

An aerial photograph of a large-scale solar farm. The image shows a vast field of solar panels arranged in neat, rectangular rows. The panels are a dark, monochromatic blue-grey color. Between the rows of panels, there are lighter-colored paths or gaps, some of which appear to be open ground or small water-filled depressions. The perspective is from a high angle, looking down at the panels, which creates a strong sense of depth and repetition. The lighting is even, suggesting a clear day.

How NA Installed Solar

Ruth McElroy







Lower school install started Oct 22





Complete Install



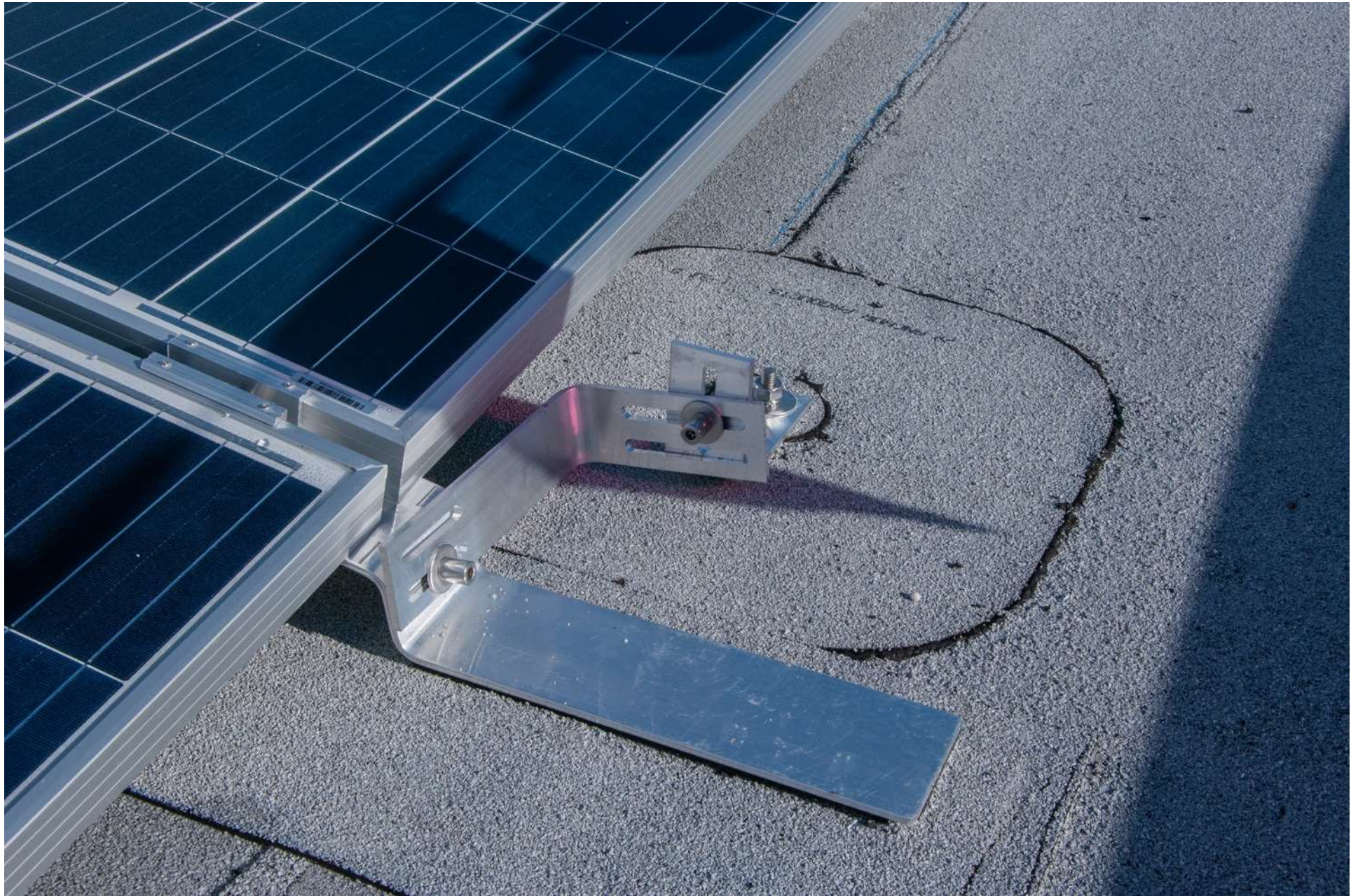
How It Came to Be

- \$1M solar array bought by LLC of NA parents
 - 610 kW, enough to power ~80 homes
 - Grid-tied (Dominion pays NA for electricity generated)
 - Parents fully paid back after 7 years, then give array to school
 - NA gets solar with no money out-of-pocket
- Maintenance building completed May 2018
- Lower and Middle school install started Sept 2018
- Will have touch kiosks inside so students can watch energy production



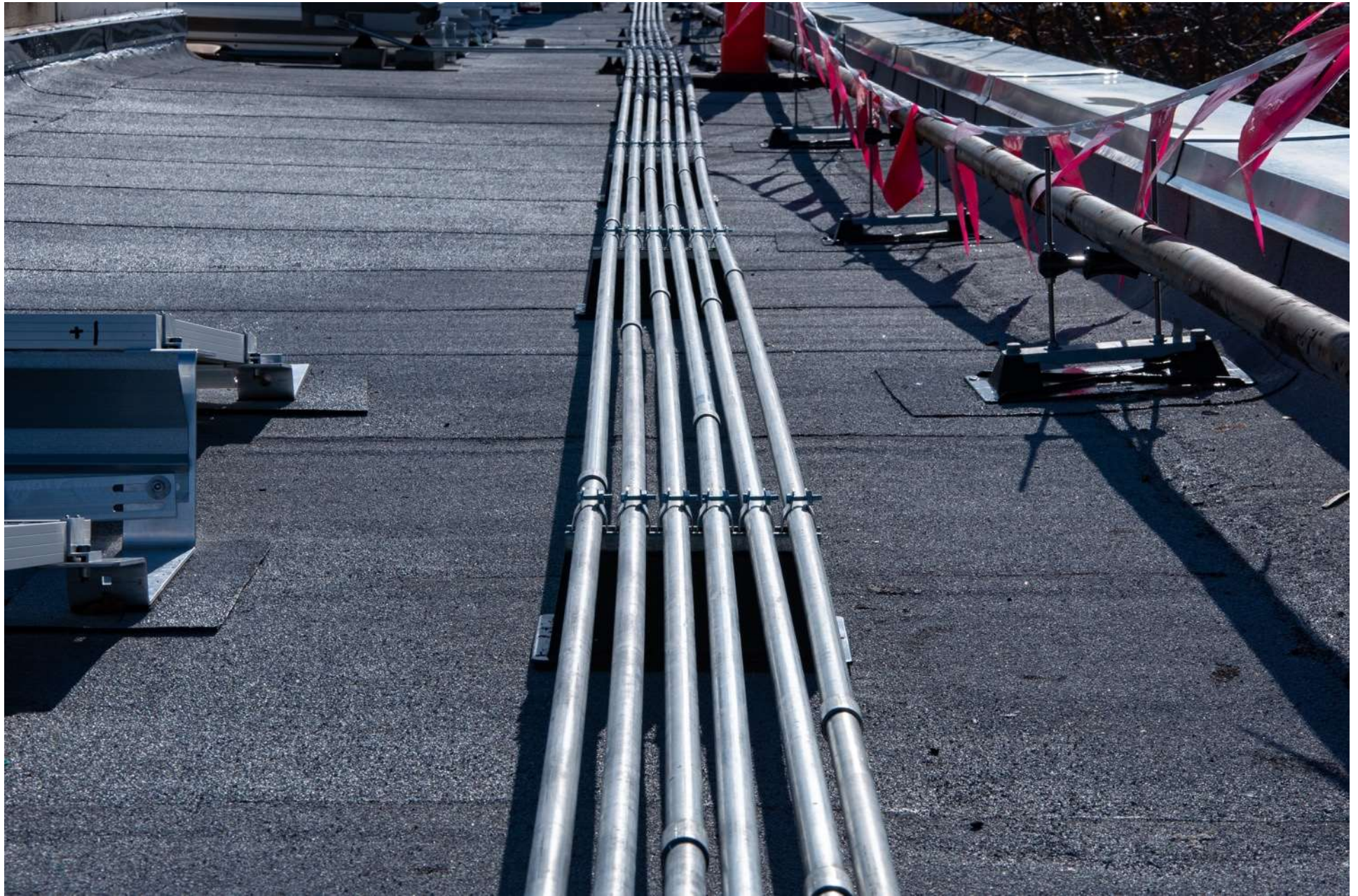
Sun Dogs LLC

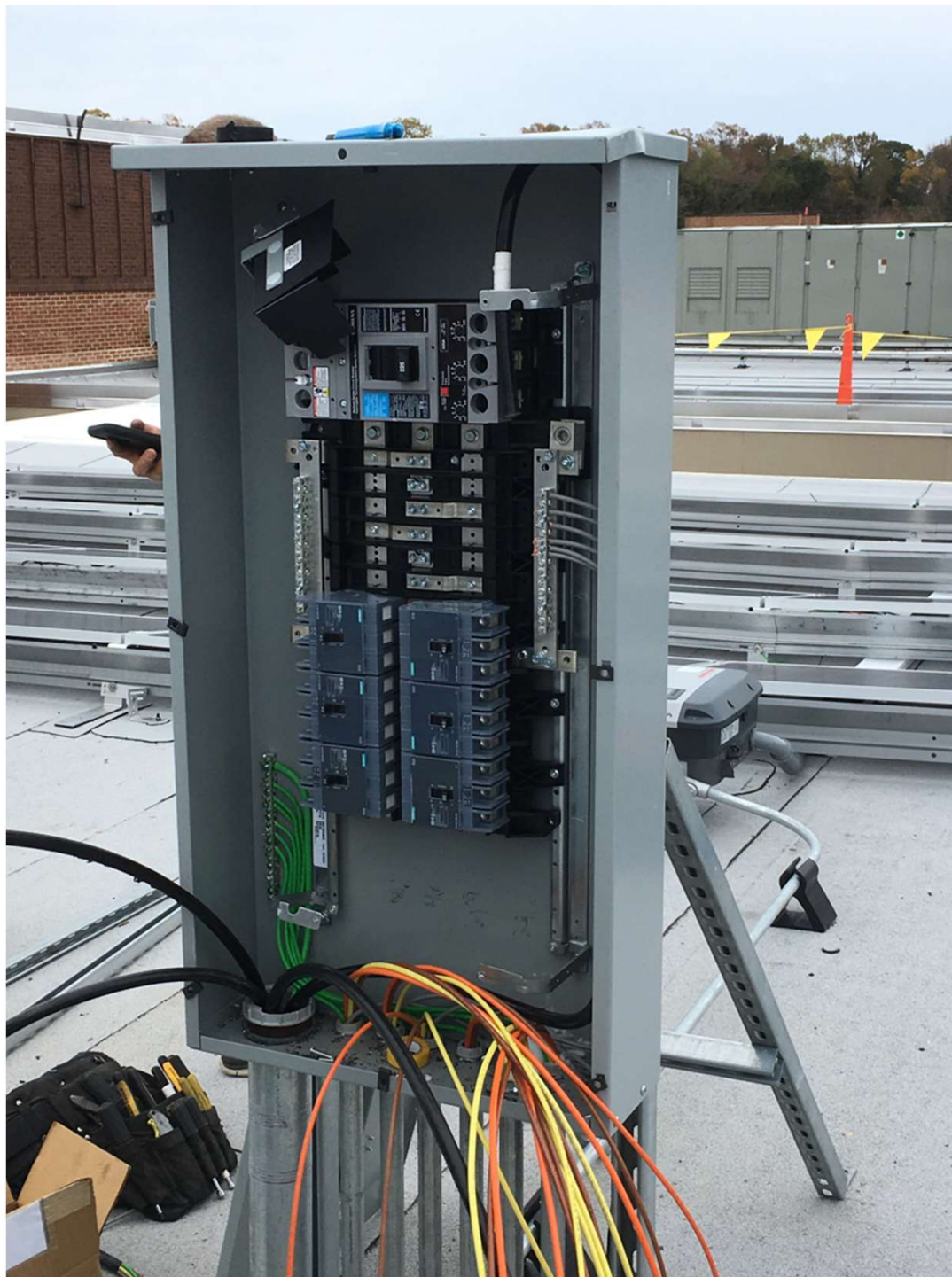














All the Numbers

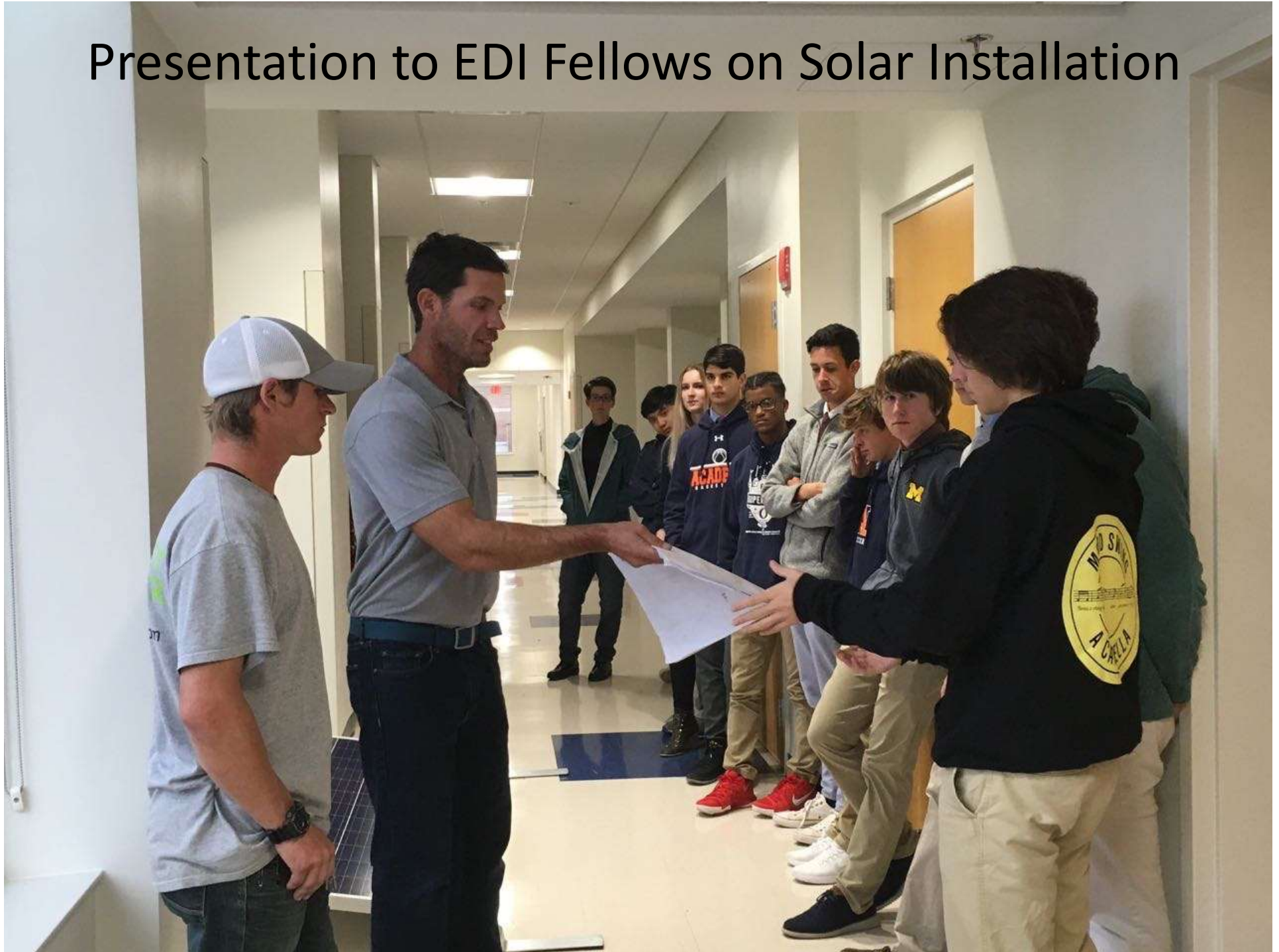
- Panels 325W each
- 150 panels on maintenance building
 - Zeroed out that power bill for 4 months!
- 510 panels on middle school
- 1300 panels on lower school
- >610 kW power total
- \$80,000 per year in solar electricity



Benefits for Norfolk Academy

- \$80,000 per year in free solar electricity
- Decreases air-conditioning need
- Increases roof lifetime
- Decreases school carbon footprint
- Example of sustainability for Hampton Roads
- Allows students to learn about renewable energy

Presentation to EDI Fellows on Solar Installation





Questions?

