

INSPECTION AND TESTING FORM OF WATER BASED FIRE PROTECTION SYSTEMS: FIRE PUMPS

*This form is to be completed by the system inspection and testing contractor at the time of a system test.
Insert N/A in all unused lines.*

System Name: Philadelphia Charter School Building(s):
Equipment Group Name: 01 - Bsmt Fire Command

1. PROPERTY INFORMATION

Name of property: Philadelphia Charter School (4433-19124-00025)
Address: 1197 HAWORTH ST. Philadelphia, PA 19124
Description of property: School
Name of property representative: THE PHILADELPHIA CHARTER SCHOOL FOR (30454774), None
Address: 1197 HAWORTH ST, PHILADELPHIA, PA 19124
Phone: None Fax: None E-mail: None

2. TESTING INFORMATION

Testing Organization: SIEMENS Organization License No.: NA
Address: 1450 Union Meeting Road, Blue Bell, PA 19422
Phone: 215-654-8040 Fax: NA E-mail: NA
Start Date/Time: 2024-06-21 7:00am Completion Date/Time: 2024-06-21 3:00pm
Contract Info: BPA2 FIS Philadelphia Charter (2600124827) Notification Number: 5102615798
Inspection Type: Annual

NOTES: 1) All questions are to be answered Yes, No, or Not Applicable (NA). Explain all No answers in Parts 6, 7, or 8 of this form.
2) Inspection, Testing, and Maintenance are to be performed with water supplies (including fire pumps) in service, unless the impairment procedures of NFPA 25 are followed.

3. GENERAL INFORMATION (TO BE COMPLETED BY OWNER)

Is the Fire Pump in service? ☐ Yes ☐ No ☐ (NA)
Has the private fire service main system remained in service since the last inspection? ☐ Yes ☐ No ☐ (NA)
Are the systems supplied by the main free of actuation of devices or alarms since the last inspection? ☐ Yes ☐ No ☐ (NA)

4. INSPECTOR'S SECTION

4.1 Inspections

Heat in pump room is 40° or higher?	Yes
Intake air louvers in pump room appear operational?	(NA)
Pump suction, discharge, and bypass valves are open?	Yes
No piping or hoses leak?	Yes
Fire pump leaking one drop of water per second at seals?	Yes
Suction line pressure is normal?	Yes
System line pressure is normal?	Yes
Suction reservoir is full?	(NA)
Controller pilot light (power on) is illuminated?	Yes
Transfer switch normal power light is illuminated?	(NA)
Isolating switch for standby power is closed?	(NA)
Reverse-phase alarm light is not illuminated?	(NA)
Normal-phase rotation light is illuminated?	Yes
Oil level in vertical motor sight glass is normal?	(NA)
Diesel fuel tank is at least 2/3 full?	(NA)
Controller selector switch is in "auto" position?	Yes
Voltage readings for batteries (2) are normal?	(NA)

Charging current readings are normal for batteries?	(NA)
Pilot lights for batteries are "on" or battery failure pilot lights are "off" ?	(NA)
All alarm pilot lights are "off" ?	Yes
Record engine running time from meter?	Yes
Oil level is normal in right-angle gear-drive pumps?	(NA)
Crankcase oil level is normal?	(NA)
Cooling water level is normal?	(NA)
Electrolyte level in batteries is normal?	(NA)
Battery terminals are free of corrosion?	(NA)
Water-jacket heater is operational?	(NA)
For steam-driven pumps, steam pressure is normal?	(NA)
Examine exhaust system for leaks?	(NA)
Check lube oil heater for operation (diesel pumps) ?	(NA)
Drain condensate trap of cooling system?	(NA)
Check for water in diesel fuel tank?	(NA)
Compare pressure transducer pressure to discharge pressure on fire pump (applicable controllers) ?	(NA)
Inspect pump coupling alignment? ?	Yes

4.2 Testing

Operate fire pump for 10 minutes (30 minutes for diesel pump)?	Yes
Check packing gland tightness (slight leak at no flow)?	Yes
Adjust gland nuts if necessary?	Yes
Check for unusual noise or vibration?	Yes
Check packing boxes, bearings, or pump casing for overheating?	Yes
Check oil pressure gauge, speed indicator, water & oil temperatures while engine is running?	(NA)
Check heat exchanger for cooling water flow?	(NA)
Record steam pressure for steam-operated pumps	NA (NA)
Check water tank float switch?	(NA)
Check solenoids for proper operation?	(NA)
Operate speed governor (internal combustion engine only)?	(NA)
Check steam trap (steam turbine only)?	(NA)
Check steam relief valve (steam turbine only)?	(NA)
Check controller alarms?	Yes
Flow test was performed by?	(NA)
Automatic Transfer test simulated during peak flow?	(NA)
During the Automatic transfer test, did the normal power reconnect to the normal source?	(NA)
All alarms conditions simulated and operated?	Yes

5. FIRE PUMP PERFORMANCE TEST RESULTS

5.1 Pump Information

Fire Pumps - Electric																	
Pump ID	Location	Shaft	Manufacturer	Approved	Shop or Serial No.	Model Number	Rated GPM	Head PSI at Churn	Head PSI at 100%	Head PSI at 150%	Rated RPM	Suction From	Size Conn. Inch.	Tank Size Gallons	Tank Height Feet	Pass/Fail	Date
01:FP-01	Basement	Horizontal	Patterson	Yes	FPO15000	18x6	1500				1780	City	8"			Pass	2024-06-21

5.2 Driver

Pump ID	Manufacturer	Approved	Shop or Serial No.	Model Number	Horse Power	Rated RPM	Motor/Engine	Engine Run Hours	Rated Volts	Rated Amps	Hz. Cycles	Service Factor
01:FP-01	US Electric Motors	Yes	B0797084469-001R				Electric Motor		460	168	60	1.15

5.3 Controller

Pump ID	Manufacturer	Approved	Shop or Serial No.	Model Number	Start PSI	Start Method	Stop PSI	Stop Method	Jockey Pump Tested	On PSI	Off PSI
01:FP-01	Joslyn Clark	Yes	C164183-1	C7B224	115	Auto - PSI Drop		Manual	Yes	150	190

5.4 Check Points

Pump ID	Jockey Pump Overall Condition	Fire Pump Overall Condition	Fire Pump Controller Overall Condition	Engine Run Hours	Gauges	Pressure Relief Valve	Packing and Drain Condition
01:FP-01	Good	Good	Good		Good	Good	Good

5.5 Variable Speed Pump Test Results

5.6 Pump Test Results

(Test 1 = Churn Test; Test 2 = 100%; Test 3 = 150%; APS Test = Alternate Power Source at 100%)

Pump ID	Pump Rated RPM	Test 1 RPM	Test 1 Suction PSI	Test 1 Discharge PSI	Test 1 Net PSI	Test 1 Rated PSI	Test 1 PC Net PSI	Test 1 Flow GPM	Test 2 RPM	Test 2 Suction PSI	Test 2 Discharge PSI	Test 2 Net PSI	Test 2 Rated PSI	Test 2 PC Net PSI	Test 2 Flow GPM	Test 3 RPM	Test 3 Suction PSI	Test 3 Discharge PSI	Test 3 Net PSI	Test 3 Rated PSI	Test 3 PC Net PSI	Test 3 Flow GPM
01:FP-01	1780		52	170	118					20	130	110					0	100	100			

Rated PSI - Factory rated curve from manufacture; **Net PSI** - Difference between suction and discharge psi; **Net Speed Adjusted PSI** - Pressure corrected using the affinity law in relation to rated speed (rpm) and measured speed (rpm); **5% Degradation PSI** - Benchmark curve to compare the rated and net psi in reference to NFPA 25 performance criteria

6. COMMENTS

7. DEFICIENCIES (ONLY RELATED TO NFPA 25)

A condition that will or has the potential to adversely impact the performance of a system or portion thereof but does not rise to the level of an impairment.

8. IMPAIRMENTS

A condition where a fire protection system or unit or portion thereof is out of order, and the condition can result in the fire protection system or unit not functioning in a fire event.

9. CERTIFICATION

This Testing Was Performed in Accordance with Applicable NFPA Standards.

I state that the information on this form is correct at the time and place of my inspection and that all equipment tested at this time was left in operational condition upon completion of this inspection except as noted in Parts 6, 7, and 8 above.

Name of Inspector: Lance Corbett & Greg McGovern Inspector License #: P00597

Signature: Lance Corbett Date: 6/21/24

10. ACCEPTANCE BY OWNER OR OWNER'S REPRESENTATIVE

Name: Carl Pharo Organization: THE PHILADELPHIA CHARTER SCHOOL FOR (30454774) Phone: None

Signature: Carl Pharo Date: 6/21/24

The owner and/or designated representative acknowledges the responsibility of the operating condition of the component parts at the time of this inspection. Pursuant to the National Fire Protection Association Form 25, Chapter 4, the owner is responsible for proper maintenance and care of the sprinkler system. It is agreed that the inspection service provided by the contractor as prescribed herein is limited to performing a visual inspection and/or routine testing, and any investigation or unscheduled testing, modification, maintenance, repair, etc., of the component parts is not included as part of the inspection work performed. It is understood that this inspection pertains to the condition of the sprinkler system on the day of inspection only. This inspection meets or exceeds NFPA 25 requirements and or local AHJ requirements. AHJ requirements supersede all other code requirements. The inspector shall not be liable for future defaults or defects in the sprinkler system which are beyond the inspector's control, including, but not limited to, failure from malicious tampering, accidents, lack of proper inspection, material failure or inadequate heating. The inspector can give no assurance, nor will be held liable, with regard to work that may have been previously performed or work performed at a future date by other companies. It is further understood that all information contained herein is provided to the best of the knowledge of the party providing such information.

11. OTHER**11.1 Special Procedures****11.2 Comments**
