

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

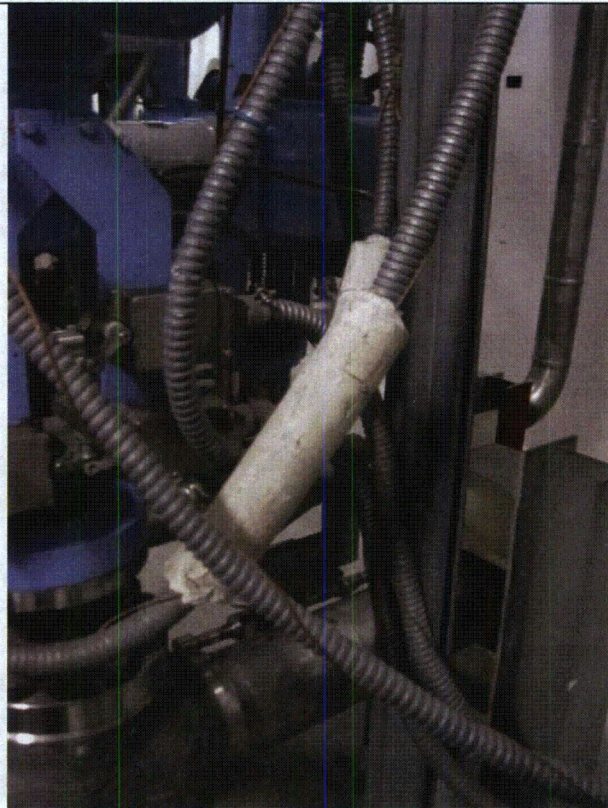
Equipment ID No.: LFFV0096

Equipment Class: (7) Fluid-Operated Valves

Equipment Description: CTMT NOR SUMPS TO FLR DRN TK OUTSIDE CTMT ISO



LFFV0096 9-19 196



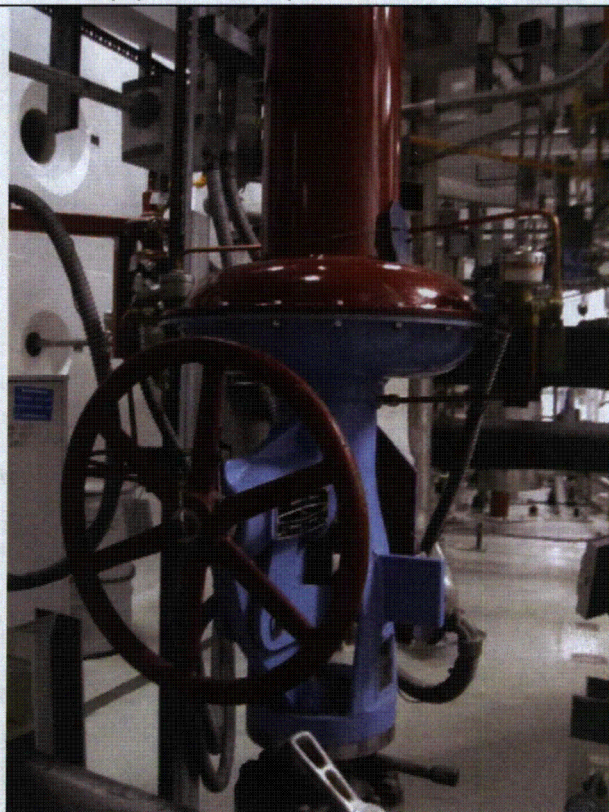
LFFV0096 9-19 198

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: LFFV0096

Equipment Class: (7) Fluid-Operated Valves

Equipment Description: CTMT NOR SUMPS TO FLR DRN TK OUTSIDE CTMT ISO



LFFV0096 9-19 199



LFFV0096 9-19 200

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NE002

Equipment Class: (17) Engine-Generators

Equipment Description: STANDBY #2

Project: WCNOC SWEL

Location (Bldg, Elev, Room/Area): DGB, 2000.00 ft, 5201

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Yes

2. Is the anchorage free of bent, broken, missing or loose hardware? Yes
Item shares common skid with KKJ01B.

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes

4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes

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.) Yes
Item shares common skid with KKJ01B. Refer to Note 5 for KKJ01B. No hazard.

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NE002

Equipment Class: (17) Engine-Generators

Equipment Description: STANDBY #2

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Yes

Noted ruggedly-supported crane overhead with hoist chains tied off. Fall protection yo-yos above also well-secured. No hazards.

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes

See Note 7 above. No hazards.

9. Do attached lines have adequate flexibility to avoid damage? Yes

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Yes

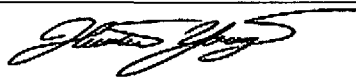
Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

Noted minor surface oxidation on heat exchanger bolts, but no indication of strength loss. Therefore no seismic concern.

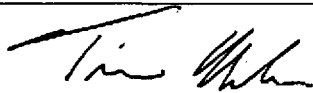
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

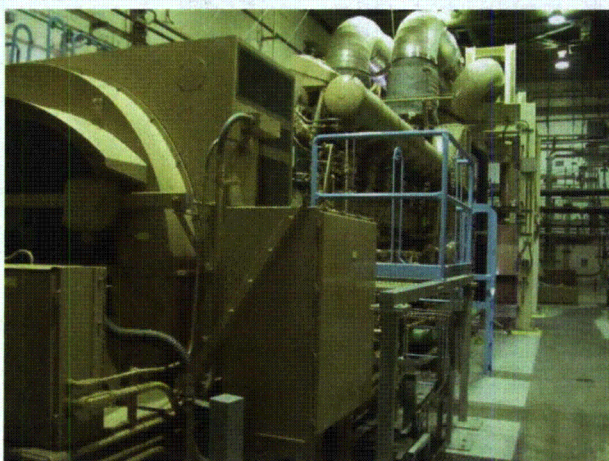
11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

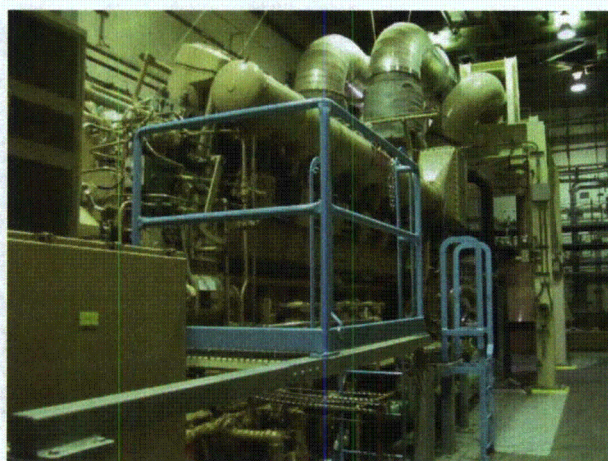
Equipment ID No.: NE002

Equipment Class: (17) Engine-Generators

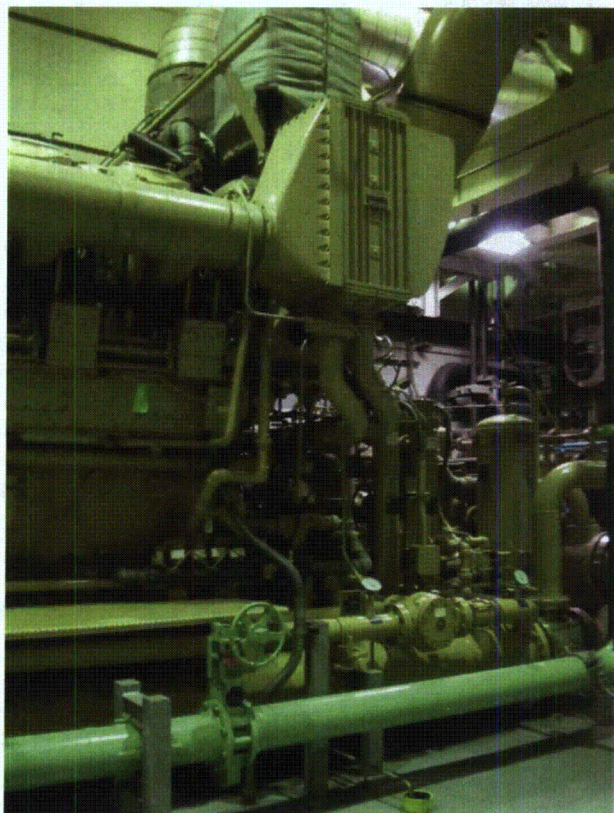
Equipment Description: STANDBY #2

Photos

NE002 9-17 001



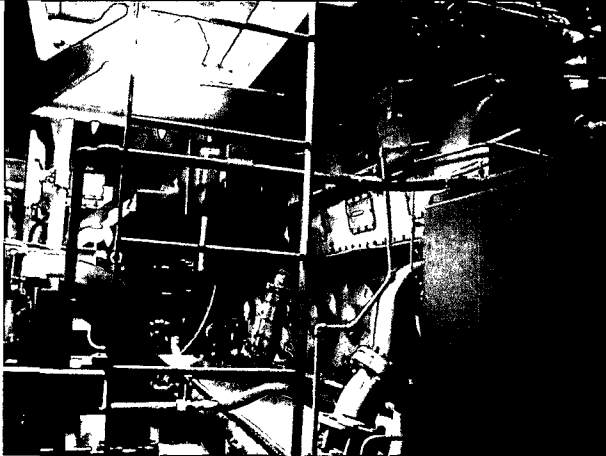
NE002 9-17 002



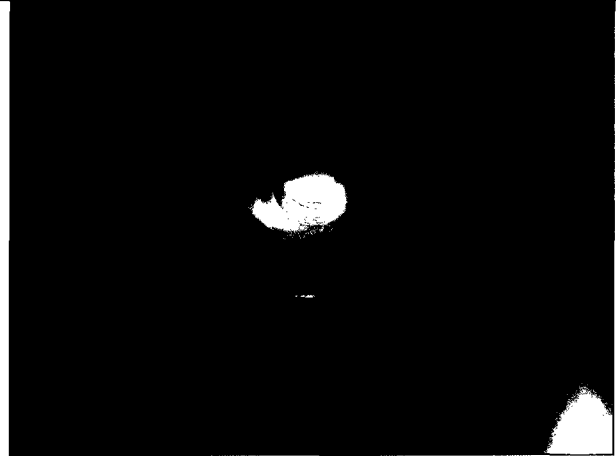
NE002 9-17 003



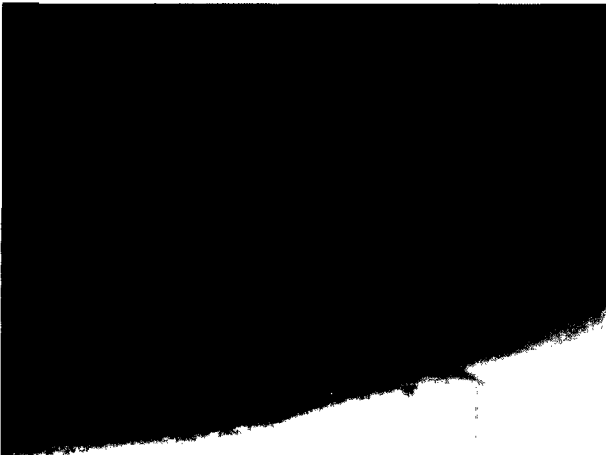
NE002 9-17 004

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**Equipment ID No.: NE002Equipment Class: (17) Engine-GeneratorsEquipment Description: STANDBY #2

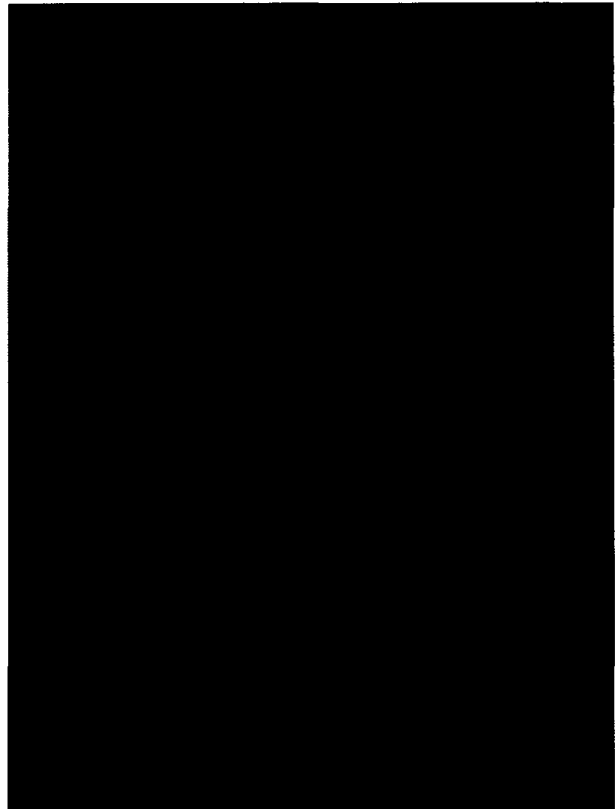
NE002 9-17 005



NE002 9-17 006



NE002 9-17 007



NE002 9-17 008

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NE002

Equipment Class: (17) Engine-Generators

Equipment Description: STANDBY #2



NE002 9-17 009

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NF039B

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: CONT SHED/SEQ CH 4 LOGIC

Project: WCNO SWEL

Location (Bldg, Elev, Room/Area): CTRL, 2047.50 ft, 3605

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? No
2. Is the anchorage free of bent, broken, missing or loose hardware? Yes
3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes
4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes
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.) Not Applicable
6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NF039B

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: CONT SHED/SEQ CH 4 LOGIC

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Yes

Adjacent cabinets are flush. Concern regarding potential sensitive equipment changing state due to chatter. Check that cabinets are attached.

Licensing Basis Evaluation: SWT review of WCNOG Calculation XX-FH-009-002 confirms that cabinet NF039B and adjacent cabinets NF039A and NF039C have been analyzed for proximity concerns with adjacent cabinets and are therefore acceptable.

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes

9. Do attached lines have adequate flexibility to avoid damage? Yes

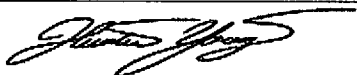
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Yes

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

Comments

Evaluated by:



Hunter Young

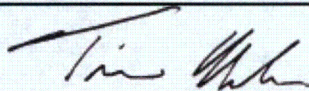
Date: 11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NF039B

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: CONT SHED/SEQ CH 4 LOGIC

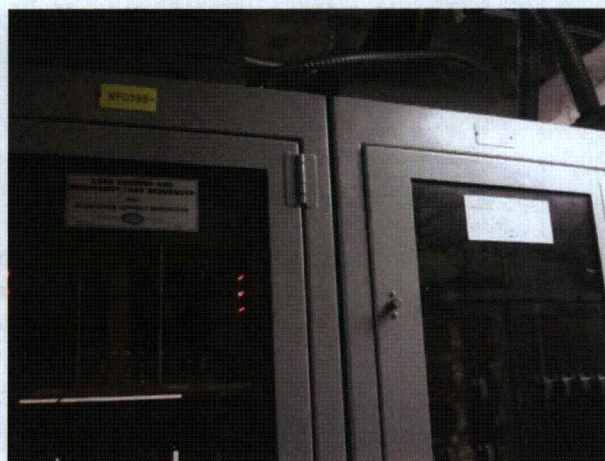


Timothy Nealon

11-15-12

Photos

NF039B 9-18 136



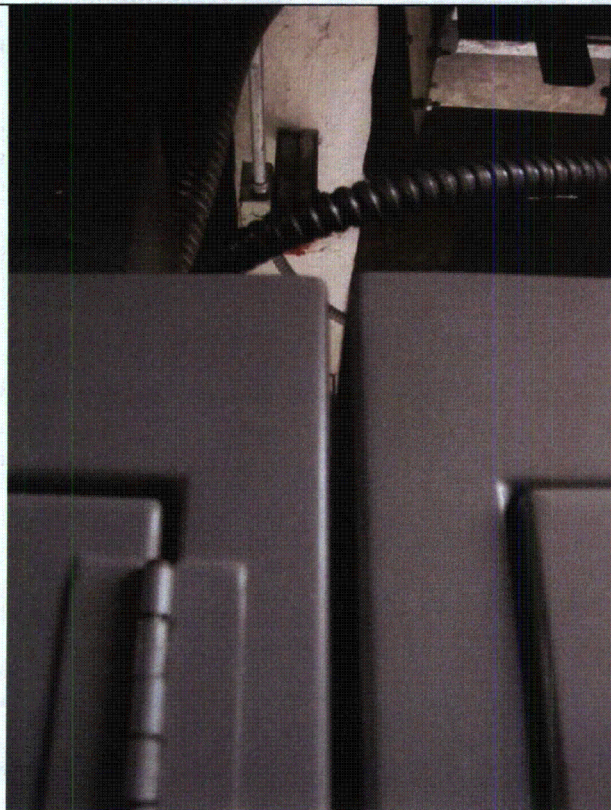
NF039B 9-18 137

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NF039B

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: CONT SHED/SEQ CH 4 LOGIC



NF039B 9-18 138



NF039B 9-18 139

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NF039B

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: CONT SHED/SEQ CH 4 LOGIC



NF039B 9-18 140



NF039B 9-18 141

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NF039B

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: CONT SHED/SEQ CH 4 LOGIC



NF039B 9-18 142

Status: Y N ☒ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NG002B

Equipment Class: (1) Motor Control Centers

Equipment Description: 480 VAC MOTOR CONTROL CENTER

Project: WCNO SWEL

Location (Bldg, Elev, Room/Area): AUX, 2026.00 ft, 1409

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? No
2. Is the anchorage free of bent, broken, missing or loose hardware? Yes
3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes
4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes
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.) Not Applicable
6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: Y N ☒ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NG002B

Equipment Class: (1) Motor Control Centers

Equipment Description: 480 VAC MOTOR CONTROL CENTER

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Yes

Approximately 3/4" of an inch between top drip shield and P1001 unistrut support on SE corner. From close inspection drip shield edge would pass between P1001 channel flanges, so actual N-S clearance is greater than 2". No spatial interaction concern.

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes

Heavy cable tray observed above but ruggedly supported by P1001 members. No hazard.

9. Do attached lines have adequate flexibility to avoid damage? Yes

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Yes

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Unknown

Cabinet internals could not be accessed during at-power walkdowns. Internals will be inspected during next bus outage.

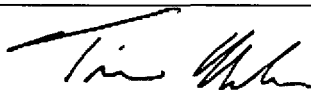
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

11-15-12

Status: Y N ☒ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NG002B

Equipment Class: (1) Motor Control Centers

Equipment Description: 480 VAC MOTOR CONTROL CENTER

Photos

NG002B 9-20 072



NG002B 9-20 073

Status: Y N ☒ U**Seismic Walkdown Checklist (SWC)**

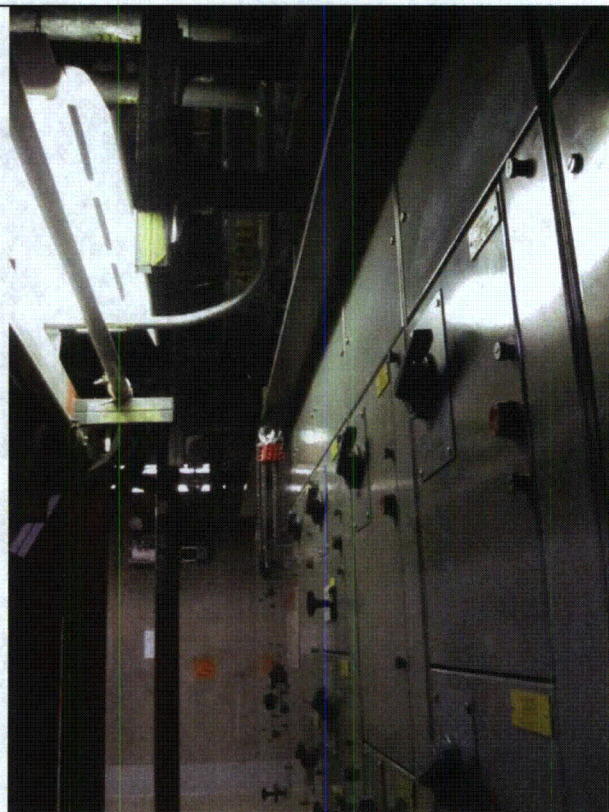
Equipment ID No.: NG002B

Equipment Class: (1) Motor Control Centers

Equipment Description: 480 VAC MOTOR CONTROL CENTER



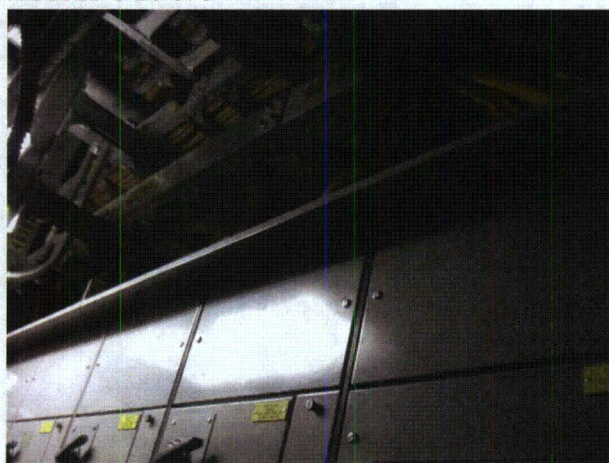
NG002B 9-20 074



NG002B 9-20 075



NG002B 9-20 076



NG002B 9-20 077

Status: Y N ☒ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NG002B

Equipment Class: (1) Motor Control Centers

Equipment Description: 480 VAC MOTOR CONTROL CENTER



NG002B 9-20 078



NG002B 9-20 079



NG002B 9-20 080

Status: Y N ☒ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NG004C

Equipment Class: (1) Motor Control Centers

Equipment Description: 480 VAC

Project: WCNOC SWEL

Location (Bldg, Elev, Room/Area): AUX, 2047.50 ft, 1501

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? | No |
| 2. Is the anchorage free of bent, broken, missing or loose hardware? | Yes |
| 3. Is the anchorage free of corrosion that is more than mild surface oxidation? | Yes |
| 4. Is the anchorage free of visible cracks in the concrete near the anchors? | Yes |
| 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.) | Not Applicable |
| 6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? | Yes |

Status: Y N ☒ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NG004C

Equipment Class: (1) Motor Control Centers

Equipment Description: 480 VAC

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Yes

Observed 1-7/8" clearance from back of MCC (drip shield) to concrete wall. There is concern that the MCC could close the gap in SSE event and cause equipment to malfunction. Verification needed to ensure gap is sufficient given MCC flexibility (gap oriented in weak direction) and high elevation of the Aux Building (2047.5').

Licensing Basis Evaluation: Using a conservative lower bound frequency estimate of 5 Hz, a modal shape factor of 1.6 for cantilever action, and taking the peak spectral acceleration of approx. 1g at the 2047.5 ft. elevation for 3% damping (conservative), the upper-bound displacement is 6.3 in ($= 1.6 \cdot 386.4 \text{ in/s}^2 \cdot 1g / (2 \cdot \pi \cdot 5 \text{ Hz})^2$). Therefore, a 1-7/8" gap is acceptable.

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes

9. Do attached lines have adequate flexibility to avoid damage? Yes

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Yes

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Unknown

Cabinet internals could not be accessed during at-power walkdowns. Internals will be inspected during next bus outage.

Comments

Status: Y N ☒ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NG004C

Equipment Class: (1) Motor Control Centers

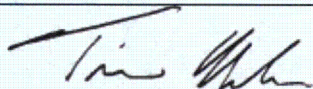
Equipment Description: 480 VAC

Evaluated by:



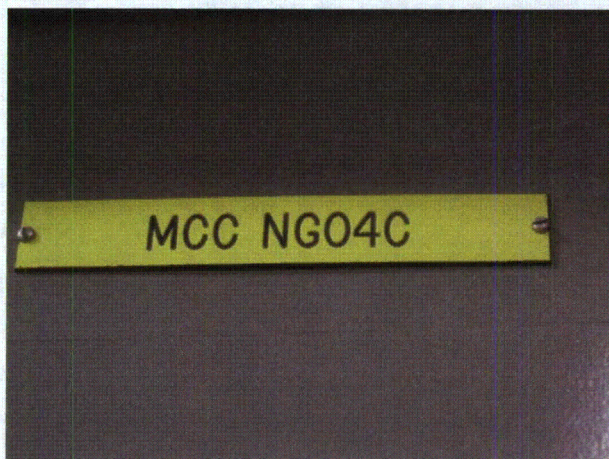
Hunter Young

Date: 11-15-12



Timothy Nealon

11-15-12

Photos

NG004C 9-19 419



NG004C 9-19 420

Status: Y N ☒ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NG004C

Equipment Class: (1) Motor Control Centers

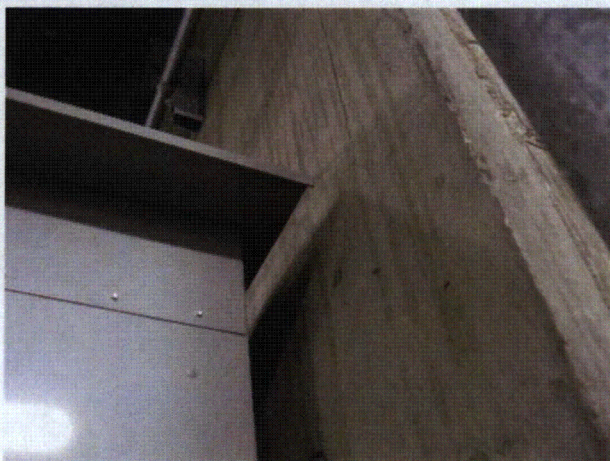
Equipment Description: 480 VAC



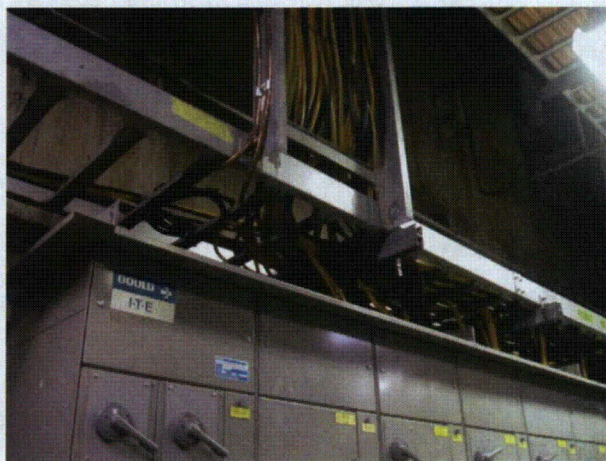
NG004C 9-19 421



NG004C 9-19 422



NG004C 9-19 423



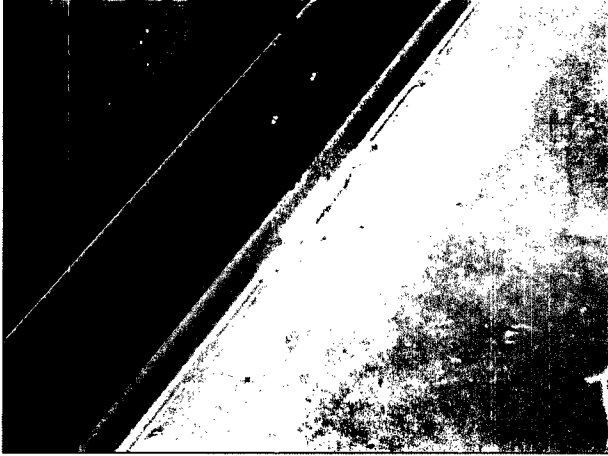
NG004C 9-19 424

Status: Y N ☒ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NG004C

Equipment Class: (1) Motor Control Centers

Equipment Description: 480 VAC



NG004C 9-19 425

Status: Y N ☒ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NG006E

Equipment Class: (1) Motor Control Centers

Equipment Description: 480 VAC

Project: WCNO SWEL

Location (Bldg, Elev, Room/Area): ESW, 2000.00 ft, UNK

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? | No |
| 2. Is the anchorage free of bent, broken, missing or loose hardware? | Yes |
| 3. Is the anchorage free of corrosion that is more than mild surface oxidation? | Yes |
| 4. Is the anchorage free of visible cracks in the concrete near the anchors? | Yes |
| 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.) | Not Applicable |
| 6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? | Yes |

Status: Y N ☒ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NG006E

Equipment Class: (1) Motor Control Centers

Equipment Description: 480 VAC

Interaction Effects

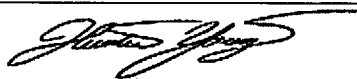
7. Are soft targets free from impact by nearby equipment or structures? Yes
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes
9. Do attached lines have adequate flexibility to avoid damage? Yes
10. Based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

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Unknown
- Cabinet internals could not be accessed during at-power walkdowns.*
Internals will be inspected during next bus outage.

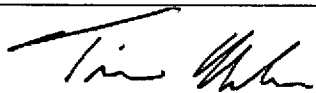
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

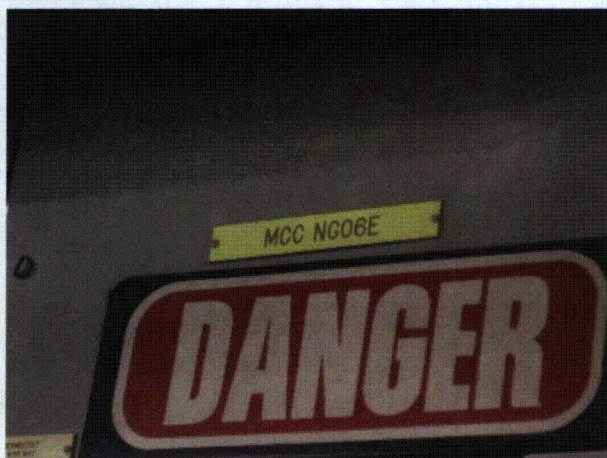
11-15-12

Status: Y N ☒ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NG006E

Equipment Class: (1) Motor Control Centers

Equipment Description: 480 VAC

Photos

NG006E 9-17 151



NG006E 9-17 152



NG006E 9-17 153



NG006E 9-17 154

Status: Y N ☒ U**Seismic Walkdown Checklist (SWC)**

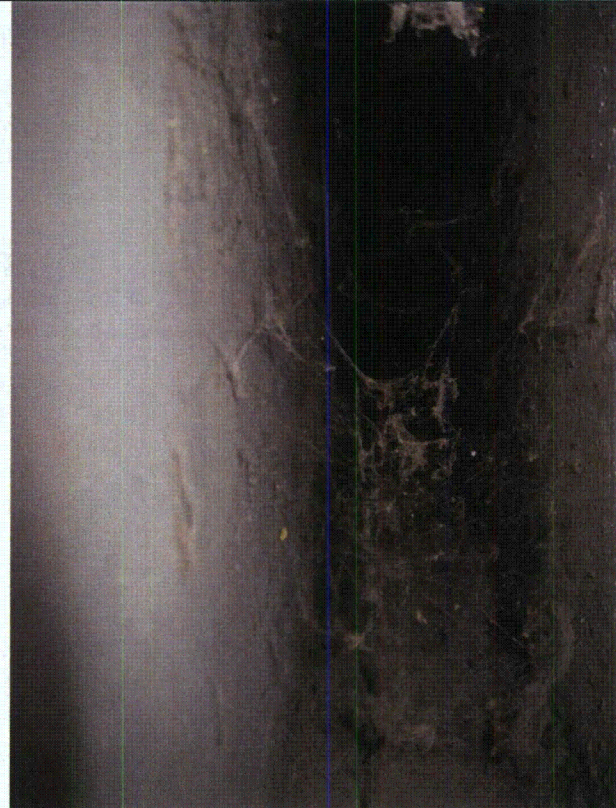
Equipment ID No.: NG006E

Equipment Class: (1) Motor Control Centers

Equipment Description: 480 VAC



NG006E 9-17 155



NG006E 9-17 157



NG006E 9-17 159

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NK012

Equipment Class: (15) Batteries on Racks

Equipment Description: 125-VDC NO.2 60-CELL BATTERY

Project: WCNOG SWEL

Location (Bldg, Elev, Room/Area): CTRL, 2016.00 ft, 3411

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)?
<i>Component has identical anchorage as NK014 (RM 3405).</i> | Yes |
| 2. | Is the anchorage free of bent, broken, missing or loose hardware? | Yes |
| 3. | Is the anchorage free of corrosion that is more than mild surface oxidation? | Yes |
| 4. | Is the anchorage free of visible cracks in the concrete near the anchors? | Yes |
| 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.) | Yes |
| 6. | Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? | Yes |

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NK012

Equipment Class: (15) Batteries on Racks

Equipment Description: 125-VDC NO.2 60-CELL BATTERY

Interaction Effects

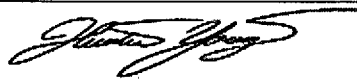
7. Are soft targets free from impact by nearby equipment or structures? Yes
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes
9. Do attached lines have adequate flexibility to avoid damage? Yes
10. Based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

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

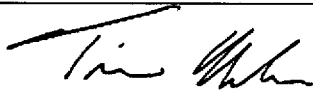
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NK012

Equipment Class: (15) Batteries on Racks

Equipment Description: 125-VDC NO.2 60-CELL BATTERY

Photos

NK012 9-18 101



NK012 9-18 102

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

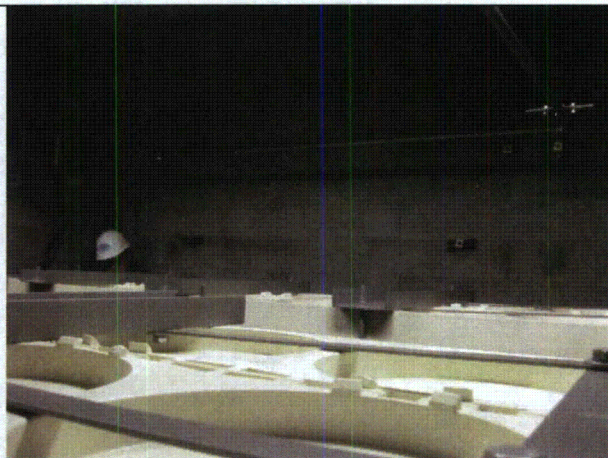
Equipment ID No.: NK012

Equipment Class: (15) Batteries on Racks

Equipment Description: 125-VDC NO.2 60-CELL BATTERY



NK012 9-18 103



NK012 9-18 105



NK012 9-18 106



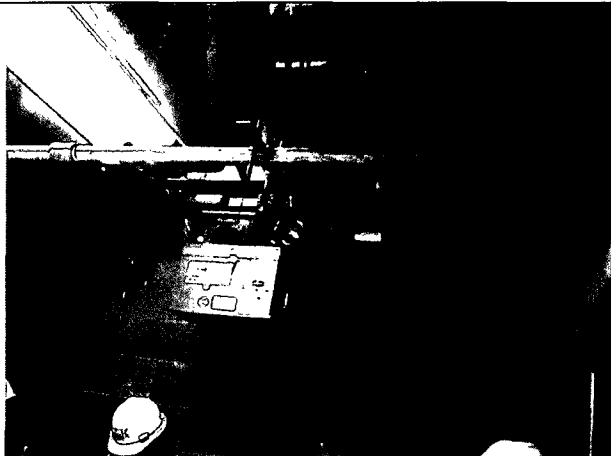
NK012 9-18 107

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NK012

Equipment Class: (15) Batteries on Racks

Equipment Description: 125-VDC NO.2 60-CELL BATTERY



NK012 9-18 108

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NK014

Equipment Class: (15) Batteries on Racks

Equipment Description: 125-VDC NO.4 60-CELL BATTERY

Project: WCNOG SWEL

Location (Bldg, Elev, Room/Area): CTRL, 2016.00 ft, 3405

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Yes
2. Is the anchorage free of bent, broken, missing or loose hardware? Yes
3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes
4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes
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.) Yes
6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NK014

Equipment Class: (15) Batteries on Racks

Equipment Description: 125-VDC NO.4 60-CELL BATTERY

Interaction Effects

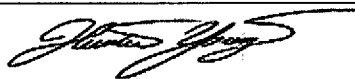
7. Are soft targets free from impact by nearby equipment or structures? Yes
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes
Rod-hung piping overhead is noted; however piping is low mass with ductile connections. Therefore, there is no seismic hazard.
9. Do attached lines have adequate flexibility to avoid damage? Yes
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Yes

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

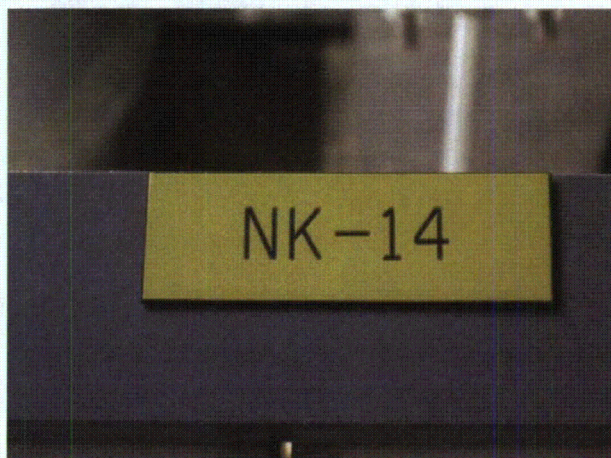
11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NK014

Equipment Class: (15) Batteries on Racks

Equipment Description: 125-VDC NO.4 60-CELL BATTERY

Photos

NK014 9-18 096



NK014 9-18 097

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: NK014

Equipment Class: (15) Batteries on Racks

Equipment Description: 125-VDC NO.4 60-CELL BATTERY



NK014 9-18 098



NK014 9-18 099



NK014 9-18 100

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PAL01B

Equipment Class: (5) Horizontal Pumps

Equipment Description: AUX FEEDWATER PUMP

Project: WCNO SWEL

Location (Bldg, Elev, Room/Area): AUX, 2000.00 ft, 1325

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Yes

2. Is the anchorage free of bent, broken, missing or loose hardware? Yes

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes

4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes

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.) Yes

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PAL01B

Equipment Class: (5) Horizontal Pumps

Equipment Description: AUX FEEDWATER PUMP

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Yes

W site glass is in zone of influence of hoist rig. However rig cannot uplift from rail and is no hazard. Also chains are tied off. No adverse seismic concerns.

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes

9. Do attached lines have adequate flexibility to avoid damage? Yes

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Yes

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

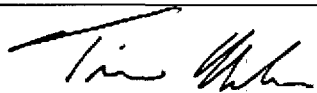
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

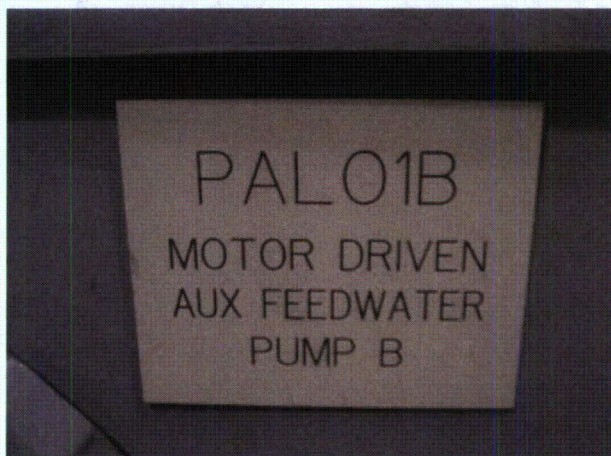
11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PAL01B

Equipment Class: (5) Horizontal Pumps

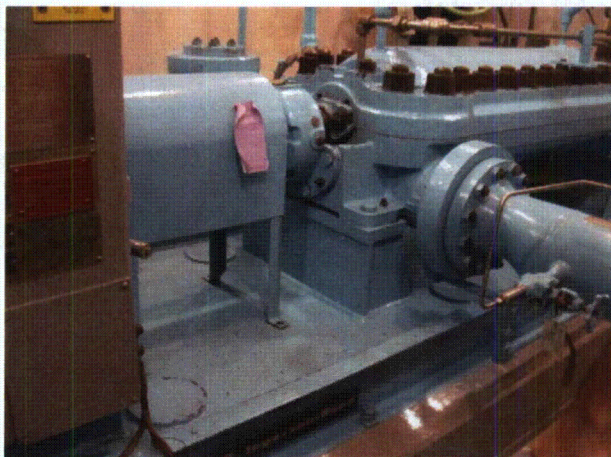
Equipment Description: AUX FEEDWATER PUMP

Photos

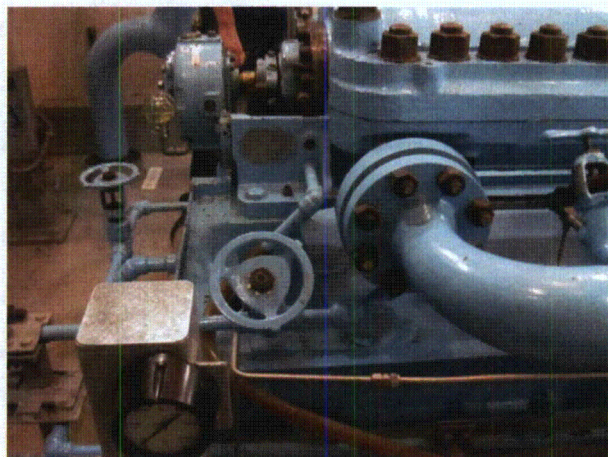
PAL01B 9-19 298



PAL01B 9-19 299



PAL01B 9-19 300



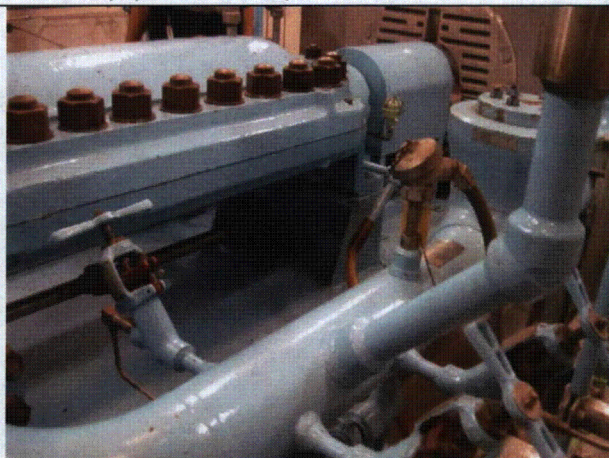
PAL01B 9-19 301

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PAL01B

Equipment Class: (5) Horizontal Pumps

Equipment Description: AUX FEEDWATER PUMP



PAL01B 9-19 302



PAL01B 9-19 303

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PAL01B

Equipment Class: (5) Horizontal Pumps

Equipment Description: AUX FEEDWATER PUMP



PAL01B 9-19 304



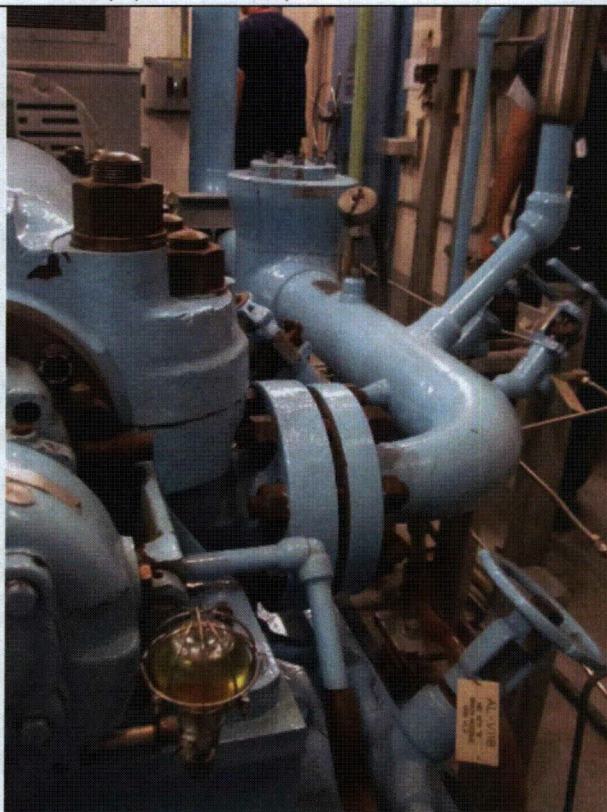
PAL01B 9-19 305

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

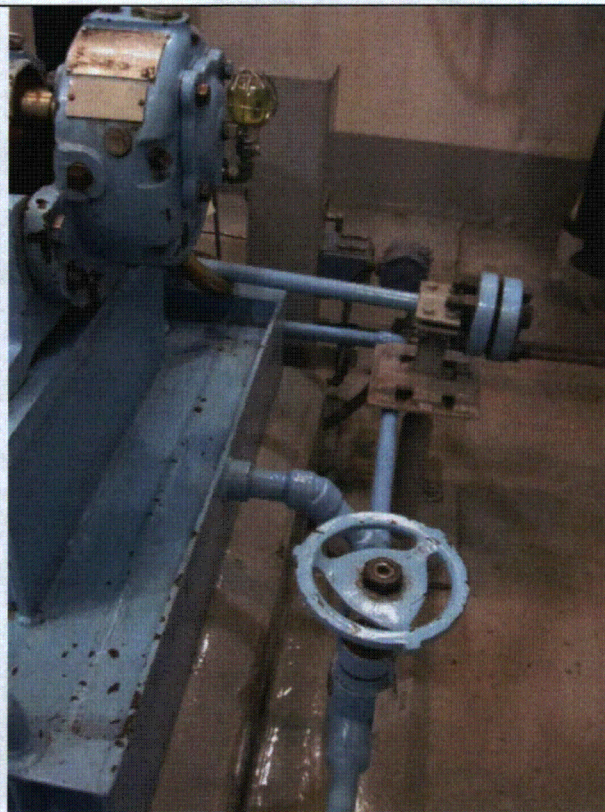
Equipment ID No.: PAL01B

Equipment Class: (5) Horizontal Pumps

Equipment Description: AUX FEEDWATER PUMP



PAL01B 9-19 306



PAL01B 9-19 307



PAL01B 9-19 308

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PAL02

Equipment Class: (5) Horizontal Pumps

Equipment Description: AFW PUMP--TURBINE DRIVEN

Project: WCNOG SWEL

Location (Bldg, Elev, Room/Area): AUX, 2000.00 ft, 1331

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Yes

2. Is the anchorage free of bent, broken, missing or loose hardware? Yes

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes
Minor surface oxidation noted but no indication of strength loss. Therefore no hazard.

4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes

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.) Yes

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PAL02

Equipment Class: (5) Horizontal Pumps

Equipment Description: AFW PUMP--TURBINE DRIVEN

Interaction Effects

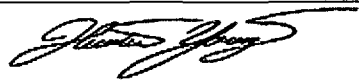
7. Are soft targets free from impact by nearby equipment or structures? Yes
Hoist overhead well-supported with rig away from equipment and chains tied off. No hazard.
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes
9. Do attached lines have adequate flexibility to avoid damage? Yes
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Yes

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes
Noted leveling bolts missing on N end. Large anchors are adjacent at 4 corners; therefore no adverse seismic condition. WCNOG is checking on bolt.

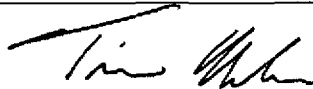
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

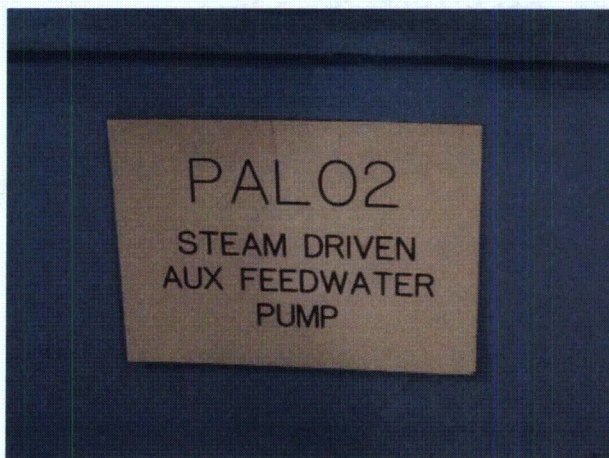
11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

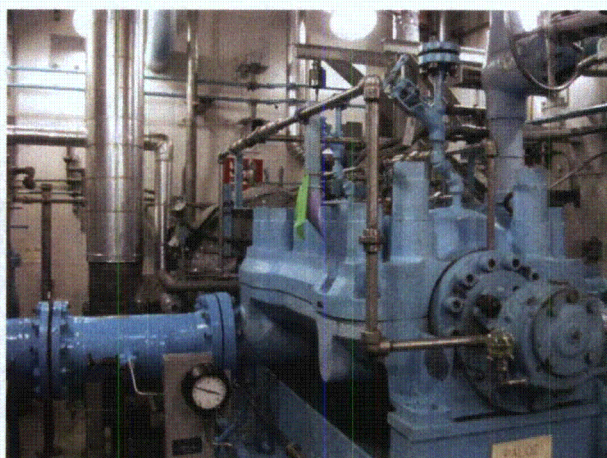
Equipment ID No.: PAL02

Equipment Class: (5) Horizontal Pumps

Equipment Description: AFW PUMP--TURBINE DRIVEN

Photos

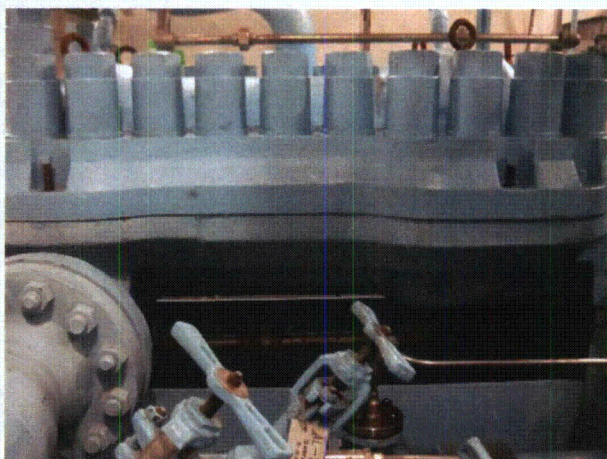
PAL02 9-19 253



PAL02 9-19 254



PAL02 9-19 255



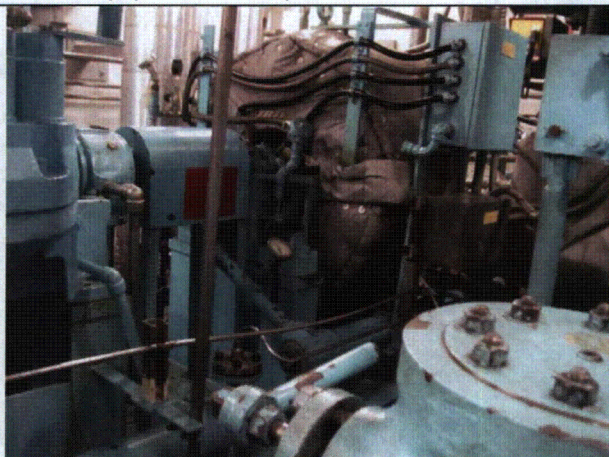
PAL02 9-19 256

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

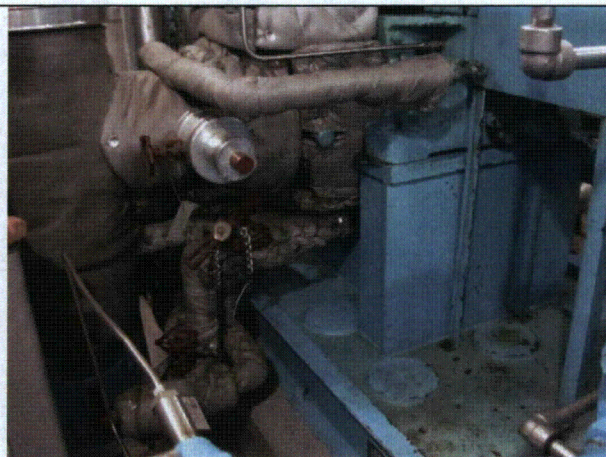
Equipment ID No.: PAL02

Equipment Class: (5) Horizontal Pumps

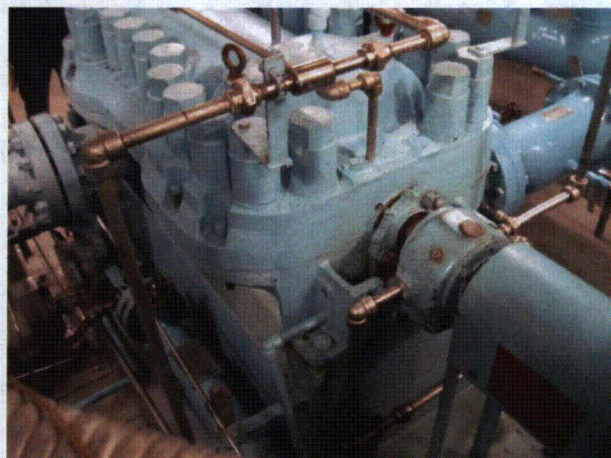
Equipment Description: AFW PUMP--TURBINE DRIVEN



PAL02 9-19 257



PAL02 9-19 259



PAL02 9-19 260



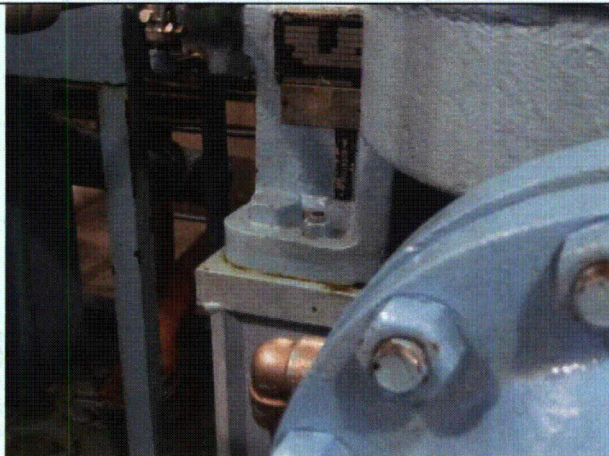
PAL02 9-19 261

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

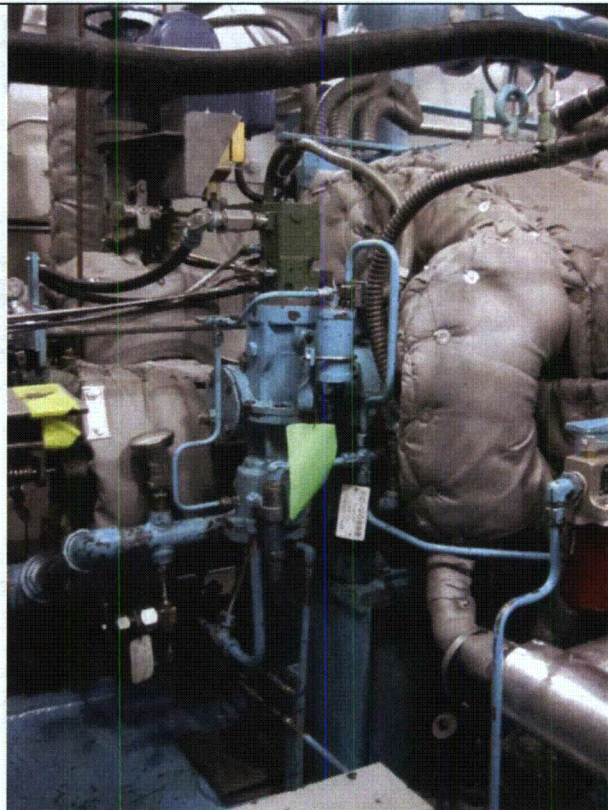
Equipment ID No.: PAL02

Equipment Class: (5) Horizontal Pumps

Equipment Description: AFW PUMP--TURBINE DRIVEN



PAL02 9-19 262



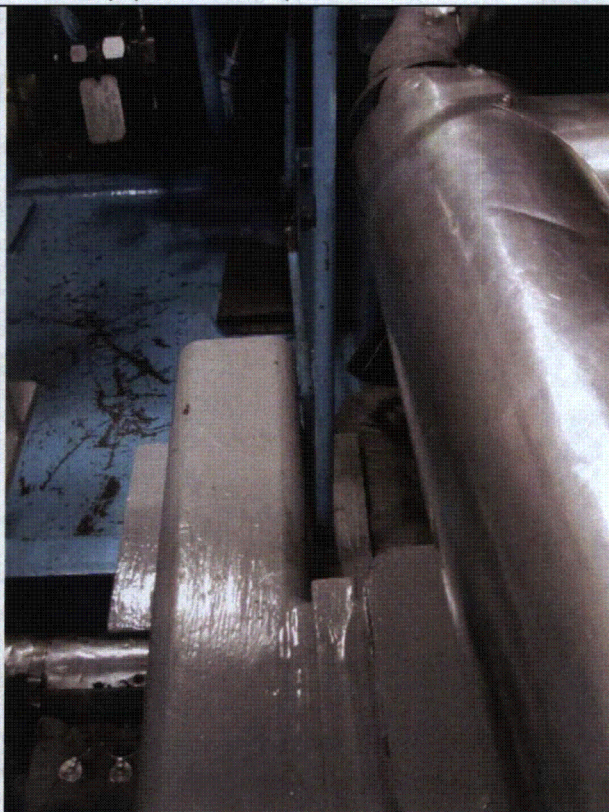
PAL02 9-19 263

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PAL02

Equipment Class: (5) Horizontal Pumps

Equipment Description: AFW PUMP--TURBINE DRIVEN



PAL02 9-19 264



PAL02 9-19 265

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PBG02B

Equipment Class: (5) Horizontal Pumps

Equipment Description: BORIC ACID TRANSFER PUMP MOTOR

Project: WCNO SWEL

Location (Bldg, Elev, Room/Area): AUX, 1974.00 ft, 1116

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Yes

2. Is the anchorage free of bent, broken, missing or loose hardware? Yes

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes

4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes
Minor grout cracks noted but no concrete cracks in pump pedestal. No adverse concern.

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.) Yes

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PBG02B

Equipment Class: (5) Horizontal Pumps

Equipment Description: BORIC ACID TRANSFER PUMP MOTOR

Interaction Effects

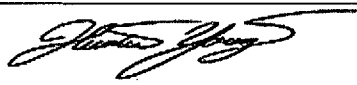
7. Are soft targets free from impact by nearby equipment or structures? Yes
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes
9. Do attached lines have adequate flexibility to avoid damage? Yes
10. Based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

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

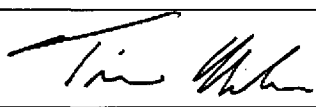
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

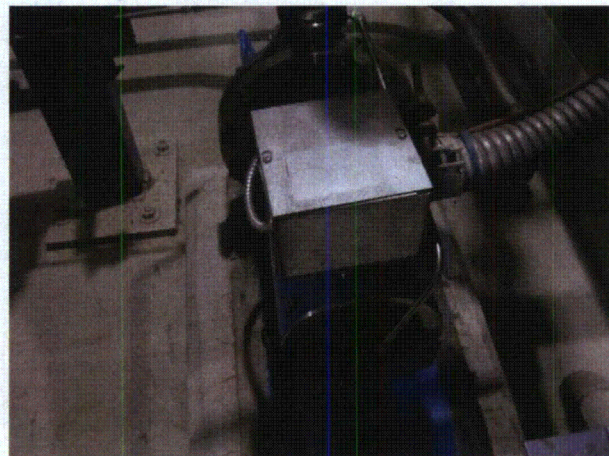
Equipment ID No.: PBG02B

Equipment Class: (5) Horizontal Pumps

Equipment Description: BORIC ACID TRANSFER PUMP MOTOR

Photos

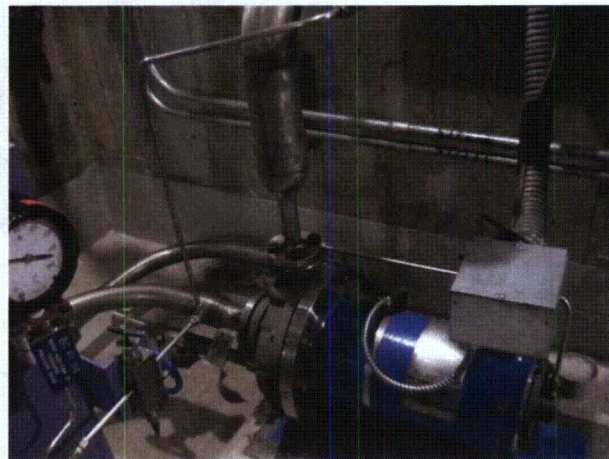
PBG02B 9-19 084



PBG02B 9-19 085



PBG02B 9-19 086



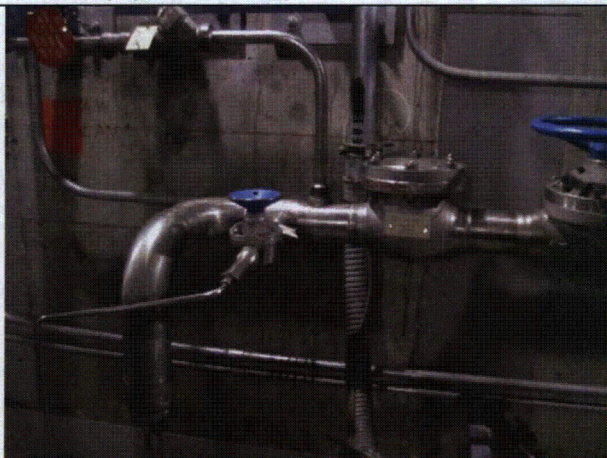
PBG02B 9-19 087

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PBG02B

Equipment Class: (5) Horizontal Pumps

Equipment Description: BORIC ACID TRANSFER PUMP MOTOR



PBG02B 9-19 088



PBG02B 9-19 089

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PBG04

Equipment Class: (5) Horizontal Pumps

Equipment Description: NORMAL CHARGING PUMP

Project: WCNO SWEL

Location (Bldg, Elev, Room/Area): AUX, 1974.00 ft, 1115

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? No

2. Is the anchorage free of bent, broken, missing or loose hardware? Yes

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes

4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes
Minor grout cracks noted. No adverse concern.

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.) Not Applicable

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PBG04

Equipment Class: (5) Horizontal Pumps

Equipment Description: NORMAL CHARGING PUMP

Interaction Effects

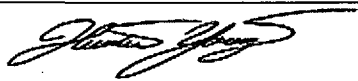
7. Are soft targets free from impact by nearby equipment or structures? Yes
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes
Overhead hoist well-supported with rig parked away from pump. No hazard.
9. Do attached lines have adequate flexibility to avoid damage? Yes
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Yes

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

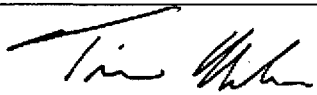
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

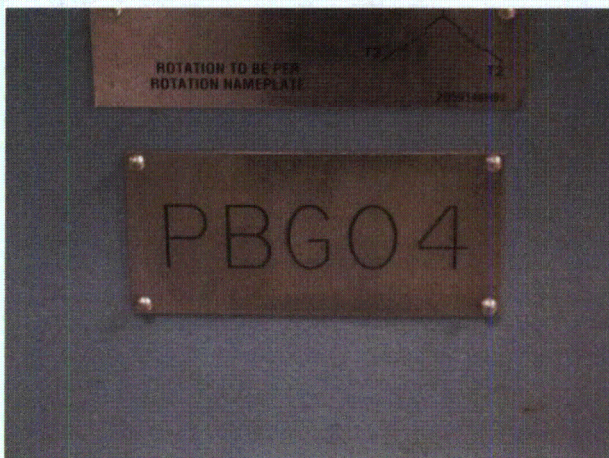
11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PBG04

Equipment Class: (5) Horizontal Pumps

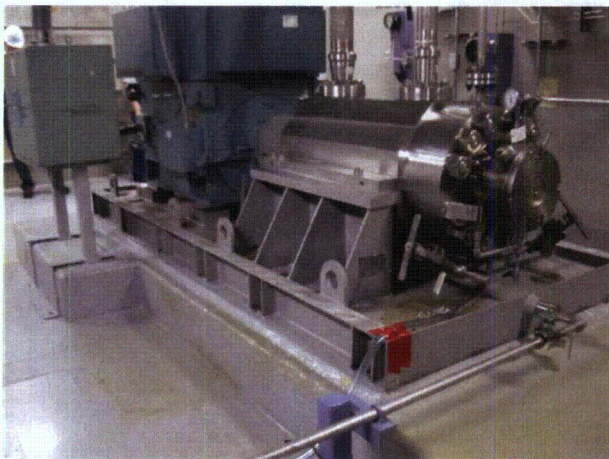
Equipment Description: NORMAL CHARGING PUMP

Photos

PBG04 9-19 061



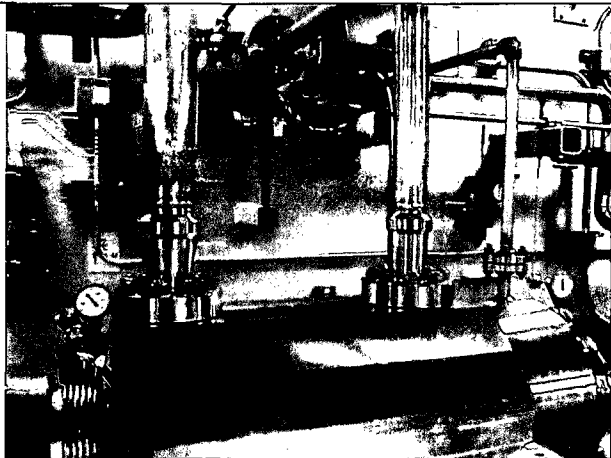
PBG04 9-19 062



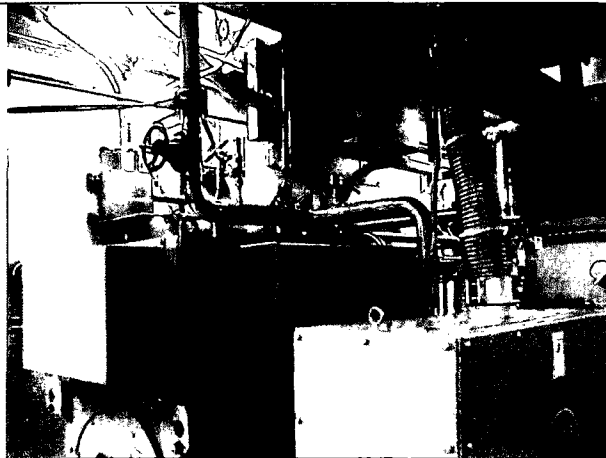
PBG04 9-19 063



PBG04 9-19 064

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**Equipment ID No.: PBG04Equipment Class: (5) Horizontal PumpsEquipment Description: NORMAL CHARGING PUMP

PBG04 9-19 065



PBG04 9-19 066



PBG04 9-19 067



PBG04 9-19 068

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PBG05B

Equipment Class: (5) Horizontal Pumps

Equipment Description: CENTRIFUGAL CHARGING PUMP

Project: WCNO SWEL

Location (Bldg, Elev, Room/Area): AUX, 1974.00 ft, 1107

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Yes

2. Is the anchorage free of bent, broken, missing or loose hardware? Yes

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes

4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes

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.) Yes

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PBG05B

Equipment Class: (5) Horizontal Pumps

Equipment Description: CENTRIFUGAL CHARGING PUMP

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Yes

Noted scaffolding near air tubing running to pump. Scaffolding is well-supported, well-braced and has adequate clearance. Fall protection harness mounted on scaffold but far enough away not to be in zone of influence of the tubing. No hazards.

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes

Overhead hoist noted to be well-supported with chains tied off. No hazard.

9. Do attached lines have adequate flexibility to avoid damage? Yes

10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Yes

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

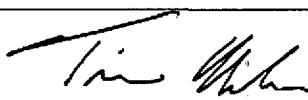
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

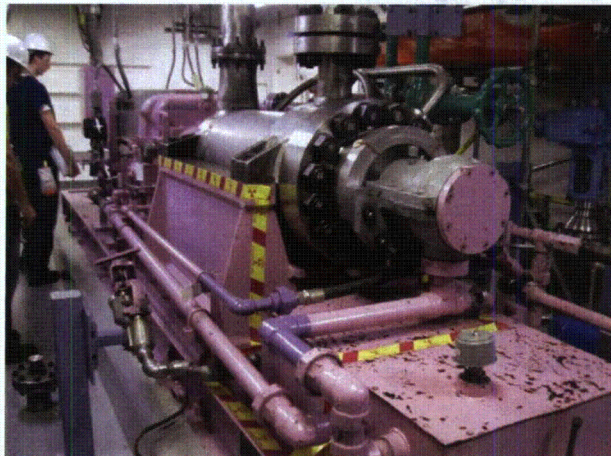
11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PBG05B

Equipment Class: (5) Horizontal Pumps

Equipment Description: CENTRIFUGAL CHARGING PUMP

Photos

PBG05B 9-19 008



PBG05B 9-19 009

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

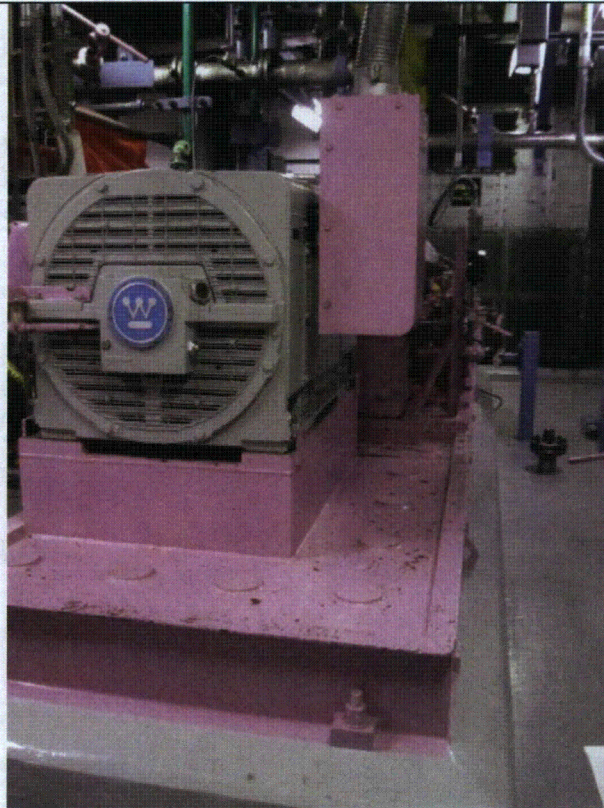
Equipment ID No.: PBG05B

Equipment Class: (5) Horizontal Pumps

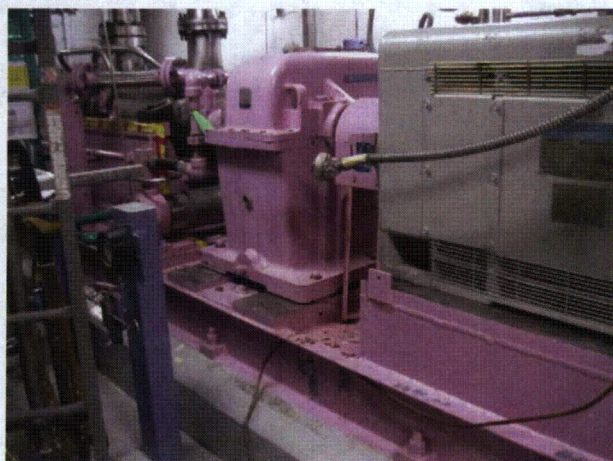
Equipment Description: CENTRIFUGAL CHARGING PUMP



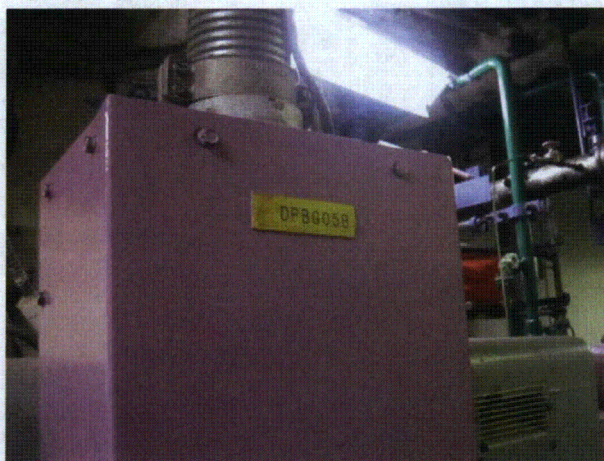
PBG05B 9-19 010



PBG05B 9-19 011



PBG05B 9-19 012



PBG05B 9-19 013

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

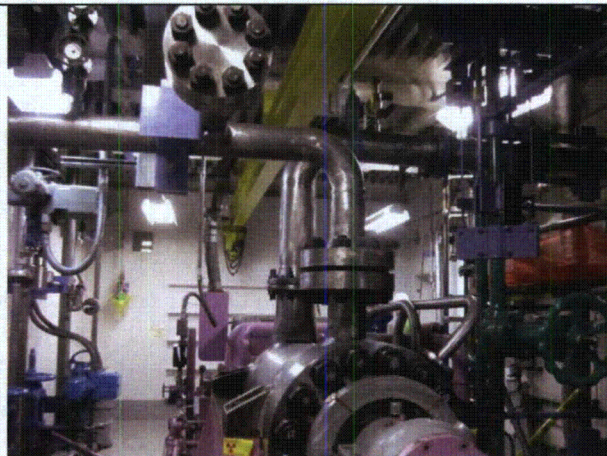
Equipment ID No.: PBG05B

Equipment Class: (5) Horizontal Pumps

Equipment Description: CENTRIFUGAL CHARGING PUMP



PBG05B 9-19 014



PBG05B 9-19 015

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**Equipment ID No.: PECO1BEquipment Class: (5) Horizontal PumpsEquipment Description: FUEL POOL COOLING PUMPProject: WCNOC SWELLocation (Bldg, Elev, Room/Area): FB, 2000.00 ft, 6104

Manufacturer/Model: _____

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Yes

2. Is the anchorage free of bent, broken, missing or loose hardware? Yes

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes

4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes

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.) Yes

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PECO1B

Equipment Class: (5) Horizontal Pumps

Equipment Description: FUEL POOL COOLING PUMP

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Yes
Hoist overhead, well supported and hoist chains tied off at south end away from pump. Good practice noted; no hazard.
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes
9. Do attached lines have adequate flexibility to avoid damage? Yes
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Yes

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

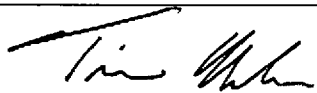
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

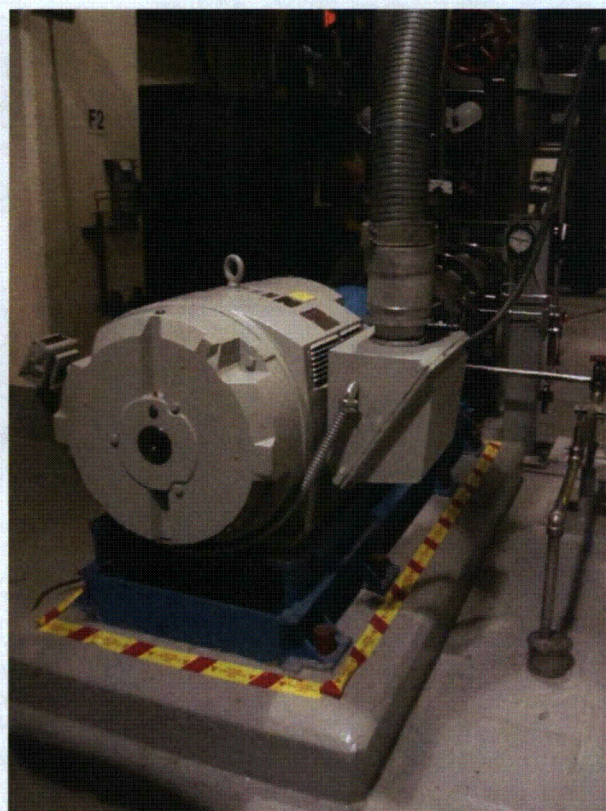
Equipment ID No.: PECO1B

Equipment Class: (5) Horizontal Pumps

Equipment Description: FUEL POOL COOLING PUMP

Photos

PECO1B 9-18 230



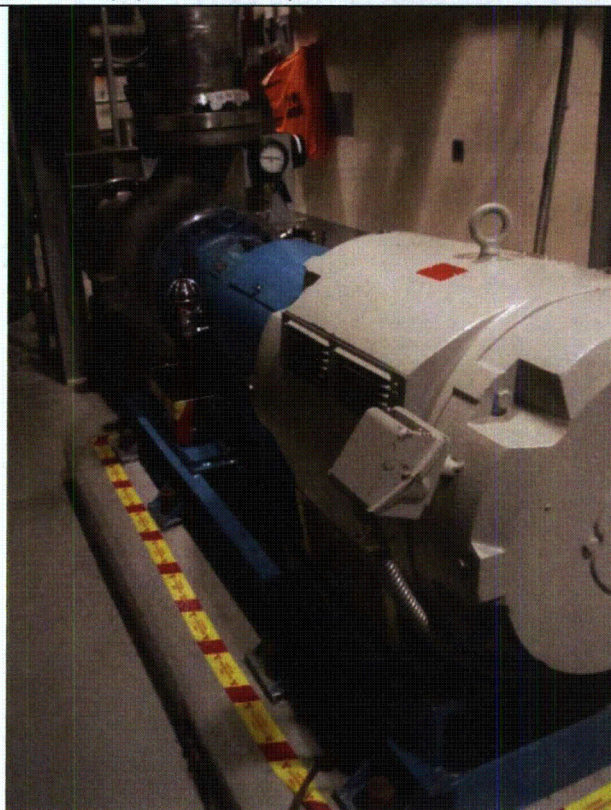
PECO1B 9-18 231

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

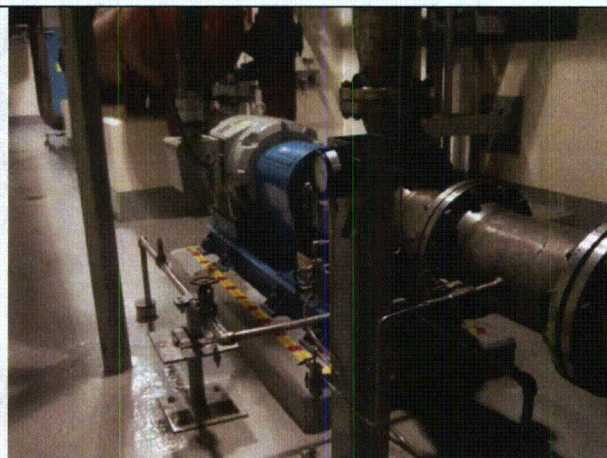
Equipment ID No.: PECO1B

Equipment Class: (5) Horizontal Pumps

Equipment Description: FUEL POOL COOLING PUMP



PECO1B 9-18 232



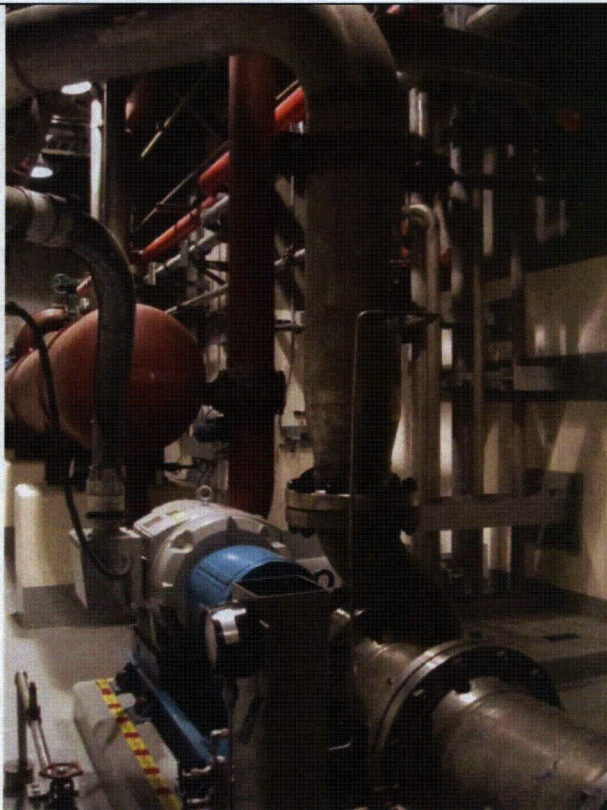
PECO1B 9-18 233

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PECO1B

Equipment Class: (5) Horizontal Pumps

Equipment Description: FUEL POOL COOLING PUMP



PECO1B 9-18 234

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PEG01B

Equipment Class: (5) Horizontal Pumps

Equipment Description: COMPONENT COOL. WATER PUMP

Project: WCNO SWEL

Location (Bldg, Elev, Room/Area): AUX, 2026.00 ft, 1401

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Yes

2. Is the anchorage free of bent, broken, missing or loose hardware? Yes

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes

4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes

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.) Yes

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PEG01B

Equipment Class: (5) Horizontal Pumps

Equipment Description: COMPONENT COOL. WATER PUMP

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Yes

Scaffolding and overhead hoist are well-supported and properly braced. Hoist rig is in safe position with chains tied off. No hazards.

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes

9. Do attached lines have adequate flexibility to avoid damage? Yes

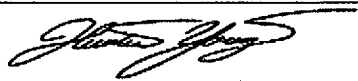
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Yes

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

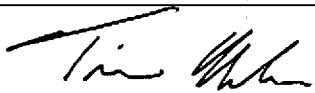
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

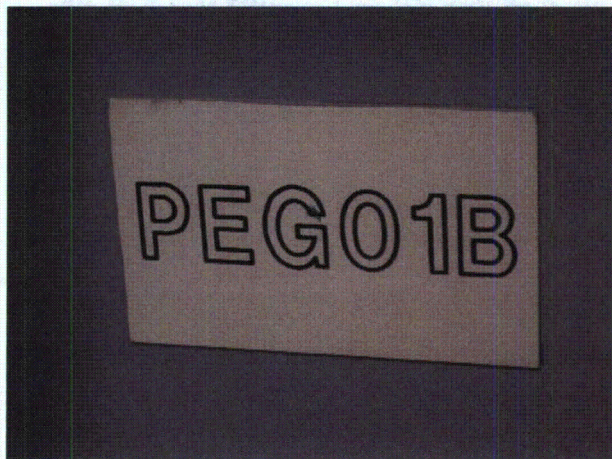
11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PEG01B

Equipment Class: (5) Horizontal Pumps

Equipment Description: COMPONENT COOL. WATER PUMP

Photos

PEG01B 9-20 138



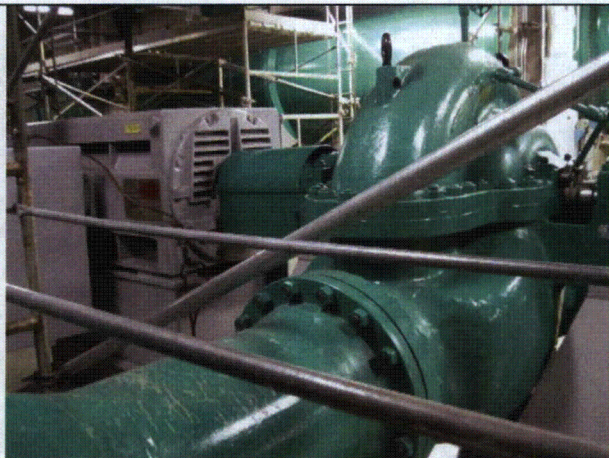
PEG01B 9-20 139

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PEG01B

Equipment Class: (5) Horizontal Pumps

Equipment Description: COMPONENT COOL. WATER PUMP



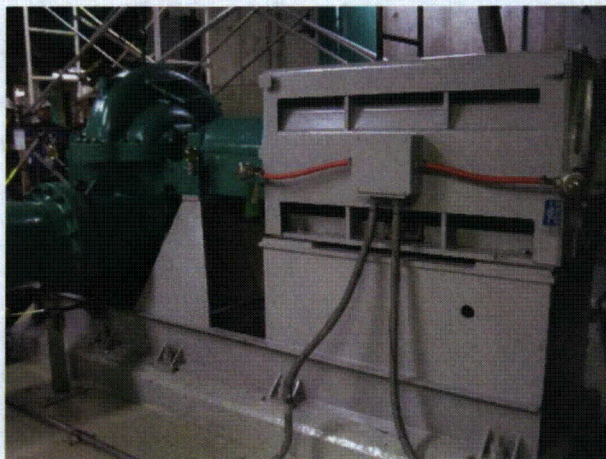
PEG01B 9-20 140



PEG01B 9-20 141



PEG01B 9-20 142



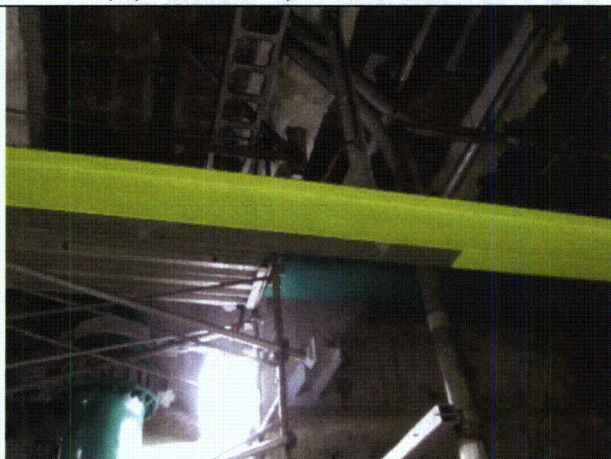
PEG01B 9-20 143

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PEG01B

Equipment Class: (5) Horizontal Pumps

Equipment Description: COMPONENT COOL. WATER PUMP



PEG01B 9-20 144

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PEJ01B

Equipment Class: (6) Vertical Pumps

Equipment Description: RESIDUAL HEAT REMOVAL PUMP

Project: WCNO SWEL

Location (Bldg, Elev, Room/Area): AUX, 1974.00 ft, 1109

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? | Yes |
| | | |
| 2. | Is the anchorage free of bent, broken, missing or loose hardware? | Yes |
| | | |
| 3. | Is the anchorage free of corrosion that is more than mild surface oxidation? | Yes |
| | | |
| 4. | Is the anchorage free of visible cracks in the concrete near the anchors? | Yes |
| | | |
| 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.) | Yes |
| | | |
| 6. | Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? | Yes |

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PEJ01B

Equipment Class: (6) Vertical Pumps

Equipment Description: RESIDUAL HEAT REMOVAL PUMP

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Yes
Scaffolding observed to be approximately 1" from tank legs. Tank legs and scaffold are stiff enough that distance is adequate. Hoist above is well supported with rigging parked away from equipment and tied off. No hazards.
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes
9. Do attached lines have adequate flexibility to avoid damage? Yes
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Yes

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

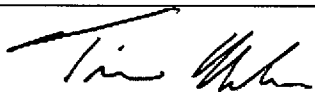
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

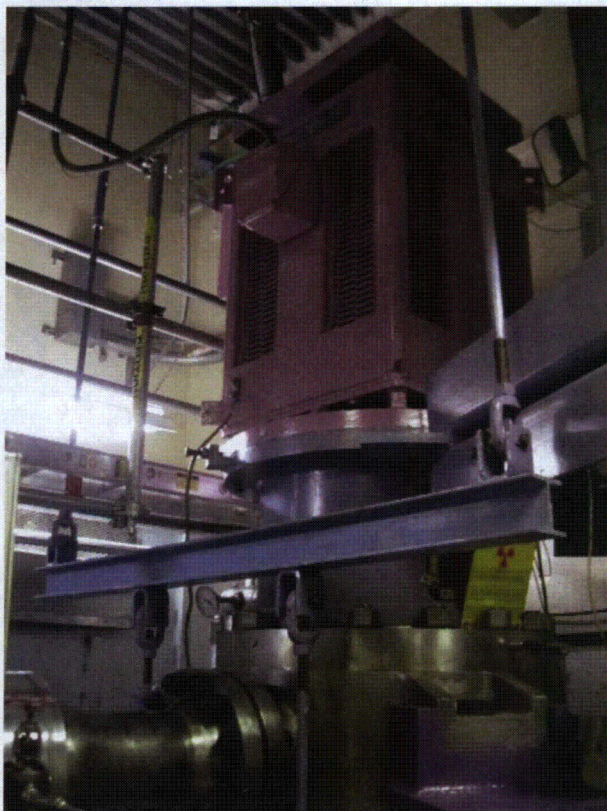
11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

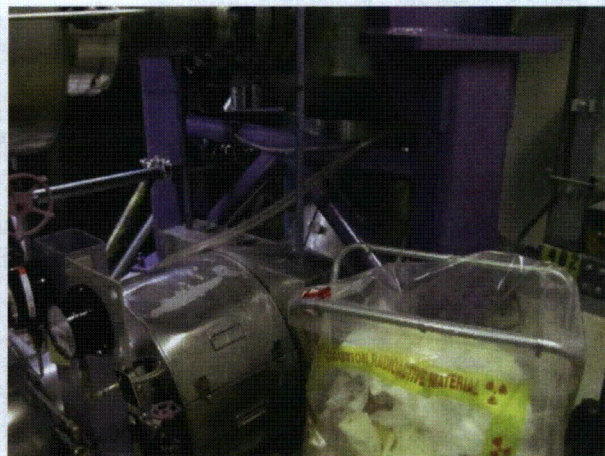
Equipment ID No.: PEJ01B

Equipment Class: (6) Vertical Pumps

Equipment Description: RESIDUAL HEAT REMOVAL PUMP

Photos

PEJ01B 9-19 144



PEJ01B 9-19 145



PEJ01B 9-19 146



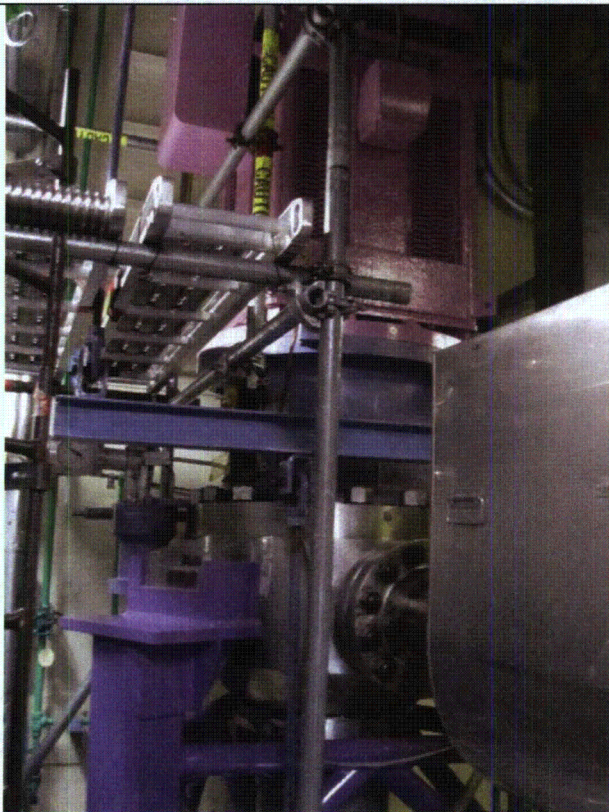
PEJ01B 9-19 147

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

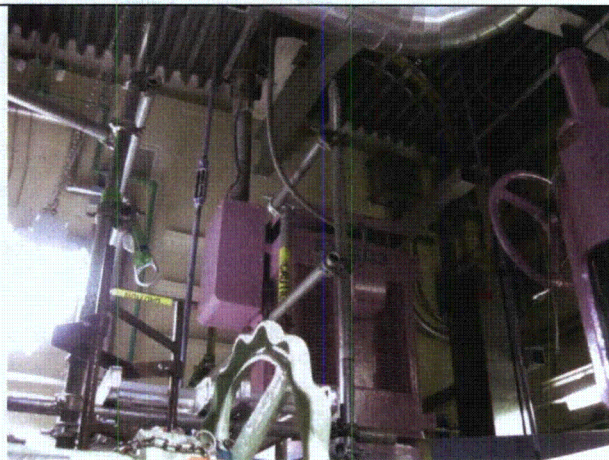
Equipment ID No.: PEJ01B

Equipment Class: (6) Vertical Pumps

Equipment Description: RESIDUAL HEAT REMOVAL PUMP



PEJ01B 9-19 148



PEJ01B 9-19 149

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**Equipment ID No.: PEN01BEquipment Class: (6) Vertical PumpsEquipment Description: Containment Spray Pump BProject: WCNOC SWELLocation (Bldg, Elev, Room/Area): AUX, 1974.00 ft, 1110

Manufacturer/Model: _____

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? Yes

2. Is the anchorage free of bent, broken, missing or loose hardware? Yes

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes

4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes

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.) Yes

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PEN01B

Equipment Class: (6) Vertical Pumps

Equipment Description: Containment Spray Pump B

Interaction Effects

7. Are soft targets free from impact by nearby equipment or structures? Yes

*Noted blackout wall adjacent and with rugged external supports. No concern.
Overhead hoist well supported with chains tied off. No concerns.*

8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes

See Note 7 above. No hazards.

9. Do attached lines have adequate flexibility to avoid damage? Yes

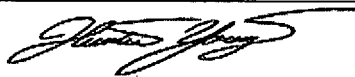
10. Based on the above seismic interaction evaluations, is equipment free of potentially adverse seismic interaction effects? Yes

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

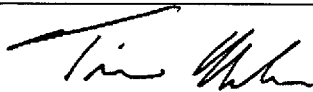
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

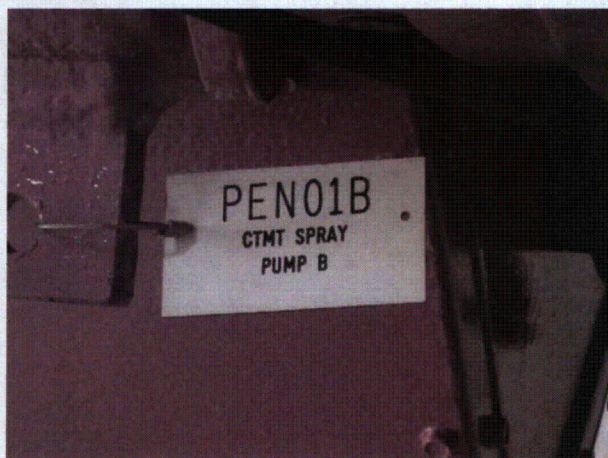
11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

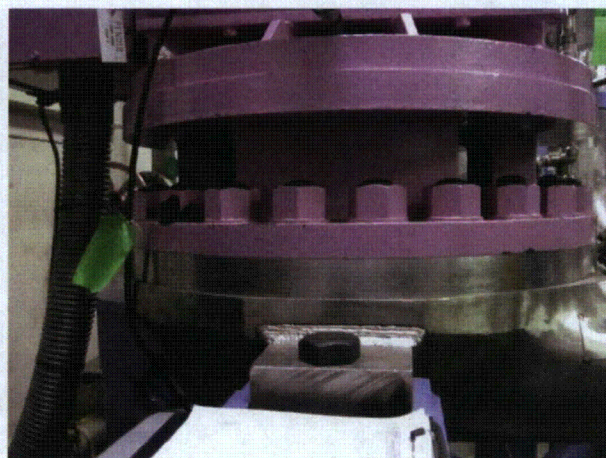
Equipment ID No.: PEN01B

Equipment Class: (6) Vertical Pumps

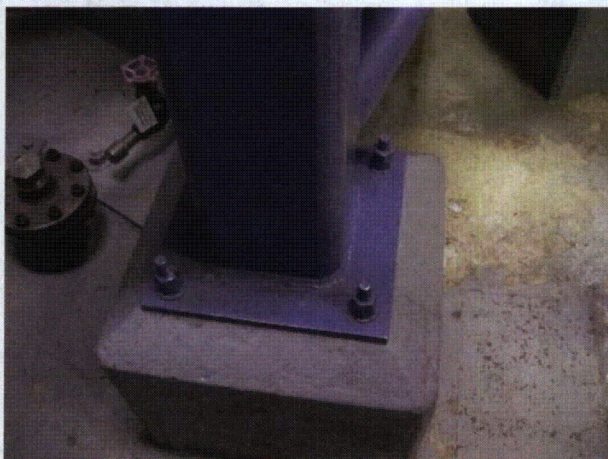
Equipment Description: Containment Spray Pump B

Photos

PEN01B 9-19 119



PEN01B 9-19 120



PEN01B 9-19 121



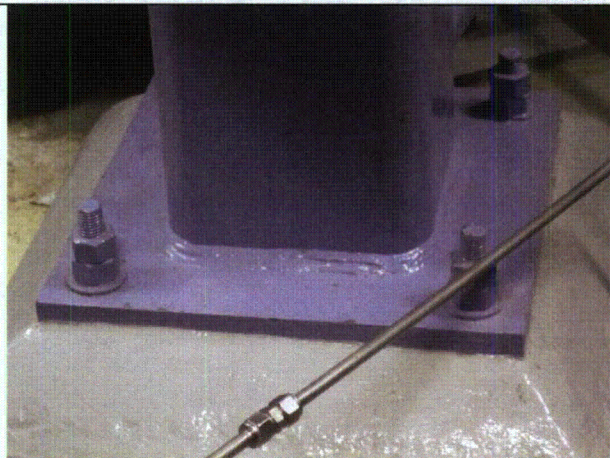
PEN01B 9-19 122

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PEN01B

Equipment Class: (6) Vertical Pumps

Equipment Description: Containment Spray Pump B



PEN01B 9-19 123



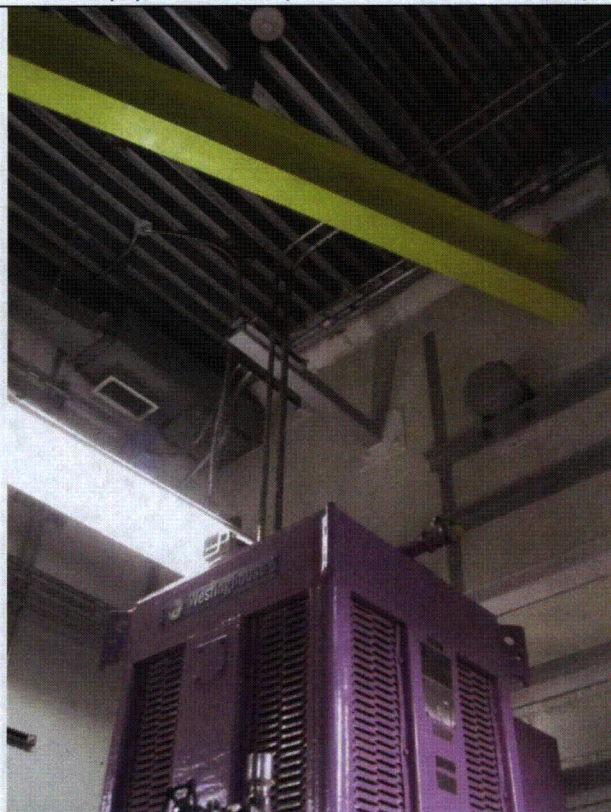
PEN01B 9-19 124

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PEN01B

Equipment Class: (6) Vertical Pumps

Equipment Description: Containment Spray Pump B



PEN01B 9-19 125

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PKJ03B

Equipment Class: (5) Horizontal Pumps

Equipment Description: AUXILIARY LUBE-OIL (KEEP-WARM) PUMP FOR KKJ01B

Project: WCNOC SWEL

Location (Bldg, Elev, Room/Area): DGB, 2000.00 ft, 5201

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? No

2. Is the anchorage free of bent, broken, missing or loose hardware? Yes

3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes

4. Is the anchorage free of visible cracks in the concrete near the anchors? Not Applicable
Pump is rigidly mounted to diesel skid.

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.) Not Applicable

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: PKJ03B

Equipment Class: (5) Horizontal Pumps

Equipment Description: AUXILIARY LUBE-OIL (KEEP-WARM) PUMP FOR KKJ01B

Interaction Effects

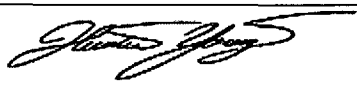
7. Are soft targets free from impact by nearby equipment or structures? Yes
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes
9. Do attached lines have adequate flexibility to avoid damage? Yes
10. Based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

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

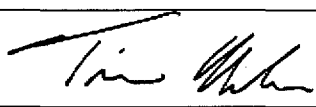
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

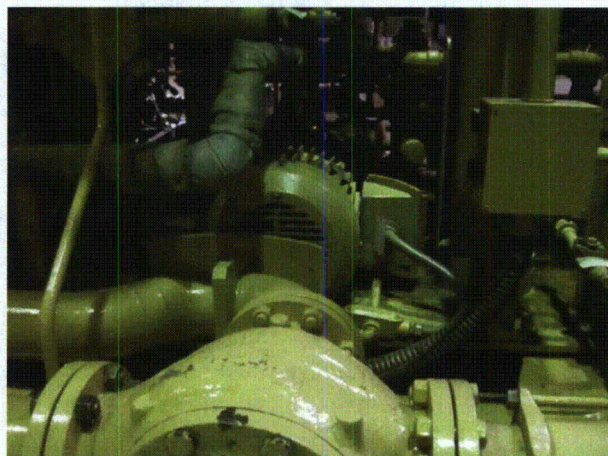
Equipment ID No.: PKJ03B

Equipment Class: (5) Horizontal Pumps

Equipment Description: AUXILIARY LUBE-OIL (KEEP-WARM) PUMP FOR KKJ01B

Photos

PKJ03B 9-17 010



PKJ03B 9-17 011



PKJ03B 9-17 012

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: RL017

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: ESF MCB

Project: WCNO SWEL

Location (Bldg, Elev, Room/Area): CTRL, 2047.50 ft, 3601

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? No

2. Is the anchorage free of bent, broken, missing or loose hardware? Yes
Welds on rear of panel are inaccessible due to floor tile that requires excessive dismantling to view. SWT observed over 50% of anchorage, which is deemed sufficient to verify the equipment as anchored. No adverse concern.
3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes

4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes

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.) Not Applicable

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: RL017

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: ESF MCB

Interaction Effects

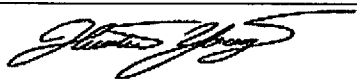
7. Are soft targets free from impact by nearby equipment or structures? Yes
8. Are overhead equipment, distribution systems, ceiling tiles and lighting, and masonry block walls not likely to collapse onto the equipment? Yes
9. Do attached lines have adequate flexibility to avoid damage? Yes
10. Based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

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

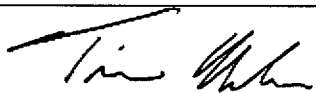
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

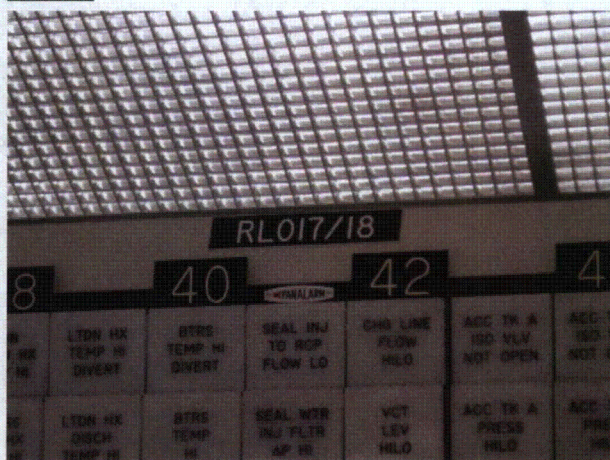
11-15-12

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

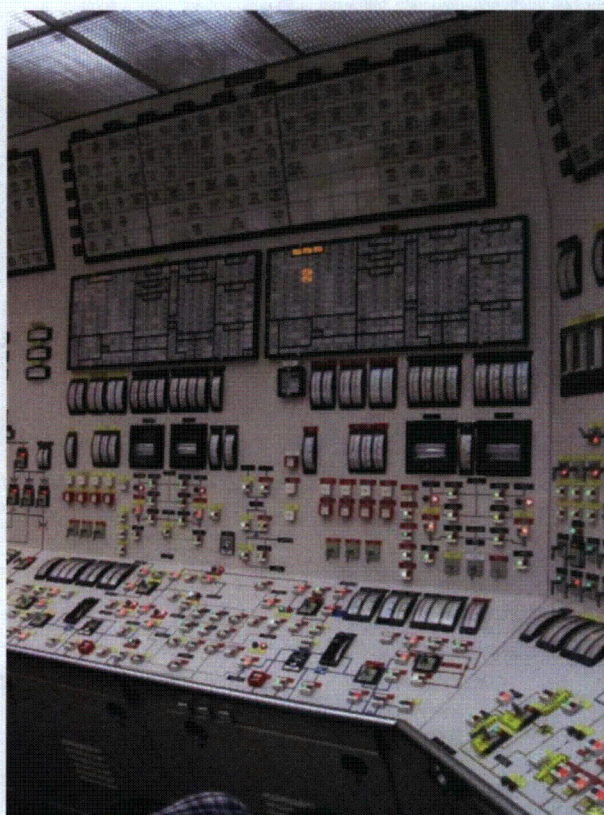
Equipment ID No.: RL017

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: ESF MCB

Photos

RL017 9-18 109



RL017 9-18 110

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

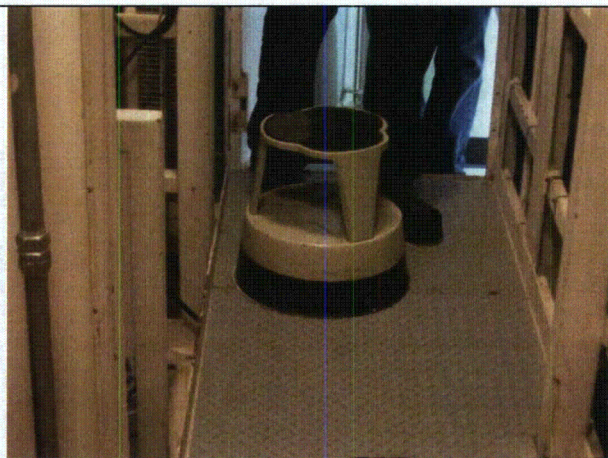
Equipment ID No.: RL017

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: ESF MCB



RL017 9-19 001



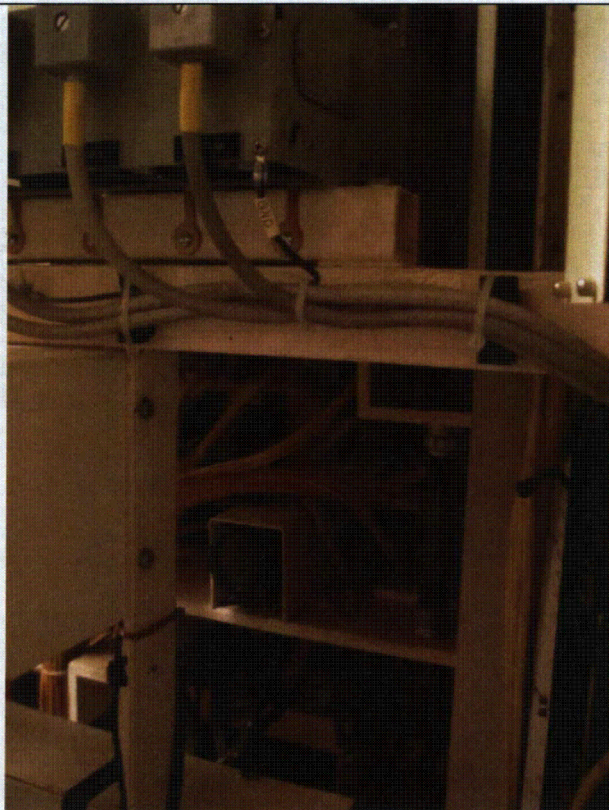
RL017 9-19 002

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

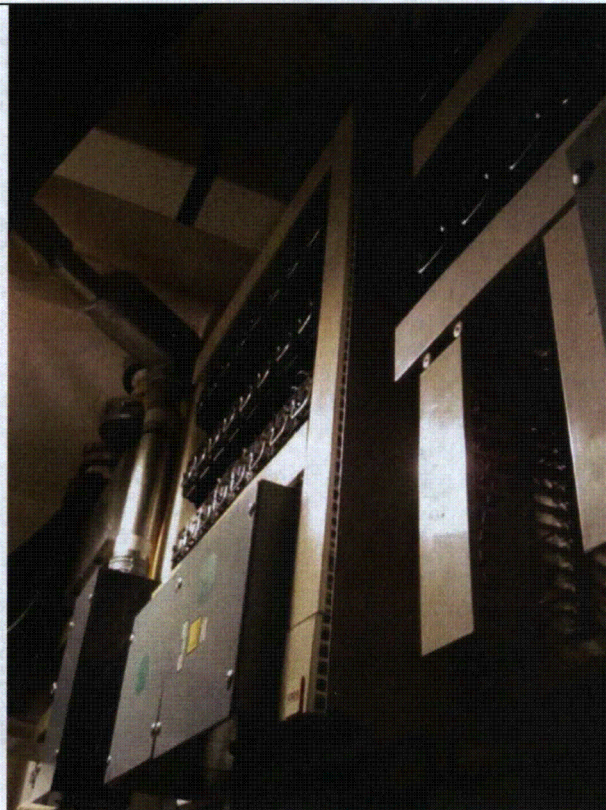
Equipment ID No.: RL017

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: ESF MCB



RL017 9-19 003



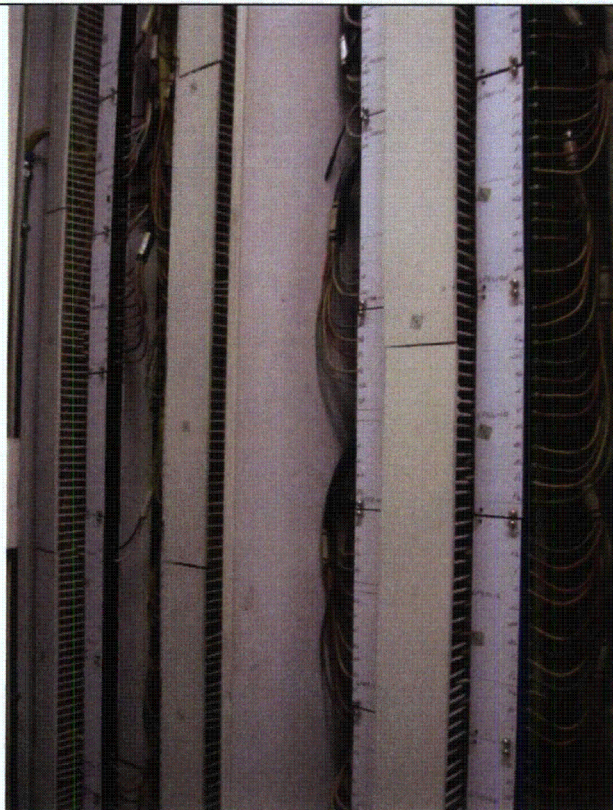
RL017 9-19 004

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: RL017

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: ESF MCB



RL017 9-19 005



RL017 9-19 006

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: RL017

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: ESF MCB



RL017 9-19 007

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: RL020

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: ESF MCB

Project: WCNO SWEL

Location (Bldg, Elev, Room/Area): CTRL, 2047.50 ft, 3601

Manufacturer/Model:

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 anchorage configuration verification required (i.e., is the item one of the 50% of SWEL items requiring such verification)? No

2. Is the anchorage free of bent, broken, missing or loose hardware? Yes
Welds on rear of panel are inaccessible due to floor tile that requires excessive dismantling to view. SWT observed over 50% of anchorage, which is deemed sufficient to verify the equipment as anchored. No adverse concern.
3. Is the anchorage free of corrosion that is more than mild surface oxidation? Yes

4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes

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.) Not Applicable

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: RL020

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: ESF MCB

Interaction Effects

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

Other Adverse Conditions

11. Have you looked for and found no adverse seismic conditions that could adversely affect the safety functions of the equipment? Yes

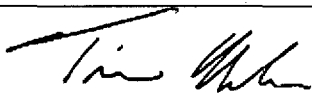
Comments

Evaluated by:



Hunter Young

Date: 11-15-12



Timothy Nealon

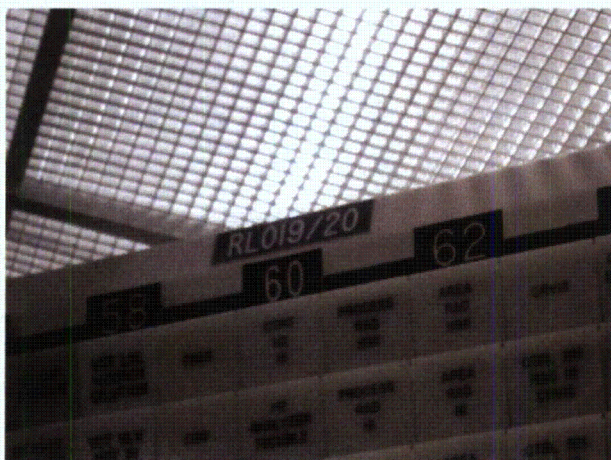
11-15-12

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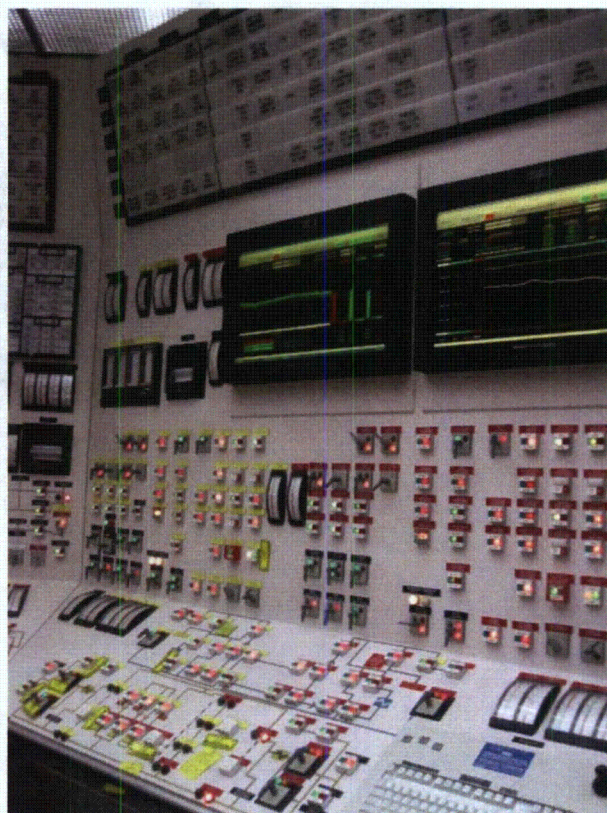
Equipment ID No.: RL020

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: ESF MCB

Photos

RL020 9-18 111



RL020 9-18 112

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: RL020

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: ESF MCB



RL020 9-19 001



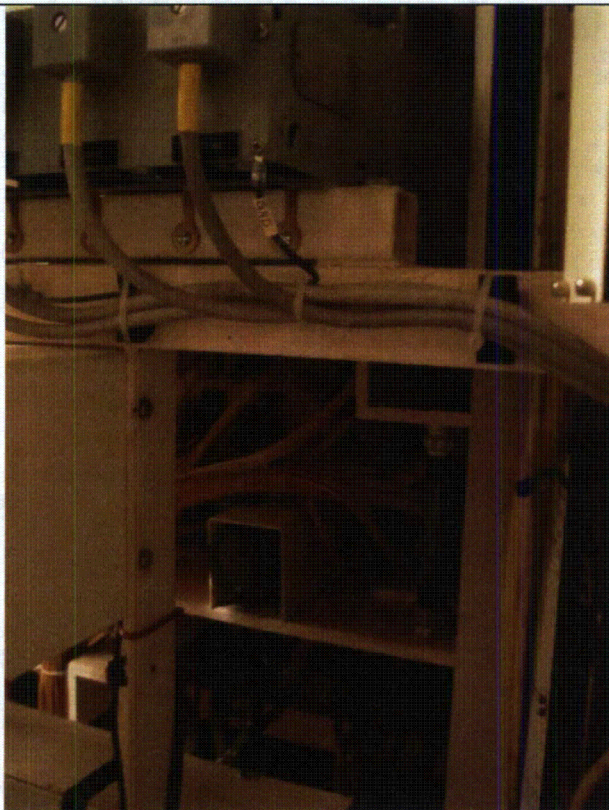
RL020 9-19 002

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

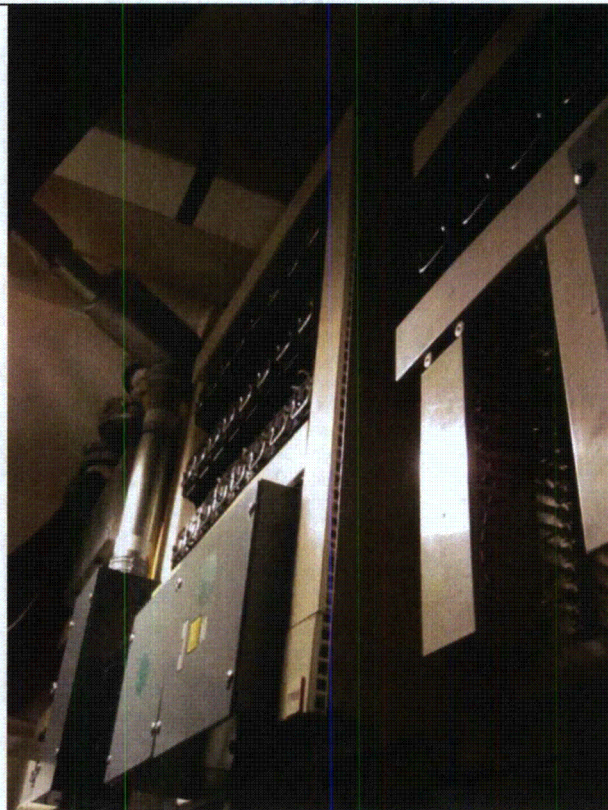
Equipment ID No.: RL020

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: ESF MCB



RL020 9-19 003



RL020 9-19 004

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**Equipment ID No.: RL020Equipment Class: (20) Instrumentation and Control Panels and CabinetsEquipment Description: ESF MCB

RL020 9-19 005



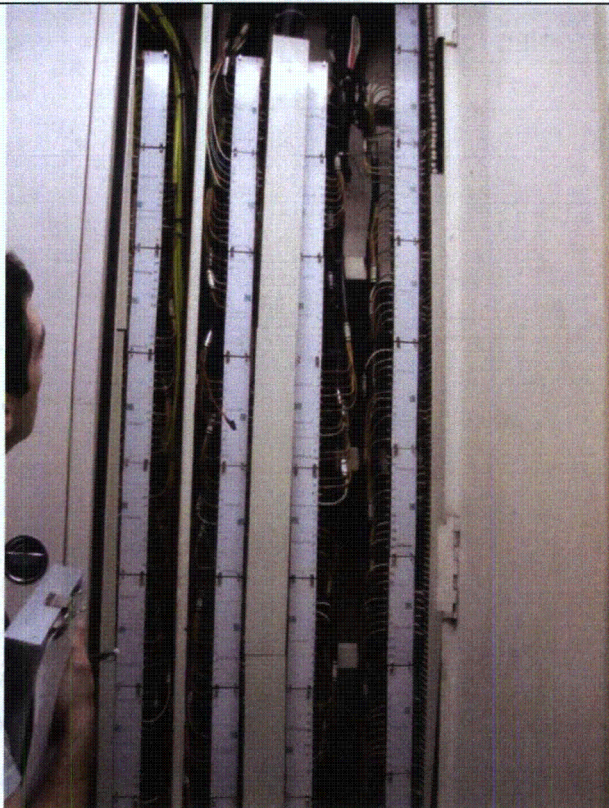
RL020 9-19 006

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: RL020

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: ESF MCB



RL020 9-19 007

Status: ☒ Y ☐ N ☐ U**Seismic Walkdown Checklist (SWC)**

Equipment ID No.: RL021

Equipment Class: (20) Instrumentation and Control Panels and Cabinets

Equipment Description: REACTOR AUXILIARIES PANEL

Project: WCNO SWEL

Location (Bldg, Elev, Room/Area): CTRL, 2047.50 ft, 3601

Manufacturer/Model:

Instructions for Completing Checklist

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4. Is the anchorage free of visible cracks in the concrete near the anchors? Yes

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.) Not Applicable

6. Based on the above anchorage evaluations, is the anchorage free of potentially adverse seismic conditions? Yes