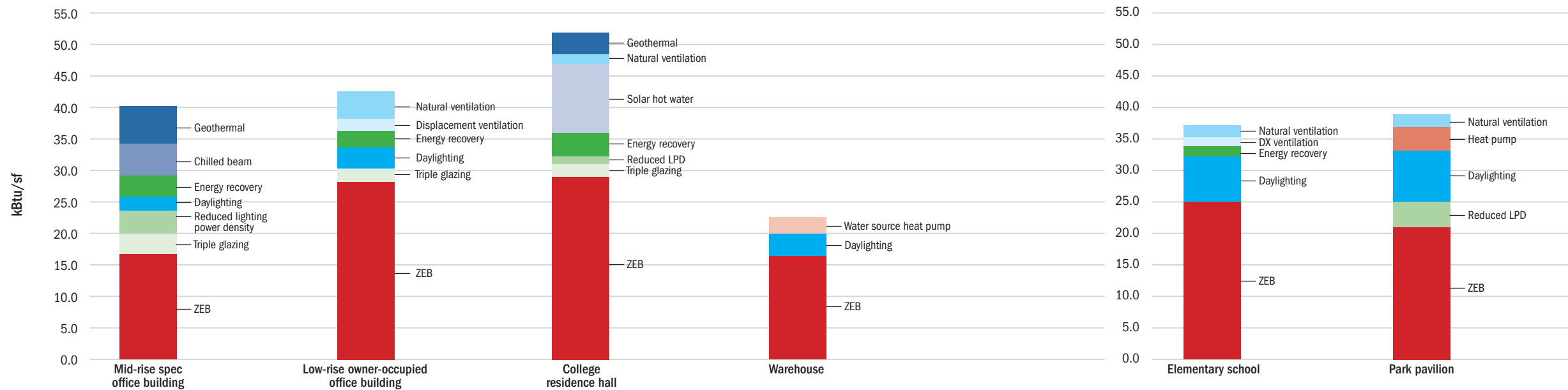


Physical Parameters of the Six Buildings Under Study

Building type	Area (sf)	Window-to-wall area ratio	EUI (original design)	EUI (ZEB design)
10-story spec office with central core	253,000	43%	39.9	17.0
Low-rise owner-occupied office	33,000	32%	42.1	28.1
College residence hall (384 beds)	126,000	19%	51.9	29.0
Pre-K to grade 5 elementary school	87,000	18%	36.9	24.8
Warehouse	60,000	20%	22.5	16.5
Park pavilion	3,120	70%	38.7	21.0

Source: Kirksey EcoServices

Energy Use Intensity



The study took in a variety of building types, based on real projects in the Gulf Coast region of Texas. The small park pavilion (3,120 sf) is being designed to comply with the Living Building Challenge. The others are either seeking or have earned LEED certification.

In each of the charts, the height of the bar measures the energy use intensity (EUI) of each building before applying commercially available energy-conserving measures. The lower portion of the bar (in red) shows the EUI of the building after the various energy-saving strategies have been employed. This is the amount of energy that must be generated by on-site renewables.