Burlington School District

Facility Condition Assessment and Level 1 Energy Audit

EXECUTIVE SUMMARY REPORT

April 2016



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1. Executive Summary

1.1 Background

The Facility Condition Assessments (FCAs) were prepared by EMG Corporation (EMG) in collaboration with Burlington School District, are a component of a long range capital plan.

The Burlington School District (BSD) portfolio covered by these assessments consists of 709,255 SF of District-owned facilities, contained within 9 schools and a facilities building. The FCAs inventoried and evaluated each of the BSD buildings to benchmark current conditions and establish replacement values. The assessments evaluate site conditions, building envelope, mechanical/HVAC, electrical, plumbing, fire protection and accessibility. For each recommended improvement, replacement or alteration, a project budget is provided. The projects are then prioritized based on the evaluations of the conditions. The Level 1 Energy Audit – Walk-Through Analysis identified and provided a savings cost analysis of low cost/no cost measures as well as providing a listing of potential capital improvements that merit further consideration.

This Facility Condition Assessment Executive Summary Report combines the individual assessments into one consolidated report, presenting general conclusions and an overall cost and condition summary. The report documents the identified immediate repair needs and anticipates replacement/repair needs based on useful life expectancy of the various systems, components and/or assets at each building.

1.2 Objectives

The objective of the Facility Condition Assessment is to identify the capital needs for infrastructure life cycle replacement/repair over the next twenty years. The FCA immediate need projections will become the basis for the Facility Condition Index (FCI). The FCI is the ratio of immediate needs versus the replacement value of the current facility. The FCI is a key performance indicator used to objectively quantify and evaluate the current condition of a facility. Once the FCI for a facility is established, it can be used to compare the relative condition of the subject facility with other facilities within the same portfolio, and as a trending matrix for infrastructure "health" over time.

1.3 Scope of Assessment

The evaluation teams visited each of the 10 buildings in June 2015. The evaluation teams reviewed available engineering studies, construction documents, and utility data to familiarize themselves with the physical conditions of the buildings and to perform a preliminary energy use analysis. The evaluation teams conducted walk-through surveys of the buildings in order to observe systems and components, identify physical deficiencies, and formulate recommendations to remedy the physical deficiencies in addition to identifying opportunities for energy conservation.

1.4 Key Findings

One of the major goals of the Facility Condition Assessment is to calculate the FCI, which gives an indication of a building's overall condition. The values are based on a scale from 0 to100 percent and are derived by dividing the immediate repair needs for a facility by the calculated replacement value. A lower FCI value indicates that the building infrastructure is in a better condition. Typically, a "Good" condition building will have the FCI below five percent, a "Fair" condition building will have the FCI between five and ten percent, and a "Poor" condition building will have the FCI above ten percent. If the FCI exceeds 65 percent, this is considered "Very Poor", and the building is a candidate for replacement or divestment.

The table below represents combined summary-level findings for all of the facility condition assessments. The deficiencies identified can be combined with potential new construction requirements to develop an overall long term capital needs plan that can be the basis for a facility-wide capital improvement funding strategy. Key findings from the assessments include:

Key Finding	Metric
Portfolio Replacement Value	$208,741,300
Portfolio Immediate Repair Needs (12 months)	$12,416,878
Portfolio 20- Year Capital Needs	$63,509,658

$$\text{FCI} = \frac{\text{Repair Costs [Immediate or 20-year Total]}}{\text{Current Replacement Value of Portfolio}}$$

Portfolio Current Year FCI

$$\text{Current FCI} = \frac{\$12,416,878}{\$208,741,300}$$

5.95 % = *Good to Fair Condition*

Portfolio 20-Year FCI

$$\text{20-Year FCI} = \frac{\$63,509,658}{\$208,741,300}$$

30.43 % = *Poor Condition*

The above FCI calculations show the condition across the entire portfolio. Generally buildings constructed or significantly renovated within the last 15 years are in good condition. There are two buildings that are currently in fair condition and two buildings that are currently in poor condition, based on FCI.

If no modernization or significant repair work is completed, the portfolio FCI index climbs to 30.43 percent or poor condition over the twenty year term. See summary table below.

Location	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Total
Burlington High School	$9,021,863	$697,530	$10,992,745	$271,112	$351,378	$1,975,681	$1,401,817	$1,642	$1,632,700	$670,711	$363,350	$124,686	$489,091	$0	$529,844	$852,668	$760,743	$510,359	$522,827	$419,438	$31,590,186
Champlain Elementary	$370,003	$80,424	$354,246	$0	$161,826	$249,711	$15,105	$13,158	$430,401	$10,438	$262,490	$100,565	$0	$252,731	$41,681	$50,316	$68,441	$280,534	$303,033	$31,191	$3,076,293
Charles P. Smith Elementary	$420	$110,210	$0	$96,784	$38,899	$0	$14,329	$30,776	$7,514	$53,624	$0	$16,611	$465,673	$109,012	$79,659	$0	$19,256	$69,487	$28,202	$0	$1,140,457
Edmunds Middle & Elementary School	$247,797	$179,036	$1,663,478	$127,618	$404,684	$1,369,669	$320,871	$1,401,074	$392,676	$185,386	$0	$0	$71,912	$469,167	$420,931	$708,860	$0	$602,615	$207,367	$90,140	$8,863,279
IAA - H.O. Wheeler Elementary	$150,414	$44,774	$406,815	$196,455	$60,597	$26,874	$58,690	$147,943	$0	$177,210	$127,820	$64,842	$45,624	$10,656	$68,236	$278,220	$21,747	$367,602	$0	$916,152	$3,170,671
IRA	$1,109,631	$0	$21,534	$927,426	$0	$0	$300,305	$12,809	$133,486	$368,760	$49,510	$0	$0	$14,541	$0	$290,384	$153,667	$33,549	$0	$0	$3,415,601
John J. Flynn Elementary	$121,768	$20,281	$43,294	$239,635	$45,290	$0	$0	$344,279	$29,489	$0	$266,116	$38,901	$451,424	$29,808	$16,183	$15,001	$99,411	$1,302,362	$0	$0	$3,063,240
Lyman C. Hunt	$476,730	$4,483,566	$83,132	$299,847	$119,933	$63,640	$86,496	$75,241	$9,592	$405,328	$0	$2,680	$35,359	$374,296	$0	$21,812	$0	$67,568	$54,427	$22,821	$6,682,467
Property Services Building	$154,172	$9,970	$2,228	$1,993	$188,073	$0	$0	$1,520	$0	$0	$23,250	$15,696	$0	$0	$20,273	$3,965	$0	$0	$22,832	$9,206	$453,177
SA - Lawrence Barnes Elementary	$764,081	$0	$30,766	$0	$17,108	$916	$0	$102,841	$315,948	$68,177	$85,997	$0	$0	$108,755	$24,309	$378,197	$0	$0	$130,546	$26,653	$2,054,292
GrandTotal	$12,416,878	$5,625,792	$13,598,237	$2,160,869	$1,387,787	$3,686,490	$2,197,612	$2,131,283	$2,951,805	$1,939,635	$1,178,533	$363,980	$1,559,082	$1,368,966	$1,201,117	$2,599,421	$1,123,265	$3,234,076	$1,269,234	$1,515,602	$63,509,663

2. Introduction

2.1 Scope of Assessment

The surveys included analysis and observation of each facility's interior and exterior, including the roofs. The evaluation teams interviewed building maintenance staff to inquire about the subject property's historical repairs and replacements, their costs, level of preventive maintenance exercised, pending repairs and improvements, and frequency of repairs and replacements. Opinions were developed based on the teams' site evaluations, interviews with relevant maintenance providers and facilities managers, and the teams' experience gained on similar previously evaluated properties. The evaluation teams interviewed those with knowledge of the subject property's physical condition and operation, or knowledge of similar systems, to gain comparative information to use in evaluation of the subject property. The evaluation teams reviewed documents and information provided by the staff to gain knowledge of the subject property's physical improvements, extent and type of use, and/or to assist in identifying material discrepancies between reported information and observed conditions.

The evaluation teams made visual assessments for compliance with ADA Accessibility Guidelines. Items determined to be out of compliance are included in the repair and renovation costs. Detailed measurements were not taken to determine compliance under the regulations.

The data collected in the assessment is the basis of the twenty year lifecycle horizon facility condition projection for capital needs. The goals of the analysis are:

- Benchmark present facility conditions with recommended corrections for deficiencies to establish the "immediate repair needs".
- Estimate life expectancy of various building systems and components to establish the "capital reserve needs" for infrastructure lifecycle replacement/repair for the twenty-year assessment period of 2016 to 2035.
- Provide cost estimates for corrections for "immediate repairs" and cost projections for "capital reserve needs" for lifecycle component replacement within the twenty-year projection timeframe.

The FCA will be a guide for future replacement, repairs, and improvements, and to assist the Burlington School District in prioritizing its capital budget and expenditures across its district portfolio. The Level 1 Energy Audit will be a stepping off point for future energy savings programs.

2.2 Property Condition Summary

The below chart projects twenty years into the future, identifying the repair needs based on the current conditions observed, and the estimated remaining useful life for the various building systems and materials.

20-Year Cost Summary

Location	Building Area (SF)	Total 2016-2035
Burlington High School	236,000	$31,590,186
Champlain Elementary	51,140	$3,076,293
Charles P. Smith Elementary	41,048	$1,140,457
Edmunds Middle & Elementary School	151,156	$8,863,279
IAA - H.O. Wheeler Elementary	39,080	$3,170,671
IRA	16,860	$3,415,601
John J. Flynn Elementary	52,688	$3,063,240
Lyman C. Hunt	77,633	$6,682,467
Property Services Building	12,244	$453,177
SA - Lawrence Barnes Elementary	31,406	$2,054,292
Total for Burlington School District	709,255	$63,509,663

2.3 Level 1 Energy Audit Summary

The major area of low cost energy savings for most of the District buildings evaluated is in reduction of water use by installing low flow aerators and shower heads along with low flow toilet fixtures. EMG recommends that all fixture upgrades be low flow units.

At the High School, addition of Variable Frequency Drives and high efficiency motors for the larger HVAC components will have a favorable payback.

At Wheeler Elementary, replacement of the defective steam traps is expected to provide immediate energy savings. The eventual replacement of the steam system with a hot water system is recommended for long term energy savings.

The implementation of demand control ventilation for major air handling systems is projected to yield a favorable payback.

Most of the refrigeration equipment uses more energy than the current best technology. When refrigeration equipment requires replacement, the installation of the highest efficiency components is recommended for long term energy savings.

The installation of the most efficient furnaces and boilers is recommended as equipment ages out of service.

3. Cost Analysis Charts

The cost data that has been produced from the surveys has been entered into the AssetCALC database software. The software can manipulate the data and produce charts and graphs to provide analyses of the costs in terms of type of work and the anticipated year the work will be required.

Cost Summary by Uniformat

A. Substructure	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Total
Foundations	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	$0
Basement Construction	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	$0
B. Shell	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Total
Superstructure	$97,880	$57,846	-	$219,300	$12,200	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	$387,226
Exterior Enclosure	$4,460,424	$35,616	$341,350	$15,630	$119,880	-	$1,117,552	$2,904	-	-	$36,840	$11,616	-	$3,630	$65,300	-	$13,552	$2,904	-	$76,500	$6,303,697
Roofing	$79,099	$14,725	$71,685	$172,528	$343,452	-	-	-	$336,640	$441,204	-	-	-	$215,055	$6,213	$273,520	-	$602,796	$75,744	$211,650	$2,844,311
C. Interiors	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Total
Interior Construction	$785,569	$241,250	$573,443	-	$139,465	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	$1,739,727
Stairs	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	$0
Interior Finishes	$17,282	-	$1,213,855	$13,683	$74,801	$2,114,967	$39,440	$1,023,750	$619,750	$231,955	$476,100	$28,880	$73,350	$341,980	$38,031	$538,512	-	$455,455	$476,100	-	$7,777,893
D. Services	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Total
Conveying	$108,794	-	-	-	-	-	-	$171,910	-	$18,975	-	-	$334,476	-	-	-	-	-	-	-	$634,155
Plumbing	$807,182	$322,714	-	$228,830	-	-	-	$23,685	$1,844	$86,568	$14,680	$1,844	$31,943	$21,528	$27,174	$36,385	-	-	$20,830	-	$1,625,206
HVAC	$2,469,629	$464,402	$1,832,276	$399,668	$349,970	$690,371	$197,329	-	$1,189,127	$562,494	$149,176	$80,957	$477,033	$309,411	$287,029	$621,131	$496,019	$455,187	$138,138	$511,592	$11,680,939
Fire Protection	$82,968	-	$1,453,538	-	-	-	-	-	$105,375	-	-	-	-	-	$4,447	$23,909	-	-	-	-	$1,670,236
Electrical	$11,790	$4,109,791	$7,105,950	$839,291	-	$222,655	$151,900	$20,298	-	$60,893	$93,780	-	-	$40,595	$278,285	$8,660	-	$40,595	$9,488	-	$12,993,970
E. Equipment & Furnishings	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Total
Equipment	$124,465	$94,650	$124,500	-	$45,553	-	$139,284	$191,451	$52,206	$31,480	$52,206	$94,650	$176,706	-	$42,600	$154,465	$94,650	$124,500	-	$26,585	$1,569,951
Furnishings	$18,599	-	-	-	$7,710	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	$26,309
F. Special Construction & Demolition	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Total
Special Construction	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	$0
Selective Building Demolition	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	$0
G. Building Sitework	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Total
Site Preparation	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	$0
Roadways	$241,056	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	$241,056
Parking Lots	$831,713	-	-	$88,571	-	$7,148	$194,960	$213,560	$25,241	$38,000	$49,417	-	-	-	-	$7,148	$95,760	$275,232	$25,241	$38,000	$1,889,990
Pedestrian Paving	$71,646	-	$34,685	-	-	$4,740	-	-	-	-	$4,740	-	-	-	-	$4,740	-	-	-	-	$120,551
Pedestrian Paving	$71,646	-	$34,685	-	-	$4,740	-	-	-	-	$4,740	-	-	-	-	$4,740	-	-	-	-	$120,551
Site Development	-	$30,000	$66,360	-	-	-	-	$85,370	-	$15,000	-	$45,000	-	-	$45,000	-	-	-	-	-	$286,730
Landscaping	$34,332	-	-	-	$140,000	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	$174,332
Site Mechanical Utilities	$66,179	$19,690	-	-	-	$140,119	-	-	-	-	-	-	-	-	-	-	-	-	-	-	$225,987
Site Electrical Utilities	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	$0
TOTAL	$10,380,251	$5,390,684	$12,852,327	$1,977,501	$1,233,031	$3,184,739	$1,840,466	$1,732,928	$2,330,182	$1,486,569	$881,679	$262,947	$1,093,509	$932,199	$794,080	$1,673,210	$699,981	$1,956,669	$745,541	$864,326	$52,312,819

20-Year Capital Reserve Summary Table

Property	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Total Escalated Estimate
Burlington High School	$9,021,863	$697,530	$10,992,745	$271,112	$351,378	$1,975,681	$1,401,817	$1,642	$1,632,700	$670,711	$363,350	$124,686	$489,091	$0	$529,844	$852,668	$760,743	$510,359	$522,827	$419,438	$31,590,186
Champlain Elementary	$370,003	$80,424	$354,246	$0	$161,826	$249,711	$15,105	$13,158	$430,401	$10,438	$262,490	$100,565	$0	$252,731	$41,681	$50,316	$68,441	$280,534	$303,033	$31,191	$3,076,293
Charles P. Smith Elementary	$420	$110,210	$0	$96,784	$38,899	$0	$14,329	$30,776	$7,514	$53,624	$0	$16,611	$465,673	$109,012	$79,659	$0	$19,256	$69,487	$28,202	$0	$1,140,457
Edmunds Middle & Elementary School	$247,797	$179,036	$1,663,478	$127,618	$404,684	$1,369,669	$320,871	$1,401,074	$392,676	$185,386	$0	$0	$71,912	$469,167	$420,931	$708,860	$0	$602,615	$207,367	$90,140	$8,863,279
IAA - H.O. Wheeler Elementary	$150,414	$44,774	$406,815	$196,455	$60,597	$26,874	$58,690	$147,943	$0	$177,210	$127,820	$64,842	$45,624	$10,656	$68,236	$278,220	$21,747	$367,602	$0	$916,152	$3,170,671
IRA	$1,109,631	$0	$21,534	$927,426	$0	$0	$300,305	$12,809	$133,486	$368,760	$49,510	$0	$0	$14,541	$0	$290,384	$153,667	$33,549	$0	$0	$3,415,601
John J. Flynn Elementary	$121,768	$20,281	$43,294	$239,635	$45,290	$0	$0	$344,279	$29,489	$0	$266,116	$38,901	$451,424	$29,808	$16,183	$15,001	$99,411	$1,302,362	$0	$0	$3,063,240
Lyman C. Hunt	$476,730	$4,483,566	$83,132	$299,847	$119,933	$63,640	$86,496	$75,241	$9,592	$405,328	$0	$2,680	$35,359	$374,296	$0	$21,812	$0	$67,568	$54,427	$22,821	$6,682,467
Property Services Building	$154,172	$9,970	$2,228	$1,993	$188,073	$0	$0	$1,520	$0	$0	$23,250	$15,696	$0	$0	$20,273	$3,965	$0	$0	$22,832	$9,206	$453,177
SA - Lawrence Barnes Elementary	$764,081	$0	$30,766	$0	$17,108	$916	$0	$102,841	$315,948	$68,177	$85,997	$0	$0	$108,755	$24,309	$378,197	$0	$0	$130,546	$26,653	$2,054,292
GrandTotal	$12,416,878	$5,625,792	$13,598,237	$2,160,869	$1,387,787	$3,686,490	$2,197,612	$2,131,283	$2,951,805	$1,939,635	$1,178,533	$363,980	$1,559,082	$1,368,966	$1,201,117	$2,599,421	$1,123,265	$3,234,076	$1,269,234	$1,515,602	$63,509,663

Appendix A: 20-Year Capital Reserve Tables by Property

Replacement Reserves Report
Burlington High School

3/23/2016

Report Section	Location Description	Cost Description	Lifespan (EUL)	EAge	RUL	Quantity	Unit	Unit Cost	Subtotal	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Deficiency Repair Estimate
3.1	Building A through F	C1021 Fire Doors, Replace	20	20	0	1	EA	$241,812.00	$241,812	$241,812																				$241,812
3.2	Interiors and Connections	Z1050 ADA, Miscellaneous (Lump Sum Budgetary Allowance), Upgrade	0	0	0	1	EA	$1,951,938.00	$1,951,938	$1,951,938																				$1,951,938
3.2	Parking and Site Grounds	Z1050 ADA, Miscellaneous (Lump Sum Budgetary Allowance), Upgrade	0	0	0	1	EA	$50,000.00	$50,000	$50,000																				$50,000
5.2	Courtyard connecting paths	G2012 Asphalt paving, crack repair, large quantities	0	0	0	1000	LF	$2.09	$2,090	$2,090																				$2,090
5.2	B building landing and front entrance sidewalk	G2022 Concrete Pavement, Parking Lot, Replace	30	30	0	3200	SF	$19.82	$63,424	$63,424																				$63,424
5.2	Parking lots	G2022 Asphalt Pavement, Parking Lot, Seal & Stripe	10	1	9	100000	SF	$0.38	$38,000										$38,000										$38,000	$76,000
5.2	Student parking lots	G2022 Asphalt Pavement, Parking Lot, Mill & Overlay	25	25	0	45000	SF	$3.28	$147,600	$147,600																				$147,600
5.4	Courtyards and entrances	G2052 Landscaping, Ground Cover, Regrade/Establish	25	21	4	50000	SF	$2.80	$140,000					$140,000																$140,000
6.3	Flat Roof	B3011 Single-Ply EPDM Membrane Roof, Replace	20	11	9	16500	SF	$10.52	$173,580										$173,580											$173,580
6.4	Building A through F	B2011 Brick Veneer, Exterior, 3+ Stories, Repoint	25	19	6	100000	SF	$11.04	$1,104,000							$1,104,000														$1,104,000
6.4	F building - north elevation	B2011 Brick Veneer, Exterior, 3+ Stories, Repair	0	0	0	500	SF	$53.28	$26,640	$26,640																				$26,640
6.4	Building exterior	B2011 Aluminum Siding, Exterior, 1-2 Stories, Replace	40	26	14	10000	SF	$6.53	$65,300															$65,300						$65,300
6.5	B building and loading dock area	B1015 Concrete, Exterior Stairs, Replace	50	46	4	200	SF	$61.00	$12,200					$12,200																$12,200
6.6	Windows	B2011 Lintel, Steel, Up to 8', Replace	40	40	0	200	EA	$4,105.00	$821,000	$821,000																				$821,000
6.6	Building A through F	B2023 Storefront Windows without Door(s), Metal-Framed, Replace	30	30	0	58200	SF	$48.00	$2,793,600	$2,793,600																				$2,793,600
6.6	Building A through F Connector Corridors	B2023 Storefront Windows without Door(s), Metal-Framed, Replace	30	30	0	12000	SF	$48.00	$576,000	$576,000																				$576,000
6.6	Building A through F Entrances	B2023 Storefront Windows with Door(s), Metal-Framed, Replace	30	30	0	2500	SF	$55.00	$137,500	$137,500																				$137,500
6.6	Exterior entrances	B2032 Steel, Insulated, Exterior Door, Replace	25	25	0	25	EA	$1,098.00	$27,450	$27,450																				$27,450
6.6	Loading docks and industrial arts shop doors	B2034 Steel, Roll-up Door, Automatic, 400 SF, Replace	35	16	19	10	EA	$7,650.00	$76,500																				$76,500	$76,500
6.6	Fire stairs	C1021 Fire Doors, Replace	20	20	0	21	EA	$1,536.05	$32,257	$32,257																				$32,257
6.6	Classrooms/Offices	C1021 Fire Doors, Replace	20	20	0	100	EA	$950.00	$95,000	$95,000																				$95,000
6.8	Common corridors	C1033 Locker, Steel, Baked Enamel, Single to 5 Tier, 12" W x 15" D x 72" H, Replace (Per LF)	20	20	0	1000	LF	$416.50	$416,500	$416,500																				$416,500
6.8	Student restrooms	C3012 Replace all restroom finishes	15	6	9	1500	SF	$120.00	$180,000										$180,000											$180,000
6.8	Common corridors/Classrooms	C3012 Concrete/Masonry, Interior Wall, Prep & Paint	8	6	2	300000	SF	$0.89	$267,000				$267,000							$267,000									$267,000	$801,000
6.8	Elementary School Corridors, Classrooms, Offices and Common	C3024 Wood Strip Flooring, Sand & Refinish	10	5	5	18000	SF	$3.68	$66,240					$66,240											$66,240					$132,480
6.8	Areas	C3024 Vinyl Tile Flooring w/ Asbestos Abatement, Replace	15	10	5	200000	SF	$8.19	$1,638,000					$1,638,000																$1,638,000
6.8	Hallways/Corridors, Classrooms, Offices and Common Areas	C3024 Plywood Flooring, Replace	20	12	8	100000	SF	$3.35	$335,000									$335,000												$335,000
6.8	Gymnasium	C3024 Wood Parquetry Flooring, Replace	30	28	2	10000	SF	$28.23	$282,300				$282,300																	$282,300
6.8	Building Stairwells	C3024 Vinyl Sheet Flooring, Replace	15	13	2	24300	SF	$10.01	$243,243				$243,243															$243,243		$486,486
6.8	Common corridors/Classrooms	C3032 Acoustical Tile Ceiling, Replace	20	9	11	250	SF	$3.11	$778											$778										$778
6.8	Commercial Kitchen	E1093 Freezer/Cooler w/ Desuperheater, Commercial, Walk-In, Replace	15	15	0	2	EA	$45,346.71	$90,693	$90,693															$90,693					$181,387
6.8	Home economics classroom	E1093 Range/Oven, Replace	15	15	0	5	EA	$5,240.00	$26,200	$26,200															$26,200					$52,400
6.8	Commericial and culinary arts kitchens	E1093 Food Service Equipment, Commercial Kitchen (Allowance), Replace	5	4	1	2	EA	$35,000.00	$70,000		$70,000					$70,000				$70,000					$70,000					$280,000
6.8	Commercial and Culinary Arts kitchens	E1093A Replace Kitchen Exhaust Hood w/ Makeup Air Unit	20	5	15	2	EA	$15,000.00	$30,000																$30,000					$30,000
6.8	Home economics classroom	E1094 Dishwasher, Residential, Replace	10	6	4	5	EA	$880.00	$4,400					$4,400										$4,400						$8,800
6.8	Home economics classrooms	E1094 Refrigerator, Residential, 14-18 CF, Replace	15	11	4	5	EA	$676.90	$3,385					$3,385															$3,385	$6,769
6.8	Home economics classroom	E2012 Residential kitchen countertop 10.5 ' w/new sink and faucet	25	21	4	5	Each	$1,542.00	$7,710					$7,710																$7,710
6.8	Home economics classroom	E2012 Kitchen Cabinet, Base and Wall Section, Wood, Replace	20	20	0	50	LF	$371.98	$18,599	$18,599																				$18,599
7.1	Building A through F Roofs	D2021 Pipe & Fittings, Steel, 3", Replace	30	29	1	2800	LF	$45.44	$127,232		$127,232																			$127,232
7.1	Mechanical Rooms	D2023 Circulator Pump, 2 HP, Replace	15	6	9	9	EA	$5,945.45	$53,509										$53,509											$53,509
7.1	Building H	D3021 Boiler, Dual Fuel, 2,001 to 20,000 MBH, Replace	30	22	8	1	EA	$953,868.57	$953,869									$953,869												$953,869
7.1	Building G	D3021 Boiler, Gas, 4,201 to 10,000 MBH, Replace	25	23	2	3	EA	$332,867.50	$998,603				$998,603																	$998,603

7.1	Building A through F	D3022 Expansion Tank, 31 to 60 GAL, Replace	25	23	2	6	EA	$2,483.48	$14,901		$14,901												$14,901
7.1	Building G	D3022 Expansion Tank, 176 to 250 GAL, Replace	25	25	0	2	EA	$4,696.79	$9,394	$9,394													$9,394
7.1	Roof	D3031 Chiller, Air-Cooled, 41 to 50 Ton, Replace	25	10	15	1	EA	$78,186.30	$78,186										$78,186				$78,186
7.1	Roof	D3031 Chiller, Air-Cooled, 21 to 30 Ton, Replace	25	10	15	1	EA	$54,093.38	$54,093										$54,093				$54,093
7.1	Roof	D3032 Condensing Unit/Heat Pump, Split System, 2.5 Ton, Replace	15	12	3	7	EA	$3,366.36	$23,565			$23,565									$23,565		$47,129
7.1	Roof	D3032 Condensing Unit/Heat Pump, Split System, 2.5 Ton, Replace	15	5	10	1	EA	$3,366.36	$3,366						$3,366								$3,366
7.1	Roof	D3032 Ductless Split System, Single Zone, 2.5 to 3 Ton, Replace	15	15	0	2	EA	$6,577.13	$13,154	$13,154									$13,154				$26,309
7.1	Lobby, connectors	D3041 Fan Coil Unit, Hydronic, 4,001 to 12,000 CFM, Replace	15	15	0	7	EA	$23,034.63	$161,242	$161,242									$161,242				$322,485
7.1	Administration	D3041 Fan Coil Unit, 2 to 2.5 Ton, Replace	15	4	11	7	EA	$2,756.89	$19,298							$19,298							$19,298
7.1	Roof	D3041 Make-Up Air Unit, 6,001 to 12,000 CFM, Replace	20	16	4	2	EA	$44,658.41	$89,317				$89,317										$89,317
7.1	Buildings A,B,C,D,and part of E	D3041 Unit Ventilator, 1,251 to 1,500 CFM (approx. 4 Ton), Replace	15	14	1	40	EA	$9,974.25	$398,970		$398,970									$398,970			$797,940
7.1	Nursing, Early Child Development	D3041 Fan Coil Unit, 2 to 2.5 Ton, Replace	15	12	3	6	EA	$2,756.89	$16,541			$16,541									$16,541		$33,083
7.1	Industrial arts workshops	D3041 Air Handler, Interior, 15,001 to 20,000 CFM, Replace	30	11	19	3	EA	$25,200.00	$75,600													$75,600	$75,600
7.1	Roof	D3042 Exhaust Fan, Centrifugal, 801 to 2,000 CFM, Replace	15	11	4	12	EA	$2,664.18	$31,970				$31,970									$31,970	$63,940
7.1	Roof	D3042 Exhaust Fan, Centrifugal, 8,001 to 10,000 CFM, Replace	15	6	9	6	EA	$7,685.96	$46,116						$46,116								$46,116
7.1	Industrial Arts	D3042 Exhaust Fan, Centrifugal, 3,501 to 5,000 CFM, Replace	15	11	4	2	EA	$4,322.55	$8,645				$8,645									$8,645	$17,290
7.1	A Building	D3043 Replace Heat Exchanger	20	5	15	1	EA	$5,100.00	$5,100										$5,100				$5,100
7.1	C Building	D3043 Replace Heat Exchanger	20	1	19	1	EA	$5,100.00	$5,100													$5,100	$5,100
7.1	D Building	D3043 Replace Heat Exchanger	20	4	16	1	EA	$5,100.00	$5,100											$5,100			$5,100
7.1	Industrial arts workshops	D3044 Replace water source unit heaters with fan 43.9 MBH	30	16	14	50	EA	$4,764.00	$238,200								$238,200						$238,200
7.1	Building G	D3044 Circulation Pump, Heating Water, 30 to 75 HP, Replace	20	6	14	2	EA	$17,713.00	$35,426								$35,426						$35,426
7.1	Entrance Lobby	D3052 Package Unit, 16 to 20 Ton, Replace	15	13	2	1	EA	$36,777.37	$36,777			$36,777								$36,777			$73,555
7.1	Roof	D3052 Air Handling Unit, Exterior, 3.5 to 5 Ton, Replace	15	6	9	2	EA	$11,419.83	$22,840						$22,840								$22,840
7.1	Building A through F	D3068 Building Automation System (HVAC Controls), Upgrade	20	20	0	232566	SF	$5.36	$1,246,554	$1,246,554													$1,246,554
7.1	Jewelry Shop	E1027 Laboratory Exhaust Hood, Variable Volume, 4 LF, Replace	25	21	4	2	EA	$7,284.16	$14,568				$14,568										$14,568
7.2	Bathrooms	D2011 Toilet, Tankless (Water Closet), Replace	20	19	1	25	EA	$842.97	$21,074		$21,074												$21,074
7.2	Restrooms	D2012 Urinal, Vitreous China, Replace	20	19	1	12	EA	$1,193.44	$14,321		$14,321												$14,321
7.2	Restrooms	D2013 Lavatory, Vitreous China, Replace	20	19	1	25	EA	$572.66	$14,317		$14,317												$14,317
7.2	Janitor closets	D2014 Service Sink, Porcelain Enamel, Cast Iron, Replace	20	19	1	8	EA	$1,360.33	$10,883		$10,883												$10,883
7.2	Building E	D2019 Emergency Eye Wash & Shower Station, Replace	15	15	0	4	EA	$2,114.70	$8,459	$8,459									$8,459				$16,918
7.2	F building	D2023 Water Heater, Electric, Commercial, 30 to 80 GAL, Replace	15	15	0	1	EA	$6,963.24	$6,963	$6,963									$6,963				$13,926
7.2	C Building	D2023 Water Heater, Electric, Residential, 30 to 52 GAL, Replace	15	8	7	1	EA	$1,335.00	$1,335					$1,335									$1,335
7.2	E building	D2023 Water Heater, Electric, Commercial, 30 to 80 GAL, Replace	15	1	14	1	EA	$6,963.24	$6,963									$6,963					$6,963
7.2	D building	D2023 Water Heater, Electric, Commercial, 30 to 80 GAL, Replace	15	15	0	1	EA	$6,963.24	$6,963	$6,963									$6,963				$13,926
7.2	Building A and B	D2023 Water Storage Tank, 80 to 150 GAL, Replace	20	8	12	4	EA	$2,140.56	$8,562								$8,562						$8,562
7.2	Kitchen	D2023 Domestic Boiler, Gas, 260 to 500 MBH, Replace	22	21	1	1	EA	$20,417.07	$20,417		$20,417												$20,417
7.2	Waste and vent piping	D2031 Pipe & Fittings, Cast Iron, 3", Replace	50	47	3	5000	LF	$41.60	$208,000			$208,000											$208,000
7.2	Building A and B	D3021 Boiler, Gas, 126 to 250 MBH, Replace	25	8	17	2	EA	$14,377.52	$28,755											$28,755			$28,755
7.4	Building A to H	D5019 Electrical System, School, Upgrade	40	38	2	232566	SF	$27.25	$6,337,424		$6,337,424												$6,337,424
7.5	All buildings	D1011 Elevator, Hydraulic, 3000 to 4000 LB, 3 Floors, Renovate	30	18	12	4	EA	$83,619.00	$334,476								$334,476						$334,476
7.5	F Building and B Building Library	Z1020 ADA, Elevator/Lift, Wheelchair Lift, Up to 8', Install	0	0	0	2	EA	$23,850.00	$47,700	$47,700													$47,700
7.6	Building A through F	D4019 Sprinkler System, Full Retrofit, School (per SF), Renovate	50	48	2	232566	SF	$6.25	$1,453,538		$1,453,538												$1,453,538
7.6	All Buildings	D5037 Fire Alarm System, School, Upgrade/Install	20	18	2	232566	SF	$3.13	$727,932		$727,932												$727,932

7.6 Building F Dust Collection System	D5037 Fire Alarm System, School, Upgrade/Install	20	20	0	1000 SF	$3.13	$3,130	$3,130																					$3,130
Totals, Unescalated								$9,021,863	$677,214	$10,361,716	$248,106	$312,195	$1,704,240	$1,174,000	$1,335	$1,288,869	$514,044	$270,366	$90,076	$343,038	$0	$350,289	$547,295	$474,070	$308,775	$307,106	$239,200		$28,233,798
Location Factor (1.00)								$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0		$0
Totals, Escalated (3.0% inflation, compounded annually)								$9,021,863	$697,530	$10,992,745	$271,112	$351,378	$1,975,681	$1,401,817	$1,642	$1,632,700	$670,711	$363,350	$124,686	$489,091	$0	$529,844	$852,668	$760,743	$510,359	$522,827	$419,438		$31,590,186

Replacement Reserves Report
Lyman C. Hunt Middle School

3/23/2016

Report Section	Location Description	Cost Description	Lifespan (EUL)	EAge	RUL	Quantity	Unit	Unit Cost	Subtotal	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Deficiency Repair Estimate
3.2	Parking lot	Z1060 ADA, Parking, Designated Stall with Pavement Markings & Signage (Van), Install	0	0	0	1	EA	$420.00	$420	$420																				$420
3.2	Crosswalk to entrance	Z1060 ADA, Parking, Access Aisle Striping, Install	0	0	0	15	LF	$7.25	$109	$109																				$109
3.2	Parking lot	Z1060 ADA, Parking, Designated Stall with Pavement Markings & Signage, Install	0	0	0	7	EA	$375.00	$2,625	$2,625																				$2,625
3.2	Main entrance	Z1090 ADA, Site, Walkways, Curb Cut Ramp, Install	0	0	0	1	EA	$1,900.00	$1,900	$1,900																				$1,900
5.2	Entrance Drives	G2012 Curb & Gutter, Concrete, 24" by 6" straight (per LF), Replace	25	25	0	3000	LF	$40.08	$120,240	$120,240																				$120,240
5.2	Entrance Pavement	G2012 Curb & Gutter, Concrete, Repair	0	0	0	300	LF	$24.02	$7,206	$7,206																				$7,206
5.2	Parking Area and Drive Lanes	G2022 Asphalt Pavement, Parking Lot, Mill & Overlay	25	25	0	76000	SF	$3.28	$249,280	$249,280																				$249,280
5.2	Parking Area and Drive Lanes	G2022 Asphalt Pavement, Parking Lot, Seal & Stripe	10	3	7	76000	SF	$0.38	$28,880								$28,880										$28,880			$57,760
5.2	Entrance Drive and Main Entrance	G2031 Concrete Sidewalk, Replace	30	30	0	3300	SF	$19.82	$65,406	$65,406																				$65,406
5.3	Left and rear of building	D2033 Trench Drain, 12", Replace	30	30	0	50	LF	$171.74	$8,587	$8,587																				$8,587
5.5	Perimeter	G2041 Chain Link Fence, 3' to 4' High (per LF), Replace x	30	28	2	3000	LF	$22.12	$66,360			$66,360																		$66,360
6.3	D wing	B3011 Single-Ply TPO/PVC Membrane Roof, Replace	20	7	13	13500	SF	$15.93	$215,055														$215,055							$215,055
6.8	Building	C1033 Locker, Steel, Baked Enamel, Single to 5 Tier, 12" W x 15" D x 72" H, Replace (Per LF)	20	19	1	500	LF	$482.50	$241,250		$241,250																			$241,250
6.8	Entire building	C3012 Concrete/Masonry, Interior Wall, Prep & Paint	8	3	5	34000	SF	$0.89	$30,260						$30,260								$30,260							$60,520
6.8	Common areas and classrooms	C3024 Vinyl Tile Flooring, Replace	15	6	9	3000	SF	$4.80	$14,400										$14,400											$14,400
6.8	Common areas and classrooms	C3032 Acoustical Tile Ceiling, Replace	20	17	3	200	SF	$3.11	$622				$622																	$622
6.8	Commercial kitchen	E1093 Food Service Equipment, Commercial Kitchen (Allowance), Replace	5	3	2	1	EA	$12,000.00	$12,000			$12,000					$12,000					$12,000				$12,000			$48,000
6.8	Kitchen	E1093 Freezer/Cooler, Commercial, Walk-In, Replace	15	9	6	2	EA	$22,317.14	$44,634						$44,634															$44,634
6.8, 7.6	Kitchen	E1093 Kitchen Exhaust Hood, Commercial, Replace	15	7	8	1	EA	$7,571.72	$7,572									$7,572												$7,572
7.1	Boiler Room	D3021 Boiler, Gas, 2,501 to 4,200 MBH, Replace	25	22	3	2	EA	$120,905.15	$241,810				$241,810																	$241,810
7.1	Boiler room / Gymnasium	D3041 Air Handler, Interior, 8,001 to 10,000 CFM, Replace	30	26	4	3	EA	$31,181.53	$93,545					$93,545																$93,545
7.1	Classrooms - Heating Only	D3041 Unit Ventilator, 751 to 1,250 CFM (approx. 3 Ton), Replace	15	6	9	30	EA	$9,050.00	$271,500										$271,500											$271,500
7.1	Site	D3042 Exhaust Fan, Centrifugal, 8,001 to 10,000 CFM, Replace	15	11	4	1	EA	$7,685.96	$7,686					$7,686															$7,686	$15,372
7.1	Building Interior General	D3042 Exhaust Fan, Centrifugal, 801 to 2,000 CFM, Replace	15	11	4	2	EA	$2,664.18	$5,328					$5,328															$5,328	$10,657
7.1	Roof	D3042 Exhaust Fan, Centrifugal, 801 to 2,000 CFM, Replace	15	12	3	12	EA	$2,664.18	$31,970				$31,970															$31,970		$63,940
7.1	Boiler room	D3044 Circulation Pump, Heating Water, 20 to 25 HP, Replace	20	11	9	2	EA	$12,375.00	$24,750										$24,750											$24,750
7.1	Building Interior General	D3051 Unit Heater, Hydronic, 13 to 36 MBH, Replace	20	7	13	3	EA	$1,516.80	$4,550														$4,550							$4,550
7.1	Rooftop	D3052 Air Handling Unit, Exterior, 11 to 15 Ton, Replace	15	9	6	1	EA	$27,804.57	$27,805						$27,805															$27,805
7.1	Rooftop	D3052 Heat Pump, 2.5 to 3 Ton, Replace	15	2	13	1	EA	$5,012.00	$5,012														$5,012							$5,012
7.1	Rooftop	D3052 Package Unit, 13 to 15 Ton, Replace	15	10	5	1	EA	$24,636.00	$24,636						$24,636															$24,636
7.2	D wing	D2023 Water Heater, Electric, Commercial, 30 to 80 GAL, Replace	15	3	12	1	EA	$12,800.00	$12,800													$12,800								$12,800
7.2	Boiler Room	D2023 Water Heater, Gas, Commercial, 60 to 120 GAL, Replace	15	15	0	1	EA	$14,000.00	$14,000	$14,000															$14,000					$28,000
7.2	Kitchen	P1000 Engineer, Plumbing, Domestic Water Supply System, Evaluate/Report	0	0	0	1	EA	$6,957.50	$6,958	$6,958																				$6,958
7.4	Lyman C. Hunt	D5012 Building/Main Switchgear, 208 Y, 120 V, 1,200 Amp, Replace	30	29	1	1	EA	$212,265.31	$212,265		$212,265																			$212,265
7.4	Building	D5019 Electrical System, School, Upgrade	40	39	1	77633	SF	$49.78	$3,864,571		$3,864,571																			$3,864,571

7.4 Auditorium	D5029 Lighting System, Interior, School, Upgrade	25	24	1	1500 SF	$21.97	$32,955		$32,955																				$32,955
7.6 Electrical Room	D5037 Fire Alarm Control Panel, Addressable, Replace	15	8	7	1 EA	$20,297.59	$20,298									$20,298													$20,298
9 Storage shed	B2011 Exterior Wall Paint, 1-2 Stories, Prep & Paint	10	9	1	800 SF	$2.42	$1,936		$1,936										$1,936										$3,872
Totals, Unescalated								$476,730	$4,352,977	$78,360	$274,402	$106,559	$54,896	$72,439	$61,178	$7,572	$310,650	$0	$1,936	$24,800	$254,877	$0	$14,000	$0	$40,880	$31,970	$13,014		$6,177,241
Location Factor (1.00)								$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0		$0
Totals, Escalated (3.0% inflation, compounded annually)								$476,730	$4,483,566	$83,132	$299,847	$119,933	$63,640	$86,496	$75,241	$9,592	$405,328	$0	$2,680	$35,359	$374,296	$0	$21,812	$0	$67,568	$54,427	$22,821		$6,682,467

Replacement Reserves Report
Edmunds Middle & Elementary School

3/23/2016

Report Section	Location Description	Cost Description	Lifespan (EUL)	EAge	RUL	Quantity	Unit	Unit Cost	Subtotal	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Deficiency Repair Estimate
3.2	Parking lot	Z1060 ADA, Parking, Designated Stall with Pavement Markings & Signage (Van), Install	0	0	0	1	EA	$420.00	$420	$420																				$420
3.2, 5.2	Building Attached	B1015 Concrete, Exterior Stairs, Replace	50	49	1	1000	SF	$48.94	$48,940		$48,940																			$48,940
5.2	Gymnasium - Fire Escape	B1015 Metal, Exterior Stairs, Replace	40	39	1	200	SF	$44.53	$8,906		$8,906																			$8,906
5.2	Parking and service drives	G2022 Asphalt Pavement, Parking Lot, Mill & Overlay	25	25	0	41500	SF	$3.28	$136,120	$136,120																			$136,120
5.2	Throughout Parking Areas	G2022 Asphalt Pavement, Parking Lot, Cut & Patch	25	19	6	20000	SF	$4.96	$99,200							$99,200														$99,200
5.2	All parking and service drives	G2022 Asphalt Pavement, Parking Lot, Seal & Stripe	10	2	8	66400	SF	$0.38	$25,232									$25,232										$25,232		$50,464
5.2	Site	G2031 Concrete Sidewalk, Replace	30	28	2	1750	SF	$19.82	$34,685			$34,685																		$34,685
5.5	East side of property	G2047 Play Structure, Small, Replace	20	19	1	2	EA	$15,000.00	$30,000		$30,000																			$30,000
6.3	Elementary School	B3011 Single-Ply EPDM Membrane Roof, Replace	20	3	17	13300	SF	$10.52	$139,916																		$139,916			$139,916
6.3	Cafeteria building	B3011 Single-Ply EPDM Membrane Roof, Replace	20	2	18	7200	SF	$10.52	$75,744																			$75,744		$75,744
6.3	Gymnasium	B3011 Single-Ply TPO/PVC Membrane Roof, Replace	20	16	4	11400	SF	$15.93	$181,602					$181,602																$181,602
6.3	Middle School -snow guards	B3011 Metal Roof, Repair	0	-1	1	47500	SF	$0.31	$14,725		$14,725																			$14,725
6.3	Middle School Attic	X1010 ECM, Attic Insulation Levels, Upgrade	0	-1	1	47500	SF	$1.50	$71,250		$71,250																			$71,250
6.5	B and C Building Entrances	B1015 Concrete, Exterior Stairs, Replace	50	50	0	2000	SF	$48.94	$97,880	$97,880																				$97,880
6.6	Elementary School and Middle School	B2021 Wood Window, Repair	0	0	0	56	EA	$238.87	$13,377	$13,377																				$13,377
6.6	Cafeteria Building	B2021 Aluminum Window, Double Glazed, 3+ Stories, 24 SF, Replace	30	28	2	100	EA	$1,450.00	$145,000			$145,000																		$145,000
6.6	Gymnasium	B2023 Storefront Windows without Door(s), Metal-Framed, Replace	30	27	3	250	SF	$48.00	$12,000				$12,000																	$12,000
6.6	Building Connectors and Entrances	B2023 Storefront Windows with Door(s), Metal-Framed, Replace	30	28	2	1600	SF	$55.00	$88,000			$88,000																		$88,000
6.6	Elementary School	C1021 Wood, Solid Core w/ Safety Glass, Painted/Stained, Interior Door, Replace	20	16	4	98	EA	$1,423.11	$139,465					$139,465																$139,465
6.8	Elementary School and Middle School	C1033 Locker, Steel, Baked Enamel, Single to 5 Tier, 12" W x 15" D x 72" H, Replace (Per LF)	20	18	2	1100	LF	$482.50	$530,750			$530,750																		$530,750
6.8	Entire building	C3012 Concrete/Masonry, Interior Wall, Prep & Paint	8	3	5	205650	SF	$1.45	$298,193						$298,193								$298,193							$596,385
6.8	Building Stairwells	C3024 Vinyl Sheet Flooring, Replace	15	13	2	14000	SF	$10.01	$140,140			$140,140															$140,140			$280,280
6.8	Common Areas Hallways/Corridors, Classrooms, Offices and	C3024 Vinyl Tile Flooring w/ Asbestos Abatement, Replace	15	8	7	125000	SF	$8.19	$1,023,750								$1,023,750													$1,023,750
6.8	Common Areas Hallways/Corridors, Classrooms, Offices and	C3024 Plywood Flooring, Replace	20	12	8	85000	SF	$3.35	$284,750									$284,750												$284,750
6.8	Elementary School	C3024 Wood Strip Flooring, Sand & Refinish	10	5	5	18000	SF	$3.68	$66,240						$66,240										$66,240					$132,480
6.8	1904 Building Stairwells	C3024 Vinyl Sheet Flooring, Replace	15	13	2	3600	SF	$10.01	$36,036			$36,036															$36,036			$72,072
6.8	Hallways, classrooms	C3032 Acoustical Tile Ceiling, Replace	20	5	15	125000	SF	$3.11	$388,750																$388,750					$388,750
7.1	Mechanical Room	D2091 Air Compressor, 2 HP, Replace	20	11	9	5	EA	$6,611.73	$33,059										$33,059											$33,059
7.1	Boiler Room	D3021 Boiler, Gas, 4,201 to 10,000 MBH, Replace	25	20	5	2	EA	$332,867.50	$665,735						$665,735															$665,735
7.1	Mechanical Room	D3022 Condensate Receiver Station, 15 GAL, Replace	25	16	9	4	EA	$7,732.67	$30,931										$30,931											$30,931
7.1	Elementary School - Building B	D3023 Heat Exchanger, Steam-to-Water, 76 to 105 GPM, Replace	35	16	19	1	EA	$12,916.17	$12,916																				$12,916	$12,916
7.1	Mechanical Room	D3041 Air Handler, Interior, 10,001 to 15,000 CFM, Replace	30	27	3	2	EA	$41,979.17	$83,958				$83,958																	$83,958
7.1	All Buildings	D3041 Variable Air Volume (VAV) Unit, 100 to 400 CFM, Replace	15	9	6	38	EA	$4,141.92	$157,393							$157,393														$157,393
7.1	Kitchen, Gym	D3042 Exhaust Fan, Propeller, 1,000 CFM, Replace	15	11	4	3	EA	$1,402.69	$4,208					$4,208															$4,208	$8,416
7.1	Attic	D3042 Exhaust Fan, Centrifugal, 2,001 to 3,500 CFM, Replace	15	11	4	3	EA	$3,072.78	$9,218					$9,218															$9,218	$18,437
7.1	Building Interior General	D3042 Exhaust Fan, Centrifugal, 251 to 800 CFM, Replace	15	9	6	6	EA	$2,021.87	$12,131							$12,131														$12,131
7.1	Roof	D3042 Exhaust Fan, Roof Mounted, 1,001 to 1,500 CFM, Replace	15	11	4	13	EA	$1,927.94	$25,063					$25,063															$25,063	$50,126
7.1	Boiler room	D3044 Circulation Pump, Heating Water, 10 HP, Replace	20	11	9	2	EA	$11,175.00	$22,350										$22,350											$22,350
7.1	Building Interior General	D3051 Unit Heater, Hydronic, 37 to 85 MBH, Replace	20	7	13	1	EA	$1,900.28	$1,900														$1,900							$1,900

Replacement Reserves Report
Edmunds Middle & Elementary School

3/23/2016

Report Section	Location Description	Cost Description	Lifespan (EUL)	EAge	RUL	Quantity	Unit	Unit Cost	Subtotal	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Deficiency Repair Estimate
7.1	Building Interior General	D3051 Unit Heater, Hydronic, 101 to 160 MBH, Replace	20	11	9	11	EA	$2,469.66	$27,166										$27,166											$27,166
7.1	Elementary School, Gym and Cafeteria	D3068 Building Automation System (HVAC Controls), Upgrade	20	18	2	101656	SF	$5.36	$544,876			$544,876																		$544,876
7.1	Kitchen	E1093 Kitchen Exhaust Hood, Commercial, Replace	15	6	9	1	EA	$7,571.72	$7,572										$7,572											$7,572
7.1	Kitchen	E1094 Ceiling Fan, Residential, Replace	15	6	9	2	EA	$354.11	$708										$708											$708
7.1	Elementary School	G3011 Pipe & Fittings, Copper, 2", Replace/Install	40	35	5	1875	LF	$74.73	$140,119						$140,119															$140,119
7.2	Mechanical room	D2023 Water Heater, Electric, Commercial, 121 to 300 GAL, Replace	15	12	3	1	EA	$10,415.00	$10,415				$10,415															$10,415		$20,830
7.2	Mechanical room	D2023 Water Heater, Electric, Residential, 16 to 29 GAL, Replace	15	3	12	1	EA	$1,937.53	$1,938													$1,938								$1,938
7.2	Mechanical room	D2023 Water Heater, Electric, Commercial, 81 to 100 GAL, Replace	15	2	13	3	EA	$6,462.33	$19,387														$19,387							$19,387
7.2	Mechanical room	D2023 Water Heater, Electric, Commercial, 121 to 300 GAL, Replace	15	12	3	1	EA	$10,415.00	$10,415				$10,415															$10,415		$20,830
7.4	Boiler Room	D5012 Distribution Panel, 480 Y, 277 V, 400 Amp, Replace	30	25	5	1	EA	$11,202.02	$11,202						$11,202															$11,202
7.4	Building Interior General	D5012 Distribution Panel, 208 Y, 120 V, 225 Amp, Replace	30	16	14	35	EA	$7,951.00	$278,285															$278,285						$278,285
7.6	Mechanical Room	D5037 Fire Alarm Control Panel, Addressable, Replace	15	6	9	1	EA	$20,297.59	$20,298										$20,298											$20,298
8.2	Commercial kitchen	E1093 Food Service Equipment, Commercial Kitchen (Allowance), Replace	5	3	2	1	EA	$48,500.00	$48,500			$48,500					$48,500					$48,500					$48,500			$194,000
8.2	Kitchen	E1093 Freezer/Cooler, Commercial, Walk-In, Replace	15	8	7	3	EA	$22,317.14	$66,951								$66,951													$66,951
Totals, Unescalated										$247,797	$173,821	$1,567,987	$116,788	$359,556	$1,181,488	$268,724	$1,139,201	$309,982	$142,083	$0	$0	$50,438	$319,480	$278,285	$454,990	$0	$364,592	$121,806	$51,406	$7,148,425
Location Factor (1.00)										$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0
Totals, Escalated (3.0% inflation, compounded annually)										$247,797	$179,036	$1,663,478	$127,618	$404,684	$1,369,669	$320,871	$1,401,074	$392,676	$185,386	$0	$0	$71,912	$469,167	$420,931	$708,860	$0	$602,615	$207,367	$90,140	$8,863,279

Replacement Reserves Report
Champlain Elementary

3/23/2016

Report Section	Location Description	Cost Description	Lifespan (EUL)	EAge	RUL	Quantity	Unit	Unit Cost	Subtotal	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Deficiency Repair Estimate
3.2	Main parking lot	Z1060 ADA, Parking, Designated Stall with Pavement Markings & Signage, Install	0	0	0	1	EA	$375.00	$375	$375																				$375
3.2	Front Parking lot	Z1060 ADA, Parking, Designated Stall with Pavement Markings & Signage (Van), Install	0	0	0	1	EA	$420.00	$420	$420																				$420
5.2	Parking lots	G2022 Asphalt Pavement, Parking Lot, Seal & Stripe	10	0	10	45	SF	$0.38	$17											$17										$17
5.2	Parking lots, drive aisles	G2022 Asphalt Pavement, Parking Lot, Mill & Overlay	25	25	0	55000	SF	$3.28	$180,422	$180,422																				$180,422
5.2	Site walkways	G2031 Asphalt Sidewalk, Seal	5	5	0	5000	SF	$0.79	$3,950	$3,950					$3,950					$3,950					$3,950					$15,800
5.2	Site walkways	G2031 Asphalt Sidewalk, Replace	25	25	0	2000	SF	$0.75	$1,500	$1,500																				$1,500
5.3	Side parking area	G2052 Drainage Swale, Concrete, Replace/Install	25	25	0	250	LF	$40.81	$10,203	$10,203																				$10,203
5.3	Building to manhole	G3031 Pipe & Fittings, Cast Iron, 10", Replace/Install	50	50	0	150	LF	$188.43	$28,265	$28,265																				$28,265
5.3	Parking lot sewer line	P1000 Engineer, Civil, Roadway & Driveway, Evaluate/Report	0	0	0	1	EA	$6,325.00	$6,325	$6,325																				$6,325
6.3	Primary roofs	B3011 Single-Ply EPDM Membrane Roof, Replace	20	12	8	32000	SF	$10.52	$336,637									$336,637												$336,637
6.4	Boiler room exterior	B2011 Brick Veneer, Exterior, 1-2 Stories, Repair	0	0	0	175	SF	$50.88	$8,904	$8,904																				$8,904
6.8	Classroom windows	B2021 Aluminum Window, Double Glazed, 3+ Stories, 24 SF, Replace	30	26	4	2400	EA	$49.95	$119,880					$119,880																$119,880
6.8	Classrooms/Common Corridors	C3012 Concrete/Masonry, Interior Wall, Prep & Paint	8	6	2	200000	SF	$0.89	$178,000			$178,000								$178,000								$178,000		$534,000
6.8	Classrooms/common corridors	C3024 Vinyl Tile Flooring, Replace	15	15	0	3500	SF	$4.80	$16,802	$16,802															$16,802					$33,604
6.8	Building interior	C3032 Acoustical Tile Ceiling, Replace	20	6	14	35	SF	$3.11	$109															$109						$109
6.8	Kitchen	E1093 Food Service Equipment, Commercial Kitchen (Allowance), Replace	5	4	1	1	EA	$12,650.00	$12,650		$12,650					$12,650					$12,650					$12,650				$50,600
6.8	Kitchen	E1093 Food Service Equipment, Commercial Kitchen (Allowance), Replace	5	1	4	1	EA	$8,000.00	$8,000					$8,000					$8,000					$8,000					$8,000	$32,000
7.1	Building Interior	D3022 Pipe & Fittings, Steel, 3", Replace	40	39	1	800	LF	$44.29	$35,432		$35,432																			$35,432
7.1	Roof	D3032 Condensing Unit/Heat Pump, Split System, 2 Ton, Replace	15	13	2	5	EA	$3,122.18	$15,611			$15,611															$15,611			$31,222
7.1	Roof	D3032 Condensing Unit/Heat Pump, Split System, 2 Ton, Replace	15	7	8	1	EA	$3,122.18	$3,122									$3,122												$3,122
7.1	Split systems - classrooms	D3032 Condensing Unit/Heat Pump, Split System, 3.5 Ton, Replace	15	11	4	2	EA	$4,894.00	$9,788					$9,788															$9,788	$19,576
7.1	Gymnasium	D3041 Unit Ventilator, 1,501 to 2,000 CFM (approx. 5 Ton), Replace	15	14	1	2	EA	$15,000.00	$30,000		$30,000															$30,000				$60,000
7.1	Gymnasium	D3042 Exhaust Fan, Centrifugal, 251 to 800 CFM, Replace	15	15	0	2	EA	$2,021.87	$4,044	$4,044															$4,044					$8,087
7.1	Common areas/basement	D3044 Replace water source unit heaters with fan 43.9 MBH	30	26	4	8	EA	$764.00	$6,112					$6,112																$6,112
7.1	Boiler Room	D3044 Circulation Pump, Heating Water, 7.5 HP, Replace	20	3	17	2	EA	$6,037.49	$12,075																		$12,075			$12,075
7.1	Building Interior General	D3051 Unit Heater, Electric, 3 to 6 kW, Replace	20	3	17	1	EA	$1,741.57	$1,742																		$1,742			$1,742
7.1	Gym Air Handling Unit	D3052 Air Handling Unit, Exterior, 21 to 25 Ton, Replace	15	2	13	1	EA	$151,800.00	$151,800														$151,800							$151,800
7.1	RTU - 2nd floor classrooms (VFD Addition)	D3052 Air Handling Unit, Exterior, 26 to 40 Ton, Replace	15	0	15	1	EA	$7,500.00	$7,500																$7,500					$7,500
7.1	RTU - Library and Offices	D3052 Replace rooftop unit	15	4	11	20	Ton	$3,000.00	$60,000												$60,000									$60,000
7.1	RTU - 2nd floor classrooms	D3052 Replace rooftop unit	15	13	2	40	Ton	$3,507.50	$140,300			$140,300															$140,300			$280,600
7.1	Kitchen	E1093 Kitchen Exhaust Hood, Commercial, Replace	15	1	14	1	EA	$15,000.00	$15,000															$15,000						$15,000
7.2	Custodian Closets	D2023 Water Heater, Electric, Residential, 30 to 52 GAL, Replace	12	2	10	10	EA	$1,335.00	$13,350											$13,350										$13,350
7.2	Boiler Room	D2023 Water Heater, Gas, Commercial, 60 to 120 GAL, Replace	15	8	7	1	EA	$10,698.82	$10,699								$10,699													$10,699
7.4	Electrical Room	D5012 Secondary Transformer, Dry, 150 kVA, Replace	30	25	5	1	EA	$15,803.27	$15,803						$15,803															$15,803
7.4	Electrical Room	D5012 Building/Main Switchgear, 480 Y, 277 V, 1,000 Amp, Replace	30	25	5	1	EA	$195,649.21	$195,649						$195,649															$195,649
7.5	Common corridor	D1011 Elevator, Hydraulic, 1500 to 2500 LB, 2 Floors, Renovate	30	30	0	1	EA	$108,794.40	$108,794	$108,794																				$108,794

Replacement Reserves Report
Champlain Elementary

3/23/2016

Report Section	Location Description	Cost Description	Lifespan (EUL)	EAge	RUL	Quantity	Unit	Unit Cost	Subtotal	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Deficiency Repair Estimate
7.6	Kitchen	D4091 Kitchen Fire Suppression System (CO2), Replace	15	1	14	1	EA	$4,447.10	$4,447															$4,447						$4,447
7.6	Electrical closet	D5037 Fire Alarm Control Panel, Addressable, Replace	15	2	13	1	EA	$20,297.59	$20,298														$20,298							$20,298
Totals, Unescalated										$370,003	$78,082	$333,911	$0	$143,780	$215,402	$12,650	$10,699	$339,759	$8,000	$195,317	$72,650	$0	$172,098	$27,556	$32,296	$42,650	$169,727	$178,000	$17,788	$2,420,368
Location Factor (1.00)										$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0
Totals, Escalated (3.0% inflation, compounded annually)										$370,003	$80,424	$354,246	$0	$161,826	$249,711	$15,105	$13,158	$430,397	$10,438	$262,490	$100,565	$0	$252,731	$41,681	$50,316	$68,441	$280,534	$303,033	$31,191	$3,076,289

Replacement Reserves Report
SA - Lawrence Barnes Elementary

3/23/2016

Report Section	Location Description	Cost Description	Lifespan (EUL)	EAge	RUL	Quantity	Unit	Unit Cost	Subtotal	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Deficiency Repair Estimate
3.2	Parking lot	Z1060 ADA, Parking, Designated Stall with Pavement Markings & Signage (Van), Install	0	0	0	1	EA	$420.00	$420	$420																				$420
3.2	Parking lot	Z1060 ADA, Parking, Designated Stall with Pavement Markings & Signage, Install	0	0	0	3.21	EA	$375.00	$1,204	$1,204																				$1,204
5.2	Parking lots	G2022 Asphalt Pavement, Parking Lot, Seal & Stripe	10	10	0	90000	SF	$0.38	$34,200	$34,200										$34,200										$68,400
5.2	Side and rear yards	G2031 Asphalt Sidewalk, Seal	5	5	0	1000	SF	$0.79	$790	$790					$790					$790					$790					$3,160
6.3	Roof	B3011 Single-Ply EPDM Membrane Roof, Replace	20	5	15	23000	SF	$10.52	$241,960															$241,960						$241,960
6.4	1993 Wing	B2021 Steel Window, Repair	0	0	0	25	EA	$133.50	$3,338	$3,338																				$3,338
6.8	Common corridors/classrooms	C3012 Concrete/Masonry, Interior Wall, Prep & Paint	8	6	2	20000	SF	$1.45	$29,000			$29,000								$29,000								$29,000		$87,000
6.8	Common corridors/classrooms	C3024 Vinyl Tile Flooring, Replace	15	6	9	3490	SF	$4.80	$16,754										$16,754											$16,754
6.8	Common corridors/classrooms	C3032 Acoustical Tile Ceiling, Replace	20	6	14	280	SF	$3.11	$871															$871						$871
6.8	Kitchen	E1093 Freezer/Cooler, Commercial, Walk-In, Replace	15	7	8	2	EA	$22,317.14	$44,634									$44,634												$44,634
7.1	Mechanical Room	D3021 Boiler, Gas, 301 to 750 MBH, Replace	25	7	18	2	EA	$23,840.87	$47,682																			$47,682		$47,682
7.1	Classrooms	D3032 Condensing Unit/Heat Pump, Split System, 2.5 Ton, Replace	15	7	8	26	EA	$3,366.36	$87,525									$87,525												$87,525
7.1	Roof	D3041 Make-Up Air Unit, 2,000 to 6,000 CFM, Replace	20	7	13	1	EA	$32,062.66	$32,063														$32,063							$32,063
7.1	Roof	D3042 Exhaust Fan, Centrifugal, 3,501 to 5,000 CFM, Replace	15	7	8	2	EA	$4,322.55	$8,645									$8,645												$8,645
7.1	Mechanical Room	D3044 Circulation Pump, Heating Water, 3 HP, Replace	20	7	13	2	EA	$4,652.29	$9,305														$9,305							$9,305
7.1	Mechanical Room	D3045 Circulation Pump, Chiller & Condenser Water, 10 HP, Replace	20	7	13	2	EA	$6,237.69	$12,475														$12,475							$12,475
7.1	Mechanical Room	D3045 Circulation Pump, Chiller & Condenser Water, 5 HP, Replace	20	7	13	3	EA	$5,518.88	$16,557														$16,557							$16,557
7.1	Electrical Room	D3051 Unit Heater, Hydronic, 13 to 36 MBH, Replace	20	7	13	1	EA	$1,516.80	$1,517														$1,517							$1,517
7.1	Roof	D3052 Air Handling Unit, Exterior, 16 to 20 Ton, Replace	15	7	8	1	EA	$37,802.95	$37,803									$37,803												$37,803
7.1	Roof	D3052 Air Handling Unit, Exterior, 16 to 20 Ton, Replace	15	7	8	1	EA	$37,802.95	$37,803									$37,803												$37,803
7.1	Roof	D3052 Air Handling Unit, Exterior, 3.5 to 5 Ton, Replace	15	7	8	1	EA	$11,419.83	$11,420									$11,420												$11,420
7.1	Roof	D3052 Air Handling Unit, Exterior, 8 to 10 Ton, Replace	15	7	8	1	EA	$19,738.18	$19,738									$19,738												$19,738
7.2	Mechanical Room	D2023 Water Heater, Gas, Tankless, 6.5 to 9.5 GPM, Replace	15	7	8	1	EA	$1,843.56	$1,844									$1,844												$1,844
7.2	Mechanical Room	D2023 Water Storage Tank, 80 to 150 GAL, Replace	20	7	13	1	EA	$2,140.56	$2,141														$2,141							$2,141
7.2	Piping Distribution System	D2029 Plumbing System, School, Upgrade	40	40	0	35014	SF	$20.00	$700,280	$700,280																				$700,280
7.5	Lobby	D1011 Elevator, Hydraulic, 3000 to 4000 LB, 3 Floors, Renovate	30	23	7	1	EA	$83,619.00	$83,619								$83,619													$83,619
7.5	Main lobby	Z1020 ADA, Elevator/Lift, Wheelchair Lift, Up to 8', Install	0	0	0	1	EA	$23,850.00	$23,850	$23,850																				$23,850
7.6	Electric room	D5037 Fire Alarm Control Panel, Addressable, Replace	15	6	9	1	EA	$20,297.59	$20,298										$20,298											$20,298
8.2	Commercial kitchen	E1093 Food Service Equipment, Commercial Kitchen (Allowance), Replace	5	1	4	1	EA	$15,200.00	$15,200					$15,200						$15,200					$15,200				$15,200	$60,800
Totals, Unescalated										$764,081	$0	$29,000	$0	$15,200	$790	$0	$83,619	$249,412	$52,252	$63,990	$0	$0	$74,057	$16,071	$242,750	$0	$0	$76,682	$15,200	$1,683,104
Location Factor (1.00)										$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0
Totals, Escalated (3.0% inflation, compounded annually)										$764,081	$0	$30,766	$0	$17,108	$916	$0	$102,841	$315,948	$68,177	$85,997	$0	$0	$108,755	$24,309	$378,197	$0	$0	$130,546	$26,653	$2,054,292

Replacement Reserves Report
IAA - H.O. Wheeler Elementary

3/23/2016

Report Section	Location Description	Cost Description	Lifespan (EUL)	EAge	RUL	Quantity	Unit	Unit Cost	Subtotal	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Deficiency Repair Estimate
3.2	East and west sides of property	Z1050 ADA, Miscellaneous, Signage, Directional, Wall-Mounted, Install	0	0	0	2	EA	$280.00	$560	$560																				$560
3.2	East side parking	Z1060 ADA, Parking, Designated Stall with Pavement Markings & Signage (Van), Install	0	0	0	1	EA	$420.00	$420	$420																				$420
3.2	East and west sides of property	Z1060 ADA, Parking, Designated Stall with Pavement Markings & Signage, Install	0	0	0	3	EA	$375.00	$1,125	$1,125																				$1,125
3.2	Accessible restroom	Z1080 ADA, Restroom, Lavatory Pipe Wraps, Install	0	0	0	2	EA	$120.00	$240	$240																				$240
5.2	Recreation area at rear of property	G2022 Asphalt Pavement, Parking Lot, Mill & Overlay	25	8	17	7000	SF	$3.28	$22,963																		$22,963			$22,963
5.2	Parking lots	G2022 Asphalt Pavement, Parking Lot, Mill & Overlay	25	8	17	11800	SF	$3.28	$38,709																		$38,709			$38,709
5.2	Asphalt parking lots throughout site	G2022 Asphalt Pavement, Parking Lot, Seal & Stripe	10	5	5	18810	SF	$0.38	$7,148						$7,148										$7,148					$14,296
5.3	West parking lot	G2052 Drainage Swale, Concrete, Replace/Install	25	25	0	150	LF	$31.26	$4,689	$4,689																				$4,689
5.5	West, north and northeast sides	G2047 Play Structure, Small, Replace	20	9	11	3	EA	$15,000.00	$45,000												$45,000									$45,000
6.3	North portion of building	B3011 Single-Ply EPDM Membrane Roof, Replace	20	17	3	16400	SF	$10.52	$172,528				$172,528																	$172,528
6.3	West and central portion of building	B3011 Single-Ply TPO/PVC Membrane Roof, Replace	20	18	2	4500	SF	$15.93	$71,685			$71,685																		$71,685
6.3	Original Building - Snow Guards	B3011 Metal Roof, Repair	0	0	0	8500	SF	$0.31	$2,635	$2,635																				$2,635
6.3	Original building	B3011 Metal Roof, Replace	40	21	19	8500	SF	$24.90	$211,650																				$211,650	$211,650
6.3	Gymnasium	B3011 Single-Ply EPDM Membrane Roof, Replace	20	5	15	3000	SF	$10.52	$31,560																$31,560					$31,560
6.3	1904 Building Attic	X1010 ECM, Attic Insulation Levels, Upgrade	0	0	0	10800	SF	$0.75	$8,100	$8,100																				$8,100
6.4	North portion of building	B2011 Exterior Wall Paint, 1-2 Stories, Prep & Paint	10	4	6	5600	SF	$2.42	$13,552							$13,552										$13,552				$27,104
6.6	Exterior	B2021 Aluminum Window, Double Glazed, 3+ Stories, 24 SF, Replace	30	28	2	56	EA	$1,934.82	$108,350			$108,350																		$108,350
6.6	1993 Building	B2023 Storefront Windows without Door(s), Metal-Framed, Replace	30	29	1	500	SF	$48.00	$24,000		$24,000																			$24,000
6.6	Classrooms	B2032 Steel, Insulated, Exterior Door, Replace	25	25	0	10	EA	$1,577.53	$15,775	$15,775																				$15,775
6.6	1904 Classrooms	C1021 Wood, Solid Core w/ Safety Glass, Painted/Stained, Interior Door, Replace	20	18	2	30	EA	$1,423.11	$42,693			$42,693																		$42,693
6.8	Hallways, classrooms	C3012 Concrete/Masonry, Interior Wall, Prep & Paint	8	2	6	40000	SF	$0.89	$35,600							$35,600							$35,600							$71,200
6.8	1904 Building Stairwells	C3024 Vinyl Sheet Flooring, Replace	15	13	2	3600	SF	$10.01	$36,036			$36,036															$36,036			$72,072
6.8	Classrooms, common areas	C3024 Vinyl Tile Flooring, Replace	15	10	5	3340	SF	$4.80	$16,034						$16,034															$16,034
6.8	Offices, classrooms	C3025 Carpet, Standard Commercial, Medium Traffic, Replace	10	7	3	1000	SF	$7.26	$7,256				$7,256									$7,256								$14,512
7.1	Boiler Room	D3021 Boiler, Gas, 2,001 to 2,500 MBH, Replace	25	10	15	2	EA	$54,195.22	$108,390															$108,390						$108,390
7.1	Boiler Room	D3022 Condensate Receiver Station, 15 GAL, Replace	25	16	9	1	EA	$7,732.67	$7,733										$7,733											$7,733
7.1	Boiler Room	D3023 Heat Exchanger, Steam-to-Water, 41 to 75 GPM, Replace	35	16	19	2	EA	$9,484.21	$18,968																				$18,968	$18,968
7.1	South portion of building	D3041 Unit Ventilator, 751 to 1,250 CFM (approx. 3 Ton), Replace	15	13	2	8	EA	$9,050.00	$72,400			$72,400															$72,400			$144,800
7.1	North portion of building	D3041 Unit Ventilator, 751 to 1,250 CFM (approx. 3 Ton), Replace	15	6	9	10	EA	$9,050.00	$90,500										$90,500											$90,500
7.1	Attic	D3042 Exhaust Fan, Centrifugal, 251 to 800 CFM, Replace	15	11	4	5	EA	$2,021.87	$10,109					$10,109															$10,109	$20,219
7.1	Roof	D3042 Exhaust Fan, Roof Mounted, 801 to 1,000 CFM, Replace	15	11	4	9	EA	$1,769.49	$15,925					$15,925															$15,925	$31,851
7.1	Boiler Room	D3044 Circulation Pump, Heating Water, 3 HP, Replace	20	11	9	4	EA	$4,652.29	$18,609										$18,609											$18,609
7.1	Roof	D3052 Air Handling Unit, Exterior, 11 to 15 Ton, Replace	15	11	4	1	EA	$27,804.57	$27,805					$27,805															$27,805	$55,609
7.1	Building Interior General	D3068 Building Automation System (HVAC Controls), Upgrade	20	1	19	44405	SF	$5.36	$238,011																				$238,011	$238,011
7.2	New and Old Building	D2021 Backflow Preventer, 3", Replace	15	1	14	2	EA	$4,756.10	$9,512															$9,512						$9,512
7.2	Site	D2021 Pipe & Fittings, Steel, 3", Replace	30	30	0	100	LF	$100.00	$10,000	$10,000																				$10,000

7.2	Mechanical room	D2023 Water Heater, Gas, Residential, 30 to 50 GAL, Replace	10	10	0	1	EA	$1,330.00	$1,330	$1,330										$1,330													$2,660
7.2	Boiler Room	D2023 Water Heater, Gas, Tankless, 6.5 to 9.5 GPM, Replace	15	4	11	1	EA	$1,843.56	$1,844												$1,844												$1,844
7.2	Kitchen	D2029 Plumbing System, School, Upgrade	40	39	1	500	SF	$38.94	$19,470		$19,470																						$19,470
7.2	Boiler Room, New Building	D2031 Pipe & Fittings, Cast Iron, 4", Replace	50	50	0	100	LF	$150.00	$15,000	$15,000																							$15,000
7.4	Electrical Room	D5012 Secondary Transformer, Dry, 50 kVA, Replace	30	20	10	2	EA	$6,857.93	$13,716											$13,716													$13,716
7.4	Building Interior General	D5012 Distribution Panel, 208 Y, 120 V, 200 Amp, Replace	30	20	10	5	EA	$7,906.20	$39,531											$39,531													$39,531
7.4	Electrical Room	D5012 Distribution Panel, 480 Y, 277 V, 400 Amp, Replace	30	20	10	1	EA	$11,202.02	$11,202											$11,202													$11,202
7.4	Electrical Room	D5012 Distribution Panel, 480 Y, 277 V, 200 Amp, Replace	30	20	10	3	EA	$9,777.06	$29,331											$29,331													$29,331
7.5	Elevator	D1011 Elevator Controls, Automatic, 6 Car Cluster, Modernize	20	13	7	1	EA	$88,291.00	$88,291								$88,291																$88,291
7.5	Elevator	D1011 Replace passenger cab finishes	20	11	9	1	EA	$18,975.00	$18,975									$18,975															$18,975
7.6	Building Interior General	D4019 Sprinkler Heads (per SF), Replace	20	20	0	44405	SF	$1.33	$59,059	$59,059																							$59,059
7.6	Mechanical room	D5037 Fire Alarm Control Panel, Addressable, Replace	15	13	2	1	EA	$20,297.59	$20,298			$20,298																	$20,298				$40,595
8.2	Commercial kitchen	D4091 Kitchen Fire Suppression System (CO2), Replace	15	15	0	1	EA	$23,909.00	$23,909	$23,909																	$23,909						$47,818
8.2	Kitchen	E1093 Kitchen Exhaust Hood, Commercial, Replace	15	15	0	1	EA	$7,571.72	$7,572	$7,572																	$7,572						$15,143
8.2	Commercial kitchen	E1093 Food Service Equipment, Commercial Kitchen (Allowance), Replace	5	3	2	1	EA	$32,000.00	$32,000			$32,000					$32,000					$32,000						$32,000				$128,000
Totals, Unescalated										$150,414	$43,470	$383,462	$179,784	$53,839	$23,182	$49,152	$120,291	$0	$135,817	$95,110	$46,844	$32,000	$7,256	$45,112	$178,579	$13,552	$222,405	$0	$522,469			$2,302,737
Location Factor (1.00)										$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0			$0
Totals, Escalated (3.0% inflation, compounded annually)										$150,414	$44,774	$406,815	$196,455	$60,597	$26,874	$58,690	$147,943	$0	$177,210	$127,820	$64,842	$45,624	$10,656	$68,236	$278,220	$21,747	$367,602	$0	$916,152			$3,170,671

Replacement Reserves Report
Charles P. Smith Elementary

03/23/2016

Report Section	Location Description	Cost Description	Lifespan (EUL)	EAge	RUL	Quantity	Unit	Unit Cost	Subtotal	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Deficiency Repair Estimate
3.2	Parking lot	Z1060 ADA, Parking, Designated Stall with Pavement Markings & Signage (Van), Install	0	0	0	1	EA	$420.00	$420	$420																				$420
5.2	Parking lot	G2022 Asphalt Pavement, Parking Lot, Mill & Overlay	25	22	3	27000	SF	$3.28	$88,571				$88,571																	$88,571
5.2	Parking lot	G2022 Asphalt Pavement, Parking Lot, Seal & Stripe	10	2	8	24.3	SF	$0.38	$9									$9										$9		$18
5.5	Perimeter	G2041 Chain Link Fence, 3' to 4' High (per LF), Replace x	30	23	7	1000	LF	$22.12	$22,120								$22,120													$22,120
5.5	Playground	G2047 Play Structure, Small, Replace	20	6	14	3	EA	$15,000.00	$45,000															$45,000						$45,000
6.3	Roof	B3011 Single-Ply TPO/PVC Membrane Roof, Replace	20	6	14	390	SF	$15.93	$6,213															$6,213						$6,213
6.4	Exterior trim	B2011 Exterior Wall Paint, 1-2 Stories, Prep & Paint	10	3	7	1200	SF	$2.42	$2,904								$2,904										$2,904			$5,808
6.8	Hallways, classrooms	C3012 Gypsum Board/Plaster/Metal, Interior Wall, Prep & Paint	8	4	4	32000	SF	$0.84	$26,880					$26,880								$26,880								$53,760
6.8	Gymnasium	C3012 Concrete/Masonry, Interior Wall, Prep & Paint	8	4	4	7000	SF	$0.89	$6,230					$6,230								$6,230								$12,460
6.8	Common areas and classrooms	C3024 Vinyl Tile Flooring, Replace	15	6	9	4333	SF	$4.80	$20,801										$20,801											$20,801
6.8	Offices, classrooms	C3025 Carpet, Standard Commercial, Medium Traffic, Replace	10	6	4	200	SF	$7.26	$1,451					$1,451										$1,451						$2,902
7.1	Kitchen	D3041 Fan Coil Unit, 1 to 1.5 Ton, Replace	15	7	8	1	EA	$1,878.84	$1,879									$1,879												$1,879
7.1	Roof	D3042 Exhaust Fan, Centrifugal, 2,001 to 3,500 CFM, Replace	15	3	12	1	EA	$3,072.78	$3,073													$3,073								$3,073
7.1	Electrical Room	D3042 Exhaust Fan, Centrifugal, 251 to 800 CFM, Replace	15	7	8	2	EA	$2,021.87	$4,044									$4,044												$4,044
7.1	Boiler Room	D3044 Circulation Pump, Heating Water, 3 HP, Replace	20	3	17	5	EA	$4,652.29	$23,261																		$23,261			$23,261
7.1	Boiler Room	D3045 Circulation Pump, Chiller & Condenser Water, 5 HP, Replace	20	2	18	3	EA	$5,518.88	$16,557																			$16,557		$16,557
7.1	Boiler Room	D3045 Circulation Pump, Chiller & Condenser Water, 7.5 HP, Replace	20	3	17	2	EA	$6,037.49	$12,075																		$12,075			$12,075
7.1	Gymnasium, Boiler Room	D3051 Unit Heater, Hydronic, 37 to 85 MBH, Replace	20	3	17	2	EA	$1,900.28	$3,801																		$3,801			$3,801
7.1	Roof	D3052 Air Handling Unit, Exterior, 16 to 20 Ton, Replace	15	3	12	1	EA	$42,000.00	$42,000													$42,000								$42,000
7.1	Office, Custodian	D3052 Heat Pump, 2.5 to 3 Ton, Replace	15	3	12	2	EA	$5,770.93	$11,542													$11,542								$11,542
7.1	Roof	D3052 Air Handling Unit, Exterior, 16 to 20 Ton, Replace	15	3	12	1	EA	$34,000.00	$34,000													$34,000								$34,000
7.1	Office	D3052 Heat Pump, 2.5 to 3 Ton, Replace	15	3	12	1	EA	$5,770.93	$5,771													$5,771								$5,771
7.1	Roof	D3052 Air Handling Unit, Exterior, 16 to 20 Ton, Replace	15	3	12	1	EA	$42,000.00	$42,000													$42,000								$42,000
7.1	Classrooms	D3052 Heat Pump, 1.5 to 2 Ton, Replace	15	2	13	18	EA	$4,124.00	$74,232														$74,232							$74,232
7.1	Roof	D3052 Air Handling Unit, Exterior, 16 to 20 Ton, Replace	15	3	12	1	EA	$42,000.00	$42,000													$42,000								$42,000
7.1	Roof	D3052 Air Handling Unit, Exterior, 16 to 20 Ton, Replace	15	3	12	1	EA	$42,000.00	$42,000													$42,000								$42,000
7.1	Entrances	D3052 Heat Pump, 0.75 to 1 Ton, Replace	15	3	12	3	EA	$4,175.73	$12,527													$12,527								$12,527
7.1	Kitchen	E1093 Kitchen Exhaust Hood, Commercial, Replace	15	3	12	1	EA	$7,571.72	$7,572													$7,572								$7,572
7.2	Boiler room	D2023 Water Heater, Gas, Tankless, 6.5 to 9.5 GPM, Replace	15	3	12	1	EA	$2,259.00	$2,259													$2,259								$2,259
7.2	Classrooms	D2023 Water Heater, Electric, Residential, 5 to 15 GAL, Replace	15	14	1	19	EA	$5,000.00	$95,000		$95,000																			$95,000
7.2	Pit	D2043 Sump Pump, 3 HP, Replace	15	3	12	2	EA	$2,062.81	$4,126													$4,126								$4,126
7.6	Electrical room	D5037 Fire Alarm Control Panel, Addressable, Replace	15	6	9	1	EA	$20,297.59	$20,298										$20,298											$20,298
8.2	Kitchen	E1093 Freezer/Cooler, Commercial, Walk-In, Replace	15	3	12	2	EA	$22,317.14	$44,634													$44,634								$44,634

Replacement Reserves Report
Charles P. Smith Elementary

03/23/2016

Report Section	Location Description	Cost Description	Lifespan (EUL)	EAge	RUL	Quantity	Unit	Unit Cost	Subtotal	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Deficiency Repair Estimate
8.2	Common areas and classrooms	E1093 Food Service Equipment, Commercial Kitchen (Allowance), Replace	5	4	1	1	EA	$12,000.00	$12,000		$12,000					$12,000					$12,000					$12,000				$48,000
Totals, Unescalated										$420	$107,000	$0	$88,571	$34,561	$0	$12,000	$25,024	$5,932	$41,099	$0	$12,000	$326,613	$74,232	$52,664	$0	$12,000	$42,041	$16,566	$0	$850,723
Location Factor (1.00)										$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0
Totals, Escalated (3.0% inflation, compounded annually)										$420	$110,210	$0	$96,784	$38,899	$0	$14,329	$30,776	$7,514	$53,624	$0	$16,611	$465,673	$109,012	$79,659	$0	$19,256	$69,487	$28,202	$0	$1,140,457

Replacement Reserves Report
John J. Flynn Elementary

03/23/2016

Report Section	Location Description	Cost Description	Lifespan (EUL)	EAge	RUL	Quantity	Unit	Unit Cost	Subtotal	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Deficiency Repair Estimate
3.2	Parking lot	Z1060 ADA, Parking, Designated Stall with Pavement Markings & Signage (Van), Install	0	0	0	1	EA	$420.00	$420	$420																				$420
3.2	North side parking area	Z1060 ADA, Parking, Designated Stall with Pavement Markings & Signage, Install	0	0	0	1	EA	$375.00	$375	$375																				$375
5.2	Parking lots and service drives	G2022 Asphalt Pavement, Parking Lot, Seal & Stripe	10	3	7	486000	SF	$0.38	$184,680								$184,680										$184,680			$369,360
5.5	Rear of property	G2047 Play Structure, Medium, Replace	20	13	7	2	EA	$31,625.00	$63,250								$63,250													$63,250
6.3	Gymnasium/Auditorium	B1012 Concrete Decking, Replace	50	47	3	5000	SF	$43.86	$219,300				$219,300																	$219,300
6.3	Roof - Kitchen Area	B3011 Single-Ply TPO/PVC Membrane Roof, Replace	20	20	0	2400	SF	$31.86	$76,464	$76,464																				$76,464
6.3	Roof - Halls & Classrooms	B3011 Single-Ply EPDM Membrane Roof, Replace	20	3	17	44000	SF	$10.52	$462,880																		$462,880			$462,880
6.3	Site	G3011 Pipe & Fittings, Ductile Iron, 6", Replace/Install	40	40	0	300	LF	$126.38	$37,914	$37,914																				$37,914
6.8	Common areas and classrooms	C3012 Concrete/Masonry, Interior Wall, Prep & Paint	8	4	4	32000	SF	$0.89	$28,480					$28,480								$28,480								$56,960
6.8	Hallways, classrooms	C3012 Gypsum Board/Plaster/Metal, Interior Wall, Prep & Paint	8	4	4	14000	SF	$0.84	$11,760					$11,760								$11,760								$23,520
6.8	Common areas and classrooms	C3024 Vinyl Tile Flooring, Replace	15	4	11	5854	SF	$4.80	$28,103												$28,103									$28,103
7.1	Boiler Room	D3021 Boiler, Gas, 2,001 to 2,500 MBH, Replace	25	8	17	2	EA	$54,195.22	$108,390																		$108,390			$108,390
7.1	Rooftop	D3032 Condensing Unit/Heat Pump, Split System, 16 to 20 Ton, Replace	15	3	12	2	EA	$24,577.00	$49,154													$49,154								$49,154
7.1	Rooftop	D3032 Condensing Unit/Heat Pump, Split System, 16 to 20 Ton, Replace	15	3	12	1	EA	$26,950.00	$26,950													$26,950								$26,950
7.1	Building Interior General	D3032 Condensing Unit/Heat Pump, Split System, 6 to 7.5 Ton, Replace	15	5	10	2	EA	$11,591.12	$23,182											$23,182										$23,182
7.1	Roof	D3032 Condensing Unit/Heat Pump, Split System, 13 to 15 Ton, Replace	15	7	8	1	EA	$23,279.00	$23,279									$23,279												$23,279
7.1	Attic	D3041 Make-Up Air Unit, 2,000 to 6,000 CFM, Replace	20	4	16	1	EA	$32,062.66	$32,063																	$32,063				$32,063
7.1	Roof	D3042 Exhaust Fan, Centrifugal, 2,001 to 3,500 CFM, Replace	15	5	10	3	EA	$3,072.78	$9,218											$9,218										$9,218
7.1	Boiler Room	D3044 Circulation Pump, Heating Water, 3 HP, Replace	20	8	12	2	EA	$4,652.29	$9,305													$9,305								$9,305
7.1	Boiler Room	D3045 Circulation Pump, Chiller & Condenser Water, 3 HP, Replace	20	4	16	2	EA	$4,652.29	$9,305																	$9,305				$9,305
7.1	Boiler Room	D3045 Circulation Pump, Chiller & Condenser Water, 12.5 to 15 HP, Replace	20	4	16	3	EA	$6,860.74	$20,582																	$20,582				$20,582
7.1	Mechanical Spaces	D3051 Unit Heater, Hydronic, 13 to 36 MBH, Replace	20	5	15	2	EA	$1,516.80	$3,034																$3,034					$3,034
7.1	Corridors and Vestibules	D3051 Unit Heater, Hydronic, 8 to 12 MBH, Replace	20	18	2	10	EA	$880.85	$8,809			$8,809																		$8,809
7.1	Roof	D3052 Air Handling Unit, Exterior, 16 to 20 Ton, Replace	15	5	10	1	EA	$37,802.95	$37,803											$37,803										$37,803
7.1	Roof	D3052 Air Handling Unit, Exterior, 16 to 20 Ton, Replace	15	5	10	1	EA	$37,802.95	$37,803											$37,803										$37,803
7.1	Roof	D3052 Air Handling Unit, Exterior, 16 to 20 Ton, Replace	15	5	10	1	EA	$37,802.95	$37,803											$37,803										$37,803
7.1	Classrooms	D3052 Heat Pump, 1.5 to 2 Ton, Replace	15	3	12	38	EA	$4,124.00	$156,712													$156,712								$156,712
7.2	Boiler room	D2023 Water Heater, Gas, Tankless, 6.5 to 9.5 GPM, Replace	15	3	12	1	EA	$2,259.00	$2,259													$2,259								$2,259
7.2	Kitchen	D2023 Water Heater, Gas, Commercial, 60 to 120 GAL, Replace	15	1	14	1	EA	$10,698.82	$10,699															$10,699						$10,699
7.2	Site	G3011 Pipe & Fittings, PVC, 8", Replace/Install	40	39	1	200	LF	$98.45	$19,690		$19,690																			$19,690
7.6	Electrical room	D5037 Fire Alarm Control Panel, Addressable, Replace	15	2	13	1	EA	$20,297.59	$20,298														$20,298							$20,298
7.6	Main building	D5038 Security Control Panel, Replace	15	15	0	1	EA	$6,594.69	$6,595	$6,595															$6,595					$13,189
8.2	Commercial kitchen	E1093 Food Service Equipment, Commercial Kitchen (Allowance), Replace	5	3	2	1	EA	$32,000.00	$32,000			$32,000					$32,000					$32,000					$32,000			$128,000

Replacement Reserves Report
John J. Flynn Elementary

03/23/2016

Report Section	Location Description	Cost Description	Lifespan (EUL)	EAge	RUL	Quantity	Unit	Unit Cost	Subtotal	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Deficiency Repair Estimate
8.2	Kitchen	E1093 Freezer/Cooler, Commercial, Walk-In, Replace	15	5	10	2	EA	$22,317.14	$44,634											$44,634										$44,634
8.2	Kitchen	E1093 Kitchen Exhaust Hood, Commercial, Replace	15	5	10	1	EA	$7,571.72	$7,572											$7,572										$7,572
Totals, Unescalated										$121,768	$19,690	$40,809	$219,300	$40,240	$0	$0	$279,930	$23,279	$0	$198,015	$28,103	$316,620	$20,298	$10,699	$9,628	$61,949	$787,950	$0	$0	$2,178,278
Location Factor (1.00)										$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0
Totals, Escalated (3.0% inflation, compounded annually)										$121,768	$20,281	$43,294	$239,635	$45,290	$0	$0	$344,279	$29,489	$0	$266,116	$38,901	$451,424	$29,808	$16,183	$15,001	$99,411	$1,302,362	$0	$0	$3,063,240

Replacement Reserves Report
IRA

3/23/2016

Report Section	Location Description	Cost Description	Lifespan (EUL)	EAge	RUL	Quantity	Unit	Unit Cost	Subtotal	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Deficiency Repair Estimate
3.2	Parking lot	Z1060 ADA, Parking, Access Aisle Striping, Install	0	0	0	80	LF	$7.25	$580	$580																				$580
3.2	Public restroom	Z1080 ADA, Restroom, Grab Bars & Blocking, Install	0	0	0	1	EA	$1,250.00	$1,250	$1,250																				$1,250
3.2	Public restroom	Z1080 ADA, Restroom, Lavatory Pipe Wraps, Install	0	0	0	1	EA	$120.00	$120	$120																				$120
5.2	Parking lot and service drives	G2022 Asphalt Pavement, Parking Lot, Seal & Stripe	10	4	6	252000	SF	$0.38	$95,760							$95,760									$95,760					$191,520
5.5	Rear of property	G2047 Play Structure, Small, Replace	20	11	9	1	EA	$15,000.00	$15,000										$15,000											$15,000
6.3	Roof	B3011 Single-Ply TPO/PVC Membrane Roof, Replace	20	11	9	16800	SF	$15.93	$267,624										$267,624											$267,624
6.4	Window seals	B2011 Caulk Sealant, Exterior Wall Joints to 1/2", Replace	10	10	0	2400	LF	$15.35	$36,840	$36,840										$36,840										$73,680
6.4	Exterior trim	B2011 Exterior Wall Paint, 1-2 Stories, Prep & Paint	10	7	3	1500	SF	$2.42	$3,630				$3,630										$3,630							$7,260
6.8	Classrooms, conference rooms, restrooms	C3024 Vinyl Tile Flooring, Replace	15	9	6	800	SF	$4.80	$3,840							$3,840														$3,840
6.8	Offices and hallways	C3025 Carpet, Standard Commercial, Medium Traffic, Replace	10	7	3	800	SF	$7.26	$5,805				$5,805										$5,805							$11,610
6.8	Entire building	C3032 Acoustical Tile Ceiling, Replace	20	7	13	150	SF	$3.11	$467														$467							$467
7.1	Equipment mezzanine	D2023 Domestic Boiler, Gas, 501 to 800 MBH, Replace	22	22	0	2	EA	$17,800.00	$35,600	$35,600																				$35,600
7.1	Roof	D3031 Chiller, Air-Cooled, 41 to 50 Ton, Replace	25	25	0	1	EA	$78,186.30	$78,186	$78,186																				$78,186
7.1	Penthouse	D3041 Air Handler, Interior, 10,001 to 15,000 CFM, Replace	30	30	0	1	EA	$41,979.17	$41,979	$41,979																				$41,979
7.1	Building	D3041 Variable Air Volume (VAV) Unit, 100 to 400 CFM, Replace	15	15	0	45	EA	$4,141.92	$186,386	$186,386															$186,386					$372,773
7.1	Building	D3049 HVAC System, School, Upgrade	20	20	0	16860	SF	$43.22	$728,689	$728,689																				$728,689
7.2	Mechanical closet	D2023 Water Heater, Electric, Commercial, 121 to 300 GAL, Replace	15	8	7	1	EA	$10,415.00	$10,415								$10,415													$10,415
7.4	Room 17	D5019 Electrical System, School, Upgrade	40	37	3	16860	SF	$49.78	$839,291				$839,291																	$839,291
7.4	Building	D5022 LED Lighting Fixture, Basic, 20 W, Replace	20	14	6	843	EA	$180.19	$151,900							$151,900														$151,900
7.6	Building	D4019 Sprinkler System, Full Retrofit, School (per SF), Renovate	50	42	8	16860	SF	$6.25	$105,375									$105,375												$105,375
7.6	Room 17	D5037 Fire Alarm Control Panel, Addressable, Replace	15	13	2	1	EA	$20,297.59	$20,298			$20,298															$20,298			$40,595
Totals, Unescalated										$1,109,631	$0	$20,298	$848,726	$0	$0	$251,501	$10,415	$105,375	$282,624	$36,840	$0	$0	$9,902	$0	$186,386	$95,760	$20,298	$0	$0	$2,977,755
Location Factor (1.00)										$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0
Totals, Escalated (3.0% inflation, compounded annually)										$1,109,631	$0	$21,534	$927,426	$0	$0	$300,305	$12,809	$133,486	$368,760	$49,510	$0	$0	$14,541	$0	$290,384	$153,667	$33,549	$0	$0	$3,415,601

Replacement Reserves Report
Property Services Building

3/23/2016

Report Section	Location Description	Cost Description	Lifespan (EUL)	EAge	RUL	Quantity	Unit	Unit Cost	Subtotal	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	Deficiency Repair Estimate
5.2	Parking area	G2012 Asphalt Pavement, Roadways, Mill & Overlay	25	25	0	34000	SF	$3.28	$111,520	$111,520																				$111,520
5.2	Driveway	G2022 Asphalt Pavement, Parking Lot, Mill & Overlay	25	25	0	6300	SF	$3.28	$20,667	$20,667																				$20,667
5.2	Asphalt pavement	G2022 Asphalt Pavement, Parking Lot, Seal & Stripe	10	0	10	40000	SF	$0.38	$15,200											$15,200										$15,200
5.3	Building perimeter	G2052 Landscaping, Flat Areas, Re-slope, Regrade/Establish	25	25	0	6000	SF	$3.24	$19,440	$19,440																				$19,440
5.5	Entrance	D5038 Vehicle Control Gate Operator, Replace	15	15	0	1	EA	$2,065.00	$2,065	$2,065															$2,065					$4,130
6.3	Roof	B3011 Metal Roof, Replace	40	36	4	13000	SF	$12.45	$161,850					$161,850																$161,850
6.4	Exterior walls	B2011 Exterior Wall Paint, 1-2 Stories, Prep & Paint	10	9	1	4000	SF	$2.42	$9,680		$9,680										$9,680									$19,360
6.8	Interior drywall	C3012 Gypsum Board/Plaster/Metal, Interior Wall, Prep & Paint	8	6	2	2500	SF	$0.84	$2,100			$2,100								$2,100								$2,100		$6,300
6.8	Offices, restrooms	C3024 Vinyl Tile Flooring, Replace	15	15	0	100	SF	$4.80	$480	$480															$480					$960
7.1	Mezzanine	D3032 Condensing Unit/Heat Pump, Split System, 4 Ton, Replace	15	11	4	1	EA	$5,250.00	$5,250					$5,250															$5,250	$10,500
7.1	Exterior Wall	D3042 Exhaust Fan, Propeller, 2,000 CFM, Replace	15	12	3	1	EA	$1,823.76	$1,824				$1,824																$1,824		$3,648
7.1	Mezzanine	D3051 Furnace, Gas, 101 to 150 MBH, Replace	20	9	11	1	EA	$1,658.87	$1,659												$1,659									$1,659
7.1	Auto Shop and Back Rooms	D3051 Unit Heater, Natural Gas, 56 to 75 MBH, Replace	20	6	14	3	EA	$4,467.67	$13,403															$13,403						$13,403
7.2	Mechanical closet	D2023 Water Heater, Electric, Residential, 30 to 52 GAL, Replace	15	8	7	1	EA	$1,236.00	$1,236								$1,236													$1,236
7.4	Mezzanine	D5012 Distribution Panel, 208 Y, 120 V, 400 Amp, Replace	30	12	18	1	EA	$9,487.85	$9,488																			$9,488		$9,488
Totals, Unescalated										$154,172	$9,680	$2,100	$1,824	$167,100	$0	$0	$1,236	$0	$0	$17,300	$11,339	$0	$0	$13,403	$2,545	$0	$0	$13,412	$5,250	$399,360
Location Factor (1.00)										$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0	$0
Totals, Escalated (3.0% inflation, compounded annually)										$154,172	$9,970	$2,228	$1,993	$188,073	$0	$0	$1,520	$0	$0	$23,250	$15,696	$0	$0	$20,273	$3,965	$0	$0	$22,832	$9,206	$453,177