A	CRD/SCRAM DISCHARGE VOLUME VENT/DRAIN SOV	YES	NO	YES	NO		I		NO	X				
	1	08B	SE-3-31B	SE-3-31B	CRD/SCRAM DISCHARGE VOLUME VENT/DRAIN SOV	YES	NO	YES	NO		I		NO	X				
	1	08B	SO-3-117-XX-XX	SO-3-117-XX-XX	CRD/SCRAM PILOT VALVES (89)	YES	NO	YES	NO		I		NO	X				
	1	08B	SO-3-118-XX-XX	SO-3-118-XX-XX	CRD/SCRAM PILOT VALVES (89)	YES	NO	YES	NO		I		NO	X				
	1	08B	LSO-108-2A	LSO-108-2A	FUEL OIL/DG DAY TK FILL	YES	NO	NO	NO		I		NO					
	1	08B	LSO-108-2B	LSO-108-2B	FUEL OIL/DG DAY TK FILL	YES	NO	NO	NO		I		NO					
	1	08B	LSO-108-3	LSO-108-3	FUEL OIL/HEAT BOILER TK FILL	YES	NO	NO	NO		I	H	NO					
	1	08B	SE-23-50A	SE-23-50A	HPCI COND TO GL SEAL COND	YES	NO	YES	NO		I		NO		X	X		
	1	08B	LSO-23-54	LSO-23-54	HPCI DR TO GL SEAL COND	YES	NO	YES	NO		I		NO		X	X		
	1	20	FIC-23-108	FIC-23-108	HPCI FLOW CONT	YES	NO	YES	NO		I		NO		X	X		
	1	20	FI-23-108-1	FI-23-108-1	HPCI FLOW IND	YES	NO	YES	NO		I		NO		X	X		
	1	08B	LSO-23-40	LSO-23-40	HPCI G.S. COND DISCH TO RW	YES	NO	YES	NO		I		NO		X	X		
	1	08B	LSO-23-39	LSO-23-39	HPCI G.S. COND PP DISCH	YES	NO	YES	NO		I		NO		X	X		
x	1	20	ES-23-110	ES-23-110	HPCI INST PWR SUPPLY	YES	NO	YES	NO		I		NO		X	X		
x	1	20	FTA-23-118	FTA-23-118	HPCI SQ RT CONV-FLOW	YES	NO	YES	NO		I		NO		X	X		
x	1	20	ES-23-94	ES-23-94	HPCI/DC/AC INVERTER	YES	NO	YES	NO		I		NO		X	X		
	1	08B	SE-23-1	SE-23-1	HPCI/REMOTE TURBINE TRIP	YES	NO	YES	NO		I		NO		X	X		
x	1	0	TS-23-101A	TS-23-101A	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I	T	NO		X	X		
	1	0	TS-23-101B	TS-23-101B	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I		NO		X	X		
	1	0	TS-23-101C	TS-23-101C	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I		NO		X	X		
	1	0	TS-23-101D	TS-23-101D	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I		NO		X	X		
	1	0	TS-23-102B	TS-23-102B	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I		NO		X	X		

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											Environment							
						Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)	Borated System?					
	1	0	TS-23-102C	TS-23-102C	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I		NO		X	X		
x	1	0	TS-23-102A	TS-23-102A	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I	T	NO		X	X		
	1	0	TS-23-102D	TS-23-102D	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I		NO		X	X		
x	1	0	TS-23-103A	TS-23-103A	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I	T	NO		X	X		
	1	0	TS-23-103B	TS-23-103B	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I		NO		X	X		
	1	0	TS-23-103C	TS-23-103C	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I		NO		X	X		
	1	0	TS-23-103D	TS-23-103D	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I		NO		X	X		
x	1	0	TS-23-104A	TS-23-104A	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I	T	NO		X	X		
	1	0	TS-23-104B	TS-23-104B	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I		NO		X	X		
	1	0	TS-23-104C	TS-23-104C	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I		NO		X	X		
	1	0	TS-23-104D	TS-23-104D	HPCI/STEAM LEAK DETECTOR	YES	NO	YES	NO		I		NO		X	X		
	1	20	LSL-107-5A	LSL-107-5A	CST/LEVEL SWITCHES	YES	NO	YES	NO		I		NO			X		
	1	20	LSL-107-5B	LSL-107-5B	CST/LEVEL SWITCHES	YES	NO	YES	NO		I		NO			X		
	1	20	LR-23-73	LR-23-73	CST/RECORDER	YES	NO	YES	NO		I		NO			X		
	1	08B	SE-2-80A-1	SE-2-80A-1	INBOARD MSIV SOLENOID AC/DC	YES	NO	YES	NO		I	T	NO					X
	1	08B	SE-2-80B-1	SE-2-80B-1	INBOARD MSIV SOLENOID AC/DC	YES	NO	YES	NO		I	T	NO					X
	1	08B	SE-2-80C-1	SE-2-80C-1	INBOARD MSIV SOLENOID AC/DC	YES	NO	YES	NO		I	T	NO					X
	1	08B	SE-2-80D-1	SE-2-80D-1	INBOARD MSIV SOLENOID AC/DC	YES	NO	YES	NO		I	T	NO					X
	1	08B	FSO-2-39	FSO-2-39	RECIRC/SAMPLE LINE INBOARD ISOLATION	YES	NO	YES	NO		I	T	NO					X
	1	08B	FSO-2-40	FSO-2-40	RECIRC/SAMPLE LINE OUTBOARD ISOLATION	YES	NO	YES	NO		I		NO					X
	1	08B	SE-2-71A	SE-2-71A	MS SAFETY/RELIEF VALVE SOLENOID	YES	NO	YES	NO		I	T	NO					X
	1	08B	SE-2-71B	SE-2-71B	MS SAFETY/RELIEF VALVE SOLENOID	YES	NO	YES	NO		I	T	NO					X
	1	08B	SE-2-71C	SE-2-71C	MS SAFETY/RELIEF VALVE SOLENOID	YES	NO	YES	NO		I	T	NO					X
	1	08B	SE-2-71D	SE-2-71D	MS SAFETY/RELIEF VALVE SOLENOID	YES	NO	YES	NO		I	T	NO					X
x	1	08B	SE-2-86A-1	SE-2-86A-1	MS/OUTBOARD MSIV SOLENOID AC/DC	YES	NO	YES	NO		I	T	NO					X
	1	08B	SE-2-86B-1	SE-2-86B-1	MS/OUTBOARD MSIV SOLENOID AC/DC	YES	NO	YES	NO		I	T	NO					X
	1	08B	SE-2-86C-1	SE-2-86C-1	MS/OUTBOARD MSIV SOLENOID AC/DC	YES	NO	YES	NO		I	T	NO					X
	1	08B	SE-2-86D-1	SE-2-86D-1	MS/OUTBOARD MSIV SOLENOID AC/DC	YES	NO	YES	NO		I	T	NO					X
	1	07	FCV-10-160	FCV-10-160	RHR/SYS PROCESS SAMPLE	YES	NO	YES	NO		I		NO				X	
	1	08B	FSO-10-160	FSO-10-160	RHR/SYS PROCESS SAMPLE SOLENOID FCV-10-160	YES	NO	YES	NO		I		NO				X	
	1	08B	FSO-104-17A	FSO-104-17A	SW/A TRAVELLING SCREEN FLOW SOLENOID FCV-104-17A	YES	NO	NO	NO		I	H	NO					
	1	08B	FSO-104-17B	FSO-104-17B	SW/B TRAVELLING SCREEN FLOW SOLENOID FCV-104-17B	YES	NO	NO	NO		I	H	NO					
	1	08B	FSO-104-17C	FSO-104-17C	SW/C TRAVELLING SCREEN FLOW SOLENOID FCV-104-17C	YES	NO	NO	NO		I	H	NO					
	1	08B	FSO-104-17D	FSO-104-17D	SW/D TRAVELLING SCREEN FLOW SOLENOID FCV-104-17D	YES	NO	NO	NO		I	H	NO					
	1	18	FC-104-28A	FC-104-28A	SW/DG A FLOW CONTROLLER	YES	NO	NO	NO	YES	I		NO					
	1	18	FC-104-28B	FC-104-28B	SW/DG B FLOW CONTROLLER	YES	NO	NO	NO	YES	I		NO					
	1	08B	FSO-104-28A	FSO-104-28A	SW/DG COOLING FCV-104-28A	YES	NO	NO	NO		I		NO					
	1	08B	FSO-104-28B	FSO-104-28B	SW/DG COOLING FCV-104-28B	YES	NO	NO	NO		I		NO					
	1	08B	FSO-104-17E	FSO-104-17E	SW/E TRAVELLING SCREEN FLOW SOLENOID FCV-104-17E	YES	NO	NO	NO		I	H	NO					
	1	08B	NG-12B	NG-12B	CAC SOV AIR ISOLATION (INBD) INJECTION TO TORUS PNL B	YES	NO	YES	NO		I		NO					X
x	1	08A	VG-22A	VG-22A	CAD MOV VENT ISOLATION (OUTBD)	YES	NO	YES	NO		I		NO					X
	1	08A	VG-22B	VG-22B	CAD MOV VENT ISOLATION (OUTBD)	YES	NO	YES	NO		I		NO					X
	1	08B	NG-11A	NG-11A	CAD SOV AIR ISOLATION (OUTBD) COMPR DISCHARGE PNL A	YES	NO	YES	NO		I		NO					X
x	1	08B	NG-13A	NG-13A	CAD SOV AIR ISOLATION (INBD) INJECTION TO DW PNL A	YES	NO	YES	NO		I		NO					X
	1	08B	NG-13B	NG-13B	CAD SOV AIR ISOLATION (INBD) INJECTION TO DW PNL B	YES	NO	YES	NO		I		NO					X
	1	08B	NG-12A	NG-12A	CAD SOV AIR ISOLATION (INBD) INJECTION TO TORUS PNL A	YES	NO	YES	NO		I		NO					X
	1	08B	NG-11B	NG-11B	CAD SOV AIR ISOLATION (OUTBD) COMP DISCHARGE PNL B	YES	NO	YES	NO		I		NO					X
	1	08B	VG-26	VG-26	CAD SOV SAMPLE ISOLATION (INBD) SUPPLY	YES	NO	YES	NO		I		NO					X
	1	08B	FSO-109-75A-3	FSO-109-75A-3	CAD SOV SAMPLE ISOLATION (INBD) TORUS SUPPLY PNL A	YES	NO	YES	NO		I		NO					X
	1	08B	VG-23	VG-23	CAD SOV SAMPLE ISOLATION (OUTBD) SUPPLY	YES	NO	YES	NO		I		NO					X

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					Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Environment							
										Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)	Borated System?					
1	08B	FSO-109-75A-4	FSO-109-75A-4	CAD SOV SAMPLE ISOLATION (OUTBD) TORUS SUPPLY PNL A	YES	NO	YES	NO		I		NO					X
1	08B	VG-9B	VG-9B	CAD SOV VENT ISOLATION (INBD) INJECTION TO TORUS PNL B	YES	NO	YES	NO		I		NO					X
1	08B	VG-9A	VG-9A	CAD SOV VENT ISOLATION (INBD) INJECTION TO DW PNL A	YES	NO	YES	NO		I		NO					X
1	08B	FSO-109-76A	FSO-109-76A	SAMPLE SYSTEM ISOLATION (INBD) CAM RETURN TO TORUS	YES	NO	YES	NO		I		NO					X
1	08B	FSO-109-76B	FSO-109-76B	SAMPLE SYSTEM ISOLATION (OUTBD) CAM RETURN TO TORUS	YES	NO	YES	NO		I		NO					X
1	07	V20-94	V20-94	DRYWELL EQUIPMENT DRAINS ISOLATION (INBD) AOV	YES	NO	YES	NO		I		NO					X
1	07	V20-95	V20-95	DRYWELL EQUIPMENT DRAINS ISOLATION (OUTBD) AOV	YES	NO	YES	NO		I		NO					X
1	07	V20-83	V20-83	DRYWELL FLOOR DRAINS DISCHARGE ISOLATION (OUTBD) AOV	YES	NO	YES	NO		I		NO					X
1	07	V20-82	V20-82	DRYWELL FLOOR DRAINS DISCHARGE ISOLATION (INBD) AOV	YES	NO	YES	NO		I		NO					X
1	07	V72-38A	V72-38A	CAC SUCTION AOV	YES	NO	YES	NO		I		NO					X
1	07	V72-38B	V72-38B	CAC SUCTION AOV	YES	NO	YES	NO		I		NO					X
1	07	SB-11	SB-11	REACTOR BUILDING HVAC RETURN ISOLATION (INBD)	YES	NO	YES	NO		I		NO					X
1	07	SB-12	SB-12	REACTOR BUILDING HVAC RETURN ISOLATION (OUTBD)	YES	NO	YES	NO		I		NO					X
1	07	SB-10	SB-10	REACTOR BUILDING HVAC SUPPLY ISOLATION (OUTBD)	YES	NO	YES	NO		I		NO					X
1	07	SB-9	SB-9	REACTOR BUILDING HVAC SUPPLY ISOLATION (OUTBD)	YES	NO	YES	NO		I		NO					X
1	07	FCV-2-39	FCV-2-39	RECIRC/SAMPLE LINE INBOARD ISOLATION	YES	NO	YES	NO		I	T	NO					X
1	07	FCV-2-40	FCV-2-40	RECIRC/SAMPLE LINE OUTBOARD ISOLATION	YES	NO	YES	NO		I		NO					X
1	07	SB-16-19-7A	SB-16-19-7A	18" DRYWELL VENT AOV ISOLATION (INBD)	YES	NO	YES	NO		I		NO					X
1	07	SB-16-19-7B	SB-16-19-7B	18" TORUS VENT AOV ISOLATION (INBD)	YES	NO	YES	NO		I		NO					X
1	07	SB-16-19-6A	SB-16-19-6A	3" DRYWELL VENT AOV ISOLATION (INBD)	YES	NO	YES	NO		I		NO					X
1	07	SB-16-19-6B	SB-16-19-6B	3" TORUS VENT AOV ISOLATION (INBD)	YES	NO	YES	NO		I		NO					X
1	07	SB-16-19-9	SB-16-19-9	AIR PURGE SUPPLY ISOLATION (OUTBD) AOV	YES	NO	YES	NO		I		NO					X
1	08B	V16-20-22A	V16-20-22A	N2 MAKEUP ISOLATION (INBD) SOLENOID	YES	NO	YES	NO		I		NO					X
1	08B	V16-20-22B	V16-20-22B	N2 MAKEUP ISOLATION (INBD) SOLENOID	YES	NO	YES	NO		I		NO					X
1	08B	V16-20-20	V16-20-20	N2 MAKEUP ISOLATION (OUTBD) SOLENOID	YES	NO	YES	NO		I		NO					X
1	07	SB-16-19-23	SB-16-19-23	N2 PURGE SUPPLY ISOLATION (OUTBD) AOV	YES	NO	YES	NO		I		NO					X
1	07	SB-16-19-11A	SB-16-19-11A	PRIMARY CONTAINMENT VACUUM RELIEF AOV	YES	NO	YES	NO		I		NO					X
1	07	SB-16-19-11B	SB-16-19-11B	PRIMARY CONTAINMENT VACUUM RELIEF AOV	YES	NO	YES	NO		I		NO					X
1	07	SB-16-19-6	SB-16-19-6	PRIMARY CONTAINMENT VENT TO SBGT ISOLATION (OUTBD) AOV	YES	NO	YES	NO		I		NO					X
1	07	SB-16-19-7	SB-16-19-7	PRIMARY CONTAINMENT VENT TO STACK ISOLATION (OUTBD) AOV	YES	NO	YES	NO		I		NO					X
1	07	SB-16-19-8	SB-16-19-8	PURGE SUPPLY DRYWELL ISOLATION (INBD) AOV	YES	NO	YES	NO		I		NO					X
1	07	SB-16-19-10	SB-16-19-10	PURGE SUPPLY TO TORUS ISOLATION (OUTBD) AOV	YES	NO	YES	NO		I		NO					X
1	08A	V70-117	V70-117	RBCCW/PC ISOLATION MOV	YES	NO	YES	NO		I		NO					X
1	08A	V13-15	V13-15	RCIC/STEAM SUPPLY MOV	YES	NO	YES	NO		I	T	NO					X
1	08A	V13-16	V13-16	RCIC/STEAM ISOL VALVE MOV	YES	NO	YES	NO		I	T	NO					X
1	08A	V10-57	V10-57	RHR/MOV TO RW	YES	NO	YES	NO		I		NO				X	
1	08A	V10-66	V10-66	RHR/MOV TO RW	YES	NO	YES	NO		I		NO				X	
1	08A	V10-17	V10-17	RHR/SDC VALVE	YES	NO	YES	NO		I		NO				X	
1	08A	V10-18	V10-18	RHR/SDC VALVE	YES	NO	YES	NO		I	T	NO				X	
1	08A	V12-15	V12-15	RWCU/INBOARD ISOLATION MOV	YES	NO	YES	NO		I	T	NO					X
1	08A	V12-18	V12-18	RWCU/OUTBOARD ISOLATION MOV	YES	NO	YES	NO		I		NO					X
1	21			CRD/ACCUMULATORS (89)	YES	NO	YES	NO		I		NO	X				
1	0	V2-96A	V2-96A	FDW/OUTBOARD CHECK VALVE	YES	NO	YES	NO		I	T	NO					X
1	0	V2-27A	V2-27A	FDW/OUTBOARD CHECK VALVE	YES	NO	YES	NO		I	T	NO					X
1	0	V2-28A	V2-28A	FDW/INBOARD CHECK VALVE	YES	NO	YES	NO		I	T	NO					X
1	0	V2-28B	V2-28B	FDW/INBOARD CHECK VALVE	YES	NO	YES	NO		I	T	NO					X
1	18	DPT-2-116A	DPT-2-116A	MS/STEAM DIFF PRESSURE TRANSMITTER A	YES	NO	YES	NO		I		NO					X
1	18	DPT-2-116B	DPT-2-116B	MS/STEAM DIFF PRESSURE TRANSMITTER A	YES	NO	YES	NO		I		NO					X
1	18	DPT-2-116C	DPT-2-116C	MS/STEAM DIFF PRESSURE TRANSMITTER A	YES	NO	YES	NO		I		NO					X
1	18	DPT-2-116D	DPT-2-116D	MS/STEAM DIFF PRESSURE TRANSMITTER A	YES	NO	YES	NO		I		NO					X

	UNIT	SQUG EQUIPMENT CLASS	CURRENT EQUIPMENT ID	SSEL EQUIPMENT ID	EQUIPMENT DESCRIPTION	SCREEN1	SCREEN 2	SCREEN 3	SCREEN 4					Reactivity Control	Pressure Control	Inventory Control	Decay Heat Removal	Containment
											Environment							
						Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)	Borated System?					
	1	18	DPT-2-117A	DPT-2-117A	MS/STEAM DIFF PRESSURE TRANSMITTER B	YES	NO	YES	NO		I		NO					X
	1	18	DPT-2-117B	DPT-2-117B	MS/STEAM DIFF PRESSURE TRANSMITTER B	YES	NO	YES	NO		I		NO					X
	1	18	DPT-2-117C	DPT-2-117C	MS/STEAM DIFF PRESSURE TRANSMITTER B	YES	NO	YES	NO		I		NO					X
	1	18	DPT-2-117D	DPT-2-117D	MS/STEAM DIFF PRESSURE TRANSMITTER B	YES	NO	YES	NO		I		NO					X
	1	18	DPT-2-118A	DPT-2-118A	MS/STEAM DIFF PRESSURE TRANSMITTER C	YES	NO	YES	NO		I		NO					X
	1	18	DPT-2-118B	DPT-2-118B	MS/STEAM DIFF PRESSURE TRANSMITTER C	YES	NO	YES	NO		I		NO					X
	1	18	DPT-2-118C	DPT-2-118C	MS/STEAM DIFF PRESSURE TRANSMITTER C	YES	NO	YES	NO		I		NO					X
	1	18	DPT-2-118D	DPT-2-118D	MS/STEAM DIFF PRESSURE TRANSMITTER C	YES	NO	YES	NO		I		NO					X
	1	18	DPT-2-119A	DPT-2-119A	MS/STEAM DIFF PRESSURE TRANSMITTER D	YES	NO	YES	NO		I		NO					X
	1	18	DPT-2-119B	DPT-2-119B	MS/STEAM DIFF PRESSURE TRANSMITTER D	YES	NO	YES	NO		I		NO					X
	1	18	DPT-2-119C	DPT-2-119C	MS/STEAM DIFF PRESSURE TRANSMITTER D	YES	NO	YES	NO		I		NO					X
	1	18	DPT-2-119D	DPT-2-119D	MS/STEAM DIFF PRESSURE TRANSMITTER D	YES	NO	YES	NO		I		NO					X
	1	0	V70-113	V70-113	RBCCW/RC ISOLATION CHECK VALVE	YES	NO	YES	NO		I		NO					X
	1	18	PS-13-87A	PS-13-87A	RCIC/LOW STEAM PRESSURE ISOLATION	YES	NO	YES	NO		I		NO					X
	1	18	PS-13-87B	PS-13-87B	RCIC/LOW STEAM PRESSURE ISOLATION	YES	NO	YES	NO		I		NO					X
	1	18	PS-13-87C	PS-13-87C	RCIC/LOW STEAM PRESSURE ISOLATION	YES	NO	YES	NO		I		NO					X
	1	18	PS-13-87D	PS-13-87D	RCIC/LOW STEAM PRESSURE ISOLATION	YES	NO	YES	NO		I		NO					X
	1	0	TS-13-79A	TS-13-79A	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I	T	NO					X
	1	0	TS-13-80A	TS-13-80A	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I	T	NO					X
	1	0	TS-13-81A	TS-13-81A	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I	T	NO					X
	1	0	TS-13-82A	TS-13-82A	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I	T	NO					X
	1	0	FI-104-70A	FI-104-70A	RHRSW/PUMP A COOLING WATER FLOW INDICATOR	YES	NO	YES	NO		I		NO				X	
	1	0	FI-104-70B	FI-104-70B	RHRSW/PUMP B COOLING WATER FLOW INDICATOR	YES	NO	YES	NO		I		NO				X	
	1	0	FI-104-70C	FI-104-70C	RHRSW/PUMP C COOLING WATER FLOW INDICATOR	YES	NO	YES	NO		I		NO				X	
	1	0	FI-104-70D	FI-104-70D	RHRSW/PUMP D COOLING WATER FLOW INDICATOR	YES	NO	YES	NO		I		NO				X	
	1	08A	V10-184	V10-184	RHR/RHR TO RHRSW TIE	YES	NO	YES	NO		I		NO			X		
	1	08A	V10-183	V10-183	RHR/RHR TO RHRSW TIE	YES	NO	YES	NO		I		NO			X		
	1	0	F-24-1B	F-24-1B	DG START AIR/FILTER B	YES	NO	NO	NO		I		NO					
	1	14	LP-1AH	LP-1AH	DG "A" LIGHTING PNL	YES	NO	NO	NO		I		NO					
	1	04	T-LP-1AH	T-LP-1AH	TRANSFORMER FOR LP-1AH DG "A"	YES	NO	NO	NO		I		NO					
	1	14	LP-1AJ	LP-1AJ	DG "B" LIGHTING PNL	YES	NO	NO	NO		I		NO					
	1	04	T-LP-1AJ	T-LP-1AJ	TRANSFORMER FOR LP-1AJ DG "B"	YES	NO	NO	NO		I		NO					
	1	14	AC-DP-5	AC-DP-5	120/208V AC DISTRIBUTION PANEL	YES	NO	NO	NO		I		NO					
	1	14	LP-1L	LP-1L	LIGHTING PNL-120V AC	YES	NO	NO	NO		I		NO					
	1	14	PP-9A	PP-9A	240/120V AC POWER PANEL AT MCC-9A FOR SBGT	YES	NO	NO	NO		I		NO					
	1	14	CP-82-1	CP-82-1	ALTERNATE SHUTDOWN PANEL	YES	NO	NO	NO		I		NO					
	1	14	CP-82-3	CP-82-3	ALTERNATE SHUTDOWN PANEL	YES	NO	NO	NO		I		NO					
x	1	20	CRP 9-03	CRP 9-03	CONTROL ROOM PANEL	YES	NO	NO	NO	YES	I		NO					
	1	20	CRP 9-04	CRP 9-04	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-05	CRP 9-05	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-06	CRP 9-06	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-07	CRP 9-07	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-08	CRP 9-08	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-10	CRP 9-10	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-12	CRP 9-12	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-14	CRP 9-14	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-15	CRP 9-15	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-17	CRP 9-17	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
x	1	20	CRP 9-19	CRP 9-19	CONTROL ROOM PANEL	YES	NO	NO	NO	YES	I		NO					
x	1	20	CRP 9-20	CRP 9-20	CONTROL ROOM PANEL	YES	NO	NO	NO	YES	I		NO					

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											Environment							
						Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)	Borated System?					
	1	20	CRP 9-22	CRP 9-22	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-25	CRP 9-25	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-26	CRP 9-26	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-27	CRP 9-27	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-30	CRP 9-30	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-32	CRP 9-32	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-33	CRP 9-33	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-39	CRP 9-39	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-41	CRP 9-41	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-42	CRP 9-42	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-45	CRP 9-45	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-46	CRP 9-46	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CRP 9-47	CRP 9-47	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CAD PNL A	CAD PNL A	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	CAD PNL B	CAD PNL B	CONTROL ROOM PANEL	YES	NO	NO	NO		I		NO					
	1	20	PPP-A-1	PPP-A-1	RPS PWR PROTECTION PNL PNL A-1	YES	NO	YES	NO		I		NO	X				
	1	20	PPP-A-2	PPP-A-2	RPS PWR PROTECTION PNL PNL A-2	YES	NO	YES	NO		I		NO	X				
	1	20	PPP-B-1	PPP-B-1	RPS PWR PROTECTION PNL PNL B-1	YES	NO	YES	NO		I		NO	X				
	1	20	PPP-B-2	PPP-B-2	RPS PWR PROTECTION PNL PNL-B-2	YES	NO	YES	NO		I		NO	X				
x	1	20		DG VOLT REG CAB	DG RM B VOLTAGE REGULATOR CAB	YES	NO	NO	NO	YES	I		NO					
x	1	20		NEUTRAL TRANS CAB	DG RM A NEUTRAL TRANSFORMER CAB	YES	NO	NO	NO	YES	I		NO					
	1	20		CONT BOARD	DG RM A CONTROL BOARD	YES	NO	NO	NO	YES	I		NO					
	1	20		ENG INST PNL	DG RM A ENGINE INSTR PNL	YES	NO	NO	NO		I		NO					
	1	20		ENG CONTACTOR CAB	DG RM A ENGINE CONTACTOR CAB	YES	NO	NO	NO		I		NO					
	1	17		DG SKID	DG RM A EQUIP SKID	YES	NO	NO	NO		I		NO					
	1	18	LSL-108-13A	LSL-108-13A	DIESEL FUEL OIL TRANSFER PUMP START	YES	NO	NO	NO		I		NO					
	1	18	LSL-108-13B	LSL-108-13B	DIESEL FUEL OIL TRANSFER PUMP START	YES	NO	NO	NO		I		NO					
	1	18	LSH-108-12A	LSH-108-12A	DIESEL FUEL OIL TRANSFER PUMP STOP	YES	NO	NO	NO		I		NO					
	1	18	LSH-108-12B	LSH-108-12B	DIESEL FUEL OIL TRANSFER PUMP STOP	YES	NO	NO	NO		I		NO					
	1	18	PS-23-1	PS-23-1	HPCI/AUX OIL PUMP START	YES	NO	YES	NO		I		NO		X	X		
	1	18	LSH-23-90	LSH-23-90	HPCI/MS COND DRAIN POT LCV-23-53 CONTROL	YES	NO	YES	NO		I		NO		X	X		
	1	08B	FSO-10-161	FSO-10-161	RHR/SYS PROCESS SAMPLE SOLENOID FCV-10-161	YES	NO	YES	NO		I		NO					X
	1	18	PS-2-134A	PS-2-134A	MS LINE PRESS	YES	NO	YES	NO		I		NO					X
	1	18	PS-2-134B	PS-2-134B	MS LINE PRESS	YES	NO	YES	NO		I		NO					X
	1	18	PS-2-134C	PS-2-134C	MS LINE PRESS	YES	NO	YES	NO		I		NO					X
	1	18	PS-2-134D	PS-2-134D	MS LINE PRESS	YES	NO	YES	NO		I		NO					X
	1	18	PS-2-11A	PS-2-11A	CONDENSER VACUUM	YES	NO	YES	NO		I		NO					X
	1	18	PS-2-11B	PS-2-11B	CONDENSER VACUUM	YES	NO	YES	NO		I		NO					X
	1	18	PS-2-11C	PS-2-11C	CONDENSER VACUUM	YES	NO	YES	NO		I		NO					X
	1	18	PS-2-11D	PS-2-11D	CONDENSER VACUUM	YES	NO	YES	NO		I		NO					X
	1	18	PS-10-105A	PS-10-105A	RHR PP A DISCH PRESS INTERLOCK	YES	NO	YES	NO		I		NO				X	
	1	18	PS-10-105B	PS-10-105B	RHR PP B DISCH PRESS INTERLOCK	YES	NO	YES	NO		I		NO				X	
	1	18	PS-10-105C	PS-10-105C	RHR PP C DISCH PRESS INTERLOCK	YES	NO	YES	NO		I		NO				X	
	1	18	PS-10-105D	PS-10-105D	RHR PP D DISCH PRESS INTERLOCK	YES	NO	YES	NO		I		NO				X	
	1	18	PS-10-105E	PS-10-105E	RHR PP A DISCH PRESS INTERLOCK	YES	NO	YES	NO		I		NO				X	
	1	18	PS-10-105F	PS-10-105F	RHR PP B DISCH PRESS INTERLOCK	YES	NO	YES	NO		I		NO				X	
	1	18	PS-10-105G	PS-10-105G	RHR PP C DISCH PRESS INTERLOCK	YES	NO	YES	NO		I		NO				X	
	1	18	PS-10-105H	PS-10-105H	RHR PP D DISCH PRESS INTERLOCK	YES	NO	YES	NO		I		NO				X	
	1	08B	SE-1-125-9A	SE-1-125-9A	SB-9 SOV	YES	NO	YES	NO		I		NO					X
	1	08B	SE-1-125-9B	SE-1-125-9B	SB-9 SOV	YES	NO	YES	NO		I		NO					X

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											Environment							
						Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)	Borated System?					
	1	08B	SE-1-125-9C	SE-1-125-9C	SB-9 SOV	YES	NO	YES	NO		I		NO					X
	1	08B	SE-1-125-10A	SE-1-125-10A	SB-10 SOV	YES	NO	YES	NO		I		NO					X
	1	08B	SE-1-125-10B	SE-1-125-10B	SB-10 SOV	YES	NO	YES	NO		I		NO					X
	1	08B	SE-1-125-10C	SE-1-125-10C	SB-10 SOV	YES	NO	YES	NO		I		NO					X
	1	08B	SE-1-125-11A	SE-1-125-11A	SB-11 SOV	YES	NO	YES	NO		I		NO					X
	1	08B	SE-1-125-11B	SE-1-125-11B	SB-11 SOV	YES	NO	YES	NO		I		NO					X
	1	08B	SE-1-125-11C	SE-1-125-11C	SB-11 SOV	YES	NO	YES	NO		I		NO					X
	1	08B	SE-1-125-12A	SE-1-125-12A	SB-12 SOV	YES	NO	YES	NO		I		NO					X
	1	08B	SE-1-125-12B	SE-1-125-12B	SB-12 SOV	YES	NO	YES	NO		I		NO					X
	1	08B	SE-1-125-12C	SE-1-125-12C	SB-12 SOV	YES	NO	YES	NO		I		NO					X
	1	18	FT-12-1A	FT-12-1A	RWCU/FLOW TRANSMITTER	YES	NO	YES	NO		I		NO					X
	1	18	FT-12-1B	FT-12-1B	RWCU/FLOW TRANSMITTER	YES	NO	YES	NO		I		NO					X
	1	18	DPIS-16-19-32A	DPIS-16-19-32A	TORUS VACUUM VV CONTROL	YES	NO	YES	NO		I		NO					X
	1	18	DPIS-16-19-32B	DPIS-16-19-32B	TORUS VACUUM VV CONTROL	YES	NO	YES	NO		I		NO					X
	1	20	B-1098	B-1098	TEF-2 DG EXH FAN CONTROLS	YES	NO	NO	NO		I		NO					
	1	20	B-1099	B-1099	TEF-2 DG EXH FAN CONTROLS	YES	NO	NO	NO		I		NO					
	1	20	B-1100	B-1100	TEF-3 DG EXH FAN CONTROLS	YES	NO	NO	NO		I		NO					
	1	20	B-1101	B-1101	TEF-3 DG EXH FAN CONTROLS	YES	NO	NO	NO		I		NO					
	1	0	B-1106	B-1106	BUS 3 TRANSFER SWITCH	YES	NO	NO	NO		I		NO					
	1	20	B-892	B-892	MCC-9C LOAD SHEDDING RELAY BOX	YES	NO	NO	NO		I		NO					
	1	0	B-1059	B-1059	RWCU/HI TEMP ISOL SYS TB BOX	YES	NO	YES	NO		I		NO					X
	1	0	B-1060	B-1060	RWCU/HI TEMP ISOL SYS TB BOX	YES	NO	YES	NO		I		NO					X
	1	0	B-1061	B-1061	RWCU/HI TEMP ISOL SYS TB BOX	YES	NO	YES	NO		I		NO					X
	1	0	B-1062	B-1062	RWCU/HI TEMP ISOL SYS TB BOX	YES	NO	YES	NO		I		NO					X
	1	0	B-1063	B-1063	RWCU/HI TEMP ISOL SYS TB BOX	YES	NO	YES	NO		I		NO					X
	1	0	B-1064	B-1064	RWCU/HI TEMP ISOL SYS TB BOX	YES	NO	YES	NO		I		NO					X
	1	0	B-1065	B-1065	RWCU/HI TEMP ISOL SYS TB BOX	YES	NO	YES	NO		I		NO					X
	1	0	B-1066	B-1066	RWCU/HI TEMP ISOL SYS TB BOX	YES	NO	YES	NO		I		NO					X
	1	20	HVSGP-A	HVSGP-A	RRU 5,6,7,8 SWITCH BOX	YES	NO	NO	NO		I		NO					
	1	20	HVSGP-B	HVSGP-B	RRU 5,6,7,8 SWITCH BOX	YES	NO	NO	NO		I		NO					
	1	14	HVFRP-A	HVFRP-A	HVAC "A" CONT PNL	YES	NO	NO	NO		I		NO					
	1	20	HVAC PNL 2	HVAC PNL 2	HVAC PNL - SAC-1	YES	NO	NO	NO		I		NO					
	1	14		FAN CONT BOX A	HVAC SACC-1A FAN CONTROL BOX	YES	NO	NO	NO		I		NO					
	1	14	PP-89	PP-89	120/240V AC DISTRIBUTION PANEL AT MCC-9D	YES	NO	NO	NO		I		NO					
	1	0	L-16	L-16	DG "A" RM DAMPER MOTOR	YES	NO	NO	NO		I		NO					
x	1	0	L-17	L-17	DG "B" RM DAMPER MOTOR	YES	NO	NO	NO		I		NO					
x	1	20	RATS-1A	RATS-1A	DG-1A RM THERMOSTAT	YES	NO	NO	NO		I		NO					
	1	20	RATS-1B	RATS-1B	DG-1B RM THERMOSTAT	YES	NO	NO	NO		I		NO					
	1	0	TS-113-4001	TS-113-4001	SAC-1 FREEZESTAT SWITCH	YES	NO	NO	NO		I		NO					
	1	0	FS-113-4001	FS-113-4001	SP-1 DISCH FLOW SWITCH	YES	NO	NO	NO		I		NO					
	1	0	FS-113-4005	FS-113-4005	SP-2 DISCH FLOW SWITCH	YES	NO	NO	NO		I		NO					
	1	08B	SE-113-2007	SE-113-2007	DG RM A DAMPER SOV	YES	NO	NO	NO		I		NO					
	1	08B	SE-113-2021	SE-113-2021	DG RM B DAMPER SOV	YES	NO	NO	NO		I		NO					
x	1	08B	SE-113-2022	SE-113-2022	DG RM B DAMPER SOV	YES	NO	NO	NO		I		NO					
	1	08B	SE-113-2023	SE-113-2023	DG RM B DAMPER SOV	YES	NO	NO	NO		I		NO					
	1	20	25-5A	25-5A	ANALOG CABINET	YES	NO	NO	NO		I		NO					
	1	20	25-5B	25-5B	ANALOG CABINET	YES	NO	NO	NO		I		NO					
	1	20	25-6A	25-6A	ANALOG CABINET	YES	NO	NO	NO		I		NO					
	1	20	25-6B	25-6B	ANALOG CABINET	YES	NO	NO	NO		I		NO					
	1	20	25-56A	25-56A	ANALOG CABINET	YES	NO	NO	NO		I		NO					

	UNIT	SQUG EQUIPMENT CLASS	CURRENT EQUIPMENT ID	SSEL EQUIPMENT ID	EQUIPMENT DESCRIPTION	SCREEN1	SCREEN 2	SCREEN 3	SCREEN 4					Reactivity Control	Pressure Control	Inventory Control	Decay Heat Removal	Containment
											Environment							
						Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)	Borated System?					
	1	20	25-56B	25-56B	ANALOG CABINET	YES	NO	NO	NO		I		NO					
	1	20		PNL-VAC-MG-2-1A	CONTROL PANEL FOR VITAL AC MG-2-1A	YES	NO	NO	NO	YES	I		NO					
	1	20		CONT BOARD	DG RM B CONTROL BOARD	YES	NO	NO	NO	YES	I		NO					
x	1	20		ENG CONTACTOR CAB	DG RM B ENGINE CONTACTOR CAB	YES	NO	NO	NO		I		NO					
x	1	20		ENG INST PNL	DG RM B ENGINE INSTR PNL	YES	NO	NO	NO		I		NO					
x	1	17		DG SKID	DG RM B EQUIP SKID	YES	NO	NO	NO		I		NO					
	1	20		NEUTRAL TRANS CAB	DG RM B NEUTRAL TRANSFORMER CAB	YES	NO	NO	NO	YES	I		NO					
	1	20		DG VOLT REG CAB	DG RM A VOLTAGE REGULATOR CAB	YES	NO	NO	NO	YES	I		NO					
x	1	04	T-LP-1L	T-LP-1L	TRANFORMER FOR LP-1L IN CONTROL ROOM	YES	NO	NO	NO		I		NO					
	1	0	TS-13-79B	TS-13-79B	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I		NO					X
	1	0	TS-13-79C	TS-13-79C	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I		NO					X
	1	0	TS-13-79D	TS-13-79D	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I		NO					X
	1	0	TS-13-80B	TS-13-80B	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I		NO					X
	1	0	TS-13-80C	TS-13-80C	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I		NO					X
	1	0	TS-13-80D	TS-13-80D	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I		NO					X
	1	0	TS-13-81B	TS-13-81B	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I		NO					X
	1	0	TS-13-81C	TS-13-81C	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I		NO					X
	1	0	TS-13-81D	TS-13-81D	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I		NO					X
	1	0	TS-13-82B	TS-13-82B	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I		NO					X
	1	0	TS-13-82C	TS-13-82C	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I		NO					X
	1	0	TS-13-82D	TS-13-82D	RCIC/STEAM LEAK DETECTION	YES	NO	YES	NO		I		NO					X
	1	14		FAN CONT BOX B	HVAC SACC-1B FAN CONTROL BOX	YES	NO	NO	NO		I		NO					
	1	20	ES-16-19-13A	ES-16-19-13A	POWER SUPPLY FOR TORUS LT-10A;PT-29A;LI/PI-12A	YES	NO	NO	NO		I		NO					
	1	20	ES-16-19-13B	ES-16-19-13B	POWER SUPPLY FOR TORUS LT-10B;PT-29B;LI/PI-12B	YES	NO	NO	NO		I		NO					
	1	20	ES-10-145A	ES-10-145A	POWER SUPPLY FOR PI-16-19-36A TORUS PRESSURE	YES	NO	NO	NO		I		NO					
	1	20	ES-16-19-43	ES-16-19-43	POWER SUPPLY FOR PT-16-19-36B TORUS PRESSURE	YES	NO	NO	NO		I		NO					
	1	20	PR-16-19-44	PR-16-19-44	TORUS PRESS RECORDER	YES	NO	NO	NO		I		NO					
	1	18	EGM-23-1	EGM-23-1	HPCI/EGM CONTROL BOX (TURB SPEED CONTROLLER)	YES	NO	YES	NO		I		NO		X	X		
	1	18	RGSC-23-1	RGSC-23-1	HPCI/TURB RAMP GEN. SIG. CONV. (TURB SPEED CONTROLLER)	YES	NO	YES	NO		I		NO		X	X		
	1	01	LSB-V23-16	LSB-V23-16	HPCI/LOCAL STARTER BOX FOR V23-16 MOV	YES	NO	YES	NO		I		NO		X	X		
	1	01	LSB-V23-19	LSB-V23-19	HPCI/LOCAL STARTER BOX FOR V23-19 MOV	YES	NO	YES	NO		I		NO		X	X		
	1	01	LSB-V23-20	LSB-V23-20	HPCI/LOCAL STARTER BOX FOR V23-20 MOV	YES	NO	YES	NO		I		NO		X	X		
	1	0	TS-12-101A	TS-12-101A	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-101B	TS-12-101B	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-102A	TS-12-102A	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-102B	TS-12-102B	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-103A	TS-12-103A	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-103B	TS-12-103B	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-106A	TS-12-106A	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-106B	TS-12-106B	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-107A	TS-12-107A	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-107B	TS-12-107B	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-108A	TS-12-108A	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-108B	TS-12-108B	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-109A	TS-12-109A	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-109B	TS-12-109B	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-110A	TS-12-110A	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-110B	TS-12-110B	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-111A	TS-12-111A	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-111B	TS-12-111B	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X

	UNIT	SQUG EQUIPMENT CLASS	CURRENT EQUIPMENT ID	SSEL EQUIPMENT ID	EQUIPMENT DESCRIPTION	SCREEN1	SCREEN 2	SCREEN 3	SCREEN 4					Reactivity Control	Pressure Control	Inventory Control	Decay Heat Removal	Containment
											Environment							
						Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)	Borated System?					
	1	0	TS-12-112A	TS-12-112A	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	0	TS-12-112B	TS-12-112B	RWCU/LINE TEMP MONITORING	YES	NO	YES	NO		I		NO					X
	1	18	FIS-14-45A	FIS-14-45A	CS/FLOW INDICATION	YES	NO	YES	NO		I		NO			X		
	1	18	FIS-14-45B	FIS-14-45B	CS/FLOW INDICATION	YES	NO	YES	NO		I		NO			X		
	1	18	PS-14-44A	PS-14-44A	CS/"A" PUMP DISCHARGE PRESSURE	YES	NO	YES	NO		I		NO			X		
	1	18	PS-14-44B	PS-14-44B	CS/"B" PUMP DISCHARGE PRESSURE	YES	NO	YES	NO		I		NO			X		
	1	18	PS-14-44C	PS-14-44C	CS/"A" PUMP DISCHARGE PRESSURE	YES	NO	YES	NO		I		NO			X		
	1	18	PS-14-44D	PS-14-44D	CS/"B" PUMP DISCHARGE PRESSURE	YES	NO	YES	NO		I		NO			X		
	1	18	FIS-23-78	FIS-23-78	HPCI/LOW FLOW INDICATION	YES	NO	YES	NO		I		NO		X	X		
	1	18	FIS-10-148A	FIS-10-148A	RHR/V10-16A CONT. ON LOW FLOW	YES	NO	YES	NO		I		NO				X	
	1	18	FIS-10-148B	FIS-10-148B	RHR/V10-16B CONT. ON LOW FLOW	YES	NO	YES	NO		I		NO				X	
	1	08B	FSO-109-75A-1	FSO-109-75A-1	CAD SOV SAMPLE ISOLATION (INBD) TORUS SUPPLY PNL A	YES	NO	YES	NO		I		NO					X
	1	08B	FSO-109-75A-2	FSO-109-75A-2	CAD SOV SAMPLE ISOLATION (OUTBD) TORUS SUPPLY PNL A	YES	NO	YES	NO		I		NO					X
	1	0	B-787	B-787	LOCAL TERM BOX - V10-57	YES	NO	YES	NO		I		NO					X
	1	0	B-618	B-618	LOCAL TERM BOX - V10-17	YES	NO	YES	NO		I		NO					X
	1	0	B-1102	B-1102	LOCAL TERM BOX - V12-18	YES	NO	YES	NO		I		NO					X
	1	01	LOCAL-13-16	LOCAL-13-16	RCIC/LOCAL STARTER BOX FOR V13-16 MOV	YES	NO	YES	NO		I		NO					X
	1	0	B-862	B-862	LOCAL TERM BOX - V13-16	YES	NO	YES	NO		I	T	NO					X
	1	04	T-AC-DP-5	T-AC-DP-5	480/120-208 VAC DIST TRANSFORMER	YES	NO	NO	NO		I		NO					
	1	04	DT-3	DT-3	480/240-120 VAC DIST TRANSFORMER	YES	NO	NO	NO		I		NO					
	1	04	DT-6	DT-6	480/240-120 VAC DIST TRANSFORMER	YES	NO	NO	NO		I		NO					
	1	04	DT-10	DT-10	480/240-120 VAC DIST TRANSFORMER	YES	NO	NO	NO		I		NO					
	1	04	DT-4	DT-4	480/240-120 VAC DIST TRANSFORMER	YES	NO	NO	NO		I		NO					
	1	04	DT-1	DT-1	480/240-120 VAC DIST TRANSFORMER	YES	NO	NO	NO		I		NO					
	1	13	MG-UPS-1A	MG-UPS-1A	480 VAC UPS-1A MG SET	YES	NO	NO	NO		I		NO					
	1	13	MG-UPS-1B	MG-UPS-1B	480 VAC UPS-1B MG SET	YES	NO	NO	NO		I		NO					
	1	20	CP-UPS-1A	CP-UPS-1A	480 VAC UPS-1A CONTROL PANEL	YES	NO	NO	NO		I		NO					
	1	20	CP-UPS-1B	CP-UPS-1B	480 VAC UPS-1B CONTROL PANEL	YES	NO	NO	NO		I		NO					
	1	18	PT-104-20B	PT-104-20B	SW/HEADER TRANSMITTER	YES	NO	NO	NO		I		NO					
	1	18	PS-104-120A	PS-104-120A	V70-19A,B, 20 ISOLATION	YES	NO	NO	NO		I		NO					
	1	18	PS-104-120B	PS-104-120B	V70-19A,B, 20 ISOLATION	YES	NO	NO	NO		I		NO					
	1	18	PS-104-120C	PS-104-120C	V70-19A,B 20 ISOLATION	YES	NO	NO	NO		I		NO					
	1	18	PS-104-120D	PS-104-120D	V70-19A,B, 20 ISOLATION	YES	NO	NO	NO		I		NO					
x	1	20	ES-1-156-5	ES-1-156-5	POWER SUPPLY FOR LSL-107-5B	YES	NO	YES	NO		I		NO		X	X		
	1	18	RK25-01	RK25-01	CS (A) INST. RACK	YES	NO	YES	NO		I		NO			X		
	1	18	RK25-60	RK25-60	CS (B) INST. RACK	YES	NO	YES	NO		I		NO			X		
	1	18	RK25-7A	RK25-7A	REACTOR RECIRC INST. RACK (A)	YES	NO	YES	NO		I		NO	X				
	1	18	RK25-7B	RK25-7B	REACTOR RECIRC INST. RACK (B)	YES	NO	YES	NO		I		NO	X				
	1	18	RK25-23	RK25-23	RECIRC PUMP A INST. RACK	YES	NO	YES	NO		I		NO	X				
	1	18	RK25-24	RK25-24	RECIRC PUMP B INST. RACK	YES	NO	YES	NO		I		NO	X				
x	1	18	RK25-50A	RK25-50A	HPCI INST. RACK (A)	YES	NO	YES	NO	YES	I		NO		X	X		
x	1	18	RK25-50B	RK25-50B	HPCI INST. RACK (B)	YES	NO	YES	NO	YES	I		NO		X	X		
	1	18	RK25-51A	RK25-51A	JET PUMP INST. RACK (51A)	YES	NO	YES	NO		I		NO	X				
	1	18	RK25-51B	RK25-51B	JET PUMP INST. RACK (51B)	YES	NO	YES	NO		I		NO	X				
x	1	18	RK25-52A	RK25-52A	JET PUMP INST. RACK (52A)	YES	NO	YES	NO	YES	I		NO	X				
x	1	18	RK25-52B	RK25-52B	JET PUMP INST. RACK (52B)	YES	NO	YES	NO	YES	I		NO	X				
	1	18	RK25-56A	RK25-56A	RCIC RM INST. RACK (A)	YES	NO	NO	NO		I		NO					
	1	18	RK25-56B	RK25-56B	RCIC RM INST. RACK (B)	YES	NO	NO	NO		I		NO					
	1	18	RK25-59	RK25-59	RHR INST. RACK (A)	YES	NO	YES	NO		I		NO				X	
	1	18	RK25-62	RK25-62	RHR INST. RACK (B)	YES	NO	YES	NO		I		NO				X	

	UNIT	SQUG EQUIPMENT CLASS	CURRENT EQUIPMENT ID	SSEL EQUIPMENT ID	EQUIPMENT DESCRIPTION	SCREEN1	SCREEN 2	SCREEN 3	SCREEN 4					Reactivity Control	Pressure Control	Inventory Control	Decay Heat Removal	Containment
						Seismic 1?	Undergo Regular Configuration Inspections?	Maintains at least one of the 5 safety Functions	Replaced?	IPEEE	Environment		Borated System?					
											Inside/ Outside? (I / O)	High Temp/ Humidity? (T / H)						
	1	18	RK25-5A	RK25-5A	REACTOR PROT. & NSSS INST. RACK	YES	NO	YES	NO		I		NO	X				
	1	18	RK25-5B	RK25-5B	REACTOR PROT. & NSSS INST. RACK	YES	NO	YES	NO		I		NO	X				
x	1	18	RK25-6A	RK25-6A	REACTOR PROT. & NSSS INST. RACK	YES	NO	YES	NO	YES	I		NO	X				
x	1	18	RK25-6B	RK25-6B	REACTOR PROT. & NSSS INST. RACK	YES	NO	YES	NO	YES	I		NO	X				
	1	08A	V70-257A	V70-257A	SW/E-19-2A OUTLET	YES	NO	NO	NO		I		NO					
	1	08A	V70-257B	V70-257B	SW/E-19-2B OUTLET	YES	NO	NO	NO		I		NO					
	1	18	PT-104-20A	PT-104-20A	SW/HEADER TRANSMITTER	YES	NO	NO	NO		I		NO					
	1	0	EGR	EGR	HPCI EGR ACTUATOR ASSEMBLY (TURB SPEED CONTROLLER)	YES	NO	YES	NO		I		NO		X	X		
	1	07	SCW-46A	SCW-46A	SAC-1 TCV	YES	NO	NO	NO		I		NO					
	1	0	TC-113-4002	TC-113-4002	SAC-1 DISCHARGE TEMPERATURE	YES	NO	NO	NO		I		NO					
	1	0			CRHVAC/DISCHARGE ISOLATION DAMPER FOR SAC-1A	YES	NO	NO	NO		I		NO					
	1	0			CRHVAC/DISCHARGE ISOLATION DAMPER FOR SAC-1B	YES	NO	NO	NO		I		NO					
	1	0			CRHVAC/SUPPLY ISOLATION DAMPER FOR SAC-1B	YES	NO	NO	NO		I		NO					
	1	0			CRHVAC CR FIRE DAMPERS (3)	YES	NO	NO	NO		I		NO					
	1	20			CR FIRE DAMPER CONTROL SWITCH	YES	NO	NO	NO		I		NO					
	1	21			SCH-1 EXPANSION TANK	YES	NO	NO	NO		I		NO					
	1	21			SCH-2 EXPANSION TANK	YES	NO	NO	NO		I		NO					
	1	20			SCH-1 CONTROL PANEL	YES	NO	NO	NO		I		NO					
	1	20			SCH-2 CONTROL PANEL	YES	NO	NO	NO		I		NO					
	1	07	PCV-1-156-1073A	PCV-1-156-1073A	N2 PRESSURE REGULATOR	YES	NO	YES	NO		I		NO		X			
	1	07	PCV-1-156-1073B	PCV-1-156-1073B	N2 PRESSURE REGULATOR	YES	NO	YES	NO		I		NO		X			
	1	0	FIS-1-156-76	FIS-1-156-76	N2 ROTOMETER	YES	NO	YES	NO		I		NO		X			
	1	0	D-2-1A	D-2-1A	N2 DRYERS	YES	NO	YES	NO		I		NO		X			
	1	0			DRYER INLET VALVE	YES	NO	NO	NO		I		NO					
	1	0			DRYER OUTLET VALVE	YES	NO	NO	NO		I		NO					
	1	0	V72-89B	V72-89B	N2/RC ISOLATION CHECK VALVE	YES	NO	NO	NO		I		NO					
	1	0	V72-89C	V72-89C	N2/RC ISOLATION CHECK VALVE	YES	NO	NO	NO		I		NO					
	1	21			N2 CYLINDERS (18 TOTAL) AND MANIFOLD	YES	NO	YES	NO		I		NO		X			
x	1	18	RK-25-66	RK-25-66	CST INST. RACK	YES	NO	YES	NO		I	H	NO			X		
	1	20	SE-113-4002	SE-113-4002	SAC-1A EXHAUST DAMPER CONTROL	YES	NO	NO	NO		I		NO					
	1	20	SE-113-4003	SE-113-4003	SAC-1B INLET/OUTLET DAMPER CONTROL	YES	NO	NO	NO		I		NO					
	1	08B	SE-70-3A	SE-70-3A	BACKWASH FLOW CONTROL	YES	NO	NO	NO		I	H	NO					
	1	08B	SE-70-3B	SE-70-3B	BACKWASH FLOW CONTROL	YES	NO	NO	NO		I	H	NO					
	1	16	ES-24DC-1		POWER SUPPLY FOR ECCS PANEL A	YES	NO	NO	NO		I		NO					
x	1	16	ES-24DC-2		POWER SUPPLY FOR ECCS PANEL B	YES	NO	NO	NO		I		NO					
x	1	21	CYL-72-1A		NITROGEN BOTTLE FOR BACKUP SRV SUPPLY	YES	NO	NO	NO		I		NO					
	1	21	CYL-72-1B		NITROGEN BOTTLE FOR BACKUP SRV SUPPLY	YES	NO	NO	NO		I		NO					

X is SWEL Item

SSEL#	SWEL1#	EQUIPMENT ID	DESCRIPTION	BLDG.	ELEV.	ROOM	TRAIN	SYSTEM TYPE	CLASS	ENVIORNMENT	ANC	DWG
000002	SWEL1-001		CRD/HYDRAULIC CONTROL UNITS (89)	RB	252'			1	0	I	N	
000007	SWEL1-002	LCV-3-33C	CRD/SCRAM DISCHARGE VOLUME DRAIN VALVE	RB	252'			1	07	I	N	
000010	SWEL1-003	PCV-3-32B	CRD/SCRAM DISCHARGE VOLUME VENT VALVES	RB	252'			1	07	I	N	
000011	SWEL1-004	CV-3-126-	CRD/SCRAM VALVES (89) INLET	RB	252'			1	07	I	N	
000015	SWEL1-005	P-46-1A	CS/"A" CORE SPRAY PUMP	RB	213'	NECR	A	3	06	I	Y	5920-2258
000033	SWEL1-006	C-3-1A	DG START AIR/COMPRESSOR A	TB	252'	EDGR A	A	1,2,3,4,5	12	I	Y	
000044	SWEL1-007	DG-1-1B	DIESEL GENERATOR B	TB	252'	EDGRB	B	1,2,3,4,5	17	I	Y	
000049	SWEL1-008	LCV-108-2A	FUEL OIL/DAY TANK FILL	TB	252'	DAY TK RM A	A	1,2,3,4,5	07	I	N	
000052	SWEL1-009	TK-42-1B	FUEL OIL/DIESEL OIL DAY TANK B	TB	252'	DAY TK RM B	B	1,2,3,4,5	21	I	Y	
000053	SWEL1-010	TK-40-1A	FUEL OIL/FUEL OIL STORAGE TANK	YARD	252'			1,2,3,4,5	21	O	Y	
000054	SWEL1-011	P-92-1A	FUEL OIL/FUEL OIL TRANSFER PUMP A	FO	241'		A	1,2,3,4,5	05	I, H	Y	
000060	SWEL1-012	MG-2-1A	120/240V VITAL AC MG SET	RB	280'			1,2,3,4,5	13	I	Y	5920-4463
000061	SWEL1-013	BC-1-1A	125V DC MAIN STATION BATTERY CHARGER A ON DC-1	CB	248'	SWGR WEST		1,2,3,4,5	16	I	Y	
000065	SWEL1-014	B-AS-2	125V DC STATION BATTERY ON BUS DC-2AS	TB	252'	EDGR A		1,2,3,4,5	15	I	Y	
000067	SWEL1-015	B-1-1B	125V DC STATION BATTERY ON DC-2	CB	262'	CABLE VAULT		1,2,3,4,5	15	I	Y	5920-4411
000069	SWEL1-016	DC-1	125V DC DISTR PNL DC-1 1600AMP	CB	262'	CABLE VAULT		1,2,3,4,5	14	I	N	
000071	SWEL1-017	DC-2	125V DC DISTR PNL DC-2 1600AMP	CB	262'	CABLE VAULT		1,2,3,4,5	14	I	N	5920-4835
000081	SWEL1-018	DC-ECCS-B	24 VDC ECCS PNL (B)	RB	303'		B	1,2,3,4,5	14	I	Y	5920-4836
000085	SWEL1-019	MCC-9C	480V ESS AC MCC-9C - DIESEL 1A ROOM (SII)	TB	252'	EDG A		1,2,3,4,5	01	I	Y	
000088	SWEL1-020	MCC-9D	480V ESS AC MCC-9D - REACTOR BLDG	RB	252'			1,2,3,4,5	01	I	N	
000090	SWEL1-021	MCC-8B	480V ESS AC MCC-8B - REACTOR BLDG (SI)	RB	280'			1,2,3,4,5	01	I	Y	
000092	SWEL1-022	MCC-9B	480V ESS AC MCC-9B - REACTOR BLDG (SII)	RB	280'			1,2,3,4,5	01	I	Y	
000095	SWEL1-023	BUS-9	480V AC SWITCHGEAR BUS NO.9 1600AMP (SII)	CB	248'	SWGR EAST		1,2,3,4,5	02	I	N	
000096	SWEL1-024	BUS-3	4KV - 4160V SWITCHGEAR BUS NO.3 1200AMP (SI)	CB	248'	SWGR WEST		1,2,3,4,5	03	I	N	
000101	SWEL1-025	T-8-1A	STATION SERVICE TRANS 4160/480 BUS NO.8	CB	248'	SWGR WEST		1,2,3,4,5	04	I	Y	
000103	SWEL1-026	TK-4-1A	CONDENSATE STORAGE TANK	YARD	252'			2,3	21	O	N	
000116	SWEL1-027	P-44-1A	HPCI/HPCI PUMP	RB	213'	HPCI		2,3	05	I	Y	5920-0622
000125	SWEL1-028	PS-23-84-1	HPCI/PUMP SUCTION PRESSURE SWITCH	RB	213'	HPCI		2,3	18	I	Y	
000129	SWEL1-029	V23-15	HPCI/STEAM SUPPLY MOV	DW	266'			2,3	08A	I, T	N	
000130	SWEL1-030	V23-16	HPCI/STEAM SUPPLY MOV	ST	251'			2,3	08A	I, T	N	5920-1835
000145	SWEL1-031	TEF-3	DG B ROOM VENTILATION/EXHAUST FAN	TB	252'	EDG B	B	1,2,3,4,5	09	I	Y	5920-4449
000164	SWEL1-032	RRU-8	SW/ECCS RM COOLING	RB	213'	SECR		1,2,3,4,5	10	I	N	5920-4683
000174	SWEL1-033	PT-2-3-52C	CS, RHR PERMISSIVE	RB	252'			3	18	I	Y	5920-3055/5920-3057
000176	SWEL1-034	LT-107-5A	CST/LEVEL TRANSMITTER	CST VALVE	252'			3	18	I, H	Y	
000177	SWEL1-035	LT-107-5B	CST/LEVEL TRANSMITTER	CST VALVE	252'			3	18	I, H	Y	5920-6041
000178	SWEL1-036	PT-10-101A	DW PRESSURE ECCS	RB	280'			5	18	I	Y	5920-3016/5920-3017
000180	SWEL1-037	PT-10-101C	DW PRESSURE ECCS	RB	280'			5	18	I	Y	5920-3016/5920-3017
000182	SWEL1-038	PT-16-19-29A	DW PRESSURE INDICATION	RB	280'			5	18	I	Y	5920-3016/5920-3017
000186	SWEL1-039	PT-5-12C	DW PRESSURE SCRAM	RB	280'			5	18	I	Y	5920-3016/5920-3017
000187	SWEL1-040	PT-5-12D	DW PRESSURE SCRAM	RB	280'			5	18	I	Y	5920-3016/5920-3017
000188	SWEL1-041	TE-16-19-30A	DW TEMP INDICATION	DW	268'			5	19	I, T	Y	
000203	SWEL1-042	LT-2-3-72A	RV LEVEL FOR RHR, DG, HPCI, RCIC, ADS, CS	RB	280'			3	18	I	Y	5920-3016/5920-3017
000205	SWEL1-043	LT-2-3-72C	RV LEVEL FOR RHR, DG, HPCI, RCIC, ADS, CS	RB	280'			3	18	I	Y	5920-3016/5920-3017
000209	SWEL1-044	LT-2-3-58A	RV LEVEL SCRAM & PCIS	RB	280'			5	18	I	Y	5920-3016/5920-3017
000210	SWEL1-045	LT-2-3-58B	RV LEVEL SCRAM & PCIS	RB	280'			5	18	I	Y	5920-3016/5920-3017
000213	SWEL1-046	PT-2-3-56A	RV PRESSURE ECCS	RB	280'			2	18	I	Y	5920-3016/5920-3017
000215	SWEL1-047	PT-2-3-56C	RV PRESSURE ECCS	RB	280'			2	18	I	Y	5920-3016/5920-3017
000219	SWEL1-048	PT-2-3-55C	RV PRESSURE SCRAM	RB	280'			2	18	I	Y	5920-3016/5920-3017
000220	SWEL1-049	PT-2-3-55D	RV PRESSURE SCRAM	RB	280'			2	18	I	Y	5920-3016/5920-3017
000221	SWEL1-050	LT-2-3-73A	RV SHROUD LEVEL, CONT SPRAY PERMISSIVE	RB	252'			2	18	I	Y	5920-3055/5920-3057
000227	SWEL1-051	PS-104-53A	SW/PUMP A PRESSURE SWITCH	IS	237'	SW ROOM		1,2,3,4,5	18	I, H	Y	

SSEL#	SWEL1#	EQUIPMENT ID	DESCRIPTION	BLDG.	ELEV.	ROOM	TRAIN	SYSTEM TYPE	CLASS	ENVIORNMENT	ANC	DWG
000248	SWEL1-052	V2-80D	MAIN STEAM/INBOARD MSIV	DW	254'			5	07	I, T	N	
000253	SWEL1-053	V2-86A	MAIN STEAM/OUTBOARD MSIV	ST	251'			5	07	I, T	N	
000257	SWEL1-054	S-2-6A	MAIN STEAM/OUTBOARD MSIV INST AIR SUPPLY ACCUMULATOR	ST	251'			5	21	I, T	Y	
000263	SWEL1-055	RV-2-71C	MAIN STEAM/RELIEF VALVE	DW	275'			2	07	I, T	N	
000266	SWEL1-056	TK-55-1A	N2 AIR RECIEVER	RB	303'			2	21	I	N	5920-5017
000268	SWEL1-057	S-2-13A	SAFETY RELIEF VALVE/NITROGEN SUPPLY ACCUMULATOR	DW	275'			2	21	I, T	Y	
000279	SWEL1-058	P-10-1D	RHR/D RHR PUMP	RB	213'	SECR	B	4	06	I	N	5920-1611
000281	SWEL1-059	V10-65B	RHR/HEAT XC BYPASS MOV	RB	232'	SECR	B	4	08A	I	N	5920-9288
000282	SWEL1-060	V10-27A	RHR/LPCI INJECTION MOV	RB	252'			4	08A	I	N	5920-5564/5920-5565
000306	SWEL1-061	P-8-1C	RHRSW/C RHRSW PUMP	RB	232'	NECR	A	4	06	I	Y	5920-3855/5920-3944
000312	SWEL1-062	V10-89A	RHRSW/SW SUPPLY MOV	RB	232'	NECR	A	4	08B	I	N	5920-11020
000314	SWEL1-063	SP-70-3A	BACKWASH FLOW CONTROL	IS	237'	SW ROOM	A	1,2,3,4,5	07	I, H	N	5920-1811
000320	SWEL1-064	P-7-1C	SW/C SW PUMP	IS	237'	SW ROOM	A	1,2,3,4,5	06	I, H	Y	5920-3947/5920-4602
000394	**SWEL1-065	**LCV-108-03	**FUEL OIL/HEAT BOILER TK FILL	FO	241'			1,2,3,4,5	07	I, H	N	
000324	SWEL1-066	FCV-104-28A	SW/DG COOLING	TB	252'	EDGR A	A	1,2,3,4,5	07	I	N	
000335	SWEL1-067	V70-20	SW/TURB BLDG ISOL MOV	RB	246'	TORUS CW		1,2,3,4,5	08A	I	N	
000353	SWEL1-068	TU-1-1A	HPCI/HPCI TURBINE	RB	213'	HPCI		2,3	05	I	Y	
000371	SWEL1-069	DG-1B-INTAKE-1 - 6	DG ROOM VENTILATION/DG ROOM B LOUVERS (6 TOTAL)	TB	252'	EDGR B	B	1,2,3,4,5	0	I	Y	5920-9096
000401	SWEL1-070	ES-23-110	HPCI INST PWR SUPPLY	CB	272'	CONT RM		2,3	20	I	N	5920-2678
000402	SWEL1-071	FTA-23-118	HPCI SQ RT CONV-FLOW	CB	272'	CONT RM		2,3	20	I	N	5920-3258
000404	SWEL1-072	ES-23-94	HPCI/DC/AC INVERTER	CB	272'	CONT RM		2,3	20	I	N	5920-3258
000420	SWEL1-073	TS-23-101A	HPCI/STEAM LEAK DETECTOR	ST	251'			2,3	0	I, T	Y	
000426	SWEL1-074	TS-23-102A	HPCI/STEAM LEAK DETECTOR	ST	251'			2,3	0	I, T	Y	
000428	SWEL1-075	TS-23-103A	HPCI/STEAM LEAK DETECTOR	ST	251'			2,3	0	I, T	Y	
000432	SWEL1-076	TS-23-104A	HPCI/STEAM LEAK DETECTOR	ST	251'			2,3	0	I, T	Y	
000496	SWEL1-077	SE-2-86A-1	MS/OUTBOARD MSIV SOLENOID AC/DC	ST	251'			5	08B	I, T	N	
000512	SWEL1-078	VG-22A	CAD MOV VENT ISOLATION (OUTBD)	RB	303'			5	08A	I	N	
000515	SWEL1-079	NG-13A	CAD SOV AIR ISOLATION (INBD) INJECTION TO DW PNL A	RB	222'	TORUS AREA		5	08B	I	N	
000554	SWEL1-080	SB-16-19-6	PRIMARY CONTAINMENT VENT TO SBGT ISOLATION (OUTBD) AOV	RB	303'			5	07	I	N	5920-4892/5920-4901
001210	SWEL1-081	CRP 9-03	CONTROL ROOM PANEL	CB	272'	CONT RM		2,3	20	I	Y	5920-3258
001221	SWEL1-082	CRP 9-19	CONTROL ROOM PANEL	CB	272'	CONT RM		2,3	20	I	N	5920-2678
001222	SWEL1-083	CRP 9-20	CONTROL ROOM PANEL	CB	272'	CONT RM		2,3	20	I	N	5920-3770
001242	SWEL1-084		DG RM B VOLTAGE REGULATOR CAB	TB	252'	EDGR B	B	1,2,3,4,5	20	I	N	5920-3911/5920-4592
001243	SWEL1-085		DG RM A NEUTRAL TRANSFORMER CAB	TB	252'	EDGR A	A	1,2,3,4,5	20	I	Y	5920-4593
001354	SWEL1-086	L-17	DG "B" RM DAMPER MOTOR	TB	252'	EDGR B	B	1,2,3,4,5	0	I	N	
001355	SWEL1-087	RATS-1A	DG-1A RM THERMOSTAT	TB	252'	EDGR A	A	1,2,3,4,5	20	I	N	
001375	SWEL1-088	SE-113-2022	DG RM B DAMPER SOV	TB	252'	EDGR B	B	1,2,3,4,5	08B	I	N	
001387	SWEL1-089		DG RM B ENGINE CONTACTOR CAB	TB	252'	EDGR B	B	1,2,3,4,5	20	I	Y	
001388	SWEL1-090		DG RM B ENGINE INSTR PNL	TB	252'	EDGR B	B	1,2,3,4,5	20	I	Y	5920-4801/5920-4802
001389	SWEL1-091		DG RM B EQUIP SKID	TB	252'	EDGR B	B	1,2,3,4,5	17	I	Y	
001396	SWEL1-092	T-LP-1L	TRANFORMER FOR LP-1L IN CONTROL ROOM	CB	262'	CABLE VAULT		1,2,3,4,5	04	I	N	
001514	SWEL1-093	ES-1-156-5	POWER SUPPLY FOR LSL-107-5B	CB	272'	CONT RM		2,3	20	I	N	
001522	SWEL1-094	RK25-50A	HPCI INST. RACK (A)	RB	213'	HPCI		2,3	18	I	Y	5920-3044/5920-3045
001523	SWEL1-095	RK25-50B	HPCI INST. RACK (B)	RB	213'	HPCI		2,3	18	I	Y	5920-3044/5920-3045
001526	SWEL1-096	RK25-52A	JET PUMP INST. RACK (52A)	RB	252'			1	18	I	Y	5920-3055/5920-3057
001527	SWEL1-097	RK25-52B	JET PUMP INST. RACK (52B)	RB	252'			1	18	I	Y	5920-3055/5920-3057
001534	SWEL1-098	RK25-6A	REACTOR PROT. & NSSS INST. RACK	RB	280'			1	18	I	Y	5920-3016/5920-3017
001535	SWEL1-099	RK25-6B	REACTOR PROT. & NSSS INST. RACK	RB	280'			1	18	I	Y	5920-3016/5920-3017
001566	SWEL1-100	RK-25-66	CST INST. RACK	CST	252'			3	18	I, H	Y	5920-6041
	SWEL1-101	ES-24DC-2	POWER SUPPLY FOR ECCS PANEL B	CB	248'	SWGR EAST		2,4	16	I	Y	
	SWEL1-102	CYL-72-1A	NITROGEN BOTTLE FOR BACKUP SRV SUPPLY	RB	252'		A	2	21	I	N	

SSEL#	SWEL1#	EQUIPMENT ID	DESCRIPTION	BLDG.	ELEV.	ROOM	TRAIN	SYSTEM TYPE	CLASS	ENVIORNMENT	ANC	DWG

System

1 Reactivity Control
2 Pressure Control
3 Inventory Control
4 Decay Heat Removal
5 Containment

**During implementation of the Seismic Walkdowns SWEL-065 was determined to be inaccessible for inspection. This SWEL number was valve FCV-104-17D, SW/D TRAVELLING SCREEN CONTROL VALVE. It was replaced with Valve LCV-108-3 which is located in the Fuel Oil Pump House. This valve is a similar GIP 07 class valve and is also located in a humid environment as was FCV-104-17D. No other SWEL1 & SWEL2 items have been changed since the original SWEL approval prior to Seismic Walkdowns.

	BL2#	EQUIPMENT ID	DESCRIPTION	BLDG.	ELEV.	ROOM	TRAIN	SYSTEM TYPE	CLASS	ENVIRONMENT	N/R
	2001	ES-19-81B	Power Supply (CAD PNL A)	CRB	272'	Control Room		SFPC	20		
	2002	PI-19-81B	Pressure Indicator (CAD PNL A)	CRB	272'	Control Room		SFPC	18		
	2003	TI-19-73B	Temperature Indicator (CAD PNL A)	CRB	272'	Control Room		SFPC	18		
	2004	dPI-19-76B	Differential Pressure Indicator (CAD PNL A)	CRB	272'	Control Room		SFPC	18		
	2005	ES-19-76B	Power Supply (CAD PNL A)	CRB	272'	Control Room		SFPC	20		
	2006	ES-19-81A	Power Supply (CAD PNL B)	CRB	272'	Control Room		SFPC	20		
	2007	PI-19-81A	Pressure Indicator (CAD PNL B)	CRB	272'	Control Room		SFPC	18		
	2008	TI-19-73A	Temperature Indicator (CAD PNL B)	CRB	272'	Control Room		SFPC	18		
	2009	dPI-19-76A	Differential Pressure Indicator (CAD PNL B)	CRB	272'	Control Room		SFPC	18		
	2010	ES-19-76A	Power Supply (CAD PNL B)	CRB	272'	Control Room		SFPC	20		
x	2011	RK-10AA	Rack	RB	303'			SFPC	18		
	2012	PI-19-82A	Pressure Indicator (RK-10AA)	RB	303'			SFPC	18		
x	2013	dPT-19-76A	Differential Pressure Transmitter (RK-10AA)	RB	303'			SFPC	18		
x	2014	PT-19-81A	Pressure Transmitter (RK-10AA)	RB	303'			SFPC	18		
	2015	PI-19-83A	Pressure Indicator (RK-10AA)	RB	303'			SFPC	18		
x	2016	PS-19-80A	Pressure Switch (RK-10AA)	RB	303'			SFPC	18		
x	2017	PI-19-84A	Pressure Indicator (RK-10AA)	RB	303'			SFPC	18		
	2018	RK-10AB	Rack	RB	303'			SFPC	18		
	2019	PI-19-82B	Pressure Indicator (RK-10AB)	RB	303'			SFPC	18		
	2020	dPT-19-76B	Differential Pressure Transmitter (RK-10AB)	RB	303'			SFPC	18		
	2021	PT-19-81B	Pressure Transmitter (RK-10AB)	RB	303'			SFPC	18		
	2022	PI-19-83B	Pressure Indicator (RK-10AB)	RB	303'			SFPC	18		
	2023	PS-19-80B	Pressure Switch (RK-10AB)	RB	303'			SFPC	18		
	2024	PI-19-84B	Pressure Indicator (RK-10AB)	RB	303'			SFPC	18		
	2025	TI-19-72	Temperature Indicator	RB	303'	FP Hx Room		SFPC	0		
	2026	TE-19-73A	Temperature Element	RB	303'	FP Hx Room		SFPC	19		
	2027	TE-19-73B	Temperature Element	RB	303'	FP Hx Room		SFPC	19		
	2028	FE-19-73	Flow Element	RB	303'	FP Hx Room		SFPC	0		
x	2029	FI-19-73	Flow Indicator	RB	303'	FP Hx Room		SFPC	0		
	2030	TI-104-60	Temperature Indicator	RB	303'			SFPC	0		
	2031	TI-104-61	Temperature Indicator	RB	303'			SFPC	0		
	2032	V70-257A	SW MOV SFPC Hx Outlet	RB	303'	FP Hx Rm		SFPC	8A		
x	2033	V70-257B	SW MOV SFPC Hx outlet	RB	303'	FP Hx Rm		SFPC	8A		
x	2034	P-19-2A	SFPC Pump	RB	303'	FP Hx Rm		SFPC	5		
	2035	P-19-2B	SFPC Pump	RB	303'	FP Hx Rm		SFPC	5		
x	2036	E-19-2A	SFPC Heat Exchanger	RB	303'	FP Hx Rm		SFPC	21		
	2037	E-19-2B	SFPC Heat Exchanger	RB	303'	FP Hx Rm		SFPC	21		
	2038	CAD Panel A	Panel	CRB	272'	Control Room		SFPC/FPC	20		
x	2039	CAD Panel B	Panel	CRB	272'	Control Room		SFPC/FPC	20		
	2040	RK-10	Rack	RB	303'			FPC	18		
	2041	TI-19-1	Temperature Indicator (RK-10)	RB	303'			FPC	18		
	2042	PSL-19-69A	Pressure Switch (RK-10)	RB	303'			FPC	18		
	2043	PSL-19-69B	Pressure Switch (RK-10)	RB	303'			FPC	18		
	2044	PI-19-69A	Pressure Indicator (RK-10)	RB	303'			FPC	18		
	2045	PI-19-69B	Pressure Indicator (RK-10)	RB	303'			FPC	18		
	2046	LS-19-62	Level Switch (RK-10)	RB	303'			FPC	18		
	2047	LI-19-62	Level Indicator (RK-10)	RB	303'			FPC	18		
	2048	LI-19-63B	Level Indicator (CAD PNL A)	CRB	272'	Control Room		FPC	18		
	2049	TI-19-71B	Temperature Indicator (CAD PNL A)	CRB	272'	Control Room		FPC	18		
	2050	LI-19-63A	Level Indicator (CAAD PNL B)	CRB	272'	Control Room		FPC	18		

	BL2#	EQUIPMENT ID	DESCRIPTION	BLDG.	ELEV.	ROOM	TRAIN	SYSTEM TYPE	CLASS	ENVIRONMENT	N/R
	2051	TI-19-71A	Temperature Indicator (CAD PNL B)	CRB	272'	Control Room		FPC	18		
	2052	TE-19-70A	Temperature Element	RB	303'	FP Hx Room		FPC	19		
	2053	TE-19-70B	Temperature Element	RB	303'	FP Hx Room		FPC	19		
	2054	TE-19-70C	Temperature Element	RB	303'	FP Hx Room		FPC	19		
	2055	TE-19-1A	Temperature Element	RB	303'	FP Hx Room		FPC	19		
	2056	TE-19-1B	Temperature Element	RB	303'	FP Hx Room		FPC	19		
	2057	PS-19-68A	Pressure Switch	RB	303'	FP Hx Room		FPC	0		
	2058	PS-19-68B	Pressure Switch	RB	303'	FP Hx Room		FPC	0		
	2059	TE-19-71A	Temperature Element	RB	345'			FPC	19		
	2060	TE-19-71B	Temperature Element	RB	345'			FPC	19		
	2061	LT-19-63A	Level Transmitter	RB	345'			FPC	0		
	2062	LT-19-63B	Level Transmitter	RB	345'			FPC	0		
	2063	PI-19-65A	Pressure Indicator	RB	318'			FPC	0		
	2064	PI-19-65B	Pressure Indicator	RB	318'			FPC	0		
	2065	PI-19-66A	Pressure Indicator	RB	318'	Skim Pump Rm		FPC	0		
	2066	PI-19-66B	Pressure Indicator	RB	318'	Skim Pump Rm		FPC	0		
	2067	V19-220	FPC system suction isolation MOV	RB	303'	FP Hx Rm		FPC	8A		
	2068	V19-221	FPC system suction isolation MOV	RB	303'	FP Hx Rm		FPC	8A		
	2069	P-82-1A	FPC Skimmer Pump	RB	318'	Skim Pump Rm		FPC	5		
	2070	P-82-1B	FPC Skimmer Pump	RB	318'	Skim Pump Rm		FPC	5		
	2071	P-9-1A	FPC Pump	RB	303'	FP Hx Rm		FPC	5		
	2072	P-9-1B	FPC Pump	RB	303'	FP Hx Rm		FPC	5		
	2073	E-9-1A	FPC Heat Exchanger	RB	303'	FP Hx Rm		FPC	21		
	2074	E-9-1B	FPC Heat Exchanger	RB	303'	FP Hx Rm		FPC	21		
	2075	FT-104-80B	Flow Transmitter (RK-10AB)	RB	303'			SW	18		
	2076	FI-104-80B	Flow Indicator (CAD PNL A) SW to SFPC Hx	CRB	272'	Control Room		SW	18		
	2077	ES-104-80B	Power Supply (CAD PNL A) SW to SFPC Hx	CRB	272'	Control Room		SW	20		
	2078	FI-104-80A	Flow Indicator (CAD PNL B) SW to SFPC Hx	CRB	272'	Control Room		SW	18		
	2079	ES-104-80A	Power Supply (CAD PNL B) SW to SFPC Hx	CRB	272'	Control Room		SW	20		
	2080	PI-104-93A	Pressure indicator (RK-10AA)	RB	303'			SW	18		
x	2081	FT-104-80A	Flow Transmitter (RK-10AA)	RB	303'			SW	18		
	2082	PI-104-93B	Pressure indicator (RK-10AB)	RB	303'			SW	18		
	2083	MCC-6A	MCC	RB	280'			480A	1		
	2084	MCC-6C	MCC	RWB	252'	Control Room		480A	1		
	2085	MCC-6D	MCC	RWB	252'	Control Room		480A	1		
	2086	MCC-7A	MCC	RB	280'			480A	1		
	2087	MCC-8B	MCC	RB	280'			480A	1		
	2088	MCC-9B	MCC	RB	280'			480A	1		
	2089	MCC-8E	MCC	RB	252'			480A	1		

x is SWEL Item

RDD#	DESCRIPTION	BASIS FOR INCLUSION/EXCLUSION	RDD
	No Rapid Drain-Down items were identified during the development of the SWEL 2.		

SWEL 2#	EQUIPMENT ID	DESCRIPTION	BLDG.	ELEV.	ROOM	TRAIN	SYSTEM TYPE	CLASS	ENVIRONMENT	N/R	RDD
SWEL2-001	RK-10AA	Rack	RB	303'			4	18			
SWEL2-002	dPT-19-76A	Differential Pressure Transmitter (RK-10AA)	RB	303'			4	18			
SWEL2-003	PT-19-81A	Pressure Transmitter (RK-10AA)	RB	303'			4	18			
SWEL2-004	PS-19-80A	Pressure Switch (RK-10AA)	RB	303'			4	18			
SWEL2-005	PI-19-84A	Pressure Indicator (RK-10AA)	RB	303'			4	18			
SWEL2-006	FI-19-73	Flow Indicator	RB	303'	FP Hx Room		4	0			
SWEL2-007	V70-257B	SW MOV SFPC Hx outlet	RB	303'	FP Hx Rm	B	4	8A			
SWEL2-008	P-19-2A	SFPC Pump	RB	303'	FP Hx Rm	A	4	5			
SWEL2-009	E-19-2A	SFPC Heat Exchanger	RB	303'	FP Hx Rm	A	4	21			
SWEL2-010	CAD Panel B	Panel	CRB	272'	Control Room	B	4	20			
SWEL2-011	FT-104-80A	Flow Transmitter (RK-10AA)	RB	303'			4	18			

System

1 Reactivity Control
2 Pressure Control
3 Inventory Control
4 Decay Heat Removal
5 Containment

Attachment C

Seismic Walkdown Checklists (SWCs)

SWEL1#	EQUIPMENT ID	DESCRIPTION	PAGE
SWEL1-001		CRD/HYDRAULIC CONTROL UNITS (89)	5
SWEL1-002	LCV-3-33C	CRD/SCRAM DISCHARGE VOLUME DRAIN VALVE	10
SWEL1-003	PCV-3-32B	CRD/SCRAM DISCHARGE VOLUME VENT VALVES	15
SWEL1-004	CV-3-126-	CRD/SCRAM VALVES (89) INLET	20
SWEL1-005	P-46-1A	CS/"A" CORE SPRAY PUMP	25
SWEL1-006	C-3-1A	DG START AIR/COMPRESSOR A	30
SWEL1-007	DG-1B	DIESEL GENERATOR B	35
SWEL1-008	LCV-108-2A	FUEL OIL/DAY TANK FILL	40
SWEL1-009	TK-42-1B	FUEL OIL/DIESEL OIL DAY TANK B	45
SWEL1-010	TK-40-1A	FUEL OIL/FUEL OIL STORAGE TANK	50
SWEL1-011	P-92-1A	FUEL OIL/FUEL OIL TRANSFER PUMP A	55
SWEL1-012	MG-2-1A	120/240V VITAL AC MG SET	60
SWEL1-013	BC-1-1A	125V DC MAIN STATION BATTERY CHARGER A ON DC-1	65
SWEL1-014	B-AS-2	125V DC STATION BATTERY ON BUS DC-2AS	70
SWEL1-015	B-1-1B	125V DC STATION BATTERY ON DC-2	75
SWEL1-016	DC-1	125V DC DISTR PNL DC-1 1600AMP	80
SWEL1-017	DC-2	125V DC DISTR PNL DC-2 1600AMP	85
SWEL1-018	DC-ECCS-B	24 VDC ECCS PNL (B)	90
SWEL1-019	MCC-9C	480V ESS AC MCC-9C - DIESEL 1A ROOM (SII)	95
SWEL1-020	MCC-9D	480V ESS AC MCC-9D - REACTOR BLDG	100
SWEL1-021	MCC-8B	480V ESS AC MCC-8B - REACTOR BLDG (SI)	105
SWEL1-022	MCC-9B	480V ESS AC MCC-9B - REACTOR BLDG (SII)	110
SWEL1-023	BUS-9	480V AC SWITCHGEAR BUS NO.9 1600AMP (SII)	115
SWEL1-024	BUS-3	4KV - 4160V SWITCHGEAR BUS NO.3 1200AMP (SI)	120
SWEL1-025	T-8-1A	STATION SERVICE TRANS 4160/480 BUS NO.8	125
SWEL1-026	TK-4-1A	CONDENSATE STORAGE TANK	130
SWEL1-027	P-44-1A	HPCI/HPCI PUMP	135
SWEL1-028	PS-23-84-1	HPCI/PUMP SUCTION PRESSURE SWITCH	140
SWEL1-031	TEF-3	DG B ROOM VENTILATION/EXHAUST FAN	145
SWEL1-032	RRU-8	SW/ECCS RM COOLING	150
SWEL1-033	PT-2-3-52C	CS, RHR PERMISSIVE	155
SWEL1-034	LT-107-5A	CST/LEVEL TRANSMITTER	160
SWEL1-035	LT-107-5B	CST/LEVEL TRANSMITTER	165
SWEL1-036	PT-10-101A	DW PRESSURE ECCS	170
SWEL1-037	PT-10-101C	DW PRESSURE ECCS	175
SWEL1-038	PT-16-19-29A	DW PRESSURE INDICATION	180
SWEL1-039	PT-5-12C	DW PRESSURE SCRAM	185
SWEL1-040	PT-5-12D	DW PRESSURE SCRAM	190
SWEL1-042	LT-2-3-72A	RV LEVEL FOR RHR, DG, HPCI, RCIC, ADS, CS	195
SWEL1-043	LT-2-3-72C	RV LEVEL FOR RHR, DG, HPCI, RCIC, ADS, CS	200
SWEL1-044	LT-2-3-58A	RV LEVEL SCRAM & PCIS	205
SWEL1-045	LT-2-3-58B	RV LEVEL SCRAM & PCIS	210
SWEL1-046	PT-2-3-56A	RV PRESSURE ECCS	215
SWEL1-047	PT-2-3-56C	RV PRESSURE ECCS	220
SWEL1-048	PT-2-3-55C	RV PRESSURE SCRAM	225

SWEL1#	EQUIPMENT ID	DESCRIPTION	PAGE
SWEL1-049	PT-2-3-55D	RV PRESSURE SCRAM	230
SWEL1-050	LT-2-3-73A	RV SHROUD LEVEL, CONT SPRAY PERMISSIVE	235
SWEL1-051	PS-104-53A	SW/PUMP A PRESSURE SWITCH	240
SWEL1-056	TK-55-1A	N2 AIR RECIEVER	245
SWEL1-058	P-10-1D	RHR/D RHR PUMP	250
SWEL1-059	V10-65B	RHR/HEAT XC BYPASS MOV	255
SWEL1-060	V10-27A	RHR/LPCI INJECTION MOV	260
SWEL1-061	P-8-1C	RHRSW/C RHRSW PUMP	265
SWEL1-062	V10-89A	RHRSW/SW SUPPLY MOV	270
SWEL1-063	SP-70-3A	BACKWASH FLOW CONTROL	275
SWEL1-064	P-7-1C	SW/C SW PUMP	280
SWEL1-065	FCV-104-17D	SW/D TRAVELLING SCREEN CONTROL VALVE	285
SWEL1-066	FCV-104-28A	SW/DG COOLING	290
SWEL1-067	V70-20	SW/TURB BLDG ISOL MOV	295
SWEL1-068	TU-1-1A	HPCI/HPCI TURBINE	300
SWEL1-069	DG-1B-INTAKE-X	DG ROOM VENTILATION/DG ROOM B LOUVERS (6 TOTAL)	305
SWEL1-070	ES-23-110	HPCI INST PWR SUPPLY	310
SWEL1-071	FTA-23-118	HPCI SQ RT CONV-FLOW	315
SWEL1-072	ES-23-94	HPCI/DC/AC INVERTER	320
SWEL1-078	VG-22A	CAD MOV VENT ISOLATION (OUTBD)	325
SWEL1-079	NG-13A	CAD SOV AIR ISOLATION (INBD) INJECTION TO DW PNL A	330
SWEL1-080	SB-16-19-6	PRIMARY CONTAINMENT VENT TO SBGT ISOLATION (OUTBD) AOV	335
SWEL1-081	CRP 9-03	CONTROL ROOM PANEL	340
SWEL1-082	CRP 9-19	CONTROL ROOM PANEL	345
SWEL1-083	CRP 9-20	CONTROL ROOM PANEL	350
SWEL1-084		DG RM B VOLTAGE REGULATOR CAB	355
SWEL1-085		DG RM A NEUTRAL TRANSFORMER CAB	360
SWEL1-086	L-17	DG "B" RM DAMPER MOTOR	365
SWEL1-087	RATS-1A	DG-1A RM THERMOSTAT	370
SWEL1-088	SE-113-2022	DG RM B DAMPER SOV	375
SWEL1-089		DG RM B ENGINE CONTACTOR CAB	380
SWEL1-090		DG RM B ENGINE INSTR PNL	385
SWEL1-091		DG RM B EQUIP SKID	390
SWEL1-092	T-LP-1L	TRANFORMER FOR LP-1L IN CONTROL ROOM	395
SWEL1-093	ES-1-156-5	POWER SUPPLY FOR LSL-107-5B	400
SWEL1-094	RK25-50A	HPCI INST. RACK (A)	405
SWEL1-095	RK25-50B	HPCI INST. RACK (B)	410
SWEL1-096	RK25-52A	JET PUMP INST. RACK (52A)	415
SWEL1-097	RK25-52B	JET PUMP INST. RACK (52B)	420
SWEL1-098	RK25-6A	REACTOR PROT. & NSSS INST. RACK	425
SWEL1-099	RK25-6B	REACTOR PROT. & NSSS INST. RACK	430
SWEL1-100	RK-25-66	CST INST. RACK	435
SWEL1-101	ES-24DC-2	POWER SUPPLY FOR ECCS PANEL B	440
SWEL1-102	CYL-71-1A	NITROGEN BOTTLE FOR BACKUP SRV SUPPLY	445

SWEL1#	EQUIPMENT ID	DESCRIPTION	PAGE
SWEL2-001	RK-10AA	Rack	450
SWEL2-002	dPT-19-76A	Differential Pressure Transmitter (RK-10AA)	455
SWEL2-003	PT-19-81A	Pressure Transmitter (RK-10AA)	460
SWEL2-004	PS-19-80A	Pressure Switch (RK-10AA)	465
SWEL2-005	PI-19-84A	Pressure Indicator (RK-10AA)	470
SWEL2-006	FI-19-73	Flow Indicator	475
SWEL2-007	V70-257B	SW MOV SFPC Hx outlet	480
SWEL2-008	P-19-2A	SFPC Pump	485
SWEL2-009	E-19-2A	SFPC Heat Exchanger	490
SWEL2-010	CAD Panel B	Panel	495
SWEL2-011	FT-104-80A	Flow Transmitter (RK-10AA)	500

Items Differed to RFO 30 (March 2013)	505

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 001

Equipment ID No. ~~CRD/HCU (89)~~ * / N/A 10-25-12 / N 10-25-12 Equip. Class[1] 0

Equipment Description CRD/HYDRAULIC CONTROL UNITS (89)

Location: Bldg. RB Floor El. 252' Room, Area SOUTH AND NORTH BANKS

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☐ N☒

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

* DELETED EQUIPMENT ID. Julio Dorado 10-25-12
Juan Vizcaya 10-25-12

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 001

Equipment ID No. ~~CDR/HCU (89)~~ SEE SHEET 1 JBF 10-25-12 Equip. Class[1] 0

Equipment Description *CRD/HYDRAULIC CONTROL UNITS (89)*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which an anchorage configuration verification is required.)	Y☐ N☐ U☐ N/A☒
6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions?	Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures?	Y☒ N☐ U☐ N/A☐
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment?	Y☒ N☐ U☐ N/A☐
9. Do attached lines have adequate flexibility to avoid damage?	Y☒ N☐ U☐ N/A☐
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects?	Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 001

Equipment ID No/ SEE SHEET 1 ~~CRD/HCU (89)~~ 10-25-12 Equip. Class[1] 0

Equipment Description *CRD/HYDRAULIC CONTROL UNITS (89)*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

NOTE: South bank inspected 10/04/12 and the North bank inspected 10/16/12.

Reference Documents:
A46/IPEEE – SSEL Line No. 000002

Evaluated by: *Kirit Parikh* 10/18/2012 Date: *10/16/2012*

Randy Stephens 10/18/2012 *10/16/2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

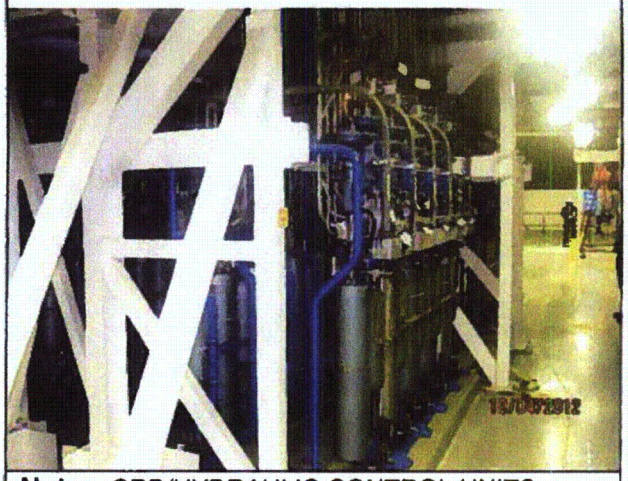
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 001**

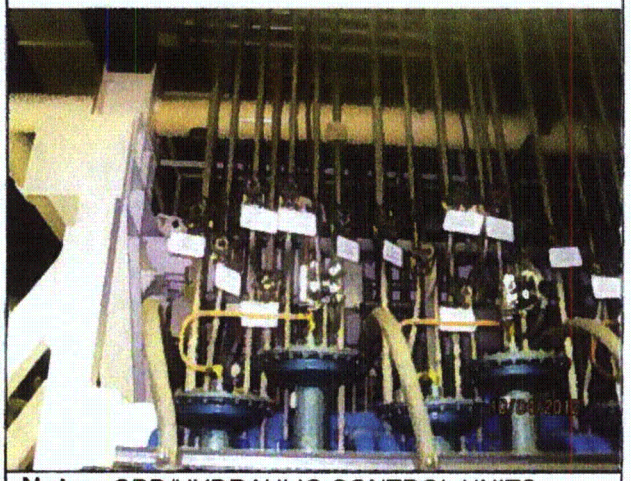
Equipment ID No. ~~CDR/HCU (89)~~ SEE SHEET 1 dlb 10-25-12 Equip. Class[1] 0

Equipment Description *CRD/HYDRAULIC CONTROL UNITS (89)*

Photographs



Note: *CRD/HYDRAULIC CONTROL UNITS (south bank)*



Note: *CRD/HYDRAULIC CONTROL UNITS (south bank)*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

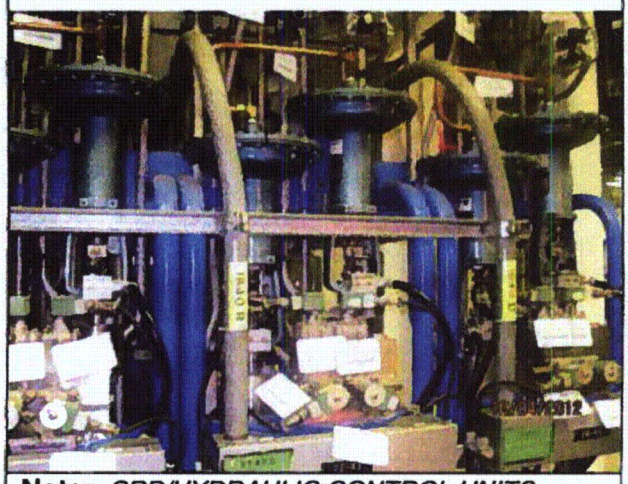
Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 001**

Equipment ID No. ~~CDR/HCU (89)~~ SEE SHEET 1 JM 10-25-12 Equip. Class[1] 0

Equipment Description *CRD/HYDRAULIC CONTROL UNITS (89)*



Note: *CRD/HYDRAULIC CONTROL UNITS (south bank)*

Note: *CRD/HYDRAULIC CONTROL UNITS (north bank)*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 002**

Equipment ID No. *LCV-3-33C* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM DISCHARGE VOLUME DRAIN VALVE*

Location: Bldg. *RB* Floor El. *252'* Room, Area

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☐ N☒

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☐ N☐ U☐ N/A☒

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☐ N☐ U☐ N/A☒

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☐ N☐ U☐ N/A☒

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 002

Equipment ID No. *LCV-3-33C* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM DISCHARGE VOLUME DRAIN VALVE*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) Y☐ N☐ U☐ N/A☒

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 002

Equipment ID No. *LCV-3-33C* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM DISCHARGE VOLUME DRAIN VALVE*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-04-2012*

Raymond Tworek Raymond G Tworek 10/18/12 *10-04-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

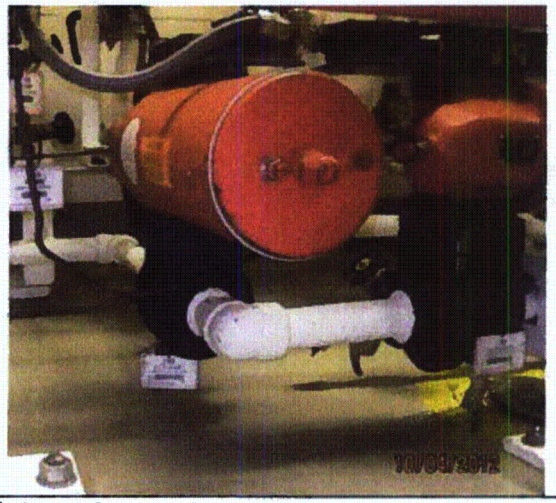
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 002**

Equipment ID No. *LCV-3-33C* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM DISCHARGE VOLUME DRAIN VALVE*

Photographs



Note: *LCV-3-33C*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 002

Equipment ID No. *LCV-3-33C* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM DISCHARGE VOLUME DRAIN VALVE*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 003

Equipment ID No. *PCV-3-32B* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM DISCHARGE VOLUME VENT VALVES*

Location: Bldg. *RB* Floor El. *252'* Room, Area *Reactor Building (South Wall)*

Manufacturer, Model, Etc. (optional but recommended) *Conval 2" Globe, 1500#, model 2-12G2GJ-105*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☐ N☒

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☐ N☐ U☐ N/A☒
   In-line valve, no anchorage.

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☐ N☐ U☐ N/A☒

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☐ N☐ U☐ N/A☒

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 003

Equipment ID No. *PCV-3-32B* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM DISCHARGE VOLUME VENT VALVES*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which an anchorage configuration verification is required.)	Y☐ N☐ U☐ N/A☒
6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions?	Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures?	Y☒ N☐ U☐ N/A☐
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment?	Y☒ N☐ U☐ N/A☐
9. Do attached lines have adequate flexibility to avoid damage?	Y☒ N☐ U☐ N/A☐
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects?	Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 003**

Equipment ID No. *PCV-3-32B* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM DISCHARGE VOLUME VENT VALVES*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Reference Documents:
A46/IPEEE – SSEL Line No. 000010

Evaluated by: *Kirit Parikh* K Parikh 10/18/2012 Date: *10/04/2012*

Randy Stephens Randy Stephens 10/18/2012 *10/04/2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

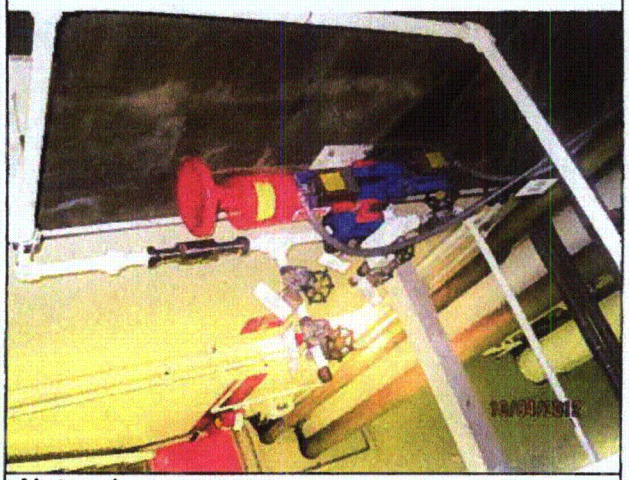
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 003**

Equipment ID No. *PCV-3-32B* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM DISCHARGE VOLUME VENT VALVES*

Photographs



Note: *Looking down at valve # PCV-3-32B.*

Note: *Looking up at valve # PCV-3-32B.*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 003**

Equipment ID No. *PCV-3-32B* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM DISCHARGE VOLUME VENT VALVES*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 004

Equipment ID No. *CV-3-126-* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM VALVES (89) INLET*

Location: Bldg. *RB* Floor El. *252'* Room, Area *Reactor Building (North/South)*

Manufacturer, Model, Etc. (optional but recommended) *Hammel-Dahl, model # 2500ASA-V999Z1205*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☐ N☒

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 004

Equipment ID No. *CV-3-126-* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM VALVES (89) INLET*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which an anchorage configuration verification is required.) Y☐ N☐ U☐ N/A☒

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 004

Equipment ID No. *CV-3-126-* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM VALVES (89) INLET*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Note: South bank inspected 10/04/12 and the North bank inspected 10/16/12.

Note: Surface corrosion was observed on valve CV-3-126-10-27associated with HCU 10-27(north bank) at the bonnet and yoke interface (see photos page 5). This surface corrosion does not pose an adverse seismic condition. See CR-VTY-2012-05099.

Reference Documents:
A46/IPEEE – SSEL Line No. 000011

Evaluated by: *Kirit Parikh* K Parikh 10/18/2012 Date: *10/16/2012*

Randy Stephens Randy Stephens 10/18/2012 *10/16/2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 004**

Equipment ID No. *CV-3-126-* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM VALVES (89) INLET*

Photographs

Note: *South bank of (CV-3-126-) CRD/SCRAM VALVES INLET.*

Note: *CV-3-126-*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

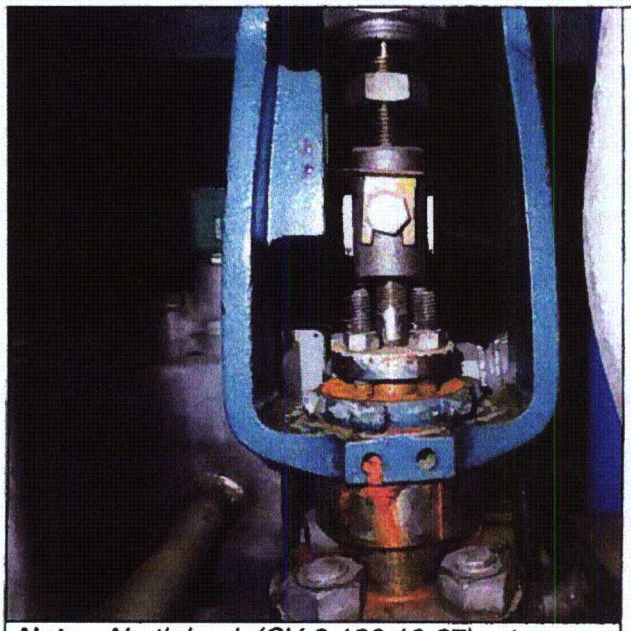
Sheet 5 of 5

Status: Y☒ N☐ U☐

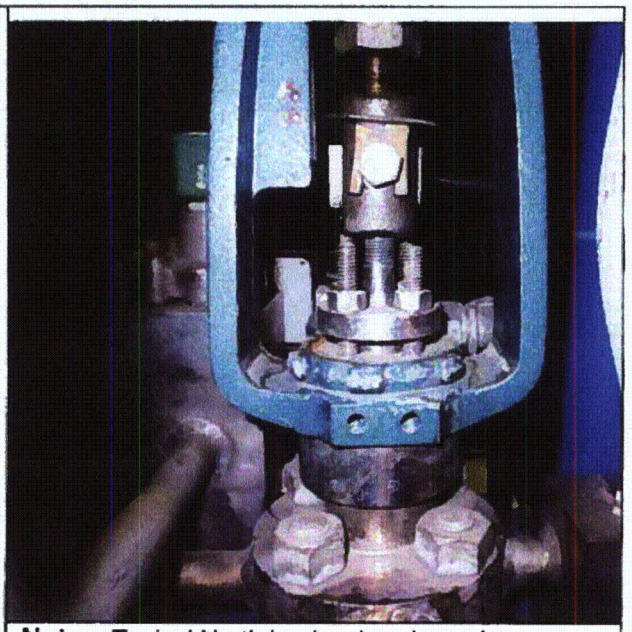
Seismic Walkdown Checklist (SWC) **SWEL1- 004**

Equipment ID No. *CV-3-126-* Equip. Class[1] *07*

Equipment Description *CRD/SCRAM VALVES (89) INLET*



Note: *North bank (CV-3-126-10-27) valve showing surface corrosion.*



Note: *Typical North bank valve shown for comparison.*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 005

Equipment ID No. *P-46-1A* Equip. Class[1] *06*

Equipment Description *CS/"A" CORE SPRAY PUMP*

Location: Bldg. *RB* Floor El. *213'* Room, Area *NECR*

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 005

Equipment ID No. *P-46-1A* Equip. Class[1] *06*

Equipment Description *CS/"A" CORE SPRAY PUMP*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) Y☒ N☐ U☐ N/A☐
   See drawing 5920-2258.

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 005

Equipment ID No. *P-46-1A* Equip. Class[1] *06*

Equipment Description *CS/"A" CORE SPRAY PUMP*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Note:
Picture originally taken at 10/11/2012 inspection was blurred. Re-inspected 10/17/2012 and took another picture.

Reference Documents:
Drawing 5920-2258
A46/IPEEE – SSEL Line No. 000015

Evaluated by: *Kirit Parikh* K Parikh 10/18/2012 Date: *10/17/2012*

Randy Stephens Randy Stephens 10/18/2012 *10/17/2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

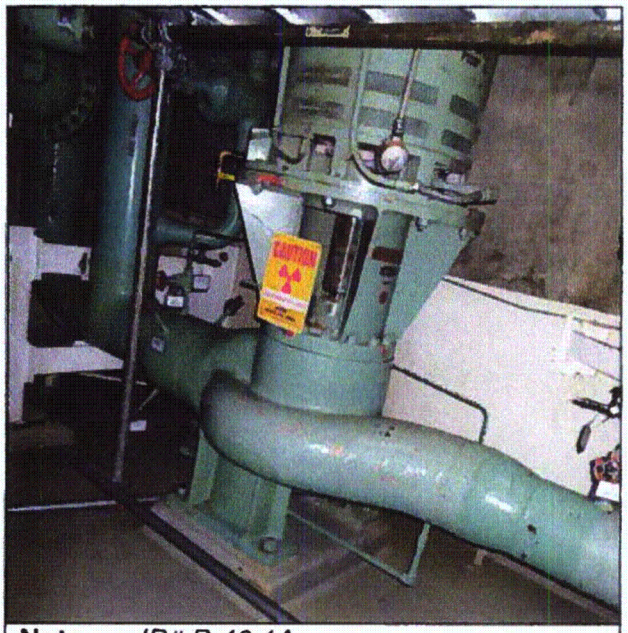
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 005

Equipment ID No. *P-46-1A* Equip. Class[1] *06*

Equipment Description *CS/"A" CORE SPRAY PUMP*

Photographs



Note: *ID# P-46-1A*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 005**

Equipment ID No. *P-46-1A* Equip. Class[1] *06*

Equipment Description *CS/"A" CORE SPRAY PUMP*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 006

Equipment ID No. *C-3-1A* Equip. Class[1] *12 - AIR COMPRESSORS*

Equipment Description *DG START AIR/COMPRESSOR A*

Location: Bldg. *TB* Floor El. *252* Room, Area *EDGR A*

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 006

Equipment ID No. *C-3-1A* Equip. Class[1] *12 - AIR COMPRESSORS*

Equipment Description *DG START AIR/COMPRESSOR A*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) Y☒ N☐ U☐ N/A☐
   See A46/IPEEE – SSEL Line No. 000033

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐
   There is a rigid connection but seismically they will move together and are acceptable based on engineering judgment.

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 006

Equipment ID No. *C-3-1A* Equip. Class[1] *12 - AIR COMPRESSORS*

Equipment Description *DG START AIR/COMPRESSOR A*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Reference Documents:
A46/IPEEE – SSEL Line No. 000033

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-01-2012*

Raymond Tworek 10/18/12 *10-01-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

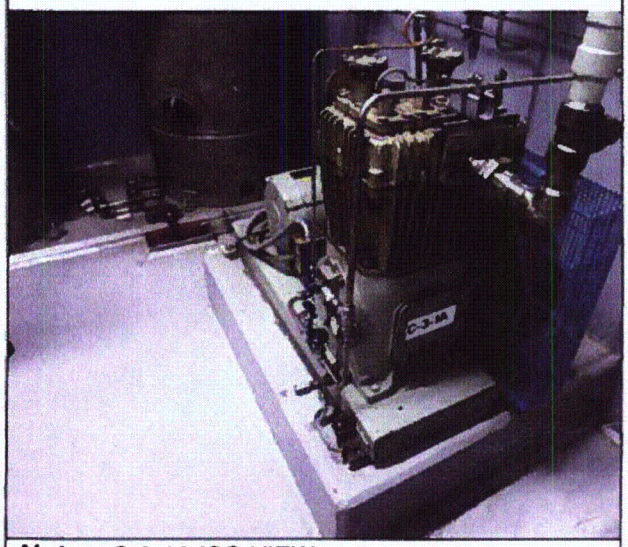
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 006**

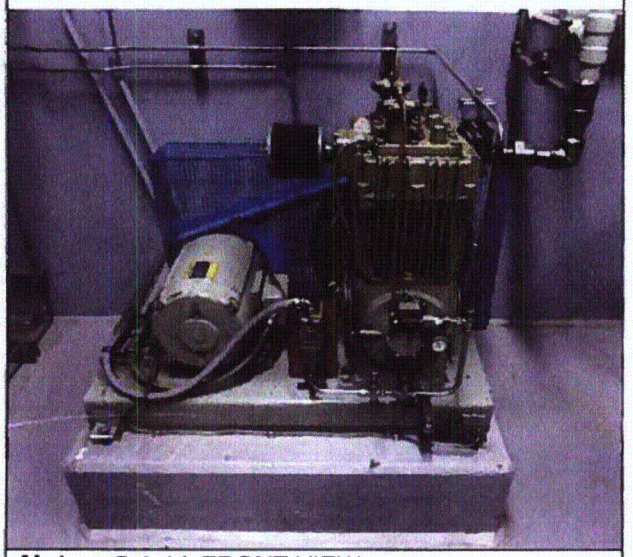
Equipment ID No. *C-3-1A* Equip. Class[1] *12 - AIR COMPRESSORS*

Equipment Description *DG START AIR/COMPRESSOR A*

Photographs



Note: *C-3-1A ISO VIEW*



Note: *C-3-1A FRONT VIEW*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 006**

Equipment ID No. *C-3-1A* Equip. Class[1] *12 - AIR COMPRESSORS*

Equipment Description *DG START AIR/COMPRESSOR A*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 007

Equipment ID No. ~~DG-1B~~ * DG-1-1B Equip. Class[1] 17

Equipment Description DIESEL GENERATOR B

Location: Bldg. TB Floor El. 252' Room, Area EDGR B

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☐ N☐ U☐ N/A☒
   Steel structure, no concrete.

* CORRECTED EQUIPMENT ID

10/25/12

10-25-12

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 007

Equipment ID No. ~~DG-1B~~ DG-1-1B JRA 10/4/12 JV 10-25-12 Equip. Class[1] 17

Equipment Description *DIESEL GENERATOR B*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) *The diesel generator comes attached to the skid. The skid is properly attached to the foundation (see Swel 1-091 and VYEM-0107) and the generator is attached to the skid with 8-1 ¾" diameter bolts. Thus, the generator falls under the rule of the box. Seismically acceptable by engineering judgment.*	Y☒ N☐ U☐ N/A☐
6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions?	Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures?	Y☒ N☐ U☐ N/A☐
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment?	Y☒ N☐ U☐ N/A☐
9. Do attached lines have adequate flexibility to avoid damage?	Y☒ N☐ U☐ N/A☐
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects?	Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 007

Equipment ID No. ~~DG-1B~~ DG-1-13 JAF 10/18/12 Equip. Class[1] 17

JF 10-25-12

Equipment Description DIESEL GENERATOR B

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
Drawing 5920-3991, G-191566, and VYEM-0107
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 000044

Evaluated by: Marcus Hecht-Nielsen 10/18/2012 Date: 10-03-2012

Raymond Tworek Raymond Tworek 10/18/12 10-03-2012

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

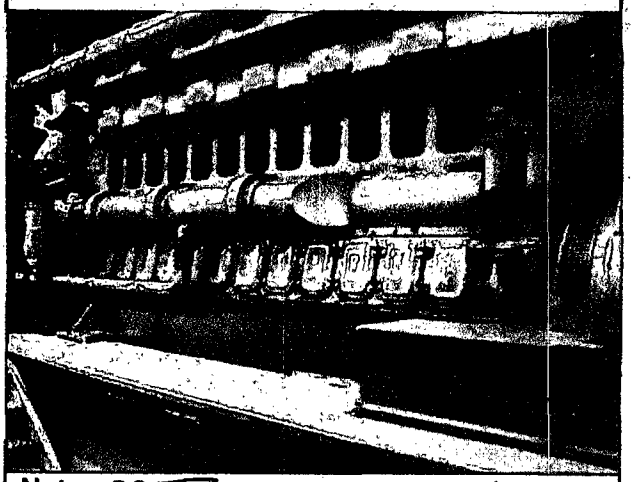
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 007**

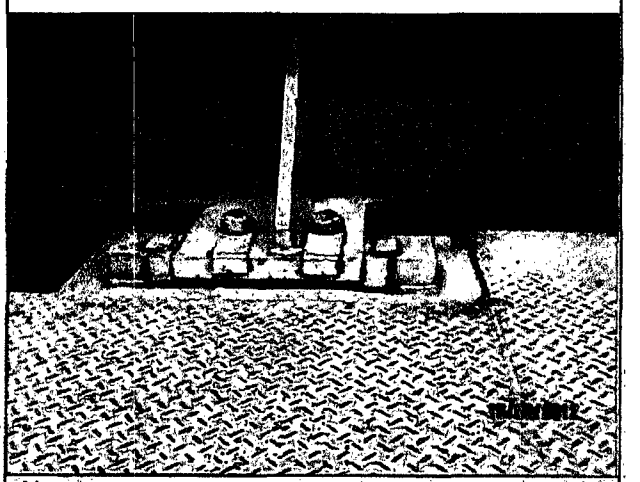
Equipment ID No. ~~DG-1B~~ DG-1-1B JBA 10/25/12 JBA 10-25-12 Equip. Class[1] 17

Equipment Description *DIESEL GENERATOR B*

Photographs



Note: ~~DG-1B~~ DG-1-1B JBA 10/25/12



Note: *Close-up of bolting*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

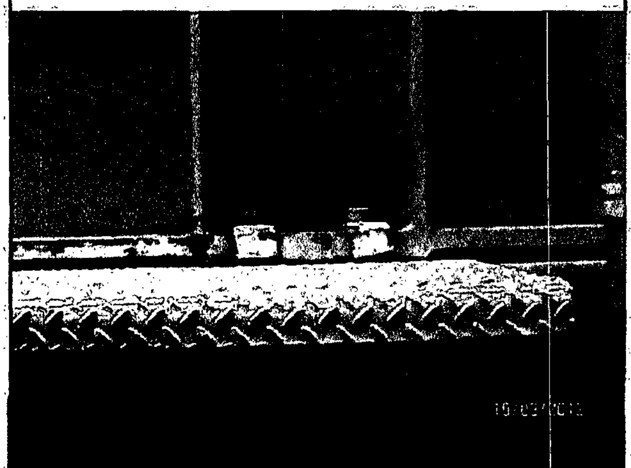
Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 007

Equipment ID No. ~~DG-1B~~ DG-1-1B Equip. Class[1] 17

Equipment Description *DIESEL GENERATOR B*

	NO PHOTO
Note: *Close-up of bolting*	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 008**

Equipment ID No. *LCV-108-2A* Equip. Class[1] *07 - FLUID OPERATED VALVES*

Equipment Description *FUEL OIL/DAY TANK FILLVALVE*

Location: Bldg. *TB* Floor El. *252'* Room, Area *DAY TK RM A*

Manufacturer, Model, Etc. (optional but recommended) *ACF #70-14-2-RH*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☐ N☒

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☐ N☐ U☐ N/A☒
   In-line valve, no anchorage.

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☐ N☐ U☐ N/A☒

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☐ N☐ U☐ N/A☒

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 008

Equipment ID No. *LCV-108-2A* Equip. Class[1] *07 - FLUID OPERATED VALVES*

Equipment Description *FUEL OIL/DAY TANK FILLVALVE*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which an anchorage configuration verification is required.) Y☐ N☐ U☐ N/A☒

6. **Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions?** Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? *No attached lines exist.* Y☐ N☐ U☐ N/A☒

10. **Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects?** Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 008**

Equipment ID No. *LCV-108-2A* Equip. Class[1] *07 - FLUID OPERATED VALVES*

Equipment Description *FUEL OIL/DAY TANK FILLVALVE*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Reference Documents:
A46/IPEEE – SSEL Line No. 000049

Evaluated by: *Kirit Parikh* K Parikh 10/18/2012 Date: *10/02/2012*

Randy Stephens Randy Stephens 10/18/2012 *10/02/2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

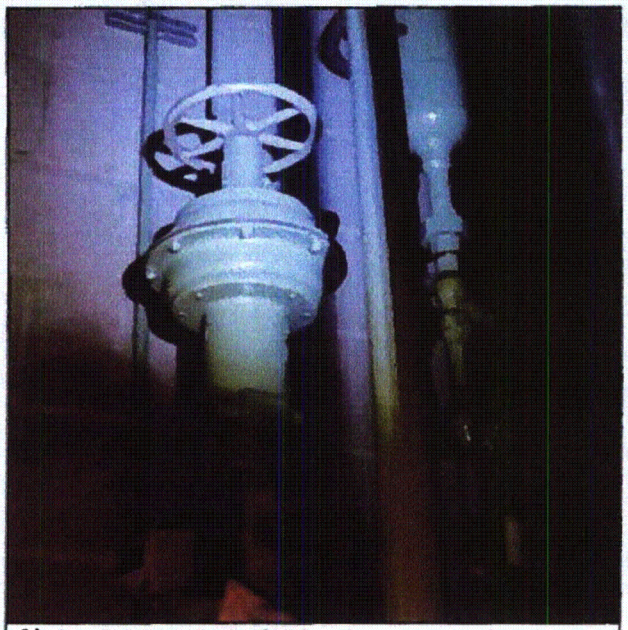
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 008**

Equipment ID No. *LCV-108-2A* Equip. Class[1] *07 - FLUID OPERATED VALVES*

Equipment Description *FUEL OIL/DAY TANK FILLVALVE*

Photographs



Note: *Upper view of valve.*

Note: *Lower view of valve.*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 008**

Equipment ID No. *LCV-108-2A* Equip. Class[1] *07 - FLUID OPERATED VALVES*

Equipment Description *FUEL OIL/DAY TANK FILLVALVE*

NO PHOTO

Note: *Valve Identification #LCV-108-2A*

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 009

Equipment ID No. *TK-42-1B* Equip. Class[1] *21 - TANKS & HEAT EXCHANGERS*

Equipment Description *FUEL OIL/DIESEL OIL DAY TANK B*

Location: Bldg. *TB* Floor El. *252* Room, Area *DAY TK RM B*

Manufacturer, Model, Etc. (optional but recommended) *Buffulo Tank Div.*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐
   Two grout pads on the east side of the tank are slightly damaged, but do not effect seismic performance or reliability.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 009

Equipment ID No. *TK-42-1B* Equip. Class[1] *21 - TANKS & HEAT EXCHANGERS*

Equipment Description *FUEL OIL/DIESEL OIL DAY TANK B*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) Y☒ N☐ U☐ N/A☐
   See A46/IPEEE – SSEL Line No. 000052

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 009

Equipment ID No. *TK-42-1B* Equip. Class[1] *21 - TANKS & HEAT EXCHANGERS*

Equipment Description *FUEL OIL/DIESEL OIL DAY TANK B*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Reference Documents:
A46/IPEEE – SSEL Line No. 000052
Drawing 5920-4047 and B-191261, sheet 54.
Modification MM 99-021
Calculation VYC-1891

Evaluated by: *Marcus Hecht-Nielsen* 10/15/2012 Date: *10-03-2012*

Raymond Tworek Raymond Tworek 10/18/12 *10-03-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

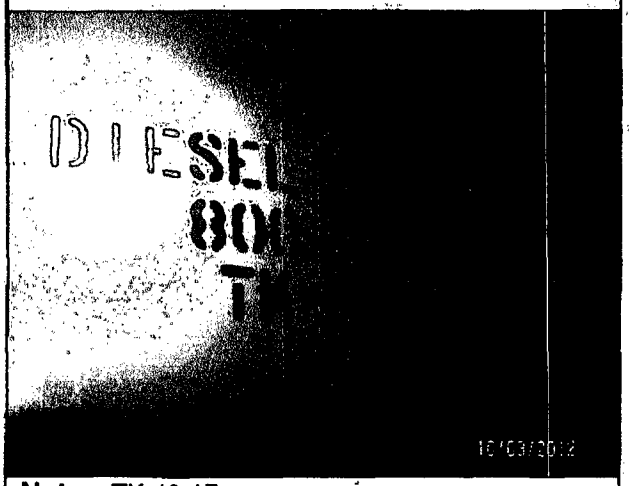
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 009**

Equipment ID No. *TK-42-1B* Equip. Class[1] *21 - TANKS & HEAT EXCHANGERS*

Equipment Description *FUEL OIL/DIESEL OIL DAY TANK B*

Photographs



Note: *TK-42-1B*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 009**

Equipment ID No. *TK-42-1B* Equip. Class[1] *21 - TANKS & HEAT EXCHANGERS*

Equipment Description *FUEL OIL/DIESEL OIL DAY TANK B*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 010

Equipment ID No. *TK-40-1A* Equip. Class[1] *21*

Equipment Description *FUEL OIL/FUEL OIL STORAGE TANK (FOST)*

Location: Bldg. *YARD* Floor El. *252'* Room, Area *YARD*

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

   A small hairline crack is seen near North-East bolt, seismically insignificant by engineering judgment since only small area has this crack. All other areas are without any cracks.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 010

Equipment ID No. *TK-40-1A* Equip. Class[1] *21*

Equipment Description *FUEL OIL/FUEL OIL STORAGE TANK (FOST)*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which an anchorage configuration verification is required.) Y☒ N☐ U☐ N/A☐
   See *Drawing G-191606 and calculation VYC-1469.*

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☐ N☐ U☐ N/A☒
   No flexible items connected

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 010

Equipment ID No. *TK-40-1A* Equip. Class[1] *21*

Equipment Description *FUEL OIL/FUEL OIL STORAGE TANK (FOST)*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
Drawing G-191606
Calculation VYC-1469
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 00053

Evaluated by: *Kirit Parikh* K Parikh 10/18/2012 Date: *10/03/12*

Randy Stephens Randy Stephens 10/18/2012 *10/03/12*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

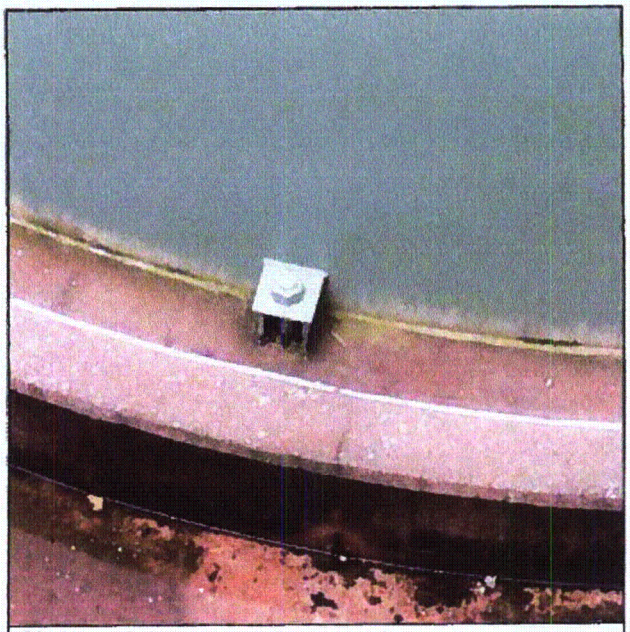
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 010**

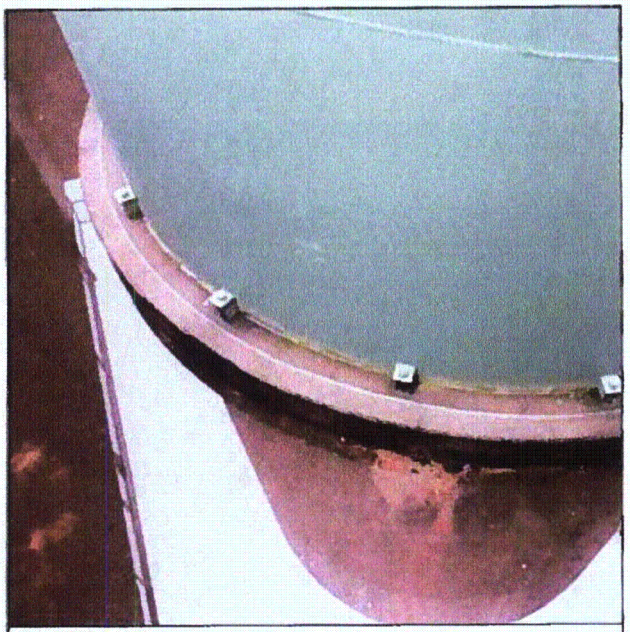
Equipment ID No. *TK-40-1A* Equip. Class[1] *21*

Equipment Description *FUEL OIL/FUEL OIL STORAGE TANK (FOST)*

Photographs



Note: *Hairline crack in concrete.*



Note: *FOST Tank anchorage.*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

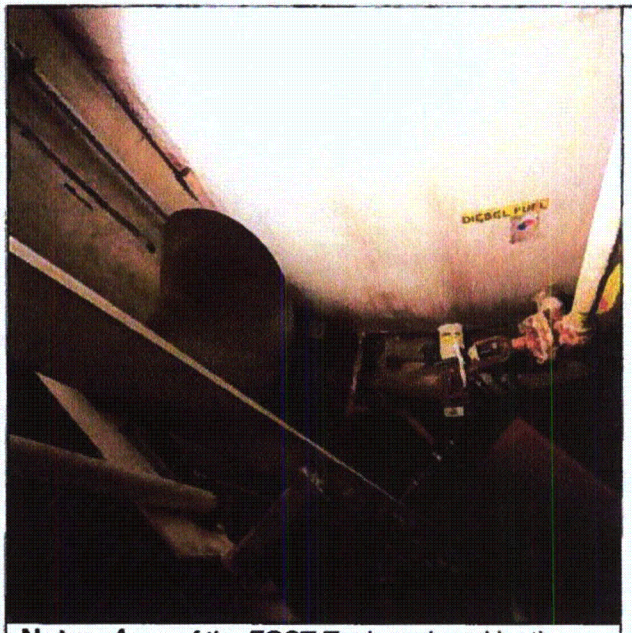
Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 010**

Equipment ID No. *TK-40-1A* Equip. Class[1] *21*

Equipment Description *FUEL OIL/FUEL OIL STORAGE TANK (FOST)*



Note: *Area of the FOST Tank enclosed by the pump house.*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 011

Equipment ID No. *P-92-1A* Equip. Class[1] *05*

Equipment Description *FUEL OIL/FUEL OIL TRANSFER PUMP A*

Location: Bldg. *FO* Floor El. *241'* Room, Area *SWCR*

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 011

Equipment ID No. *P-92-1A* Equip. Class[1] *05*

Equipment Description *FUEL OIL/FUEL OIL TRANSFER PUMP A*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which an anchorage configuration verification is required.) Y☒ N☐ U☐ N/A☐
   See SSEL Line No. 00054 and associated anchorage calculation.

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 011**

Equipment ID No. *P-92-1A* Equip. Class[1] *05*

Equipment Description *FUEL OIL/FUEL OIL TRANSFER PUMP A*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 00054

Evaluated by: *Kirit Parikh* 10/18/2012 Date: *10/03/2012*

Randy Stephens Randy Stephens 10/18/2012 *10/03/2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 011**

Equipment ID No. *P-92-1A* Equip. Class[1] *05*

Equipment Description *FUEL OIL/FUEL OIL TRANSFER PUMP A*

Photographs

Note: *ID # P-92-1A*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 011

Equipment ID No. *P-92-1A* Equip. Class[1] *05*

Equipment Description *FUEL OIL/FUEL OIL TRANSFER PUMP A*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 012

Equipment ID No. *MG-2-1A* Equip. Class[1] *13*

Equipment Description *120/240V VITAL AC MG SET*

Location: Bldg. *RB* Floor El. *280'* Room, Area

Manufacturer, Model, Etc. (optional but recommended) *G.E. # 5LS4404A22Y37*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 012

Equipment ID No. *MG-2-1A* Equip. Class[1] *13*

Equipment Description *120/240V VITAL AC MG SET*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which an anchorage configuration verification is required.) *See drawings 5920-12739 and 5920-4463* — Y☒ N☐ U☐ N/A☐

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? — Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? — Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? — Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? — Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? — Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 012

Equipment ID No. *MG-2-1A* Equip. Class[1] *13*

Equipment Description *120/240V VITAL AC MG SET*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y N☒ U☐

Comments (Additional pages may be added as necessary)

Reference Documents:
Drawing 5920-4463, Sheet 1, Rev.0 and 5920-12739
A46/IPEEE - Screening Evaluation Work Sheet, SSEL Line No. 000060

Evaluated by: *Marcus Hecht-Nielsen* 10/18/12 Date: *10-09-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-09-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

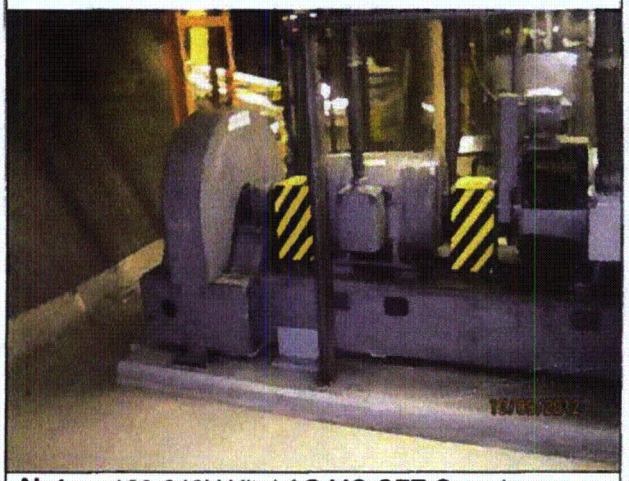
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 012**

Equipment ID No. *MG-2-1A* Equip. Class[1] *13*

Equipment Description *120/240V VITAL AC MG SET*

Photographs



Note: *120-240V Vital AC MG SET Overview*

Note: *Modification*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 012**

Equipment ID No. *MG-2-1A* Equip. Class[1] *13*

Equipment Description *120/240V VITAL AC MG SET*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 013

Equipment ID No. *BC-1-1A* Equip. Class[1] *16*

Equipment Description *125V DC MAIN STATION BATTERY CHARGER A ON DC-1*

Location: Bldg. *CB* Floor El. *248'* Room, Area *SWGR WEST*

Manufacturer, Model, Etc. (optional but recommended) *C&D Power Systems, # ARR130K150F*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 013

Equipment ID No. *BC-1-1A* Equip. Class[1] *16*

Equipment Description *125V DC MAIN STATION BATTERY CHARGER A ON DC-1*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) Y☒ N☐ U☐ N/A☐

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 013

Equipment ID No. *BC-1-1A* Equip. Class[1] *16*

Equipment Description *125V DC MAIN STATION BATTERY CHARGER A ON DC-1*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Reference Documents:
Drawing 5920-10849, Sheet 1, Rev.1
A46/IPEEE - Screening Evaluation Work Sheet, SSEL Line No. 000061

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-09-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-09-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

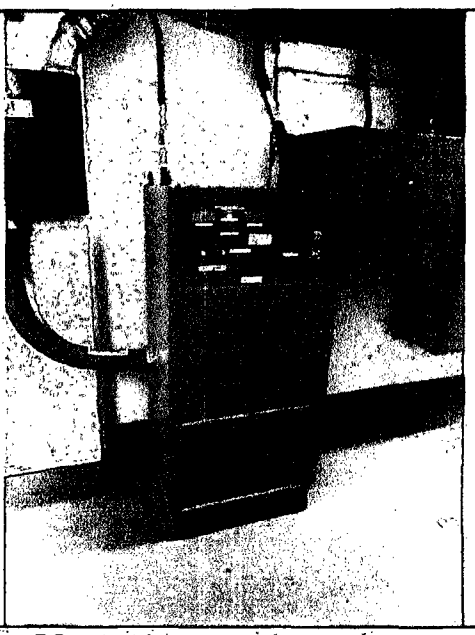
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 013**

Equipment ID No. *BC-1-1A* Equip. Class[1] *16*

Equipment Description *125V DC MAIN STATION BATTERY CHARGER A ON DC-1*

Photographs



Note: *BC – 1 -1A*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 013

Equipment ID No. *BC-1-1A* Equip. Class[1] *16*

Equipment Description *125V DC MAIN STATION BATTERY CHARGER A ON DC-1*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 014

Equipment ID No. *B-AS-2* Equip. Class[1] *15 - BATTERIES ON RACKS*

Equipment Description *125V DC STATION BATTERY ON BUS DC-2AS*

Location: Bldg. *TB* Floor El. *252* Room, Area *EDGR A*

Manufacturer, Model, Etc. (optional but recommended) *C/D, KC-9, 59 cells, flat plate*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 014

Equipment ID No. *B-AS-2* Equip. Class[1] *15 - BATTERIES ON RACKS*

Equipment Description *125V DC STATION BATTERY ON BUS DC-2AS*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) Y☒ N☐ U☐ N/A☐
   See drawing G-191572

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐
   Expansion tank TK-67-1A located above the battery rack is adequately supported (see EDCR -82-12) no issue.

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 014

Equipment ID No. *B-AS-2* Equip. Class[1] *15 - BATTERIES ON RACKS*

Equipment Description *125V DC STATION BATTERY ON BUS DC-2AS*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Reference Documents:
A46/IPEEE – SSEL Line No. 000065
See SSEL# 000328, TK-67-1A, and EDCR 82-12
Drawings G-191572 & 5920-11085

Evaluated by: *Marcus Hecht-Nielsen* 10/18/12 Date: *10-01-2012*

Raymond Tworek 10/18/12 *10-01-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 014**

Equipment ID No. *B-AS-2* Equip. Class[1] *15 - BATTERIES ON RACKS*

Equipment Description *125V DC STATION BATTERY ON BUS DC-2AS*

Photographs

Note: *B-AS-2 view looking west*

Note: *B-AS-2 view looking east*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

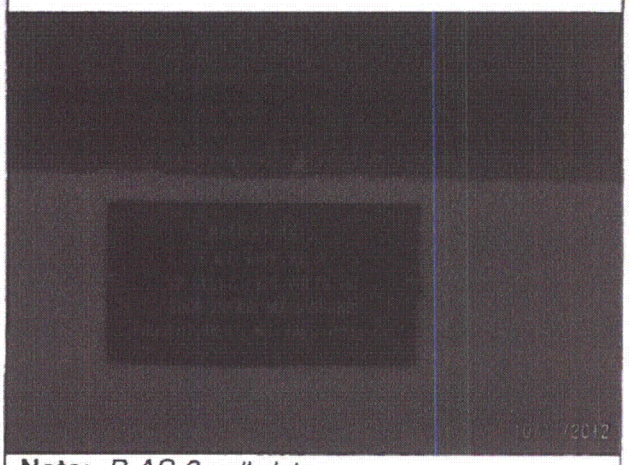
Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 014

Equipment ID No. *B-AS-2* Equip. Class[1] *15 - BATTERIES ON RACKS*

Equipment Description *125V DC STATION BATTERY ON BUS DC-2AS*



Note: *B-AS-2 wall plate*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 015**

Equipment ID No. *B-1-1B* Equip. Class[1] *15*

Equipment Description *125V DC STATION BATTERY ON DC-2*

Location: Bldg. *CB* Floor El. *262'* Room, Area *CABLE VAULT*

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 015

Equipment ID No. *B-1-1B* Equip. Class[1] *15*

Equipment Description *125V DC STATION BATTERY ON DC-2*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) *See drawings B-1-1A and B-1-1B*	Y☒ N☐ U☐ N/A☐
6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions?	Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures?	Y☒ N☐ U☐ N/A☐
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment?	Y☒ N☐ U☐ N/A☐
9. Do attached lines have adequate flexibility to avoid damage?	Y☒ N☐ U☐ N/A☐
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects?	Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 015

Equipment ID No. *B-1-1B* Equip. Class[1] *15*

Equipment Description *125V DC STATION BATTERY ON DC-2*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Reference Documents:
Drawing 5920-4411, C&D BATTERIES, Sheet 1
Drawing 5920-11884, Duke Engineering & Services, Sheets 1-4
Drawings B-1-1A and B-1-1B
A46/IPEEE - Screening Evaluation Work Sheet, SSEL Line No. 000067

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-09-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-09-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

Status: Y☒ N☐ U☐

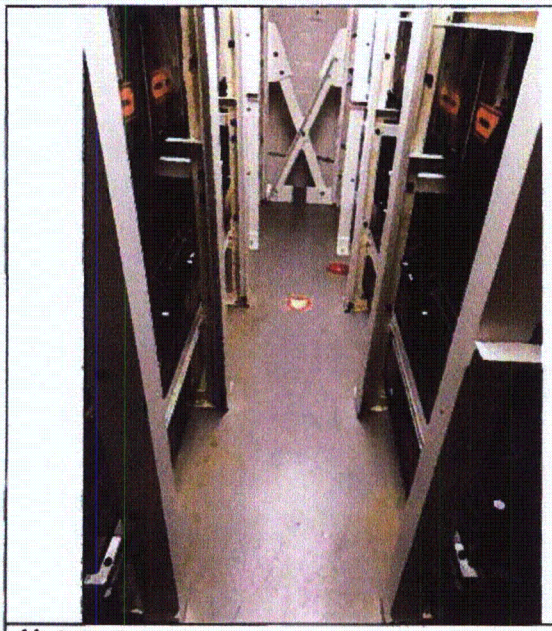
Seismic Walkdown Checklist (SWC) **SWEL1- 015**

Equipment ID No. *B-1-1B* Equip. Class[1] *15*

Equipment Description *125V DC STATION BATTERY ON DC-2*

Photographs

Note: *B-1-1B*



Note: *B-1-1B*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

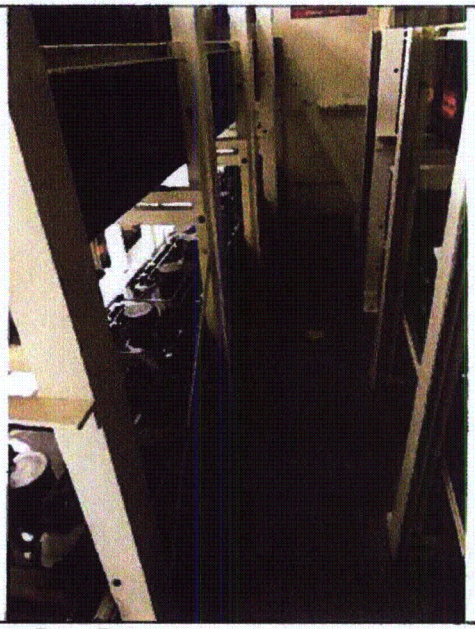
Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 015**

Equipment ID No. *B-1-1B* Equip. Class[1] *15*

Equipment Description *125V DC STATION BATTERY ON DC-2*



Note: *B-1-1B*

Note: *B-1-1B*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 016

Equipment ID No. *DC-1* Equip. Class[1] *14*

Equipment Description *125V DC DISTR PNL DC-1 1600AMP*

Location: Bldg. *CB* Floor El. *262'* Room, Area *CABLE VAULT*

Manufacturer, Model, Etc. (optional but recommended) *Westinghouse, NEMA II Switchboard*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☐ N☒

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☐ N☐ U☐ N/A☒

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☐ N☐ U☐ N/A☒

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 016

Equipment ID No. *DC-1* Equip. Class[1] *14*

Equipment Description *125V DC DISTR PNL DC-1 1600AMP*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) Y☐ N☐ U☐ N/A☒

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 016

Equipment ID No. *DC-1* Equip. Class[1] *14*

Equipment Description *125V DC DISTR PNL DC-1 1600AMP*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Reference Documents:
Drawing 5920-11819, Sheets 1-2, Rev.0
Drawing 5920-4835, Sheet 1, Rev.0
A46/IPEEE - Screening Evaluation Work Sheet, SSEL Line No. 000069

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-09-2012*

Raymond Tworek 10/18/12 *10-09-20102*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 016**

Equipment ID No. *DC-1* Equip. Class[1] *14*

Equipment Description *125V DC DISTR PNL DC-1 1600AMP*

Photographs

Note: *125V DC Distr. Pnl. DC-1*

Note: *125V DC Distr. Pnl. DC-1*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

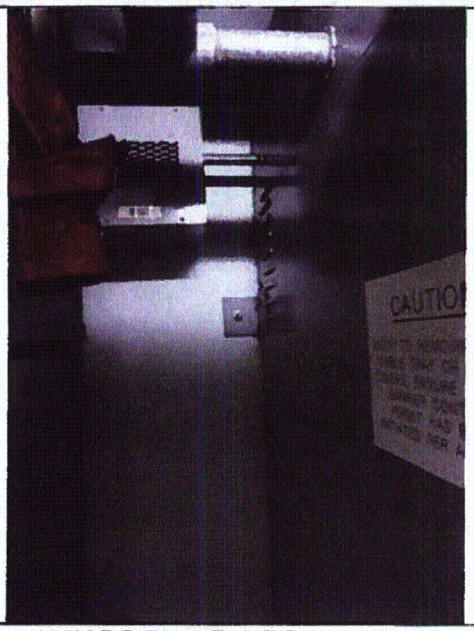
Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 016**

Equipment ID No. *DC-1* Equip. Class[1] *14*

Equipment Description *125V DC DISTR PNL DC-1 1600AMP*



Note: *125V DC Distr. Pnl. DC-1*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 017

Equipment ID No. *DC-2* Equip. Class[1] *14*

Equipment Description *125V DC DISTR PNL DC-2 1600AMP*

Location: Bldg. *CB* Floor El. *262'* Room, Area *CABLE VAULT*

Manufacturer, Model, Etc. (optional but recommended) *Westinghouse, NEMA II Switchboard*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☐ N☒

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☐ N☐ U☐ N/A☒

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☐ N☐ U☐ N/A☒

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 017**

Equipment ID No. *DC-2* Equip. Class[1] *14*

Equipment Description *125V DC DISTR PNL DC-2 1600AMP*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.)	Y☐ N☐ U☐ N/A☒
6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions?	Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures?	Y☒ N☐ U☐ N/A☐
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment?	Y☒ N☐ U☐ N/A☐
9. Do attached lines have adequate flexibility to avoid damage?	Y☒ N☐ U☐ N/A☐
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects?	Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 017

Equipment ID No. *DC-2* Equip. Class[1] *14*

Equipment Description *125V DC DISTR PNL DC-2 1600AMP*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Reference Documents:
Drawing 5920-11819, Sheets 1-2; Rev.0
Drawing 5920-4836, Sheet 1, Rev.2
A46/IPEEE - Screening Evaluation Work Sheet, SSEL Line No. 000071

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-09-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-09-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

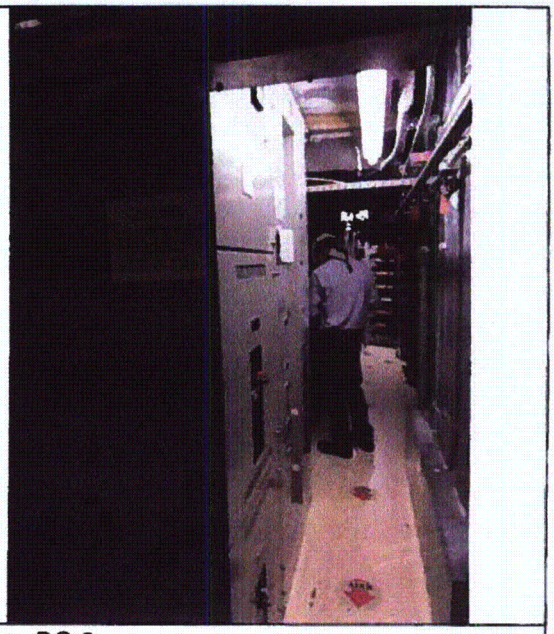
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 017**

Equipment ID No. *DC-2* Equip. Class[1] *14*

Equipment Description *125V DC DISTR PNL DC-2 1600AMP*

Photographs



Note: *DC-2*

Note: *DC-2*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

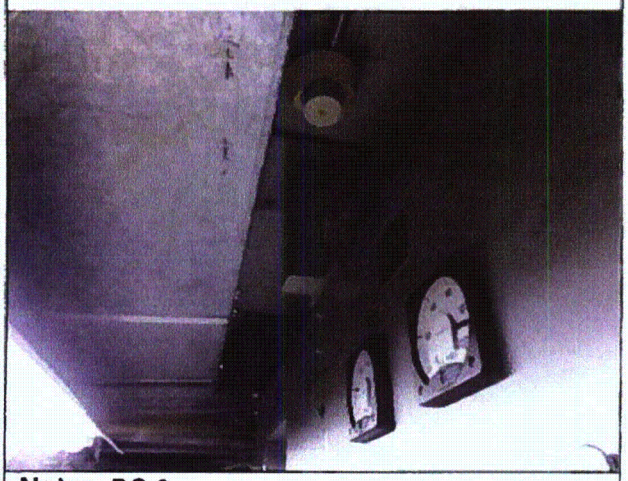
Sheet 5 of 5

Status: Y☒ N☐ U☐

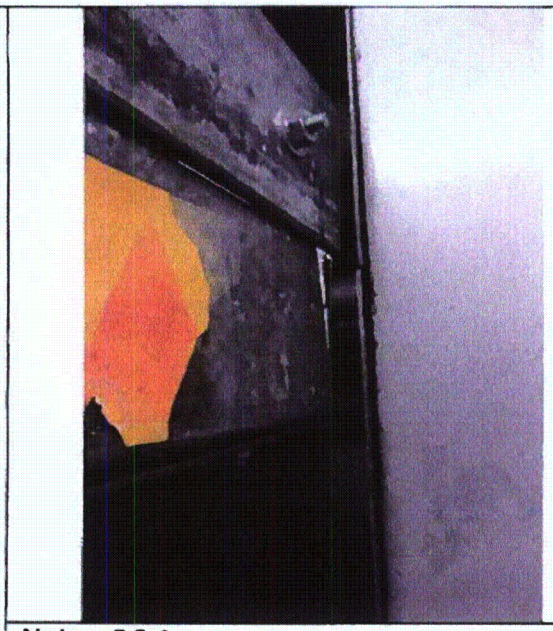
Seismic Walkdown Checklist (SWC) **SWEL1- 017**

Equipment ID No. *DC-2* Equip. Class[1] *14*

Equipment Description *125V DC DISTR PNL DC-2 1600AMP*



Note: *DC-2*



Note: *DC-2*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 018

Equipment ID No. *DC-ECCS-B* Equip. Class[1] *14 - DISTRIBUTION PANELS*

Equipment Description *24 VDC ECCS PNL (B)*

Location: Bldg. *RB* Floor El. *303'* Room, Area *EAST*

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 018

Equipment ID No. *DC-ECCS-B* Equip. Class[1] *14 - DISTRIBUTION PANELS*

Equipment Description *24 VDC ECCS PNL (B)*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) *See SSEL Line No. 000081(attachment A).* Y☒ N☐ U☐ N/A☐

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 018

Equipment ID No. *DC-ECCS-B* Equip. Class[1] *14 - DISTRIBUTION PANELS*

Equipment Description *24 VDC ECCS PNL (B)*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

1 - 3/8" nut (right upper in cabinet-see attached photo) is not fully engaged. About 50% of the nut is engaged. Remaining nuts are fully engaged. With this observation the panel is secured and will not be impacted due to seismic condition.

CR # CR-VTY-2012-05021 / 05007 generated to fix the engagement.

Comments (Additional pages may be added as necessary)

Note: Original inspection completed 10/10/2012. Re-inspected 10/11/2012 when cabinet door was opened by qualified plant personnel.

Reference Documents:

A46/IPEEE – SSEL Line No. 000081.

A46/IPEEE – SSEL Line No. 000081(attachment A)

Evaluated by: *Kirit Parikh* K Parikh 10/18/2012 Date: *10/11/2012*

Randy Stephens Randy Stephen 10/18/2012 *10/11/2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

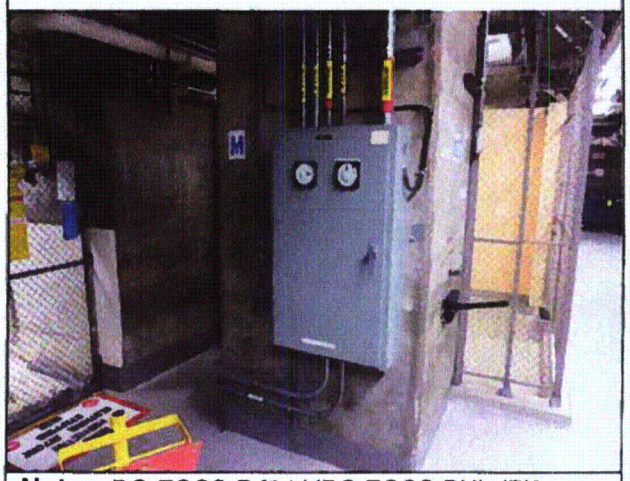
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 018

Equipment ID No. *DC-ECCS-B* Equip. Class[1] *14 - DISTRIBUTION PANELS*

Equipment Description *24 VDC ECCS PNL (B)*

Photographs



Note: *DC-ECCS-B [24 VDC ECCS PNL (B)]*

Note: *Distribution Panel ID tag*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

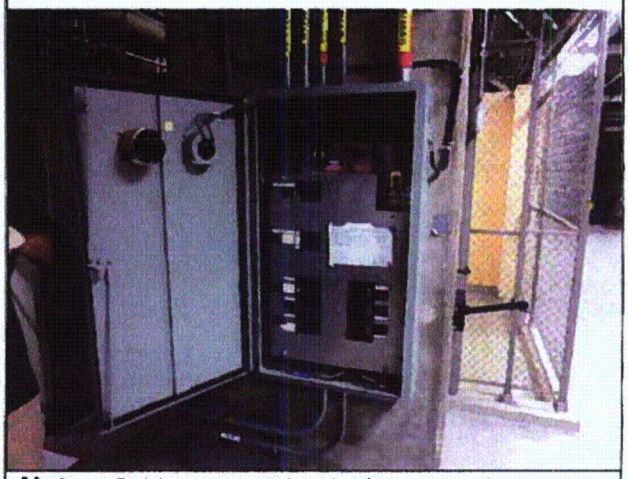
Sheet 5 of 5

Status: Y☒ N☐ U☐

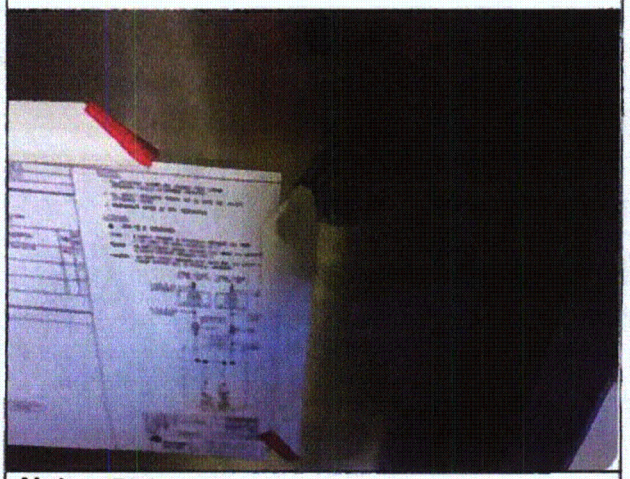
Seismic Walkdown Checklist (SWC) SWEL1- 018

Equipment ID No. *DC-ECCS-B* Equip. Class[1] *14 - DISTRIBUTION PANELS*

Equipment Description *24 VDC ECCS PNL (B)*



Note: *Cabinet opened 10/11/12 and re-inspection completed. One nut not engaged for 50% of thread. No seismic concerns since 3 nuts are fully engaged.*



Note: *Right upper nut.*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 019

Equipment ID No. *MCC-9C* Equip. Class[1] *01 - Motor Control Centers*

Equipment Description *480V ESS AC MCC-9C - DIESEL 1A ROOM (SII)*

Location: Bldg. *TB* Floor El. *252* Room, Area *EDG A*

Manufacturer, Model, Etc. (optional but recommended) *Westinghouse, Type W*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐
   On October 11, 2012 revisited the unit and removed upper and lower panels. With upper panel removed was able to verify attachment of angle to unit.

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐
   On October 11, 2012 revisited the unit and removed upper and lower panels. With upper panel removed was able to verify attachment of angle to unit.

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐
   Crack on eastside of the floor. The crack goes thru the grout pad and the corner of house pad (SE Corner). By engineering judgment the crack, hairline, is not a seismic issue. No photos of crack included because the crack was not visible in the picture.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 019

Equipment ID No. *MCC-9C* Equip. Class[1] *01 - Motor Control Centers*

Equipment Description *480V ESS AC MCC-9C - DIESEL 1A ROOM (SII)*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) *See SK92403-06-A* Y☒ N☐ U☐ N/A☐

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 019

Equipment ID No. *MCC-9C* Equip. Class[1] *01 - Motor Control Centers*

Equipment Description *480V ESS AC MCC-9C - DIESEL 1A ROOM (SII)*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Two loose screws on front east side of cabinet. The screws still have positive attachment and given the number and the weight of the cabinet door the system is acceptable.

See CR-VTY-2012-04816 for corrective action.

Reference Documents:
A46/IPEEE – SSEL Line No. 000085

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-11-12*

Raymond Tworek Raymond F Tworek 10/18/12 *10-11-12*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 019

Equipment ID No. *MCC-9C* Equip. Class[1] *01 - Motor Control Centers*

Equipment Description *480V ESS AC MCC-9C - DIESEL 1A ROOM (SII)*

Photographs

Note:

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 019

Equipment ID No. *MCC-9C* Equip. Class[1] *01 - Motor Control Centers*

Equipment Description *480V ESS AC MCC-9C - DIESEL 1A ROOM (SII)*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 020

Equipment ID No. *MCC-9D* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-9D – REACTOR BLDG*

Location: Bldg. *RB* Floor El. *252'* Room, Area *Reactor Building*

Manufacturer, Model, Etc. (optional but recommended) *Westinghouse*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☐ N☒

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐
   Two small screws used to attach the South end panel are missing. See photo on sheet 5. Not a seismic concern as the modified anchorage securely attaches the end panel. The modified bolts are a replacement for the screws above it. The bolts clamping force far exceeds the fasteners (2 screws) clamping force. The end panel is securely fastened.

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 020

Equipment ID No. *MCC-9D* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-9D – REACTOR BLDG*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which an anchorage configuration verification is required.)	Y☐ N☐ U☐ N/A☒
6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? The right upper panel was not opened due to interference concerns with internal components. Anchorage is secure at the bolted connections. No adverse seismic condition.	Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures?	Y☒ N☐ U☐ N/A☐
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment?	Y☒ N☐ U☐ N/A☐
9. Do attached lines have adequate flexibility to avoid damage?	Y☒ N☐ U☐ N/A☐
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects?	Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 020**

Equipment ID No. *MCC-9D* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-9D – REACTOR BLDG*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Note: Original inspection completed 10/04/2012. Re-inspected 10/11/2012 when cabinet panels were opened by qualified plant personnel exposing the anchorage connections.

Reference Documents:
A46/IPEEE – SSEL Line No. 000088

Evaluated by: *Kirit Parikh* K Parikh 10/16/2012 Date: *10/11/2012*

Randy Stephens Randy Stephens 10/18/2012 *10/11/2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

Status: Y☒ N☐ U☐

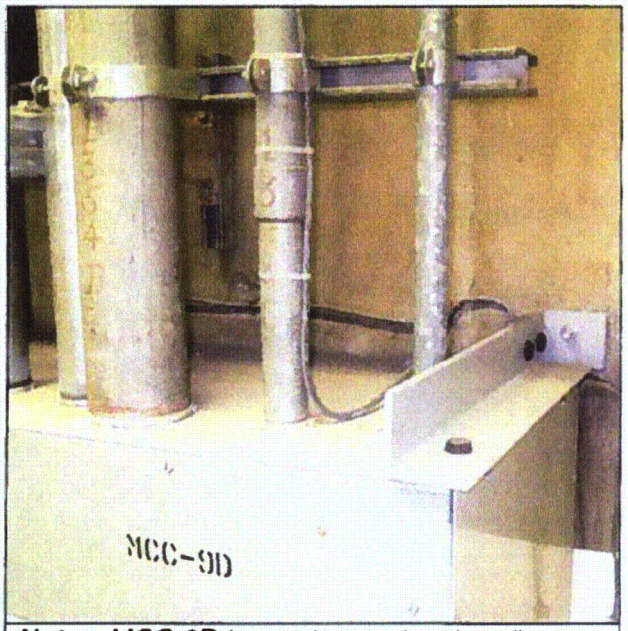
Seismic Walkdown Checklist (SWC) SWEL1- 020

Equipment ID No. *MCC-9D* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-9D – REACTOR BLDG*

Photographs

Note: *MCC-9D is located on the right.*



Note: *MCC-9D top anchorage (south end).*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

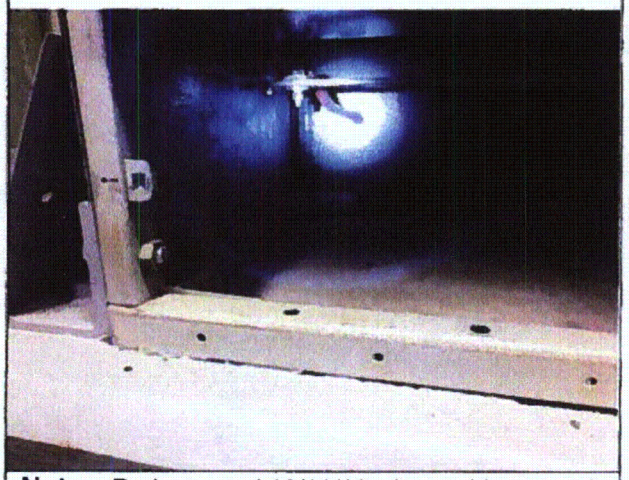
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 020

Equipment ID No. *MCC-9D* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-9D – REACTOR BLDG*

Note: *Two small screws are missing from the South end of MCC-9D.See item 1 comment on page 1.*



Note: *Re-inspected 10/11/12 when cabinet panels were opened.*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 021**

Equipment ID No. *MCC-8B* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-8B – REACTOR BLDG (SI)*

Location: Bldg. *RB* Floor El. *280'* Room, Area

Manufacturer, Model, Etc. (optional but recommended) *Westinghouse, Type W*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐
   See comments.

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐
   See comments.

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐
   There is a protective cover on the concrete and the concrete is not visible. However, the protective cover shows no signs of stress or cracking and is seismically okay by engineering judgment.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 021

Equipment ID No. *MCC-8B* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-8B – REACTOR BLDG (SI)*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) *See drawing 5920-11776* Y☒ N☐ U☐ N/A☐

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 021

Equipment ID No. *MCC-8B* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-8B – REACTOR BLDG (SI)*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Notes:

1. *At the location where MCC 7A and 8B come together there are 3 loose screws and there is a screw missing on panel 8M. Neither issue is a seismic concern, see CR-VTY-2012-04979 for corrective action.*
2. *Was unable to view anchorage on 10-09-2012. Returned on 10-11-2012 and removed the bottom panels at locations 1M, 4M, 6M, and 9M and top panels at 1C, 5C, 6B, and 10BL, as well as, the vertical panel between MCC 7A and MCC 8B come together. With the aid of a flashlight and a telescopic inspection mirror was able to verify anchorage.*

Reference Documents:
Drawing 5920-11776, Sheets 1-2, Rev.0
A46/IPEEE - Screening Evaluation Work Sheet, SSEL Line No. 000090

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-11-2012*

Raymond Tworek 10/18/12 *10-11-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 021**

Equipment ID No. *MCC-8B* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-8B – REACTOR BLDG (SI)*

Photographs

Note: *Loose bolts at connection of MCC8 and MCC7*

Note: *Missing bolt*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 021**

Equipment ID No. *MCC-8B* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-8B – REACTOR BLDG (SI)*

Note: *Ground anchorage*

Note: *Wall anchorage*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 022**

Equipment ID No. *MCC-9B* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-9B – REACTOR BLDG (SII)*

Location: Bldg. *RB* Floor El. *280'* Room, Area

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

   There is a protective cover on the concrete and the concrete is not visible. However, the protective cover shows no signs of stress or cracking and is seismically okay by engineering judgment.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 022**

Equipment ID No. *MCC-9B* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-9B – REACTOR BLDG (SII)*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.)
   See drawing 5920-11776
   Y☒ N☐ U☐ N/A☐

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions?
   Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures?
   Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment?
   Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage?
   Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects?
    Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 022

Equipment ID No. *MCC-9B* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-9B – REACTOR BLDG (SII)*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐
    Loose screws between rows 1C to 1M and 2C to 2M. 10-18-2012 Went to verify that the electrician tightened all the screw (on 10-11-2012 while we were opening the panels to verify anchorage) and all screws are tight.

Comments (Additional pages may be added as necessary)

Notes:

1. *Was unable to view anchorage on 10-09-2012. Returned on 10-11-2012 and removed the bottom panels at locations 1M, 5M, 8M, 9M, and 11M and top panels at 2C, 5C, 7C, and 10B, as well as, the vertical panel between MCC 6 and MCC 9 come together. With the aid of a flashlight and a telescopic inspection mirror was able to verify anchorage.*

Reference Documents:
Drawing 5920-11776, Sheets 1-2, Rev.0
A46/IPEEE - Screening Evaluation Work Sheet, SSEL Line No. 000092

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-11-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-11-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

Status: Y☒ N☐ U☐

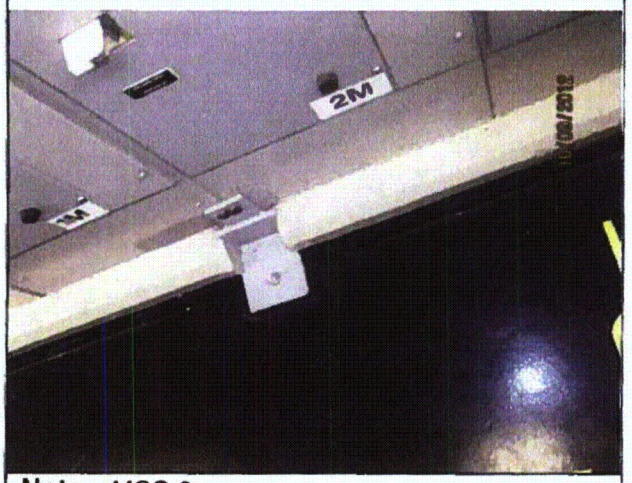
Seismic Walkdown Checklist (SWC) **SWEL1- 022**

Equipment ID No. *MCC-9B* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-9B – REACTOR BLDG (SII)*

Photographs

Note: *Loose bolts between panels*



Note: *MCC-9*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 022**

Equipment ID No. *MCC-9B* Equip. Class[1] *01*

Equipment Description *480V ESS AC MCC-9B – REACTOR BLDG (SII)*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 023

Equipment ID No. *BUS-9* Equip. Class[1] *02*

Equipment Description *480V AC SWITCHGEAR BUS NO.9 1600AMP (SII)*

Location: Bldg. *CB* Floor El. *248'* Room, Area *SWGR EAST*

Manufacturer, Model, Etc. (optional but recommended) *GE AKD-5*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☐ N☒

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☐ N☐ U☐ N/A☒

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☐ N☐ U☐ N/A☒

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☐ N☐ U☐ N/A☒

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 023

Equipment ID No. *BUS-9* Equip. Class[1] *02*

Equipment Description *480V AC SWITCHGEAR BUS NO.9 1600AMP (SII)*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) Y☐ N☐ U☐ N/A☒

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 023

Equipment ID No. *BUS-9* Equip. Class[1] *02*

Equipment Description *480V AC SWITCHGEAR BUS NO.9 1600AMP (SII)*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-09-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-09-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 023**

Equipment ID No. *BUS-9* Equip. Class[1] *02*

Equipment Description *480V AC SWITCHGEAR BUS NO.9 1600AMP (SII)*

Photographs

Note: *Bus-9*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 023

Equipment ID No. *BUS-9* Equip. Class[1] *02*

Equipment Description *480V AC SWITCHGEAR BUS NO.9 1600AMP (SII)*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 024

Equipment ID No. *BUS-3* Equip. Class[1] *03*

Equipment Description *4KV – 4160V SWITCHGEAR BUS NO.3 1200AMP (SI)*

Location: Bldg. *CB* Floor El. *248'* Room, Area *SWGR WEST*

Manufacturer, Model, Etc. (optional but recommended) *GE*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☐ N☒

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☐ N☐ U☐ N/A☒

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☐ N☐ U☐ N/A☒

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☐ N☐ U☐ N/A☒

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 024

Equipment ID No. *BUS-3* Equip. Class[1] *03*

Equipment Description *4KV – 4160V SWITCHGEAR BUS NO.3 1200AMP (SI)*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) Y☐ N☐ U☐ N/A☒

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 024

Equipment ID No. *BUS-3* Equip. Class[1] *03*

Equipment Description *4KV – 4160V SWITCHGEAR BUS NO.3 1200AMP (SI)*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Reference Documents:
A46/IPEEE - Screening Evaluation Work Sheet, SSEL Line No. 000096

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-09-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-09-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 024**

Equipment ID No. *BUS-3* Equip. Class[1] *03*

Equipment Description *4KV – 4160V SWITCHGEAR BUS NO.3 1200AMP (SI)*

Photographs

Note: *Bus - 3*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 024

Equipment ID No. *BUS-3* Equip. Class[1] *03*

Equipment Description *4KV – 4160V SWITCHGEAR BUS NO.3 1200AMP (SI)*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 025

Equipment ID No. *T-8-1A* Equip. Class[1] *04*

Equipment Description *STATION SERVICE TRANS 4160/480 BUS NO.8*

Location: Bldg. *CB* Floor El. *248'* Room, Area *SWGR WEST*

Manufacturer, Model, Etc. (optional but recommended) *ASEA BROWN BOVERI # PAL2721, 3 phase, type RSL*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 025

Equipment ID No. *T-8-1A* Equip. Class[1] *04*

Equipment Description *STATION SERVICE TRANS 4160/480 BUS NO.8*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) *See calculation VYC - 1046* Y☒ N☐ U☐ N/A☐

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 025

Equipment ID No. *T-8-1A* Equip. Class[1] *04*

Equipment Description *STATION SERVICE TRANS 4160/480 BUS NO.8*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Reference Documents:
A46/IPEEE - Screening Evaluation Work Sheet, SSEL Line No. 000101
Calculation VYC - 1046

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-09-2012*

Raymond Tworek Raymond G Tworek 10/18/12 *10-09-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

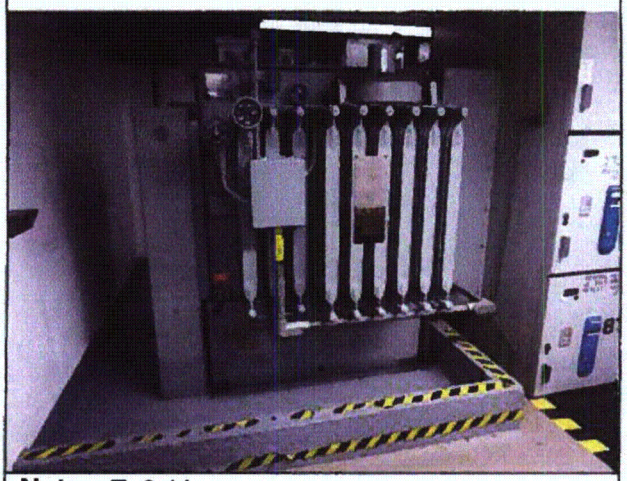
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 025**

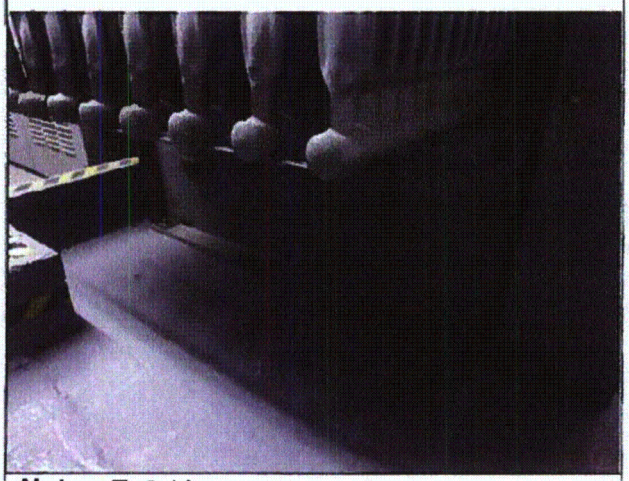
Equipment ID No. *T-8-1A* Equip. Class[1] *04*

Equipment Description *STATION SERVICE TRANS 4160/480 BUS NO.8*

Photographs



Note: *T- 8-1A*



Note: *T- 8-1A*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 025

Equipment ID No. *T-8-1A* Equip. Class[1] *04*

Equipment Description *STATION SERVICE TRANS 4160/480 BUS NO.8*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 026

Equipment ID No. *TK-4-1A* Equip. Class[1] *21*

Equipment Description *CONDENSATE STORAGE TANK*

Location: Bldg. *YARD* Floor El. *252'* Room, Area *OUTSIDE*

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☐ N☒

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐
   Entire tank covered with insulation. Anchorage is not visible. Cannot be determined that these are true but evidence of visual inspection around the tank and the nearby areas, indicates that anchorage is free of bent, broken, missing or loose hardware.

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐
   Same as above

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐
   No cracks in the concrete base.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 026

Equipment ID No. *TK-4-1A* Equip. Class[1] *21*

Equipment Description *CONDENSATE STORAGE TANK*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) Y☐ N☐ U☐ N/A☒

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐
   Entire tank covered with insulation. Anchorage is not visible. However, based on reviewing equipment documentation (see reference page 3) and seeing no modifications surrounding the anchorage, it is our engineering judgment through area walkdown and visual inspections that no adverse seismic condition exists.

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☐ N☐ U☐ N/A☒
   No soft target found.

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 026

Equipment ID No. *TK-4-1A* Equip. Class[1] *21*

Equipment Description *CONDENSATE STORAGE TANK*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐
No adverse condition around the tank.

Comments (Additional pages may be added as necessary)

Referenced Documents:
Drawings: G-191605,G-191603, G-191630, 5920-3589, 5920-3596, and 5920-3588
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 000103

Evaluated by: *Kirit Parikh* K Parikh 10/18/2012 Date: *10/02/2012*

Randy Stephens Randy Stephens 10/18/2012 *10/02/2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 026**

Equipment ID No. *TK-4-1A* Equip. Class[1] *21*

Equipment Description *CONDENSATE STORAGE TANK*

Photographs

Note: *Condensate Storage Tank – Anchorage covered by insulation. No visible cracks around the tank foundation*

Note: *TK-4-1A*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 026**

Equipment ID No. *TK-4-1A* Equip. Class[1] *21*

Equipment Description *CONDENSATE STORAGE TANK*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 027

Equipment ID No. *P-44-1A* Equip. Class[1] *0-5 HORIZONTAL PUMPS*

Equipment Description *HPCI/HPCI PUMP*

Location: Bldg. *RB* Floor El. *213'* Room, Area *HPCI*

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 027

Equipment ID No. *P-44-1A* Equip. Class[1] *0-5 HORIZONTAL PUMPS*

Equipment Description *HPCI/HPCI PUMP*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) Y☒ N☐ U☐ N/A☐
   See SSEL Line No. 000116 (and associated calculation) and drawing No. 5920-0622.

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 027**

Equipment ID No. *P-44-1A* Equip. Class[1] *0-5 HORIZONTAL PUMPS*

Equipment Description *HPCI/HPCI PUMP*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 000116
Drawing No. 5920-0622

Evaluated by: *Kirit Parikh* 10/18/2012 Date: *10/09/2012*

Randy Stephens 10/18/2012 *10/09/2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

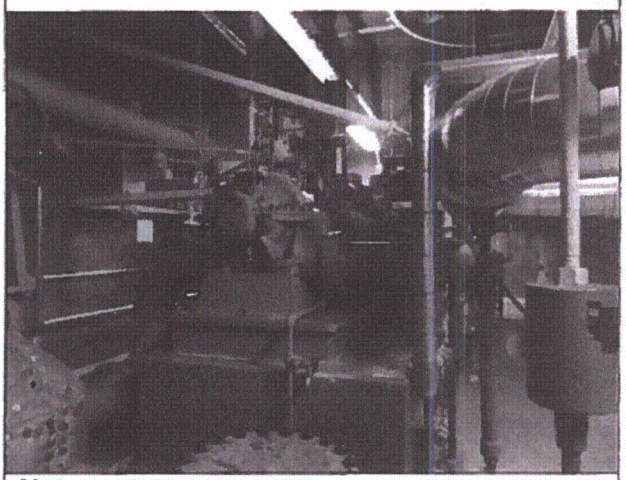
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 027

Equipment ID No. *P-44-1A* Equip. Class[1] *0-5 HORIZONTAL PUMPS*

Equipment Description *HPCI/HPCI PUMP*

Photographs



Note: *HPCI/HPCI PUMP # P-44-1A*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 027

Equipment ID No. *P-44-1A* Equip. Class[1] *0-5 HORIZONTAL PUMPS*

Equipment Description *HPCI/HPCI PUMP*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 028**

Equipment ID No. *PS-23-84-1* Equip. Class[1] *18- INSTRUMENTS ON THE RACK*

Equipment Description *HPCI/PUMPSUCTION PRESSURE SWITCH*

Location: Bldg. *RB* Floor El. *213'* Room, Area *HPCI*

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 028

Equipment ID No. *PS-23-84-1* Equip. Class[1] *18- INSTRUMENTS ON THE RACK*

Equipment Description *HPCI/PUMPSUCTION PRESSURE SWITCH*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) *See SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks* Y☒ N☐ U☐ N/A☐

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 028

Equipment ID No. *PS-23-84-1* Equip. Class[1] *18- INSTRUMENTS ON THE RACK*

Equipment Description *HPCI/PUMPSUCTION PRESSURE SWITCH*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 000125
SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks

Evaluated by: *Kirit Parikh* KParikh 10/18/2012 Date: *10/09/2012*

Randy Stephens Randy Stephens 10/18/2012 *10/09/2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

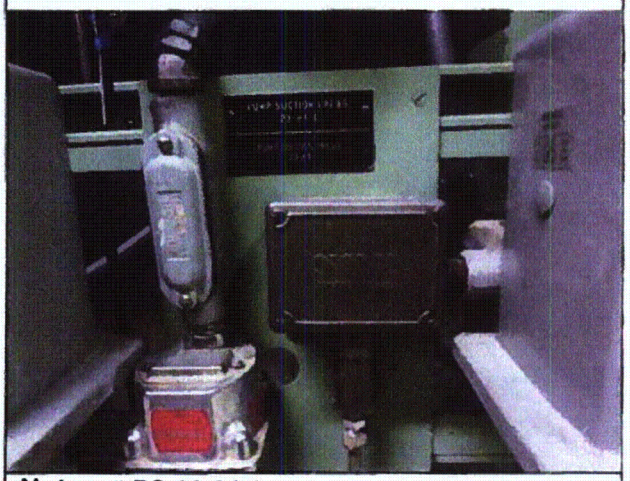
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 028**

Equipment ID No. *PS-23-84-1* Equip. Class[1] *18- INSTRUMENTS ON THE RACK*

Equipment Description *HPCI/PUMPSUCTION PRESSURE SWITCH*

Photographs



Note: *# PS-23-84-1*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 028

Equipment ID No. *PS-23-84-1* Equip. Class[1] *18- INSTRUMENTS ON THE RACK*

Equipment Description *HPCI/PUMPSUCTION PRESSURE SWITCH*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 031

Equipment ID No. *TEF-3* Equip. Class[1] *09*

Equipment Description *DG B ROOM VENTILATION/EXAUST FAN*

Location: Bldg. *TB* Floor El. *252'* Room, Area *EDGR B*

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐
   There is a hairline crack in the upper right hand corner. No seismic concern by engineering judgment.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 031

Equipment ID No. *TEF-3* Equip. Class[1] *09*

Equipment Description *DG B ROOM VENTILATION/EXAUST FAN*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) Y☒ N☐ U☐ N/A☐
   See *A46/IPEEE –Screening Evaluation Work Sheet, SSEL Line No. 000145*

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐
   Rule of the box used for motor.

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☐ N☐ U☐ N/A☒

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 031

Equipment ID No. *TEF-3* Equip. Class[1] *09*

Equipment Description *DG B ROOM VENTILATION/EXAUST FAN*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
Drawing 5920-4449
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 000145

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-03-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-03-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

Status: Y☒ N☐ U☐

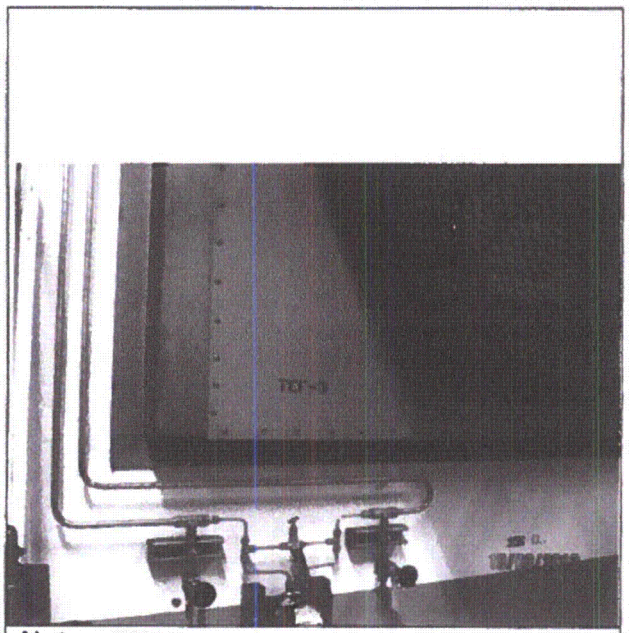
Seismic Walkdown Checklist (SWC) SWEL1- 031

Equipment ID No. *TEF-3* Equip. Class[1] *09*

Equipment Description *DG B ROOM VENTILATION/EXAUST FAN*

Photographs

Note: *TEF-3*



Note: *TEF-3*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 031**

Equipment ID No. *TEF-3* Equip. Class[1] *09*

Equipment Description *DG B ROOM VENTILATION/EXAUST FAN*

No Photo	No Photo
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 032

Equipment ID No. *RRU-8* Equip. Class[1] *10*

Equipment Description *SW/ECCS RM COOLING*

Location: Bldg. *RB* Floor El. *213'* Room, Area *SECR*

Manufacturer, Model, Etc. (optional but recommended) *HK PORTER-MARLO COIL WORKS, Model # 41-523-H*

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☐ N☒

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 032**

Equipment ID No. *RRU-8* Equip. Class[1] *10*

Equipment Description *SW/ECCS RM COOLING*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which an anchorage configuration verification is required.) Y☐ N☐ U☐ N/A☒

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 032

Equipment ID No. *RRU-8* Equip. Class[1] *10*

Equipment Description *SW/ECCS RM COOLING*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Reference Documents:
A46/IPEEE – SSEL Line No. 000164

Evaluated by: *Kirit Parikh* 10/18/2012 Date: *10/11/2012*

Randy Stephens 10/18/2012 *10/11/2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

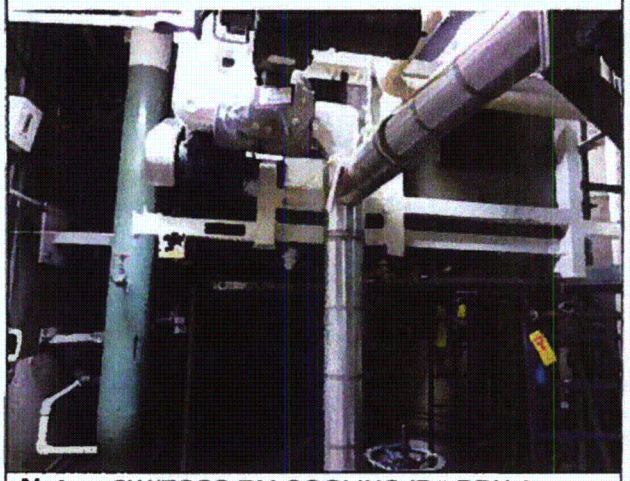
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 032**

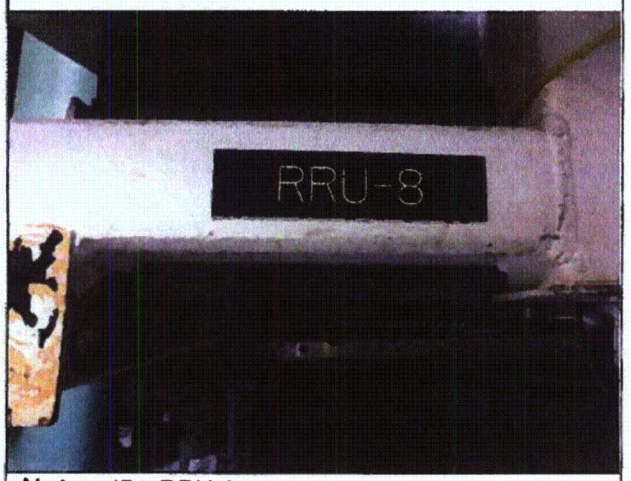
Equipment ID No. *RRU-8* Equip. Class[1] *10*

Equipment Description *SW/ECCS RM COOLING*

Photographs



Note: *SW/ECCS RM COOLING ID# RRU-8*



Note: *ID# RRU-8*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 032**

Equipment ID No. *RRU-8* Equip. Class[1] *10*

Equipment Description *SW/ECCS RM COOLING*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 033

Equipment ID No. *PT-2-3-52C* Equip. Class[1] *18*

Equipment Description *CS, RHR PERMISSIVE*

Location: Bldg. *RB* Floor El. *252'* Room, Area

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☐ N☐ U☐ N/A☒
   Equipment has a steel attachment.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 033

Equipment ID No. *PT-2-3-52C* Equip. Class[1] *18*

Equipment Description *CS, RHR PERMISSIVE*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which an anchorage configuration verification is required.) Y☒ N☐ U☐ N/A☐
   See SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks.

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 033

Equipment ID No. *PT-2-3-52C* Equip. Class[1] *18*

Equipment Description *CS, RHR PERMISSIVE*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Reference Documents:
Drawing 5920-6200, Rev. 0
A46/IPEEE - Screening Evaluation Work Sheet, SSEL Line No. 000174
SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks.

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-04-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-04-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

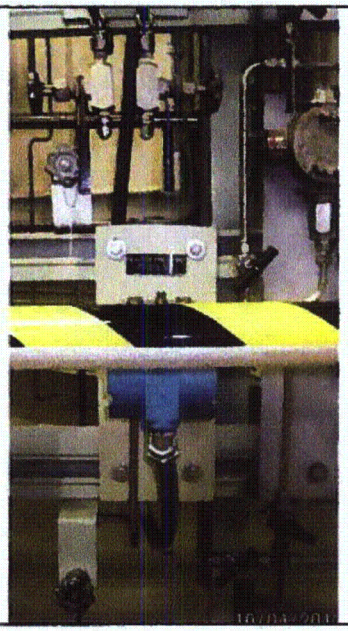
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 033**

Equipment ID No. *PT-2-3-52C* Equip. Class[1] *18*

Equipment Description *CS, RHR PERMISSIVE*

Photographs



Note: *PT-2-3-52C*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 033**

Equipment ID No. *PT-2-3-52C* Equip. Class[1] *18*

Equipment Description *CS, RHR PERMISSIVE*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 034

Equipment ID No. *LT-107-5A* Equip. Class[1] *18*

Equipment Description *CST/LEVEL TRANSMITTER*

Location: Bldg. *CST Valve* Floor El. *252'* Room, Area

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 034

Equipment ID No. *LT-107-5A* Equip. Class[1] *18*

Equipment Description *CST/LEVEL TRANSMITTER*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) Y☒ N☐ U☐ N/A☐
   See drawing 5920-6041

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 034

Equipment ID No. *LT-107-5A* Equip. Class[1] *18*

Equipment Description *CST/LEVEL TRANSMITTER*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
Drawings: 5920-6041
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 000176

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-02-2012*

Raymond Tworek 10/18/12 *10-02-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

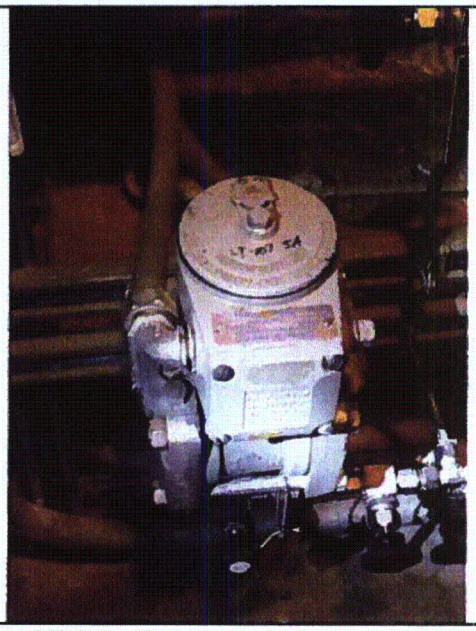
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 034**

Equipment ID No. *LT-107-5A* Equip. Class[1] *18*

Equipment Description *CST/LEVEL TRANSMITTER*

Photographs



Note: *LT-107-5A*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 034**

Equipment ID No. *LT-107-5A* Equip. Class[1] *18*

Equipment Description *CST/LEVEL TRANSMITTER*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 035

Equipment ID No. *LT-107-5B* Equip. Class[1] *18*

Equipment Description *CST/LEVEL TRANSMITTER*

Location: Bldg. *CST Valve* Floor El. *252'* Room, Area

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☒ N☐ U☐ N/A☐

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 035

Equipment ID No. *LT-107-5B* Equip. Class[1] *18*

Equipment Description *CST/LEVEL TRANSMITTER*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) Y☒ N☐ U☐ N/A☐
   See drawing 5920-6041

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 035

Equipment ID No. *LT-107-5B* Equip. Class[1] *18*

Equipment Description *CST/LEVEL TRANSMITTER*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
Drawings: 5920-6041
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 000177

Evaluated by: *Marcus Hecht-Nielsen* 10/15/2012 Date: *10-02-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-02-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

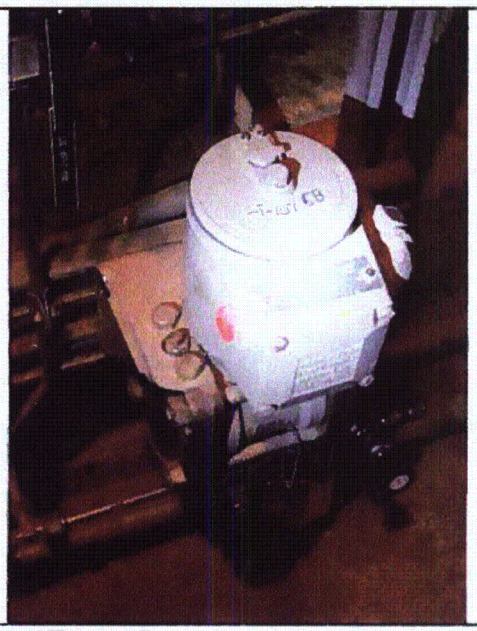
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 035**

Equipment ID No. *LT-107-5B* Equip. Class[1] *18*

Equipment Description *CST/LEVEL TRANSMITTER*

Photographs



Note: *LT-107-5B*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 035

Equipment ID No. *LT-107-5B* Equip. Class[1] *18*

Equipment Description *CST/LEVEL TRANSMITTER*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 036

Equipment ID No. *PT-10-101A* Equip. Class[1] *18*

Equipment Description *DW PRESSURE ECCS*

Location: Bldg. *RB* Floor El. *280'* Room, Area

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☐ N☐ U☐ N/A☒
   Attached to rack.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 036

Equipment ID No. *PT-10-101A* Equip. Class[1] *18*

Equipment Description *DW PRESSURE ECCS*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.)
   See SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks
   Y☒ N☐ U☐ N/A☐

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions?
   Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures?
   Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment?
   Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage?
   Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects?
    Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 036

Equipment ID No. *PT-10-101A* Equip. Class[1] *18*

Equipment Description *DW PRESSURE ECCS*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
Drawings: 5920-3016, 5920-3017, 5920-3018, and sketch no. SK-VY-94411-1
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 000178
SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks

Evaluated by: *Marcus Hecht-Nielsen* 10/15/2012 Date: *10-09-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-09-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

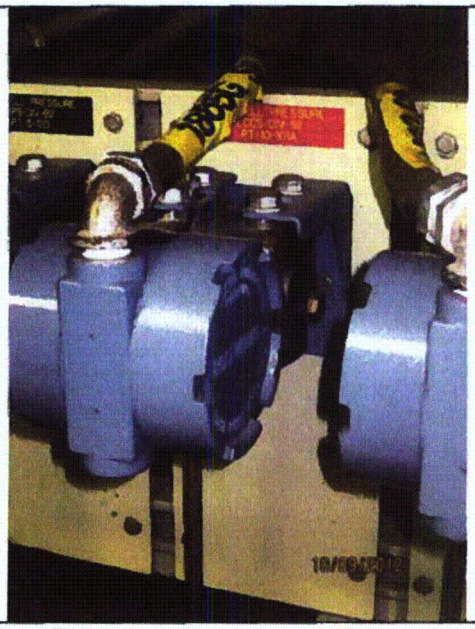
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 036**

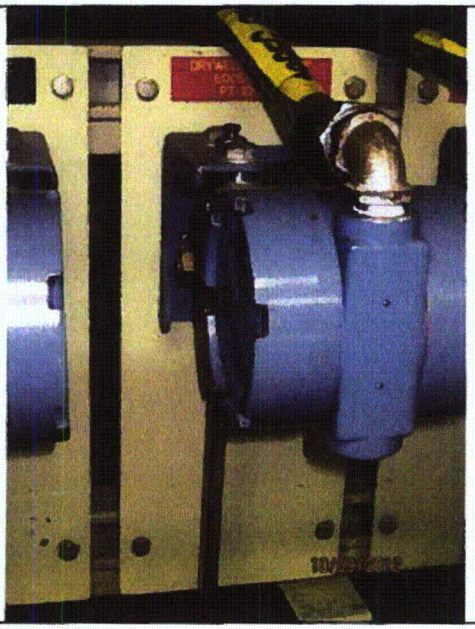
Equipment ID No. *PT-10-101A* Equip. Class[1] *18*

Equipment Description *DW PRESSURE ECCS*

Photographs



Note: *PT-10-101A*



Note: *PT-10-101A*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 036

Equipment ID No. *PT-10-101A* Equip. Class[1] *18*

Equipment Description *DW PRESSURE ECCS*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 037

Equipment ID No. *PT-10-101C* Equip. Class[1] *18*

Equipment Description *DW PRESSURE ECCS*

Location: Bldg. *RB* Floor El. *280'* Room, Area

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☐ N☐ U☐ N/A☒
   Attached to rack.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 037

Equipment ID No. *PT-10-101C* Equip. Class[1] *18*

Equipment Description *DW PRESSURE ECCS*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) *See SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks*	Y☒ N☐ U☐ N/A☐
6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions?	Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures?	Y☒ N☐ U☐ N/A☐
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment?	Y☒ N☐ U☐ N/A☐
9. Do attached lines have adequate flexibility to avoid damage?	Y☒ N☐ U☐ N/A☐
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects?	Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 037

Equipment ID No. *PT-10-101C* Equip. Class[1] *18*

Equipment Description *DW PRESSURE ECCS*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
Drawings: 5920-3016, 5920-3017, 5920-3018, and sketch no. SK-VY-94411-1
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 000180
SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-09-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-09-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

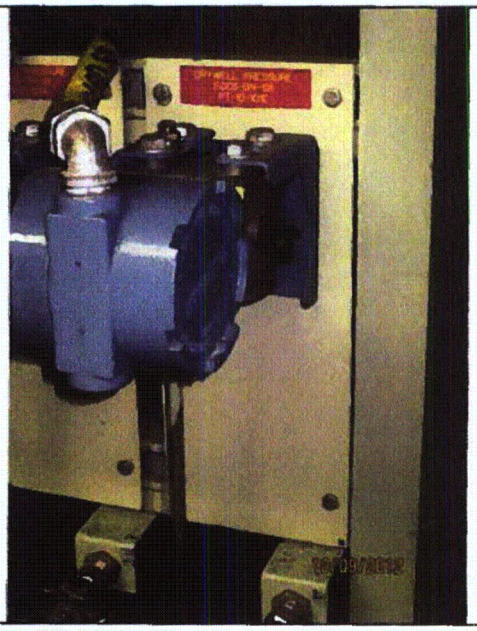
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 037**

Equipment ID No. *PT-10-101C* Equip. Class[1] *18*

Equipment Description *DW PRESSURE ECCS*

Photographs



Note: *PT-10-101C*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 037**

Equipment ID No. *PT-10-101C* Equip. Class[1] *18*

Equipment Description *DW PRESSURE ECCS*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 038

Equipment ID No. *PT-16-19-29A* Equip. Class[1] *18*

Equipment Description *DW PRESSURE INDICATION*

Location: Bldg. *RB* Floor El. *280'* Room, Area

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☐ N☐ U☐ N/A☒
   Attached to rack.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 038

Equipment ID No. *PT-16-19-29A* Equip. Class[1] *18*

Equipment Description *DW PRESSURE INDICATION*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) *See SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks*	Y☒ N☐ U☐ N/A☐
6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions?	Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures?	Y☒ N☐ U☐ N/A☐
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment?	Y☒ N☐ U☐ N/A☐
9. Do attached lines have adequate flexibility to avoid damage?	Y☒ N☐ U☐ N/A☐
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects?	Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 038

Equipment ID No. *PT-16-19-29A* Equip. Class[1] *18*

Equipment Description *DW PRESSURE INDICATION*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
Drawings: 5920-3016, 5920-3017, 5920-3018, and sketch no. SK-VY-94411-1
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 000182
SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks

Evaluated by: *Marcus Hecht-Nielsen* 10/18/12 Date: *10-09-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-09-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

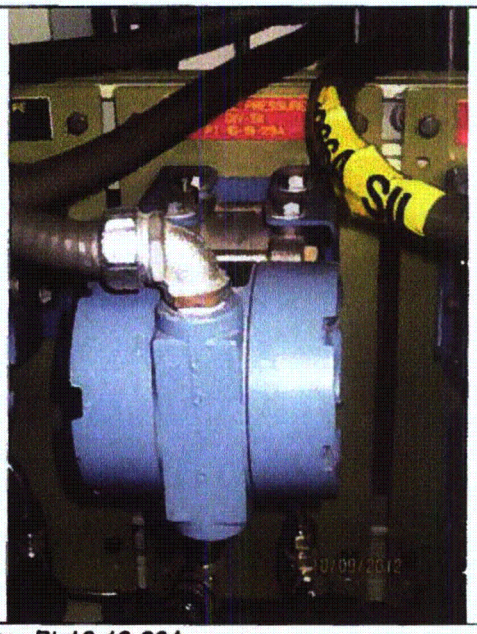
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 038**

Equipment ID No. *PT-16-19-29A* Equip. Class[1] *18*

Equipment Description *DW PRESSURE INDICATION*

Photographs



Note: *Pt-16-19-29A*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 038

Equipment ID No. *PT-16-19-29A* Equip. Class[1] *18*

Equipment Description *DW PRESSURE INDICATION*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 039

Equipment ID No. *PT-5-12C* Equip. Class[1] *18*

Equipment Description *DW PRESSURE SCRAM*

Location: Bldg. *RB* Floor El. *280'* Room, Area

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☐ N☐ U☐ N/A☒
   Attached to rack.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 039

Equipment ID No. *PT-5-12C* Equip. Class[1] *18*

Equipment Description *DW PRESSURE SCRAM*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.)
   See SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks
   Y☒ N☐ U☐ N/A☐

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions?
   Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures?
   Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment?
   Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage?
   Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects?
    Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 039

Equipment ID No. *PT-5-12C* Equip. Class[1] *18*

Equipment Description *DW PRESSURE SCRAM*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
Drawings: 5920-3016, 5920-3017, 5920-3018, and sketch no. SK-VY-94411-1
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 000186
SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-09-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-09-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

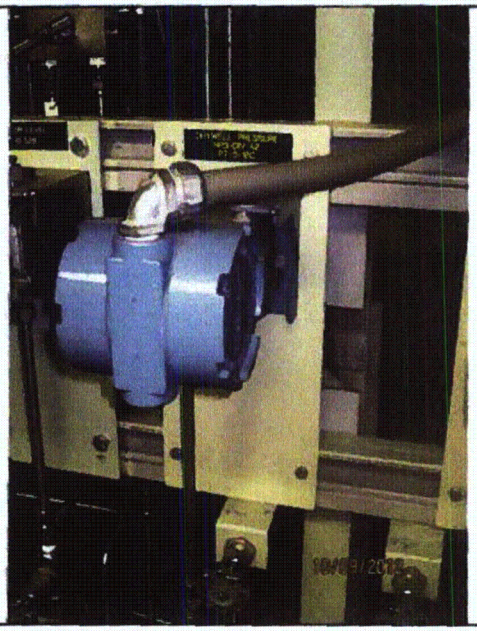
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 039**

Equipment ID No. *PT-5-12C* Equip. Class[1] *18*

Equipment Description *DW PRESSURE SCRAM*

Photographs



Note: *PT-5-12C*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 039

Equipment ID No. *PT-5-12C* Equip. Class[1] *18*

Equipment Description *DW PRESSURE SCRAM*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 040

Equipment ID No. *PT-5-12D* Equip. Class[1] *18*

Equipment Description *DW PRESSURE SCRAM*

Location: Bldg. *RB* Floor El. *280'* Room, Area

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☐ N☐ U☐ N/A☒
   Attached to rack.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 040

Equipment ID No. *PT-5-12D* Equip. Class[1] *18*

Equipment Description *DW PRESSURE SCRAM*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) *See SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks* — Y☒ N☐ U☐ N/A☐

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? — Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? — Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? — Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? — Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? — Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 040

Equipment ID No. *PT-5-12D* Equip. Class[1] *18*

Equipment Description *DW PRESSURE SCRAM*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
Drawings: 5920-3016, 5920-3017, 5920-3018, and sketch no. SK-VY-94411-1
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 000187
SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks

Evaluated by: *Marcus Hecht-Nielsen* 10/15/2012 Date: *10-09-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-09-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

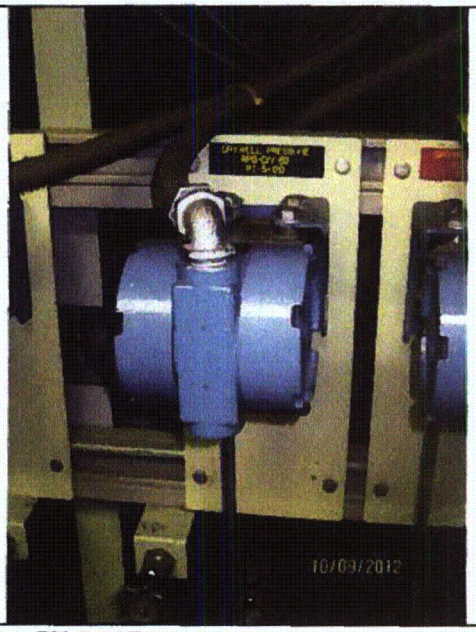
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 040**

Equipment ID No. *PT-5-12D* Equip. Class[1] *18*

Equipment Description *DW PRESSURE SCRAM*

Photographs



Note: *PT-5-12D*

NO PHOTO

Note:

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 040

Equipment ID No. *PT-5-12D* Equip. Class[1] *18*

Equipment Description *DW PRESSURE SCRAM*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 042

Equipment ID No. *LT-2-3-72A* Equip. Class[1] *18*

Equipment Description *RV LEVEL FOR RHR, DG, HPCI, PCIC, ADS, CS*

Location: Bldg. *RB* Floor El. *280'* Room, Area

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐
   Two alignment screws have no nuts attached, however, all other screws are secure. No seismic issue by engineering judgment.

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☐ N☐ U☐ N/A☒
   Attached to rack.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 042**

Equipment ID No. *LT-2-3-72A* Equip. Class[1] *18*

Equipment Description *RV LEVEL FOR RHR, DG, HPCI, PCIC, ADS, CS*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) *See SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks*	Y☒ N☐ U☐ N/A☐
6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions?	Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures?	Y☒ N☐ U☐ N/A☐
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment?	Y☒ N☐ U☐ N/A☐
9. Do attached lines have adequate flexibility to avoid damage?	Y☒ N☐ U☐ N/A☐
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects?	Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 042**

Equipment ID No. *LT-2-3-72A* Equip. Class[1] *18*

Equipment Description *RV LEVEL FOR RHR, DG, HPCI, PCIC, ADS, CS*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
Drawings: 5920-3016, 5920-3017, 5920-3018, and sketch no. SK-VY-94411-1
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 000203
SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-09-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-09-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

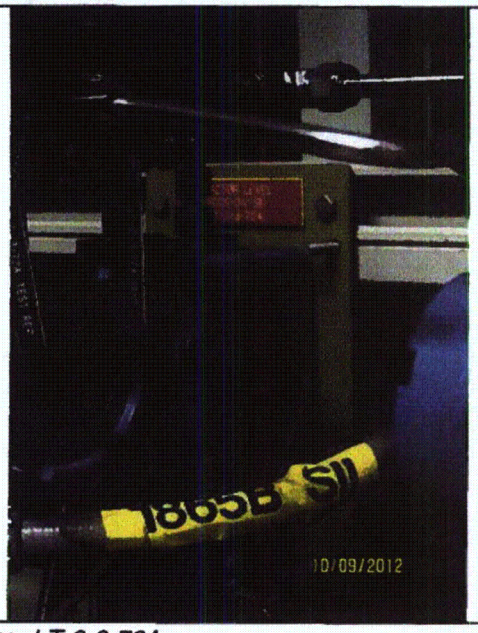
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 042**

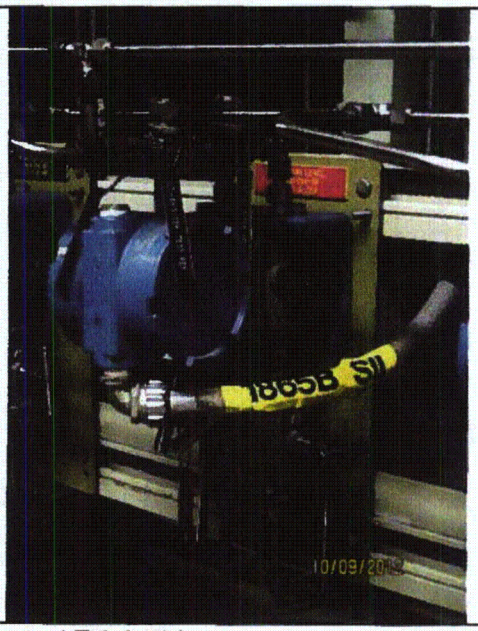
Equipment ID No. *LT-2-3-72A* Equip. Class[1] *18*

Equipment Description *RV LEVEL FOR RHR, DG, HPCI, PCIC, ADS, CS*

Photographs



Note: *LT-2-3-72A*



Note: : *LT-2-3-72A*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 042

Equipment ID No. *LT-2-3-72A* Equip. Class[1] *18*

Equipment Description *RV LEVEL FOR RHR, DG, HPCI, PCIC, ADS, CS*

NO PHOTO	NO PHOTO
Note:	**Note:**

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 1 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 043

Equipment ID No. *LT-2-3-72C* Equip. Class[1] *18*

Equipment Description *RV LEVEL FOR RHR, DG, HPCI, PCIC, ADS, CS*

Location: Bldg. *RB* Floor El. *280'* Room, Area

Manufacturer, Model, Etc. (optional but recommended)

Instructions for Completing Checklist

This checklist may be used to document the results of the Seismic Walkdown of an item of equipment on the SWEL. The space below each of the following questions may be used to record the results of judgments and findings. Additional space is provided at the end of this checklist for documenting other comments.

Anchorage

1. Is the anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Y☒ N☐

2. Is the anchorage free of bent, broken, missing or loose hardware? Y☒ N☐ U☐ N/A☐

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Y☒ N☐ U☐ N/A☐

4. Is the anchorage free of visible cracks in the concrete near the anchors? Y☐ N☐ U☐ N/A☒
   Attached to rack.

[1] Enter the equipment class name from EPRI 1025286, Appendix B: Classes of Equipment.

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 2 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 043

Equipment ID No. *LT-2-3-72C* Equip. Class[1] *18*

Equipment Description *RV LEVEL FOR RHR, DG, HPCI, PCIC, ADS, CS*

5. Is the anchorage configuration consistent with plant documentation? (Note: This question only applies if the item is one of the 50% for which anchorage configuration verification is required.) *See SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks* Y☒ N☐ U☐ N/A☐

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Y☒ N☐ U☐

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Y☒ N☐ U☐ N/A☐

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Y☒ N☐ U☐ N/A☐

9. Do attached lines have adequate flexibility to avoid damage? Y☒ N☐ U☐ N/A☐

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Y☒ N☐ U☐

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 3 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) SWEL1- 043

Equipment ID No. *LT-2-3-72C* Equip. Class[1] *18*

Equipment Description *RV LEVEL FOR RHR, DG, HPCI, PCIC, ADS, CS*

Other Adverse Conditions

11. Have you looked for and found no other seismic conditions that could adversely affect the safety functions of the equipment? Y☒ N☐ U☐

Comments (Additional pages may be added as necessary)

Referenced Documents:
Drawings: 5920-3016, 5920-3017, 5920-3018, and sketch no. SK-VY-94411-1
A46/IPEEE – Screening Evaluation Work Sheet, SSEL Line No. 000205
SQUG, November 9-13, 1992, Section VB7, Equipment Category 7 Instruments on Racks

Evaluated by: *Marcus Hecht-Nielsen* 10/18/2012 Date: *10-09-2012*

Raymond Tworek Raymond F Tworek 10/18/12 *10-09-2012*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 4 of 5

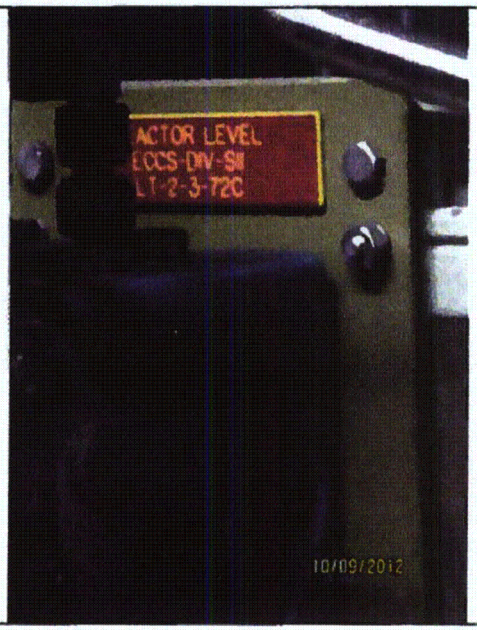
Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 043**

Equipment ID No. *LT-2-3-72C* Equip. Class[1] *18*

Equipment Description *RV LEVEL FOR RHR, DG, HPCI, PCIC, ADS, CS*

Photographs



Note: *LT-2-3-72C*

Note: *LT-2-3-72C*

ATTACHMENT 9.6 **SEISMIC WALKDOWN CHECKLIST FORM**

Sheet 5 of 5

Status: Y☒ N☐ U☐

Seismic Walkdown Checklist (SWC) **SWEL1- 043**

Equipment ID No. *LT-2-3-72C* Equip. Class[1] *18*

Equipment Description *RV LEVEL FOR RHR, DG, HPCI, PCIC, ADS, CS*

NO PHOTO	NO PHOTO
Note:	**Note:**