

Pelton, Jason M (DEC)

From: Capps, Dustin <dustin.capps@aptim.com>
Sent: Thursday, November 12, 2020 9:28 AM
To: Murray, Brian S CIV USN NAVFAC MIDLANT NOR (USA); Sokolowski, Scott C CIV USN NAVFAC MIDLANT NOR (USA); Shukis, Christopher R CIV NAVFAC MIDLANT, PWD New London; Tancreti, Leo P CIV USN NAVFAC MIDLANT NOR (USA)
Cc: Pelton, Jason M (DEC); Smeal, Monica; Kinley, James (CFS); Hummel, Andrew
Subject: N62470-16-D-9004.N4008517F5347 Former NWIRP Bethpage Phase I RE-108 Area Hotspot Treatment System Submittal SD-06-002
Attachments: N62470.16.D.9004.N4008517F5347 Submittal SD-06-002.pdf; 9004.F5347 HDPE Pipe Segment Pressure Test Reports.pdf

ATTENTION: This email came from an external source. Do not open attachments or click on links from unknown senders or unexpected emails.

ALCON,

Submittal SD-06-002 has been uploaded to the submittal register and distributed for the record. The submittal and supporting documents have also been attached for your convenience.

This submittal includes the pneumatic and hydrostatic testing reports of the dual-containment HDPE pipe segments. All segments passed pressure testing.

A final test will be conducted once all segments have been welded together and the pipe installed.

Very respectfully,

DUSTIN K. CAPPS, P.E.

Engineer 2

APTIM | Technical Services

O 757 640 6963

M 757 373 1963

E dustin.capps@aptim.com



150 Boush Street, suite 701
Norfolk, VA 23510

APTIM.com



PNEUMATIC PRESSURE TEST REPORT

Test Report #:	1	Revision:	Date: 10/27/2020
Project #:	APTIM	Description:	5 psi Air Test
Job #:	501012	Client:	APTIM

System/Test Description:			
Design Code:		Min Design Metal Temp:	
Test Pressure:	5 PSI	Test Duration:	1 hour
Test Medium:	AIR	Permissible leakage Rate:	per
Test Package #:		ITP #	

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)	
1	fusion - 64 through 72 10/14/2020
2	
3	
4	
5	

Test Steps	
Date of Test:	10/27/2020

Checks		Initials	Date (mm/dd/yy)
1	Required Regulatory & Client notifications completed prior to pneumatic	J.P.	10/27/2020 ↓
2	Pre-test inspection complete	J.P.	
3	NDE/PWHT performed and accepted	N/A	
4	Test package approved and piping released for Test	J.P.	
5	Pneumatic test conducted in accordance with Test Package	J.P.	
6	Cleaning / Draining / Air Blowing as applicable completed after pressure test	N/A	
7	Line restoration completed after pressure test	N/A	

Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
Ashcraft	D#C 67158	1 lb increments	0 to 100	2938	9/20/2020

Test Data							
Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
10/27/2020	2:00 PM	540			5 psi		

Test Conducted By:			
Joe Paul	Owner	[Signature]	10/27/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)
Final Evaluation and Acceptance			
Dustin Capps	QC	[Signature]	10/27/2020
APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)



HYDROSTATIC PRESSURE TEST REPORT

Test Report #:	1	Revision:		Date:	10/27/2020
Project #:	APTIm	Description:	96 PSI Water Test		
Job #:	501012	Client:	APTIm		

System/Test Description:					
Design Code:		Min Design Metal Temp:			
Test Pressure:	96 PSI	Test Duration:	3 hrs		
Test Medium:	Water	Permissible leakage Rate:		per	
Test Package #:		ITP #			

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)						
1	fusions #5 - 64 through 72				10/14 fusion date	
2						
3						
4	820 gallons					
5						

Test Steps					
Date of Test:	10/27/2020				

Checks	Initials	Date (mm/dd/yy)
1 Required Regulatory & Client notifications completed prior to hydrotest	J.P.	10/27/2020
2 Pre-hydro inspection complete	J.P.	
3 NDE/PWHT performed and accepted	N/A	
4 Test package approved and piping released for Test	J.P.	
5 Hydro test conducted in accordance with Hydro Test Package	J.P.	
6 Cleaning / Draining / Air Blowing as applicable completed after pressure test	N/A	
7 Line restoration completed after pressure test	N/A	

Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
Aircoft	D5C67158	1-lb increment gauge	0 to 100	892E	9/2020

Test Data							
Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
10/27	9:05 AM	51°	51°	49	96 PSI		

Test Conducted By:			
JOE PAUL	Owner	[Signature]	10/27/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)
Final Evaluation and Acceptance			
Dustin Capps	QCM	[Signature]	10/27/2020
APTIm Representative (Print)	Title	Signature	Date (mm/dd/yy)
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)



PNEUMATIC PRESSURE TEST REPORT

Test Report #:	2	Revision:		Date:	10/28/2020	
Project #:	APTIM	Description:	Air Test			
Job #:	501012	Client:				

System/Test Description:

Design Code:		Min Design Metal Temp:			
Test Pressure:	5PSI	Test Duration:	1 hr.		
Test Medium:	AIR	Permissible leakage Rate:		per	
Test Package #:		ITP #			

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)

1	Fusion numbers - 1-12
2	
3	
4	
5	

Test Steps

Date of Test:	10/28/2020
---------------	------------

Checks

#	Description	Initials	Date (mm/dd/yy)
1	Required Regulatory & Client notifications completed prior to pneumatic	J.P.	10/28/2020
2	Pre-test inspection complete	J.P.	
3	NDE/PWHT performed and accepted	N/R	
4	Test package approved and piping released for Test	J.P.	
5	Pneumatic test conducted in accordance with Test Package	J.P.	
6	Cleaning / Draining / Air Blowing as applicable completed after pressure test	N/A	
7	Line restoration completed after pressure test	N/A	↓

Test Instruments

Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
Ashcroft	09 C67158	1 lb. increments	0 to 100 psi	8928	9/2020

Test Data

Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
10/28/2020	12:20	52°				5 PSI	

Test Conducted By:

JOE PAUL	Owner - APA Inc	[Signature]	10/28/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)

Final Evaluation and Acceptance

Dustin Capps	QCM	[Signature]	10/28/2020
APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)

1-4 → 10/6
5-12 - 10/7



Form Number: AMS-720-03-FM-30902

Revision: 0

Approval Date: 1/14/2019

HYDROSTATIC PRESSURE TEST REPORT

Test Report #: 2	Revision:	Date: 10/28/2020
Project #: APTIM	Description: Test section #38	
Job #:	Client:	

System/Test Description:			
Design Code:	Min Design Metal Temp:		
Test Pressure: 96 PSI	Test Duration: 3 hrs		
Test Medium: Water	Permissible leakage Rate:	per	
Test Package #:	ITP #		

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)	
1	<i>Fusion numbers 1 through 12 - 10/6 & 10/7 (5-12)</i>
2	
3	
4	1,049 gallons
5	

Test Steps
Date of Test: 10/28/2020

Checks	Initials	Date (mm/dd/yy)
1 Required Regulatory & Client notifications completed prior to hydrotest	<i>J.P.</i>	10/28/2020
2 Pre-hydro inspection complete	<i>S.P.</i>	
3 NDE/PWHT performed and accepted	<i>N/A</i>	
4 Test package approved and piping released for Test	<i>S.P.</i>	
5 Hydro test conducted in accordance with Hydro Test Package	<i>J.P.</i>	
6 Cleaning / Draining / Air Blowing as applicable completed after pressure test	<i>N/A</i>	
7 Line restoration completed after pressure test	<i>N/A</i>	

Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
<i>As herofT</i>	<i>D#C 67158</i>	<i>1 lb. increments gauge</i>	<i>0 to 100 PSI</i>	<i>8928</i>	<i>9/2020</i>

Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
10/28/2020	9:30	52°	54°	49	96 PSI	96 PSI	96 PSI

Test Conducted By:			
<i>Joe Paul</i>	<i>Owner</i>	<i>[Signature]</i>	10/28/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)
Final Evaluation and Acceptance			
<i>Dustin Capps</i>	<i>QC M</i>	<i>[Signature]</i>	10/28/2020
APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)



PNEUMATIC PRESSURE TEST REPORT

Test Report #: <u>3</u>	Revision:	Date: <u>10/29/2020</u>
Project #:	Description:	
Job #:	Client:	

System/Test Description:			
Design Code:	Min Design Metal Temp:		
Test Pressure: <u>5 psi</u>	Test Duration: <u>1 hr</u>		
Test Medium:	Permissible leakage Rate:	per	
Test Package #:	ITP #		

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)	
1	<u>Flange numbers 13 to 24</u>
2	
3	
4	
5	

Test Steps	
Date of Test:	

Checks		Initials	Date (mm/dd/yy)
1	Required Regulatory & Client notifications completed prior to pneumatic	<u>J.P.</u>	<u>10/29/2020</u>
2	Pre-test inspection complete	<u>J.P.</u>	
3	NDE/PWHT performed and accepted	<u>N/A</u>	↓
4	Test package approved and piping released for Test	<u>J.P.</u>	
5	Pneumatic test conducted in accordance with Test Package	<u>J.P.</u>	
6	Cleaning / Draining / Air Blowing as applicable completed after pressure test	<u>N/A</u>	
7	Line restoration completed after pressure test	<u>N/A</u>	

Test Instruments					
Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
<u>Ashtcroft</u>	<u>DPC67158</u>	<u>1 lb increments</u>	<u>0 to 100</u>	<u>9928</u>	<u>9/20/2020</u>

Test Data							
Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
<u>10/29/2020</u>	<u>12:57</u>	<u>52</u>				<u>5 psi</u>	

Test Conducted By:			
<u>Joe Paul</u>	<u>Beaver-PPA Inc</u>	<u>Joe Paul</u>	<u>10/29/2020</u>
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)

Final Evaluation and Acceptance			
<u>Dustin Capps</u>	<u>QCM</u>	<u>[Signature]</u>	<u>10/29/2020</u>
APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)



HYDROSTATIC PRESSURE TEST REPORT

Test Report #:	3	Revision:		Date:	10/29/2020
Project #:	APTIM	Description:	Test section #3		
Job #:		Client:			

System/Test Description:					
Design Code:			Min Design Metal Temp:		
Test Pressure:	96 psi		Test Duration:	3 hrs	
Test Medium:	water	Permissible leakage Rate:		per	
Test Package #:		ITP #			

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)	
1	Fusion numbers 13 through 24
2	
3	974 gallons
4	
5	

Test Steps	
Date of Test:	10/29

Checks		Initials	Date (mm/dd/yy)
1	Required Regulatory & Client notifications completed prior to hydrotest	J.P.	10/29/2020
2	Pre-hydro inspection complete	J.P.	
3	NDE/PWHT performed and accepted	N/A	
4	Test package approved and piping released for Test	J.P.	
5	Hydro test conducted in accordance with Hydro Test Package	J.P.	
6	Cleaning / Draining / Air Blowing as applicable completed after pressure test	N/A	
7	Line restoration completed after pressure test	N/A	

Test Instruments					
Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
Ashcroft	D#C67158	1 lb increments	0 to 100	8928	9/30/2020

Test Data							
Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
10/29/2020	8:57 AM	49	52	50	96 psi	96 psi	96 psi

Test Conducted By:			
Joe Paul	owner	[Signature]	10/29/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)

Final Evaluation and Acceptance			
Dustin Capps	OCM	[Signature]	10/29/2020
APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)



Form Number: AMS-720-03-FM-30902.01

3997

Revision: 0

Approval Date: 1/14/2019

PNEUMATIC PRESSURE TEST REPORT

Test Report #:	4	Revision:		Date:	10/29/2020
Project #:	APTIM	Description:	Air test		
Job #:	501012	Client:			

System/Test Description:					
Design Code:		Min Design Metal Temp:			
Test Pressure:	5 PSI	Test Duration:	1 hour		
Test Medium:	Air	Permissible leakage Rate:		per	
Test Package #:		ITP #			

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)			
1	faint	25-36	10/9
2			
3			
4			
5			

Test Steps	
Date of Test:	10/29/2020

Checks	Initials	Date (mm/dd/yy)
1 Required Regulatory & Client notifications completed prior to pneumatic	J.P.	10/29/2020
2 Pre-test inspection complete	J.P.	
3 NDE/PWHT performed and accepted	N/A	
4 Test package approved and piping released for Test	J.P.	
5 Pneumatic test conducted in accordance with Test Package	J.P.	
6 Cleaning / Draining / Air Blowing as applicable completed after pressure test	N/A	
7 Line restoration completed after pressure test	N/A	

Test Instruments					
Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
Calcraft	D#C67158	1 lb-increments	0 to 100	8928	9/20/2020

Test Data							
Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
10/29/2020	2:53pm	46	51		5psi		

Test Conducted By:			
Joe Paul	OWNER	[Signature]	10/29/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)
Final Evaluation and Acceptance			
Dustin Capps	QC/M	[Signature]	10/29/2020
APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)



HYDROSTATIC PRESSURE TEST REPORT

Test Report #: #4	Revision:	Date: 10/30/2020
Project #: APTIM	Description: 96 PSI water test	
Job #: 5010 13	Client: APTIM	

System/Test Description:

Design Code:	Min Design Metal Temp:
Test Pressure: 96 PSI	Test Duration: 3 hrs
Test Medium: WATER	Permissible leakage Rate: per
Test Package #:	ITP #

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)

1	Fusions - 25 to 36	10/9
2		
3	1,014 gallons	
4		
5		

Test Steps

Date of Test: 10/30/2020

Checks

1	Description	Initials	Date (mm/dd/yy)
1	Required Regulatory & Client notifications completed prior to hydrotest	S.P.	10/30/2020
2	Pre-hydro inspection complete	S.P.	
3	NDE/PWHT performed and accepted	N/A	
4	Test package approved and piping released for Test	S.P.	
5	Hydro test conducted in accordance with Hydro Test Package	S.P.	
6	Cleaning / Draining / Air Blowing as applicable completed after pressure test	N/A	
7	Line restoration completed after pressure test	N/A	

Test Instruments

Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
Ashcroft	D# 67158	1 lb increments	0 to 100	8928	9/20/2020

Test Data

Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
10/30/2020		38°	40°	42°	96 PSI		

Test Conducted By:

JOE PAUL	Owner PPA Inc	[Signature]	10/30/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)
Dustin Capps	QCM	[Signature]	10/30/2020
APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)



PNEUMATIC PRESSURE TEST REPORT

Test Report #:	5	Revision:		Date:	10/30/2020
Project #:	APTIM	Description:			
Job #:	501012	Client:			

System/Test Description:					
Design Code:		Min Design Metal Temp:			
Test Pressure:	5 psi	Test Duration:	1 hour		
Test Medium:	Air	Permissible leakage Rate:		per	
Test Package #:		ITP #			

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)					
1	flanges - 37 through 48				
2					
3					
4					
5					

Test Steps					
Date of Test:					

Checks	Description	Initials	Date (mm/dd/yy)
1	Required Regulatory & Client notifications completed prior to pneumatic	J.P.	10/30/2020
2	Pre-test inspection complete	J.P.	↓
3	NDE/PWHT performed and accepted	N/A	
4	Test package approved and piping released for Test	J.P.	
5	Pneumatic test conducted in accordance with Test Package	J.P.	
6	Cleaning / Draining / Air Blowing as applicable completed after pressure test	N/A	
7	Line restoration completed after pressure test	N/A	

Test Instruments					
Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
Ashcroft	DPC67158	1 lb. increments	0 to 100	8928	9/20/2020

Test Data							
Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
10/30/2020	2:13 PM	44	45				

Test Conducted By:			
Joe Paul	Owner	[Signature]	10/30/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)

Final Evaluation and Acceptance			
Dustin Capps	QCM	[Signature]	10/30/2020
APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)



HYDROSTATIC PRESSURE TEST REPORT

Test Report #: 5	Revision:	Date: 11/2/2020
Project #: APTIM	Description: 96 Psi water	
Job #: 501012	Client:	

System/Test Description:

Design Code:	Min Design Metal Temp:
Test Pressure: 96 psi	Test Duration: 3 hrs
Test Medium: water	Permissible leakage Rate: _____ per _____
Test Package #:	ITP #

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)
1 flanges - 37 through 48 - 11/9/2020
2
3 + 235 gallons
4 1,000
5

Test Steps

Date of Test: **11/2/2020**

Checks	Initials	Date (mm/dd/yy)
1 Required Regulatory & Client notifications completed prior to hydrotest	J.P	11/2/2020
2 Pre-hydro inspection complete	J.P	
3 NDE/PWHT performed and accepted	N/A	
4 Test package approved and piping released for Test	J.P	
5 Hydro test conducted in accordance with Hydro Test Package	J.P	
6 Cleaning / Draining / Air Blowing as applicable completed after pressure test	N/A	
7 Line restoration completed after pressure test	N/A	

Test Instruments

Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
Ashcroft	D4C67158	1 lb increments	0 to 100 psi	8928	9/22/2020

Test Data

Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
11/2/2020	10:08 AM	36	36	39			
	10:05 AM	1:05 PM					

Test Conducted By:

JOE PAUL	owner	[Signature]	11/2/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)

Final Evaluation and Acceptance

APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
Andrew Hummel	QC	[Signature]	11/2/2020
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)



PNEUMATIC PRESSURE TEST REPORT

Test Report #:	7	Revision:		Date:	11/2/2020
Project #:	APTIM	Description:	5 PSI Air test		
Job #:	50102	Client:	APTIM		

System/Test Description:					
Design Code:			Min Design Metal Temp:		
Test Pressure:	5 PSI		Test Duration:	1 hour	
Test Medium:	Air	Permissible leakage Rate:		per	
Test Package #:		ITP #			

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)	
1	fusion numbers 49 through 63 12/13/2020
2	
3	
4	
5	

Test Steps	
Date of Test:	11/3/2020 ^{J.P.} 11/2/2020

Checks	Initials	Date (mm/dd/yy)
1 Required Regulatory & Client notifications completed prior to pneumatic	J.P.	11/2/2020
2 Pre-test inspection complete	J.P.	↓
3 NDE/PWHT performed and accepted	N/A	
4 Test package approved and piping released for Test	J.P.	
5 Pneumatic test conducted in accordance with Test Package	J.P.	
6 Cleaning / Draining / Air Blowing as applicable completed after pressure test	N/A	
7 Line restoration completed after pressure test	N/A	

Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
Airswift	DSC6715B	1 lb increments	0 to 100	8928	9/30/2020

Test Data							
Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
11/2/2020	8:25 AM	37	37	41	5 PSI	5 PSI	

Test Conducted By:			
JOE PAUL	Owner - PPA Inc	[Signature]	11/2/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)

Final Evaluation and Acceptance			
APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
[Signature]	QC	[Signature]	11/2/2020
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)



HYDROSTATIC PRESSURE TEST REPORT

Test Report #:	6	Revision:		Date:	11/2/2020
Project #:	APTIM	Description:	96 PSI		
Job #:	501012	Client:	APTIM		

System/Test Description:

Design Code:		Min Design Metal Temp:	
Test Pressure:	96 PSI	Test Duration:	3 hrs
Test Medium:	WATER	Permissible leakage Rate:	per
Test Package #:		ITP #	

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)

1	fusion numbers - 49 through 63	10/13/63
2		
3		
4		1,235
5		

Test Steps

Date of Test:	11/2/2020
---------------	-----------

Checks	Initials	Date (mm/dd/yy)
1 Required Regulatory & Client notifications completed prior to hydrotest	J.P.	11/2/2020
2 Pre-hydro inspection complete	J.P.	↓
3 NDE/PWHT performed and accepted	N/A	
4 Test package approved and piping released for Test	J.P.	
5 Hydro test conducted in accordance with Hydro Test Package	J.P.	
6 Cleaning / Draining / Air Blowing as applicable completed after pressure test	N/A	
7 Line restoration completed after pressure test	N/A	

Test Instruments

Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
Ashcraft	D&C67158	1 lb. increments	0 to 100	8920	9/20/2020

Test Data

Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
11/2/2020	12:45 pm	39	40	42	96 PSI	96 PSI	

Test Conducted By:

Joe Paul	Owner - PPA Inc	[Signature]	11/2/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)

Final Evaluation and Acceptance

APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
Arden Hummel	DC	[Signature]	11/2/2020
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)



HYDROSTATIC PRESSURE TEST REPORT

Test Report #:	7-	Revision:		Date:	11/6/2020
Project #:	Aptim	Description:	Directional drill section under Road		
Job #:	501012	Client:	APTIM		

System/Test Description:					
Design Code:		Min Design Metal Temp:			
Test Pressure:	96 PSI	Test Duration:	3 hrs.		
Test Medium:	Water	Permissible leakage Rate:		per	
Test Package #:		ITP #			

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)					
1	Section under roadway - Directional drill				
2					
3					
4					
5					

Test Steps					
Date of Test:	11/6/2020				

Checks					
1	Required Regulatory & Client notifications completed prior to hydrotest	Initials	Date (mm/dd/yy)		
2	Pre-hydro inspection complete	J.P.	11/6/2020 ↓ ✓		
3	NDE/PWHT performed and accepted	J.P.			
4	Test package approved and piping released for Test	N/A			
5	Hydro test conducted in accordance with Hydro Test Package	J.P.			
6	Cleaning / Draining / Air Blowing as applicable completed after pressure test	N/A			
7	Line restoration completed after pressure test	N/A			

Test Instruments					
Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
Adecraft	D5C7158	1 lb increments	0 to 100	8928	9/2020

Test Data							
Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
11/6/2020	1:20	65	76	56	96 PSI	96 PSI	

Test Conducted By:			
Joe Paul	OWNER	[Signature]	11/6/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)

Final Evaluation and Acceptance			
APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
Andrea Howard	QC	[Signature]	11-06-2020
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)



Form Number: AMS-720-03-FM-30902.01

Revision: 0

Approval Date: 1/14/2019

PNEUMATIC PRESSURE TEST REPORT

Test Report #:	8	Revision:		Date:	11/6/2020
Project #:	APTIM	Description:			
Job #:	501012	Client:			

System/Test Description:					
Design Code:		Min Design Metal Temp:			
Test Pressure:	5 PSI	Test Duration:	1 hr.		
Test Medium:	AIR	Permissible leakage Rate:		per	
Test Package #:		ITP #			

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)					
1	Air test section under roadway				
2					
3					
4					
5					

Test Steps	
Date of Test:	11/6/2020

Checks	Initials	Date (mm/dd/yy)
1 Required Regulatory & Client notifications completed prior to pneumatic	J.P	11/6/2020
2 Pre-test inspection complete	J.P	↓
3 NDE/PWHT performed and accepted	N/A	
4 Test package approved and piping released for Test	J.P	
5 Pneumatic test conducted in accordance with Test Package	J.P	
6 Cleaning / Draining / Air Blowing as applicable completed after pressure test	N/A	
7 Line restoration completed after pressure test	N/A	

Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
Aircraft	D5C759	1-lb increments	0 to 100	8928	9/2020

Test Data							
Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
11/6/2020	9:10	62	75		5 PSI		

Test Conducted By:			
JOE PAUL	OWNER	[Signature]	11/6/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)

Final Evaluation and Acceptance			
[Signature]	[Signature]	[Signature]	[Signature]
APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
Andrew Hummel	QC	[Signature]	11-6-2020
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)



Form Number: AMS-720-03-FM-30902.01

Revision: 0

Approval Date: 1/14/2019

PNEUMATIC PRESSURE TEST REPORT

Test Report #: #10	Revision:	Date: 11/16/2020
Project #: APTIM	Description: Air Test	
Job #: 501012	Client: APTIM	

System/Test Description:			
Design Code:	Min Design Metal Temp:		
Test Pressure: 5 PSI	Test Duration: 1 hour		
Test Medium: AIR	Permissible leakage Rate:	per	
Test Package #:	ITP #		

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)	
1	Recharge Basin 495 Segment
2	
3	
4	Start 6960 End 8360 <i>1450 gallons</i>
5	

Test Steps	
Date of Test:	11/16/2020

Checks	Initials	Date (mm/dd/yy)
1 Required Regulatory & Client notifications completed prior to pneumatic	J.P.	11/16/2020
2 Pre-test inspection complete	J.P.	↓
3 NDE/PWHT performed and accepted	N/A	
4 Test package approved and piping released for Test	J.P.	
5 Pneumatic test conducted in accordance with Test Package	J.P.	
6 Cleaning / Draining / Air Blowing as applicable completed after pressure test	N/A	
7 Line restoration completed after pressure test	N/A	

Test Instruments					
Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
Ashcroft	D/C715B	1 lb increment gauge	0 to 100 PSI	8928	9/30/20

Test Data							
Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
11/16/2020	2:20 pm	68	79	57	5 psi	5 PSI	

Test Conducted By:			
JOE PAUL	Owner PPA Inc		11/16/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)

Final Evaluation and Acceptance			
APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
Andrew Harnett	QC		11-20-20
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)



HYDROSTATIC PRESSURE TEST REPORT

Test Report #:	9	Revision:		Date:	11/10/2020
Project #:	APTIM	Description:	Water Test		
Job #:	501012	Client:			

System/Test Description:					
Design Code:		Min Design Metal Temp:			
Test Pressure:	96 PSI	Test Duration:	3 hours		
Test Medium:	Water	Permissible leakage Rate:		per	
Test Package #:		ITP #			

Drawing #/Sketch#/Line#/Piece# (with start and finish location identified as applicable)	
1	Recharge Basin - Segment 495
2	
3	
4	
5	

Test Steps	
Date of Test:	11/10/2020

Checks		Initials	Date (mm/dd/yy)
1	Required Regulatory & Client notifications completed prior to hydrotest	J.P.	11/10/2020
2	Pre-hydro inspection complete	J.P.	↓
3	NDE/PWHT performed and accepted	N/A	
4	Test package approved and piping released for Test	J.P.	
5	Hydro test conducted in accordance with Hydro Test Package	J.P.	
6	Cleaning / Draining / Air Blowing as applicable completed after pressure test	N/A	
7	Line restoration completed after pressure test	N/A	

Test Instruments					
Manufacturer	ID. No.	Description	Range	Serial No.	Calibration Due Date (mm/dd/yy)
Ashcroft	D#C 7158	1 lb. increment gauge	0 to 100 PSI	8928	9/2020

Test Data							
Date (mm/dd/yy)	Time	Ambient Temp	Pipe Temp	Medium Temp	Test Pressure	Pressure Gauge Reading (Bottom)	Pressure Gauge Reading (Top)
11/10/2020	10:20 AM	64	70	60	96 PSI	96 PSI	

Test Conducted By:			
JOE PAUL	Owner PPA Inc	[Signature]	11/10/2020
Testing Representative (Print)	Title	Signature	Date (mm/dd/yy)

Final Evaluation and Acceptance			
APTIM Representative (Print)	Title	Signature	Date (mm/dd/yy)
Andrew Hummel	QC	[Signature]	11-10-2020
Client Representative (Print)	Title	Signature	Date (mm/dd/yy)
ANI (Print)	Title	Signature	Date (mm/dd/yy)