



Photo by Paul Franz

# Building Dashboard

## Four Corners Elementary

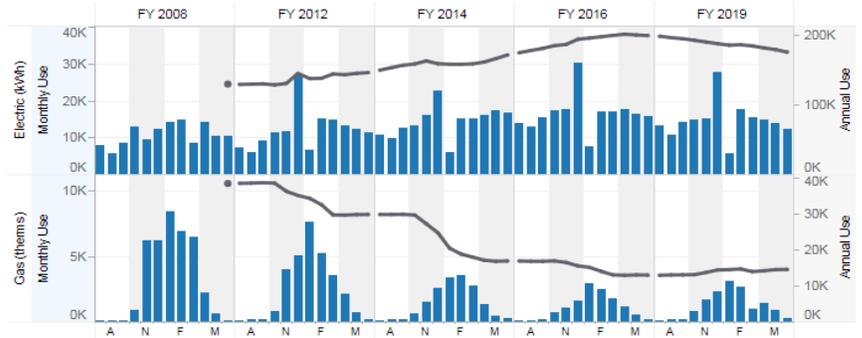
21 Ferrante Ave

### Building Data

Structural Details		HVAC		Condition	Appliances/equipment	
<b>Year Built</b>	1955; additional wings added in 1991	<b>Heating System</b>	Gas-fired hot water boiler (2011) Mini-split in mushroom (2010), HV units in gym (1991), New Rooftop Units (2) 2019	Excellent	<b>Interior Lighting</b>	all upgraded to LEDs 2018
<b>Square footage</b>	37,439					
<b>Envelope</b>	Concrete foundation walls, 10" brick with furred and plaster interior surface, mushroom has metal exterior	<b>Heat Distribution</b>	Two-pipe system to unit ventilators and convectors	Good	<b>Exterior Lighting</b>	LED floodlights - parking/ wallpacks not LED
<b>Roof</b>	Gym, classrooms have flat roof, single-ply membrane, rigid insulation, backer board, metal deck. Office, storage areas have rolled roofing on a flat wood deck with 3-1/2" of insulation. Mushroom section has pitched metal roof w/insulation.	<b>Ventilation</b>	Ventilators in mushroom ceiling. Exhaust fans ducted to classrooms	Good	<b>Vending Machines</b>	none
<b>Windows</b>	Double pane upgrades in 2011	<b>Air Conditioning</b>	Mini-split in mushroom, 6 window air conditioners	Excellent		
<b>Insulation</b>	Rigid insulation in flat roof, also roof insulation in mushroom section	<b>Hot Water Heater</b>	Gas-fired - 75 gal	Excellent		
<b>Building Summary</b>	The gymnasium, hall and toilet addition was added on the west side of the building, and classrooms ("mushroom"), were added on the east side in 1991. In 2011 roof repairs, window upgrades, and a new boiler were paid for through the Green Repair program.					

### Energy Profile - FY2019

Energy Efficiency (BTU per Square Foot)		
Electric	Heat	Total
16,026	38,703	<b>54,729</b>
If Total is ≤ 40K <b>Great!</b>	40K-80K <b>OK</b>	>80K <b>Needs Work</b>
Annual Energy Cost		
Electric	Heat	Total
\$32,973	\$13,527	<b>\$46,500</b>
<b>Berkshire Gas Rate Class</b>	<a href="#">G-42</a>	
<b>Electric Service Rate Class</b>	<a href="#">G2</a>	
<b>Average Monthly Demand (kW)</b>	<b>58</b>	



### Completed Work

Fiscal Year	Project	Project Cost	Grants/Rebates	Life Expectancy	Warranty
2011	Windows, boiler, roof repairs/upgrades (MSBA)	\$1,617,964	\$1,264,356	varies	varies
2018	Rooftop unit replacement	\$75,000	\$40,000	20+ years	5 years
2019	LED lighting upgrade- on bill financed	\$20,148	\$9,532	20+ years	5 years

### Capital Improvement Plan Projects

Fiscal Year	Project	Project Cost	Grants/Rebates	Life Expectancy	Warranty
2020	Flooring Replacement (4 Schools)	\$550,000	N/A	N/A	N/A
2020	Fencing Replacement (All Schools)	\$23,000	N/A	N/A	N/A
2020	Paving	\$55,250	N/A	N/A	N/A

### Audits/Assessments

Fiscal Year	Type	Findings
2009	Siemens Whole building assessment	Report available upon request
2016	Insulation assessment CET	difficult to access ceiling. Leaks should be fixed, then insulation to be replaced
2016	Power Options (Sollect) Solar Assessment	143 kW system on roof proposed - in queue for SMART Program