

EAST CAROLINA UNIVERSITY

INCINERATOR PLANT AND UTILITY

ASSET CODE: UTIN

FACILITY CONDITION ANALYSIS

DECEMBER 15, 2009



EAST CAROLINA UNIVERSITY
Facility Condition Analysis

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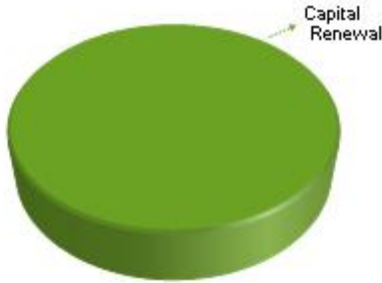
FACILITY CONDITION ANALYSIS

SECTION 1

GENERAL ASSET INFORMATION

EXECUTIVE SUMMARY - INCINERATOR PLANT AND UTILITY

PROJECT COSTS BY CLASSIFICATION



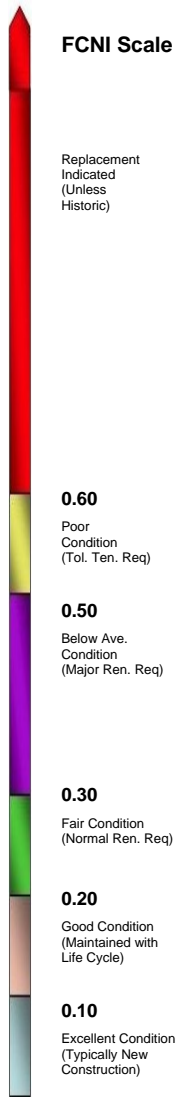
Building Code: UTIN
Building Name: INCINERATOR PLANT AND UTILITY
Year Built: 1999
Building Use: Physical Plant / Utility
Square Feet: 16,672

Project Costs by Priority

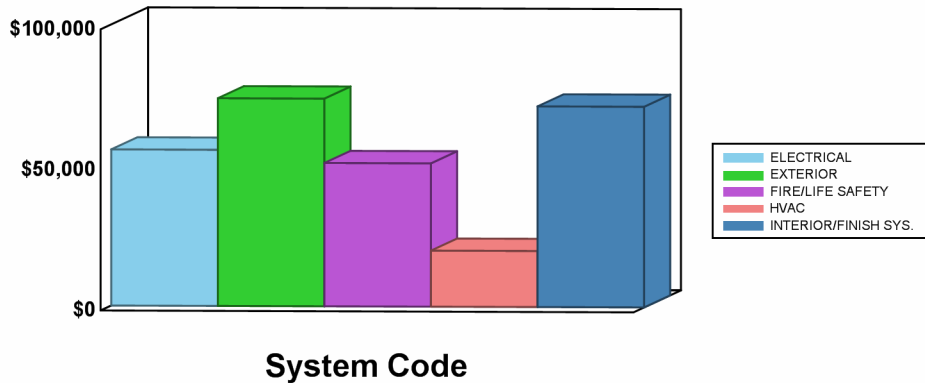
Priority 1:	\$0
Priority 2:	\$0
Priority 3:	\$140,644
Priority 4:	\$131,086
Total Project Costs:	\$271,730

Facility Replacement Cost: **\$4,489,542**

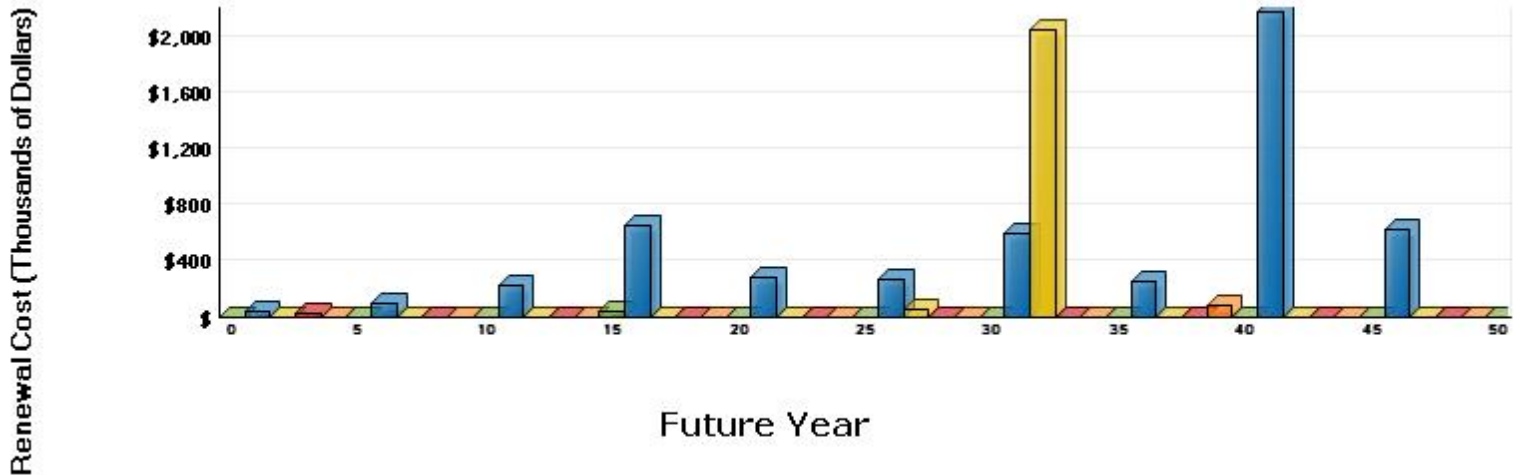
Facility Condition Needs Index (FCNI): **0.06**
 (Project Costs / Replacement Cost)



PROJECT COSTS BY SYSTEM CODE



LIFE CYCLE MODEL EXPENDITURE PROJECTIONS



Average Annual Renewal Cost Per SqFt \$3.62

B. ASSET SUMMARY

Built in 1999, the Incinerator Plant and Utility Building is a two story incinerator plant and office building. The building is constructed of a concrete structure on a slab on grade foundation. The exterior finishes consist of brick facades and a built-up roof system. This structure is one-half of the Heating Plant at the Health Science Campus and is connected to the Medical Heating Facility to the south. The first floor consists of an incinerator plant is utilitarian in design. The second floor consists of office and work space for the Facilities Department. The building totals 16,672 square feet and is located at the Health Science Campus of East Carolina University in Greenville, North Carolina.

Information for this report was gathered during a site inspection that concluded on September 1, 2009.

SITE

Landscaping around the building is minimal and consists of sparse lawns and natural wooded areas. The landscaping is in average condition, but should last the ten-year scope of this report with routine maintenance.

The pedestrian paving consists of concrete sidewalks at several locations. The concrete appears to be in good condition and should last the ten-year scope of this report. The asphalt paving on the east facade is also in good condition. No work to the pavement should be needed in the next ten years.

EXTERIOR STRUCTURE

Brick veneer is the primary exterior finish. While the brick is fundamentally sound, exposure to the elements has caused some deterioration of the mortar joints and expansion joints. Cleaning, surface preparation, selective repairs, and applied finish or penetrating sealant upgrades are recommended to restore the aesthetics and integrity of the building envelope.

The built-up roofing system is not expected to outlast the scope of this analysis. Future budget modeling should include a provision for the replacement of all failing roofing systems. Replace this roof with a similar application.

The exterior doors consist of painted metal service doors and roll-up metal doors, with one metal-framed glass door at the lobby entrance. The doors are in good condition, considering their use, and should last the next ten years.

The windows in the building are found at the second floor office level. These windows are dual-pane units in metal frames and are original to construction. The windows are in good condition and should last the ten-year scope of this report.

INTERIOR FINISHES / SYSTEMS

The interior floor finishes consist of carpet and vinyl tile in the office areas and concrete in the incinerator spaces. The interior wall finishes consist of painted plaster or concrete walls. The ceiling finishes consist of lay-in, acoustical tile in the office spaces and painted ceilings in the incinerator areas. These interior applications vary in age and condition from area to area. Flooring, wall, and ceiling finish upgrades should be considered as part of any future cosmetic improvements or major comprehensive renovation efforts.

ACCESSIBILITY

Access to the incinerator is provided by several at-grade entrances. The second floor offices are accessed via an at-grade entrance on the east facade. Once inside, a single passenger elevator provides service to the upper level. The restrooms in the building were designed with proper space allocations and fixtures. The doors are equipped with proper signage and lever door hardware. The stairs were designed with proper handrails and guardrailing. The break room sink has undercounter clearance for accessibility. The drinking fountains are dual-level designs and also accessible. No modifications are recommended with regard to accessibility.

HEALTH

There were no reports or evidence of any asbestos containing material or lead based paint. No health related issues were observed or reported by facility personnel at the time of the on-site review for this building. Therefore, no Health category recommendations or assessment comments are included in this report.

FIRE / LIFE SAFETY

The paths of egress in this building are adequate with regard to fire rating. There are no compromises involving doors, partitions, elevators lobbies, or stairs. No fire or life safety issues related to architectural features were observed during the inspection of this facility.

The fire and life safety protection within this structure is provided by an addressable fire alarm system equipped with combination audible annunciators and xenon strobes, smoke detectors, and fire pulls. It is anticipated the fire alarm system will reach the end of its useful service life within the next five years, and a complete system upgrade is recommended.

This facility is protected by a comprehensive, automatic, wet-pipe fire suppression system with fusible link-type sprinkler heads. The statistical life cycle for a sprinkler head is approximately twenty years. During this time, scale can accumulate inside the head and cause it to malfunction when needed. It is recommended that the aging sprinkler heads be replaced to ensure that proper protection is available.

The emergency exits are indicated by original LED exit signs that are connected to the building's emergency power network. The exit signs are in fair condition and should remain serviceable for the scope of this report. The path of egress is illuminated by select interior light fixtures connected to the generator power. Based on the daytime inspection, the emergency egress illumination level was not easily identified. It is assumed there is sufficient emergency egress lighting, since no deficiencies were reported.

HVAC

The primary heating and cooling medium is hot and chilled water supplied from the attached Medical Heating facility. Residing in the adjacent boiler plant is the 1,000 horsepower, Superior incinerator steam boiler (B-4) installed in approximately 2005. The boiler is currently inactive since the incinerator has been decommissioned. The boiler is in good condition and with scheduled maintenance, should remain serviceable for the scope of this assessment.

Conditioned air is not available for the first floor of the incinerator building. Cross ventilation provides comfort cooling for this area. Air distribution throughout the second floor administrative offices is provided by a rooftop, variable air volume, Buffalo air handler. Building exhaust is provided by a few centrifugal and utility exhaust fans. Building automation is provided by a modern direct digital Johnson Control system. The air distribution equipment is in good operating condition and should outlast the ten-year purview of this report. However, a formal budget was created for the renewal of the exhaust fans within the next ten years.

ELECTRICAL

Building service is supplied from the adjacent facility and is distributed to the various 480/277 volt distribution panels. Mechanical equipment and lighting is circuited to the 480/277 volt system. Dry transformers reduce the 480/277 volt to 120/208 volt power for receptacle and miscellaneous low voltage power requirements. The electrical distribution network in this facility is also in good operating condition. However, it is recommended that minor deficiencies in the electrical distribution network be rectified. Such remedies include, but are not limited to, installing additional circuits, replacing worn switches and receptacles, replacing circuit breakers, and updating panel directories.

The current lighting configuration for this facility consists of lay-in / pendent-mounted, T8 and compact fluorescent fixtures. Based on life cycle depletion, replacement of all interior fixtures is recommended within the next ten years. Select lamps with the same color temperature and rendering index for lighting uniformity. Install occupancy sensors in select areas for additional energy conservation.

The exterior areas adjacent to the building are illuminated by building-mounted HID fixtures and street lighting. These exterior light fixtures are currently in good condition, and no upgrade is warranted within the timeframe covered by this report.

PLUMBING

Potable water is distributed throughout this facility via a copper piping network. Sanitary waste and storm water piping is of cast-iron, no-hub construction with copper run-outs. The supply and drain piping networks are adequate and in good condition. They will likely provide reliable service throughout the scope of this analysis. The plumbing fixtures are in good working order and there are no condition-related upgrades to recommend, at this time. Domestic water for this facility is supplied from the attached Medical Heating facility.

VERTICAL TRANSPORTATION

The university commissioned an outside contractor to perform an elevator condition study in 2009. The aforementioned study did not identify any deficiencies requiring capital funding.

Note: The deficiencies outlined in this report were noted from a visual inspection. ISES engineers and architects developed projects with related costs that are needed over the next ten-year period to bring the facility to “like-new” condition. The costs developed do not represent the cost of a complete facility renovation. Soft costs not represented in this report include telecommunications, furniture, window treatment, space change, program issues, relocation, swing space, contingency, or costs that could not be identified or determined from the visual inspection and available building information. However, existing fixed building components and systems were thoroughly inspected. The developed costs represent correcting existing deficiencies and anticipated life cycle failures (within a ten-year period) to bring the facility to modern standards without any anticipation of change to facility space layout or function. Please refer to Section Three of this report for recommended Specific Project Details.

C. INSPECTION TEAM DATA

DATE OF INSPECTION: September 1, 2009

INSPECTION TEAM PERSONNEL:

<u>NAME</u>	<u>POSITION</u>	<u>SPECIALTY</u>
Thomas Ferguson, AIA, LEED® AP	Project Architect	Interior Finishes / Exterior / ADA- Handicapped Accessibility / Site / Fire Safety / Life Safety / Health
Rob Gasaway, Q.E.I.	Facility Analyst	Interior Finishes / Exterior / ADA- Handicapped Accessibility / Site / Fire Safety / Life Safety / Health
John Holder, Q.E.I.	Project Engineer	Mechanical / Electrical / Plumbing / Energy / Fire Safety / Life Safety / Health
Imelda Jordan	Project Engineer	Mechanical / Electrical / Plumbing / Energy / Fire Safety / Life Safety / Health
James Lewis	Project Engineer	Mechanical / Electrical / Plumbing / Energy / Fire Safety / Life Safety / Health
Carl Mason, PE, BSCP	Project Engineer	Interior Finishes / Exterior / ADA- Handicapped Accessibility / Site / Fire Safety / Life Safety / Health
Paul Southwell	Project Engineer	Mechanical / Electrical / Plumbing / Energy / Fire Safety / Life Safety / Health
Norm Teahan, RA, AIA, NCARB	Project Architect	Interior Finishes / Exterior / ADA- Handicapped Accessibility / Site / Fire Safety / Life Safety / Health

FACILITY CONTACTS:

<u>NAME</u>	<u>POSITION</u>
William Bagwell	Associate Vice Chancellor, Campus Operations

REPORT DEVELOPMENT:

Report Development by: ISES Corporation
2165 West Park Court
Suite N
Stone Mountain, GA 30087

Contact: Kyle Thompson, Project Manager
770-879-7376

D. FACILITY CONDITION ANALYSIS - DEFINITIONS

The following information is a clarification of Asset Report Sections using example definitions.

1. REPORT DESCRIPTION

Section 1: Asset Executive Summary, Asset Summary, and General Report Information

Section 2: Detailed Project Summaries and Totals

- A. Detailed Project Totals – Matrix with FCNI Data and Associated Charts
- B. Detailed Projects by Priority Class / Priority Sequence
- C. Detailed Projects by Cost within range [\$0 - < \$100,000]
- D. Detailed Projects by Cost within range [≥ \$100,000 - < \$500,000]
- E. Detailed Projects by Cost within range [≥ \$500,000]
- F. Detailed Projects by Project Classification
- G. Detailed Projects by Project Rating Type - Energy Conservation
- H. Detailed Projects by Category / System Code

FCNI = Facility Condition Needs Index, Total Cost vs. Replacement Cost. The FCNI provides a life cycle cost comparison. Facility replacement cost is based on replacement with current construction standards for facility use type, and not original design parameters. This index gives the University a comparison within all buildings for identifying worst case / best case building conditions.

$$\text{FCNI} = \frac{\text{Deferred Maintenance / Modernization} + \text{Capital Renewal} + \text{Plant Adaption}}{\text{Plant / Facility Replacement Cost}}$$

Section 3: Specific Project Details Illustrating Description / Cost

Section 4: Drawings with Iconography

The drawings for this facility are marked with ICONS (see legend), denoting the specific location(s) for each project. Within each ICON is the last four characters of the respective project number (e.g., 0001IS01 is marked on plan by IS01). There is one set of drawings marked with ICONS representing all priority classes (1, 2, 3, and 4).

Section 5: Life Cycle Model Summary and Projections

Section 6: Photographic Log

2. PROJECT CLASSIFICATION

- A. Plant / Program Adaption: Expenditures required to adapt the physical plant to the evolving needs of the institution and to changing codes or standards. These are expenditures beyond normal maintenance. Examples include compliance with changing codes (e.g. accessibility), facility alterations required by changed teaching or research methods, and improvements occasioned by the adoption of modern technology (e.g., the use of personal computer networks).
- B. Deferred Maintenance: Refers to expenditures for repairs which were not accomplished as a part of normal maintenance or capital repair which have accumulated to the point that facility deterioration is evident and could impair the proper functioning of the facility. Costs estimated for deferred maintenance projects should include compliance with applicable codes, even if such compliance requires expenditures beyond those essential to affect the needed repairs. Deferred maintenance projects represent catch up expenses.
- C. Capital Renewal: A subset of regular or normal facility maintenance which refers to major repairs or the replacement / rebuilding of major facility components (e.g., roof replacement at the end of its normal useful life is capital repair; roof replacement several years after its normal useful life is deferred maintenance).

3. PROJECT SUBCLASS TYPE

- A. Energy Conservation: Projects with energy conservation opportunities, based on simple payback analysis.

4. PRIORITY SEQUENCE BY PRIORITY CLASS (Shown in Sections 2 and 3)

All projects are assigned both a Priority Sequence number and Priority Class number for categorizing and sorting projects based on criticality and recommended execution order.

Example:

	<u>PRIORITY CLASS 1</u>	
CODE	PROJECT NO.	PRIORITY SEQUENCE
HV2C	0001HV04	01
PL1D	0001PL02	02

	<u>PRIORITY CLASS 2</u>	
CODE	PROJECT NO.	PRIORITY SEQUENCE
IS1E	0001IS06	03
EL4C	0001EL03	04



5. PRIORITY CLASS (Shown in Sections 2 and 3)

PRIORITY 1 - Currently Critical (Immediate)

Projects in this category require immediate action to:

- a. return a facility to normal operation
- b. stop accelerated deterioration
- c. correct a cited safety hazard

PRIORITY 2 - Potentially Critical (Year One)

Projects in this category, if not corrected expeditiously, will become critical within a year. Situations in this category include:

- a. intermittent interruptions
- b. rapid deterioration
- c. potential safety hazards

PRIORITY 3 - Necessary - Not Yet Critical (Years Two to Five)

Projects in this category include conditions requiring appropriate attention to preclude predictable deterioration or potential downtime and the associated damage or higher costs if deferred further.

PRIORITY 4 - Recommended (Years Six to Ten)

Projects in this category include items that represent a sensible improvement to existing conditions. These items are not required for the most basic function of a facility; however, Priority 4 projects will either improve overall usability and / or reduce long-term maintenance.

6. COST SUMMARIES AND TOTALS

The cost summaries and totals are illustrated by Detailed Projects sorted in multiple formats (shown in Sections 2 and 3).

City Index material / labor cost factors: (shown in Sections 2 and 3)

Cost factors are based on the Greenville City Index and are adjusted for material and labor cost factors (2009). Refer to the project related labor report found later in this section.

Global Markup Percentages

R.S. MEANS

Local Labor Index:	51.3 %	of National Average
Local Materials Index:	100.7 %	of National average
General Contractor Markup:	20.0 %	Contractor profit & overhead, bonds & insurance
Professional Fees:	16.0 %	Arch. / Eng. Firm design fees and in-house design cost

7. PROJECT NUMBER (Shown in Sections 2 and 3)

Example:

Project Number = 0001-EL-04 (unique for each independent project)

- 0001 - Building Identification Number
- EL - System Code, EL represents Electrical
- 04 - Sequential Assignment Project Number by Category / System

8. PHOTO NUMBER (Shown in Section 6)

A code shown on the Photographic Log identifies the building number, photo sequence, and architect, engineer, or vertical transportation.

Example: 0001006e

<u>Building Number</u>	<u>Photo Sequence</u>	<u>Arch / Eng / VT</u>
0001	006	e

9. LIFE CYCLE COST MODEL DESCRIPTION AND DEFINITIONS (Shown in Section 5)

Included in this report is a Life Cycle Cost Model. This model consists of two elements, one is the component listing (starting on page 5.1.1) and the other is the Life Cycle Cost Projections Graph (page 5.2.1). The component list is a summary of all major systems and components within the facility. Each indicated component has the following associated information:

Uniformat Code	This is the standard Uniformat Code that applies to the component
Component Description	This line item describes the individual component
Qty	The quantity of the listed component
Units	The unit of measure associated with the quantity
Unit Cost	The cost to replace each individual component unit (This cost is in today's dollars)
Total Cost	Unit cost multiplied by Quantity, also in today's dollars. Note that this is a one time renewal / replacement cost
Install Date	Year that the component was installed. Where this data is not available, it defaults to the year the asset was constructed
Life Exp	Average life expectancy for each individual component

The component listing forms the basis for the Life Cycle Cost Projections Graph shown on page 5.2.1. This graph represents a projection over a fifty-year period (starting from the date the report is run) of expected component renewals based on each individual item's renewal cost and life span. Some components might require renewal several times within the fifty-year model, while others might not occur at all. Each individual component is assigned a renewal year based on life cycles, and the costs for each item are inflated forward to the appropriate year. The vertical bars shown on the graph represent the accumulated (and inflated) total costs for each individual year. At the bottom of the graph, the average annual cost per gross square foot (\$/GSF) is shown for the facility. In this calculation, all costs are not inflated. This figure can be utilized to assess the adequacy of existing capital renewal and repair budgets.

10. CATEGORY CODE (Shown in Sections 2 and 3)

Refer to the following Category Code Report.

Example: Category Code = EL5A

EL = System Description
5 = Component Description
A = Element Description

CATEGORY CODE

AC1A - AC4B
EL1A - EL8A
ES1A - ES6E
FS1A - FS6A
HE1A - HE7A
HV1A - HV8B
IS1A - IS6D
PL1A - PL5A
SI1A - SI4A
SS1A - SS7A
VT1A - VT7A

SYSTEM DESCRIPTION

ACCESSIBILITY
ELECTRICAL
EXTERIOR STRUCTURE
FIRE / LIFE SAFETY
HEALTH
HVAC
INTERIOR FINISHES / SYSTEMS
PLUMBING
SITE
SECURITY SYSTEMS
VERTICAL TRANSPORTATION

CATEGORY CODE REPORT			
CODE	COMPONENT DESCRIPTION	ELEMENT DESCRIPTION	DEFINITION
SYSTEM DESCRIPTION: ACCESSIBILITY			
AC1A	SITE	STAIR AND RAILINGS	Includes exterior stairs and railings which are not part of the building entrance points.
AC1B	SITE	RAMPS AND WALKS	Includes sidewalks, grade change ramps (except for a building entrance), curb ramps, etc.
AC1C	SITE	PARKING	Designated parking spaces including striping, signage, access aisles and ramps, etc.
AC1D	SITE	TACTILE WARNINGS	Raised tactile warnings located at traffic crossing and elevation changes.
AC2A	BUILDING ENTRY	GENERAL	Covers all aspects of entry into the building itself including ramps, lifts, doors and hardware, power operators, etc.
AC3A	INTERIOR PATH OF TRAVEL	LIFTS/RAMPS/ ELEVATORS	Interior lifts, ramps and elevators designed to accommodate level changes inside a building. Includes both installation and retrofitting.
AC3B	INTERIOR PATH OF TRAVEL	STAIRS AND RAILINGS	Upgrades to interior stairs and handrails for accessibility reasons.
AC3C	INTERIOR PATH OF TRAVEL	DOORS AND HARDWARE	Accessibility upgrades to the interior doors including widening, replacing hardware power, assisted operators, etc.
AC3D	INTERIOR PATH OF TRAVEL	SIGNAGE	Interior building signage upgrades for compliance with ADA.
AC3E	INTERIOR PATH OF TRAVEL	RESTROOMS/ BATHROOMS	Modifications to and installation of accessible public restrooms and bathrooms. Bathrooms, which are an integral part of residential suites, are catalogued under HC4A.
AC3F	INTERIOR PATH OF TRAVEL	DRINKING FOUNTAINS	Upgrading/replacing drinking fountains for reasons of accessibility.
AC3G	INTERIOR PATH OF TRAVEL	PHONES	Replacement/modification of public access telephones.
AC4A	GENERAL	FUNCTIONAL SPACE MODIFICATIONS	This category covers all necessary interior modifications necessary to make the services and functions of a building accessible. It includes installation of assistive listening systems, modification of living quarters, modifications to laboratory workstations, etc. Bathrooms, which are integral to efficiency suites, are catalogued here.
AC4B	GENERAL	OTHER	All accessibility issues not catalogued elsewhere.
SYSTEM DESCRIPTION: ELECTRICAL			
EL1A	INCOMING SERVICE	TRANSFORMER	Main building service transformer.
EL1B	INCOMING SERVICE	DISCONNECTS	Main building disconnect and switchgear.
EL1C	INCOMING SERVICE	FEEDERS	Incoming service feeders. Complete incoming service upgrades, including transformers, feeders, and main distribution panels are catalogued here.
EL1D	INCOMING SERVICE	METERING	Installation of meters to record consumption and/or demand.
EL2A	MAIN DISTRIBUTION PANELS	CONDITION UPGRADE	Main distribution upgrade due to deficiencies in condition.
EL2B	MAIN DISTRIBUTION PANELS	CAPACITY UPGRADE	Main distribution upgrades due to inadequate capacity.
EL3A	SECONDARY DISTRIBUTION	STEP DOWN TRANSFORMERS	Secondary distribution stepdown and isolation transformers.
EL3B	SECONDARY DISTRIBUTION	DISTRIBUTION NETWORK	Includes conduit, conductors, sub-distribution panels, switches, outlets, etc. Complete interior rewiring of a facility is catalogued here.
EL3C	SECONDARY DISTRIBUTION	MOTOR CONTROLLERS	Mechanical equipment motor starters and control centers.
EL4A	DEVICES AND FIXTURES	EXTERIOR LIGHTING	Exterior building lighting fixtures including supply conductors and conduit.
EL4B	DEVICES AND FIXTURES	INTERIOR LIGHTING	Interior lighting fixtures (also system wide emergency lighting) including supply conductors and conduits.
EL4C	DEVICES AND FIXTURES	LIGHTING CONTROLLERS	Motion sensors, photocell controllers, lighting contactors, etc.

CATEGORY CODE REPORT			
CODE	COMPONENT DESCRIPTION	ELEMENT DESCRIPTION	DEFINITION
EL4D	DEVICES AND FIXTURES	GFCI PROTECTION	Ground fault protection including GFCI receptacles and breakers.
EL4E	DEVICES AND FIXTURES	LIGHTNING PROTECTION	Lightning arrestation systems including air terminals and grounding conductors.
EL5A	EMERGENCY POWER SYSTEM	GENERATION/DISTRIBUTION	Includes generators, central battery banks, transfer switches, emergency power grid, etc.
EL6A	SYSTEMS	UPS/DC POWER SUPPLY	Uninterruptible power supply systems and DC motor-generator sets and distribution systems.
EL7A	INFRASTRUCTURE	ABOVE GROUND TRANSMISSION	Includes poles, towers, conductors, insulators, fuses, disconnects, etc.
EL7B	INFRASTRUCTURE	UNDERGROUND TRANSMISSION	Includes direct buried feeders, ductbanks, conduit, manholes, feeders, switches, disconnects, etc.
EL7C	INFRASTRUCTURE	SUBSTATIONS	Includes incoming feeders, breakers, buses, switchgear, meters, CTs, PTs, battery systems, capacitor banks, and all associated auxiliary equipment.
EL7D	INFRASTRUCTURE	DISTRIBUTION SWITCHGEAR	Stand-alone sectionalizing switches, distribution switchboards, etc.
EL7F	INFRASTRUCTURE	AREA AND STREET LIGHTING	Area and street lighting systems including stanchions, fixtures, feeders, etc.
EL8A	GENERAL	OTHER	Electrical system components not catalogued elsewhere.
SYSTEM DESCRIPTION: EXTERIOR			
ES1A	FOUNDATION/FOOTING	STRUCTURE	Structural foundation improvements involving structural work on foundation wall/footing, piers, caissons, piles including crack repairs, shoring & pointing
ES1B	FOUNDATION/FOOTING	DAMPPROOFING/DEWATERING	Foundation/footing waterproofing work including, damp proofing, dewatering, insulation, etc.
ES2A	COLUMNS/BEAMS/WALLS	STRUCTURE	Structural work to primary load-bearing structural components aside from floors including columns, beams, bearing walls, lintels, arches, etc.
ES2B	COLUMNS/BEAMS/WALLS	FINISH	Work involving restoration of the appearance and weatherproof integrity of exterior wall/structural envelope components including masonry/pointing, expansion joints, efflorescence & stain removal, grouting, surfacing, chimney repairs, etc.
ES3A	FLOOR	STRUCTURE	Work concerning the structural integrity of the load supporting floors both exposed and unexposed including deformation, delamination, spalling, shoring, crack repair, etc.
ES4A	ROOF	REPAIR	Work on waterproof horizontal finish (roof) involving repair and/or limited replacement (<40% total) including membrane patching, flashing repair, coping caulk/resetting, PPT wall parging/coating, walkpad installation, skylight and roof hatch R&R, etc.
ES4B	ROOF	REPLACEMENT	Work involving total refurbishment of roofing system including related component rehab.
ES5A	FENESTRATIONS	DOORS	Work on exterior exit/access door including storefronts, airlocks, air curtains, vinyl slat doors, all power/manual operating hardware (except handicapped), etc.
ES5B	FENESTRATIONS	WINDOWS	Work on exterior fenestration closure & related components including glass/metal/wood curtain walls, fixed or operable window sashes, glazing, frames, sills, casings, stools, seats, coatings, treatments, screens, storm windows, etc.
ES6A	GENERAL	ATTACHED STRUCTURE	Work on attached exterior structure components not normally considered in above categories including porches, stoops, decks, monumental entrance stairs, cupolas, tower, etc.
ES6B	GENERAL	AREAWAYS	Work on attached grade level or below structural features including subterranean light wells, areaways, basement access stairs, etc.
ES6C	GENERAL	TRIM	Work on ornamental exterior (generally non-structural) elements including beltlines, quoins, porticos, soffits, cornices, moldings, trim, etc.
ES6D	GENERAL	SUPERSTRUCTURE	Finish and structural work on non-standard structures with exposed load-bearing elements such as stadiums, bag houses, bleachers, freestanding towers, etc.

CATEGORY CODE REPORT			
CODE	COMPONENT DESCRIPTION	ELEMENT DESCRIPTION	DEFINITION
ES6E	GENERAL	OTHER	Any exterior work not specifically categorized elsewhere including finish and structural work on freestanding boiler stacks.
SYSTEM DESCRIPTION: FIRE / LIFE SAFETY			
FS1A	LIGHTING	EGRESS LIGHTING/EXIT SIGNAGE	R & R work on exit signage and packaged AC/DC emergency lighting.
FS2A	DETECTION/ALARM	GENERAL	Repair or replacement of fire alarm/detection system/components including alarms, pull boxes, smoke/heat detectors, annunciator panels, central fire control stations, remote dialers, fire station communications, etc.
FS3A	SUPPRESSION	SPRINKLERS	Repair or installation of water sprinklers type automatic fire suppressions including wet pipe & dry pipe systems, heads, piping, deflectors, valves, monitors, associated fire pump, etc.
FS3B	SUPPRESSION	STANDPIPE/HOSE	Repair or installation of standpipe system or components including hardware, hoses, cabinets, nozzles, necessary fire pumping system, etc.
FS3C	SUPPRESSION	EXTINGUISHERS	Repairs or upgrades to F.E. cabinets/wall fastenings and handheld extinguisher testing/replacement.
FS3D	SUPPRESSION	OTHER	Other fire suppression items not specifically categorized elsewhere including fire blankets, carbon dioxide automatic systems, Halon systems, dry chemical systems, etc.
FS4A	HAZARDOUS MATERIALS	STORAGE ENVIRONMENT	Installation or repair of special storage environment for the safe holding of flammable or otherwise dangerous materials/supplies including vented flammables storage cabinets, holding pens/rooms, cages, fire safe chemical storage rooms, etc.
FS4B	HAZARDOUS MATERIALS	USER SAFETY	Improvements, repairs, installation, or testing of user safety equipment including emergency eyewashes, safety showers, emergency panic/shut-down system, etc.
FS5A	EGRESS PATH	DESIGNATION	Installation, relocation or repair of posted diagrammatic emergency evacuation routes.
FS5B	EGRESS PATH	DISTANCE/GEOMETRY	Work involving remediation of egress routing problems including elimination of dead end corridors, excessive egress distance modifications and egress routing inadequacies.
FS5C	EGRESS PATH	SEPARATION RATING	Restoration of required fire protective barriers including wall rating compromises, fire rated construction, structural fire proofing, wind/safety glazing, transom retrofitting, etc.
FS5D	EGRESS PATH	OBSTRUCTION	Clearance of items restricting the required egress routes.
FS5E	EGRESS PATH	STAIRS RAILING	Retrofit of stair/landing configurations/structure, railing heights/geometries, etc.
FS5F	EGRESS PATH	FIRE DOORS/HARDWARE	Installation/replacement/repair of fire doors and hardware including labeled fire doors, fire shutters, closers, magnetic holders, panic hardware, etc.
FS5G	EGRESS PATH	FINISH/FURNITURE RATINGS	Remediation of improper fire/smoke ratings of finishes and furniture along egress routes.
FS6A	GENERAL	OTHER	Life/fire safety items not specifically categorized elsewhere.
SYSTEM DESCRIPTION: HEALTH			
HE1A	ENVIRONMENTAL CONTROL	EQUIPMENT AND ENCLOSURES	Temperature control chambers (both hot and cold) for non-food storage. Includes both chamber and all associated mechanical equipment.
HE1B	ENVIRONMENTAL CONTROL	OTHER	General environmental control problems not catalogued elsewhere.
HE2A	PEST CONTROL	GENERAL	Includes all measures necessary to control and destroy insects, rodents and other pests.
HE3A	REFUSE	GENERAL	Issues related to the collection, handling and disposal of refuse.
HE4A	SANITATION EQUIPMENT	LABORATORY AND PROCESS	Includes autoclaves, cage washers, steam cleaners, etc.
HE5A	FOOD SERVICE	KITCHEN EQUIPMENT	Includes ranges, grilles, cookers, sculleries, etc.
HE5B	FOOD SERVICE	COLD STORAGE	Includes the cold storage room and all associated refrigeration equipment.
HE6A	HAZARDOUS MATERIAL	STRUCTURAL ASBESTOS	Testing, abatement and disposal of structural and building finish materials containing asbestos.

CATEGORY CODE REPORT			
CODE	COMPONENT DESCRIPTION	ELEMENT DESCRIPTION	DEFINITION
HE6B	HAZARDOUS MATERIAL	MECHANICAL ASBESTOS	Testing, abatement and disposal of mechanical insulation materials containing asbestos.
HE6C	HAZARDOUS MATERIAL	PCBs	Includes testing, demolition, disposal and cleanup of PCB contaminated substances.
HE6D	HAZARDOUS MATERIAL	FUEL STORAGE	Includes monitoring, removal and replacement of above and below ground fuel storage and distribution systems. Also includes testing and disposal of contaminated soils.
HE6E	HAZARDOUS MATERIAL	LEAD PAINT	Testing, removal and disposal of lead-based paint systems.
HE6F	HAZARDOUS MATERIAL	OTHER	Handling, storage, and disposal of other hazardous materials.
HE7A	GENERAL	OTHER	Health related issues not catalogued elsewhere.
SYSTEM DESCRIPTION: HVAC			
HV1A	HEATING	BOILERS/STACKS/ CONTROLS	Boilers for heating purposes including their related stacks, flues, and controls.
HV1B	HEATING	RADIATORS/ CONVECTORS	Including cast iron radiators, fin tube radiators, baseboard radiators, etc.
HV1C	HEATING	FURNACE	Furnaces and their related controls, flues, etc.
HV1D	HEATING	FUEL SUPPLY/STORAGE	Storage and/or distribution of fuel for heating purposes, including tanks and piping networks and related leak detection/monitoring.
HV2A	COOLING	CHILLERS/ CONTROLS	Chiller units for production of chilled water for cooling purposes, related controls (not including mods for CFC compliance).
HV2B	COOLING	HEAT REJECTION	Repair/replacement of cooling towers, dry coolers, air-cooling and heat rejection. (Includes connection of once-through system to cooling tower.)
HV3A	HEATING/COOLING	SYSTEM RETROFIT/ REPLACE	Replacement or major retrofit of HVAC systems.
HV3B	HEATING/COOLING	WATER TREATMENT	Treatment of hot water, chilled water, steam, condenser water, etc.
HV3C	HEATING/COOLING	PACKAGE/SELF-CONTAINED UNITS	Repair/replacement of self-contained/package type units including stand up units, rooftop units, window units, etc; both air conditioners and heat pumps.
HV3D	HEATING/COOLING	CONVENTIONAL SPLIT SYSTEMS	Repair, installation, or replacement of conventional split systems; both air conditioners and heat pumps including independent component replacements of compressors and condensers.
HV4A	AIR MOVING/ VENTILATION	AIR HANDLERS/ FAN UNITS	Includes air handlers & coils, fan coil units, unit ventilators, filtration upgrades, etc., not including package/self-contained units, split systems or other specifically categorized systems.
HV4B	AIR MOVING/ VENTILATION	EXHAUST FANS	Exhaust fan systems including fans, range and fume hoods, controls, and related ductwork.
HV4C	AIR MOVING/ VENTILATION	OTHER FANS	Supply, return, or any other fans not incorporated into a component categorized elsewhere.
HV4D	AIR MOVING/ VENTILATION	AIR DISTRIBUTION NETWORK	Repair, replacement, or cleaning of air distribution network including ductwork, terminal reheat/cool, VAV units, induction units, power induction units, insulation, dampers, linkages, etc.
HV5A	STEAM/HYDRONIC DISTRIBUTION	PIPING NETWORK	Repair/replacement of piping networks for heating and cooling systems including pipe, fittings, insulation, related components, etc.
HV5B	STEAM/HYDRONIC DISTRIBUTION	PUMPS	Repair or replacement of pumps used in heating and cooling systems, related control components, etc.
HV5C	STEAM/HYDRONIC DISTRIBUTION	HEAT EXCHANGERS	Including shell and tube heat exchangers and plate heat exchangers for heating and cooling.
HV6A	CONTROLS	COMPLETE SYSTEM UPGRADE	Replacement of HVAC control systems.

CATEGORY CODE REPORT			
CODE	COMPONENT DESCRIPTION	ELEMENT DESCRIPTION	DEFINITION
HV6B	CONTROLS	MODIFICATIONS/ REPAIRS	Repair or modification of HVAC control system.
HV6C	CONTROLS	AIR COMPRESSORS/ DRYERS	Repair or modification of control air compressors and dryers.
HV7A	INFRASTRUCTURE	STEAM/HOT WATER GENERATION	Generation of central steam and/or hot water including boilers and related components.
HV7B	INFRASTRUCTURE	STEAM/HOT WATER DISTRIBUTION	Distribution system for central hot water and/or steam.
HV7C	INFRASTRUCTURE	CHILLED WATER GENERATION	Generation of central chilled water including chillers and related components.
HV7D	INFRASTRUCTURE	CHILLED WATER DISTRIBUTION	Distribution system for central chilled water.
HV7E	INFRASTRUCTURE	TUNNELS/ MANHOLES/ TRENCHES	Repairs, installation, replacement of utility system access chambers.
HV7F	INFRASTRUCTURE	OTHER	HVAC infrastructure issues not specifically categorized elsewhere.
HV8A	GENERAL	CFC COMPLIANCE	Chiller conversions/replacements for CFC regulatory compliance, monitoring, etc.
HV8B	GENERAL	OTHER	HVAC issues not catalogued elsewhere.
SYSTEM DESCRIPTION: INTERIOR FINISHES / SYSTEMS			
IS1A	FLOOR	FINISHES-DRY	R & R of carpet, hardwood strip flooring, concrete coating, vinyl linoleum & tile, marble, terrazzo, rubber flooring, underlayment in predominantly dry areas ("dry" includes non-commercial kitchens)
IS1B	FLOOR	FINISHES-WET	Flooring finish/underlayment work in predominantly "wet" areas including work with linoleum, rubber, terrazzo, concrete coating, quarry tile, ceramic tile, epoxy aggregate, etc.
IS2A	PARTITIONS	STRUCTURE	Structural work on full height permanent interior partitions including wood/metal stud & drywall systems, CMU systems, structural brick, tile, glass block, etc.
IS2B	PARTITIONS	FINISHES	Work on full height permanent interior partitions including R & R to gypsum board, plaster, lath, wood paneling, acoustical panels, wall coverings, column coverings, tile, paint, etc.
IS3A	CEILINGS	REPAIR	Repair of interior ceilings (<40% of total) including tiles, gypsum board, plaster, paint, etc.
IS3B	CEILINGS	REPLACEMENT	Major refurbishments (>40% of total) to interior ceiling systems including grid system replacements, structural framing, new suspended systems, paint, plastering, etc.
IS4A	DOORS	GENERAL	Any work on interior non-fire rated doors, roll-up counter doors, mechanical/plumbing access doors, and all door hardware (except for reasons of access improvement).
IS5A	STAIRS	FINISH	Any finish restorative work to stair tower walking surfaces including replacement of rubber treads, safety grips, nosings, etc. (except as required to accommodate disabled persons).
IS6A	GENERAL	MOLDING	R & R to interior trim/molding systems including rubber/vinyl/wood base, crown/chair/ornamental moldings, cased openings, etc.
IS6B	GENERAL	CABINETRY	R & R work to interior casework systems including cabinets, countertops, wardrobes, lockers, mail boxes, built-in bookcases, lab/work benches, reagent shelving, etc. (except as required for access by the disabled).
IS6C	GENERAL	SCREENING	Work on temporary or partial height partitioning systems including toilet partitions, urinal/vanity screens, etc.
IS6D	GENERAL	OTHER	Any work on interior elements not logically or specifically categorized elsewhere including light covers, phone booths, interior light wells, etc.
SYSTEM DESCRIPTION: PLUMBING			
PL1A	DOMESTIC WATER	PIPING NETWORK	Repair or replacement of domestic water supply piping network, insulation, hangers, etc.

CATEGORY CODE REPORT			
CODE	COMPONENT DESCRIPTION	ELEMENT DESCRIPTION	DEFINITION
PL1B	DOMESTIC WATER	PUMPS	Domestic water booster pumps, circulating pumps, related controls, etc.
PL1C	DOMESTIC WATER	STORAGE/ TREATMENT	Equipment or vessels for storage or treatment of domestic water.
PL1D	DOMESTIC WATER	METERING	Installation, repair, or replacement of water meters.
PL1E	DOMESTIC WATER	HEATING	Domestic water heaters including gas, oil, and electric water heaters, shell and tube heat exchangers, tank type and instantaneous.
PL1F	DOMESTIC WATER	COOLING	Central systems for cooling and distributing drinking water.
PL1G	DOMESTIC WATER	FIXTURES	Plumbing fixtures including sinks, drinking fountains, water closets, urinals, etc.
PL1H	DOMESTIC WATER	CONSERVATION	Alternations made to the water distribution system to conserve water.
PL1I	DOMESTIC WATER	BACKFLOW PROTECTION	Backflow protection devices including backflow preventers, vacuum breakers, etc.
PL2A	WASTEWATER	PIPING NETWORK	Repair or replacement of building wastewater piping network.
PL2B	WASTEWATER	PUMPS	Pump systems used to lift wastewater including sewage ejectors and other sump systems.
PL3A	SPECIAL SYSTEMS	PROCESS GAS/FLUIDS	Generation and/or distribution of process steam, compressed air, natural and LP gas, process water, vacuum, etc.
PL4A	INFRASTRUCTURE	POTABLE WATER STORAGE/ TREATMENT	Storage and treatment of potable water for distribution.
PL4B	INFRASTRUCTURE	INDUSTRIAL WATER DISTRIBUTION/ TREATMENT	Storage and treatment of industrial water for distribution.
PL4C	INFRASTRUCTURE	SANITARY WATER COLLECTION	Sanitary water collection systems, sanitary sewer systems; including combined systems.
PL4D	INFRASTRUCTURE	STORM WATER COLLECTION	Storm water collection systems, storm sewer systems; storm water only.
PL4E	INFRASTRUCTURE	POTABLE WATER DISTRIBUTION	Potable water distribution network.
PL4F	INFRASTRUCTURE	WASTEWATER TREATMENT	Wastewater treatment plants, associated equipment, etc.
PL5A	GENERAL	OTHER	Plumbing issues not categorized elsewhere.
SYSTEM DESCRIPTION: SITE			
SI1A	ACCESS	PEDESTRIAN	Paved pedestrian surfaces including walks, site stairs, step ramps, paths, pedestrian signage, sidewalk bridges/canopies, pedestrian plaza/mall areas, etc.
SI1B	ACCESS	VEHICULAR	Paved vehicular surfaces including roads, paths, curbs, guards, bollards, bridges, skyways, joints, shoulder work, culverts, ditches, vehicular signage, etc.
SI2A	LANDSCAPE	GRADE/FLORA	Landscape related work including new grass/turf refurbishment, grade improvements, catch basins, swales, berms, pruning, new ornamental flora, etc.
SI3A	HARDSCAPE	STRUCTURE	Permanent hard site features, predominantly ornamental, including terraces, fences, statues, freestanding signage, fountains, benches, etc.
SI4A	GENERAL	OTHER	Other site work not specifically categorized elsewhere.
SYSTEM DESCRIPTION: SECURITY SYSTEMS			
SS1A	LIGHTING	EXTERIOR	Fixtures, stanchions, foliage interference, cleanliness, locations, etc.
SS2A	SITE	FENCING	Perimeter campus fencing, individual building fencing, includes both pedestrian and vehicular control fences.

CATEGORY CODE REPORT			
CODE	COMPONENT DESCRIPTION	ELEMENT DESCRIPTION	DEFINITION
SS2B	SITE	GENERAL	Hidden areas due to foliage, fencing, parking, walls, etc.
SS3A	COMMUNICATIONS	EMERGENCY PHONES	Access, locations, visibility, function, reliability, etc.
SS4A	ACCESS CONTROL	DOORS	Access, locks, keys, two way speakers, reliability, redundancy, etc.
SS4B	ACCESS CONTROL	WINDOWS	Locks, screens, access, reliability, etc.
SS4C	ACCESS CONTROL	SYSTEMS	Card key, proximity devices, data control, data use, reliability, system design, etc.
SS5A	MONITORING	SYSTEMS	Cameras, audio communication, monitoring stations, locations, system design, etc.
SS6A	CIRCULATION	PEDESTRIAN	On campus as well as to and from off campus housing and class locations, etc.
SS6B	CIRCULATION	VEHICULAR	Guard gates, access, systems, data control and use, identification, etc.
SS7A	GENERAL	OTHER	General information/projects pertaining to security issues.
SYSTEM DESCRIPTION: VERTICAL TRANSPORTATION			
VT1A	MACHINE ROOM	GENERAL	Machine, worm gear, thrust bearing, brake, motors, sheaves, generator, controller, selector, governor, pump(s), valves, oil, access, lighting, ventilation, floor.
VT2A	CAR	GENERAL	Position indicator, lighting, floor, gate-doors, operation devices, safeties, safety shoe, light ray/detection, emergency light, fire fighter service, car top, door operator, stop switch, car frame, car guides, sheaves, phone, ventilation.
VT3A	HOISTWAY	GENERAL	Enclosure, fascia, interlock, doors, hangers, closers, sheaves, rails, hoistway switches, ropes, traveling cables, selector tape, weights, compensation.
VT4A	HALL FIXTURES	GENERAL	Operating panel, position indicator, hall buttons, lobby panel, hall lanterns, fire fighter service, audible signals, card/key access.
VT5A	PIT	GENERAL	Buffer(s), guards, sheaves, hydro packing, floor, lighting, safety controls.
VT6A	OPERATING CONDITIONS	GENERAL	Door open time, door close time, door thrust, acceleration, deceleration, leveling, dwell time, speed, OFR time, nudging.
VT7A	GENERAL	OTHER	General information/projects relating to vertical transportation system components.

FACILITY CONDITION ANALYSIS

SECTION 2

**DETAILED PROJECT SUMMARIES
AND TOTALS**

**Detailed Project Totals
 Facility Condition Analysis
 System Code by Priority Class
 UTIN : INCINERATOR PLANT AND UTILITY**

System Code	System Description	Priority Classes				Subtotal
		1	2	3	4	
EL	ELECTRICAL	0	0	7,774	47,780	55,554
ES	EXTERIOR	0	0	16,783	57,094	73,877
FS	FIRE/LIFE SAFETY	0	0	44,716	6,270	50,986
HV	HVAC	0	0	0	19,941	19,941
IS	INTERIOR/FINISH SYS.	0	0	71,372	0	71,372
	TOTALS	0	0	140,644	131,086	271,730

Facility Replacement Cost	\$4,489,542
Facility Condition Needs Index	0.06

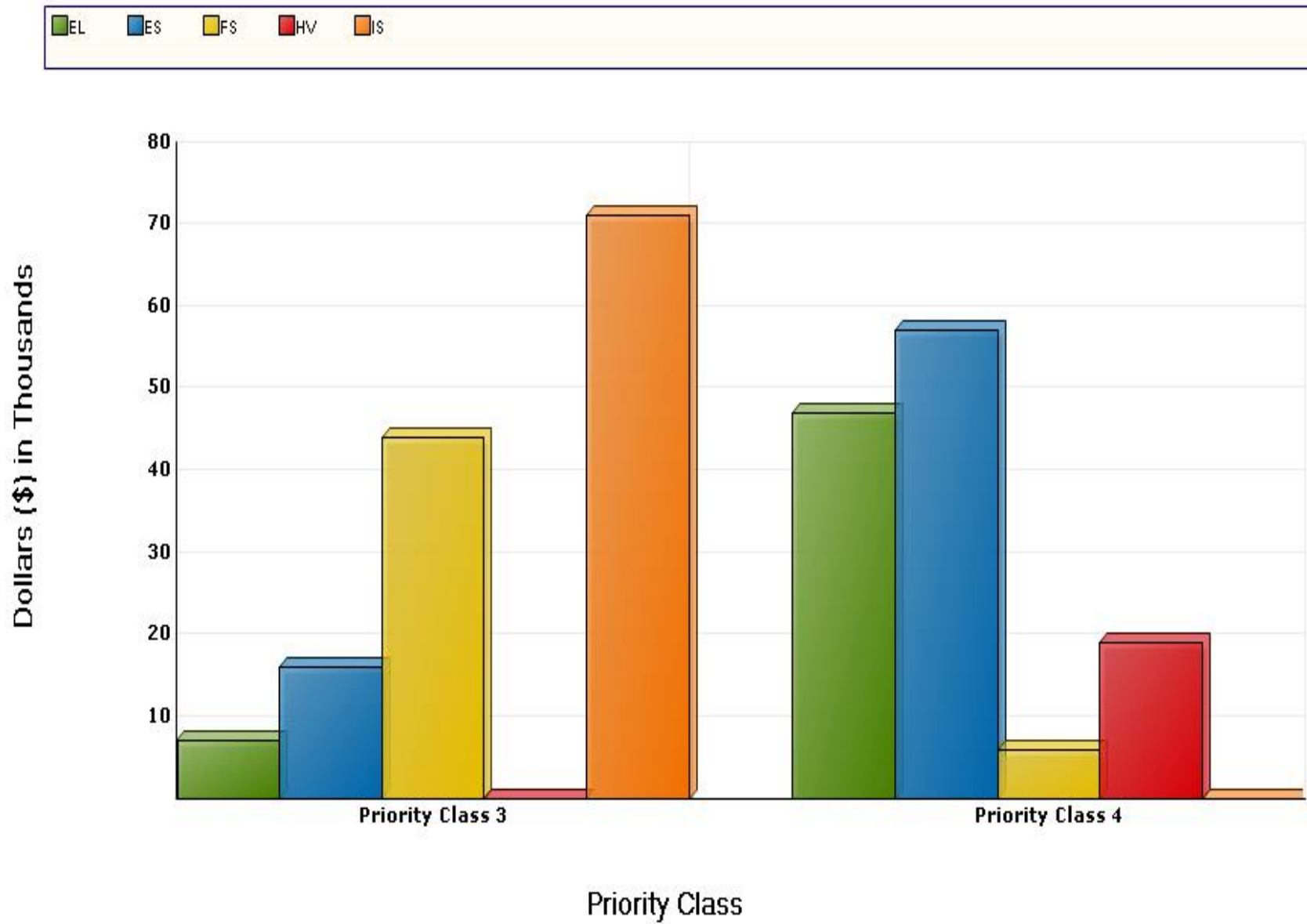
Gross Square Feet	16,672
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Total Cost Per Square Foot	\$16.30
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FACILITY CONDITION ANALYSIS

System Code by Priority Class

UTIN : INCINERATOR PLANT AND UTILITY



**Detailed Project Totals
 Facility Condition Analysis
 System Code by Project Class
 UTIN : INCINERATOR PLANT AND UTILITY**

System Code	System Description	Project Classes			Subtotal
		Capital Renewal	Deferred Maintenance	Plant Adaption	
EL	ELECTRICAL	55,554	0	0	55,554
ES	EXTERIOR	73,877	0	0	73,877
FS	FIRE/LIFE SAFETY	50,986	0	0	50,986
HV	HVAC	19,941	0	0	19,941
IS	INTERIOR/FINISH SYS.	71,372	0	0	71,372
	TOTALS	271,730	0	0	271,730

Facility Replacement Cost	\$4,489,542
Facility Condition Needs Index	0.06

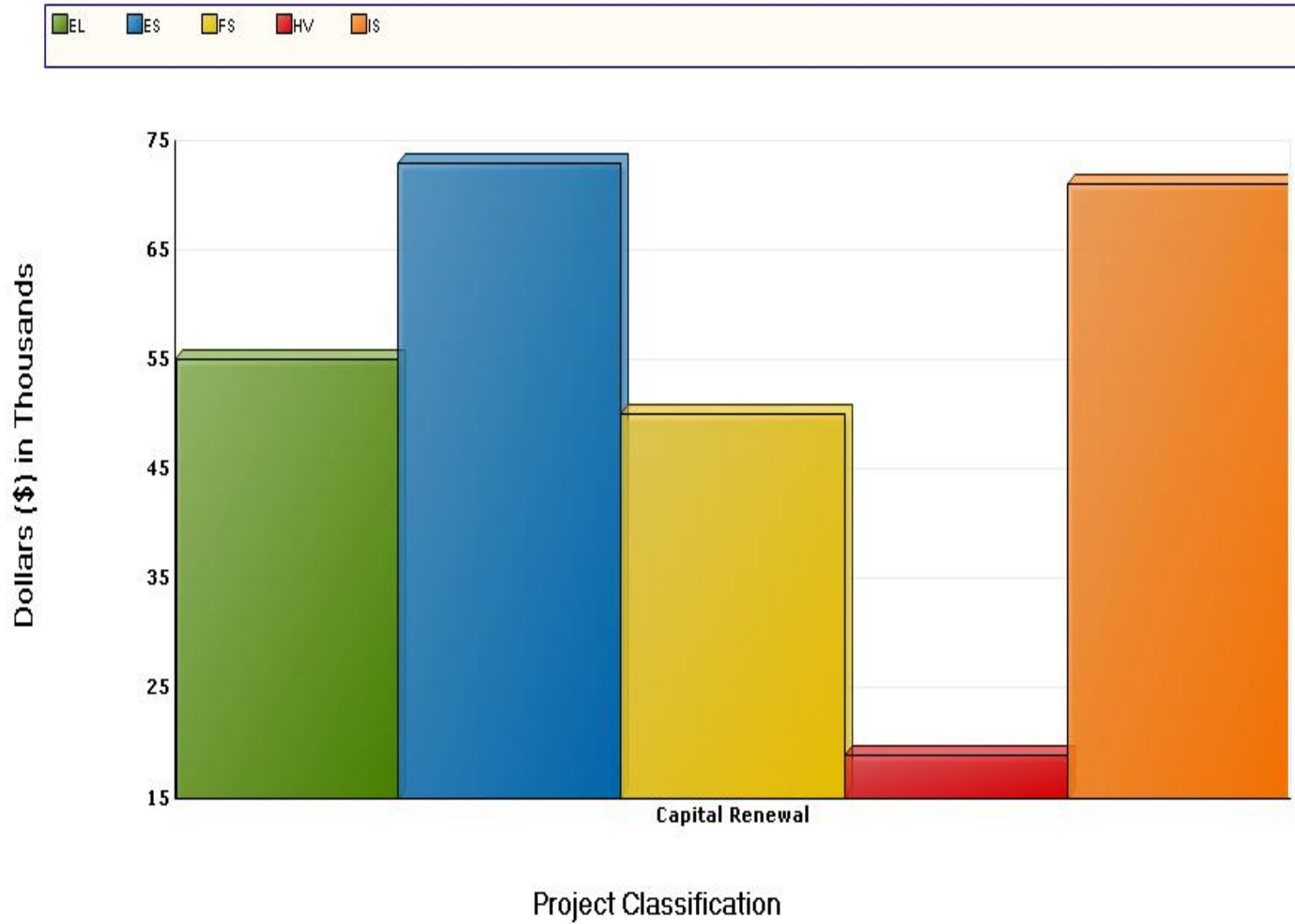
Gross Square Feet	16,672
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Total Cost Per Square Foot	\$16.30
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FACILITY CONDITION ANALYSIS

System Code by Project Class

UTIN : INCINERATOR PLANT AND UTILITY



Detailed Project Summary
Facility Condition Analysis
Project Class by Priority Class
UTIN : INCINERATOR PLANT AND UTILITY

Project Class	Priority Classes				Subtotal
	1	2	3	4	
Capital Renewal	0	0	140,644	131,086	271,730
TOTALS	0	0	140,644	131,086	271,730

Facility Replacement Cost	\$4,489,542
Facility Condition Needs Index	0.06

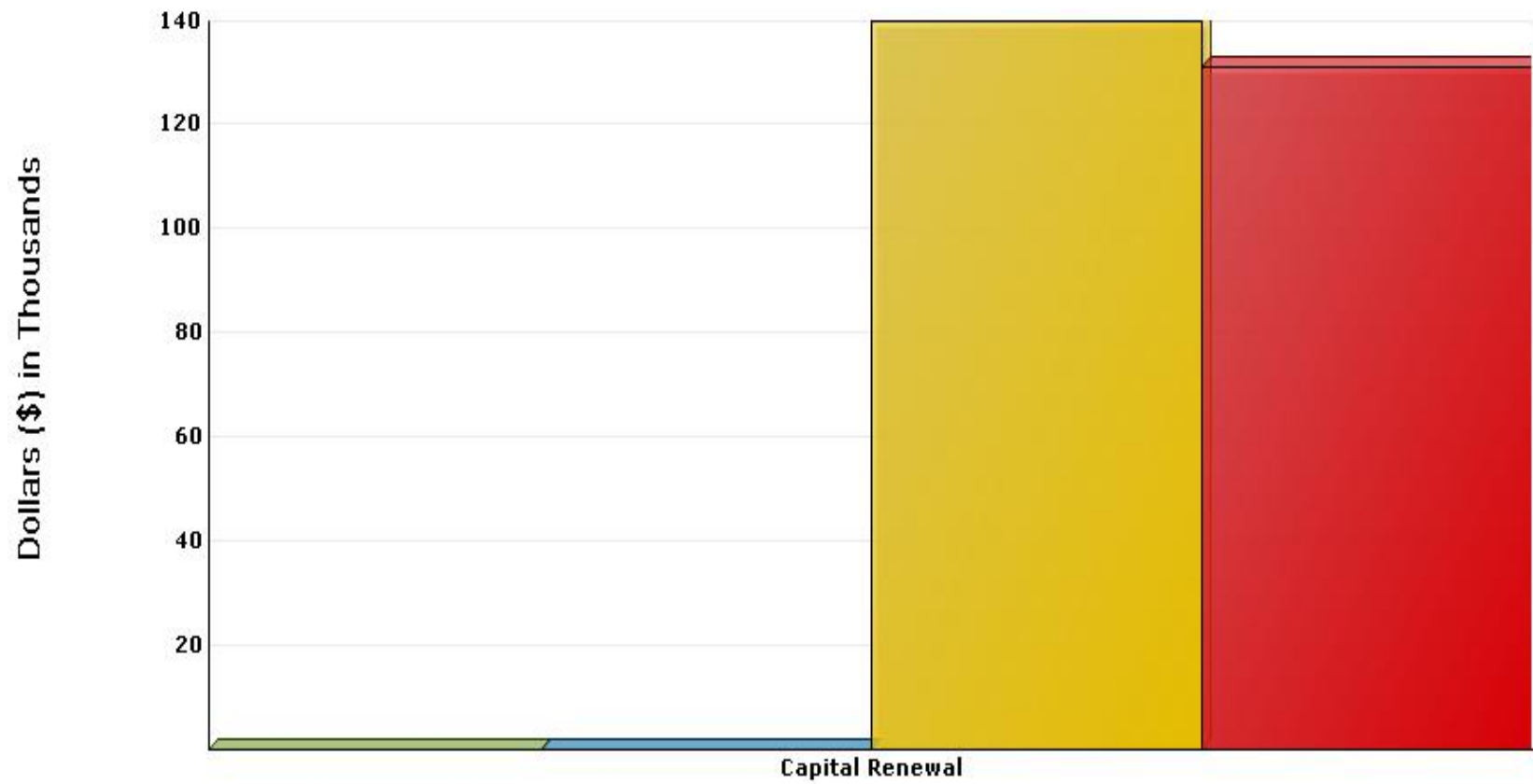
Gross Square Feet	16,672
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Total Cost Per Square Foot	\$16.30
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FACILITY CONDITION ANALYSIS

Project Class by Priority Class

UTIN : INCINERATOR PLANT AND UTILITY



Project Classification

Detailed Project Summary
Facility Condition Analysis
Priority Class - Priority Sequence
 UTIN : INCINERATOR PLANT AND UTILITY

Cat. Code	Project Number	Pri Cls	Pri Seq	Project Title	Construction Cost	Professional Fee	Total Cost
FS2A	UTINFS01	3	1	FIRE ALARM SYSTEM REPLACEMENT	38,548	6,168	44,716
ES2B	UTINES01	3	2	RESTORE BRICK VENEER	14,468	2,315	16,783
EL3B	UTINEL02	3	3	ELECTRICAL SYSTEM REPAIRS	6,702	1,072	7,774
IS1A	UTINIS01	3	4	REFINISH FLOORING	25,674	4,108	29,782
IS2B	UTINIS02	3	5	REFINISH WALLS	17,735	2,838	20,573
IS3B	UTINIS03	3	6	REFINISH CEILINGS	18,117	2,899	21,016
Totals for Priority Class 3					121,245	19,399	140,644
FS3A	UTINFS02	4	7	REPLACE SPRINKLER HEADS	5,405	865	6,270
ES4B	UTINES02	4	8	BUILT-UP ROOF REPLACEMENT	49,219	7,875	57,094
HV4B	UTINHV01	4	9	EXHAUST FAN REPLACEMENT	17,191	2,750	19,941
EL4B	UTINEL01	4	10	INTERIOR LIGHTING UPGRADE	41,190	6,590	47,780
Totals for Priority Class 4					113,005	18,081	131,086
Grand Total:					234,250	37,480	271,730

Detailed Project Summary
Facility Condition Analysis
Project Cost Range
 UTIN : INCINERATOR PLANT AND UTILITY

Cat. Code	Project Number	Pri Cls	Pri Seq	Project Title	Construction Cost	Professional Fee	Total Cost
ES2B	UTINES01	3	2	RESTORE BRICK VENEER	14,468	2,315	16,783
IS1A	UTINIS01	3	4	REFINISH FLOORING	25,674	4,108	29,782
IS2B	UTINIS02	3	5	REFINISH WALLS	17,735	2,838	20,573
IS3B	UTINIS03	3	6	REFINISH CEILINGS	18,117	2,899	21,016
FS2A	UTINFS01	3	1	FIRE ALARM SYSTEM REPLACEMENT	38,548	6,168	44,716
EL3B	UTINEL02	3	3	ELECTRICAL SYSTEM REPAIRS	6,702	1,072	7,774
Totals for Priority Class 3					121,245	19,399	140,644
ES4B	UTINES02	4	8	BUILT-UP ROOF REPLACEMENT	49,219	7,875	57,094
FS3A	UTINFS02	4	7	REPLACE SPRINKLER HEADS	5,405	865	6,270
HV4B	UTINHV01	4	9	EXHAUST FAN REPLACEMENT	17,191	2,750	19,941
EL4B	UTINEL01	4	10	INTERIOR LIGHTING UPGRADE	41,190	6,590	47,780
Totals for Priority Class 4					113,005	18,081	131,086
Grand Totals for Projects < 100,000					234,250	37,480	271,730
Grand Totals For All Projects:					234,250	37,480	271,730

Detailed Project Summary
Facility Condition Analysis
Project Classification
 UTIN : INCINERATOR PLANT AND UTILITY

Cat Code	Project Number	Pri. Seq.	Project Classification	Pri. Cls	Project Title	Total Cost
FS2A	UTINFS01	1	Capital Renewal	3	FIRE ALARM SYSTEM REPLACEMENT	44,716
ES2B	UTINES01	2	Capital Renewal	3	RESTORE BRICK VENEER	16,783
EL3B	UTINEL02	3	Capital Renewal	3	ELECTRICAL SYSTEM REPAIRS	7,774
IS1A	UTINIS01	4	Capital Renewal	3	REFINISH FLOORING	29,782
IS2B	UTINIS02	5	Capital Renewal	3	REFINISH WALLS	20,573
IS3B	UTINIS03	6	Capital Renewal	3	REFINISH CEILINGS	21,016
FS3A	UTINFS02	7	Capital Renewal	4	REPLACE SPRINKLER HEADS	6,270
ES4B	UTINES02	8	Capital Renewal	4	BUILT-UP ROOF REPLACEMENT	57,094
HV4B	UTINHV01	9	Capital Renewal	4	EXHAUST FAN REPLACEMENT	19,941
EL4B	UTINEL01	10	Capital Renewal	4	INTERIOR LIGHTING UPGRADE	47,780
Totals for Capital Renewal						271,730
Grand Total:						271,730

Detailed Project Summary
Facility Condition Analysis
Energy Conservation
 UTIN : INCINERATOR PLANT AND UTILITY

Cat Code	Project Number	Pri Cls	Pri Seq	Project Title	Total Cost	Annual Savings	Simple Payback
ES4B	UTINES02	4	8	BUILT-UP ROOF REPLACEMENT	57,094	700	81.56
EL4B	UTINEL01	4	10	INTERIOR LIGHTING UPGRADE	47,780	6,800	7.03
Totals for Priority Class 4					104,874	7,500	13.98
Grand Total:					104,874	7,500	13.98

Detailed Project Summary
Facility Condition Analysis
Category/System Code
UTIN : INCINERATOR PLANT AND UTILITY

Cat. Code	Project Number	Pri Cls	Pri Seq	Project Title	Construction Cost	Professional Fee	Total Cost
EL3B	UTINEL02	3	3	ELECTRICAL SYSTEM REPAIRS	6,702	1,072	7,774
EL4B	UTINEL01	4	10	INTERIOR LIGHTING UPGRADE	41,190	6,590	47,780
Totals for System Code: ELECTRICAL					47,892	7,663	55,554
ES2B	UTINES01	3	2	RESTORE BRICK VENEER	14,468	2,315	16,783
ES4B	UTINES02	4	8	BUILT-UP ROOF REPLACEMENT	49,219	7,875	57,094
Totals for System Code: EXTERIOR					63,687	10,190	73,877
FS2A	UTINFS01	3	1	FIRE ALARM SYSTEM REPLACEMENT	38,548	6,168	44,716
FS3A	UTINFS02	4	7	REPLACE SPRINKLER HEADS	5,405	865	6,270
Totals for System Code: FIRE/LIFE SAFETY					43,953	7,033	50,986
HV4B	UTINHV01	4	9	EXHAUST FAN REPLACEMENT	17,191	2,750	19,941
Totals for System Code: HVAC					17,191	2,750	19,941
IS1A	UTINIS01	3	4	REFINISH FLOORING	25,674	4,108	29,782
IS2B	UTINIS02	3	5	REFINISH WALLS	17,735	2,838	20,573
IS3B	UTINIS03	3	6	REFINISH CEILINGS	18,117	2,899	21,016
Totals for System Code: INTERIOR/FINISH SYS.					61,527	9,844	71,372
Grand Total:					234,250	37,480	271,730

FACILITY CONDITION ANALYSIS

SECTION 3

SPECIFIC PROJECT DETAILS
ILLUSTRATING DESCRIPTION / COST

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Description

Project Number:	UTINFS01	Title:	FIRE ALARM SYSTEM REPLACEMENT
Priority Sequence:	1		
Priority Class:	3		
Category Code:	FS2A	System:	FIRE/LIFE SAFETY
		Component:	DETECTION ALARM
		Element:	GENERAL
Building Code:	UTIN		
Building Name:	INCINERATOR PLANT AND UTILITY		
Subclass/Savings:	Not Applicable		
Code Application:	ADAAG	702.1	
	NFPA	1, 101	
Project Class:	Capital Renewal		
Project Date:	11/6/2009		
Project Location:	Floor-wide: Floor(s) 1, 2		

Project Description

Upgrade the existing fire alarm system with a modern application. Specify a point addressable, supervised, main fire alarm panel with an annunciator. This work includes pull stations, audible and visible alarms, smoke and heat detectors, and a wiring network. Install all devices in accordance with current NFPA and ADA requirements. The system should be monitored to report activation or trouble to an applicable receiving station.

Specific Project Details
Facility Condition Analysis
Section Three
 UTIN : INCINERATOR PLANT AND UTILITY

Project Cost

Project Number: UTINFS01

Task Cost Estimate

Task Description	Unit	Qty	Material Unit Cost	Total Material Cost	Labor Unit Cost	Total Labor Cost	Total Cost
Fire alarm control panel(s), annunciator, smoke and heat detectors, manual pull stations, audible and visual alarms, wiring, raceways, and cut and patching materials	SF	16,672	\$1.46	\$24,341	\$0.89	\$14,838	\$39,179
Project Totals:				\$24,341		\$14,838	\$39,179

Material/Labor Cost		\$39,179
Material Index		100.7%
Labor Index		51.3%
Material/Labor Indexed Cost		<u>\$32,123</u>
General Contractor Mark Up at 20.0%	+	<u>\$6,425</u>
Construction Cost		<u>\$38,548</u>
Professional Fees at 16.0%	+	<u>\$6,168</u>
Total Project Cost		<u>\$44,716</u>

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Description

Project Number:	UTINES01	Title:	RESTORE BRICK VENEER
Priority Sequence:	2		
Priority Class:	3		
Category Code:	ES2B	System:	EXTERIOR
		Component:	COLUMNS/BEAMS/WALLS
		Element:	FINISH
Building Code:	UTIN		
Building Name:	INCINERATOR PLANT AND UTILITY		
Subclass/Savings:	Not Applicable		
Code Application:	Not Applicable		
Project Class:	Capital Renewal		
Project Date:	10/8/2009		
Project Location:	Building-wide: Floor(s) 1		

Project Description

Brick veneer is the primary exterior finish. While the brick is fundamentally sound, exposure to the elements has caused some deterioration of the mortar joints and expansion joints. Cleaning, surface preparation, selective repairs, and applied finish or penetrating sealant upgrades are recommended to restore the aesthetics and integrity of the building envelope.

Specific Project Details
Facility Condition Analysis
Section Three
 UTIN : INCINERATOR PLANT AND UTILITY

Project Cost

Project Number: UTINES01

Task Cost Estimate

Task Description	Unit	Qty	Material Unit Cost	Total Material Cost	Labor Unit Cost	Total Labor Cost	Total Cost
Cleaning and surface preparation	SF	8,810	\$0.11	\$969	\$0.22	\$1,938	\$2,907
Selective mortar and / or sealant repairs (assumes 10 linear feet for every 100 square feet of envelope)	LF	881	\$2.45	\$2,158	\$4.99	\$4,396	\$6,555
Applied finish or sealant	SF	8,810	\$0.22	\$1,938	\$0.82	\$7,224	\$9,162
Project Totals:				\$5,066		\$13,559	\$18,624

Material/Labor Cost		\$18,660
Material Index		100.7%
Labor Index		51.3%
Material/Labor Indexed Cost		\$12,057
General Contractor Mark Up at 20.0%	+	\$2,411
Construction Cost		\$14,468
Professional Fees at 16.0%	+	\$2,315
Total Project Cost		\$16,783

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Description

Project Number:	UTINEL02	Title:	ELECTRICAL SYSTEM REPAIRS
Priority Sequence:	3		
Priority Class:	3		
Category Code:	EL3B	System:	ELECTRICAL
		Component:	SECONDARY DISTRIBUTION
		Element:	DISTRIBUTION NETWORK
Building Code:	UTIN		
Building Name:	INCINERATOR PLANT AND UTILITY		
Subclass/Savings:	Not Applicable		
Code Application:	NEC	Articles 100, 210, 410	
Project Class:	Capital Renewal		
Project Date:	11/6/2009		
Project Location:	Floor-wide: Floor(s) 1, 2		

Project Description

Aging devices, including wall switches and receptacles, are potential shock and fire hazards. Replace all worn or damaged switches, receptacles, and cover plates. Install ground fault circuit interrupter (GFCI) receptacles where required by code. Test power panels for proper operation, replacing faulty breakers as needed. Update power panel directories for circuit identification.

Specific Project Details
Facility Condition Analysis
Section Three
 UTIN : INCINERATOR PLANT AND UTILITY

Project Cost

Project Number: UTINEL02

Task Cost Estimate

Task Description	Unit	Qty	Material Unit Cost	Total Material Cost	Labor Unit Cost	Total Labor Cost	Total Cost
Switches, receptacles, cover plates, breakers, and miscellaneous materials	SF	16,672	\$0.19	\$3,168	\$0.28	\$4,668	\$7,836
Project Totals:				\$3,168		\$4,668	\$7,836

Material/Labor Cost		\$7,836
Material Index		100.7%
Labor Index		51.3%
Material/Labor Indexed Cost		<u>\$5,585</u>
General Contractor Mark Up at 20.0%	+	<u>\$1,117</u>
Construction Cost		<u>\$6,702</u>
Professional Fees at 16.0%	+	<u>\$1,072</u>
Total Project Cost		<u>\$7,774</u>

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Description

Project Number:	UTINIS01	Title:	REFINISH FLOORING
Priority Sequence:	4		
Priority Class:	3		
Category Code:	IS1A	System:	INTERIOR/FINISH SYS.
		Component:	FLOOR
		Element:	FINISHES-DRY
Building Code:	UTIN		
Building Name:	INCINERATOR PLANT AND UTILITY		
Subclass/Savings:	Not Applicable		
Code Application:	Not Applicable		
Project Class:	Capital Renewal		
Project Date:	10/8/2009		
Project Location:	Floor-wide: Floor(s) 1,2		

Project Description

Interior floor finishes consist of carpet and vinyl tile in the office areas and concrete in the incinerator spaces. The applications vary in age and condition from area to area. Floor finish upgrades should be considered as part of any future cosmetic improvements or major comprehensive renovation efforts.

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Cost

Project Number: UTINIS01

Task Cost Estimate

Task Description	Unit	Qty	Material Unit Cost	Total Material Cost	Labor Unit Cost	Total Labor Cost	Total Cost
Carpet	SF	1,900	\$5.36	\$10,184	\$2.00	\$3,800	\$13,984
Vinyl floor tile	SF	1,900	\$3.53	\$6,707	\$2.50	\$4,750	\$11,457
Project Totals:				\$16,891		\$8,550	\$25,441

Material/Labor Cost		\$25,443
Material Index		100.7%
Labor Index		51.3%
Material/Labor Indexed Cost		\$21,395
General Contractor Mark Up at 20.0%	+	\$4,279
Construction Cost		\$25,674
Professional Fees at 16.0%	+	\$4,108
Total Project Cost		\$29,782

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Description

Project Number:	UTINIS02	Title:	REFINISH WALLS
Priority Sequence:	5		
Priority Class:	3		
Category Code:	IS2B	System:	INTERIOR/FINISH SYS.
		Component:	PARTITIONS
		Element:	FINISHES

Building Code:	UTIN
Building Name:	INCINERATOR PLANT AND UTILITY
Subclass/Savings:	Not Applicable

Code Application: Not Applicable

Project Class:	Capital Renewal
Project Date:	10/8/2009

Project Location:	Floor-wide: Floor(s) 1,2
--------------------------	--------------------------

Project Description

Interior wall finishes consist of painted plaster or concrete walls. The applications vary in age and condition. Wall finish upgrades should be considered as part of any future cosmetic improvements or major comprehensive renovation efforts.

Specific Project Details
Facility Condition Analysis
Section Three
 UTIN : INCINERATOR PLANT AND UTILITY

Project Cost

Project Number: UTINIS02

Task Cost Estimate

Task Description	Unit	Qty	Material Unit Cost	Total Material Cost	Labor Unit Cost	Total Labor Cost	Total Cost
Standard wall finish (paint, wall covering, etc.)	SF	25,190	\$0.17	\$4,282	\$0.81	\$20,404	\$24,686
Project Totals:				\$4,282		\$20,404	\$24,686

Material/Labor Cost		\$24,657
Material Index		100.7%
Labor Index		51.3%
Material/Labor Indexed Cost		<u>\$14,779</u>
General Contractor Mark Up at 20.0%	+	<u>\$2,956</u>
Construction Cost		<u>\$17,735</u>
Professional Fees at 16.0%	+	<u>\$2,838</u>
Total Project Cost		<u>\$20,573</u>

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Description

Project Number:	UTINIS03	Title:	REFINISH CEILINGS
Priority Sequence:	6		
Priority Class:	3		
Category Code:	IS3B	System:	INTERIOR/FINISH SYS.
		Component:	CEILINGS
		Element:	REPLACEMENT
Building Code:	UTIN		
Building Name:	INCINERATOR PLANT AND UTILITY		
Subclass/Savings:	Not Applicable		
Code Application:	Not Applicable		
Project Class:	Capital Renewal		
Project Date:	10/8/2009		
Project Location:	Floor-wide: Floor(s) 1, 2		

Project Description

Ceiling finishes consists of lay-in, acoustical tile in the office spaces and painted ceilings in the incinerator areas. The applications vary in age and condition from area to area. Ceiling finish upgrades should be considered as part of any future cosmetic improvements or major comprehensive renovation efforts.

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Cost

Project Number: UTINIS03

Task Cost Estimate

Task Description	Unit	Qty	Material Unit Cost	Total Material Cost	Labor Unit Cost	Total Labor Cost	Total Cost
Acoustical tile ceiling system	SF	3,000	\$2.12	\$6,360	\$2.98	\$8,940	\$15,300
Painted ceiling finish application	SF	7,000	\$0.17	\$1,190	\$0.81	\$5,670	\$6,860
Project Totals:				\$7,550		\$14,610	\$22,160

Material/Labor Cost		\$22,160
Material Index		100.7%
Labor Index		51.3%
Material/Labor Indexed Cost		<u>\$15,098</u>
General Contractor Mark Up at 20.0%	+	<u>\$3,020</u>
Construction Cost		<u>\$18,117</u>
Professional Fees at 16.0%	+	<u>\$2,899</u>
Total Project Cost		<u>\$21,016</u>

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Description

Project Number:	UTINFS02	Title:	REPLACE SPRINKLER HEADS
Priority Sequence:	7		
Priority Class:	4		
Category Code:	FS3A	System:	FIRE/LIFE SAFETY
		Component:	SUPPRESSION
		Element:	SPRINKLERS
Building Code:	UTIN		
Building Name:	INCINERATOR PLANT AND UTILITY		
Subclass/Savings:	Not Applicable		
Code Application:	NFPA	1, 13, 13D, 101	
Project Class:	Capital Renewal		
Project Date:	11/6/2009		
Project Location:	Floor-wide: Floor(s) 1,2		

Project Description

The sprinkler heads are recommended for replacement. The statistical life cycle for a sprinkler head is approximately twenty years. During this time, scale can accumulate inside the head and cause it to malfunction when needed. It is recommended that the aging sprinkler heads be replaced to ensure that proper protection is available.

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Cost

Project Number: UTINFS02

Task Cost Estimate

Task Description	Unit	Qty	Material Unit Cost	Total Material Cost	Labor Unit Cost	Total Labor Cost	Total Cost
Fire sprinkler head replacement	SF	16,672	\$0.09	\$1,500	\$0.35	\$5,835	\$7,336
Project Totals:				\$1,500		\$5,835	\$7,336

Material/Labor Cost		\$7,465
Material Index		100.7%
Labor Index		51.3%
Material/Labor Indexed Cost		\$4,504
General Contractor Mark Up at 20.0%	+	\$901
Construction Cost		\$5,405
Professional Fees at 16.0%	+	\$865
Total Project Cost		\$6,270

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Description

Project Number:	UTINES02	Title:	BUILT-UP ROOF REPLACEMENT
Priority Sequence:	8		
Priority Class:	4		
Category Code:	ES4B	System:	EXTERIOR
		Component:	ROOF
		Element:	REPLACEMENT
Building Code:	UTIN		
Building Name:	INCINERATOR PLANT AND UTILITY		
Subclass/Savings:	Energy Conservation	\$700	
Code Application:	Not Applicable		

Project Class:	Capital Renewal
Project Date:	10/8/2009
Project Location:	Floor-wide: Floor(s) R

Project Description

The built-up roofing system is not expected to outlast the scope of this analysis. Future budget modeling should include a provision for the replacement of all failing roofing systems. Replace this roof with a similar application.

Specific Project Details
Facility Condition Analysis
Section Three
 UTIN : INCINERATOR PLANT AND UTILITY

Project Cost

Project Number: UTINES02

Task Cost Estimate

Task Description	Unit	Qty	Material Unit Cost	Total Material Cost	Labor Unit Cost	Total Labor Cost	Total Cost
Built-up roof	SF	8,340	\$3.06	\$25,520	\$3.58	\$29,857	\$55,378
Project Totals:				\$25,520		\$29,857	\$55,378

Material/Labor Cost		\$55,407
Material Index		100.7%
Labor Index		51.3%
Material/Labor Indexed Cost		\$41,016
General Contractor Mark Up at 20.0%	+	\$8,203
Construction Cost		\$49,219
Professional Fees at 16.0%	+	\$7,875
Total Project Cost		\$57,094

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Description

Project Number:	UTINHV01	Title:	EXHAUST FAN REPLACEMENT
Priority Sequence:	9		
Priority Class:	4		
Category Code:	HV4B	System:	HVAC
		Component:	AIR MOVING/VENTILATION
		Element:	EXHAUST FANS
Building Code:	UTIN		
Building Name:	INCINERATOR PLANT AND UTILITY		
Subclass/Savings:	Not Applicable		
Code Application:	ASHRAE	62-2004	
Project Class:	Capital Renewal		
Project Date:	11/6/2009		
Project Location:	Floor-wide: Floor(s) R		

Project Description

The exhaust fans are recommended for replacement. The statistical life cycle for an exhaust fan is approximately twenty years. At or beyond this time, exhaust fans can incur high maintenance costs that justify replacement. Replace the existing fans with new units to include all electrical connections. Modify existing ductwork, as necessary, to accommodate the new fans.

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Cost

Project Number: UTINHV01

Task Cost Estimate

Task Description	Unit	Qty	Material Unit Cost	Total Material Cost	Labor Unit Cost	Total Labor Cost	Total Cost
Replace centrifugal roof exhauster (medium size, belt-driven)	EA	2	\$1,350	\$2,700	\$1,300	\$2,600	\$5,300
Replace utility set exhaust fan (medium size, belt-driven)	EA	1	\$2,000	\$2,000	\$1,290	\$1,290	\$3,290
Replace exhaust system ductwork	CFM	3,000	\$2.26	\$6,780	\$0.50	\$1,500	\$8,280
Project Totals:				\$11,480		\$5,390	\$16,870

Material/Labor Cost		\$16,870
Material Index		100.7%
Labor Index		51.3%
Material/Labor Indexed Cost		\$14,325
General Contractor Mark Up at 20.0%	+	\$2,865
Construction Cost		\$17,191
Professional Fees at 16.0%	+	\$2,750
Total Project Cost		\$19,941

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Description

Project Number:	UTINEL01	Title:	INTERIOR LIGHTING UPGRADE
Priority Sequence:	10		
Priority Class:	4		
Category Code:	EL4B	System:	ELECTRICAL
		Component:	DEVICES AND FIXTURES
		Element:	INTERIOR LIGHTING
Building Code:	UTIN		
Building Name:	INCINERATOR PLANT AND UTILITY		
Subclass/Savings:	Energy Conservation	\$6,800	
Code Application:	NEC	Articles 210, 410	
Project Class:	Capital Renewal		
Project Date:	11/6/2009		
Project Location:	Floor-wide: Floor(s) 1,2		

Project Description

An interior lighting upgrade is recommended. Replace existing aged and / or inefficient light fixtures with modern fixtures of the latest energy-efficient design. Select lamps with the same color temperature and rendering index for lighting uniformity. Install occupancy sensors in select areas for additional energy conservation.

Specific Project Details
Facility Condition Analysis
Section Three
UTIN : INCINERATOR PLANT AND UTILITY

Project Cost

Project Number: UTINEL01

Task Cost Estimate

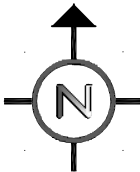
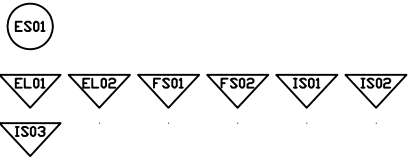
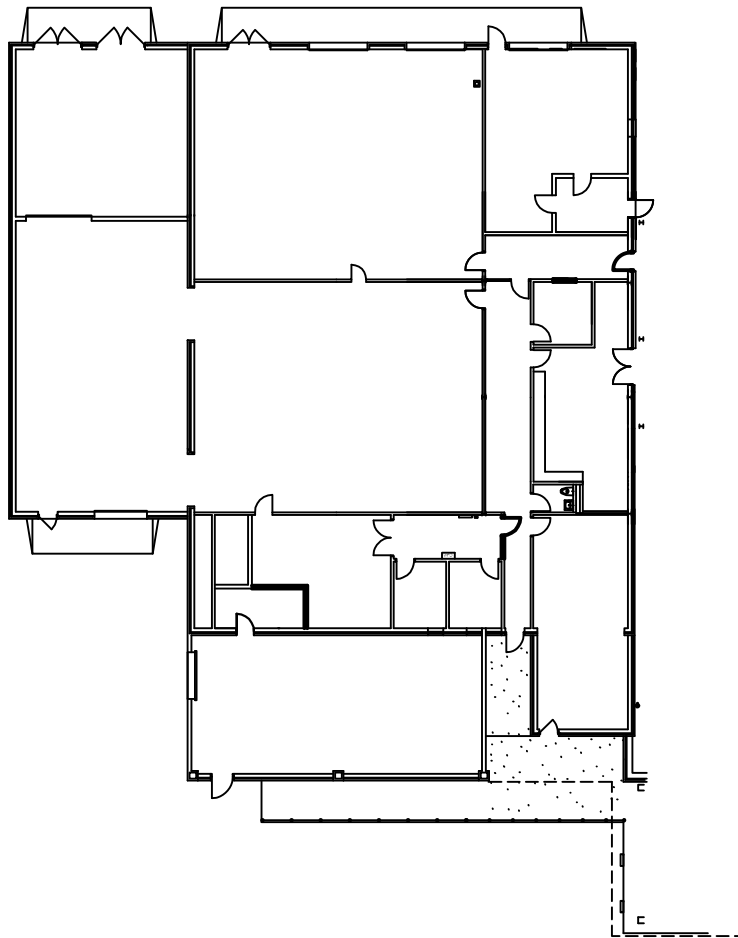
Task Description	Unit	Qty	Material Unit Cost	Total Material Cost	Labor Unit Cost	Total Labor Cost	Total Cost
High efficiency fluorescent fixtures, occupancy sensors, and demolition of existing lighting	SF	16,672	\$1.26	\$21,007	\$1.54	\$25,675	\$46,682
Project Totals:				\$21,007		\$25,675	\$46,682

Material/Labor Cost		\$46,656
Material Index		100.7%
Labor Index		51.3%
Material/Labor Indexed Cost		\$34,325
General Contractor Mark Up at 20.0%	+	\$6,865
Construction Cost		\$41,190
Professional Fees at 16.0%	+	\$6,590
Total Project Cost		\$47,780

FACILITY CONDITION ANALYSIS

SECTION 4

**DRAWINGS
AND PROJECT LOCATIONS**



INCINERATOR
PLANT AND
UTILITY

BLDG NO. UTIN



FACILITY
CONDITION
ANALYSIS

2165 West Park Court
Suite N
Stone Mountain GA 30087
770.879.7376

PROJECT NUMBER
APPLIES TO
ONE ROOM ONLY

PROJECT NUMBER
APPLIES TO
ONE ITEM ONLY

PROJECT NUMBER
APPLIES TO
ENTIRE BUILDING

PROJECT NUMBER
APPLIES TO
ENTIRE FLOOR

PROJECT NUMBER
APPLIES TO A SITUATION
OF UNDEFINED EXTENTS

PROJECT NUMBER
APPLIES TO AREA
AS NOTED

Date: 12/15/09

Drawn by: J.T.V.

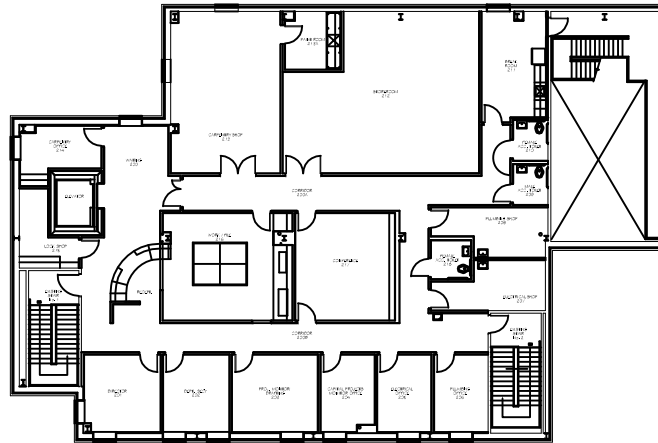
Project No. 09-041

FIRST
FLOOR
PLAN

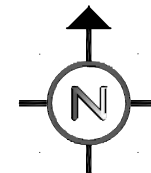
Sheet No.

1 of 2

ROOF
ES02 HV01



EL01 EL02 FS01 FS02 IS01 IS02
IS03



INCINERATOR
PLANT AND
UTILITY

BLDG NO. UTIN

ISES
CORPORATION

FACILITY
CONDITION
ANALYSIS

2165 West Park Court
Suite N
Stone Mountain GA 30087
770.879.7376

PROJECT NUMBER
APPLIES TO
ONE ROOM ONLY

PROJECT NUMBER
APPLIES TO
ONE ITEM ONLY

PROJECT NUMBER
APPLIES TO
ENTIRE BUILDING

PROJECT NUMBER
APPLIES TO
ENTIRE FLOOR

PROJECT NUMBER
APPLIES TO A SITUATION
OF UNDEFINED EXTENTS

PROJECT NUMBER
APPLIES TO AREA
AS NOTED

Date: 12/15/09
Drawn by: J.T.V.
Project No. 09-041

SECOND
FLOOR
PLAN

Sheet No.
2 of 2

FACILITY CONDITION ANALYSIS

SECTION 5

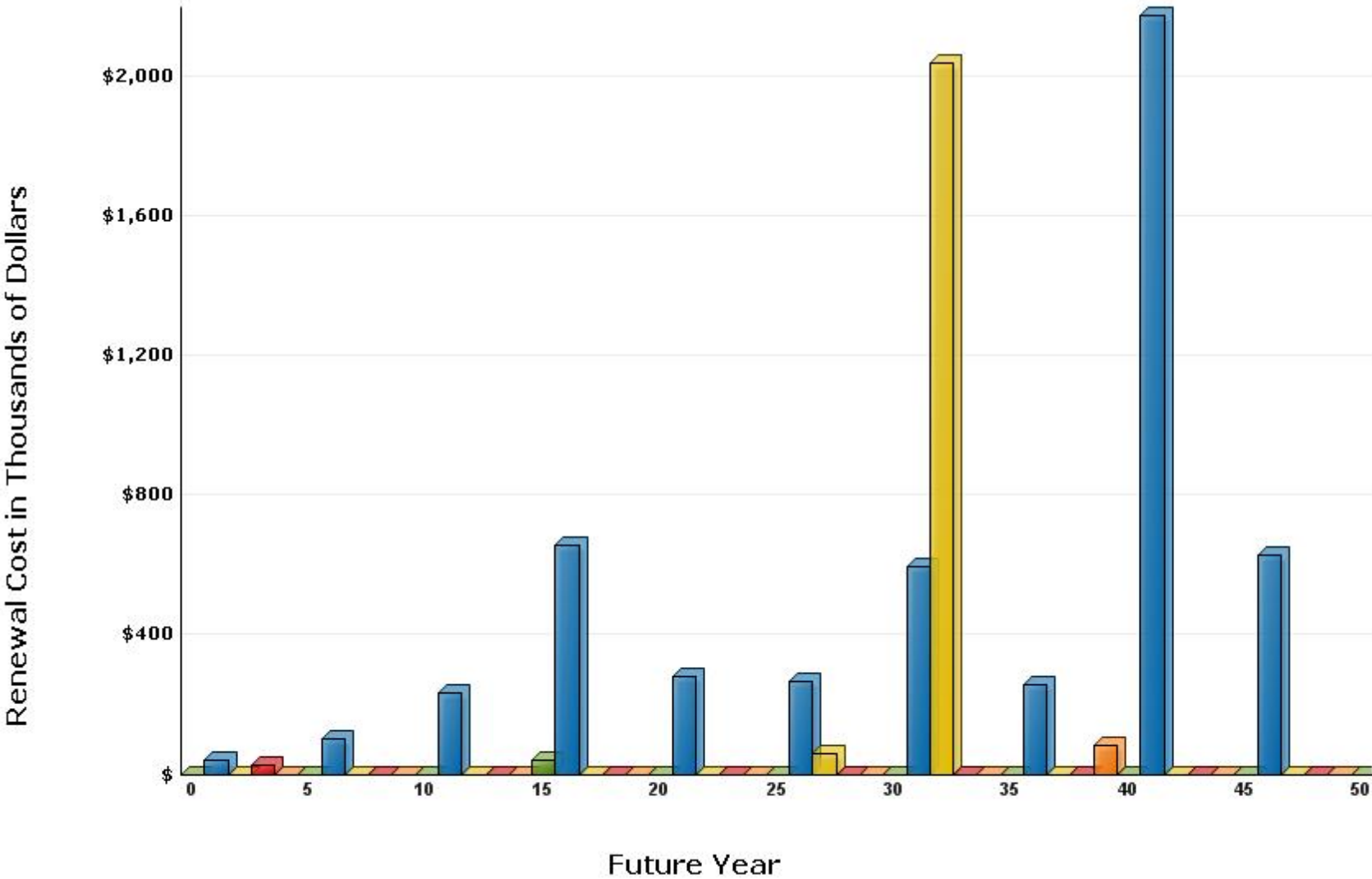
LIFE CYCLE MODEL SUMMARY
AND PROJECTIONS

Life Cycle Model
Building Component Summary
UTIN : INCINERATOR PLANT AND UTILITY

Unifomat Code	Component Description	Qty	Units	Unit Cost	Complex Adj	Total Cost	Install Date	Life Exp
B2010	EXTERIOR FINISH RENEWAL	8,810	SF	\$1.30	.31	\$3,560	1999	10
B2020	STANDARD GLAZING AND CURTAIN WALL	1,550	SF	\$104.04		\$161,257	1999	55
B2030	OVERHEAD GARAGE DOOR	3	EA	\$7,425.74		\$22,277	1999	30
B2030	HIGH TRAFFIC EXTERIOR DOOR SYSTEM	1	LEAF	\$4,311.24		\$4,311	1999	20
B2030	LOW TRAFFIC EXTERIOR DOOR SYSTEM	6	LEAF	\$2,863.29		\$17,180	1999	40
B3010	BUILT-UP ROOF	8,340	SF	\$6.70		\$55,900	1999	20
C1020	RATED DOOR AND FRAME INCLUDING HARDWARE	28	LEAF	\$1,489.06		\$41,694	1999	35
C1020	INTERIOR DOOR HARDWARE	28	EA	\$423.04		\$11,845	1999	15
C3010	STANDARD WALL FINISH (PAINT, WALL COVERING, ETC.)	25,190	SF	\$0.80		\$20,178	1999	10
C3020	CARPET	1,900	SF	\$8.75		\$16,618	1999	10
C3020	VINYL FLOOR TILE	1,900	SF	\$6.59		\$12,517	1999	15
C3020	RESURFACE AND SEAL CONCRETE OR TERRAZZO	8,870	SF	\$5.85		\$51,860	1999	50
C3030	ACOUSTICAL TILE CEILING SYSTEM	3,000	SF	\$4.99		\$14,979	1999	15
C3030	PAINTED CEILING FINISH APPLICATION	7,000	SF	\$0.80		\$5,607	1999	15
D1010	ELEVATOR MODERNIZATION - HYDRAULIC	1	EA	\$158,628.64		\$158,629	1999	25
D1010	ELEVATOR CAB RENOVATION - PASSENGER	1	EA	\$26,616.80		\$26,617	1999	12
D2010	PLUMBING FIXTURES - SHOPS / TRADES	16,672	SF	\$2.90		\$48,418	1999	35
D2020	WATER PIPING - SHOPS / TRADES	16,672	SF	\$2.08		\$34,607	1999	35
D2030	DRAIN PIPING - SHOPS / TRADES	16,672	SF	\$3.15		\$52,485	1999	40
D3020	BOILER (OVER 10,000 MBH)	33,471	MBH	\$23.67		\$792,157	2005	35
D3040	EXHAUST FAN - CENTRIFUGAL ROOF EXHAUSTER OR SIMILAR	2	EA	\$2,768.62		\$5,537	1999	20
D3040	EXHAUST FAN - UTILITY SET OR SIMILAR	1	EA	\$3,660.81		\$3,661	1999	20
D3040	HVAC SYSTEM - SHOPS / TRADES	16,672	SF	\$15.10		\$251,774	1999	25
D4010	FIRE SPRINKLER SYSTEM	16,672	SF	\$6.86		\$114,388	1999	80
D4010	FIRE SPRINKLER HEADS	16,672	SF	\$0.38		\$6,288	1999	20
D5010	ELECTRICAL SYSTEM - SHOPS / TRADES	16,672	SF	\$8.72		\$145,381	1999	50
D5020	EXIT SIGNS (BATTERY)	20	EA	\$280.76		\$5,615	1999	20
D5020	LIGHTING - SHOPS / TRADES	16,672	SF	\$2.80		\$46,669	1999	20
D5030	FIRE ALARM SYSTEM, POINT ADDRESSABLE	16,672	SF	\$2.61		\$43,590	1999	15
						\$2,175,600		

Life Cycle Model Expenditure Projections

UTIN : INCINERATOR PLANT AND UTILITY



Average Annual Renewal Cost Per SqFt \$3.62

FACILITY CONDITION ANALYSIS

SECTION 6

PHOTOGRAPHIC LOG

**Photo Log - Facility Condition
Analysis
UTIN : INCINERATOR PLANT AND UTILITY**

Photo ID No	Description	Location	Date
UTIN001a	Roof detail	Roof	9/1/2009
UTIN001e	Rooftop package unit	Roof	9/1/2009
UTIN002a	Roof detail	Roof	9/1/2009
UTIN002e	Incinerator boiler	Mechanical room	9/1/2009
UTIN003a	Reception area	Second floor	9/1/2009
UTIN004a	Interior corridor finishes	Second floor	9/1/2009
UTIN005a	Door hardware and signage	Second floor	9/1/2009
UTIN006a	Break room sink	Second floor	9/1/2009
UTIN007a	Stairwell design	Second floor	9/1/2009
UTIN008a	Dual-level drinking fountain	Second floor	9/1/2009
UTIN009a	Stairwell design	Second floor	9/1/2009
UTIN010a	Incinerator finishes	First floor	9/1/2009
UTIN011a	Exterior elevation	North facade	9/1/2009
UTIN012a	Exterior elevation	West facade	9/1/2009
UTIN013a	Exterior elevation	West facade	9/1/2009

Facility Condition Analysis - Photo Log



UTIN001A.jpg



UTIN001E.jpg



UTIN002A.jpg



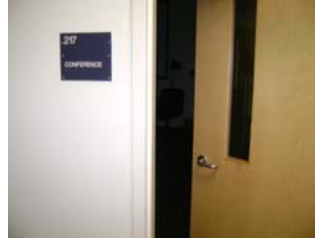
UTIN002E.jpg



UTIN003A.jpg



UTIN004A.jpg



UTIN005A.jpg



UTIN006A.jpg



UTIN007A.jpg



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UTIN011A.jpg



UTIN012A.jpg



UTIN013A.jpg