MECHANICAL UTILITIES TEST REPORT

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

PREPARED BY: R. O’BRIEN  LIFE #: 24021  DATE: 10/26/16

TEST LOCATION: 18-1D FX1  APPLICABLE DRAWING(S): ATTACHMENT

DESCRIPTION OF COMPONENT/SYSTEM:
PROCESS CHILLED WATER PIPING

MAXIMUM ALLOWABLE WORKING PRESSURE (PSIG) OF COMPONENT/SYSTEM:
75 PSIG

MECHANICAL UTILITY SYSTEM (MARK AN “X” ON ALL THAT APPLY):

PRIMARY DI WATER □  SECONDARY DI WATER □  ALUMINUM DI WATER □

PROCESS CHILLED WATER  X  COMPRESSED AIR □  GASEOUS NITROGEN □  OTHER □

IF ‘OTHER’ IS SELECTED, DESCRIBE THE SYSTEM:

TEST GAUGE INFORMATION:
RANGE: 0-400  UNIT OF MEASUREMENT: PSIG

SERIAL NUMBER: M014749  CALIBRATION DUE DATE: 5/23/17

OPERATIONS CONDUCTED (SELECT ALL THAT APPLY):
LEAK TEST  X  FLUSH  X  HYDROSTATIC PRESSURE TEST  X  PNEUMATIC PRESSURE TEST □

OTHER □

IF ‘OTHER’ IS SELECTED, DESCRIBE THE OPERATION:

R. O’BRIEN 08/07/2015 REV A
MECHANICAL UTILITIES TEST REPORT - PAGE 2

LEAK TEST:

**THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER**

TEST FLUID: AIR** FLUID TEMPERATURE: AMBIENT °F FLUID PRESSURE: <50 PSIG

METHOD USED (VISUAL, SOAP BUBBLES, VACUUM, ETC.): VISUAL/SOAP/CTC.

***TEST DURATION SHALL BE AS LONG AS REQUIRED TO EVALUATE POTENTIAL LEAK POINTS***

**THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN**

CONDUCTED BY: Buivuccio DATE: 11-21-16

RECORD ACTUAL LEAK TEST DURATION HERE: __________________________

NO LEAKAGE PRESENT X SIGNATURE: V. Buivuccio

FLUSH:

**THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER**

FLUSH FLUID: WATER** FLUID TEMPERATURE: AMBIENT °F FLUID PRESSURE: HOUSE PSIG

FLUSH DURATION: 20 MINUTES/ HOURS (CIRCLE ONE)

FLUSH PARAMETERS: N/A

____________________________ (WRITE "N/A" IF NONE APPLY)

**THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN**

CONDUCTED BY: Buivuccio DATE: 11-21-16

COMMENTS:

____________________________

ACCEPTABLE X SIGNATURE: V. Buivuccio

PRESSURE TEST:

**THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER**

TYPE: HYDROSTATIC X PNEUMATIC □ TEST FLUID: WATER FLUID TEMPERATURE: AMBIENT

SPECIFIED STARTING PRESSURE: 75 PSIG SPECIFIED MAXIMUM TEST PRESSURE: 150 PSIG

SPECIFIED PRESSURE AND TIME INCREMENTS: 10/10 PSIG/MINUTES

SPECIFIED MAXIMUM TEST PRESSURE DURATION: 10 MINUTES (10 MINUTES MINIMUM)

R. O'BRIEN 08/07/2015 REV A
**MECHANICAL UTILITIES TEST REPORT – PAGE 3**

**PRESSURE TEST (CONTINUED):**

*THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN*

**CONDUCTED BY:** [Name]
**DATE:** 11-21-16

**ENVIRONMENTAL FACTORS:**
- **TEMPERATURE:** N/A °F
- **RELATIVE HUMIDITY:** N/A %

### PRESSURE TEST DATA TO BE COMPLETED DURING TEST

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**PRESSURE TEST ACCEPTABLE:** Y

**TECHNICIAN SIGNATURE/LIFE NUMBER:** [Signature]
**WITNESS SIGNATURE/LIFE NUMBER:** [Signature]

**OTHER:**

*THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER*

**DETAILED DESCRIPTION OF OPERATION (ATTACHMENT Y/N):**


**TEST FLUID:**

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*THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN*

**CONDUCTED BY:** [Name]
**DATE:** [Date]

**ENVIRONMENTAL FACTORS:**
- **TEMPERATURE:** [Temperature] °F
- **RELATIVE HUMIDITY:** [Humidity] %

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R. O'BRIEN 08/07/2015 REV A
18ID FXI
HIGH CAPACITY COMPRESSED AIR PIPING PRESSURE TEST SHEET ATTACHMENT
SEE PRESSURE TEST REPORT FOR PARAMETERS
R. O'BRIEN
11/2/2016
MECHANICAL UTILITIES TEST REPORT

PREPARED BY: R. O'BRIEN   LIFE #: 24021   DATE: 5/9/17

TEST LOCATION: 18-10 FX1   APPLICABLE DRAWING(S): ATTACHED

DESCRIPTION OF COMPONENT/SYSTEM: MASKAS CHILLER CIRCUIT TUBING/VALVES

MAXIMUM ALLOWABLE WORKING PRESSURE (PSIG) OF COMPONENT/SYSTEM: 100 PSIG

MECHANICAL UTILITY SYSTEM (MARK AN “X” ON ALL THAT APPLY):

- PRIMARY DI WATER  
- SECONDARY DI WATER  
- ALUMINUM DI WATER
- PROCESS CHILLED WATER  
- COMPRESSED AIR  
- GASEOUS NITROGEN  
- OTHER X

IF ‘OTHER’ IS SELECTED, DESCRIBE THE SYSTEM: CLOSED LOOP CHILLER CIRCUTS

TEST GAUGE INFORMATION:

- RANGE: 0-3000 (WATER)
- UNIT OF MEASUREMENT: PSIG
- SERIAL NUMBER: 9161 8089
- CALIBRATION DUE DATE: 3/14/18

OPERATIONS CONDUCTED (SELECT ALL THAT APPLY):

- LEAK TEST X
- FLUSH
- HYDROSTATIC PRESSURE TEST
- PNEUMATIC PRESSURE TEST

IF ‘OTHER’ IS SELECTED, DESCRIBE THE OPERATION: ____________________

R. O’BRIEN 08/07/2015 REV A
LEAK TEST:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

TEST FLUID: __________ FLUID TEMPERATURE _________ °F FLUID PRESSURE: __________ PSIG

METHOD USED (VISUAL, SOAP BUBBLES, VACUUM, ETC.): ________________________________

***TEST DURATION SHALL BE AS LONG AS REQUIRED TO EVALUATE POTENTIAL LEAK POINTS***

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: __________ DATE: __________

RECORD ACTUAL LEAK TEST DURATION HERE: ________________________________

NO LEAKAGE PRESENT □ SIGNATURE: _______________________________________

FLUSH:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

FLUSH FLUID: __________ FLUID TEMPERATURE _________ °F FLUID PRESSURE: __________ PSIG

FLUSH DURATION: ______________________________ MINUTES/HOURS (CIRCLE ONE)

FLUSH PARAMETERS: ______________________________

____________________________________________________ (WRITE "N/A" IF NONE APPLY)

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: __________ DATE: __________

COMMENTS:

_______________________________________________________________

ACCEPTABLE □ SIGNATURE: _______________________________________

PRESSURE TEST:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

TYPE: HYDROSTATIC □ PNEUMATIC □ TEST FLUID: __________ FLUID TEMPERATURE __________ °F

SPECIFIED STARTING PRESSURE: __________ PSIG SPECIFIED MAXIMUM TEST PRESSURE: __________ PSIG

SPECIFIED PRESSURE AND TIME INCREMENTS: __________ PSIG/ MINUTES

SPECIFIED MAXIMUM TEST PRESSURE DURATION: __________ MINUTES (10 MINUTES MINIMUM)
MECHANICAL UTILITIES TEST REPORT – PAGE 3

PRESSURE TEST (CONTINUED):

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: J. Alcor DATE: ____________

ENVIRONMENTAL FACTORS: TEMPERATURE 72 °F RELATIVE HUMIDITY 35 %

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PRESSURE TEST ACCEPTABLE □

TECHNICIAN SIGNATURE/LIFE NUMBER: ____________________________

WITNESS SIGNATURE/LIFE NUMBER: ____________________________

OTHER:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

DETAILED DESCRIPTION OF OPERATION (ATTACHMENT Y / N):

__________________________________________________________________________

__________________________________________________________________________

__________________________________________________________________________

TEST FLUID: ___________ FLUID TEMPERATURE ___________ °F FLUID PRESSURE: ___________ PSIG

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: ___________ DATE: ___________

ENVIRONMENTAL FACTORS: TEMPERATURE ___________ °F RELATIVE HUMIDITY ___________%

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R. O’BRIEN 08/07/2015 REV A
MECHANICAL UTILITIES TEST REPORT

PREPARED BY: O'BRIEN
LIFE #: 2402
DATE: 11/2/16

TEST LOCATION: 10 FXT
APPLICABLE DRAWING(S): ATTACHMENT
ATTACHMENT Y/N (CIRCLE ONE)

DESCRIPTION OF COMPONENT/SYSTEM:
HIGH CAPACITY COMPRESSED AIR PIPING/MANIFOLD

MAXIMUM ALLOWABLE WORKING PRESSURE (PSIG) OF COMPONENT/SYSTEM:
125 PSIG

MECHANICAL UTILITY SYSTEM (MARK AN “X” ON ALL THAT APPLY):
PRIMARY DI WATER □ SECONDARY DI WATER □ ALUMINUM DI WATER □
PROCESS CHILLED WATER □ COMPRESSED AIR □ GASEOUS NITROGEN □ OTHER X

IF ‘OTHER’ IS SELECTED, DESCRIBE THE SYSTEM:
HIGH CAP AIR

TEST GAUGE INFORMATION:
RANGE: 0-300
UNIT OF MEASUREMENT: PSIG
SERIAL NUMBER: M014904
CALIBRATION DUE DATE: 9/11/17

OPERATIONS CONDUCTED (SELECT ALL THAT APPLY):
LEAK TEST X FLUSH □ HYDROSTATIC PRESSURE TEST □ PNEUMATIC PRESSURE TEST X
OTHER □

IF ‘OTHER’ IS SELECTED, DESCRIBE THE OPERATION:

R. O’BRIEN 08/07/2015 REV A
MECHANICAL UTILITIES TEST REPORT – PAGE 2

LEAK TEST:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

TEST FLUID:  AIR  FLUID TEMPERATURE: AMBIENT °F  FLUID PRESSURE: ≤ 500 PSIG

METHOD USED (VISUAL, SOAP BUBBLES, VACUUM, ETC.): VISUAL, SOAP, ETC.

***TEST DURATION SHALL BE AS LONG AS REQUIRED TO EVALUATE POTENTIAL LEAK POINTS***

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: MD AR  DATE: 11/9/16

RECORD ACTUAL LEAK TEST DURATION HERE:  3 Hours

NO LEAKAGE PRESENT  ☑  SIGNATURE: [Signature]

FLUSH:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

FLUSH FLUID:  FLUID TEMPERATURE: °F  FLUID PRESSURE: ________ PSIG

FLUSH DURATION: ______________________________ MINUTES/HOURS (CIRCLE ONE)

FLUSH PARAMETERS: ______________________________

_______________________________ (WRITE "N/A" IF NONE APPLY)

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY:  DATE: 

COMMENTS:

________________________________________________

ACCEPTABLE  ☐  SIGNATURE: ______________________________

PRESSURE TEST:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

TYPE: HYDROSTATIC ☐  PNEUMATIC ☒  TEST FLUID: AIR  FLUID TEMPERATURE: AMBIENT

SPECIFIED STARTING PRESSURE: 75 PSIG  SPECIFIED MAXIMUM TEST PRESSURE: 150 PSIG

SPECIFIED PRESSURE AND TIME INCREMENTS: 10/10 PSIG/ MINUTES

SPECIFIED MAXIMUM TEST PRESSURE DURATION: 10 MINUTES (10 MINUTES MINIMUM)

R. O'BRIEN 08/07/2015 REV A
MECHANICAL UTILITIES TEST REPORT - PAGE 3

PRESSURE TEST (CONTINUED):

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: [Signature] DATE: 11/9/16

ENVIRONMENTAL FACTORS: TEMPERATURE _____________ °F  RELATIVE HUMIDITY _____________ %

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PRESSURE TEST ACCEPTABLE [ ]

TECHNICIAN SIGNATURE/LIFE NUMBER: [Signature]

WITNESS SIGNATURE/LIFE NUMBER: [Signature]

OTHER:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

DETAILED DESCRIPTION OF OPERATION (ATTACHMENT Y/N):

___________________________________________________________________________________________

___________________________________________________________________________________________

TEST FLUID: _____________ FLUID TEMPERATURE _____________ °F  FLUID PRESSURE: _____________ PSIG

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: [Signature] DATE: [Signature]

ENVIRONMENTAL FACTORS: TEMPERATURE _____________ °F  RELATIVE HUMIDITY _____________ %

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R. O'BRIEN 08/07/2015 REV A
DO NOT INCLUDE THIS GAUGE

DO NOT INCLUDE THIS GAUGE

SECTION X-X

CA & GN2 AT END STATION B AND ALONG THE 2 DOWNSTREAM PYLONS

18-10 FX1
GN2 PRESSURE TEST SHEET ATTACHMENT
SHEET 2 OF 2
R. O'BRIEN 10/6/10
SEE TEST SHEET FOR PARAMETERS

FOR CONTINUATION SEE SHEET 3
180 FRI
DI WATER PRESSURE TEST REPORT ATTACHMENT
09/29/2015
R. O'Brien

USE EXISTING VALVES 5405 & 5436 AS TEST BOUNDARIES
DO NOT INCLUDE PRESSURE GAUGES OR PRESSURE TRANSMITTERS IN PRESSURE TEST
TEST BOTH SIDES OF ALL VALVES
SEE PRESSURE TEST REPORT FOR LEAK CHECKING, FLUSHING, AND PRESSURE TESTING PARAMETERS
MECHANICAL UTILITIES TEST REPORT

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

PREPARED BY: R. O'BRIEN        LIFE #: 24621        DATE: 10/16/16

TEST LOCATION: 18-10 TX 1        APPLICABLE DRAWING(S): ATTACHMENT (2 SHEETS)

ATTACHMENT (Y) N (CIRCLE ONE)

DESCRIPTION OF COMPONENT/SYSTEM:
GASEOUS NITROGEN PIPING

MAXIMUM ALLOWABLE WORKING PRESSURE (PSIG) OF COMPONENT/SYSTEM:
100 PSI

MECHANICAL UTILITY SYSTEM (MARK AN "X" ON ALL THAT APPLY):

PRIMARY DI WATER □ SECONDARY DI WATER □ ALUMINUM DI WATER □

PROCESS CHILLED WATER □ COMPRESSED AIR □ GASEOUS NITROGEN X OTHER □

IF 'OTHER' IS SELECTED, DESCRIBE THE SYSTEM:

TEST GAUGE INFORMATION:

RANGE: 0-400          UNIT OF MEASUREMENT: PSI

SERIAL NUMBER: m014749          CALIBRATION DUE DATE: 5/23/17

OPERATIONS CONDUCTED (SELECT ALL THAT APPLY):

LEAK TEST X FLUSH □ HYDROSTATIC PRESSURE TEST □ PNEUMATIC PRESSURE TEST X

OTHER □

IF 'OTHER' IS SELECTED, DESCRIBE THE OPERATION: ________________________________________________________________

R. O'BRIEN 08/07/2015 REV A
LEAK TEST:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

TEST FLUID: AIR  FLUID TEMPERATURE: AMBIENT °F  FLUID PRESSURE: LESS THAN 50 PSIG

METHOD USED (VISUAL, SOAP BUBBLES, VACUUM, ETC.): VISUAL/SOAP/BUBBLES

***TEST DURATION SHALL BE AS LONG AS REQUIRED TO EVALUATE POTENTIAL LEAK POINTS***

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: Briguercia  DATE: 11-3-16

RECORD ACTUAL LEAK TEST DURATION HERE: ________________

NO LEAKAGE PRESENT ☑  SIGNATURE: ___ Briguercia ___

FLUSH: ☑

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

FLUSH FLUID: _______________  FLUID TEMPERATURE: __________ °F  FLUID PRESSURE: __________ PSIG

FLUSH DURATION: ___________________________ MINUTES/HOURS (CIRCLE ONE)

FLUSH PARAMETERS: ____________________________

_________________________________________ (WRITE "N/A" IF NONE APPLY)

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: __________  DATE: __________

COMMENTS:

__________________________________________

ACCEPTABLE ☑  SIGNATURE: ___ Briguercia ___

PRESSURE TEST:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

TYPE: HYDROSTATIC ☑  PNEUMATIC ☒  TEST FLUID: AIR  FLUID TEMPERATURE: AMBIENT

SPECIFIED STARTING PRESSURE: 75 PSIG  SPECIFIED MAXIMUM TEST PRESSURE: 150 PSIG

SPECIFIED PRESSURE AND TIME INCREMENTS: 10/10 PSIG/MINUTES

SPECIFIED MAXIMUM TEST PRESSURE DURATION: 10 MINUTES (10 MINUTES MINIMUM)
MECHANICAL UTILITIES TEST REPORT – PAGE 3

PRESSURE TEST (CONTINUED):

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: [Signature] DATE: 11-3-16

ENVIRONMENTAL FACTORS: TEMPERATURE _______ °F  RELATIVE HUMIDITY _______ %

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PRESSURE TEST ACCEPTABLE ☑  TECHNICIAN SIGNATURE/LIFE NUMBER: [Signature]

WITNESS SIGNATURE/LIFE NUMBER: [Signature]

OTHER:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

DETAILED DESCRIPTION OF OPERATION (ATTACHMENT Y / N):

________________________________________________________________________

________________________________________________________________________

________________________________________________________________________

TEST FLUID: _______  FLUID TEMPERATURE _______ °F  FLUID PRESSURE: _______ PSIG

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: _______  DATE: _______

ENVIRONMENTAL FACTORS: TEMPERATURE _______ °F  RELATIVE HUMIDITY _______ %

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R. O'BRIEN 08/07/2015 REV A
MECHANICAL UTILITIES TEST REPORT

PREPARED BY: R. O'BRIEN  LIFE #: 24021  DATE: 9/29/16

TEST LOCATION: 18-10 FX 1  APPLICABLE DRAWING(S): PRESSURE TEST REPORT
ATTACHMENT: Y N (CIRCLE ONE)

DESCRIPTION OF COMPONENT/SYSTEM:
DI WATER SYSTEM

MAXIMUM ALLOWABLE WORKING PRESSURE (PSIG) OF COMPONENT/SYSTEM:
150 PSIG

MECHANICAL UTILITY SYSTEM (MARK AN "X" ON ALL THAT APPLY):
PRIMARY DI WATER  □  SECONDARY DI WATER □  ALUMINUM DI WATER □
PROCESS CHILLED WATER □  COMPRESSED AIR □  GASEOUS NITROGEN □  OTHER □

IF 'OTHER' IS SELECTED, DESCRIBE THE SYSTEM:

TEST GAUGE INFORMATION:
RANGE: 0-3000  AMOUNTING UNIT OF MEASUREMENT: PSIG
SERIAL NUMBER: 8089  CALIBRATION DUE DATE: 2/4/17

OPERATIONS CONDUCTED (SELECT ALL THAT APPLY):
LEAK TEST □  FLUSH □  HYDROSTATIC PRESSURE TEST □  PNEUMATIC PRESSURE TEST □
OTHER □

IF 'OTHER' IS SELECTED, DESCRIBE THE OPERATION:

R. O'BRIEN 08/07/2015 REV A
LEAK TEST:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

TEST FLUID: **AIR**  FLUID TEMPERATURE: AMBIENT °F  FLUID PRESSURE: **< 50** PSIG

METHOD USED (VISUAL, SOAP BUBBLES, VACUUM, ETC.): **VISUAL, SOAP, ETC.**

***TEST DURATION SHALL BE AS LONG AS REQUIRED TO EVALUATE POTENTIAL LEAK POINTS***

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: **P. K.**  DATE: **11/3/16**

RECORD ACTUAL LEAK TEST DURATION HERE: **15 min.**

NO LEAKAGE PRESENT ☑  SIGNATURE: **Peter Reidel**

FLUSH:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

FLUSH FLUID: **WATER**  FLUID TEMPERATURE: AMBIENT °F  FLUID PRESSURE: **HOUSE** PSIG

FLUSH DURATION: **20** MINUTES/HOURS (CIRCLE ONE)

FLUSH PARAMETERS: **N/A**

(WRITE "N/A" IF NONE APPLY)

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: **P. K.**  DATE: **9/30**

COMMENTS:

__________________________________________

ACCEPTABLE ☑  SIGNATURE: **Peter Reidel**

PRESSURE TEST:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

TYPE: HYDROSTATIC ☑  PNEUMATIC ☐  TEST FLUID: **WATER**  FLUID TEMPERATURE: AMBIENT °F

SPECIFIED STARTING PRESSURE: **75** PSIG  SPECIFIED MAXIMUM TEST PRESSURE: **225** PSIG

SPECIFIED PRESSURE AND TIME INCREMENTS: **10/10** PSIG/MINUTES

SPECIFIED MAXIMUM TEST PRESSURE DURATION: **10** MINUTES (10 MINUTES MINIMUM)
MECHANICAL UTILITIES TEST REPORT - PAGE 3

PRESSURE TEST (CONTINUED):

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: [Signature] DATE: 10/3

ENVIRONMENTAL FACTORS: TEMPERATURE _____ °F  RELATIVE HUMIDITY _____ %

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PRESSURE TEST ACCEPTABLE ✔

TECHNICIAN SIGNATURE/LIFE NUMBER: [Signature] 25649

WITNESS SIGNATURE/LIFE NUMBER: [Signature] 25649

OTHER:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

DETAILED DESCRIPTION OF OPERATION (ATTACHMENT Y/N):

_________________________________________________________________

_________________________________________________________________

TEST FLUID: _______ FLUID TEMPERATURE _______ °F  FLUID PRESSURE: _______ PSIG

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: _______ DATE: _______

ENVIRONMENTAL FACTORS: TEMPERATURE _______ °F  RELATIVE HUMIDITY _______ %

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R. O’BRIEN 08/07/2015 REV A
OTHER (CONTINUED):

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

NOTES:

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THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

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TEST ACCEPTABLE □

TECHNICIAN SIGNATURE/LIFE NUMBER: ________________________________

WITNESS SIGNATURE/LIFE NUMBER: ________________________________

R. O'BRIEN 08/07/2015 REV A
MECHANICAL UTILITIES TEST REPORT

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

PREPARED BY: R. O'BRIEN LIFE #: 24021 DATE: 10/20/16

TEST LOCATION: 18-10 EX 1 APPLICABLE DRAWING(S): TEST SHEET ATTACHMENT 2 SHEETS
ATTACHMENT Y N (CIRCLE ONE)

DESCRIPTION OF COMPONENT/SYSTEM:

1/2" COMPRESSED AIR SYSTEM

MAXIMUM ALLOWABLE WORKING PRESSURE (PSIG) OF COMPONENT/SYSTEM:

90 PSIG-

MECHANICAL UTILITY SYSTEM (MARK AN "X" ON ALL THAT APPLY):

PRIMARY DI WATER □ SECONDARY DI WATER □ ALUMINUM DI WATER □
PROCESS CHILLED WATER □ COMPRESSED AIR X GASEOUS NITROGEN □ OTHER □

IF 'OTHER' IS SELECTED, DESCRIBE THE SYSTEM:

__________________________

__________________________

TEST GAUGE INFORMATION:

RANGE: 0 - 300 PSIG- UNIT OF MEASUREMENT: PSIG-

SERIAL NUMBER: M014904 CALIBRATION DUE DATE: 9/11/17

OPERATIONS CONDUCTED (SELECT ALL THAT APPLY):

LEAK TEST X FLUSH □ HYDROSTATIC PRESSURE TEST □ PNEUMATIC PRESSURE TEST X

OTHER □

IF 'OTHER' IS SELECTED, DESCRIBE THE OPERATION:

__________________________

__________________________

R. O'BRIEN 08/07/2015 REV A
LEAK TEST:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

TEST FLUID: AIR  FLUID TEMPERATURE: AMBIENT °F  FLUID PRESSURE: < 50 PSIG

METHOD USED (VISUAL, SOAP BUBBLES, VACUUM, ETC.): VISUAL, ETC.

***TEST DURATION SHALL BE AS LONG AS REQUIRED TO EVALUATE POTENTIAL LEAK POINTS***

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: K.B./AR  DATE: 10/24/16

RECORD ACTUAL LEAK TEST DURATION HERE: 3 Hours

NO LEAKAGE PRESENT  /  SIGNATURE:

FLUSH:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

FLUSH FLUID:  FLUID TEMPERATURE: °F  FLUID PRESSURE: PSIG

FLUSH DURATION: MINUTES/HOURS (CIRCLE ONE)

FLUSH PARAMETERS: (WRITE "N/A" IF NONE APPLY)

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY:  DATE:

COMMENTS:

ACCEPTABLE  □  SIGNATURE:

PRESSURE TEST:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

TYPE: HYDROSTATIC  □  PNEUMATIC  X  TEST FLUID: AIR  FLUID TEMPERATURE: AMBIENT

SPECIFIED STARTING PRESSURE: 75 PSIG  SPECIFIED MAXIMUM TEST PRESSURE: 150 PSIG

SPECIFIED PRESSURE AND TIME INCREMENTS: 15/10 PSIG/MINUTES

SPECIFIED MAXIMUM TEST PRESSURE DURATION: 10 MINUTES (10 MINUTES MINIMUM)

R. O'BRIEN 08/07/2015 REV A
MECHANICAL UTILITIES TEST REPORT – PAGE 3

PRESSURE TEST (CONTINUED):

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: Mr/Ar DATE: 10-24-16

ENVIRONMENTAL FACTORS: TEMPERATURE _________ °F RELATIVE HUMIDITY _________ %

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PRESSURE TEST ACCEPTABLE /  TECHNICIAN SIGNATURE/LIFE NUMBER: 25531 7x

WITNESS SIGNATURE/LIFE NUMBER: 22895

OTHER:

THIS SECTION TO BE COMPLETED BY COGNIZANT ENGINEER

DETAILED DESCRIPTION OF OPERATION (ATTACHMENT Y/N):

________________________________________________________________________

________________________________________________________________________

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TEST FLUID: _________ FLUID TEMPERATURE _________ °F FLUID PRESSURE: _________ PSIG

THIS SECTION TO BE COMPLETED BY QUALIFIED TECHNICIAN

CONDUCTED BY: _________ DATE: _________

ENVIRONMENTAL FACTORS: TEMPERATURE _________ °F RELATIVE HUMIDITY _________ %

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R. O'BRIEN 08/07/2015 REV A