

Building Information - Willoughby-Eastlake City SD (45104) - Willowick Middle School

Program Type	Expedited Local Partnership Program (ELPP)
Setting	Suburban
Assessment Name	Willowick M_2010_TCI
Assessment Date	2010-03-16
Cost Set:	2010
Building Name	Willowick Middle School
Building IRN	41525
Building Address	31500 Royalview Dr
Building City	Willowick
Building Zipcode	44095
Building Phone	440/943-2950
Acreage	17.70
Current Grades	6-8
Teaching Stations	41
Number of Floors	1
Student Capacity	975
Current Enrollment	637
Enrollment Date	2010-04-01
Enrollment Date is the date in which the current enrollment was taken.	
Number of Classrooms	39
Historical Register	NO
Building's Principal	Ms. Lori Rodman
Building Type	Middle

[Next Page](#)

North elevation photo:



East elevation photo:



South elevation photo:



West elevation photo:



GENERAL DESCRIPTION

90,811 Total Existing Square Footage
1958,1960,1962,1975 Building Dates
6-8 Grades
637 Current Enrollment
41 Teaching Stations
17.70 Site Acreage

Willowick Middle School, which is not on the National Register of Historic Buildings, and originally constructed in 1958, is a 1 story, 90,811 square foot brick school building located in a suburban residential setting. The existing facility features a conventionally partitioned design, and does not utilize modular buildings. The structure of the overall facility contains steel frame with brick veneer type exterior wall construction, with masonry block wall construction in the interior. The floor system consists of slab on grade. The roof structure is metal deck and bar joist. The roofing system of the overall facility is overbuild standing seam metal, installed in 1989. The ventilation system of the building is inadequate to meet the needs of the users. The majority of Classrooms are undersized in terms of the current standards established by the State of Ohio. Physical Education and Student Dining spaces consist of one Gymnasium and separate Student Dining. The electrical system for the facility is inadequate. The facility is not equipped with a compliant security system. The building has a compliant automatic fire alarm. The facility is not equipped with an automated fire suppression system. The building is reported to contain asbestos and other hazardous materials. The overall building is compliant with ADA accessibility requirements. The school is located on 17.7 acres of a 27.7 acre campus site shared with Royalview Elementary School adjacent to residential properties. The property and play areas athletic facilities are partially fenced for security. Access onto the site is unrestricted. Site circulation is fair. There is dedicated space for school buses to load and unload on the site. Parking for staff, visitors and community events is adequate.

The exterior wall system of the 1960 Addition has evidence of detaching from the perpendicular masonry walls. From reviewing district provided construction documents, it is presumed that the 8" block masonry was not toothed in with the 4" block masonry, resulting in a separation due to settling of the structure.

[Previous Page](#)

[Next Page](#)

Building Construction Information - Willoughby-Eastlake City SD (45104) - Willowick Middle School (41525)

Name	Year	Handicapped Access	Floors	Square Feet
1958 Original	1958	no	1	53,910
1960 Addition	1960	no	1	20,494
1962 Addition	1962	no	1	13,547
1975 Addition	1975	no	1	2,860

[Previous Page](#)

[Next Page](#)

Building Component Information - Willoughby-Eastlake City SD (45104) - Willowick Middle School (41525)

Addition	Auditorium Fixed Seating	Corridors	Agricultural Education Lab	Primary Gymnasium	Media Center	Vocational Space	Student Dining	Kitchen	Natatorium	Indoor Tracks	Adult Education	Board Offices	Outside Agencies	Auxiliary Gymnasium
1958 Original (1958)		11604		5631	3025		1306							
1960 Addition (1960)		3789												
1962 Addition (1962)		1150					2514	1135						
1975 Addition (1975)														
Master Planning Considerations														

[Previous Page](#)

[Next Page](#)

Existing CT Programs for Assessment

[Next Page](#)

[Previous Page](#)

Program Type	Program Name	Related Space	Square Feet
No Records Found			

Legend:

Not in current design manual

In current design manual but missing from assessment

Building Summary - Willowick Middle School (41525)

District: Willoughby-Eastlake City SD				County: Lake		Area: Northeastern Ohio (8)	
Name: Willowick Middle School				Contact: Ms. Lori Rodman			
Address: 31500 Royalview Dr Willowick, OH 44095				Phone: 440/943-2950			
Bldg. IRN: 41525				Date Prepared: 2010-03-16		By: Karen L Walker	
				Date Revised: 2010-06-23		By: Karen L Walker	
Current Grades		6-8	Acreage:		17.70		
Proposed Grades		N/A	Teaching Stations:		41		
Current Enrollment		637	Classrooms:		39		
Projected Enrollment		N/A					
Addition		Date	HA	Number of Floors	Current Square Feet		
<u>1958 Original</u>		1958	no	1	53,910		
<u>1960 Addition</u>		1960	no	1	20,494		
<u>1962 Addition</u>		1962	no	1	13,547		
<u>1975 Addition</u>		1975	no	1	2,860		
Total					90,811		
*HA		= Handicapped Access					
*Rating		=1 Satisfactory					
		=2 Needs Repair					
		=3 Needs Replacement					
*Const P/S		= Present/Scheduled Construction					
FACILITY ASSESSMENT Cost Set: 2010				Rating	Dollar Assessment	C	
A. <u>Heating System</u>				3	\$2,951,357.50	Renovation Cost Factor	
B. <u>Roofing</u>				3	\$1,522,446.47	Cost to Renovate (Cost Factor applied)	
C. <u>Ventilation / Air Conditioning</u>				1	\$5,000.00	\$16,136,873.37	
D. <u>Electrical Systems</u>				3	\$1,572,846.52	The Replacement Cost Per SF and the Renovate/Replace ratio are only provided when this summary is requested from a Master Plan.	
E. <u>Plumbing and Fixtures</u>				3	\$963,077.00		
F. <u>Windows</u>				3	\$601,979.12		
G. <u>Structure: Foundation</u>				2	\$10,000.00		
H. <u>Structure: Walls and Chimneys</u>				2	\$102,743.00		
I. <u>Structure: Floors and Roofs</u>				1	\$0.00		
J. <u>General Finishes</u>				3	\$1,577,336.58		
K. <u>Interior Lighting</u>				3	\$454,055.00		
L. <u>Security Systems</u>				3	\$249,730.25		
M. <u>Emergency/Egress Lighting</u>				3	\$90,811.00		
N. <u>Fire Alarm</u>				3	\$136,216.50		
O. <u>Handicapped Access</u>				2	\$349,445.10		
P. <u>Site Condition</u>				2	\$391,943.70		
Q. <u>Sewage System</u>				3	\$67,500.00		
R. <u>Water Supply</u>				3	\$60,000.00		
S. <u>Exterior Doors</u>				3	\$56,500.00		
T. <u>Hazardous Material</u>				3	\$195,213.00		
U. <u>Life Safety</u>				3	\$295,135.75		
V. <u>Loose Furnishings</u>				2	\$181,622.00		
W. <u>Technology</u>				3	\$615,698.58		
- X. <u>Construction Contingency / Non-Construction Cost</u>				-	\$3,041,732.87		
Total					\$15,492,389.94		

[Previous Page](#)

1958 Original (1958) Summary

District: Willoughby-Eastlake City SD				County: Lake		Area: Northeastern Ohio (8)	
Name: Willowick Middle School				Contact: Ms. Lori Rodman			
Address: 31500 Royalview Dr Willowick, OH 44095				Phone: 440/943-2950			
Bldg. IRN: 41525				Date Prepared: 2010-03-16		By: Karen L Walker	
				Date Revised: 2010-06-23		By: Karen L Walker	
Current Grades		6-8	Acreage:		17.70		
Proposed Grades		N/A	Teaching Stations:		41		
Current Enrollment		637	Classrooms:		39		
Projected Enrollment		N/A					
Addition		Date	HA	Number of Floors	Current Square Feet		
1958 Original		1958	no	1	53,910		
1960 Addition		1960	no	1	20,494		
1962 Addition		1962	no	1	13,547		
1975 Addition		1975	no	1	2,860		
Total					90,811		
		*HA	= Handicapped Access				
		*Rating	=1 Satisfactory				
			=2 Needs Repair				
			=3 Needs Replacement				
		*Const P/S	= Present/Scheduled Construction				
FACILITY ASSESSMENT				Rating	Dollar	Assessment C	
Cost Set: 2010							
A. Heating System				3	\$1,752,075.00	-	
B. Roofing				3	\$889,431.96	-	
C. Ventilation / Air Conditioning				1	\$5,000.00	-	
D. Electrical Systems				3	\$933,721.20	-	
E. Plumbing and Fixtures				3	\$568,770.00	-	
F. Windows				3	\$343,472.64	-	
G. Structure: Foundation				2	\$0.00	-	
H. Structure: Walls and Chimneys				2	\$48,768.00	-	
I. Structure: Floors and Roofs				1	\$0.00	-	
J. General Finishes				3	\$810,289.80	-	
K. Interior Lighting				3	\$269,550.00	-	
L. Security Systems				3	\$148,252.50	-	
M. Emergency/Egress Lighting				3	\$53,910.00	-	
N. Fire Alarm				3	\$80,865.00	-	
O. Handicapped Access				2	\$196,786.00	-	
P. Site Condition				2	\$336,592.20	-	
Q. Sewage System				3	\$22,500.00	-	
R. Water Supply				3	\$20,000.00	-	
S. Exterior Doors				3	\$26,500.00	-	
T. Hazardous Material				3	\$111,627.00	-	
U. Life Safety				3	\$175,207.50	-	
V. Loose Furnishings				2	\$107,820.00	-	
W. Technology				3	\$365,509.80	-	
- X. Construction Contingency / Non-Construction Cost				-	\$1,775,264.05	-	
Total					\$9,041,912.65		
CEFPI Appraisal Summary							
Section		Points Possible		Points Earned		Percentage Rating Category	
Cover Sheet							
1.0 The School Site		100	76	76%	Satisfactory		
2.0 Structural and Mechanical Features		200	116	58%	Borderline		
3.0 Plant Maintainability		100	60	60%	Borderline		
4.0 Building Safety and Security		200	162	81%	Satisfactory		
5.0 Educational Adequacy		200	125	63%	Borderline		
6.0 Environment for Education		200	136	68%	Borderline		
LEED Observations							
Commentary							
Total		1000	675	68%	Borderline		
Enhanced Environmental Hazards Assessment Cost Estimates							
C=Under Contract							
Renovation Cost Factor				104.16%			
Cost to Renovate (Cost Factor applied)				\$9,418,056.22			
<i>The Replacement Cost Per SF and the Renovate/Replace ratio are only provided when this summary is requested from a Master Plan.</i>							

1960 Addition (1960) Summary

District: Willoughby-Eastlake City SD				County: Lake		Area: Northeastern Ohio (8)	
Name: Willowick Middle School				Contact: Ms. Lori Rodman			
Address: 31500 Royalview Dr Willowick, OH 44095				Phone: 440/943-2950			
Bldg. IRN: 41525				Date Prepared: 2010-03-16		By: Karen L Walker	
				Date Revised: 2010-06-23		By: Karen L Walker	
Current Grades		6-8	Acreage:		17.70		
Proposed Grades		N/A	Teaching Stations:		41		
Current Enrollment		637	Classrooms:		39		
Projected Enrollment		N/A					
Addition		Date	HA	Number of Floors	Current Square Feet		
<u>1958 Original</u>		1958	no	1	53,910		
1960 Addition		1960	no	1	20,494		
<u>1962 Addition</u>		1962	no	1	13,547		
<u>1975 Addition</u>		1975	no	1	2,860		
Total					90,811		
*HA		= Handicapped Access					
*Rating		=1 Satisfactory					
		=2 Needs Repair					
		=3 Needs Replacement					
*Const P/S		= Present/Scheduled Construction					
FACILITY ASSESSMENT				Dollar			
Cost Set: 2010				Rating		Assessment C	
A. <u>Heating System</u>		3		\$666,055.00		-	
B. <u>Roofing</u>		3		\$351,647.78		-	
C. <u>Ventilation / Air Conditioning</u>		1		\$0.00		-	
D. <u>Electrical Systems</u>		3		\$354,956.08		-	
E. <u>Plumbing and Fixtures</u>		3		\$250,358.00		-	
F. <u>Windows</u>		3		\$172,793.50		-	
G. Structure: Foundation		2		\$0.00		-	
H. <u>Structure: Walls and Chimneys</u>		2		\$17,981.00		-	
I. <u>Structure: Floors and Roofs</u>		1		\$0.00		-	
J. <u>General Finishes</u>		3		\$307,901.32		-	
K. <u>Interior Lighting</u>		3		\$102,470.00		-	
L. <u>Security Systems</u>		3		\$56,358.50		-	
M. <u>Emergency/Egress Lighting</u>		3		\$20,494.00		-	
N. <u>Fire Alarm</u>		3		\$30,741.00		-	
O. <u>Handicapped Access</u>		2		\$97,749.40		-	
P. <u>Site Condition</u>		2		\$30,741.00		-	
Q. <u>Sewage System</u>		3		\$22,500.00		-	
R. <u>Water Supply</u>		3		\$20,000.00		-	
S. <u>Exterior Doors</u>		3		\$8,000.00		-	
T. <u>Hazardous Material</u>		3		\$47,100.00		-	
U. <u>Life Safety</u>		3		\$66,605.50		-	
V. <u>Loose Furnishings</u>		2		\$40,988.00		-	
W. <u>Technology</u>		3		\$138,949.32		-	
- X. <u>Construction Contingency / Non-Construction Cost</u>		-		\$685,120.74		-	
Total						\$3,489,510.14	
CEFPI Appraisal Summary							
Section		Points Possible		Points Earned		Percentage Rating Category	
<u>Cover Sheet</u>							
1.0 <u>The School Site</u>		100		76		76% Satisfactory	
2.0 <u>Structural and Mechanical Features</u>		200		116		58% Borderline	
3.0 <u>Plant Maintainability</u>		100		60		60% Borderline	
4.0 <u>Building Safety and Security</u>		200		162		81% Satisfactory	
5.0 <u>Educational Adequacy</u>		200		125		63% Borderline	
6.0 <u>Environment for Education</u>		200		136		68% Borderline	
<u>LEED Observations</u>							
<u>Commentary</u>							
Total		1000		675		68% Borderline	
<u>Enhanced Environmental Hazards Assessment Cost Estimates</u>							
<u>C=Under Contract</u>							
Renovation Cost Factor						104.16%	
Cost to Renovate (Cost Factor applied)						\$3,634,673.77	
<i>The Replacement Cost Per SF and the Renovate/Replace ratio are only provided when this summary is requested from a Master Plan.</i>							

1962 Addition (1962) Summary

District: Willoughby-Eastlake City SD				County: Lake		Area: Northeastern Ohio (8)	
Name: Willowick Middle School				Contact: Ms. Lori Rodman			
Address: 31500 Royalview Dr Willowick, OH 44095				Phone: 440/943-2950			
Bldg. IRN: 41525				Date Prepared: 2010-03-16		By: Karen L Walker	
				Date Revised: 2010-06-23		By: Karen L Walker	
Current Grades		6-8	Acreage:		17.70		
Proposed Grades		N/A	Teaching Stations:		41		
Current Enrollment		637	Classrooms:		39		
Projected Enrollment		N/A					
Addition		Date	HA	Number of Floors	Current Square Feet		
1958 Original		1958	no	1	53,910		
1960 Addition		1960	no	1	20,494		
1962 Addition		1962	no	1	13,547		
1975 Addition		1975	no	1	2,860		
Total					90,811		
*HA		= Handicapped Access					
*Rating		=1 Satisfactory					
		=2 Needs Repair					
		=3 Needs Replacement					
*Const P/S		= Present/Scheduled Construction					
FACILITY ASSESSMENT				Dollar			
Cost Set: 2010				Rating		Assessment C	
A. Heating System		3		\$440,277.50		-	
B. Roofing		3		\$232,691.73		-	
C. Ventilation / Air Conditioning		1		\$0.00		-	
D. Electrical Systems		3		\$234,634.04		-	
E. Plumbing and Fixtures		3		\$123,929.00		-	
F. Windows		3		\$85,712.98		-	
G. Structure: Foundation		2		\$10,000.00		-	
H. Structure: Walls and Chimneys		2		\$31,575.50		-	
I. Structure: Floors and Roofs		1		\$0.00		-	
J. General Finishes		3		\$416,874.66		-	
K. Interior Lighting		3		\$67,735.00		-	
L. Security Systems		3		\$37,254.25		-	
M. Emergency/Egress Lighting		3		\$13,547.00		-	
N. Fire Alarm		3		\$20,320.50		-	
O. Handicapped Access		2		\$51,609.70		-	
P. Site Condition		2		\$20,320.50		-	
Q. Sewage System		3		\$22,500.00		-	
R. Water Supply		3		\$20,000.00		-	
S. Exterior Doors		3		\$18,000.00		-	
T. Hazardous Material		3		\$30,480.00		-	
U. Life Safety		3		\$44,027.75		-	
V. Loose Furnishings		2		\$27,094.00		-	
W. Technology		3		\$91,848.66		-	
- X. Construction Contingency / Non-Construction Cost		-		\$498,483.85		-	
Total						\$2,538,916.62	
CEFPI Appraisal Summary							
Section		Points Possible		Points Earned		Percentage Rating Category	
Cover Sheet							
1.0 The School Site		100		76		76% Satisfactory	
2.0 Structural and Mechanical Features		200		116		58% Borderline	
3.0 Plant Maintainability		100		60		60% Borderline	
4.0 Building Safety and Security		200		162		81% Satisfactory	
5.0 Educational Adequacy		200		125		63% Borderline	
6.0 Environment for Education		200		136		68% Borderline	
LEED Observations							
Commentary							
Total		1000		675		68% Borderline	
Enhanced Environmental Hazards Assessment Cost Estimates							
C=Under Contract							
Renovation Cost Factor						104.16%	
Cost to Renovate (Cost Factor applied)						\$2,644,535.55	
<i>The Replacement Cost Per SF and the Renovate/Replace ratio are only provided when this summary is requested from a Master Plan.</i>							

1975 Addition (1975) Summary

District: Willoughby-Eastlake City SD				County: Lake		Area: Northeastern Ohio (8)	
Name: Willowick Middle School				Contact: Ms. Lori Rodman			
Address: 31500 Royalview Dr Willowick, OH 44095				Phone: 440/943-2950			
Bldg. IRN: 41525				Date Prepared: 2010-03-16		By: Karen L Walker	
				Date Revised: 2010-06-23		By: Karen L Walker	
Current Grades		6-8	Acreage:		17.70		
Proposed Grades		N/A	Teaching Stations:		41		
Current Enrollment		637	Classrooms:		39		
Projected Enrollment		N/A					
Addition		Date	HA	Number of Floors	Current Square Feet		
1958 Original		1958	no	1	53,910		
1960 Addition		1960	no	1	20,494		
1962 Addition		1962	no	1	13,547		
1975 Addition		1975	no	1	2,860		
Total					90,811		
*HA =		Handicapped Access					
*Rating =1		Satisfactory					
=2		Needs Repair					
=3		Needs Replacement					
*Const P/S =		Present/Scheduled Construction					
FACILITY ASSESSMENT				Rating	Dollar	Assessment C	
Cost Set: 2010							
A. Heating System				3	\$92,950.00	-	
B. Roofing				3	\$48,675.00	-	
C. Ventilation / Air Conditioning				1	\$0.00	-	
D. Electrical Systems				3	\$49,535.20	-	
E. Plumbing and Fixtures				3	\$20,020.00	-	
F. Windows				3	\$0.00	-	
G. Structure: Foundation				2	\$0.00	-	
H. Structure: Walls and Chimneys				2	\$4,418.50	-	
I. Structure: Floors and Roofs				1	\$0.00	-	
J. General Finishes				3	\$42,270.80	-	
K. Interior Lighting				3	\$14,300.00	-	
L. Security Systems				3	\$7,865.00	-	
M. Emergency/Egress Lighting				3	\$2,860.00	-	
N. Fire Alarm				3	\$4,290.00	-	
O. Handicapped Access				2	\$3,300.00	-	
P. Site Condition				2	\$4,290.00	-	
Q. Sewage System				3	\$0.00	-	
R. Water Supply				3	\$0.00	-	
S. Exterior Doors				3	\$4,000.00	-	
T. Hazardous Material				3	\$6,006.00	-	
U. Life Safety				3	\$9,295.00	-	
V. Loose Furnishings				2	\$5,720.00	-	
W. Technology				3	\$19,390.80	-	
X. Construction Contingency / Non-Construction Cost				-	\$82,864.23	-	
Total					\$422,050.53		
CEFPI Appraisal Summary							
Section		Points Possible	Points Earned	Percentage	Rating	Category	
Cover Sheet							
1.0 The School Site		100	76	76%	Satisfactory		
2.0 Structural and Mechanical Features		200	116	58%	Borderline		
3.0 Plant Maintainability		100	60	60%	Borderline		
4.0 Building Safety and Security		200	162	81%	Satisfactory		
5.0 Educational Adequacy		200	125	63%	Borderline		
6.0 Environment for Education		200	136	68%	Borderline		
LEED Observations							
Commentary							
Total		1000	675	68%	Borderline		
Enhanced Environmental Hazards Assessment Cost Estimates							
C=Under Contract							
Renovation Cost Factor				104.16%			
Cost to Renovate (Cost Factor applied)				\$439,607.83			
<i>The Replacement Cost Per SF and the Renovate/Replace ratio are only provided when this summary is requested from a Master Plan.</i>							

A. Heating System

Description: The existing heating system for the overall facility is composed of three major hot water boilers centrally located in the main mechanical room which were installed in 1958. The units are in good condition. The heating system in the overall facility is part of the Original Construction and is a 2-pipe system supplying hot water heating. With very limited capacity for simultaneous heating and cooling operation, this system is not compliant with the OSDM requirements for basic system type. The forced draft hot water boilers, manufactured by York-Shifley were installed in 1958 and are in decent condition. Heating hot water is distributed to terminal units consisting of unit ventilators, cabinet heaters, unit heaters, and fin tubes. The terminal equipment was installed in 1958 and new with each addition and is in fair condition. The system does not comply with the 15 CFM per person fresh air requirements of the Ohio Building Code mechanical code and Ohio School Design Manual. The non DDC type system temperature controls were installed in 1958 and are in working condition. The system does feature individual heating temperature controls in all spaces required by the OSDM. The overall system does not feature any central energy recovery systems. The facility is equipped with louvered interior doors in classrooms, storage and utility rooms to facilitate Corridor utilization as return air plenums while the classrooms have a return air systems. The existing system is not ducted, and floor to structural deck heights will not accommodate the installation of properly sized ductwork for a future Ohio School Design Manual approved system. The overall heating system is evaluated as being not in safe and efficient working order, though long term life expectancy of the existing system is anticipated. The structure is not equipped with central air conditioning. The site does not contain underground fuel tanks that are currently in use.

Rating: 3 Needs Replacement

Recommendations: Provide new overall heating, ventilating, and air conditioning system to achieve compliance with Ohio Building Code and Ohio School Design Manual standards. Convert to ducted system to facilitate efficient exchange of conditioned air.

Item	Cost	Unit	Whole Building	1958 Original (1958) 53,910 ft²	1960 Addition (1960) 20,494 ft²	1962 Addition (1962) 13,547 ft²	1975 Addition (1975) 2,860 ft²	Sum	Comments
HVAC System Replacement:	\$25.00	sq.ft.		Required	Required	Required	Required	\$2,270,275.00	(includes demo of existing system and reconfiguration of piping layout and new controls, air conditioning)
Convert To Ducted System Replacement	\$7.50	sq.ft.		Required	Required	Required	Required	\$681,082.50	(includes cost for vert. & horz. chases, cut openings, soffits, etc. Must be used in addition to HVAC System Replacement if the existing HVAC system is non-ducted)
Sum:			\$2,951,357.50	\$1,752,075.00	\$666,055.00	\$440,277.50	\$92,950.00		



Typical Unit Ventilator



Gas Fired Hot Water Boilers

[Back to Assessment Summary](#)

B. Roofing

Description: The roof over the overall facility is a standing seam metal retrofit system that was assumed to be installed in 1987, and is in poor condition. Canopies in the overall facility are covered with a built-up roofing system that is in poor condition. There are District reports of current leaking throughout the 1958 Original Construction, in the corridor at the northern part of the 1962 Addition (where it connects to the 1958 Original Construction), and near the west door to the 1960 Addition. No signs of past leaking were observed during the physical assessment. Access to the roof was gained by access hatch that is in poor condition. Fall safety protection cages are not required. Standing water was not observed on the roof, but the leaks reported by the district suggest that the old roof under the standing seam metal retrofit system may have areas of standing water hidden from view. Metal cap flashings are in fair condition. Roof storm drainage is addressed through a system of gutters and downspouts which are properly located, and in poor condition. The roof is not equipped with overflow roof drains and they are not required. Roof penetrations were of similar condition to the roof surfaces. There are not any covered walkways attached to this structure.

Rating: 3 Needs Replacement

Recommendations: Replace metal roof and membrane to meet Ohio School Design Manual guidelines and due to condition. The flashing and coping on the overall facility require replacement with the roofing system. Replace gutters and downspouts due to condition. Replace roof drains with the roofing system. Replace roof hatch due to condition.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
Membrane (all types):	\$8.27	sq.ft. (Qty)		53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²	\$6,293.47	(unless under 10,000 sq.ft.)
Standing Metal Seam:	\$15.75	sq.ft. (Qty)		54,012 Required	21,390 Required	13,732 Required	2,860 Required	\$1,448,905.50	
Repair/replace cap flashing and coping:	\$17.50	in.ft.		1,213 Required	465 Required	323 Required	156 Required	\$37,747.50	
Gutters/Downspouts	\$12.50	in.ft.		723 Required	358 Required	375 Required	72 Required	\$19,100.00	
Remove/replace existing roof Drains and Sump:	\$1,200.00	each		3 Required	1 Required	3 Required		\$8,400.00	
Roof Access Hatch:	\$2,000.00	each		1 Required				\$2,000.00	(remove and replace)
Sum:			\$1,522,446.47	\$889,431.96	\$351,647.78	\$232,691.73	\$48,675.00		



Typical standing seam roofing.



Gutter condition.

[Back to Assessment Summary](#)

C. Ventilation / Air Conditioning

Description: The overall facility is not equipped with a central air conditioning system. Window units, split systems and roof top units are provided in miscellaneous locations such as offices, library, music, and media center. The ventilation system in the overall facility consists of unit ventilators and ducted air handlers installed initially in 1958 and are in fair condition, providing fresh air to classrooms and other miscellaneous spaces such as Gymnasiums, Student Dining, Media Center etc. Relief air venting is provided by relief fans and roof vents. The ventilation system does not meet the Ohio Building Code 15 CFM per occupant fresh air requirement. The overall system is not compliant with Ohio Building Code and Ohio School Design Manual requirements. Dust collection systems are not required in this facility and no system is provided. The Art program is not equipped with a kiln. Exhaust systems for Restrooms, Locker Rooms, Kitchen, Gymnasiums, Storage Rooms, Custodial Closets and specialized areas are adequately placed, and in working condition.

Rating: 1 Satisfactory

Recommendations: Provide an air conditioning system to meet with Ohio Building Code and Ohio School Design Manual requirements. Pricing included in Item A. Provide kiln exhaust system for kiln listed in item J.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
Kiln Exhaust System:	\$5,000.00	each		53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²		
				1 Required				\$5,000.00	
Sum:			\$5,000.00	\$5,000.00	\$0.00	\$0.00	\$0.00		



Rooftop Exhaust Fans



Rooftop Air Conditioning Unit

[Back to Assessment Summary](#)

D. Electrical Systems

Description: There are two electrical systems provided to the overall facility; one is a 600 amp 120/240 volt, 1 phase, 3 wire original system from the year 1958, and is in fair condition. The second electrical system added under a later building addition is a 800 amp 120/240 volt, 3 phase, 3 wire system. Power is provided to the school by transformers within a vault room located near the rear of the school. The main distribution panels cannot be expanded to add additional capacity that would be required by the OSDM air conditioning requirements. The Classrooms are not equipped with adequate electrical outlets in some of the original areas per OSFC recommendations. The typical Classroom contains usually 2 to 3 general purpose outlets with certain classrooms having added outlets used for Classroom computers, and television. There are some spaces that have no electrical outlets such as storage areas and Janitor Closets. Some Corridors are not equipped with adequate electrical outlets for electrical servicing. Adequate GFI protected exterior outlets are not provided around the perimeter of the building. The facility is not equipped with an emergency generator. There is a 30 amp disconnect switch which feeds the Fire Alarm panel. Adequate building lightning protection safeguards are not provided. The original overall electrical system does not meet Ohio School Design Manual requirements, and both will be inadequate to meet the facility's future needs.

Rating: 3 Needs Replacement

Recommendations: The entire electrical systems requires replacement to meet Ohio School Design Manual guidelines and the Ohio Building Code for overall capacity due to lack of OSDM - required features and to accommodate the addition of an air conditioning system.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
System Replacement:	\$17.32	sq.ft.		Required	Required	Required	Required	\$1,572,846.52	(Includes demo of existing system. Includes generator for life safety systems. Does not include telephone or data cable or equipment) (Use items below ONLY when the entire system is NOT being replaced)
Sum:			\$1,572,846.52	\$933,721.20	\$354,956.08	\$234,634.04	\$49,535.20		



Main Disconnect Switch



Main Distribution Switchboard

[Back to Assessment Summary](#)

E. Plumbing and Fixtures

Description: The school contains 2 Large Group Restrooms for boys, 2 Large Group Restrooms for girls, and 6 Restrooms for staff. First floor kitchen area contains 1 triple bowl sink, and 1 hand sink. Boys' first floor Large Group Restrooms contain 0 ADA and 6 non-ADA wall mounted flush valve toilets, 0 ADA, 17 non-ADA wall mounted flush valve urinals, 9 non-ADA wall mounted lavatories. Girls' first floor Large Group Restrooms contain 0 ADA and 12 non-ADA wall mounted flush valve toilets, as well as 7 non-ADA wall mounted lavatories. Staff Restrooms contain 0 ADA and 7 non-ADA wall mounted flush valve toilets, 0 ADA and 7 non-ADA wall mounted lavatories. The facility class rooms are equipped with 0 ADA and 1 non-ADA wall mounted flush valve toilets, 0 ADA and 1 non-ADA wall mounted lavatory. 35 non ADA class room sinks in good condition, 4 electric water coolers, 2 safety showers, 1 wash fountain and 3 mop sinks. Condition of fixtures is good. The school does not meet the OBC requirements for fixtures. ADA requirements are not met for fixtures and drinking fountains.

Rating: 3 Needs Replacement

Recommendations: Provide additional new fixtures to replace existing fixtures because they are not the new low flow type and do not meet ADA requirements. Replace grease interceptor as part of plumbing replacement.

Item	Cost	Unit	Whole Building	1958 Original (1958) 53,910 ft²	1960 Addition (1960) 20,494 ft²	1962 Addition (1962) 13,547 ft²	1975 Addition (1975) 2,860 ft²	Sum	Comments
Back Flow Preventer:	\$5,000.00	unit		1 Required				\$5,000.00	
Domestic Supply Piping:	\$3.50	sq.ft.		Required	Required	Required	Required	\$317,838.50	(remove / replace)
Sanitary Waste Piping:	\$3.50	sq.ft.		Required	Required	Required	Required	\$317,838.50	(remove / replace)
Domestic Water Heater:	\$5,100.00	per unit		1 Required	1 Required	1 Required		\$15,300.00	(remove / replace)
Toilet:	\$1,500.00	unit		13 Required	8 Required	4 Required		\$37,500.00	(remove / replace) See Item O
Urinal:	\$3,800.00	unit		11 Required	6 Required			\$64,600.00	(new)
Sink:	\$2,500.00	unit		33 Required	19 Required	4 Required		\$140,000.00	(new)
Electric water cooler:	\$3,000.00	unit		3 Required	1 Required			\$12,000.00	(double ADA)
Replace faucets and flush valves	\$500.00	per unit		57 Required	33 Required	8 Required		\$49,000.00	(average cost to remove/replace)
Three Station Modular Lavatory	\$4,000.00	unit				1 Required		\$4,000.00	(remove / replace)
Sum:			\$963,077.00	\$568,770.00	\$250,358.00	\$123,929.00	\$20,020.00		



Toilet room fixtures



Toilet room fixtures

[Back to Assessment Summary](#)

F. Windows

Description: The overall facility is equipped with non-thermally broken aluminum frame windows with single glazed non-insulated glazing type window system, which were installed at the dates of construction, and are in poor condition. Window system seals are in poor condition, with frequent air and water infiltration being experienced. Window system hardware is in poor condition. The window system features surface mounted blinds, which are in moderate condition. The window system is not equipped with insect screens on operable windows. Aluminum and hollow metal frame storefront window systems, with single tempered and non-tempered glazing are found in the overall facility and are in fair to poor condition. This facility does not feature any glass block windows. The 1958 and 1962 additions also contain aluminum frame window systems with cement board panels in poor condition. The school does not contain skylights. Window security grilles are not provided for ground floor windows. There is not a Greenhouse associated with this school.

Rating: 3 Needs Replacement

Recommendations: Provide a new insulated window system with integral blinds to meet with Ohio School Design Manual requirements. Replace storefront/curtainwall system due to condition.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
				53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²		
Insulated Glass/Panels:	\$57.10	sq.ft. (Qty)		4,517 Required	2,363 Required	1,337 Required		\$469,190.70	(includes blinds)
Curtain Wall/Storefront System:	\$64.18	sq.ft. (Qty)		1,333 Required	590 Required	146 Required		\$132,788.42	(remove and replace)
Sum:			\$601,979.12	\$343,472.64	\$172,793.50	\$85,712.98	\$0.00		



Typical aluminum window system.



Typical aluminum windows.

[Back to Assessment Summary](#)

G. Structure: Foundation

Description: The overall facility foundations are masonry with trench concrete footings. Perimeter insulation is minimal and dampproofing is not noted. Foundations displayed locations of significant differential settlement, cracking, at the 1960 Addition and are in moderate condition. The District reports that there has been no past leaking. Minor grading / site drainage deficiencies were noted around the perimeter of the structure that could contribute to foundation / wall structural deterioration.

Rating: 2 Needs Repair

Recommendations: Provide foundation reinforcement at the west face of the 1960 addition.

Item	Cost	Unit	Whole Building	1958 Original (1958) 53,910 ft²	1960 Addition (1960) 20,494 ft²	1962 Addition (1962) 13,547 ft²	1975 Addition (1975) 2,860 ft²	Sum	Comments
Other: Repair foundation walls.	\$100.00	n.ft.				100 Required		\$10,000.00	Excavate foundation wall and provide new concrete footing to support wall above.
Sum:			\$10,000.00	\$0.00	\$0.00	\$10,000.00	\$0.00		



Typical foundation condition.

[Back to Assessment Summary](#)

H. Structure: Walls and Chimneys

Description: The overall facility has a brick veneer on a masonry bearing wall system, which displayed locations of deterioration, and is in fair condition. The exterior masonry appears to have inappropriately spaced and adequately caulked control joints in fair condition. Control joints are not provided at lintel locations at doors and windows. The school has sufficient expansion joints between additions only, and they are in fair condition although caulk is in poor condition. The exterior masonry has not been cleaned and sealed in recent years, and shows evidence of mortar deterioration on all walls of the 1960 Addition, on the North wall of the 1958 Addition, and mild deterioration on the student dining part of the 1962 Addition, as well as at piers on all additions. Interior walls are concrete masonry units and are in fair condition. Interior masonry appears to have inadequately spaced and caulked control joints in fair condition. Soffits are in poor condition. The window sills are an element of the aluminum window system, and are in poor condition. The exterior lintels are steel, and are rusting above doors and in other locations where they are exposed. Chimneys are in fair condition although mortar has deteriorated and the precast coping is in poor condition.

Rating: 2 Needs Repair

Recommendations: Provide tuckpointing in all areas of mortar deterioration as required through the overall facility. Replace damaged brick as required in various locations in the overall facility. Provide masonry cleaning and sealing as required through the overall facility. Recaulk existing control joints. Replace masonry lintels as required through the overall facility.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
Tuckpointing:	\$5.00	sq.ft. (Qty)		53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²		
				94 Required	1,524 Required	1,309 Required		\$14,635.00	(wall surface)
Exterior Masonry Cleaning:	\$1.50	sq.ft. (Qty)		9,534 Required	3,889 Required	5,273 Required	486 Required	\$28,773.00	(wall surface)
Exterior Masonry Sealing:	\$1.00	sq.ft. (Qty)		9,534 Required	3,889 Required	5,273 Required	486 Required	\$19,182.00	(wall surface)
Exterior Caulking:	\$5.50	ln.ft.		26 Required	27 Required	56 Required	37 Required	\$803.00	(removing and replacing)
Replace Brick Veneer System:	\$35.00	sq.ft. (Qty)		22 Required	14 Required	4 Required		\$1,400.00	(total removal and replacement including pinning and shoring)
Lintel Replacement:	\$250.00	ln.ft.		85 Required		40 Required	12 Required	\$34,250.00	(total removal and replacement including pinning and shoring)
Coping Replacement Stone and Masonry:	\$100.00	ln.ft.		23 Required		14 Required		\$3,700.00	(remove and replace)
Sum:			\$102,743.00	\$48,768.00	\$17,981.00	\$31,575.50	\$4,418.50		



Deteriorating lintels and brick



Chimney on 1962 Addition

[Back to Assessment Summary](#)

I. Structure: Floors and Roofs

Description: The floor construction of the base floor of the overall facility is concrete slab on grade construction, and is in fair condition. No crawl space or intermediate floors are present at this single story structure. Ceiling to structural deck spaces are sufficient to accommodate HVAC, electrical, and plumbing scopes of work in required renovations. The roof construction of the 1958 Original Construction is concrete slab. The Gymnasium is a purlin roof structure. The 1960 Addition is metal deck with bar joists. All systems are in good condition.

Rating: 1 Satisfactory

Recommendations: Existing conditions require no renovation or replacement at the present time.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
				53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²		
Sum:			\$0.00	\$0.00	\$0.00	\$0.00	\$0.00		



Gymnasium roof



Roof system

[Back to Assessment Summary](#)

J. General Finishes

Description: The overall facility features conventionally partitioned Classrooms with vinyl tile flooring, acoustical tile ceilings, as well as painted block wall finishes, and they are in fair condition. The overall facility has Corridors with vinyl tile flooring, acoustical tile ceilings, as well as glazed block wall finishes, and they are in fair condition. The overall facility has Restrooms with ceramic mosaic tile flooring, acoustical tile ceilings, as well as glazed block wall finishes, and they are in fair condition. Toilet partitions are metal, and are in fair to poor condition. Classroom casework in the overall facility is wood type construction with plastic laminate tops, is adequately provided, and in fair to poor condition. The typical Classroom contains 24 lineal feet of casework, and Classroom casework provided ranges from 0 to 94 feet. Classrooms are not provided adequate chalkboards, markerboards, and tackboards, which are in fair condition. The lockers, located in the Corridors, are adequately provided, and in poor condition. The Art program is not equipped with a kiln. The facility is equipped with wood louvered interior doors that are recessed without proper ADA hardware and clearances, and in poor condition. The Gymnasium space has wood flooring, tectum ceilings, as well as painted block wall finishes, and they are in fair condition. The wood floor has been refinished since 2000. Gymnasium telescoping stands are plastic type construction in good condition. Gymnasium basketball backboards are fixed type, and are in good condition. The Media Center, located in the 1958 Original Construction, has vinyl tile flooring, acoustical tile ceilings, as well as painted block wall finishes, and they are in fair condition. Student Dining, located in the 1958 Original Construction and 1962 Addition, has vinyl tile flooring, acoustical tile ceilings, as well as glazed and painted block wall finishes, and they are in fair condition. OSDM-required fixed equipment for Stage is not provided. A stage is not provided. The existing Kitchen is full service, is undersized based on current enrollment, and the existing Kitchen equipment, installed before 2000, is in fair to poor condition. The Kitchen hood is in fair condition, and is equipped with the required UL 300 compliant wet chemical fire suppression system. The required 6" overhang on all three exposed sides of the cooking equipment is provided by the hood. Kitchen hood exhaust ductwork is of proper construction / material / insulation / and installed as required by the OSDM and OBMC. Walk-in coolers / freezers are located within the Kitchen spaces, and are in good condition.

Rating: 3 Needs Replacement

Recommendations: Provide complete replacement of finishes and casework due to installation of systems outlined in Items A, C, D, E, K, L, T, and U. Funding for replacement of interior doors is provided in Item O, including doors here noted as being in poor condition. Provide an Art program kiln. Provide new toilet partitions and accessories. Replace kitchen equipment.

Item	Cost	Unit	Whole Building	1958 Original (1958) 53,910 ft ²	1960 Addition (1960) 20,494 ft ²	1962 Addition (1962) 13,547 ft ²	1975 Addition (1975) 2,860 ft ²	Sum	Comments
Complete Replacement of Finishes and Casework (Middle):	\$14.58	sq.ft.		Required	Required	Required	Required	\$1,324,024.38	(middle, per building area, with removal of existing)
Toilet Partitions:	\$1,000.00	per stall		11 Required	5 Required	1 Required		\$17,000.00	(removing and replacing)
Toilet Accessory Replacement	\$0.20	sq.ft.		Required	Required	Required	Required	\$18,162.20	(per building area)
Art Program Kiln:	\$2,500.00	each		1 Required				\$2,500.00	
Total Kitchen Equipment Replacement:	\$190.00	sq.ft. (Qty)				1,135 Required		\$215,650.00	(square footage based upon only existing area of food preparation, serving, kitchen storage areas and walk-ins. Includes demolition and removal of existing kitchen equipment)
Sum:			\$1,577,336.58	\$810,289.80	\$307,901.32	\$416,874.66	\$42,270.80		



Corridor lockers



Gymnasium

[Back to Assessment Summary](#)

K. Interior Lighting

Description: The typical Classrooms of the original facility are equipped with T-12 1'X4' surface mounted style fluorescent fixtures with single level switching. Some of the additions to the school have semi-recessed 2' X 4' fluorescent fixtures. Some of these Classrooms provide 60 to 70 footcandles while others only provide 50 to 60 footcandles of light which is adequate for the recommended 50 FC. The typical Corridors in the overall facility are equipped with T-12, 2'X4' recessed mounted fluorescent fixtures with single level switching. Corridor fixtures are in good condition, providing an average illumination of 15 to 20 FC; not complying with the 20 FC recommended by the OSDM. The Multi Purpose / Cafeteria area / Gymnasium is equipped with pendant mounted incandescent type lighting in fair condition, providing an average illumination of 50 to 60 FC; complying with the 50 FC recommended by the OSDM. The Library is equipped with T-12, 1'X4' tandem surface mounted wrap-around fluorescent type lighting in fair condition, providing an average illumination of 50 to 55 FC; complying with the 50 FC recommended by the OSDM. The Kitchen space is equipped with T-12 1'X4' surface mounted fluorescent type lighting fixtures with single level switching. Kitchen fixtures are in good condition, providing an average illumination of 55 to 60 FC, which is less than the 75-80 FC recommended by the OSDM. The Service Areas in the overall facility are equipped with pendant or surface mounted T-12 surface mounted fluorescent type lighting and occasionally surface mounted incandescent fixtures in poor condition. The typical Administrative spaces in the overall facility are equipped with 2'X4' recessed fluorescent fixtures and 1'X4' surface mounted T-12 wrap-around fluorescent type lighting in fair condition, providing adequate illumination based on OSDM requirements. The overall lighting systems of the facility are not compliant with Ohio School Design Manual requirements due to age and installation of a fire protection system.

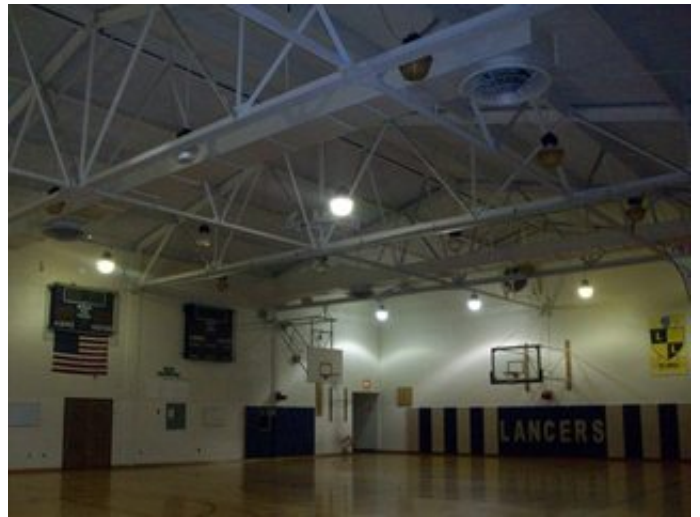
Rating: 3 Needs Replacement

Recommendations: Provide complete replacement of lighting system due to age, of lighting fixtures and installation of a fire protection system.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
Complete Building Lighting Replacement	\$5.00	sq.ft.		53,910 ft²	20,494 ft²	13,547 ft²	2,860 ft²	\$454,055.00	Includes demo of existing fixtures
Sum:			\$454,055.00	\$269,550.00	\$102,470.00	\$67,735.00	\$14,300.00		



Typical Classroom Lighting



Gymnasium Lighting

[Back to Assessment Summary](#)

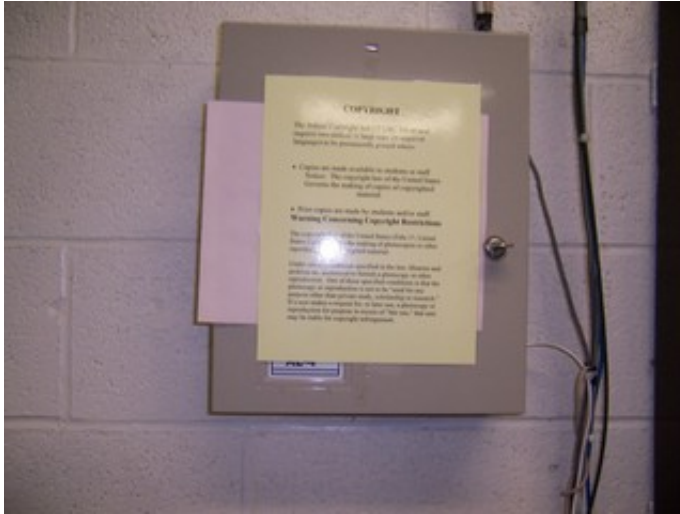
L. Security Systems

Description: The overall facility contains a security system including head-end equipment, cameras and security buzzer at main entry. The security system is not adequately provided throughout, and is not fully compliant with Ohio School Design Manual guidelines regarding security lighting throughout the site. The exterior building lighting system is equipped with incandescent semi-recessed mounted lights and mercury vapor floodlights lights; all in fair condition. Parking and bus pick-up / drop off areas are illuminated with pole mounted par 38 floodlight fixtures in fair condition. The exterior site lighting system provides inadequate coverage per the OSDM guidelines.

Rating: 3 Needs Replacement

Recommendations: Provide complete replacement of security system to meet Ohio School Design Manual guidelines. Provide complete replacement of exterior site lighting system to meet Ohio School Design Manual guidelines.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
Security System:	\$1.75	sq.ft.		53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²	\$158,919.25	(complete, area of building)
Exterior Site Lighting:	\$1.00	sq.ft.		Required	Required	Required	Required	\$90,811.00	building
Sum:			\$249,730.25	\$148,252.50	\$56,358.50	\$37,254.25	\$7,865.00		



Security Headend Equipment



Security Camera and Keypad

[Back to Assessment Summary](#)

M. Emergency/Egress Lighting

Description: The overall facility is equipped with an emergency egress lighting system consisting of exit lighting fed from the emergency panel and emergency lighting. There are some stand alone emergency floodlight units in several areas of the entire facility. The exterior egress doors have semi-recessed incandescent type lights or incandescent wall mounted fixtures, but are not provided with emergency lighting heads. Most of the system is in poor condition and in need of repair and / or additional emergency lighting equipment. The emergency egress lighting units that are provided with appropriate battery backup but, no written battery replacement schedule was available. The system is not adequately provided throughout, and does not meet Ohio School Design Manual and Ohio Building Code requirements in all cases.

Rating: 3 Needs Replacement

Recommendations: Provide complete replacement of the emergency / egress lighting system throughout to meet the Ohio School Design Manual guidelines.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
Emergency/Egress Lighting:	\$1.00	sq.ft.		53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²		
				Required	Required	Required	Required	\$90,811.00	(complete, area of building)
Sum:			\$90,811.00	\$53,910.00	\$20,494.00	\$13,547.00	\$2,860.00		



Typical Exit Sign with EM. Heads



Typical Emergency Light

[Back to Assessment Summary](#)

N. Fire Alarm

Description: The overall facility is equipped with a zoned Fire Alarm system. Due to the age of this system it cannot handle the requirements of the Ohio School Design Manual. Devices are not located in areas that are required by code and the system installed is not an addressable type and therefore will not meet the Ohio School Design Manual and Ohio Building Code requirements.

Rating: 3 Needs Replacement

Recommendations: Recommend providing a complete new Fire Alarm System to meet the Ohio School Design Manual and the Ohio Building Code.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
Fire Alarm System:	\$1.50	sq.ft.		53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²		
Sum:			\$136,216.50	\$80,865.00	\$30,741.00	\$20,320.50	\$4,290.00	\$136,216.50	(complete new system, including removal of existing)



Fire Alarm Control Panel



Typical Fire Alarm Device

[Back to Assessment Summary](#)

O. Handicapped Access

Description: At the site, there is an accessible route provided from the public right-of-way, the accessible parking areas, and from the passenger unloading zone to the main entrance of the school. There is an accessible route connecting most areas of the site. The exterior entrances are mostly ADA accessible. Access from the parking / drop-off area to the building entries is compromised by steps or steep ramps. Adequate handicap parking is not provided. Exterior doors are equipped with ADA hardware. The main entry is not equipped with an ADA power assist door. On the interior of the building, space allowances and reach ranges are mostly compliant. There is an accessible route through the building which does not include protruding objects. Ground and floor surfaces are compliant. Special provisions for floor level changes in this single story structure are not required. No Stage is provided. The Instrumental Music room, which has a sunken floor, is accessed via a non-compliant ramp and a set of compliant steps. Interior doors throughout the facility are mostly recessed, are not provided adequate clearances, and are not provided with ADA-compliant hardware. Throughout the facility, toilet partitions are metal and most do not provide appropriate ADA clearances, ADA compliant accessories are not adequately provided and mounted. Throughout the facility, and mirrors do not meet ADA requirements for mounting height. Most electric water coolers are compliant. ADA signage is not adequately provided on either the interior or the exterior of the building.

Rating: 2 Needs Repair

Recommendations: Provide ADA compliant signage. Provide a power assist door opener at the main entry. Rework the ramp at the Music room. Provide compliant toilet partitions and accessories and remount mirrors to compliant height where required. Replacement of plumbing fixtures is covered in Item E. Parking issues are corrected in Item P. Rework door openings to provide adequate clearances where required.

Item	Cost	Unit	Whole Building	1958 Original (1958) 53,910 ft ²	1960 Addition (1960) 20,494 ft ²	1962 Addition (1962) 13,547 ft ²	1975 Addition (1975) 2,860 ft ²	Sum	Comments
Signage:	\$0.10	sq.ft.		Required	Required	Required	Required	\$8,795.10	(per building area)
Ramps:	\$40.00	sq.ft. (Qty)			54 Required			\$2,160.00	(per ramp/interior-exterior complete)
Toilet Partitions:	\$1,000.00	stall		4 Required	2 Required	3 Required		\$9,000.00	(ADA - grab bars, accessories included)
ADA Assist Door & Frame:	\$7,500.00	unit		1 Required				\$7,500.00	(openers, electrical, patching, etc)
Replace Doors:	\$1,100.00	leaf		39 Required	14 Required	24 Required	3 Required	\$88,000.00	(standard 3070 wood door, HM frame-classroom door/light, includes hardware)
Replace Doors:	\$5,000.00	leaf		8 Required	1 Required			\$45,000.00	(rework narrow opening to provide 3070 wood door, HM frame, door/light, includes hardware)
Replace Doors:	\$5,000.00	leaf		19 Required	14 Required	4 Required		\$185,000.00	(rework opening and corridor wall to accommodate ADA standards when door opening is set back from edge of corridor and cannot accommodate a wheelchair.)
Remount Restroom Mirrors to Handicapped Height:	\$285.00	per restroom		7 Required	4 Required	3 Required		\$3,990.00	
Sum:			\$349,445.10	\$196,786.00	\$97,749.40	\$51,609.70	\$3,300.00		



Typical recessed classroom door



Accessible health clinic restroom

[Back to Assessment Summary](#)

P. Site Condition

Description: The building sits on a 17.7 acre site within a 26.7 acre campus shared with Royalview School. The relatively flat site is located in a suburban residential setting with moderate tree and shrub landscaping. Evidence of poor drainage was observed near the building perimeter. No evidence of erosion was observed. Also located on site are baseball and softball fields, a running track, a football field, tennis courts and several outbuildings associated with the athletic facilities. The site is bordered by lightly traveled city streets. Multiple entrances onto the site facilitate site circulation. A one way bus loop which is separated from other vehicular traffic is provided in front of Royalview Elementary school for student loading and unloading for both schools. Staff and visitor parking is facilitated by multiple asphalt parking lots in fair to poor condition, containing 138 parking places, which provides adequate parking for staff members and visitors. Adequate designated parking for the disabled is not provided. The site and parking lot drainage design, consisting of sheet drainage, catch basins, and storm sewers, provides adequate evacuation of storm water, and no problems with parking lot ponding were observed. Concrete curbs in fair to poor condition are appropriately placed. The building is not provided with a service drive or loading dock. A concrete dumpster pad in fair condition is provided. Concrete sidewalks are properly sloped, are located to provide a logical flow of pedestrian traffic, and are in fair to poor condition. The playground equipment is in excellent condition and is placed to provide compliant fall zones on a compliant soft surface of sufficient depth. A kickball field in fair condition is provided. A well landscaped courtyard with picnic tables is suitable for small group outdoor instruction. The site is bordered on all sides by single family residences. Paved paths and concrete sidewalks connect the site to the adjacent residential neighborhoods. The site is mostly flat and well drained. There is sufficient space on site for a modest addition to the building.

Rating: 2 Needs Repair

Recommendations: Provide new wearing course on entry drives, parking lot, and paved areas associated with athletic facilities. Replace concrete sidewalks and curbs where required. Costs for shared entry drives and sidewalks are divided between the Willowick Middle School and Royalview Elementary School assessments. Costs for paved play areas and bicycle parking lot are covered in the Royalview Elementary School assessment. Costs associated with athletic facilities are covered in the Willowick Middle School assessment. Designate additional accessible parking spaces convenient to the entries to both buildings. Costs for ADA signage are covered in item O of both assessments.

Item	Cost	Unit	Whole Building	1958 Original (1958) 53,910 ft ²	1960 Addition (1960) 20,494 ft ²	1962 Addition (1962) 13,547 ft ²	1975 Addition (1975) 2,860 ft ²	Sum	Comments
Asphalt Paving / New Wearing Course:	\$18.65	sq. yard		10,140 Required				\$189,111.00	(includes minor crack repair in less than 5% of paved area)
Concrete Curb:	\$17.87	in.ft.		310 Required				\$5,539.70	(new)
Concrete Sidewalk:	\$4.69	sq.ft. (Qty)		1,850 Required				\$8,676.50	(5 inch exterior slab)
Provide Concrete Dumpster Pad:	\$2,400.00	each		1 Required				\$2,400.00	(for two dumpsters)
Base Sitework Allowance for Unforeseen Circumstances	\$50,000.00	allowance		Required				\$50,000.00	Include this and one of the next two. (Applies for whole building, so only one addition should have this item)
Sitework Allowance for Unforeseen Circumstances for buildings between 0 SF and 100,000 SF	\$1.50	sq.ft.		Required	Required	Required	Required	\$136,216.50	Include this one <u>or</u> the next. (Each addition should have this item)
Sum:				\$391,943.70	\$336,592.20	\$30,741.00	\$20,320.50	\$4,290.00	



Parking lot



Sidewalk in poor condition

[Back to Assessment Summary](#)

Q. Sewage System

Description: The sanitary sewer system is tied in to the city system and is in fair condition. No significant system deficiencies were reported by the school district or noted during the physical assessment.

Rating: 3 Needs Replacement

Recommendations: Replace existing system due to age of pipe.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
Sewage Main:	\$45.00	in. ft.		53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²		
Sum:			\$67,500.00	\$22,500.00	\$22,500.00	\$22,500.00	\$0.00	\$67,500.00	(include excavation and backfilling)



Sanitary drainage Piping



Sanitary drainage Piping

[Back to Assessment Summary](#)

R. Water Supply

Description: The domestic water supply system is tied in to the municipal system. The water meter, is in good condition. The District was not able to provide water supply flow test data. The existing domestic water service does meet the facility's current needs. The facility is not equipped with an automated fire suppression system, and the existing water supply will not provide adequate support for a future system.

Rating: 3 Needs Replacement

Recommendations: The system does not provide adequate capacity for the future needs of the school. Provide a reduced pressure backflow prevention on the incoming supply, as well as future automated fire suppression system. Funding provided in Item U.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
				53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²		
Domestic Water Main	\$40.00	in.ft.		500 Required	500 Required	500 Required		\$60,000.00	(new)
Sum:			\$60,000.00	\$20,000.00	\$20,000.00	\$20,000.00	\$0.00		



Domestic water heaters



Domestic water heaters

[Back to Assessment Summary](#)

S. Exterior Doors

Description: Typical exterior doors in the Overall Facility are aluminum type construction, installed on aluminum frames, and are in fair to poor condition. Typical exterior doors feature single glazed non-insulated non-tempered glass vision panels. There are hollow metal doors on hollow metal frames that are in poor condition. There is a wood door in poor condition on a hollow metal frame in the 1960 Addition. There are hollow metal doors on hollow metal frames with and without single glazed non-tempered vision panels in poor condition of the overall facility. Overhead doors are steel coiling type in poor condition.

Rating: 3 Needs Replacement

Recommendations: Replace all exterior doors to comply with Ohio Building Code, ADA, and Ohio School Design Manual guidelines. Sidelite replacement included in item F.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
Door Leaf/Frame and Hardware:	\$2,000.00	per leaf		53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²		
Overhead doors and hardware:	\$2,500.00	per leaf		1 Required				\$2,500.00	(8 x 10 sectional, manual operation)
Sum:			\$56,500.00	\$26,500.00	\$8,000.00	\$18,000.00	\$4,000.00		



Typical aluminum doors.



Typical hollow metal doors.

[Back to Assessment Summary](#)

T. Hazardous Material

Description: The School District provided the AHERA three year reinspection reports, prepared by CTG Environmental, LLC, and dated 2006, documenting known and assumed locations of asbestos and other hazardous materials. Vinyl asbestos floor tile and mastic, pipe insulation and pipe fittings containing hazardous materials are located in the overall facility in fair condition. These materials were described in the report and open to observation and found to be in friable condition with significant to light damage. There are no underground fuel oil storage tanks on the site. Due to the construction date, there is a potential for lead based paint. Fluorescent lighting will require special disposal.

Rating: 3 Needs Replacement

Recommendations: Remove all hazardous materials, inclusive of asbestos-containing materials in the overall facility.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
				53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²		
<i>Environmental Hazards Form</i>				EHA Form	EHA Form	EHA Form	EHA Form	<	
Pipe Insulation Removal	\$10.00	ln.ft.		200 Required	100 Required	0 Required	0 Required	\$3,000.00	
Pipe Fitting Insulation Removal	\$20.00	each		50 Required	10 Required	0 Required	0 Required	\$1,200.00	
Resilient Flooring Removal, Including Mastic	\$3.00	sq.ft. (Qty)		36,209 Required	15,300 Required	10,160 Required	2,002 Required	\$191,013.00	See J
Sum:			\$195,213.00	\$111,627.00	\$47,100.00	\$30,480.00	\$6,006.00		



9x9 tile



Pipe insulation

[Back to Assessment Summary](#)

U. Life Safety

Description: The overall facility is not equipped with an automated fire suppression system. Exit corridors are situated such that dead-end corridors are not present. Stair towers and guardrails are not present in this single story structure. The facility does not have any exterior stairways from intermediate floors. The Kitchen hood is in good condition, and is equipped with the required UL 300 compliant wet chemical fire suppression system. The required 6" overhang of the cooking equipment is provided by the hood. Kitchen hood exhaust ductwork is of proper construction / material / insulation / and/or installed as required by the OSDM and OBCMC. The cooking equipment is interlocked to shut down in the event of discharge of the fire suppression system. Fire extinguishers are provided in sufficient quantity. Existing fire extinguishers are adequately spaced. The facility is not equipped with an emergency generator. The existing water supply is provided by a tie-in to the municipal system, and is insufficient to meet the future fire suppression needs of the school. Rooms with a capacity greater than 50 occupants are equipped with adequate egress.

Rating: 3 Needs Replacement

Recommendations: Provide new automated fire suppression system to meet Ohio School Design Manual guidelines. Provide increased water service of a capacity sufficient to support the fire suppression system, funding included in fire suppression funding.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
				53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²		
Sprinkler / Fire Suppression System:	\$3.25	sq.ft. (Qty)		53,910 Required	20,494 Required	13,547 Required	2,860 Required	\$295,135.75	(includes increase of service piping, if required)
Sum:			\$295,135.75	\$175,207.50	\$66,605.50	\$44,027.75	\$9,295.00		



Fire extinguisher cabinet



Fire extinguisher cabinet

[Back to Assessment Summary](#)

V. Loose Furnishings

Description: The typical Classroom furniture is mismatched, and in generally fair condition, consisting of student desks & chairs, teacher desks & chairs, desk height file cabinets, reading tables, computer workstations, bookcases, wastebaskets, and other. The facility's furniture and loose equipment were evaluated in item 6.17 in the CEFPI section of this report, and on a scale of 1 to 10 the overall facility received a rating of 7 due to observed conditions, and due to the fact that it lacks some of the Design Manual required elements.

Rating: 2 Needs Repair

Recommendations: Provide for replacement of outdated or inadequate furniture.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
				53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²		
CEFPI Rating	7	\$2.00/sq.ft.		Required	Required	Required	Required	\$181,622.00	
Sum:			\$181,622.00	\$107,820.00	\$40,988.00	\$27,094.00	\$5,720.00		



Classroom furniture



Classroom furniture

[Back to Assessment Summary](#)

W. Technology

Description: The typical Classroom is equipped with two data ports per outlet and no voice ports to be used with a digitally based phone system to meet Ohio School Design Manual requirements. The typical Classroom is not equipped with the required four technology data ports for teacher and student use and a 2-way PA system that can be initiated by either party to meet Ohio School Design Manual requirements. The facility is equipped with a centralized clock system. The Sound System provides devices for most required spaces but due to the age the infrastructure is inadequately provided for each space of this facility. The facility does contain a media distribution center, and also provides a Computer Lab for use by most students.

Rating: 3 Needs Replacement

Recommendations: Provide complete replacement of technology systems to meet Ohio School Design Manual requirements for this facility.

Item	Cost	Unit	Whole Building	1958 Original (1958)	1960 Addition (1960)	1962 Addition (1962)	1975 Addition (1975)	Sum	Comments
				53,910 ft ²	20,494 ft ²	13,547 ft ²	2,860 ft ²		
MS portion of building with total SF > 91,650	\$6.78	sq.ft. (Qty)		53,910 Required	20,494 Required	13,547 Required	2,860 Required	\$615,698.58	
Sum:			\$615,698.58	\$365,509.80	\$138,949.32	\$91,848.66	\$19,390.80		



Technology Head-End Equipment Rack



Typical Technology Outlets

[Back to Assessment Summary](#)

X. Construction Contingency / Non-Construction Cost

Renovation Costs (A-W)		\$12,450,657.07
7.00%	Construction Contingency	\$871,545.99
Subtotal		\$13,322,203.06
16.29%	Non-Construction Costs	\$2,170,186.88
Total Project		\$15,492,389.94

Construction Contingency	\$871,545.99
Non-Construction Costs	\$2,170,186.88
Total for X.	\$3,041,732.87

Non-Construction Costs Breakdown		
Land Survey	0.03%	\$3,996.66
Soil Borings / Phase I Envir. Report	0.10%	\$13,322.20
Agency Approval Fees (Bldg. Code)	0.15%	\$19,983.30
Construction Testing	0.25%	\$33,305.51
Printing - Bid Documents	0.27%	\$35,969.95
Advertising for Bids	0.03%	\$3,996.66
Builder's Risk Insurance	0.11%	\$14,654.42
Design Professional's Compensation	7.50%	\$999,165.23
CM Compensation	6.00%	\$799,332.18
Commissioning	0.42%	\$55,953.25
Maintenance Plan Advisor	0.11%	\$14,654.42
Non-Construction Contingency (includes partnering and mediation services)	1.32%	\$175,853.08
Total Non-Construction Costs	16.29%	\$2,170,186.88

[Back to Assessment Summary](#)

School Facility Appraisal

Name of Appraiser Karen L Walker **Date of Appraisal** 2010-03-16
Building Name Willowick Middle School
Street Address 31500 Royalview Dr
City/Town, State, Zip Code Willowick, OH 44095
Telephone Number(s) 440/943-2950
School District Willoughby-Eastlake City SD

Setting: Suburban
 Site-Acreage 17.70
 Grades Housed 6-8
 Number of Teaching Stations 41
 Student Enrollment 637
 Dates of Construction 1958,1960,1962,1975

Building Square Footage 90,811
 Student Capacity 975
 Number of Floors 1

Energy Sources: Fuel Oil Gas Electric Solar
Air Conditioning: Roof Top Windows Units Central Room Units
Heating: Central Roof Top Individual Unit Forced Air
 Hot Water Steam

Type of Construction
 Load bearing masonry
 Steel frame
 Concrete frame
 Wood
 Steel Joists

Exterior Surfacing
 Brick
 Stucco
 Metal
 Wood
 Stone

Floor Construction
 Wood Joists
 Steel Joists
 Slab on grade
 Structural slab

[Back to Assessment Summary](#)

1.0 The School Site

School Facility Appraisal

		Points Allocated	Points
1.1	Site is large enough to meet educational needs as defined by state and local requirements <i>The 17.7 acre site does not meet the design manual requirement of 26.37. The campus acreage of 26.7 is adequate.</i>	25	15
1.2	Site is easily accessible and conveniently located for the present and future population <i>The site is easily accessible and conveniently located for the present and future population. The site is located in the community it serves and convenient to major circulation routes.</i>	20	18
1.3	Location is removed from undesirable business, industry, traffic, and natural hazards <i>The location is removed from undesirable business, industry, traffic and natural hazards. The site is buffered by residential lots on all sides and is well insulated from noise and hazard.</i>	10	10
1.4	Site is well landscaped and developed to meet educational needs <i>The site is moderately landscaped. Tall trees along the site perimeter provide pleasant views in all directions. Landscaped courtyards provide pleasant views and opportunities to outdoor learning.</i>	10	7
1.5	ES Well equipped playgrounds are separated from streets and parking areas MS Well equipped athletic and intermural areas are separated from streets and parking HS Well equipped athletic areas are adequate with sufficient solid-surface parking <i>Well equipped athletic and intermural areas are separated from streets and parking.</i>	10	8
1.6	Topography is varied enough to provide desirable appearance and without steep inclines <i>Topography is mostly flat, with a slight slope up to the athletic fields.</i>	5	2
1.7	Site has stable, well drained soil free of erosion <i>The soil is well drained and mostly free from erosion. Some ponding was observed near the building perimeter due to faulty roof drainage system.</i>	5	3
1.8	Site is suitable for special instructional needs , e.g., outdoor learning <i>A landscaped courtyard provides opportunity for outdoor instruction.</i>	5	3
1.9	Pedestrian services include adequate sidewalk with designated crosswalks, curb cuts, and correct slopes <i>Adequate properly sloped sidewalks, crosswalks and curb cuts are provided. Paved walks connect the site to surrounding neighborhoods.</i>	5	5
1.10	ES/MS Sufficient on-site, solid surface parking for faculty and staff is provided HS Sufficient on-site, solid surface parking is provided for faculty, students, staff and community <i>Sufficient on-site, solid surface parking is provided. The site exceeds OSDM parking requirements.</i>	5	5
TOTAL - The School Site		100	76

[Back to Assessment Summary](#)

2.0 Structural and Mechanical Features

School Facility Appraisal

Structural	Points Allocated	Points
2.1 Structure meets all barrier-free requirements both externally and internally <i>The building and structure are mostly barrier free.</i>	15	12
2.2 Roofs appear sound, have positive drainage, and are weather tight <i>The roofs leak and do not have positive drainage.</i>	15	5
2.3 Foundations are strong and stable with no observable cracks <i>Some foundation deterioration was observed.</i>	10	5
2.4 Exterior and interior walls have sufficient expansion joints and are free of deterioration <i>Exterior masonry deterioration was noted. Joints are not well provided.</i>	10	5
2.5 Entrances and exits are located so as to permit efficient student traffic flow <i>Traffic flow throughout the building is efficient with a "main street and avenue" circulation concept.</i>	10	8
2.6 Building "envelope" generally provides for energy conservation (see criteria) <i>The building envelope does not meet ASHRAE standards.</i>	10	2
2.7 Structure is free of friable asbestos and toxic materials <i>The building is reported to contain asbestos and other hazardous materials.</i>	10	2
2.8 Interior walls permit sufficient flexibility for a variety of class sizes <i>Most classrooms are undersized per design manual standards, which does not permit flexibility in class size or arrangement.</i>	10	5

Mechanical/Electrical	Points Allocated	Points
2.9 Adequate light sources are well maintained, and properly placed and are not subject to overheating <i>Most areas are maintained and properly placed while other area lighting needs repair or replaced due to being incandescent type. No lighting was noticed as being subject to overheating</i>	15	6
2.10 Internal water supply is adequate with sufficient pressure to meet health and safety requirements <i>The existing domestic water service does meet the facility's current needs. The system does not provide adequate flow capacity for the future needs of the school.</i>	15	15
2.11 Each teaching/learning area has adequate convenient wall outlets , phone and computer cabling for technology applications <i>Some up-dating has occurred in Technology for the teaching / learning areas. Still more up-dating is needed regarding outlets, phones and computer cabling.</i>	15	6

2.12	Electrical controls are safely protected with disconnect switches easily accessible	10	4
	<i>The electrical controls noticed are safely protected with disconnect switches or over current protection devices and was easily accessible but, due to the age of the equipment it does not meet the requirements of the OSDM.</i>		
2.13	Drinking fountains are adequate in number and placement, and are properly maintained including provisions for the disabled	10	10
	<i>Electric water coolers do not meet ADA requirements.</i>		
2.14	Number and size of restrooms meet requirements	10	8
	<i>The quantity of restrooms is adequate for the population served.</i>		
2.15	Drainage systems are properly maintained and meet requirements	10	10
	<i>Provide all new plumbing fixtures, faucets and flush valves to replace the existing because of ADA requirements and condition of old plumbing fixtures. Refer to item O for the additional fixture replacements.</i>		
2.16	Fire alarms, smoke detectors, and sprinkler systems are properly maintained and meet requirements	10	4
	<i>The Fire Alarm system is a zoned system which does not meet the requirements of the Ohio Design Manual. There is not a sprinkler system within this facility.</i>		
2.17	Intercommunication system consists of a central unit that allows dependable two-way communication between the office and instructional areas	10	4
	<i>Intercommunication system consists of a central unit via telephones that allow two-way communication between the Office and certain areas but, also needs replacement per the OSDM requirements.</i>		
2.18	Exterior water supply is sufficient and available for normal usage	5	5
	<i>The facility is not equipped with an automated fire suppression system, and the existing water supply will not provide adequate support for a future system.</i>		
TOTAL - Structural and Mechanical Features		200	116

[Back to Assessment Summary](#)

3.0 Plant Maintainability

School Facility Appraisal

	Points Allocated	Points
3.1 Windows, doors, and walls are of material and finish requiring minimum maintenance <i>The exterior materials are requiring more maintenance due to age and condition.</i>	15	8
3.2 Floor surfaces throughout the building require minimum care <i>Floor surfaces require little effort with care.</i>	15	12
3.3 Ceilings and walls throughout the building, including service areas, are easily cleaned and resistant to stain <i>Ceilings and walls show stains from prior roof malfunctions.</i>	10	5
3.4 Built-in equipment is designed and constructed for ease of maintenance <i>Built-in equipment is adequately provided and in fair condition.</i>	10	8
3.5 Finishes and hardware , with compatible keying system, are of durable quality <i>Door hardware is compatible with the district keying system, but some are difficult to operate.</i>	10	5
3.6 Restroom fixtures are wall mounted and of quality finish <i>Restroom fixtures are mostly wall mounted and in fair condition. They do not meet water conservation methods.</i>	10	5
3.7 Adequate custodial storage space with water and drain is accessible throughout the building <i>Storage space for custodians is adequately and conveniently located.</i>	10	9
3.8 Adequate electrical outlets and power , to permit routine cleaning, are available in every area <i>Electrical outlets and power for routine cleaning is not available in most areas due to that fact that very few outlets are provided in such areas as classrooms and none in other areas such as small toilet rooms or storage areas.</i>	10	4
3.9 Outdoor light fixtures, electrical outlets , equipment, and other fixtures are accessible for repair and replacement <i>Outdoor light fixtures are maintained and accessible for repair and / or replacement, but exterior electrical outlets are non-existent in many cases as required by the Ohio School Design Manual.</i>	10	4
<hr/>		
TOTAL - Plant Maintainability	100	60

[Back to Assessment Summary](#)

4.0 Building Safety and Security

School Facility Appraisal

Site Safety		Points Allocated	Points
4.1	<p>Student loading areas are segregated from other vehicular traffic and pedestrian walkways</p> <p><i>Student loading areas are segregated from other vehicular traffic and pedestrian walkways. A bus loop is provided.</i></p>	15	12
4.2	<p>Walkways, both on and offsite, are available for safety of pedestrians</p> <p><i>Ample walkways, both on and offsite, are available for safety of pedestrians.</i></p>	10	10
4.3	<p>Access streets have sufficient signals and signs to permit safe entrance to and exit from school area</p> <p><i>Access streets have sufficient signals and signs to permit safe entrance to and exit from school area.</i></p>	5	5
4.4	<p>Vehicular entrances and exits permit safe traffic flow</p> <p><i>Vehicular entrances and exits permit safe one-way traffic flow. Wayfinding is somewhat confusing at the vehicular entry.</i></p>	5	2
4.5	<p>ES Playground equipment is free from hazard</p> <p>MS Location and types of intramural equipment are free from hazard</p> <p>HS Athletic field equipment is properly located and is free from hazard</p> <p><i>Location and types of intramural equipment are free from hazard.</i></p>	5	5
Building Safety		Points Allocated	Points
4.6	<p>The heating unit(s) is located away from student occupied areas</p> <p><i>Heating units are located away from students.</i></p>	20	17
4.7	<p>Multi-story buildings have at least two stairways for student egress</p> <p><i>No stairways are required in this single story structure.</i></p>	15	15
4.8	<p>Exterior doors open outward and are equipped with panic hardware</p> <p><i>Exterior doors open outward and are equipped with panic hardware.</i></p>	10	9
4.9	<p>Emergency lighting is provided throughout the entire building with exit signs on separate electrical circuits</p> <p><i>Emergency lighting and exit signs are provided throughout the entire building. Exits signs have battery backup but are not on a separate electrical circuit. Some emergency units are not per the Ohio Building Code or the NEC.</i></p>	10	6
4.10	<p>Classroom doors are recessed and open outward</p> <p><i>Classroom doors are recessed and open outward, but not all are provided with proper ADA clearances.</i></p>	10	7
4.11	<p>Building security systems are provided to assure uninterrupted operation of the educational program</p>	10	4

Building security systems are provided to assure uninterrupted operation of the educational program. The system does not meet all requirements of the OSDM.

4.12	Flooring (including ramps and stairways) is maintained in a non-slip condition <i>Flooring is maintained in a non-slip condition</i>	5	5
4.13	Stair risers (interior and exterior) do not exceed 6 1/2 inches and range in number from 3 - 16 <i>This building is single story. Steps in the Music room are OBC compliant.</i>	5	5
4.14	Glass is properly located and protected with wire or safety material to prevent accidental student injury <i>Most glass provided is not safety glass.</i>	5	1
4.15	Fixed Projections in the traffic areas do not extend more than eight inches from the corridor wall <i>Fixed projections in the traffic areas do not extend more than eight inches from the corridor wall.</i>	5	5
4.16	Traffic areas terminate at an exit or a stairway leading to an egress <i>All traffic areas terminate at an exit.</i>	5	5

Emergency Safety	Points Allocated	Points	
4.17	Adequate fire safety equipment is properly located <i>Adequate fire safety equipment is properly located.</i>	15	15
4.18	There are at least two independent exits from any point in the building <i>There are at least two independent exits from any point in the building.</i>	15	15
4.19	Fire-resistant materials are used throughout the structure <i>Most materials used in the building are fire resistant.</i>	15	13
4.20	Automatic and manual emergency alarm system with a distinctive sound and flashing light is provided <i>Automatic and manual emergency alarm system with a distinctive sound is provided. Alarms are also equipped with strobe lights. The Fire Alarm System is not per the OSDM requirements.</i>	15	6
TOTAL - Building Safety and Security		200	162

[Back to Assessment Summary](#)

5.0 Educational Adequacy

School Facility Appraisal

Academic Learning Space		Points Allocated	Points
5.1	<p>Size of academic learning areas meets desirable standards</p> <p><i>Approximately two thirds of the classrooms are sized below design manual tolerances.</i></p>	25	12
5.2	<p>Classroom space permits arrangements for small group activity</p> <p><i>Classroom space permits arrangements for small group activity, although most classrooms are undersized.</i></p>	15	9
5.3	<p>Location of academic learning areas is near related educational activities and away from disruptive noise</p> <p><i>Location of academic learning areas is near related educational activities and away from disruptive noise.</i></p>	10	8
5.4	<p>Personal space in the classroom away from group instruction allows privacy time for individual students</p> <p><i>Personal space in the classroom away from group instruction allows privacy time for individual students.</i></p>	10	8
5.5	<p>Storage for student materials is adequate</p> <p><i>Storage for student materials is adequately sized, however lockers are in poor condition.</i></p>	10	5
5.6	<p>Storage for teacher materials is adequate</p> <p><i>Storage for teacher materials is adequate.</i></p>	10	8

Special Learning Space		Points Allocated	Points
5.7	<p>Size of special learning area(s) meets standards</p> <p><i>Special learning areas are slightly undersized.</i></p>	15	9
5.8	<p>Design of specialized learning area(s) is compatible with instructional need</p> <p><i>Specialized learning areas are adapted standard classrooms.</i></p>	10	6
5.9	<p>Library/Resource/Media Center provides appropriate and attractive space</p> <p><i>Library is spacious but not particularly attractive.</i></p>	10	5
5.10	<p>Gymnasium (or covered P.E. area) adequately serves physical education instruction</p> <p><i>Gymnasium is undersized but pleasant in appearance.</i></p>	5	2
5.11	<p>ES Pre-kindergarten and kindergarten space is appropriate for age of students and nature of instruction</p> <p>MS/HS Science program is provided sufficient space and equipment</p> <p><i>Appropriate fixtures and casework are not provided for science labs.</i></p>	10	3

5.12	Music Program is provided adequate sound treated space <i>Music spaces have some acoustical treatment, though sound was noted mitigating through the space.</i>	5	3
5.13	Space for art is appropriate for special instruction, supplies, and equipment <i>Space for art is appropriate for special instruction, supplies and equipment. A kiln is not provided.</i>	5	3

School Facility Appraisal

		Points Allocated	Points
5.14	Space for technology education permits use of state-of-the-art equipment <i>Space for technology education permits use of state-of-the-art equipment.</i>	5	4
5.15	Space for small groups and remedial instruction is provided adjacent to classrooms <i>Space for small groups and remedial instruction is not provided.</i>	5	1
5.16	Storage for student and teacher material is adequate <i>Material storage is generally adequate.</i>	5	4

Support Space

		Points Allocated	Points
5.17	Teacher's lounge and work areas reflect teachers as professionals <i>Teacher's lounge and work areas reflect teachers as professionals.</i>	10	9
5.18	Cafeteria/Kitchen is attractive with sufficient space for seating/dining, delivery, storage, and food preparation <i>Kitchen is undersized. Cafeteria is open and attractive and provides sufficient dining space.</i>	10	6
5.19	Administrative offices provided are consistent in appearance and function with the maturity of the students served <i>Administrative offices provided are consistent in appearance and function with the maturity of the students served.</i>	5	4
5.20	Counselor's office insures privacy and sufficient storage <i>Counselor's office is sufficiently sized, however its location adjacent to a major building entry may compromise privacy.</i>	5	2
5.21	Clinic is near administrative offices and is equipped to meet requirements <i>Clinic is near administrative offices and is equipped to meet requirements. Clinic toilet room is handicap accessible.</i>	5	5
5.22	Suitable reception space is available for students, teachers, and visitors <i>Suitable reception space is available for students, teachers and visitors.</i>	5	5
5.23	Administrative personnel are provided sufficient work space and privacy <i>Administrative personnel are provided sufficient work space and privacy.</i>	5	4

TOTAL - Educational Adequacy

200

125

[Back to Assessment Summary](#)

6.0 Environment for Education

School Facility Appraisal

Exterior Environment	Points Allocated	Points
<p>6.1 Overall design is aesthetically pleasing to age of students</p> <p><i>The overall design reflects a 1960s design aesthetic with natural light as a design feature.</i></p>	15	12
<p>6.2 Site and building are well landscaped</p> <p><i>Site and building are moderately landscaped. A well landscaped courtyard provides pleasant views.</i></p>	10	8
<p>6.3 Exterior noise and poor environment do not disrupt learning</p> <p><i>Exterior noise and poor environment do not disrupt learning. The site is well insulated from traffic noise.</i></p>	10	9
<p>6.4 Entrances and walkways are sheltered from sun and inclement weather</p> <p><i>Entrances are sheltered by canopies in poor condition. Walkways are not sheltered.</i></p>	10	5
<p>6.5 Building materials provide attractive color and texture</p> <p><i>Building materials provide attractive color and texture.</i></p>	5	4

Interior Environment	Points Allocated	Points
<p>6.6 Color schemes, building materials, and decor provide an impetus to learning</p> <p><i>The color palette is dark and dated. Floor tiles are mismatched.</i></p>	20	10
<p>6.7 Year around comfortable temperature and humidity are provided throughout the building</p> <p><i>Year round temperature comfort is not well provided.</i></p>	15	5
<p>6.8 Ventilating system provides adequate quiet circulation of clean air and meets 15cfm VBC requirement</p> <p><i>Ventilation is not well provided.</i></p>	15	5
<p>6.9 Lighting system provides proper intensity, diffusion, and distribution of illumination</p> <p><i>Lighting system does not provide proper intensity, diffusion and distribution of illumination. The corridors are not adequately illuminated.</i></p>	15	6
<p>6.10 Drinking fountains and restroom facilities are conveniently located</p> <p><i>Drinking fountains and restroom facilities are conveniently located.</i></p>	15	12
<p>6.11 Communication among students is enhanced by commons area(s) for socialization</p> <p><i>Communication among students is enhanced by common areas for socialization. Wide corridors and an open cafeteria space provide ample space for student interaction.</i></p>	10	10
<p>6.12 Traffic flow is aided by appropriate foyers and corridors</p>	10	9

Traffic flow is aided by appropriate foyers and corridors.

6.13	Areas for students to interact are suitable to the age group <i>Areas for students to interact are suitable to the age group.</i>	10	9
6.14	Large group areas are designed for effective management of students <i>Large group areas are designed for effective management of students.</i>	10	9
6.15	Acoustical treatment of ceilings, walls, and floors provides effective sound control <i>Acoustical tiles provide some sound control.</i>	10	7
6.16	Window design contributes to a pleasant environment <i>Window design contributes to a pleasant environment. All classrooms and some corridors and other spaces are daylight.</i>	10	9
6.17	Furniture and equipment provide a pleasing atmosphere <i>The furniture is mismatched, but consistent to each room.</i>	10	7

TOTAL - Environment for Education

200

136

[Back to Assessment Summary](#)

LEED Observation Notes

School District: Willoughby-Eastlake City SD
County: Lake
School District IRN: 45104
Building: Willowick Middle School
Building IRN: 41525

Sustainable Sites

Construction process can have a harmful effect on local ecology, especially when buildings are build on productive agricultural, wildlife or open areas. Several measures can be take however to prevent the impact on undeveloped lands or to improve previously contaminated sites. Appropriate location reduces the need for private transportation and helps to prevent an increase in air pollution. Developing buildings in urban areas and on brownfield sites instead of greenfield locations has economical and environmental benefits. Controlling stormwater runoff and erosion can prevent the worsening of water quality in receiving bodies of water and the impact on aquatic life. Once the building is constructed, it's important to decrease heat island effects and reduce the light pollution on the site.

(source: LEED Reference Guide, 2001:9)

Construction activity pollution prevention can be successfully managed on this site. The building is known to contain hazardous materials. The site is not known to be prime agricultural farmland, within a flood plain, habitat for an endangered species, within or near a wetland, or near a previously undeveloped body of water. The site is not within a community having a density of more than 60,000 square feet per acre. The site is not located on a previously developed site within 1/2 mile of a residential area with density of more than 10 units per acre. The site is not located within 1/2 mile of 10 basic services. The site does not have pedestrian access between the school and basic services. The site is not a brownfield. The site is not located within 1/4 mile walking of a bus stop or 1/2 mile walking of a rail station. School busses do have a dedicated lane on site. The site does have sufficient bicycle storage but lacks changing facilities. The site does not have dedicated parking for fuel efficient or low emitting vehicles. The site meets exceeds current OSDM parking requirements. The site does have sufficient area to restore 50% to a natural state. The site has more than 20% vegetative spaces. Storm water management and detention is not mitigated through storm sewers and catch basins. The hard surfaces of the site do not meet the high albedo reflectance requirements to mitigate heat island effect. The roof material does not meet the high albedo reflectance requirement to mitigate heat island effect. Light pollution on the site is created from parking fixtures. The site has sufficient area to create a master plan with stormwater management, open space, parking capacity, and heat island non-roof. The property is used by the community during or after hours.

characters remaining in Sustainable Sites.

Water Efficiency

In the US ca. 340 billion gallons of fresh water are withdrawn daily from surface sources, 65% of which is discharged later after use. Water is also withdrawn from underground aquifers The excessive usage of water results in the current water deficit, estimated at 3,700 billion gallons. Water efficiency measures in commercial buildings can reduce water usage by at least 30%. Low-flow fixtures, sensors or using non potable water for landscape irrigation, toilet flushing and building systems are just some of available strategies. Not only do they result in environmental savings, but also bring about financial benefits, related to lower water use fees, lower sewage volumes to treat and energy use reductions.

(source: LEED Reference Guide, 2001:65)

The building plumbing fixtures are not water conserving models. The site does not irrigate. Recommendations in items E, Q and R enhance water use reduction targets. A baseline water use report is required for LEED credits in this category.

characters remaining in Water Efficiency.

Energy & Atmosphere

Buildings in the US account for more than 30% of the total energy use and for approximately 60% of electricity. 75% of energy is derived from the burning of fossil fuels, which releases CO2 into the Atmosphere and contributes to global warming. Moreover, coal fired electric utilities release nitrogen oxides and sulfur dioxide, where the former contribute to smog and the latter to acid rain. Other types of energy production are not less harmful. Burning of natural gas produces nitrogen oxides and greenhouse gases as well, nuclear power creates nuclear wastes, while hydroelectric generating plants disrupt natural water flows. Luckily there are several practices that can reduce energy consumption and are environmentally and economically beneficial. Not only will they reduce the air pollution and mitigate global warming thanks to being less dependent on power plants, but also they will reduce operational costs and will quickly pay back. In order to make the most of those practices, it's important to adopt a holistic approach to the building's energy load and integrate different energy saving strategies.

(source: LEED Reference Guide, 2001:93)

An energy audit or fundamental commissioning of the system is required for a baseline for any energy optimization measures. The system does contain any equipment with CFCs or HCFCs. The building does not comply with current ASHRAE envelop standards. The system does not comply with current energy consumption requirements. Renewable energy appliances are not present on the site. The property does have sufficient area for wind turbines. The building does have sufficient roof area for solar panels. The building has a measurement and verification plan in place. The building does not purchase green power.

characters remaining in Energy & Atmosphere.

Material & Resources

The steps related to process building materials, such as extraction, processing and transportation are not environmentally natural, as they pollute the air, water and use natural resources. Construction and demolition wastes account for 40% of the solid waste stream in the US. Reusing existing documents is one of the best strategies to reduce solid wastes volumes and prevents them from ending up at landfills. It also reduces habitat disturbance and minimizes the need for the surrounding infrastructure. While using new materials one should take into account different material sources. Salvaged materials provide savings on material costs, recycled content material minimizes waste products and local materials reduce the environmental impact of transportation. Finally, using rapidly renewable materials and certified wood decreases the consumption of natural resources. Recycling and reusing construction waste is another strategy to be taken into consideration in sustainable design.

(source: LEED Reference Guide, 2001:167)

The building does have an area for the collection of recyclables. The building shell is viable for renovation. The interior partitions are not viable for renovation. The classrooms do meet OSDM standards. No comments relating to construction credits for recycled content, regional products, rapidly renewable materials, or certified wood are included.

characters remaining in Material & Resources.

Indoor Environmental Quality

As we spend a big majority of our time indoors, the emphasis should be put on optimal indoor environmental quality strategies while (re)designing a building . Otherwise, a poor IEQ will have adverse effects on occupants' health, productivity and quality of life. IEQ strategies such as ventilation effectiveness and control of contaminants or a building flush-out prior to occupancy can reduce potential liability, increase the market value of the building but can also result in a significantly higher productivity (16%). Other strategies involve automatic sensors and controls, introducing fresh air to the building or providing lots of daylighting views.

(source: LEED Reference Guide, 2001:215)

The building does not meet the ASHRAE standards for indoor air quality. Smoking is not permitted on site. The building has adequate acoustical separation of spaces. Outdoor air monitoring is not provided. Fresh air intake is through roof and side wall ventilators. The building ventilation is inadequate. Refer to items A and C for additional information. Individual controls for thermal comfort and lighting levels are provided. The building does not meet ASHRAE standards for thermal comfort levels. The building does not have a thermal comfort verification plan in place. The building does have daylight, but calculations are required to verify that it meets the 35 foot candle LEED requirement for classrooms and other occupied spaces. The building does not have a system in place for mold prevention.

characters remaining in Indoor Environmental Quality.

Innovation & Design Process

This category is aimed at recognizing projects that implemented innovative building features and sustainable building knowledge, and whose strategy or measure results exceeded those which are required by the LEED Rating System. Expertise in sustainable design is the key element of the innovative design and construction process.

(source: LEED Reference Guide, 2001:271)

The school is within the region CGB271 Urban-Rural which capitalizes on credits pertaining to site storm water management quality and quantity, wastewater innovation, renewable energy, construction waste management, and rapidly renewable materials.

characters remaining in Innovation & Design Process.

Justification for Allocation of Points

Building Name and Level: **Willowick Middle School**

6-8

Building features that clearly exceed criteria:

1. The site is located in a quiet and pleasant residential area and is well insulated from noise and traffic.
2. Parking provided exceeds design manual requirements.
3. Student dining area is large, daylit, open and pleasant.
4. The building has a large community room adjacent to the dining area suitable for social activities.
5. Classrooms and corridors utilize borrowed light.
6. The building has attractive enclosed and partially enclosed courtyards which provide daylight and views for many classrooms and corridors.

Building features that are non-existent or very inadequate:

1. The building contains asbestos and other hazardous materials.
2. The roof has problems with leaking and is overdue for replacement.
3. The windows are drafty and are neither weathertight nor insulated.
4. Locker room facilities are underutilized.
5. The Gymnasium is undersized.
6. The Kitchen and serving areas are undersized.

[Back to Assessment Summary](#)

Environmental Hazards Assessment Cost Estimates

Owner:	Willoughby-Eastlake City SD
Facility:	Willowick Middle School
Date of Initial Assessment:	Mar 16, 2010
Date of Assessment Update:	Jun 23, 2010
Cost Set:	2010

District IRN:	45104
Building IRN:	41525
Firm:	The Collaborative, Inc.

Scope remains unchanged after cost updates.

Building Addition	Addition Area (sf)	Total of Environmental Hazards Assessment Cost Estimates	
		Renovation	Demolition
1958 1958 Original	53,910	\$111,627.00	\$3,000.00
1960 1960 Addition	20,494	\$47,100.00	\$1,200.00
1962 1962 Addition	13,547	\$30,480.00	\$0.00
1975 1975 Addition	2,860	\$6,006.00	\$0.00
Total	90,811	\$195,213.00	\$4,200.00
Total with Regional Cost Factor (104.16%)		\$203,333.86	\$4,374.72
Regional Total with Soft Costs & Contingency		\$253,008.93	\$5,443.48

Building Summary - Willowick Middle School (41525)

District: Willoughby-Eastlake City SD				County: Lake		Area: Northeastern Ohio (8)	
Name: Willowick Middle School				Contact: Ms. Lori Rodman			
Address: 31500 Royalview Dr Willowick, OH 44095				Phone: 440/943-2950			
Bldg. IRN: 41525				Date Prepared: 2010-03-16		By: Karen L Walker	
				Date Revised: 2010-06-23		By: Karen L Walker	
Current Grades		6-8	Acreage:		17.70		
Proposed Grades		N/A	Teaching Stations:		41		
Current Enrollment		637	Classrooms:		39		
Projected Enrollment		N/A					
Addition		Date	HA	Number of Floors	Current Square Feet		
<u>1958 Original</u>		1958	no	1	53,910		
<u>1960 Addition</u>		1960	no	1	20,494		
<u>1962 Addition</u>		1962	no	1	13,547		
<u>1975 Addition</u>		1975	no	1	2,860		
Total					90,811		
*HA		= Handicapped Access					
*Rating		=1 Satisfactory					
		=2 Needs Repair					
		=3 Needs Replacement					
*Const P/S		= Present/Scheduled Construction					
FACILITY ASSESSMENT				Rating		Dollar Assessment	
Cost Set: 2010						C	
A. <u>Heating System</u>		3		\$2,951,357.50		Renovation Cost Factor	
B. <u>Roofing</u>		3		\$1,522,446.47		Cost to Renovate (Cost Factor applied)	
C. <u>Ventilation / Air Conditioning</u>		1		\$5,000.00		104.16%	
D. <u>Electrical Systems</u>		3		\$1,572,846.52		\$16,136,873.37	
E. <u>Plumbing and Fixtures</u>		3		\$963,077.00		-	
F. <u>Windows</u>		3		\$601,979.12		-	
G. <u>Structure: Foundation</u>		2		\$10,000.00		-	
H. <u>Structure: Walls and Chimneys</u>		2		\$102,743.00		-	
I. <u>Structure: Floors and Roofs</u>		1		\$0.00		-	
J. <u>General Finishes</u>		3		\$1,577,336.58		-	
K. <u>Interior Lighting</u>		3		\$454,055.00		-	
L. <u>Security Systems</u>		3		\$249,730.25		-	
M. <u>Emergency/Egress Lighting</u>		3		\$90,811.00		-	
N. <u>Fire Alarm</u>		3		\$136,216.50		-	
O. <u>Handicapped Access</u>		2		\$349,445.10		-	
P. <u>Site Condition</u>		2		\$391,943.70		-	
Q. <u>Sewage System</u>		3		\$67,500.00		-	
R. <u>Water Supply</u>		3		\$60,000.00		-	
S. <u>Exterior Doors</u>		3		\$56,500.00		-	
T. <u>Hazardous Material</u>		3		\$195,213.00		-	
U. <u>Life Safety</u>		3		\$295,135.75		-	
V. <u>Loose Furnishings</u>		2		\$181,622.00		-	
W. <u>Technology</u>		3		\$615,698.58		-	
- X. <u>Construction Contingency / Non-Construction Cost</u>		-		\$3,041,732.87		-	
Total						\$15,492,389.94	

CEFPI Appraisal Summary					
Section	Points Possible	Points Earned	Percentage	Rating	Category
<u>Cover Sheet</u>					
1.0 <u>The School Site</u>	100	76	76%	Satisfactory	
2.0 <u>Structural and Mechanical Features</u>	200	116	58%	Borderline	
3.0 <u>Plant Maintainability</u>	100	60	60%	Borderline	
4.0 <u>Building Safety and Security</u>	200	162	81%	Satisfactory	
5.0 <u>Educational Adequacy</u>	200	125	63%	Borderline	
6.0 <u>Environment for Education</u>	200	136	68%	Borderline	
<u>LEED Observations</u>					
<u>Commentary</u>					
Total	1000	675	68%	Borderline	

<u>Enhanced Environmental Hazards Assessment Cost Estimates</u>			
C=Under Contract			
Renovation Cost Factor			104.16%
Cost to Renovate (Cost Factor applied)			\$16,136,873.37
<i>The Replacement Cost Per SF and the Renovate/Replace ratio are only provided when this summary is requested from a Master Plan.</i>			

[Previous Page](#)

Environmental Hazards - Willoughby-Eastlake City SD (45104) - Willowick Middle School (41525) - 1958 Original

Owner: Willoughby-Eastlake City SD Bldg. IRN: 41525
 Facility: Willowick Middle School BuildingAdd: 1958 Original
 Date: Consultant Name:

A. Asbestos Containing Material (ACM)		AFM=Asbestos Free Material		
ACM Found	Status	Quantity	Unit Cost	Estimated Cost
1. Boiler/Furnace Insulation Removal	Not Present	0	\$10.00	\$0.00
2. Breeching Insulation Removal	Not Present	0	\$10.00	\$0.00
3. Tank Insulation Removal	Not Present	0	\$8.00	\$0.00
4. Duct Insulation Removal	Not Present	0	\$8.00	\$0.00
5. Pipe Insulation Removal	Assumed Asbestos-Containing Material	200	\$10.00	\$2,000.00
6. Pipe Fitting Insulation Removal	Assumed Asbestos-Containing Material	50	\$20.00	\$1,000.00
7. Pipe Insulation Removal (Crawlspace/Tunnel)	Not Present	0	\$12.00	\$0.00
8. Pipe Fitting Insulation Removal (Crawlspace/Tunnel)	Not Present	0	\$30.00	\$0.00
9. Pipe Insulation Removal (Hidden in Walls/Ceilings)	Not Present	0	\$15.00	\$0.00
10. Dismantling of Boiler/Furnace/Incinerator	Not Present	0	\$2,000.00	\$0.00
11. Flexible Duct Connection Removal	Not Present	0	\$100.00	\$0.00
12. Acoustical Plaster Removal	Not Present	0	\$7.00	\$0.00
13. Fireproofing Removal	Not Present	0	\$15.00	\$0.00
14. Hard Plaster Removal	Not Present	0	\$7.00	\$0.00
15. Gypsum Board Removal	Not Present	0	\$6.00	\$0.00
16. Acoustical Panel/Tile Ceiling Removal	Not Present	0	\$3.00	\$0.00
17. Laboratory Table/Counter Top Removal	Not Present	0	\$100.00	\$0.00
18. Cement Board Removal	Not Present	0	\$5.00	\$0.00
19. Electric Cord Insulation Removal	Not Present	0	\$1.00	\$0.00
20. Light (Reflector) Fixture Removal	Not Present	0	\$50.00	\$0.00
21. Sheet Flooring with Friable Backer Removal	Not Present	0	\$4.00	\$0.00
22. Fire Door Removal	Not Present	0	\$100.00	\$0.00
23. Door and Window Panel Removal	Not Present	0	\$100.00	\$0.00
24. Decontamination of Crawlspace/Chase/Tunnel	Not Present	0	\$3.00	\$0.00
25. Soil Removal	Not Present	0	\$150.00	\$0.00
26. Non-ACM Ceiling/Wall Removal (for access)	Not Present	0	\$2.00	\$0.00
27. Window Component (Compound, Tape, or Caulk) - Reno & Demo	Not Present	0	\$300.00	\$0.00
28. Window Component (Compound, Tape, or Caulk) - Reno Only	Not Present	0	\$300.00	\$0.00
29. Resilient Flooring Removal, Including Mastic	Reported Asbestos-Containing Material	36209	\$3.00	\$108,627.00
30. Carpet Mastic Removal	Not Present	0	\$2.00	\$0.00
31. Carpet Removal (over RFC)	Not Present	0	\$1.00	\$0.00
32. Acoustical Tile Mastic Removal	Not Present	0	\$3.00	\$0.00
33. Sink Undercoating Removal	Not Present	0	\$100.00	\$0.00
34. Roofing Removal	Not Present	0	\$2.00	\$0.00
35. (Sum of Lines 1-34)	Total Asb. Hazard Abatement Cost for Renovation Work			\$111,627.00
36. (Sum of Lines 1-27)	Total Asb. Hazard Abatement Cost for Demolition Work			\$3,000.00

B. Removal Of Underground Storage Tanks <input type="checkbox"/> None Reported					
Tank No.	Location	Age	Product Stored	Size	Est.Rem.Cost
1. (Sum of Lines 1-0)	Total Cost For Removal Of Underground Storage Tanks				\$0.00

C. Lead-Based Paint (LBP) - Renovation Only <input type="checkbox"/> Addition Constructed after 1980	
1. Estimated Cost For Abatement Contractor to Perform Lead Mock-Ups	\$0.00
2. Special Engineering Fees for LBP Mock-Ups	\$0.00
3. (Sum of Lines 1-2)	Total Cost for Lead-Based Paint Mock-Ups \$0.00

D. Fluorescent Lamps & Ballasts Recycling/Incineration <input type="checkbox"/> Not Applicable			
Area Of Building Addition	Square Feet w/Fluorescent Lamps & Ballasts	Unit Cost	Total Cost
1. 53910	0	\$0.10	\$0.00

E. Other Environmental Hazards/Remarks <input type="checkbox"/> None Reported		
Description	Cost Estimate	
1. (Sum of Lines 1-0)	Total Cost for Other Environmental Hazards - Renovation	\$0.00
2. (Sum of Lines 1-0)	Total Cost for Other Environmental Hazards - Demolition	\$0.00

F. Environmental Hazards Assessment Cost Estimate Summaries		
1. A35, B1, C3, D1, and E1	Total Cost for Env. Hazards Work - Renovation	\$111,627.00
2. A36, B1, D1, and E2	Total Cost for Env. Hazards Work - Demolition	\$3,000.00

* INSPECTION ASSUMPTIONS for Reported/Assumed Asbestos-Free Materials (Rep/Asm AFM):

- a. Unless reported otherwise by the District, materials installed after 1980 are assumed to be asbestos-free.
- b. Unless reported otherwise by the District, small quantities (less than 1,000 square feet) of the following materials are assumed to be asbestos free: hard plaster, acoustical plaster and gypsum board systems; acoustical panels and tiles; fireproofing; 12"x12" floor tile and mastic.
- c. Unless reported otherwise by the District, all roofing materials are assumed to be asbestos-free.

THESE MATERIALS SHOULD BE PROPERLY SAMPLED AND ANALYZED FOR ASBESTOS PRIOR TO DISTURBING THEM.

Environmental Hazards - Willoughby-Eastlake City SD (45104) - Willowick Middle School (41525) - 1960 Addition

Owner: Willoughby-Eastlake City SD
Facility: Willowick Middle School
Date:

Bldg. IRN: 41525
BuildingAdd: 1960 Addition
Consultant Name:

A. Asbestos Containing Material (ACM)		AFM=Asbestos Free Material		
ACM Found	Status	Quantity	Unit Cost	Estimated Cost
1. Boiler/Furnace Insulation Removal	Not Present	0	\$10.00	\$0.00
2. Breeching Insulation Removal	Not Present	0	\$10.00	\$0.00
3. Tank Insulation Removal	Not Present	0	\$8.00	\$0.00
4. Duct Insulation Removal	Not Present	0	\$8.00	\$0.00
5. Pipe Insulation Removal	Assumed Asbestos-Containing Material	100	\$10.00	\$1,000.00
6. Pipe Fitting Insulation Removal	Assumed Asbestos-Containing Material	10	\$20.00	\$200.00
7. Pipe Insulation Removal (Crawlspace/Tunnel)	Not Present	0	\$12.00	\$0.00
8. Pipe Fitting Insulation Removal (Crawlspace/Tunnel)	Not Present	0	\$30.00	\$0.00
9. Pipe Insulation Removal (Hidden in Walls/Ceilings)	Not Present	0	\$15.00	\$0.00
10. Dismantling of Boiler/Furnace/Incinerator	Not Present	0	\$2,000.00	\$0.00
11. Flexible Duct Connection Removal	Not Present	0	\$100.00	\$0.00
12. Acoustical Plaster Removal	Not Present	0	\$7.00	\$0.00
13. Fireproofing Removal	Not Present	0	\$15.00	\$0.00
14. Hard Plaster Removal	Not Present	0	\$7.00	\$0.00
15. Gypsum Board Removal	Not Present	0	\$6.00	\$0.00
16. Acoustical Panel/Tile Ceiling Removal	Not Present	0	\$3.00	\$0.00
17. Laboratory Table/Counter Top Removal	Not Present	0	\$100.00	\$0.00
18. Cement Board Removal	Not Present	0	\$5.00	\$0.00
19. Electric Cord Insulation Removal	Not Present	0	\$1.00	\$0.00
20. Light (Reflector) Fixture Removal	Not Present	0	\$50.00	\$0.00
21. Sheet Flooring with Friable Backer Removal	Not Present	0	\$4.00	\$0.00
22. Fire Door Removal	Not Present	0	\$100.00	\$0.00
23. Door and Window Panel Removal	Not Present	0	\$100.00	\$0.00
24. Decontamination of Crawlspace/Chase/Tunnel	Not Present	0	\$3.00	\$0.00
25. Soil Removal	Not Present	0	\$150.00	\$0.00
26. Non-ACM Ceiling/Wall Removal (for access)	Not Present	0	\$2.00	\$0.00
27. Window Component (Compound, Tape, or Caulk) - Reno & Demo	Not Present	0	\$300.00	\$0.00
28. Window Component (Compound, Tape, or Caulk) - Reno Only	Not Present	0	\$300.00	\$0.00
29. Resilient Flooring Removal, Including Mastic	Reported Asbestos-Containing Material	15300	\$3.00	\$45,900.00
30. Carpet Mastic Removal	Not Present	0	\$2.00	\$0.00
31. Carpet Removal (over RFC)	Not Present	0	\$1.00	\$0.00
32. Acoustical Tile Mastic Removal	Not Present	0	\$3.00	\$0.00
33. Sink Undercoating Removal	Not Present	0	\$100.00	\$0.00
34. Roofing Removal	Not Present	0	\$2.00	\$0.00
35. (Sum of Lines 1-34)	Total Asb. Hazard Abatement Cost for Renovation Work			\$47,100.00
36. (Sum of Lines 1-27)	Total Asb. Hazard Abatement Cost for Demolition Work			\$1,200.00

B. Removal Of Underground Storage Tanks <input type="checkbox"/> None Reported					
Tank No.	Location	Age	Product Stored	Size	Est.Rem.Cost
1. (Sum of Lines 1-0)	Total Cost For Removal Of Underground Storage Tanks				\$0.00

C. Lead-Based Paint (LBP) - Renovation Only <input type="checkbox"/> Addition Constructed after 1980	
1. Estimated Cost For Abatement Contractor to Perform Lead Mock-Ups	\$0.00
2. Special Engineering Fees for LBP Mock-Ups	\$0.00
3. (Sum of Lines 1-2)	Total Cost for Lead-Based Paint Mock-Ups \$0.00

D. Fluorescent Lamps & Ballasts Recycling/Incineration <input type="checkbox"/> Not Applicable			
Area Of Building Addition	Square Feet w/Fluorescent Lamps & Ballasts	Unit Cost	Total Cost
1. 20494	0	\$0.10	\$0.00

E. Other Environmental Hazards/Remarks <input type="checkbox"/> None Reported		
Description	Cost Estimate	
1. (Sum of Lines 1-0)	Total Cost for Other Environmental Hazards - Renovation \$0.00	
2. (Sum of Lines 1-0)	Total Cost for Other Environmental Hazards - Demolition \$0.00	

F. Environmental Hazards Assessment Cost Estimate Summaries		
1. A35, B1, C3, D1, and E1	Total Cost for Env. Hazards Work - Renovation	\$47,100.00
2. A36, B1, D1, and E2	Total Cost for Env. Hazards Work - Demolition	\$1,200.00

* INSPECTION ASSUMPTIONS for Reported/Assumed Asbestos-Free Materials (Rep/Asm AFM):

- a. Unless reported otherwise by the District, materials installed after 1980 are assumed to be asbestos-free.
- b. Unless reported otherwise by the District, small quantities (less than 1,000 square feet) of the following materials are assumed to be asbestos free: hard plaster, acoustical plaster and gypsum board systems; acoustical panels and tiles; fireproofing; 12"x12" floor tile and mastic.
- c. Unless reported otherwise by the District, all roofing materials are assumed to be asbestos-free.

THESE MATERIALS SHOULD BE PROPERLY SAMPLED AND ANALYZED FOR ASBESTOS PRIOR TO DISTURBING THEM.

Environmental Hazards - Willoughby-Eastlake City SD (45104) - Willowick Middle School (41525) - 1962 Addition

Owner: Willoughby-Eastlake City SD **Bldg. IRN:** 41525
Facility: Willowick Middle School **BuildingAdd:** 1962 Addition
Date: **Consultant Name:**

A. Asbestos Containing Material (ACM)		AFM=Asbestos Free Material		
ACM Found	Status	Quantity	Unit Cost	Estimated Cost
1. Boiler/Furnace Insulation Removal	Not Present	0	\$10.00	\$0.00
2. Breeching Insulation Removal	Not Present	0	\$10.00	\$0.00
3. Tank Insulation Removal	Not Present	0	\$8.00	\$0.00
4. Duct Insulation Removal	Not Present	0	\$8.00	\$0.00
5. Pipe Insulation Removal	Not Present	0	\$10.00	\$0.00
6. Pipe Fitting Insulation Removal	Not Present	0	\$20.00	\$0.00
7. Pipe Insulation Removal (Crawlspace/Tunnel)	Not Present	0	\$12.00	\$0.00
8. Pipe Fitting Insulation Removal (Crawlspace/Tunnel)	Not Present	0	\$30.00	\$0.00
9. Pipe Insulation Removal (Hidden in Walls/Ceilings)	Not Present	0	\$15.00	\$0.00
10. Dismantling of Boiler/Furnace/Incinerator	Not Present	0	\$2,000.00	\$0.00
11. Flexible Duct Connection Removal	Not Present	0	\$100.00	\$0.00
12. Acoustical Plaster Removal	Not Present	0	\$7.00	\$0.00
13. Fireproofing Removal	Not Present	0	\$15.00	\$0.00
14. Hard Plaster Removal	Not Present	0	\$7.00	\$0.00
15. Gypsum Board Removal	Not Present	0	\$6.00	\$0.00
16. Acoustical Panel/Tile Ceiling Removal	Not Present	0	\$3.00	\$0.00
17. Laboratory Table/Counter Top Removal	Not Present	0	\$100.00	\$0.00
18. Cement Board Removal	Not Present	0	\$5.00	\$0.00
19. Electric Cord Insulation Removal	Not Present	0	\$1.00	\$0.00
20. Light (Reflector) Fixture Removal	Not Present	0	\$50.00	\$0.00
21. Sheet Flooring with Friable Backer Removal	Not Present	0	\$4.00	\$0.00
22. Fire Door Removal	Not Present	0	\$100.00	\$0.00
23. Door and Window Panel Removal	Not Present	0	\$100.00	\$0.00
24. Decontamination of Crawlspace/Chase/Tunnel	Not Present	0	\$3.00	\$0.00
25. Soil Removal	Not Present	0	\$150.00	\$0.00
26. Non-ACM Ceiling/Wall Removal (for access)	Not Present	0	\$2.00	\$0.00
27. Window Component (Compound, Tape, or Caulk) - Reno & Demo	Not Present	0	\$300.00	\$0.00
28. Window Component (Compound, Tape, or Caulk) - Reno Only	Not Present	0	\$300.00	\$0.00
29. Resilient Flooring Removal, Including Mastic	Reported Asbestos-Containing Material	10160	\$3.00	\$30,480.00
30. Carpet Mastic Removal	Not Present	0	\$2.00	\$0.00
31. Carpet Removal (over RFC)	Not Present	0	\$1.00	\$0.00
32. Acoustical Tile Mastic Removal	Not Present	0	\$3.00	\$0.00
33. Sink Undercoating Removal	Not Present	0	\$100.00	\$0.00
34. Roofing Removal	Not Present	0	\$2.00	\$0.00
35. (Sum of Lines 1-34)	Total Asb. Hazard Abatement Cost for Renovation Work			\$30,480.00
36. (Sum of Lines 1-27)	Total Asb. Hazard Abatement Cost for Demolition Work			\$0.00

B. Removal Of Underground Storage Tanks <input type="checkbox"/> None Reported					
Tank No.	Location	Age	Product Stored	Size	Est.Rem.Cost
1. (Sum of Lines 1-0)	Total Cost For Removal Of Underground Storage Tanks				\$0.00

C. Lead-Based Paint (LBP) - Renovation Only <input type="checkbox"/> Addition Constructed after 1980				
1. Estimated Cost For Abatement Contractor to Perform Lead Mock-Ups				\$0.00
2. Special Engineering Fees for LBP Mock-Ups				\$0.00
3. (Sum of Lines 1-2)	Total Cost for Lead-Based Paint Mock-Ups			\$0.00

D. Fluorescent Lamps & Ballasts Recycling/Incineration <input type="checkbox"/> Not Applicable				
Area Of Building Addition	Square Feet w/Fluorescent Lamps & Ballasts	Unit Cost	Total Cost	
1. 13547	0	\$0.10	\$0.00	

E. Other Environmental Hazards/Remarks <input type="checkbox"/> None Reported			
	Description	Cost Estimate	
1. (Sum of Lines 1-0)	Total Cost for Other Environmental Hazards - Renovation	\$0.00	
2. (Sum of Lines 1-0)	Total Cost for Other Environmental Hazards - Demolition	\$0.00	

F. Environmental Hazards Assessment Cost Estimate Summaries			
1. A35, B1, C3, D1, and E1	Total Cost for Env. Hazards Work - Renovation		\$30,480.00
2. A36, B1, D1, and E2	Total Cost for Env. Hazards Work - Demolition		\$0.00

* INSPECTION ASSUMPTIONS for Reported/Assumed Asbestos-Free Materials (Rep/Asm AFM):

- a. Unless reported otherwise by the District, materials installed after 1980 are assumed to be asbestos-free.
- b. Unless reported otherwise by the District, small quantities (less than 1,000 square feet) of the following materials are assumed to be asbestos free: hard plaster, acoustical plaster and gypsum board systems; acoustical panels and tiles; fireproofing; 12"x12" floor tile and mastic.
- c. Unless reported otherwise by the District, all roofing materials are assumed to be asbestos-free.

THESE MATERIALS SHOULD BE PROPERLY SAMPLED AND ANALYZED FOR ASBESTOS PRIOR TO DISTURBING THEM.

Environmental Hazards - Willoughby-Eastlake City SD (45104) - Willowick Middle School (41525) - 1975 Addition

Owner: Willoughby-Eastlake City SD
Facility: Willowick Middle School
Date:

Bldg. IRN: 41525
BuildingAdd: 1975 Addition
Consultant Name:

A. Asbestos Containing Material (ACM)		AFM=Asbestos Free Material		
ACM Found	Status	Quantity	Unit Cost	Estimated Cost
1. Boiler/Furnace Insulation Removal	Not Present	0	\$10.00	\$0.00
2. Breeching Insulation Removal	Not Present	0	\$10.00	\$0.00
3. Tank Insulation Removal	Not Present	0	\$8.00	\$0.00
4. Duct Insulation Removal	Not Present	0	\$8.00	\$0.00
5. Pipe Insulation Removal	Not Present	0	\$10.00	\$0.00
6. Pipe Fitting Insulation Removal	Not Present	0	\$20.00	\$0.00
7. Pipe Insulation Removal (Crawlspace/Tunnel)	Not Present	0	\$12.00	\$0.00
8. Pipe Fitting Insulation Removal (Crawlspace/Tunnel)	Not Present	0	\$30.00	\$0.00
9. Pipe Insulation Removal (Hidden in Walls/Ceilings)	Not Present	0	\$15.00	\$0.00
10. Dismantling of Boiler/Furnace/Incinerator	Not Present	0	\$2,000.00	\$0.00
11. Flexible Duct Connection Removal	Not Present	0	\$100.00	\$0.00
12. Acoustical Plaster Removal	Not Present	0	\$7.00	\$0.00
13. Fireproofing Removal	Not Present	0	\$15.00	\$0.00
14. Hard Plaster Removal	Not Present	0	\$7.00	\$0.00
15. Gypsum Board Removal	Not Present	0	\$6.00	\$0.00
16. Acoustical Panel/Tile Ceiling Removal	Not Present	0	\$3.00	\$0.00
17. Laboratory Table/Counter Top Removal	Not Present	0	\$100.00	\$0.00
18. Cement Board Removal	Not Present	0	\$5.00	\$0.00
19. Electric Cord Insulation Removal	Not Present	0	\$1.00	\$0.00
20. Light (Reflector) Fixture Removal	Not Present	0	\$50.00	\$0.00
21. Sheet Flooring with Friable Backer Removal	Not Present	0	\$4.00	\$0.00
22. Fire Door Removal	Not Present	0	\$100.00	\$0.00
23. Door and Window Panel Removal	Not Present	0	\$100.00	\$0.00
24. Decontamination of Crawlspace/Chase/Tunnel	Not Present	0	\$3.00	\$0.00
25. Soil Removal	Not Present	0	\$150.00	\$0.00
26. Non-ACM Ceiling/Wall Removal (for access)	Not Present	0	\$2.00	\$0.00
27. Window Component (Compound, Tape, or Caulk) - Reno & Demo	Not Present	0	\$300.00	\$0.00
28. Window Component (Compound, Tape, or Caulk) - Reno Only	Not Present	0	\$300.00	\$0.00
29. Resilient Flooring Removal, Including Mastic	Reported Asbestos-Containing Material	2002	\$3.00	\$6,006.00
30. Carpet Mastic Removal	Not Present	0	\$2.00	\$0.00
31. Carpet Removal (over RFC)	Not Present	0	\$1.00	\$0.00
32. Acoustical Tile Mastic Removal	Not Present	0	\$3.00	\$0.00
33. Sink Undercoating Removal	Not Present	0	\$100.00	\$0.00
34. Roofing Removal	Not Present	0	\$2.00	\$0.00
35. (Sum of Lines 1-34)	Total Asb. Hazard Abatement Cost for Renovation Work			\$6,006.00
36. (Sum of Lines 1-27)	Total Asb. Hazard Abatement Cost for Demolition Work			\$0.00

B. Removal Of Underground Storage Tanks <input type="checkbox"/> None Reported					
Tank No.	Location	Age	Product Stored	Size	Est.Rem.Cost
1. (Sum of Lines 1-0)	Total Cost For Removal Of Underground Storage Tanks				\$0.00

C. Lead-Based Paint (LBP) - Renovation Only <input type="checkbox"/> Addition Constructed after 1980	
1. Estimated Cost For Abatement Contractor to Perform Lead Mock-Ups	\$0.00
2. Special Engineering Fees for LBP Mock-Ups	\$0.00
3. (Sum of Lines 1-2)	Total Cost for Lead-Based Paint Mock-Ups \$0.00

D. Fluorescent Lamps & Ballasts Recycling/Incineration <input type="checkbox"/> Not Applicable			
Area Of Building Addition	Square Feet w/Fluorescent Lamps & Ballasts	Unit Cost	Total Cost
1. 2860	0	\$0.10	\$0.00

E. Other Environmental Hazards/Remarks <input type="checkbox"/> None Reported		
	Description	Cost Estimate
1. (Sum of Lines 1-0)	Total Cost for Other Environmental Hazards - Renovation	\$0.00
2. (Sum of Lines 1-0)	Total Cost for Other Environmental Hazards - Demolition	\$0.00

F. Environmental Hazards Assessment Cost Estimate Summaries		
1. A35, B1, C3, D1, and E1	Total Cost for Env. Hazards Work - Renovation	\$6,006.00
2. A36, B1, D1, and E2	Total Cost for Env. Hazards Work - Demolition	\$0.00

* INSPECTION ASSUMPTIONS for Reported/Assumed Asbestos-Free Materials (Rep/Asm AFM):

- a. Unless reported otherwise by the District, materials installed after 1980 are assumed to be asbestos-free.
- b. Unless reported otherwise by the District, small quantities (less than 1,000 square feet) of the following materials are assumed to be asbestos free: hard plaster, acoustical plaster and gypsum board systems; acoustical panels and tiles; fireproofing; 12"x12" floor tile and mastic.
- c. Unless reported otherwise by the District, all roofing materials are assumed to be asbestos-free.

THESE MATERIALS SHOULD BE PROPERLY SAMPLED AND ANALYZED FOR ASBESTOS PRIOR TO DISTURBING THEM.

