Facility Condition Assessment Summary Report

This report provides a summary of the Facility Condition Index (FCI) value of a school facility and select major building systems. The FCI calculation represents the cost of needed repairs divided by the replacement value. The FCI is a numerical value of condition and helps to identify the need for renewal or replacement of specific parts of the facility. The FCI is particularly useful when comparing similar facilities within the same portfolio.

Jenks, JS School

Governance	DISTRICT	Report Type	Elementarymiddle
Address	8301 Germantown Ave.	Enrollment	475
	Philadelphia, Pa 19118	Grade Range	'00-08'
Phone/Fax	215-248-6604 / 215-248-6681	Admissions Category	Neighborhood
Website	Www.Philasd.Org/Schools/Jsjenks	Turnaround Model	School Redesign Initiative

Building/System FCI Tiers

Facility Condition Index (FCI) = Cost of Assessed Deficiencies / Replacement Value

< 15%	15 to 25%	25 to 45%	45 to 60%	> 60%
Buildings				
Minimal Current Capital Funding Required	Refurbish Systems in building	Replace Systems in building.	Building should be considered for major renovation.	Building should be considered for closing/replacement.
Systems				
Perform routine maintenance on system	System requires minor repairs	System should be studied to determine repair vs. replacement.	System is nearing end of its life expectancy and should be considered for replacement	System should be replaced as part of the Capital Program

Building and Grounds

	FCI	Repair Costs	Replacement Cost
Overall	**38.28%**	**$10,992,083**	**$28,713,388**
Building	39.28 %	$10,706,833	$27,259,303
Grounds	19.62 %	$285,249	$1,454,085

Major Building Systems

Building System	System FCI	Repair Costs	Replacement Cost
Roof (Shows physical condition of roof)	00.00 %	$0	$828,668
Exterior Walls (Shows condition of the structural condition of the exterior facade)	00.43 %	$8,532	$1,993,140
Windows (Shows functionality of exterior windows)	00.00 %	$0	$972,540
Exterior Doors (Shows condition of exterior doors)	00.00 %	$0	$78,300
Interior Doors (Classroom doors)	36.71 %	$69,571	$189,540
Interior Walls (Paint and Finishes)	07.92 %	$67,739	$855,360
Plumbing Fixtures	27.42 %	$200,165	$730,080
Boilers	12.76 %	$128,662	$1,008,180
Chillers/Cooling Towers	64.32 %	$850,289	$1,321,920
Radiators/Unit Ventilators/HVAC	157.68 %	$3,660,449	$2,321,460
Heating/Cooling Controls	158.90 %	$1,158,413	$729,000
Electrical Service and Distribution	150.66 %	$789,168	$523,800
Lighting	34.37 %	$643,681	$1,872,720
Communications and Security (Cameras, Pa System and Fire Alarm)	32.39 %	$227,207	$701,460

Please note that some FCIs may be over 100% because there are times when replacing a building system requires that other building systems be upgraded to complete the installation. A FCI of 0.0% represents that there are no current deficiencies with the associated system.

School District of Philadelphia

S627001;Jenks, John

Final

Site Assessment Report

January 31, 2017

PARSONS

Table of Contents

Site Executive Summary

The organization of this report, as displayed in the Table of Contents, follows the structure of the associated eCOMET database. The overall node for each school campus begins with the letter "S", which indicates the "Site" label. Each Site is comprised of separate "Building" and "Grounds" nodes; their asset names begin with the letters "B" and "G" respectively. Information rolls up to the Site node from the Building and Grounds nodes. This Site report combines facility information with subsections for the Buildings And Grounds nodes.

The basis for the evaluation of condition is the functional systems and elements of a building and grounds organized according to the UNIFORMAT II Elemental Classification. The grouping of these systems and elements and applying a current replacement value to them develops a representative building cost model. Cost Models are typically developed for similar building types and functions. Evaluation of systems and their elements takes into account their current replacement values, life cycles, installation dates and next renewal dates. Systems and their elements that are within their useful lives are further evaluated to identify current deficient conditions that may have a significant impact on a system's or element's remaining service life, and to determine if they are beyond their predicted expected life. The system's or element's current replacement value is based on RS Means Commercial Cost Data.

Following are the cost model's system details for this facility. The Replacement Value is the amount needed to replace the property of the same present value. The Current Repair Amount, also known as Condition Needs, represents the budgeted contractor installed costs plus owner's soft costs for the repair, replacement or renewal for a component or system level deficiency. It excludes contributing costs for other components or systems that might also be associated with the corrective actions due to packaging the work. Facility Condition Index (FCI) is an industry-standard measurement calculated as the ratio of the repair costs to correct a facility's deficiencies to the facility's Current Replacement Value. Condition Index (CI) for a system is calculated as the sum of a the deficiencies divided by the sum of a system's Replacement Value (both values include soft-cost) expressed as a percentage ranging from 0% 100%.

Gross Area (SF):	54,000
Year Built:	1924
Last Renovation:	
Replacement Value:	$28,713,388
Repair Cost:	$10,992,082.54
Total FCI:	38.28 %
Total RSLI:	63.83 %

Description:

Facility Assessment
September 2015

School District of Philadelphia
Jenks, John Elementary School
440 North Broad Street
Philadelphia, PA 19118

54,000 SF / 477 Students / LN 04

GENERAL

The John Jenks Elementary School building is located at 440 North Broad Street in Philadelphia, PA. The 3 story, 54,000 square foot building was originally constructed in 1924. The building has a basement partially above ground and penthouses on the roof. A renovation was performed in 1996 and 2010 consisting of replacing exterior windows, doors and brick facade renovations.

The Facility Area Coordinator was not able to accompany the Parsons assessment team on this site visit. Mr. Joe Maxwell, Building Engineer, accompanied us on our tour of the school and provided us with detailed information on the building systems and recent

maintenance history.

ARCHITECTURAL/STRUCTURAL

The building typically rests on concrete foundations and bearing walls that are not showing signs of settlement or water penetration. Foundation walls do not show signs of deterioration except around the gym perimeter where moisture is penetrating the exterior walls. The basement slab does not show signs of heaving.

The main structure consists typically of cast-in-place concrete columns, beams and one-way concrete slabs. Long slab spans are supported with steel truss girders. The floor slabs and superstructure are generally in good condition.

The roof structure is typically similar to floor construction.

The building envelope is typically masonry with face brick with decorative stone friezes and quoining. Main entrance is accentuated with stone columns and arch. In general, masonry is in good condition; masonry restoration (tuck pointing) was performed in 2010.

The original building windows were retrofitted in late 1990's with extruded aluminum double hung windows single glazed with acrylic glazing; original wood frames are left in place. Basement windows are fitted with galvanized steel security screens. All windows are generally in good condition.

Roofing is typically built-up. All roofing and flashing is typically in fair condition with some deterioration and two areas were leaks have been reported.

Exterior doors installed in approximately 2010 are typically hollow metal in good condition, weather-stripping is installed.

INTERIORS:

Partition wall types include plastered ceramic hollow blocks and painted CMU. Corridors and stairways have painted wainscot band.

The interior wall finishes are generally painted plaster or CMU and some painted brick. Walls in toilets are covered with ceramic tile installed in 2000. Generally, paint is in fair condition with some deterioration in gym, auditorium, stairways and other spaces.

Most ceilings are painted plaster in classrooms, auditorium and gym; some water damage has been observed. 2x4 suspended acoustical panels are installed in corridors, classrooms, offices and library.

Flooring in classrooms and auditorium is hardwood, (30% requires refinishing); and sealed concrete in most corridors and cafeteria. Some classrooms have VCT installed in mid 1990's; approximately 20% is in poor condition. Floor in toilets is typically ceramic tile installed in 2000. Main entrance hallway floor has a sealed concrete finish in good condition.

Interior doors are generally rail and stile wood doors, most glazed, in wood frames with transoms and solid core in hollow metal frames. Doors are typically in good condition. Most doors are fitted with door knobs and are not ADA compliant.

Fittings include original chalk boards, generally in poor condition. Toilet partitions and accessories in are in very good condition, installed in 2000 and ADA compliant; handrails, generally need to be upgraded to be ADA compliant. Interior identifying signage is typically directly painted on wall or door surfaces generally in poor condition.

Stair construction is generally concrete treads and stringers, in good condition.

Furnishings include fixed casework in classrooms, corridors and library, generally in good condition; window shades/blinds, generally in good condition; fixed auditorium seating is original, generally in fair condition. Lockers are built-in along corridor walls and in good condition.

CONVEYING SYSTEMS:

No elevator.

GROUNDS (SITE):

There is no staff parking locations on site. There's a fenced in play area on the south side of the site. On the west side of the school (rear side) is paved concrete in fair condition with two basketball posts and backboards. The school site is accessible from Ardleigh Street; but there are no accessible ramps to enter the school first floor and no elevator to access the upper floors. Sidewalk pavement is in very fair condition.

There is extensive landscaping on three sides of the school, along Ardleigh Street, East Southampton Ave and Germantown Ave.

ACCESSIBILITY:

The building does not have an accessible entrance and accessible route. Ramps need to be installed throughout the building where floors change elevation. The toilets are equipped with accessible fixtures, partitions and accessories, such as grab bars. Most doors in the building do not have ADA required door handles.

MECHANICAL

Plumbing Fixtures

Many of the plumbing fixtures, updated around 2000, remain in service. Fixtures in the restrooms on each floor consist of wall mounted push button flush valve water closets, wall hung urinals and lavatories with wheel handle faucets. The units were replaced around 2000, according to the Principal, but are in poor condition. The water closets were not properly secured to the wall and thus are falling off the wall. The water closets that are falling off the wall should be repaired.

Drinking fountains in the corridors and at the restrooms are wall hung with integral refrigerated coolers. They are well beyond their service life and should be replaced; most are NOT accessible type.

A mop basin is available in a janitor closet in the corridor on each floor for use by the janitorial staff.

The Kitchen has one (1) sink; a three-compartment stainless steel prep sink with lever operated faucets and integral grease trap. Chemicals are injected manually into the sanitizing basins.

Domestic Water Distribution

A 4" city water service enters the building from East Southampton Avenue. The 4" meter and valves are located in the basement boiler room. Duplex reduced pressure backflow preventers are installed in parallel. Duplex skid mounted 7.5HP Bell and Gossett domestic pressure booster pumps are installed on the domestic water line to ensure adequate pressure throughout the building. The booster pumps leak, have significant rust damage, and should be replaced. The original domestic hot and cold water distribution piping was replaced with copper piping and sweat fittings. The Building Engineer reported several leaks in the domestic piping. The maintenance staff reports no significant problems with scale build up in the domestic piping and the supply is adequate to the fixtures, but the piping has been in use for an unknown amount of time and should be inspected and repaired as necessary by a qualified contractor.

One (1) A.O. Smith gas fired, 65 gallon, vertical hot water heater with circulating pump supplies hot water for domestic use. The unit was installed in 2005. It is located in the boiler room on the basement level. The hot water heater is equipped with a T&P relief valve. The domestic hot water heater is approaching the end of its service life and should be replaced within the next 2-4 years. A Kisco water softener is located in the boiler room.

Sanitary Waste
The sanitary sewer piping is threaded galvanized piping. Repairs have been made in several places with cast iron piping with no-hub fittings.

The maintenance staff reported mostly minor problems with the sanitary waste piping systems. The sewer piping has been in service for over 90 years and will require more frequent attention from the maintenance staff as time passes. The District should hire a qualified contractor to examine the sanitary waste piping using video cameras to locate and replace any damaged piping and to further quantify the extent of potential failures.

The building does not have a sewage ejector or sump pump.

Rain Water Drainage
Rain water drains from the roof are routed through mechanical chases in the building and appear to be original. The piping is galvanized piping with threaded fittings and has been in use well beyond its service life. Section of the original galvanized piping have

been repaired with cast iron piping and no-hub fittings. The drain piping should be inspected by a qualified contractor and repaired as necessary.

Energy Supply
A 1" city gas service enters the building from Germantown Avenue near the intersection with East Southampton Avenue. The gas meter is 1" and is located in the Cafeteria on the South side of the building. Gas is used only for the domestic hot water heating at this time. A gas pressure booster pump is installed in the boiler room for the boilers, but it is not connected to the city gas service.

The oil supply is stored in an 8,000 gallon underground storage tank (UST) located in the parking lot on the North side of the school. Oil is the primary fuel for the boilers. Duplex pumps located in the basement circulate oil through the system. The fuel oil pumping system appears to be in good condition and should be serviced on a regular basis. The actual condition of the fuel side is unknown.

Heat Generating Systems
Low pressure steam is generated at a maximum of 15 lbs./sq. in., typically 1 lb./sq. in., by three (3) 122HP HB Smith model 28A cast iron sectional boilers, installed in 2009 but the boilers were from another school so the actual age of the boilers is unknown. Each boiler is equipped with a Powerflame burner designed to operate on natural gas or fuel oil; currently fuel oil is the only fuel used. Combustion air makeup is supplied by louvers equipped with motorized dampers. Burner controls provide full modulation with electronic ignition, digital flame sensing and pressure atomization on oil. Burner oil pumps are loose and not driven by the fan motor. The Building Engineer reports the system loses a significant amount of condensate due to failed traps and leaking condensate return equipment, which is made up with treated city water. Cast iron sectional boilers have an anticipated service life of 35 years or more; these units have been in service approximately 10 years. The District should provide reliable service for the next 20-25 years.

An Alyan boiler feed tank, with triplex feed pumps headered together, is installed in the basement boiler room. The three (3) feed pumps are 3/4HP and their installation date is unknown. One of the pumps is not functional. A serious problem was reported with steam leaking into the system from failed steam traps and of the feed tank system leaking. The boiler feed tank and pumps should be replaced. A water chemical treatment system is connected to the feed tank.

Distribution Systems

Steam piping mains are black steel with flanged fittings and smaller distribution piping is black steel with welded fittings. The condensate piping is black steel with threaded fittings, repairs have been made with copper piping. Steam and condensate piping mains from the basement level run up through the building to the radiators on all three floors. The distribution piping has been in use well beyond its service life and will require more frequent attention from the maintenance staff to address pipe/valve failures as time passes. The district should hire a qualified contractor to examine the steam and condensate piping, in service for over 90 years, and perform additional testing to locate and replace any damaged piping and to further quantify the extent of potential failures.

The District should budget for replacing this piping over the next 10 years.

Two pipe cast iron radiators provide heating for the building. The radiators are original to the building and well beyond their service lives. Two (2) house fans are located in a mechanical room in the basement, but they are not operational due to "environmental issues". The fans would have provided heating and ventilation for the building. Currently ventilation for the building is provided by opening windows, which does not meet current codes for outdoor air ventilation. A new heating system should be installed to meet ventilation requirements and achieve more efficient operation. The new units should be designed for quiet operation and equipped with hot water coils, chilled water coils, and integral heat exchangers, where applicable, to introduce outdoor air to the building.

As this school serves only premade meals, there is no exhaust hood or gas fired cooking equipment in the kitchen.

The school currently has no mechanical ventilation, the existing ventilation system is inoperable. Ventilation should be provided for the Cafeteria/Gymnasium by installing a constant volume air handling unit with distribution ductwork and registers. For the administration offices a fan coil air handling unit should be hung from the structure with outdoor air ducted to the unit from louvers in the window openings. Ventilation should be provided for the Auditorium by installing a constant volume air handling unit with distribution ductwork and registers. These units would be equipped with hot water heating coils and chilled water cooling coils. Steam converters would be installed in the existing boiler room with circulating pumps, distribution piping and controls to provide heating hot water for the new coils.

Ventilation for the restrooms is provided by three (3) exhaust fans; one (1) fan serving the girls restrooms, one (1) serving the boys restroom, and one (1) serving the faculty restroom. Two (2) fans are on the upper roof and one (1) is on the lower roof. The fans were operational during the site visit, in good condition, and the Building Engineer did not report any issues.

Terminal & Package Units

Several of the classrooms in the school building have window air conditioning units that have an anticipated service life of only 10 years. Installing a 150 ton air-cooled chiller with pumps located in a mechanical room and chilled water distribution piping would supply more reliable air conditioning for the building with a much longer service life.

Controls & Instrumentation

The original pneumatic systems no longer provide basic control functions. Pneumatic room thermostats are intended to control the steam radiator control valves. In reality the radiator control valves are wide open and heating control is achieved via the boilers. Pneumatic control air is no longer supplied, the compressor has been removed. The pneumatic controls systems are no longer functional. The original control valves and pneumatic actuators are beyond their service life and should be rebuilt or replaced. These controls should be converted to DDC.

A new building automation system (BAS) with modern DDC modules and communications network should be installed to serve the HVAC systems in this building to improve reliability and energy efficiency. An interface should be provided with the preferred system in use throughout the District.

Sprinklers

The school building is NOT covered by an automatic sprinkler system. Installing a sprinkler system with quick response type heads should reduce insurance costs by providing protection for the property investment. A fire pump may be required depending on the available city water pressure.

The building is not equipped with fire stand pipes.

Portable Classroom

A portable classroom located on the Northwest side of the main school building houses one (1) classroom. The portable has an independent conditioning system from the main building. A packaged rooftop unit provides heating and cooling to the classroom. According to the Building Engineer the packaged unit is over 10 years old and leaks into the classroom. The roof of the portable was not accessible during the site visit and further information on the packaged unit is not available. This unit should be replaced to provide reliable heating and cooling to the portable classroom.

ELECTRICAL:

Site electrical service - The primary power is at 13.2KV from the power poles feeding a pole-top transformer. The secondary power is brought into the school building overhead and down on the exterior of the building into in the electrical room. It feeds an old 400A, 120V/240 V, 2 phase switchboard. The PECO meter is also located inside the new electrical room (basement). The switchboard is in a poor condition and has reached the end of its useful service life.

Distribution system - The electrical distribution is accomplished by using the 400A switchboard distribution panel (located in the electrical room) and feeding several 120V lighting and receptacle panels throughout the building (total of 10). These panels are in poor condition. They have reached the end of their useful service life.

Receptacles - The receptacles in classrooms, computer rooms, libraries, and other areas are not all adequate. The walls in classrooms and the computer rooms (50%) have insufficient number of receptacles (minimum of 2 on each wall).

Lighting - Interior building is illuminated by various types of fixtures. They include fluorescent lighting (mostly T-8 & T-12 lamps) in majority of the areas, including; classrooms, corridors, offices, Library, cafeteria, Kitchen, etc. Surface or pendant mounted industrial fluorescent fixtures are used in mechanical and electrical rooms. About 30% of the school lighting was upgraded, however the majority of the building (70%) lacks adequate illumination level. The majority of interior lighting fixtures are not in good condition and have reached the end of their useful service life.

Fire alarm - The present Fire Alarm system is not automatic/addressable, and is not in compliance with safety code. There are some manual pulls stations throughout the building. However, there are not sufficient number of horn/strobes in the classrooms, corridors, offices and other areas in the school.

Telephone/LAN - The school telephone and data systems are working properly. A main distribution frame (MDF) along with a

telephone PBX system are providing the communication system function for the building. School is also equipped with Wi-Fi system.

Public address - A separate PA system does not exist. School uses the telephone systems for public announcement. The present System is functioning properly. Each class room is provided with an intercom telephone service. This system allows paging and intercom communication between main office to each classroom, and vice versa between each classroom and main office. Also, there is communication between classrooms to classrooms.

Clock and Program system – There are clocks in each classroom (12-inch round clocks) and the clocks are controlled properly by the master clock control.

Television System - Television system is not provided for the school. There are smart boards in most of the classrooms capable of connecting to computers and internet.

Security Systems, access control, and video surveillance - The school is not provided with video surveillance system. Cameras should be installed at exit doors, corridors, exterior, and other critical areas. These cameras should be controlled by a Closed Circuit Television system (CCTV).

Emergency Power System – There is a fairly new emergency generator in this building. It was installed in 2010 and it is in a good shape.

Emergency lighting and exit lights - there are sufficient number of emergency lights/exit lights in the corridors and other exit ways. The exit/emergency lights have recently been upgraded (2010).

Lightning Protection System - There is adequate lightning protection system installed for this school on the roof. There are numerous lighting rods installed on the roof top, and they connected to the ground by using stranded aluminum cables from the roof top all the way to the ground floor.

Grounding - The present grounding system is adequate. All equipment are properly bonded to the ground.

Site Lighting - The school has some exterior lighting. However, a few pole-mounted lights are needed to provide adequate lighting for the grounds security and safety of people at night.

Site Paging – The school has some exterior speakers, however a few additional speakers are needed for proper communication with students playing outside.

Elevators – This school has a no elevator.

RECOMMENDATIONS:

- Repoint stone cornices.
- Repair (20%) & refinish hardwood flooring (50%).
- Repair (15%) and repaint all walls.
- Repair (10%) and repaint all ceilings.
- Install new signage throughout.
- Provide ADA compliant hardware on interior doors.
- Install new 2500 lbs elevator on exterior of building.
- Refurbish auditorium seating 25%.
- Provide ADA ramp on exterior stair.
- Replace ten (10) water closets, which are falling off the wall, in the restrooms with new fixtures.
- Replace eight (8) wall hung drinking fountains and integral refrigerated coolers in the corridors. These units are beyond their service life and most are NOT accessible type.
- Hire a qualified contractor to perform a detailed inspection of the domestic water piping, in use for an unknown amount of time, and replace any damaged piping.
- Replace the duplex 7.5HP domestic water booster pumps and isolation valves on the incoming domestic water line with a new skid mounted pressure booster system.
- Replace existing vertical gas fired, 65 gallon, domestic hot water heater which is approaching the end of its service life with a new gas fired hot water heater.
- Hire a qualified contractor to perform a detailed examination of the sanitary waste piping using visual inspection and video cameras to locate and replace any damaged piping and to further quantify the extent of potential failures.

- Hire a qualified contractor to perform a detailed examination of the rain water drainage piping using visual inspection and video cameras to locate and replace any damaged piping and to further quantify the extent of potential failures.
- Hire a qualified contractor to examine the steam and condensate piping, in service for over 90 years, and perform additional testing to locate and replace any damaged piping and to further quantify the extent of potential failures.
- Conduct a steam trap survey to identify and replace failed traps passing live steam into the condensate piping system.
- Replace the existing boiler feed tank, which is leaking, and three (3) 3/4HP pumps in the boiler room.
- Remove the existing cast iron steam radiators and install fan coil units with hot and chilled water coils and a dedicated outdoor air system.
- Remove the window air conditioning units and install a 150 ton air-cooled chiller with chilled water distribution piping and pumps to supply more reliable air conditioning for the building with a much longer service life.
- Provide ventilation for the Cafeteria/Gymnasium by installing a constant volume air handling unit with distribution ductwork and registers.
- Provide ventilation for the Auditorium by installing a fan coil air handling unit hung from the structure with outdoor air ducted to the unit from louvers in window openings.
- Provide ventilation for the administration offices by installing a fan coil air handling unit hung from the structure with outdoor air ducted to the unit from louvers in window openings.
- Replace the pneumatic controls for the HVAC systems with modern DDC modules, valves and actuators to improve reliability and energy efficiency. Provide a new building automation system (BAS) with communication interface to the preferred system in use throughout the District.
- Install a fire protection sprinkler system with quick response type heads to reduce insurance costs by providing protection for the property. A fire pump may be required depending on the available city water pressure.
- Replace the existing packaged rooftop unit, which is estimated to be at the end of its useful service life, serving the portable classroom on the Northwest side of the building.
- Install a new and upgraded electrical service for this school to handle existing loads plus any additional mechanical loads.
- Install new 120V lighting and receptacle panels throughout the building (total of 10)
- Install new lighting system for 70% of the building.
- Install new receptacles for 50% of the building
- Install new Automated Fire alarm System.
- Install additional pole-mounted lights for the grounds
- Install additional exterior speakers for the grounds

Attributes:

General Attributes:

Active:	Open	Bldg Lot Tm:	Lot 4 / Tm 4
Status:	Accepted by SDP	Team:	Tm 4
Site ID:	S627001		

Site Condition Summary

The Table below shows the CI and FCI for each major system shown at the UNIFORMAT classification Level II. Note that Systems with lower FCIs require less investment than systems with higher FCIs.

Current Investment Requirement and Condition by Uniformat Classification

UNIFORMAT Classification	RSLI%	FCI %	Current Repair
A10 - Foundations	37.00 %	0.00 %	$0.00
A20 - Basement Construction	37.00 %	0.00 %	$0.00
B10 - Superstructure	37.00 %	0.00 %	$0.00
B20 - Exterior Enclosure	29.15 %	0.28 %	$8,531.73
B30 - Roofing	25.23 %	0.00 %	$0.00
C10 - Interior Construction	55.37 %	7.81 %	$103,435.24
C20 - Stairs	37.00 %	0.00 %	$0.00
C30 - Interior Finishes	40.25 %	6.19 %	$169,312.07
D10 - Conveying	105.71 %	334.85 %	$1,012,601.25
D20 - Plumbing	74.18 %	98.46 %	$1,085,685.59
D30 - HVAC	105.02 %	97.33 %	$5,846,416.40
D40 - Fire Protection	105.71 %	177.49 %	$772,494.11
D50 - Electrical	110.11 %	52.30 %	$1,660,055.19
E10 - Equipment	54.29 %	0.00 %	$0.00
E20 - Furnishings	12.50 %	41.99 %	$48,301.64
G20 - Site Improvements	37.89 %	13.03 %	$142,036.47
G40 - Site Electrical Utilities	106.67 %	39.33 %	$143,212.85
Totals:	**63.83 %**	**38.28 %**	**$10,992,082.54**

Condition Deficiency Priority

Facility Name	Gross Area (S.F.)	FCI %	1 - Response Time (< 2 yr)	2 - Response Time (2-3 yrs)	3 - Response Time (3-4 yrs)	4 - Response Time (4-5 yrs)	5 - Response Time (> 5 yrs)
B627001;Jenks, John	54,000	39.28	$954,062.66	$741,678.00	$2,807,372.57	$1,222,608.83	$4,981,111.16
G627001;Grounds	83,700	19.62	$0.00	$142,036.47	$79,041.73	$64,171.12	$0.00
Total:		**38.28**	**$954,062.66**	**$883,714.47**	**$2,886,414.30**	**$1,286,779.95**	**$4,981,111.16**

Deficiencies By Priority

- 1 - Response Time (< 2 yr) - $954,062.66
- 2 - Response Time (2-3 yrs) - $883,714.47
- 3 - Response Time (3-4 yrs) - $2,886,414.30
- 4 - Response Time (4-5 yrs) - $1,286,779.95
- 5 - Response Time (> 5 yrs) - $4,981,111.16

Budget Estimate Total: $10,992,082.54

Executive Summary

Building condition is evaluated based on the functional systems and elements of a building and organized according to the UNIFORMAT II Elemental Classification. The grouping of these systems and elements and applying a current replacement value to them develops a representative building cost model. Cost Models are developed for similar building types and functions. Systems and their elements are evaluated based on their current replacement values, life cycles, installation dates and next renewal dates. Systems and their elements that are within their useful lives are further evaluated to identify current deficient conditions that may have a significant impact on a system's or element's remaining service life, and to determine if they are beyond their predicted expected life. The system's or element's current replacement value is based on RS Means Commercial Cost Data.

Following are the cost model's system details for this facility. The Replacement Value is the amount needed to replace the property of the same present value. The Current Repair Amount, also known as Condition Needs, represents the budgeted contractor installed costs plus owner's soft costs for the repair, replacement or renewal for a component or system level deficiency. It excludes contributing costs for other components or systems that might also be associated with the corrective actions due to packaging the work. Facility Condition Index (FCI) FCI is an industry-standard measurement of facility condition calculated as the ratio of the costs to correct a facility's deficiencies to the facility's Current Replacement Value. It ranges from 0% (new) to 100% (very poor). Condition Index (CI) is calculated as the sum of a renewable system's Remaining Service Life (RSL) divided by the sum of a system's Replacement Value (both values exclude soft-cost to simplify calculation updates) expressed as a percentage ranging from 100% (new) to 0% (expired).

Function:	Elementary School
Gross Area (SF):	54,000
Year Built:	1924
Last Renovation:	
Replacement Value:	$27,259,303
Repair Cost:	$10,706,833.22
Total FCI:	39.28 %
Total RSLI:	64.29 %

Description:

Attributes:

General Attributes:

Active:	Open	Bldg ID:	B627001
Sewage Ejector:	No	Status:	Accepted by SDP
Site ID:	S627001		

Condition Summary

The Table below shows the CI and FCI for each major building system shown at the UNIFORMAT classification Level II. Note that Systems with lower FCIs require less investment than systems with higher FCIs.

UNIFORMAT Classification	RSLI %	FCI %	Current Repair Cost
A10 - Foundations	37.00 %	0.00 %	$0.00
A20 - Basement Construction	37.00 %	0.00 %	$0.00
B10 - Superstructure	37.00 %	0.00 %	$0.00
B20 - Exterior Enclosure	29.15 %	0.28 %	$8,531.73
B30 - Roofing	25.23 %	0.00 %	$0.00
C10 - Interior Construction	55.37 %	7.81 %	$103,435.24
C20 - Stairs	37.00 %	0.00 %	$0.00
C30 - Interior Finishes	40.25 %	6.19 %	$169,312.07
D10 - Conveying	105.71 %	334.85 %	$1,012,601.25
D20 - Plumbing	74.18 %	98.46 %	$1,085,685.59
D30 - HVAC	105.02 %	97.33 %	$5,846,416.40
D40 - Fire Protection	105.71 %	177.49 %	$772,494.11
D50 - Electrical	110.11 %	52.30 %	$1,660,055.19
E10 - Equipment	54.29 %	0.00 %	$0.00
E20 - Furnishings	12.50 %	41.99 %	$48,301.64
Totals:	**64.29 %**	**39.28 %**	**$10,706,833.22**

Condition Detail

This section of the report contains results of the Facility Condition Assessment. The building is separated into system components based on UNIFORMAT II classification. The columns in the System Listing table below represent the following:

1. System Code: A code that identifies the system.
2. System Description: A brief description of a system present in the building.
3. Unit Price $: The unit price of the system.
4. UoM: The unit of measure for of the system.
5. Qty: The quantity for the system
6. Life: anticipated service life for thesystem based on Building Owners and Managers Association (BOMA) recommendations.
7. Year Installed: The date of system installation.
8. Calc Next Renewal Year: The date of system expiration based on the life, NR stands for non renewable.
9. Next Renewal Year: The suggested system expiration date by the assessor based on visual inspection.
10. CI: The Condition Index of the system.
11. FCI: The Facility Condition Index of the system.
12. RSL: Remaining Service Life.
13. eCR: eCOMET Condition Rating (not used).
14. Deficiency $: The financial investment to repair/replace system.

System Listing

The System Listing table below lists each of the systems organized by their UNIFORMAT II classification. The assessment team was tasked with recording the most recent replacement year of each system, determining the remaining service life based on the theoretical life, and evaluating the condition to confirm the forecast next replacement year. The system listing is the basis for all data contained in the Building Assessment Report.

Additionally, a condition rating (eCR) based on the following guidelines is provided as observed at the time of the assessment.

- Excellent (E) - No noticeable distress or damage. The entire system is free from observable defect.
- Very Good (VG) - Overall no serviceability reduction for the entire system. No degradation of critical components and minor distress and defect noticeable for some but not non critical components within the system.
- Good (G) - Slight or no serviceability reduction for the entire system. There may be noticeable defects for some non critical components and slight noticeable degradation of the critical components.
- Fair (F) - Overall serviceability is degraded but adequate. There may be moderate deterioration for very few of the critical components and few of the non critical components may have severe degradation.
- Marginal (MA) - Overall serviceability and reliability loss. Most if not all of the non critical components suffer from severe degradation and a few of the critical component may have severe degradation.
- Moderate (MO) - Overall a significant serviceability loss. Most if not all the components have severe degradation with the reminder of the component showing visible distress.
- Very Poor (VP) - Overall the system is barely functional. All of the components are severely degraded.
- Non-Functional (NF) - Overall the system does not function with all the components having no serviceability and suffer from severe degradation.

System Code	System Description	Unit Price $	UoM	Qty	Life	Year Installed	Calc Next Renewal Year	Next Renewal Year	RSLI%	FCI%	RSL	eCR	Deficiency $	Replacement Value $
A1010	Standard Foundations	$18.40	S.F.	54,000	100	1924	2024	2052	37.00 %	0.00 %	37			$993,600
A1030	Slab on Grade	$7.73	S.F.	54,000	100	1924	2024	2052	37.00 %	0.00 %	37			$417,420
A2010	Basement Excavation	$6.55	S.F.	54,000	100	1924	2024	2052	37.00 %	0.00 %	37			$353,700
A2020	Basement Walls	$12.70	S.F.	54,000	100	1924	2024	2052	37.00 %	0.00 %	37			$685,800
B1010	Floor Construction	$75.10	S.F.	54,000	100	1924	2024	2052	37.00 %	0.00 %	37			$4,055,400
B1020	Roof Construction	$13.88	S.F.	54,000	100	1924	2024	2052	37.00 %	0.00 %	37			$749,520
B2010	Exterior Walls	$36.91	S.F.	54,000	100	1924	2024	2052	37.00 %	0.43 %	37		$8,531.73	$1,993,140
B2020	Exterior Windows	$18.01	S.F.	54,000	40	1924	1964	2020	12.50 %	0.00 %	5			$972,540
B2030	Exterior Doors	$1.45	S.F.	54,000	25	1924	1949	2024	36.00 %	0.00 %	9			$78,300
B3010105	Built-Up	$37.76	S.F.	21,450	20	1999	2019	2020	25.00 %	0.00 %	5			$809,952
B3010120	Single Ply Membrane	$38.73	S.F.		20				0.00 %	0.00 %				$0
B3010130	Preformed Metal Roofing	$54.22	S.F.		30				0.00 %	0.00 %				$0
B3010140	Shingle & Tile	$38.73	S.F.	450	25	1999	2024		36.00 %	0.00 %	9			$17,429
B3020	Roof Openings	$0.06	S.F.	21,450	20	1999	2019	2020	25.00 %	0.00 %	5			$1,287
C1010	Partitions	$17.91	S.F.	54,000	100	1924	2024	2052	37.00 %	0.00 %	37			$967,140
C1020	Interior Doors	$3.51	S.F.	54,000	40	1924	1964	2057	105.00 %	36.71 %	42		$69,571.18	$189,540
C1030	Fittings	$3.12	S.F.	54,000	40	1924	1964	2057	105.00 %	20.10 %	42		$33,864.06	$168,480
C2010	Stair Construction	$1.41	S.F.	54,000	100	1924	2024	2052	37.00 %	0.00 %	37			$76,140

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System Code	System Description	Unit Price $	UoM	Qty	Life	Year Installed	Calc Next Renewal Year	Next Renewal Year	RSLI%	FCI%	RSL	eCR	Deficiency $	Replacement Value $
C3010230	Paint & Covering	$13.21	S.F.	54,000	10	2010	2020		50.00 %	9.50 %	5		$67,738.77	$713,340
C3010231	Vinyl Wall Covering	$0.97	S.F.		15				0.00 %	0.00 %				$0
C3010232	Wall Tile	$2.63	S.F.	54,000	30	2000	2030		50.00 %	0.00 %	15			$142,020
C3020411	Carpet	$7.30	S.F.		10				0.00 %	0.00 %				$0
C3020412	Terrazzo & Tile	$75.52	S.F.	2,500	50	1990	2040		50.00 %	0.00 %	25			$188,800
C3020413	Vinyl Flooring	$9.68	S.F.	2,000	20	1999	2019	2020	25.00 %	0.00 %	5			$19,360
C3020414	Wood Flooring	$22.27	S.F.	23,000	25	1924	1949	2020	20.00 %	15.16 %	5		$77,638.16	$512,210
C3020415	Concrete Floor Finishes	$0.97	S.F.	26,500	50	1924	1974	2050	70.00 %	0.00 %	35			$25,705
C3030	Ceiling Finishes	$20.97	S.F.	54,000	25	2000	2025		40.00 %	2.11 %	10		$23,935.14	$1,132,380
D1010	Elevators and Lifts	$5.60	S.F.	54,000	35			2052	105.71 %	334.85 %	37		$1,012,601.25	$302,400
D2010	Plumbing Fixtures	$13.52	S.F.	54,000	35	2000	2035	2035	57.14 %	27.42 %	20		$200,164.66	$730,080
D2020	Domestic Water Distribution	$1.68	S.F.	54,000	25	1980	2005	2042	108.00 %	420.14 %	27		$381,151.20	$90,720
D2030	Sanitary Waste	$2.90	S.F.	54,000	25	1924	1949	2042	108.00 %	169.16 %	27		$264,910.51	$156,600
D2040	Rain Water Drainage	$2.32	S.F.	54,000	30	1924	1954	2047	106.67 %	191.14 %	32		$239,459.22	$125,280
D3020	Heat Generating Systems	$18.67	S.F.	54,000	35	2009	2044		82.86 %	12.76 %	29		$128,661.51	$1,008,180
D3030	Cooling Generating Systems	$24.48	S.F.	54,000	20			2037	110.00 %	64.32 %	22		$850,289.19	$1,321,920
D3040	Distribution Systems	$42.99	S.F.	54,000	25	1924	1949	2042	108.00 %	157.68 %	27		$3,660,449.11	$2,321,460
D3050	Terminal & Package Units	$11.60	S.F.	54,000	15			2032	113.33 %	7.76 %	17		$48,603.65	$626,400
D3060	Controls & Instrumentation	$13.50	S.F.	54,000	20	1980	2000	2037	110.00 %	158.90 %	22		$1,158,412.94	$729,000
D4010	Sprinklers	$7.05	S.F.	54,000	35			2052	105.71 %	202.91 %	37		$772,494.11	$380,700
D4020	Standpipes	$1.01	S.F.	54,000	35			2052	105.71 %	0.00 %	37			$54,540
D5010	Electrical Service/Distribution	$9.70	S.F.	54,000	30	1924	1954	2047	106.67 %	150.66 %	32		$789,167.53	$523,800
D5020	Lighting and Branch Wiring	$34.68	S.F.	54,000	20	1924	1944	2037	110.00 %	34.37 %	22		$643,680.98	$1,872,720
D5030	Communications and Security	$12.99	S.F.	54,000	15	1924	1939	2032	113.33 %	32.39 %	17		$227,206.68	$701,460
D5090	Other Electrical Systems	$1.41	S.F.	54,000	30	1924	1954	2047	106.67 %	0.00 %	32			$76,140
E1020	Institutional Equipment	$4.82	S.F.	54,000	35	1999	2034		54.29 %	0.00 %	19			$260,280
E1090	Other Equipment	$11.10	S.F.	54,000	35	1999	2034		54.29 %	0.00 %	19			$599,400
E2010	Fixed Furnishings	$2.13	S.F.	54,000	40	1924	1964	2020	12.50 %	41.99 %	5		$48,301.64	$115,020
								Total	**64.29 %**	**39.28 %**			**$10,706,833.22**	**$27,259,303**

System Notes

The facility description in the site executive summary contains an overview of each system. The notes listed below provide additional information on select systems found within the facility.

No data found for this asset

Renewal Schedule

eCOMET forecasts future Capital Renewal funding needed to address expiring systems based on the Next Renewal year found in the Cost Models. A 3% annual inflation factor is applied to the costs for systems expiring in future years. The table below reflects recommended Capital Renewal funding needs over the next 10 years. Note: Cells with a zero value indicate systems for which renewal is not scheduled in that year.

Inflation Rate: 3%

System	Current Deficiencies	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	Total
Total:	**$10,706,833**	**$0**	**$0**	**$0**	**$0**	**$4,008,862**	**$0**	**$0**	**$0**	**$137,394**	**$1,674,006**	**$16,527,096**
*** A - Substructure**	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
A10 - Foundations	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
A1010 - Standard Foundations	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
A1030 - Slab on Grade	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
A20 - Basement Construction	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
A2010 - Basement Excavation	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
A2020 - Basement Walls	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
B - Shell	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
B10 - Superstructure	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
B1010 - Floor Construction	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
B1020 - Roof Construction	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
B20 - Exterior Enclosure	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
B2010 - Exterior Walls	$8,532	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$8,532**
B2020 - Exterior Windows	$0	$0	$0	$0	$0	$1,240,184	$0	$0	$0	$0	$0	**$1,240,184**
B2030 - Exterior Doors	$0	$0	$0	$0	$0	$0	$0	$0	$0	$112,380	$0	**$112,380**
B30 - Roofing	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
B3010 - Roof Coverings	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
B3010105 - Built-Up	$0	$0	$0	$0	$0	$1,032,852	$0	$0	$0	$0	$0	**$1,032,852**
B3010120 - Single Ply Membrane	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
B3010130 - Preformed Metal Roofing	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
B3010140 - Shingle & Tile	$0	$0	$0	$0	$0	$0	$0	$0	$0	$25,014	$0	**$25,014**
B3020 - Roof Openings	$0	$0	$0	$0	$0	$1,642	$0	$0	$0	$0	$0	**$1,642**
C - Interiors	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
C10 - Interior Construction	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
C1010 - Partitions	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**

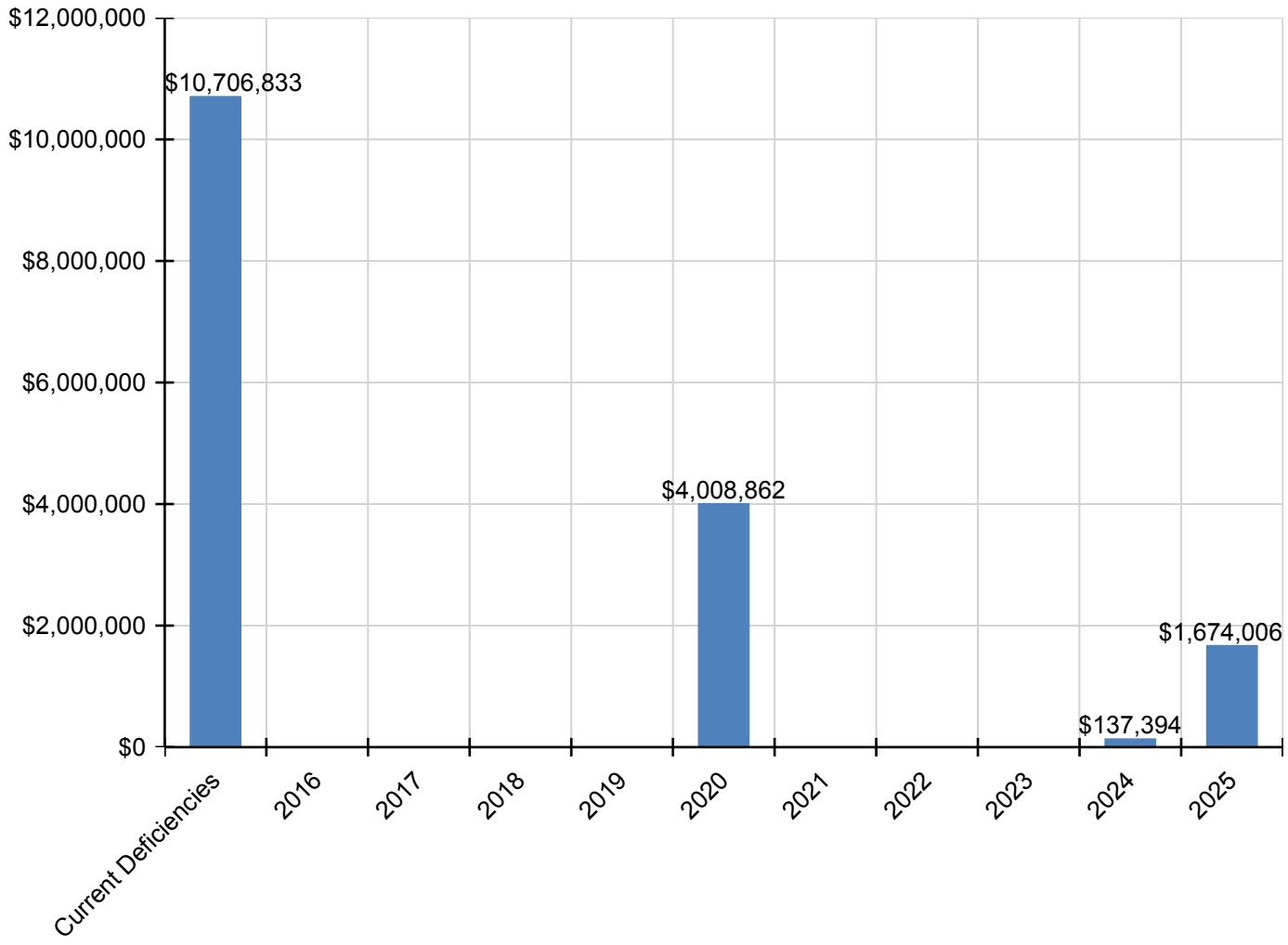
C1020 - Interior Doors	$69,571	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$69,571**
C1030 - Fittings	$33,864	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$33,864**
C20 - Stairs	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
C2010 - Stair Construction	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
C30 - Interior Finishes	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
C3010 - Wall Finishes	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
C3010230 - Paint & Covering	$67,739	$0	$0	$0	$0	$909,652	$0	$0	$0	$0	$0	**$977,391**
C3010231 - Vinyl Wall Covering	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
C3010232 - Wall Tile	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
C3020 - Floor Finishes	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
C3020411 - Carpet	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
C3020412 - Terrazzo & Tile	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
C3020413 - Vinyl Flooring	$0	$0	$0	$0	$0	$24,688	$0	$0	$0	$0	$0	**$24,688**
C3020414 - Wood Flooring	$77,638	$0	$0	$0	$0	$653,171	$0	$0	$0	$0	$0	**$730,809**
C3020415 - Concrete Floor Finishes	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
C3030 - Ceiling Finishes	$23,935	$0	$0	$0	$0	$0	$0	$0	$0	$0	$1,674,006	**$1,697,942**
D - Services	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
D10 - Conveying	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
D1010 - Elevators and Lifts	$1,012,601	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$1,012,601**
D20 - Plumbing	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
D2010 - Plumbing Fixtures	$200,165	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$200,165**
D2020 - Domestic Water Distribution	$381,151	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$381,151**
D2030 - Sanitary Waste	$264,911	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$264,911**
D2040 - Rain Water Drainage	$239,459	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$239,459**
D30 - HVAC	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
D3020 - Heat Generating Systems	$128,662	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$128,662**
D3030 - Cooling Generating Systems	$850,289	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$850,289**
D3040 - Distribution Systems	$3,660,449	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$3,660,449**
D3050 - Terminal & Package Units	$48,604	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$48,604**
D3060 - Controls & Instrumentation	$1,158,413	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$1,158,413**
D40 - Fire Protection	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
D4010 - Sprinklers	$772,494	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$772,494**
D4020 - Standpipes	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**

D50 - Electrical	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
D5010 - Electrical Service/Distribution	$789,168	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$789,168**
D5020 - Lighting and Branch Wiring	$643,681	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$643,681**
D5030 - Communications and Security	$227,207	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$227,207**
D5090 - Other Electrical Systems	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
E - Equipment & Furnishings	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
E10 - Equipment	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
E1020 - Institutional Equipment	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
E1090 - Other Equipment	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
E20 - Furnishings	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
E2010 - Fixed Furnishings	$48,302	$0	$0	$0	$0	$146,674	$0	$0	$0	$0	$0	**$194,975**

** Indicates non-renewable system*

Forecasted Sustainment Requirement

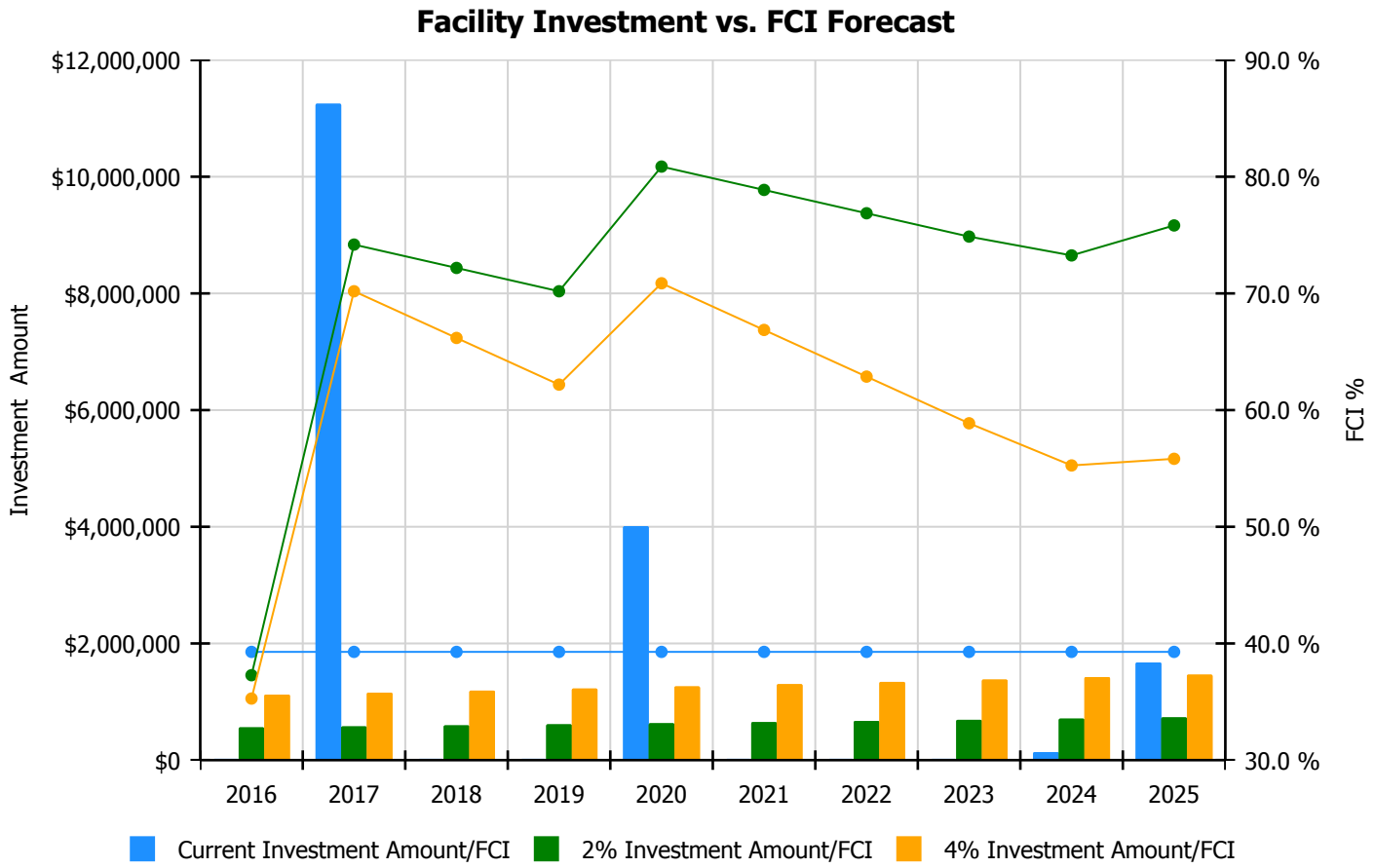
The following chart shows the current building deficiencies and forecasting sustainment requirements over the next ten years.



10 Year FCI Forecast by Investment Scenario

The chart below illustrates the effect of various investment levels on the building FCI for the next 10 years. The levels of investment shown below include:

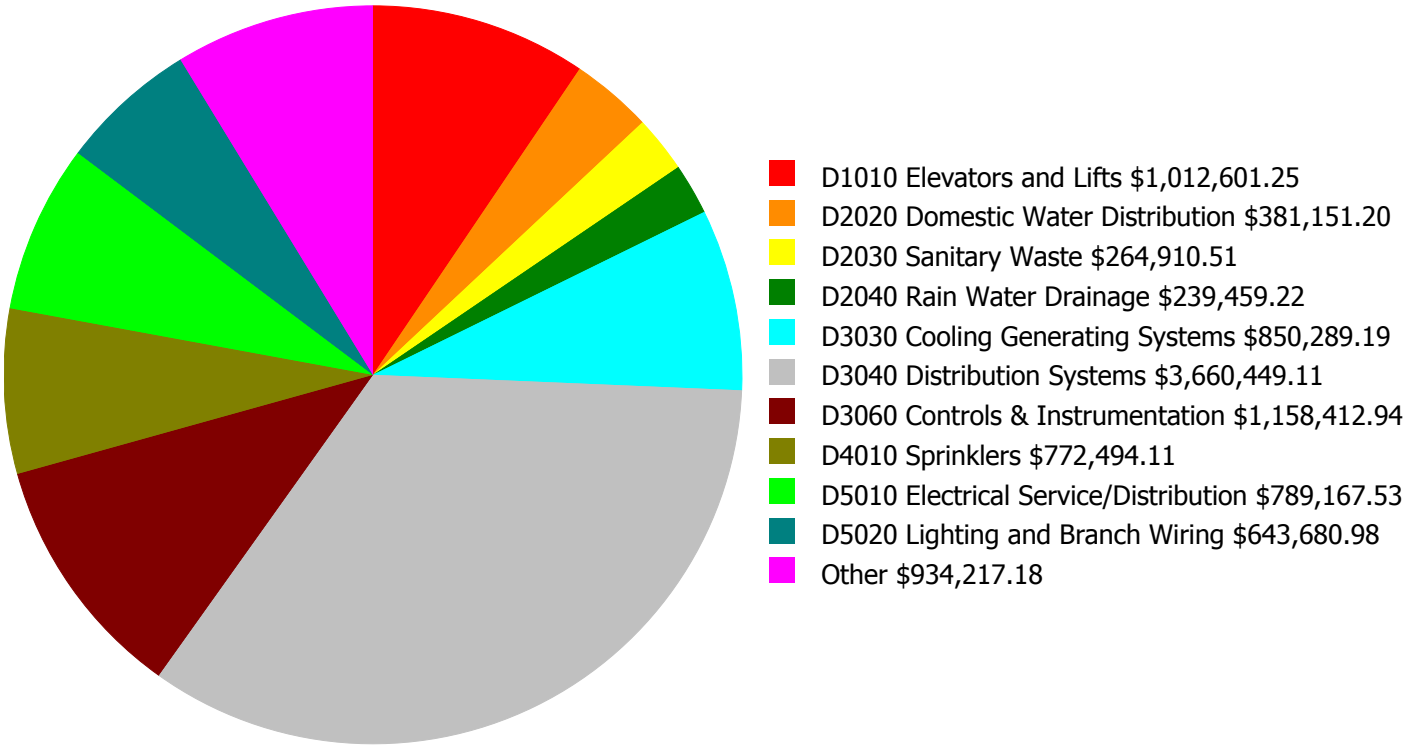
- Current FCI: a variable investment amount based on renewing expired systems to maintain the current FCI for the building
- 2% Investment: an annual investment of 2% of the replacement value of the building, escalated for inflation
- 4% Investment: an annual investment of 4% of the replacement value of the building, escalated for inflation



Year	Investment Amount Current FCI - 39.28%	2% Investment		4% Investment	
		Amount	FCI	Amount	FCI
2016	$0	$561,542.00	37.28 %	$1,123,083.00	35.28 %
2017	$11,251,137	$578,388.00	74.18 %	$1,156,776.00	70.18 %
2018	$0	$595,740.00	72.18 %	$1,191,479.00	66.18 %
2019	$0	$613,612.00	70.18 %	$1,227,223.00	62.18 %
2020	$4,008,862	$632,020.00	80.87 %	$1,264,040.00	70.87 %
2021	$0	$650,981.00	78.87 %	$1,301,961.00	66.87 %
2022	$0	$670,510.00	76.87 %	$1,341,020.00	62.87 %
2023	$0	$690,625.00	74.87 %	$1,381,251.00	58.87 %
2024	$137,394	$711,344.00	73.26 %	$1,422,688.00	55.26 %
2025	$1,674,006	$732,684.00	75.82 %	$1,465,369.00	55.82 %
Total:	**$17,071,400**	**$6,437,446.00**		**$12,874,890.00**	

Deficiency Summary by System

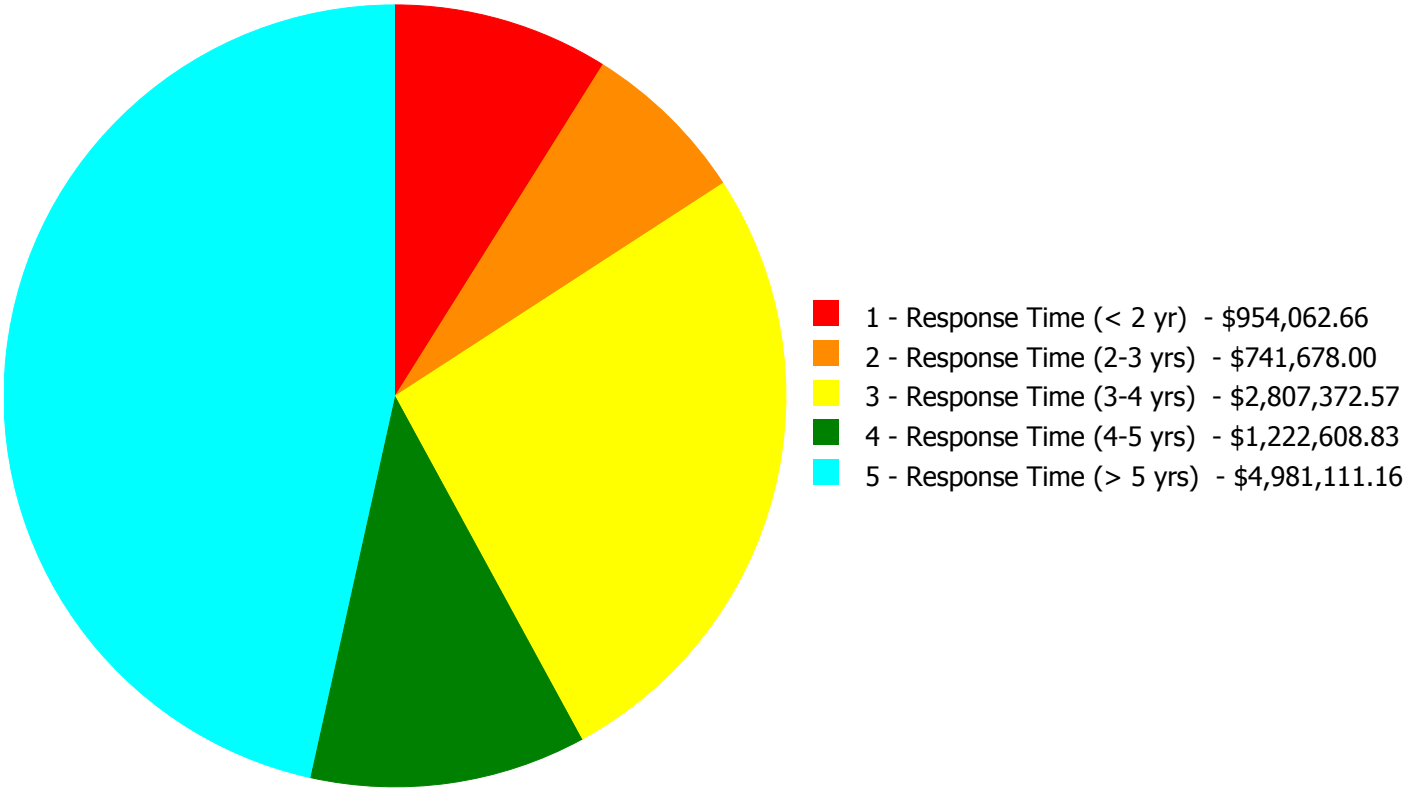
Current deficiencies included assemblies that have reached or exceeded their design life or components of the assemblies that are in need of repair. Assemblies that have reached their design life are identified as current deficiencies and assigned the distress 'Beyond Useful Life'. The following chart lists all current deficiencies associated with this facility.



Budget Estimate Total: $10,706,833.22

Deficiency Summary by Priority

The following chart shows the total repair costs broken down by priority. Assessors assigned deficiencies within eCOMET to one of the following priority categories:



Budget Estimate Total: $10,706,833.22

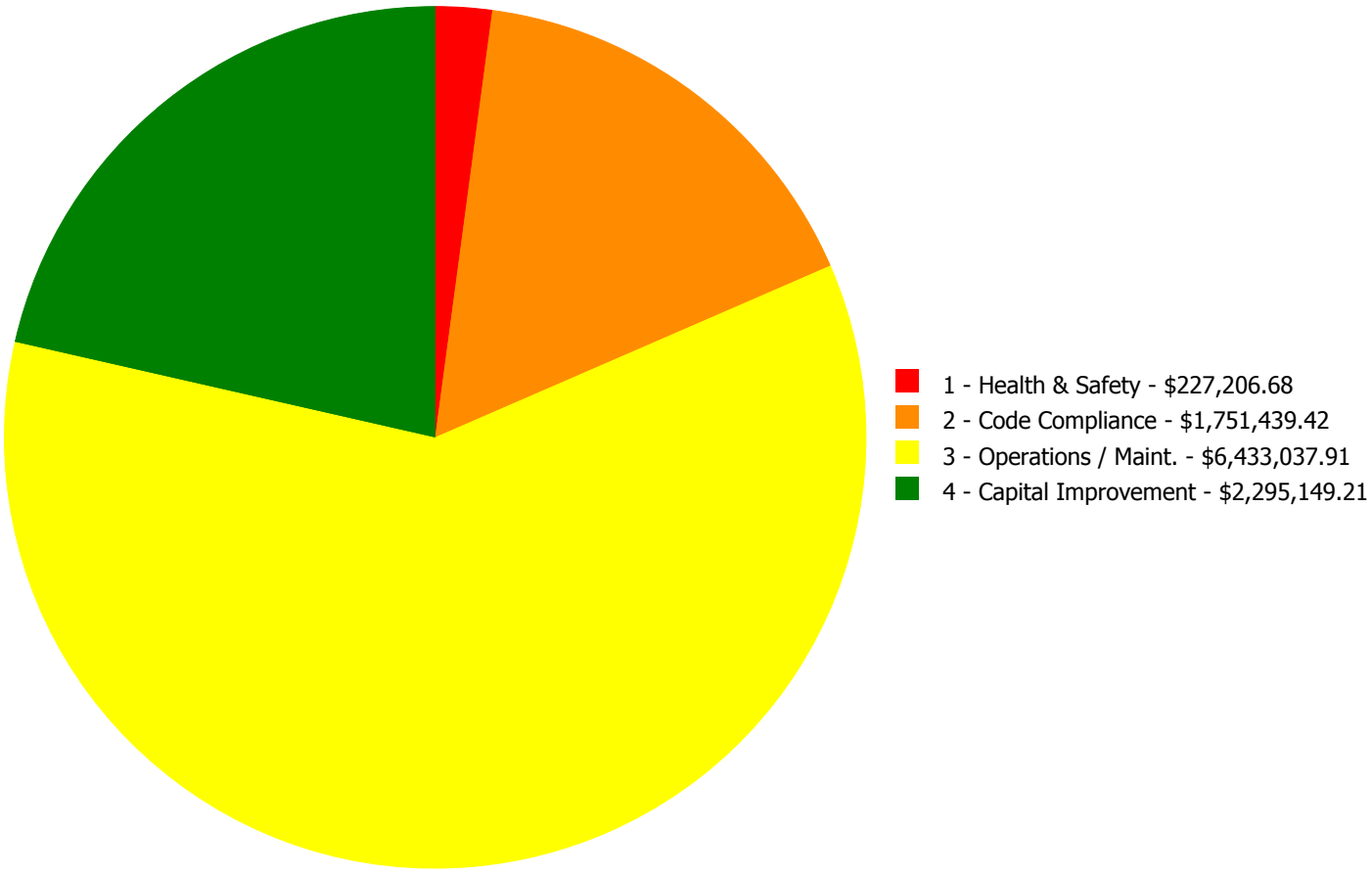
Deficiency By Priority Investment Table

The table below shows the current investment cost grouped by deficiency priority and building system.

System Code	System Description	1 - Response Time (< 2 yr)	2 - Response Time (2-3 yrs)	3 - Response Time (3-4 yrs)	4 - Response Time (4-5 yrs)	5 - Response Time (> 5 yrs)	Total
B2010	Exterior Walls	$0.00	$8,531.73	$0.00	$0.00	$0.00	$8,531.73
C1020	Interior Doors	$0.00	$0.00	$69,571.18	$0.00	$0.00	$69,571.18
C1030	Fittings	$0.00	$0.00	$0.00	$33,864.06	$0.00	$33,864.06
C3010230	Paint & Covering	$0.00	$67,738.77	$0.00	$0.00	$0.00	$67,738.77
C3020414	Wood Flooring	$0.00	$0.00	$0.00	$77,638.16	$0.00	$77,638.16
C3030	Ceiling Finishes	$0.00	$0.00	$23,935.14	$0.00	$0.00	$23,935.14
D1010	Elevators and Lifts	$0.00	$0.00	$1,012,601.25	$0.00	$0.00	$1,012,601.25
D2010	Plumbing Fixtures	$0.00	$200,164.66	$0.00	$0.00	$0.00	$200,164.66
D2020	Domestic Water Distribution	$52,907.04	$0.00	$54,606.72	$273,637.44	$0.00	$381,151.20
D2030	Sanitary Waste	$0.00	$0.00	$264,910.51	$0.00	$0.00	$264,910.51
D2040	Rain Water Drainage	$0.00	$239,459.22	$0.00	$0.00	$0.00	$239,459.22
D3020	Heat Generating Systems	$128,661.51	$0.00	$0.00	$0.00	$0.00	$128,661.51
D3030	Cooling Generating Systems	$0.00	$0.00	$0.00	$0.00	$850,289.19	$850,289.19
D3040	Distribution Systems	$0.00	$177,179.97	$510,860.11	$0.00	$2,972,409.03	$3,660,449.11
D3050	Terminal & Package Units	$0.00	$48,603.65	$0.00	$0.00	$0.00	$48,603.65
D3060	Controls & Instrumentation	$0.00	$0.00	$0.00	$0.00	$1,158,412.94	$1,158,412.94
D4010	Sprinklers	$772,494.11	$0.00	$0.00	$0.00	$0.00	$772,494.11
D5010	Electrical Service/Distribution	$0.00	$0.00	$0.00	$789,167.53	$0.00	$789,167.53
D5020	Lighting and Branch Wiring	$0.00	$0.00	$643,680.98	$0.00	$0.00	$643,680.98
D5030	Communications and Security	$0.00	$0.00	$227,206.68	$0.00	$0.00	$227,206.68
E2010	Fixed Furnishings	$0.00	$0.00	$0.00	$48,301.64	$0.00	$48,301.64
	Total:	$954,062.66	$741,678.00	$2,807,372.57	$1,222,608.83	$4,981,111.16	$10,706,833.22

Deficiency Summary by Category

The following chart shows the total repair costs broken down by deficiency categories. Assessors assigned deficiencies to one of the following categories:



Budget Estimate Total: $10,706,833.22

Deficiency Details by Priority

The deficiency detail notes listed below provide additional information on identified deficiencies found within the facility.

Priority 1 - Response Time (< 2 yr):

System: D2020 - Domestic Water Distribution

Location: Boiler room

Distress: Damaged

Category: 3 - Operations / Maint.

Priority: 1 - Response Time (< 2 yr)

Correction: Replace duplex domestic booster pump set (5 HP)

Qty: 1.00

Unit of Measure: Ea.

Estimate: $52,907.04

Assessor Name: System

Date Created: 01/12/2016

Notes: Replace the duplex 7.5HP domestic water booster pumps and isolation valves on the incoming domestic water line with a new skid mounted pressure booster system.

System: D3020 - Heat Generating Systems

Location: Boiler room

Distress: Damaged

Category: 3 - Operations / Maint.

Priority: 1 - Response Time (< 2 yr)

Correction: Replace boiler feed pump (duplex) and surge tank

Qty: 1.50

Unit of Measure: Ea.

Estimate: $128,661.51

Assessor Name: System

Date Created: 01/12/2016

Notes: Replace the existing boiler feed tank, which is leaking, and three (3) 3/4HP pumps in the boiler room.

System: D4010 - Sprinklers

Location: Throughout building

Distress: Life Safety / NFPA / PFD

Category: 2 - Code Compliance

Priority: 1 - Response Time (< 2 yr)

Correction: Install a fire protection sprinkler system

Qty: 54,000.00

Unit of Measure: S.F.

Estimate: $772,494.11

Assessor Name: System

Date Created: 01/12/2016

Notes: Install a fire protection sprinkler system with quick response type heads to reduce insurance costs by providing protection for the property. A fire pump may be required depending on the available city water pressure.

Priority 2 - Response Time (2-3 yrs):

System: B2010 - Exterior Walls

Location: Front elevation above entry area

Distress: Building Envelope Integrity

Category: 3 - Operations / Maint.

Priority: 2 - Response Time (2-3 yrs)

Correction: Repoint horizontal or vertical joints at limestone coping

Qty: 500.00

Unit of Measure: L.F.

Estimate: $8,531.73

Assessor Name: System

Date Created: 02/17/2016

Notes: Re-point stone cornices.

System: C3010230 - Paint & Covering

Location: Gym and basement corridor, stairwell

Distress: Damaged

Category: 3 - Operations / Maint.

Priority: 2 - Response Time (2-3 yrs)

Correction: Repair and repaint all interior walls - SF of wall surface

Qty: 10,000.00

Unit of Measure: S.F.

Estimate: $67,738.77

Assessor Name: System

Date Created: 02/17/2016

Notes: Repair and repaint all walls.

System: D2010 - Plumbing Fixtures

Location: Corridords

Distress: Beyond Service Life

Category: 3 - Operations / Maint.

Priority: 2 - Response Time (2-3 yrs)

Correction: Remove and replace water fountains to meet ADA - includes high and low fountains and new recessed alcove

Qty: 8.00

Unit of Measure: Ea.

Estimate: $125,543.18

Assessor Name: System

Date Created: 01/12/2016

Notes: Replace eight (8) wall hung drinking fountains and integral refrigerated coolers in the corridors. These units are beyond their service life and most are NOT accessible type.

System: D2010 - Plumbing Fixtures

Location: Restrooms

Distress: Damaged

Category: 3 - Operations / Maint.

Priority: 2 - Response Time (2-3 yrs)

Correction: Remove and replace or replace water closet - quantify additional units

Qty: 10.00

Unit of Measure: Ea.

Estimate: $74,621.48

Assessor Name: System

Date Created: 01/12/2016

Notes: Replace ten (10) water closets, which are falling off the wall, in the restrooms with new fixtures.

System: D2040 - Rain Water Drainage

Location: Throughout building

Distress: Beyond Service Life

Category: 3 - Operations / Maint.

Priority: 2 - Response Time (2-3 yrs)

Correction: Inspect internal rain water drainage piping and replace pipe - based on SF of multi-story building - insert SF of building

Qty: 54,000.00

Unit of Measure: S.F.

Estimate: $239,459.22

Assessor Name: System

Date Created: 01/12/2016

Notes: Hire a qualified contractor to perform a detailed examination of the rain water drainage piping using visual inspection and video cameras to locate and replace any damaged piping and to further quantify the extent of potential failures.

System: D3040 - Distribution Systems

This deficiency has no image.

Location: Throughout building

Distress: Failing

Category: 3 - Operations / Maint.

Priority: 2 - Response Time (2-3 yrs)

Correction: Conduct a steam trap survey and replace failed units.

Qty: 54,000.00

Unit of Measure: S.F.

Estimate: $177,179.97

Assessor Name: System

Date Created: 01/12/2016

Notes: Conduct a steam trap survey to identify and replace failed traps passing live steam into the condensate piping system.

System: D3050 - Terminal & Package Units

Location: Portable

Distress: Beyond Service Life

Category: 3 - Operations / Maint.

Priority: 2 - Response Time (2-3 yrs)

Correction: Remove and replace rooftop package unit - 5 ton including duct - remove the duct from the estimate if not required

Qty: 1.00

Unit of Measure: Ea.

Estimate: $48,603.65

Assessor Name: System

Date Created: 01/12/2016

Notes: Replace the existing packaged rooftop unit, which is estimated to be at the end of its useful service life, serving the portable classroom on the Northwest side of the building.

Priority 3 - Response Time (3-4 yrs):

System: C1020 - Interior Doors

Location: Through out building
Distress: Accessibility
Category: 3 - Operations / Maint.
Priority: 3 - Response Time (3-4 yrs)
Correction: Replace door knobs with compliant lever type
Qty: 125.00
Unit of Measure: Ea.
Estimate: $69,571.18
Assessor Name: System
Date Created: 02/17/2016

Notes: Provide ADA compliant hardware on interior doors.

System: C3030 - Ceiling Finishes

Location: Ceilings in restrooms,
Distress: Damaged
Category: 3 - Operations / Maint.
Priority: 3 - Response Time (3-4 yrs)
Correction: Re-paint ceilings - SF of ceilings
Qty: 5,000.00
Unit of Measure: S.F.
Estimate: $23,935.14
Assessor Name: System
Date Created: 02/17/2016

Notes: Repair (10%) and repaint all ceilings.

System: D1010 - Elevators and Lifts

This deficiency has no image.

Location: Main entrance near lobby

Distress: Accessibility

Category: 3 - Operations / Maint.

Priority: 3 - Response Time (3-4 yrs)

Correction: Add external 4 stop elevator - adjust the electrical run lengths to hook up the elevator

Qty: 1.00

Unit of Measure: Ea.

Estimate: $1,012,601.25

Assessor Name: System

Date Created: 02/17/2016

Notes: Install new 2500 lbs elevator on exterior of building.

System: D2020 - Domestic Water Distribution

Location: Boiler room

Distress: Beyond Service Life

Category: 3 - Operations / Maint.

Priority: 3 - Response Time (3-4 yrs)

Correction: Replace vertical tank type gas-fired water heater (75 gal)

Qty: 1.00

Unit of Measure: Ea.

Estimate: $54,606.72

Assessor Name: System

Date Created: 01/12/2016

Notes: Replace existing vertical gas fired, 65 gallon, domestic hot water heater which is approaching the end of its service life with a new gas fired hot water heater.

System: D2030 - Sanitary Waste

Location: Throughout building

Distress: Beyond Service Life

Category: 3 - Operations / Maint.

Priority: 3 - Response Time (3-4 yrs)

Correction: Inspect sanitary waste piping and replace damaged sections. (+50KSF)

Qty: 54,000.00

Unit of Measure: S.F.

Estimate: $264,910.51

Assessor Name: System

Date Created: 01/12/2016

Notes: Hire a qualified contractor to perform a detailed examination of the sanitary waste piping using visual inspection and video cameras to locate and replace any damaged piping and to further quantify the extent of potential failures.

System: D3040 - Distribution Systems

Location: Throughout building

Distress: Beyond Service Life

Category: 3 - Operations / Maint.

Priority: 3 - Response Time (3-4 yrs)

Correction: Perform testing to identify and replace damaged steam and condensate piping.

Qty: 54,000.00

Unit of Measure: S.F.

Estimate: $510,860.11

Assessor Name: System

Date Created: 01/12/2016

Notes: Hire a qualified contractor to examine the steam and condensate piping, in service for over 80 years, and perform additional testing to locate and replace any damaged piping and to further quantify the extent of potential failures.

System: D5020 - Lighting and Branch Wiring

Location: throughout the building

Distress: Beyond Service Life

Category: 3 - Operations / Maint.

Priority: 3 - Response Time (3-4 yrs)

Correction: Replace Lighting Fixtures (SF)

Qty: 0.00

Unit of Measure: S.F.

Estimate: $357,233.90

Assessor Name: System

Date Created: 02/09/2016

Notes: Install new lighting system for 70% of the building.
54,000 SF x 70% = 37,800 SF

System: D5020 - Lighting and Branch Wiring

Location: throughout the building

Distress: Inadequate

Category: 4 - Capital Improvement

Priority: 3 - Response Time (3-4 yrs)

Correction: Replace Wiring Devices (SF) - surface mounted conduit and boxes

Qty: 0.00

Unit of Measure: S.F.

Estimate: $286,447.08

Assessor Name: System

Date Created: 02/09/2016

Notes: Install new receptacles for 50% of the building
54,000 x 50% = 27,000 SF

System: D5030 - Communications and Security

Location: throughout the building

Distress: Health Hazard / Risk

Category: 1 - Health & Safety

Priority: 3 - Response Time (3-4 yrs)

Correction: Replace fire alarm system

Qty: 1.00

Unit of Measure: S.F.

Estimate: $227,206.68

Assessor Name: System

Date Created: 02/09/2016

Notes: Install new Automated Fire alarm System.

Priority 4 - Response Time (4-5 yrs):

System: C1030 - Fittings

Location: Through out building

Distress: Obsolete

Category: 3 - Operations / Maint.

Priority: 4 - Response Time (4-5 yrs)

Correction: Replace missing or damaged signage - insert the number of rooms

Qty: 125.00

Unit of Measure: Ea.

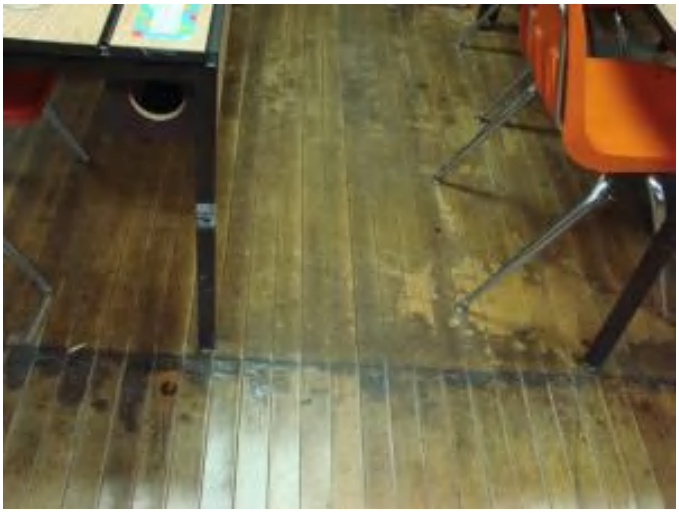
Estimate: $33,864.06

Assessor Name: System

Date Created: 02/17/2016

Notes: Install new signage throughout.

System: C3020414 - Wood Flooring



Location: B627001;Jenks, John

Distress: Appearance

Category: 3 - Operations / Maint.

Priority: 4 - Response Time (4-5 yrs)

Correction: Remove and replace partial area of wood flooring and refinish entire floor - set replacement area

Qty: 3,000.00

Unit of Measure: S.F.

Estimate: $77,638.16

Assessor Name: System

Date Created: 02/17/2016

Notes: Repair (20%) refinish hardwood flooring (50%).

System: D2020 - Domestic Water Distribution

Location: Throughout building

Distress: Beyond Service Life

Category: 3 - Operations / Maint.

Priority: 4 - Response Time (4-5 yrs)

Correction: Replace domestic water piping (75 KSF)

Qty: 54,000.00

Unit of Measure: S.F.

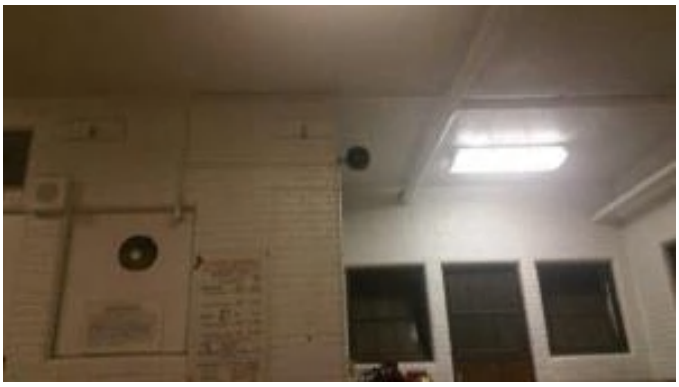
Estimate: $273,637.44

Assessor Name: System

Date Created: 01/12/2016

Notes: Hire a qualified contractor to perform a detailed inspection of the domestic water piping, in use for an unknown amount of time, and replace any damaged piping.

System: D5010 - Electrical Service/Distribution



Location: throughout the building

Distress: Beyond Service Life

Category: 3 - Operations / Maint.

Priority: 4 - Response Time (4-5 yrs)

Correction: Replace Panelboard - 225A

Qty: 0.00

Unit of Measure: Ea.

Estimate: $477,720.80

Assessor Name: System

Date Created: 02/09/2016

Notes: Install new 120V lighting and receptacle panels throughout the building (total of 10)

System: D5010 - Electrical Service/Distribution

Location: electrical room

Distress: Beyond Service Life

Category: 3 - Operations / Maint.

Priority: 4 - Response Time (4-5 yrs)

Correction: Replace Service Transformer, Add Switchboard

Qty: 0.00

Unit of Measure: Ea.

Estimate: $311,446.73

Assessor Name: System

Date Created: 02/08/2016

Notes: Install a new and upgraded electrical service for this school to handle existing loads plus any additional mechanical loads.

System: E2010 - Fixed Furnishings

Location: Auditorium

Distress: Damaged

Category: 3 - Operations / Maint.

Priority: 4 - Response Time (4-5 yrs)

Correction: Refinish auditorium seating

Qty: 75.00

Unit of Measure: Ea.

Estimate: $48,301.64

Assessor Name: System

Date Created: 02/17/2016

Notes: Refurbish auditorium seating 25%.

Priority 5 - Response Time (> 5 yrs):

System: D3030 - Cooling Generating Systems

Location: Throughout building

Distress: Inadequate

Category: 4 - Capital Improvement

Priority: 5 - Response Time (> 5 yrs)

Correction: Install chilled water system with distribution piping and pumps. (+75KSF)

Qty: 54,000.00

Unit of Measure: S.F.

Estimate: $850,289.19

Assessor Name: System

Date Created: 01/12/2016

Notes: Remove the window air conditioning units and install a 150 ton air-cooled chiller with chilled water distribution piping and pumps to supply more reliable air conditioning for the building with a much longer service life.

System: D3040 - Distribution Systems

Location: Classrooms

Distress: Beyond Service Life

Category: 3 - Operations / Maint.

Priority: 5 - Response Time (> 5 yrs)

Correction: Provide classroom FC units and dedicated OA ventilation system. (20 clsrms)

Qty: 24.00

Unit of Measure: C

Estimate: $1,993,463.72

Assessor Name: System

Date Created: 01/13/2016

Notes: Remove the existing cast iron steam radiators and install fan coil units with hot and chilled water coils and a dedicated outdoor air system.

System: D3040 - Distribution Systems

Location: Auditorium

Distress: Building / MEP Codes

Category: 2 - Code Compliance

Priority: 5 - Response Time (> 5 yrs)

Correction: Install HVAC unit for Auditorium (200 seat).

Qty: 300.00

Unit of Measure: Seat

Estimate: $427,628.15

Assessor Name: System

Date Created: 01/13/2016

Notes: Provide ventilation for the Auditorium by installing a fan coil air handling unit hung from the structure with outdoor air ducted to the unit from louvers in window openings.

System: D3040 - Distribution Systems

Location: Cafeteria/Gymnasium

Distress: Building / MEP Codes

Category: 2 - Code Compliance

Priority: 5 - Response Time (> 5 yrs)

Correction: Install HVAC unit for Gymnasium (single station).

Qty: 6,000.00

Unit of Measure: Ea.

Estimate: $344,860.27

Assessor Name: System

Date Created: 01/13/2016

Notes: Provide ventilation for the Cafeteria/Gymnasium by installing a constant volume air handling unit with distribution ductwork and registers.

System: D3040 - Distribution Systems

This deficiency has no image.

Location: Administration

Distress: Building / MEP Codes

Category: 2 - Code Compliance

Priority: 5 - Response Time (> 5 yrs)

Correction: Install HVAC unit for Administration (2000 students).

Qty: 477.00

Unit of Measure: Pr.

Estimate: $206,456.89

Assessor Name: System

Date Created: 01/13/2016

Notes: Provide ventilation for the administration offices by installing a fan coil air handling unit hung from the structure with outdoor air ducted to the unit from louvers in window openings.

System: D3060 - Controls & Instrumentation

Location: Throughout building

Distress: Inadequate

Category: 4 - Capital Improvement

Priority: 5 - Response Time (> 5 yrs)

Correction: Replace pneumatic controls with DDC (75KSF)

Qty: 54,000.00

Unit of Measure: S.F.

Estimate: $1,158,412.94

Assessor Name: System

Date Created: 01/12/2016

Notes: Replace the pneumatic controls for the HVAC systems with modern DDC modules, valves and actuators to improve reliability and energy efficiency. Provide a new building automation system (BAS) with communication interface to the preferred system in use throughout the District.

Equipment Inventory

The following table represents the inventory details of the inventory found in the building, which fall under the following subsystems:

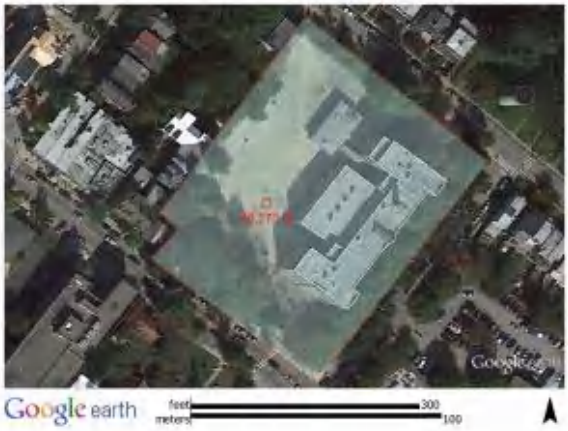
Subsystem	Inventory	Qty	UoM	Location	Manufacturer	Model Number	Serial Number	Barcode	Life	Install Date	Next Renewal	Raw Cost	Inventory Cost
D2020 Domestic Water Distribution	Pump, pressure booster system, 7-1/2 HP pump, includes diaphragm tank, control and pressure switch	1.00	Ea.	Boiler Room	Alyan				25	1995	2020	$12,198.00	$13,417.80
D3020 Heat Generating Systems	Boiler, gas/oil combination, cast iron, steam, gross output, 4070 MBH, includes burners, controls and insulated jacket, packaged	3.00	Ea.	Boiler Room	HB Smith	28A-S/W-16			35	2009	2044	$106,115.00	$350,179.50
D3020 Heat Generating Systems	Boiler, gas/oil combination, cast iron, steam, gross output, 4070 MBH, includes burners, controls and insulated jacket, packaged	3.00	Ea.	Boiler Room	HB Smith	28A-S/W-16			35	2009	2044	$106,115.00	$350,179.50
D3020 Heat Generating Systems	Boiler, gas/oil combination, cast iron, steam, gross output, 4070 MBH, includes burners, controls and insulated jacket, packaged	3.00	Ea.	Boiler Room	HB Smith	28A-S/W-16			35	2009	2044	$106,115.00	$350,179.50
D5010 Electrical Service/Distribution	Load interrupter switch, 2 position, 300 kVA & below, 13.8 kV, 600 amp w/CLF fuses, NEMA 1	1.00	Ea.	electrical room					30	1924	1954	$42,600.60	$46,860.66
D5010 Electrical Service/Distribution	Panelboard, 4 wire w/conductor & conduit, NEHB, 277/480 V, 400 A, 0 stories, 0' horizontal	4.00	Ea.	electrical room					30	2010	2040	$13,413.60	$59,019.84
D5090 Other Electrical Systems	Generator set, diesel, 3 phase 4 wire, 277/480 V, 125 kW, incl battery, charger, muffler, & day tank, excl conduit, wiring, & concrete	1.00	Ea.	electrical room					30	1924	1954	$50,797.80	$55,877.58
												Total:	**$1,225,714.38**

Executive Summary

Building condition is evaluated based on the functional systems and elements of a building and organized according to the UNIFORMAT II Elemental Classification. The grouping of these systems and elements and applying a current replacement value to them develops a representative building cost model. Cost Models are developed for similar building types and functions. Systems and their elements are evaluated based on their current replacement values, life cycles, installation dates and next renewal dates. Systems and their elements that are within their useful lives are further evaluated to identify current deficient conditions that may have a significant impact on a system's or element's remaining service life, and to determine if they are beyond their predicted expected life. The system's or element's current replacement value is based on RS Means Commercial Cost Data.

Following are the cost model's system details for this facility. The Replacement Value is the amount needed to replace the property of the same present value. The Current Repair Amount, also known as Condition Needs, represents the budgeted contractor installed costs plus owner's soft costs for the repair, replacement or renewal for a component or system level deficiency. It excludes contributing costs for other components or systems that might also be associated with the corrective actions due to packaging the work. Facility Condition Index (FCI) FCI is an industry-standard measurement of facility condition calculated as the ratio of the costs to correct a facility's deficiencies to the facility's Current Replacement Value. It ranges from 0% (new) to 100% (very poor). Condition Index (CI) is calculated as the sum of a renewable system's Remaining Service Life (RSL) divided by the sum of a system's Replacement Value (both values exclude soft-cost to simplify calculation updates) expressed as a percentage ranging from 100% (new) to 0% (expired).

Function:	
Gross Area (SF):	83,700
Year Built:	1924
Last Renovation:	
Replacement Value:	$1,454,085
Repair Cost:	$285,249.32
Total FCI:	19.62 %
Total RSLI:	55.11 %



Description:

Attributes:

General Attributes:

Bldg ID:	S627001	Site ID:	S627001

Condition Summary

The Table below shows the CI and FCI for each major building system shown at the UNIFORMAT classification Level II. Note that Systems with lower FCIs require less investment than systems with higher FCIs.

UNIFORMAT Classification	RSLI %	FCI %	Current Repair Cost
G20 - Site Improvements	37.89 %	13.03 %	$142,036.47
G40 - Site Electrical Utilities	106.67 %	39.33 %	$143,212.85
Totals:	**55.11 %**	**19.62 %**	**$285,249.32**

Condition Detail

This section of the report contains results of the Facility Condition Assessment. The building is separated into system components based on UNIFORMAT II classification. The columns in the System Listing table below represent the following:

1. System Code: A code that identifies the system.
2. System Description: A brief description of a system present in the building.
3. Unit Price $: The unit price of the system.
4. UoM: The unit of measure for of the system.
5. Qty: The quantity for the system
6. Life: anticipated service life for thesystem based on Building Owners and Managers Association (BOMA) recommendations.
7. Year Installed: The date of system installation.
8. Calc Next Renewal Year: The date of system expiration based on the life, NR stands for non renewable.
9. Next Renewal Year: The suggested system expiration date by the assessor based on visual inspection.
10. CI: The Condition Index of the system.
11. FCI: The Facility Condition Index of the system.
12. RSL: Remaining Service Life.
13. eCR: eCOMET Condition Rating (not used).
14. Deficiency $: The financial investment to repair/replace system.

System Listing

The System Listing table below lists each of the systems organized by their UNIFORMAT II classification. The assessment team was tasked with recording the most recent replacement year of each system, determining the remaining service life based on the theoretical life, and evaluating the condition to confirm the forecast next replacement year. The system listing is the basis for all data contained in the Building Assessment Report.

Additionally, a condition rating (eCR) based on the following guidelines is provided as observed at the time of the assessment.

- Excellent (E) - No noticeable distress or damage. The entire system is free from observable defect.
- Very Good (VG) - Overall no serviceability reduction for the entire system. No degradation of critical components and minor distress and defect noticeable for some but not non critical components within the system.
- Good (G) - Slight or no serviceability reduction for the entire system. There may be noticeable defects for some non critical components and slight noticeable degradation of the critical components.
- Fair (F) - Overall serviceability is degraded but adequate. There may be moderate deterioration for very few of the critical components and few of the non critical components may have severe degradation.
- Marginal (MA) - Overall serviceability and reliability loss. Most if not all of the non critical components suffer from severe degradation and a few of the critical component may have severe degradation.
- Moderate (MO) - Overall a significant serviceability loss. Most if not all the components have severe degradation with the reminder of the component showing visible distress.
- Very Poor (VP) - Overall the system is barely functional. All of the components are severely degraded.
- Non-Functional (NF) - Overall the system does not function with all the components having no serviceability and suffer from severe degradation.

System Code	System Description	Unit Price $	UoM	Qty	Life	Year Installed	Calc Next Renewal Year	Next Renewal Year	RSLI%	FCI%	RSL	eCR	Deficiency $	Replacement Value $
G2010	Roadways	$11.52	S.F.		30				0.00 %	0.00 %				$0
G2020	Parking Lots	$7.65	S.F.		30				0.00 %	0.00 %				$0
G2030	Pedestrian Paving	$11.52	S.F.	52,800	40	1990	2030		37.50 %	23.35 %	15		$142,036.47	$608,256
G2040	Site Development	$4.36	S.F.	83,700	25	2000	2025		40.00 %	0.00 %	10			$364,932
G2050	Landscaping & Irrigation	$3.78	S.F.	30,900	15	2005	2020		33.33 %	0.00 %	5			$116,802
G4020	Site Lighting	$3.58	S.F.	83,700	30	1924	1954	2047	106.67 %	26.38 %	32		$79,041.73	$299,646
G4030	Site Communications & Security	$0.77	S.F.	83,700	30	1924	1954	2047	106.67 %	99.57 %	32		$64,171.12	$64,449
								Total	**55.11 %**	**19.62 %**			**$285,249.32**	**$1,454,085**

System Notes

The facility description in the site executive summary contains an overview of each system. The notes listed below provide additional information on select systems found within the facility.

No data found for this asset

Renewal Schedule

eCOMET forecasts future Capital Renewal funding needed to address expiring systems based on the Next Renewal year found in the Cost Models. A 3% annual inflation factor is applied to the costs for systems expiring in future years. The table below reflects recommended Capital Renewal funding needs over the next 10 years. Note: Cells with a zero value indicate systems for which renewal is not scheduled in that year.

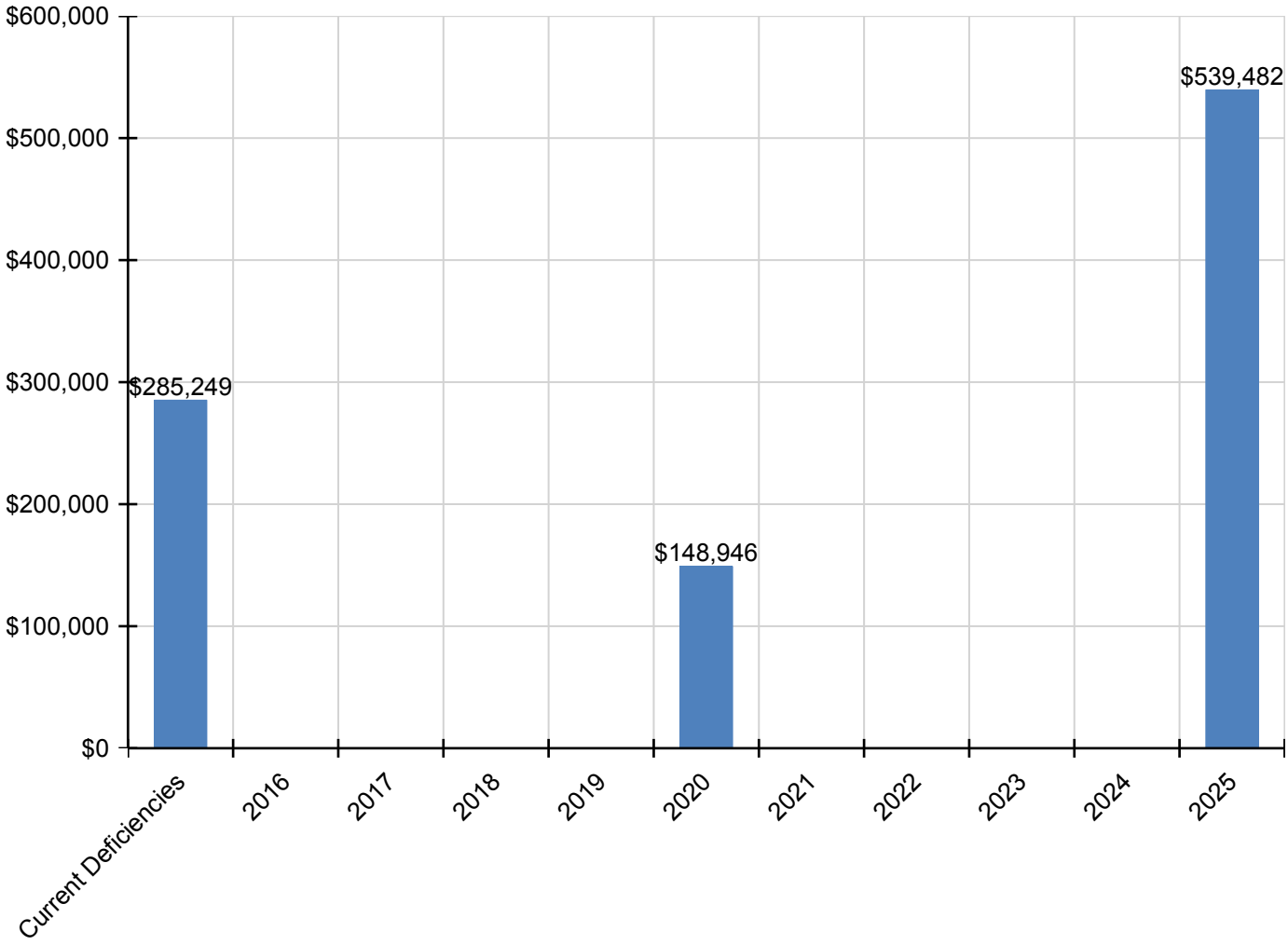
Inflation Rate: 3%

System	Current Deficiencies	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	Total
Total:	**$285,249**	**$0**	**$0**	**$0**	**$0**	**$148,946**	**$0**	**$0**	**$0**	**$0**	**$539,482**	**$973,677**
G - Building Sitework	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
G20 - Site Improvements	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
G2010 - Roadways	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
G2020 - Parking Lots	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
G2030 - Pedestrian Paving	$142,036	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$142,036**
G2040 - Site Development	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$539,482	**$539,482**
G2050 - Landscaping & Irrigation	$0	$0	$0	$0	$0	$148,946	$0	$0	$0	$0	$0	**$148,946**
G40 - Site Electrical Utilities	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$0**
G4020 - Site Lighting	$79,042	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$79,042**
G4030 - Site Communications & Security	$64,171	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	**$64,171**

** Indicates non-renewable system*

Forecasted Sustainment Requirement

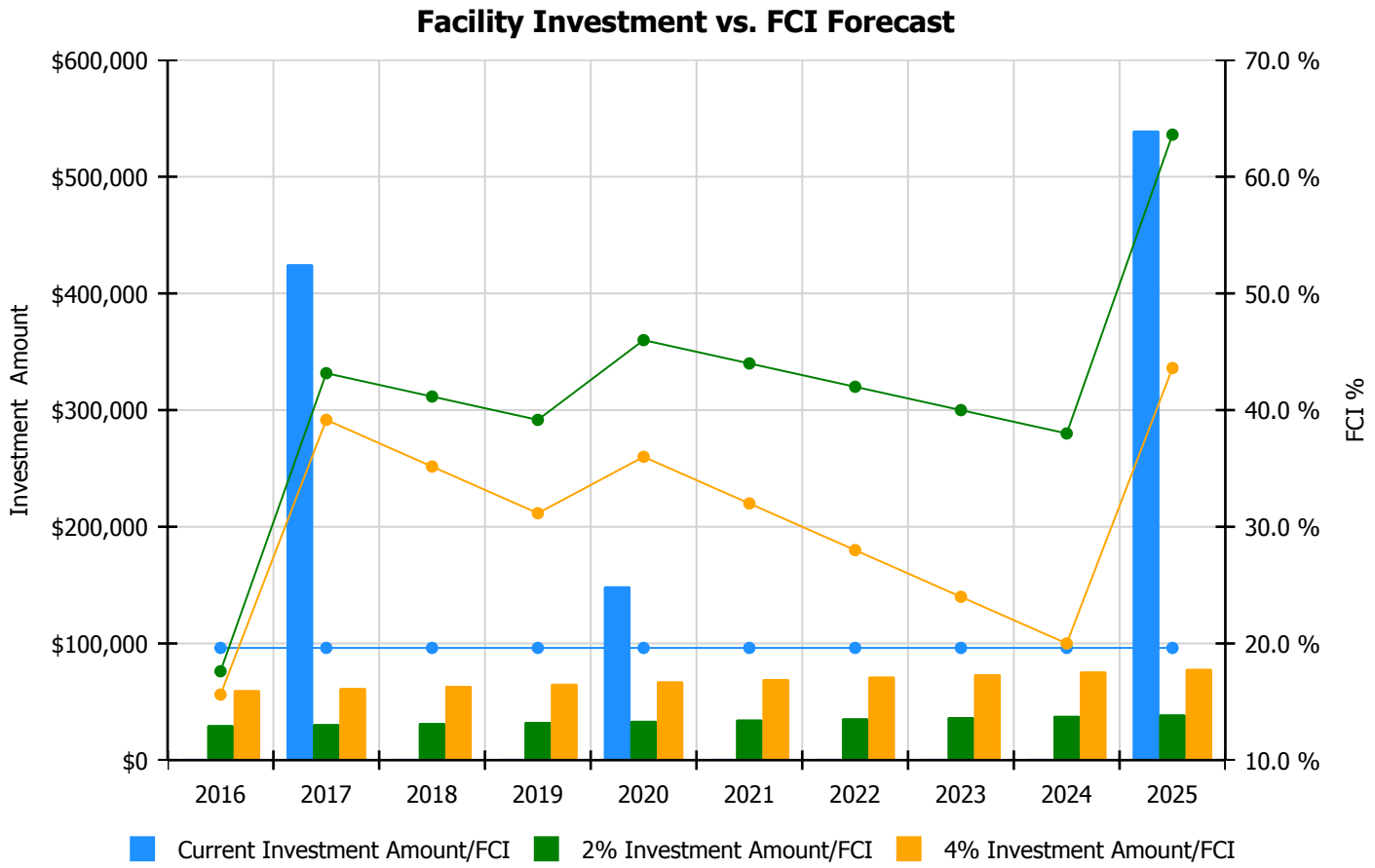
The following chart shows the current building deficiencies and forecasting sustainment requirements over the next ten years.



10 Year FCI Forecast by Investment Scenario

The chart below illustrates the effect of various investment levels on the building FCI for the next 10 years. The levels of investment shown below include:

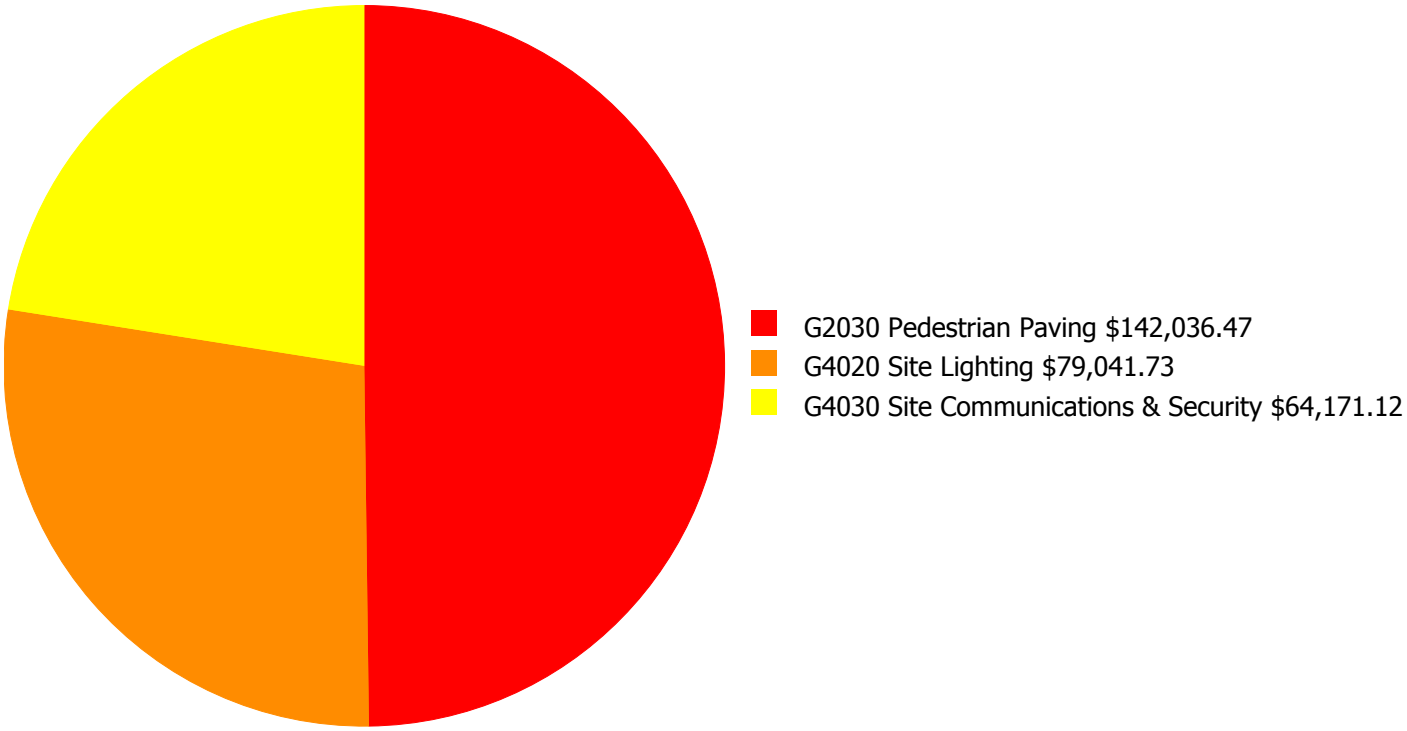
- Current FCI: a variable investment amount based on renewing expired systems to maintain the current FCI for the building
- 2% Investment: an annual investment of 2% of the replacement value of the building, escalated for inflation
- 4% Investment: an annual investment of 4% of the replacement value of the building, escalated for inflation



Year	Investment Amount Current FCI - 19.62%	2% Investment		4% Investment	
		Amount	FCI	Amount	FCI
2016	$0	$29,954.00	17.62 %	$59,908.00	15.62 %
2017	$424,896	$30,853.00	43.16 %	$61,706.00	39.16 %
2018	$0	$31,778.00	41.16 %	$63,557.00	35.16 %
2019	$0	$32,732.00	39.16 %	$65,463.00	31.16 %
2020	$148,946	$33,714.00	46.00 %	$67,427.00	36.00 %
2021	$0	$34,725.00	44.00 %	$69,450.00	32.00 %
2022	$0	$35,767.00	42.00 %	$71,534.00	28.00 %
2023	$0	$36,840.00	40.00 %	$73,680.00	24.00 %
2024	$0	$37,945.00	38.00 %	$75,890.00	20.00 %
2025	$539,482	$39,083.00	63.60 %	$78,167.00	43.60 %
Total:	**$1,113,323**	**$343,391.00**		**$686,782.00**	

Deficiency Summary by System

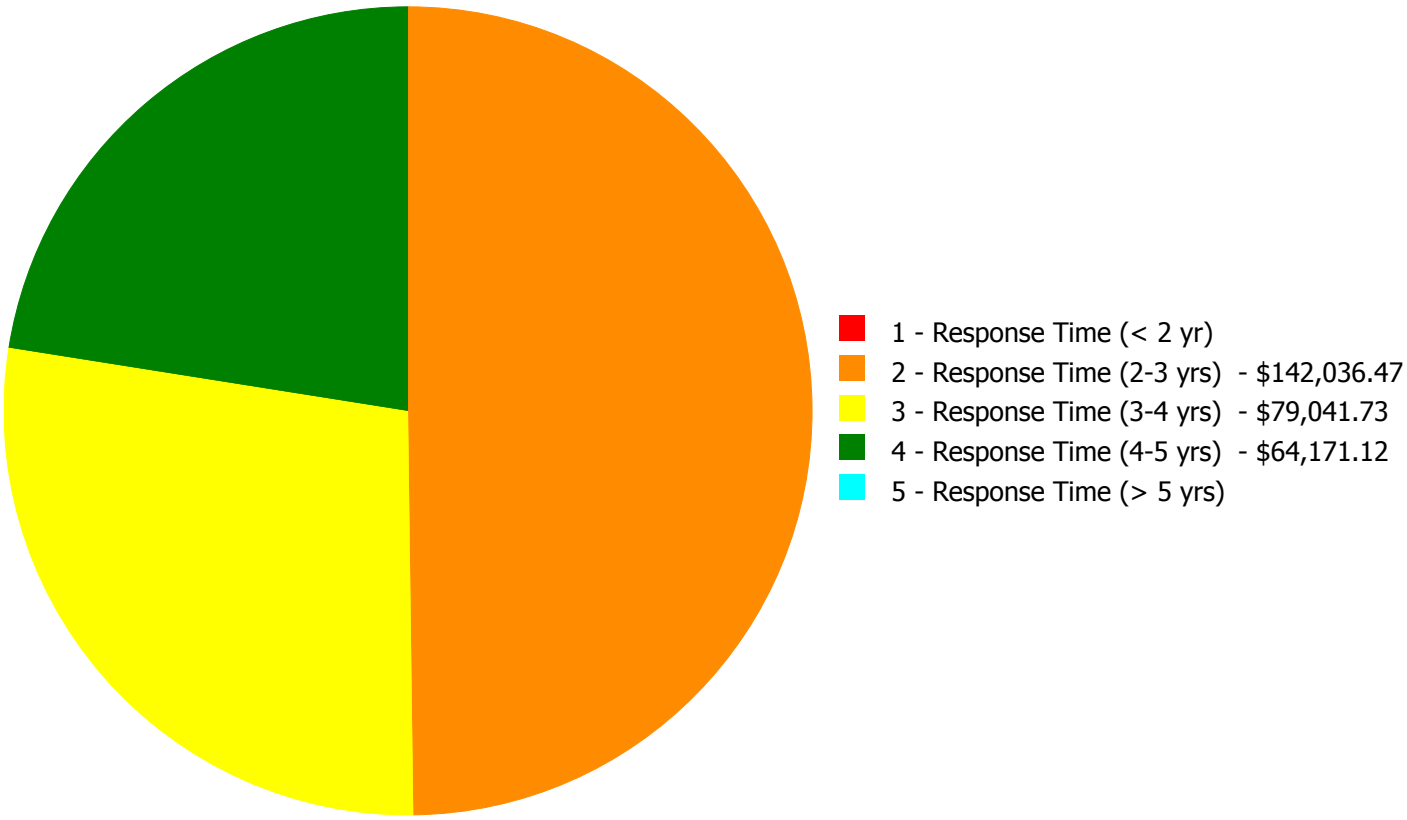
Current deficiencies included assemblies that have reached or exceeded their design life or components of the assemblies that are in need of repair. Assemblies that have reached their design life are identified as current deficiencies and assigned the distress 'Beyond Useful Life'. The following chart lists all current deficiencies associated with this facility.



Budget Estimate Total: $285,249.32

Deficiency Summary by Priority

The following chart shows the total repair costs broken down by priority. Assessors assigned deficiencies within eCOMET to one of the following priority categories:



Budget Estimate Total: $285,249.32

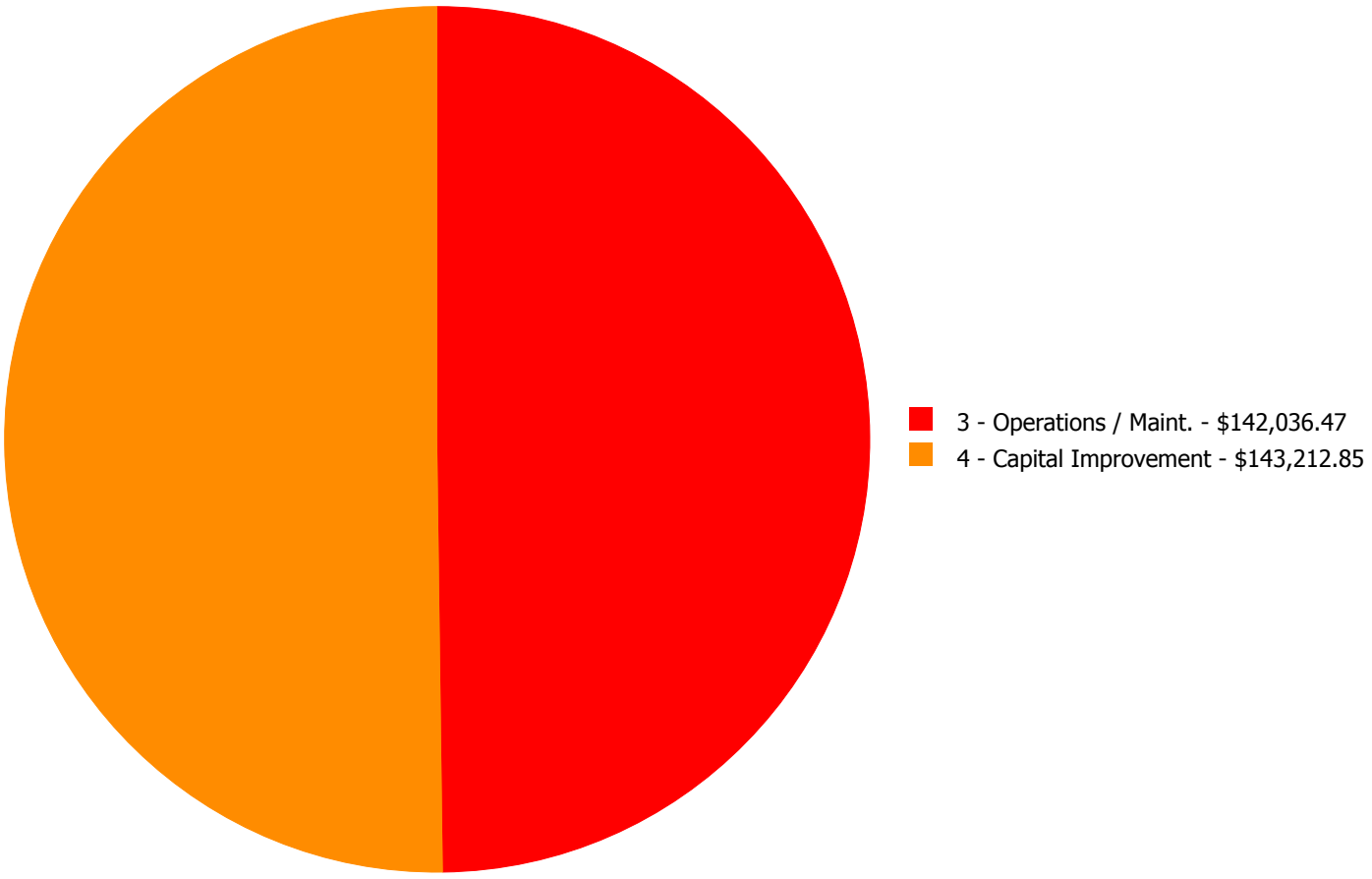
Deficiency By Priority Investment Table

The table below shows the current investment cost grouped by deficiency priority and building system.

System Code	System Description	1 - Response Time (< 2 yr)	2 - Response Time (2-3 yrs)	3 - Response Time (3-4 yrs)	4 - Response Time (4-5 yrs)	5 - Response Time (> 5 yrs)	Total
G2030	Pedestrian Paving	$0.00	$142,036.47	$0.00	$0.00	$0.00	$142,036.47
G4020	Site Lighting	$0.00	$0.00	$79,041.73	$0.00	$0.00	$79,041.73
G4030	Site Communications & Security	$0.00	$0.00	$0.00	$64,171.12	$0.00	$64,171.12
	Total:	$0.00	$142,036.47	$79,041.73	$64,171.12	$0.00	$285,249.32

Deficiency Summary by Category

The following chart shows the total repair costs broken down by deficiency categories. Assessors assigned deficiencies to one of the following categories:



Budget Estimate Total: $285,249.32

Deficiency Details by Priority

The deficiency detail notes listed below provide additional information on identified deficiencies found within the facility.

Priority 2 - Response Time (2-3 yrs):

System: G2030 - Pedestrian Paving

Location: Exterior entry on rear of building

Distress: Accessibility

Category: 3 - Operations / Maint.

Priority: 2 - Response Time (2-3 yrs)

Correction: Install an exterior ADA ramp - based on 5' wide by the linear foot - up to 84" rise - per LF of ramp - figure 1 LF of ramp per inch of rise

Qty: 60.00

Unit of Measure: L.F.

Estimate: $142,036.47

Assessor Name: Christopher Finnican

Date Created: 02/17/2016

Notes: Provide ADA ramp on exterior stair.

Priority 3 - Response Time (3-4 yrs):

System: G4020 - Site Lighting

Location: grounds

Distress: Inadequate

Category: 4 - Capital Improvement

Priority: 3 - Response Time (3-4 yrs)

Correction: Add Site Lighting - pole mounted - select the proper light and pole

Qty: 1.00

Unit of Measure: Ea.

Estimate: $79,041.73

Assessor Name: Christopher Finnican

Date Created: 02/09/2016

Notes: Install additional pole-mounted lights for the grounds

Priority 4 - Response Time (4-5 yrs):

System: G4030 - Site Communications & Security

Location: grounds

Distress: Inadequate

Category: 4 - Capital Improvement

Priority: 4 - Response Time (4-5 yrs)

Correction: Add Site Paging System

Qty: 0.00

Unit of Measure: Ea.

Estimate: $64,171.12

Assessor Name: Christopher Finnican

Date Created: 02/09/2016

Notes: Install additional exterior speakers for the grounds

Equipment Inventory

The following table represents the inventory details of the inventory found in the building, which fall under the following subsystems:

No data found for this asset

Glossary

ABMA	American Boiler Manufacturers Association http://www.abma.com/
ACEEE	American Council for an Energy-Efficient Economy
ACGIH	American Council of Governmental and Industrial Hygienists
AEE	Association of Energy Engineers
AFD	Adjustable Frequency Drive
AFTC	After Tax Cash Flow
AGA	American Gas Association
AHU	Air Handling Unit
Amp	Ampere
ANSI	American National Standards Institute
ARI	Air Conditioning and Refrigeration Institute
ASD	Adjustable Speed Drive
ASHRAE	American Society of Heating Refrigerating and Air-Conditioning Engineers Inc.
ASME	American Society of Mechanical Engineers
Assessment	Visual survey of a facility to determine its condition. It involves looking at the age of systems reviewing information from local sources and visual evidence of potential problems to assign a condition rating. It does not include destructive testing of materials or testing of systems or equipment for functionality.
ATS	After Tax Savings
AW	Annual worth
BACNET	Building Automation Control Network
BAS	Building Automation System
BCR	Benefit Cost Ratio
BEP	Business Energy Professional (AEE)
BF	Ballast Factor
BHP	Boiler Horsepower (boilers)
BHP	Brake Horsepower (motors)
BLCC	Building Life Cycle Cost analysis program (FEMP)
BOCA	Building Officials and Code Administrators
BTCF	Before Tax Cash Flow

BTS	Before Tax Savings
Btu	British thermal unit
Building Addition	An area space or component of a building added to a building after the original building's year built date.
CAA	Clean Air Act
CAAA-90	Clean Air Act Amendments of 1990
CABO	Council of American Building Officials
CAC	Conventional Air Conditioning
CADDET	Center for the Analysis and Dissemination of Demonstrated Energy Technologies
Calculated Next Renewal	The year a system or element would be expected to expire based solely on the date it was installed and the expected useful lifetime for that kind of system.
Capital Renewal	Capital renewal is condition work (excluding suitability and energy audit work) that includes the replacement of building systems or elements (as they become obsolete or beyond their useful life) not normally included in an annual operating budget. Calculated next renewal The year a system or element would be expected to expire based solely on the date it was installed and the expected useful lifetime for that kind of system. Next renewal The assessor adjusted expected useful life of a system or element based on on-site inspection.
CDD	Cooling Degree Days
CDGP	Certified Distributed Generation Professional
CEC	California Energy Commission
CEM	Certified Energy Manager
CEP	Certified Energy Procurement Professional
CFC	Chlorofluorocarbon
CFD	Cash Flow Diagram
CFL	Compact Fluorescent Light
CFM cfm	Cubic Feet per Minute
CHP	Combined Heat and Power (a.k.a. cogeneration)
CHW	Chilled Water
Condition	Condition refers to the state of physical fitness or readiness of a facility system or system element for its intended use.
COP	Coefficient of Performance
Cp	Heat Capacity of Material
CPUC	California Public Utility Commission
CRI	Color Rendering Index
CRT	Cathode Ray Tube VDT HMI

CTC	Competitive Transition Charge
Cu	Coefficient of Utilization
Current Replacement Value (CRV)	CRV represents the hypothetical total cost of rebuilding or replacing an existing facility in current dollars to its optimal condition (excluding auxiliary facilities) under current codes and construction standards.
Cv	Value Coefficient
CWS	Chilled Water System
D d	Distance (usually feet)
DB	Dry Bulb
DCV	Demand Control Ventilation
DD	Degree Day
DDB	Double Declining Balance
DDC	Direct Digital Controls
Deferred maintenance	Deferred maintenance is condition work (excluding suitability and energy audit needs) deferred on a planned or unplanned basis to a future budget cycle or postponed until funds are available.
Deficiency	A deficiency is a repair item that is damaged missing inadequate or insufficient for an intended purpose.
Delta	Difference
Delta P	Pressure Difference
Delta T	Temperature Difference
DG	Distributed Generation
DOE	Department of Energy
DP	Dew Point
DR	Demand Response
DX	Direct Expansion Air Conditioner
EA	Energy Audit
EBITDA	Earnings before Interest Taxes Depreciation and Amortization
ECI	Energy Cost Index
ECM	Energy Conservation Measure
ECO	Energy Conservation Opportunity
ECPA	Energy Conservation and Production Act
ECR	Energy Conservation Recommendation
ECS	Energy Control System

EER	Energy Efficiency Ratio
EERE	Energy Efficiency and Renewable Energy division of US DOE
EIA	Energy Information Agency
EIS	Energy Information System
EMCS	Energy Management Computer System
EMO	Energy Management Opportunity
EMP	Energy Management Project
EMR	Energy Management Recommendation
EMS	Energy Management System
Energy Utilization Index (EUI)	EUI is the measure of total energy consumed in the cooling or heating of a building in a period expressed as British thermal unit (BTU) per (cooled or heated) gross square foot.
EO	Executive Order
EPA	Environmental Protection Agency
EPACT	Energy Policy Act of 1992
EPCA	Energy Production and Conservation Act of 1975
EPRI	Electric Power Research Institute
EREN	Efficiency and Renewable Energy (Division of USDOE)
ERV	Energy Recovery Ventilator
ESCO	Energy Service Company
ESPC	Energy Savings Performance Contract
EUI	Energy Use Index
EWG	Exempt Wholesale Generators
Extended Facility Condition Index (EFCI)	EFCI is calculated as the condition needs for the current year plus facility system renewal needs going out to a set time in the future divided by Current Replacement Value.
f	Frequency
F	Fahrenheit
Facility	A facility refers to site(s) building(s) or building addition(s) or combinations thereof that provide a particular service.
Facility Condition Assessment (FCA)	FCA is a process for evaluating the condition of buildings and facilities for programming and budgetary purposes through an on site inspection and evaluation process.
Facility Condition Index (FCI)	FCI is an industry-standard measurement of a facility's condition that is the ratio of the cost to correct a facility's deficiencies to the Current Replacement Value of the facilities. The higher the FCI the poorer the condition of a facility. After an FCI is established for all buildings within a portfolio a building's condition can be ranked relative to other buildings. The FCI may also represent the condition of a portfolio based on the cumulative FCIs of the portfolio's facilities.

FC	Footcandle
FCA	Fuel Cost Adjustment
FEMIA	Federal Energy Management Improvement Act of 1988
FEMP	Federal Energy Management Program
FERC	Federal Energy Regulatory Commission
FESR	Fuel Energy Savings Ratio
FLA	Full Load Amps
FLF	Facility Load Factor (usually monthly)
FLRPM	Full Load Revolutions per Minute
FMS	Facility Management System
FPM fpm	Feet per Minute (velocity)
FSEC	Florida Solar Energy Center
Ft	Foot
GPM gpm	Gallons per Minute
GRI	Gas Research Institute
Gross Square Feet (GSF)	The size of the enclosed floor space of a building in square feet measured to the outside face of the enclosing wall.
GUI	Graphical User Interface
H h	Enthalpy Btu/lb
HCFC	Hydrochlorofluorocarbons
HDD	Heating Degree days
HFC	Hydrofluorocarbons
HHV	Higher Heating Value
HID	High Intensity Discharge (lamp)
HMI	Human Machine Interface
HMMI	Human Man Machine Interface
HO	High Output (lamp)
HP Hp hp	Horsepower
HPS	High Pressure Sodium (lamp)
HR	Humidity Ratio
Hr hr	Hour

HRU	Heat Recovery Unit
HVAC	Heating Ventilation and Air-Conditioning
Hz	Hertz
I	Intensity (lumen output of lamp)
I i	Interest rate or Discount rate
IAQ	Indoor Air Quality
ICA	International Cogeneration Alliance
ICBO	International Conference of Buildings Officials
ICC	International Code Council
ICP	Institutional Conservation Program
IECC	International Energy Conservation Code
IEEE	Institute of Electrical and Electronic Engineers
IESNA	Illuminating Engineering Society of North America
Install year	The year a building or system was built or the most recent major renovation date (where a minimum of 70 of the system?s Current Replacement Value (CRV) was replaced).
IRP	Integrated Resource Planning
IRR	Internal Rate of Return
ISO	Independent System Operator
ITA	Independent Tariff Administrator
k	Kilo multiple of thousands in SI system
K	Kelvins (color temperature of lamp)
K k	Thermal Conductivity of Material
KVA	Kilovolt Ampere
KVAR	Kilovolt Ampere Reactive
kW	kiloWatt
kWh	kiloWatt hour
L	Length (usually feet)
LCC	Life Cycle Costing
LDC	Local Distribution Company
LEED	Leadership in Energy and Environmental Design
LEED EB	LEED for Existing Buildings

LEED NC	LEED for new construction
LF	Load Factor
LHV	Lower Heating Value
Life cycle	The period of time that a building or site system or element can be expected to adequately serve its intended function.
LPS	Low Pressure Sodium (lamp)
Lu	Lumen Output of a Lamp or Fixture
M	Mega multiple of millions in SI system
M&V	Measurement and Verification
MACRS	Modified Accelerated Cost Recovery System
MARR	Minimum Attractive Rate of Return
Mbtu	Thousand Btu
MCF	Thousand Cubic Feet (usually of gas)
MEC	Model Energy Code
Mm	Multiple of Thousands in I/P System
MMBtu	Million Btu
MMCS	Maintenance Management Computer System
MMI	Man Machine Interface
MMS	Maintenance Management System
MSE 2000	Management System for Energy 2000 (ANSI Georgia Tech Univ)
MW	MegaWatt
MWH MWh	MegaWatt hour
NAAQS	National Ambient Air Quality Standards
NAESCO	National Association of Energy Service Companies
NAIMA	North American Insulation Manufacturers Association
NEA	National Energy Act of 1978
NECPA	National Energy Conservation Policy Act
NEMA	National Electrical Manufacturer's Association
NERC	North American Electric Reliability Council
Next Renewal	The Next Renewal date is an override of the 'Calculated Next Renewal' date and is based upon the assessor?s visual inspection.

NFPA	National Fire Protection Association
NGPA	National Gas Policy Act of 1978
NLRPM	No Load Revolutions per Minute (speed)
Nn	Equipment or Project lifetime in economic analysis
NOPR	Notice of Proposed Rule Making from FERC
NOx	Nitrogen Oxide Compounds
NPV	Net present value in economic analysis
NREL	National Renewable Energy Laboratory
NUG	Non-Utility Generator
O&M	Operation and Maintenance
OA	Outside Air
ODP	Ozone Depletion Potential
OPAC	Off-Peak Air Conditioning
P	Present value in economic analysis
PBR	Performance Based Rates
PEA	Preliminary Energy Audit
PF	Power Factor
PID	Proportional plus integral plus derivative (control system)
PM	Portfolio Manager in Energy Star rating system
PM	Preventive Maintenance
PoolCo	Power Pool Company or Organization
POU	Point of Use
PQ	Power Quality
PSC	Public Service Commission
PSIA psia	Pounds per square inch absolute (pressure)
PSIG psig	Pounds per square inch gauge (pressure)
PUC	Public Utility Commission
PUHCA	Public Utilities Holding Company Act of 1935
PURPA	Public Utilities Regulatory Policies of 1978
PV	Photovotaic system

PV	Present Value
PW	Present Worth
PX	Power Exchange
q	Rate of heat flow in Btu per hour
Q	Heat load due to conduction using degree days
QF	Qualifying Facility
R	Electrical resistance
R	Thermal Resistance
RC	Remote controller
RCR	Room Cavity Ratio
RCRA	Resource Conservation and Recovery Act
Remaining Service Life (RSL)	RSL is the number of years service remaining for a system or equipment item. It is automatically calculated based on the difference between the current year and the 'Calculated Next Renewal' date or the 'Next Renewal' date whichever one is the later date.
Remaining Service Life Index (RSLI)	RSLI is defined as a percentage ratio of the remaining service life of a system. It usually ranges from 0 to 100
REMR	Repair Evaluation Maintenance Rehabilitation (REMR) is a scale used to objectively rank systems based on their condition
Renewal Schedule	A timeline that provides the items that need repair the year in which the repair is needed and the estimated price of the renewal.
RH	Relative Humidity
RLA	Running Load Amps
RMS	Root Mean Square
RO	Reverse Osmosis
ROI	Return on Investment
RPM	Revolutions Per Minute
RTG	Regional Transmission Group
RTO	Regional Transmission Organization
RTP	Real Time Pricing
SBCCI	Southern Building Code Congress International
SC	Scheduling Coordinator
SC	Shading Coefficient
SCADA	Supervisory Control and Data Acquisition Systems

SEER	Seasonal Energy Efficiency Ratio
SHR	Sensible Heat Ratio
Site	The grounds and utilities roadways landscaping fencing and other typical land improvements needed to support the facility.
Soft Cost	An expense item that is not considered direct construction cost. Soft cost includes architectural engineering financing legal fees and other pre-and-post construction expenses.
SOx	Sulfur Oxide Compounds
SP	Static Pressure
SP SPB	Simple Payback
SPP	Simple Payback Period
SPP	Small Power Producers
STR	Stack Temperature Rise
SV	Specific Volume
System	System refers to building and related site work elements as described by ASTM Uniformat II Classification for Building Elements (E1557-97) a format for classifying major facility elements common to most buildings. Elements usually perform a given function regardless of the design specification construction method or materials used. See also Uniformat II.
T	Temperature
T	Tubular (lamps)
TAA	Technical Assistance Audit
TCP/IP	Transmission Control Protocol/Internet Protocol
TES	Thermal Energy Storage
THD	Total Harmonic Distortion
TOD	Time of Day
TOU	Time of Use
TQM	Total Quality Management
TransCo	Transmission Company
U	Thermal Conductance
UDC	Utility Distribution Company
UL	Underwriters Laboratories
UNIFORMAT II	The ASTM UNIFORMAT II Classification for Building Elements (E1557-97) a format for classifying major facility components common to most buildings.
USGBC	US Green Building Council
v	Specific Volume

V	Volts Voltage
V	Volume
VAV	Variable Air Volume
VDT	Video Display Terminal
VFD	Variable Frequency Drive
VHO	Very High Output
VSD	Variable Speed Drive
W	Watts
W	Width
WB	Wet bulb
WH Wh	Watt Hours
Year built	The year that a building or addition was originally built based on substantial completion or occupancy.
Z	Electrical Impedance