



FACILITY CONDITION ASSESSMENT

Nelson Field Bus Terminal | February 2022



Executive Summary

Nelson Field Bus Terminal is located at 7105 Berkman Dr in Austin, Texas. The oldest building is 25 years old (at time of 2020 assessment). It comprises 14,890 gross square feet.

The findings contained within this report are the result of an assessment of building systems and the conditions found on the site at the time of the visit. The assessment was performed by building professionals experienced in disciplines including architecture, mechanical, plumbing and electrical. The total current deficiencies for this site, in 2020 construction cost dollars, are estimated at \$630,660. A ten-year need was developed to provide an understanding of the current need as well as the projected needs in the near future. For Nelson Field Bus Terminal the ten-year need is \$2,306,026.

For master planning purposes, the total current deficiencies and the first five years of projected life cycle needs were combined to calculate a Facility Condition Assessment (FCA) score. A 5-year FCA was calculated by dividing the 5-year need by the total replacement cost. Costs associated with new construction are not included in the FCA calculation. The Nelson Field Bus Terminal facility has a 5-year FCA score of 81.84%.

Summary of Findings

The table below summarizes the condition findings at Nelson Field Bus Terminal

Table 1: Facility Condition by Building

Number	Building Name	Current Deficiencies	5-Year Life Cycle Cost	Yrs 6-10 Life Cycle Cost	Total 5 Yr Need (Yr 1-5 + Current Defs)	Total 10 Yr Need (Yr 1-10 + Current Defs)	Replacement Cost	5-Year FCA
Exterior Site								
	Exterior Site	\$253,561	\$25,073	\$1,116,135	\$278,634	\$1,394,769	\$0	
Permanent Building(s)								
959A	Main building includes Administration Offices, & Shop	\$377,099	\$398,819	\$135,339	\$775,918	\$911,257	\$5,808,440	86.64%
Sub Total for Permanent Building(s):		\$377,099	\$398,819	\$135,339	\$775,918	\$911,257	\$5,808,440	
Total for Site:		\$630,660	\$423,892	\$1,251,474	\$1,054,552	\$2,306,026	\$5,808,440	81.84%

Approach and Methodology

A facility condition assessment evaluates each building's overall condition. Two components of the facility condition assessment are combined to total the cost for facility need. The two components of the facility condition assessment are current deficiencies and life cycle forecast.

Current Deficiencies: Deficiencies are items in need of repair or replacement as a result of being broken, obsolete, or beyond useful life. The existing deficiencies that currently require correction are identified and assigned a priority. An example of a current deficiency might include a broken lighting fixture or an inoperable roof top air conditioning unit.

Life Cycle Forecast: Life cycle analysis evaluates the ages of a building's systems to forecast system replacement as they reach the end of serviceable life. An example of a life cycle system replacement is a roof with a 20-year life that has been in place for 15 years and may require replacement in five years.

All members of the survey team recorded existing conditions, identified problems and deficiencies, and documented corrective action and quantities. The team took digital photos at each site to better identify significant deficiencies.

Facility Deficiency Priority Levels

Deficiencies were ranked according to five priority levels, with Priority 1 items being the most critical to address:

Priority 1 – Mission Critical Concerns: Deficiencies or conditions that may directly affect the site's ability to remain open or deliver the educational curriculum. These deficiencies typically relate to building safety, code compliance, severely damaged or failing building components, and other items that require near-term correction. An example of a Priority 1 deficiency is a fire alarm system replacement.

Priority 2 - Indirect Impact to Educational Mission: Items that may progress to a Priority 1 item if not addressed in the near term. Examples of Priority 2 deficiencies include inadequate roofing that could cause deterioration of integral building systems, and conditions affecting building envelopes, such as roof and window replacements.

Priority 3 - Short-Term Conditions: Deficiencies that are necessary to the site's mission but may not require immediate attention. These items should be considered necessary improvements required to maximize facility efficiency and usefulness. Examples of Priority 3 items include site improvements and plumbing deficiencies.

Priority 4 - Long-Term Requirements: Items or systems that may be considered improvements to the instructional environment. The improvements may be aesthetic or provide greater functionality. Examples include cabinets, finishes, paving, removal of abandoned equipment, and educational accommodations associated with special programs.

Priority 5 - Enhancements: Deficiencies aesthetic in nature or considered enhancements. Typical deficiencies in this priority include repainting, replacing carpet, improved signage, or other improvements to the facility environment.

The following table summarizes this site's current deficiencies by building system and priority.

Table 2: System by Priority (Site & Permanent Buildings)

System	Priority					Total	% of Total
	1	2	3	4	5		
Site	\$0	\$0	\$112,307	\$94,300	\$46,953	\$253,561	40.21 %
Roofing	\$0	\$0	\$0	\$0	\$0	\$0	0.00 %
Structural	\$0	\$0	\$0	\$0	\$0	\$0	0.00 %
Exterior	\$0	\$0	\$0	\$0	\$0	\$0	0.00 %
Interior	\$0	\$0	\$0	\$98,628	\$0	\$98,628	15.64 %
Mechanical	\$0	\$0	\$0	\$0	\$0	\$0	0.00 %
Electrical	\$0	\$0	\$278,471	\$0	\$0	\$278,471	44.16 %
Plumbing	\$0	\$0	\$0	\$0	\$0	\$0	0.00 %
Fire and Life Safety	\$0	\$0	\$0	\$0	\$0	\$0	0.00 %
Conveyances	\$0	\$0	\$0	\$0	\$0	\$0	0.00 %
Specialties	\$0	\$0	\$0	\$0	\$0	\$0	0.00 %
Crawlspace	\$0	\$0	\$0	\$0	\$0	\$0	0.00 %
Total:	\$0	\$0	\$390,779	\$192,928	\$46,953	\$630,660	

The building systems at the site with the most need include:

Electrical	-	\$278,471
Site	-	\$253,561
Interior	-	\$98,628

The chart below represents the building systems and associated deficiency costs.

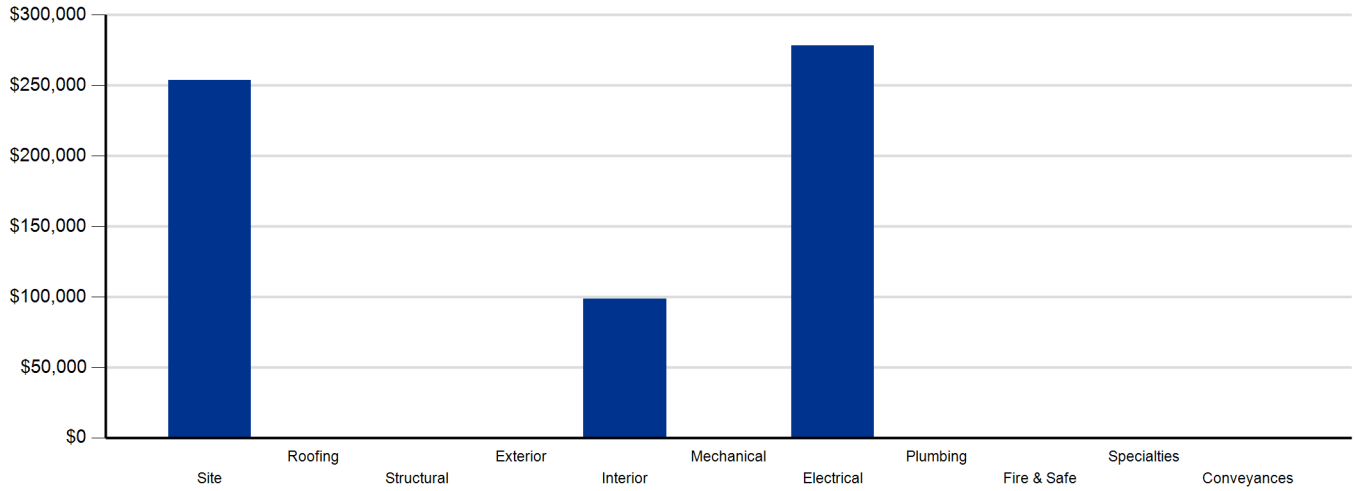


Figure 1: System Deficiencies

Life Cycle Capital Renewal Forecast

During the facility condition assessment, assessors inspected all major building systems. If an assessor identified a need for immediate replacement, a deficiency was created with the item's repair costs. The identified deficiency contributes to the facility's total current repair costs.

However, capital planning scenarios span multiple years, as opposed to being constrained to immediate repairs. Construction projects may begin several years after the initial facility condition assessment. Therefore, in addition to the current year repair costs, it is necessary to forecast the facility's future costs using a ten-year life cycle renewal forecast model.

Life cycle renewal is the projection of future building system costs based upon each individual system's expected serviceable life. Building systems and components age over time, eventually break down, reach the end of their useful lives, and may require replacement. While an item may be in good condition now, it might reach the end of its life before a planned construction project occurs.

The following tables show current deficiencies and the subsequent ten-year life cycle capital renewal projections. The projections outline costs for major building systems in which a component is expected to reach the end of its useful life and require capital funding for replacement.

Table 3a: Capital Renewal Forecast (Yrs 1-5)

System	Life Cycle Capital Renewal Projections					Total 1-5
	Year 1 2023	Year 2 2024	Year 3 2025	Year 4 2026	Year 5 2027	
Site	\$0	\$0	\$0	\$25,073	\$0	\$25,073
Roofing	\$0	\$0	\$0	\$0	\$0	\$0
Exterior	\$202,928	\$13,009	\$0	\$0	\$0	\$215,937
Interior	\$0	\$8,822	\$0	\$0	\$77,148	\$85,970
Mechanical	\$0	\$0	\$0	\$0	\$0	\$0
Electrical	\$0	\$0	\$0	\$17,847	\$46,746	\$64,593
Plumbing	\$0	\$0	\$0	\$0	\$0	\$0
Fire and Life Safety	\$0	\$0	\$0	\$0	\$41,141	\$41,141
Conveyances	\$0	\$0	\$0	\$0	\$0	\$0
Specialties	\$0	\$0	\$0	\$0	\$0	\$0
Crawlspace	\$0	\$0	\$0	\$0	\$0	\$0
Total	\$202,928	\$21,831	\$0	\$42,920	\$165,035	\$432,714

Table 3b: Capital Renewal Forecast (Yrs 6-10)

System	Life Cycle Capital Renewal Projections						Total 6-10	Total 1-10
	Total 1-5	Year 6 2028	Year 7 2029	Year 8 2030	Year 9 2031	Year 10 2032		
Site	\$25,073	\$1,116,135	\$0	\$0	\$0	\$0	\$1,116,135	\$1,141,208
Roofing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Exterior	\$215,937	\$0	\$0	\$0	\$0	\$0	\$0	\$215,937
Interior	\$85,970	\$4,710	\$0	\$31,969	\$0	\$0	\$36,679	\$122,649
Mechanical	\$0	\$0	\$0	\$57,215	\$0	\$0	\$57,215	\$57,215
Electrical	\$64,593	\$0	\$0	\$17,802	\$0	\$0	\$17,802	\$82,395
Plumbing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Fire and Life Safety	\$41,141	\$23,643	\$0	\$0	\$0	\$0	\$23,643	\$64,784
Conveyances	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Specialties	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Crawlspace	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Total	\$432,714	\$1,144,488	\$0	\$106,986	\$0	\$0	\$1,251,474	\$1,684,188

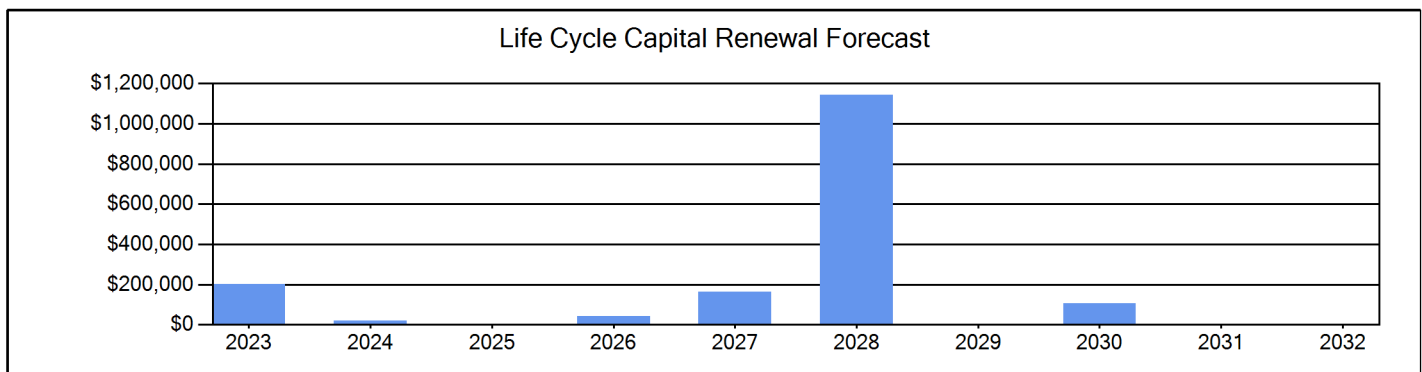


Figure 2: Ten Year Capital Renewal Forecast

Facility Condition Assessment Score

The Facility Condition Assessment Score (FCAS) is used throughout the facility condition assessment industry as a general indicator of a building’s health. The FCAS is used to benchmark the relative condition of a group of sites. The FCAS is derived by dividing the total repair cost, site-related repairs, by the total replacement cost and subtracting it from 100. A facility with a lower FCAS percentage has more need, or higher priority, than a facility with a lower FCAS. It should be noted that costs in the New Construction category are not included in the FCAS calculation.

$$FCAS = 100 - (\text{Total Repair Cost} / \text{Replacement Cost})$$

For master planning purposes, the total current deficiencies and the first five years of projected life cycle needs were combined. This provides an understanding of the current needs of a facility as well as the projected needs in the near future. A 5-year FCAS was calculated by dividing the 5-year need by the total replacement cost. Costs associated with new construction are not included in the FCAS calculation.

- Very Unsatisfactory (0-35)
- Unsatisfactory (36-50)
- Average (51-65)
- Satisfactory (66-80)
- Very Satisfactory (81-100)

Financial modeling has shown that over a 30-year period, it is more cost effective to replace than repair sites with a FCAS of 35 percent or greater. This is due to efficiency gains with facilities that are more modern and the value of the building at the end of the analysis period. It is important to note that the FCAS at which a facility should be considered for replacement is typically debated and adjusted based on property owners and facility managers approach to facility management. Of course, FCAS is not the only factor used to identify buildings that need renovation, replacement, or even closure. Historical significance, enrollment trends, community sentiment, and the availability of capital are additional factors that are analyzed when making campus facility decisions.

The replacement value represents the estimated cost of replacing the current building with another building of like size, based on today’s estimated cost of construction in the Austin area. The estimated replacement cost for this facility is \$5,808,440. For planning purposes, the total 5-year need at the Nelson Field Bus Terminal is \$1,054,552 (Life Cycle Years 1-5 plus the FCA deficiency cost). The Nelson Field Bus Terminal facility has a 5-year FCA of 81.84%.

5-Year Need vs. Replacement

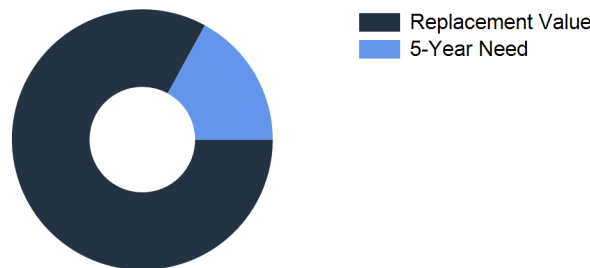


Figure 3: 5-Year FCA

Nelson Field Bus Terminal - Deficiency Summary

Site Level Deficiencies

Site

Deficiency	Category	Qty	UoM	Priority	Repair Cost	ID
Asphalt Driveway Replacement Note: potholes in drive aisles Location: east of main and west parking lot; entrance to south parking lot	Capital Renewal	17,465	SF	3	\$112,307	4449
Asphalt Paving Resurfacing Note: potholes and cracking present along wood fence Location: east of staff parking lot	Deferred Maintenance	9,150	SF	4	\$38,058	4448
Fencing Replacement (8' - 10' high Chain Link Fence) Note: east fence line on main and south lot are overgrown, resulting in damage; small portion on west fence of main lot is dented and damaged Location: east and west of main and south lots	Capital Renewal	710	LF	4	\$55,625	4446
Gate Replacement Note: gate is dented near hinges Location: east entrance of northwest parking lot	Deferred Maintenance	1	Ea.	4	\$617	4447
Paving Restriping Note: faded Location: staff parking surrounding building and south bus lot	Deferred Maintenance	47	CAR	5	\$1,563	4450
PROGRAM DEFICIENCIES	ADA Compliance	19,313	EACH	5	\$33,160	4439
PUBLIC DEFICIENCIES	ADA Compliance	6,921	EACH	5	\$11,883	4438
Wheel Stop Replacement Note: damaged Location: main and NW parking lot	Deferred Maintenance	2	Ea.	5	\$347	4451
Sub Total for System		8 items			\$253,561	
Sub Total for School and Site Level		8 items			\$253,561	

Building: 959A - Main building includes Administration Offices, & Shop

Interior

Deficiency	Category	Qty	UoM	Priority	Repair Cost	ID
Epoxy Flooring Repair Or Replacement	Deferred Maintenance	8,041	SF	4	\$96,921	4440
Exposed Ceiling Replacement Location: Maintenance Bay	Capital Renewal	1,973	SF	4	\$1,707	1920
Sub Total for System		2 items			\$98,628	

Electrical

Deficiency	Category	Qty	UoM	Priority	Repair Cost	ID
Exterior Mounted Building Lighting Replacement	Capital Renewal	6	Ea.	3	\$5,410	3665
Lighting Fixtures Replacement Note: End of Life Location: Building wide	Capital Renewal	14,890	SF	3	\$273,061	1977
Sub Total for System		2 items			\$278,471	
Sub Total for Building 959A - Main building includes Administration Offices, & Shop		4 items			\$377,099	
Total for Campus		12 items			\$630,660	

Nelson Field Bus Terminal - Life Cycle Summary Yrs 1-10

Site Level Life Cycle Items

Site

Uniformat Description	LC Type Description	Qty	UoM	Repair Cost	Remaining Life
Fences and Gates	Fencing - Wood	830	LF	\$25,073	4
Parking Lot Pavement	Asphalt	294	CAR	\$426,536	6
Roadway Pavement	Asphalt Driveways	107,240	SF	\$689,599	6
Sub Total for System		3	items	\$1,141,208	
Sub Total for Building -		3	items	\$1,141,208	

Building: 959A - Main building includes Administration Offices, & Shop

Exterior

Uniformat Description	LC Type Description	Qty	UoM	Repair Cost	Remaining Life
Exterior Operating Windows	Aluminum - Windows per SF	625	SF	\$62,329	1
Exterior Entrance Doors	Steel - Insulated and Painted	20	Door	\$74,140	1
Exterior Utility Doors	Overhead Door	8	Door	\$66,459	1
Exterior Operating Windows	Steel - Windows per SF	30	SF	\$4,336	2
Exterior Operating Windows	Steel - Windows per SF	60	SF	\$8,673	2
Sub Total for System		5	items	\$215,937	

Interior

Uniformat Description	LC Type Description	Qty	UoM	Repair Cost	Remaining Life
Acoustical Suspended Ceilings	Ceiling Exposed Metal Structure	10,200	SF	\$8,822	2
Wall Painting and Coating	Painting/Staining (Bldg SF)	8,934	SF	\$40,033	5
Interior Door Supplementary Components	Door Hardware	25	Door	\$37,115	5
Carpeting	Carpet	372	SF	\$4,710	6
Acoustical Suspended Ceilings	Ceilings - Acoustical Tiles	4,690	SF	\$15,837	8
Compartments and Cubicles	Toilet Partitions	8	Stall	\$16,132	8
Sub Total for System		6	items	\$122,649	

Mechanical

Uniformat Description	LC Type Description	Qty	UoM	Repair Cost	Remaining Life
Decentralized Heating Equipment	Unit Heater Gas (20 MBH)	20	Ea.	\$57,215	8
Sub Total for System		1	items	\$57,215	

Electrical

Uniformat Description	LC Type Description	Qty	UoM	Repair Cost	Remaining Life
Audio-Video Systems	PA Communications No Head Unit (Bldg SF)	14,890	SF	\$10,540	4
Distributed Systems	Public Address System Head End Unit	1	Ea.	\$7,307	4
Power Distribution	Panelboard - 120/208 100A	1	Ea.	\$2,782	5
Power Distribution	Panelboard - 120/208 100A	1	Ea.	\$2,782	5
Power Distribution	Panelboard - 120/208 225A	3	Ea.	\$16,499	5
Power Distribution	Panelboard - 120/208 400A	2	Ea.	\$24,683	5
Power Distribution	Distribution Panels (600 Amps)	1	Ea.	\$17,802	8
Sub Total for System		7	items	\$82,395	

Fire and Life Safety

Uniformat Description	LC Type Description	Qty	UoM	Repair Cost	Remaining Life
Security System Component	Security Alarm System	14,890	SF	\$34,273	5
Fire Detection and Alarm	Fire Alarm Panel	1	Ea.	\$6,868	5
Fire Detection and Alarm	Fire Alarm	14,890	SF	\$23,643	6
Sub Total for System		3	items	\$64,783	
Sub Total for Building 959A - Main building includes Administration Offices, & Shop		22	items	\$542,979	
Total for: Nelson Field Bus Terminal		25	items	\$1,684,188	

Supporting Photos

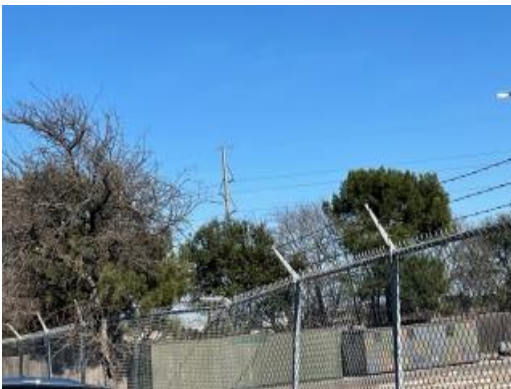
General Site Photos



Terminal exterior



Parking spaces are worn



Metal fence is bent



Front of site