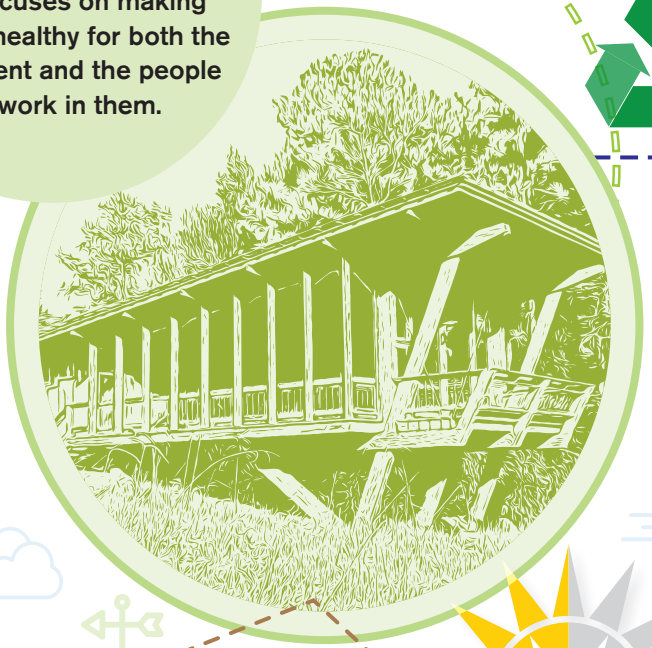
Green Technology

The **Outdoor Classroom at Prairie Ridge** was built with green building technology, which focuses on making buildings healthy for both the environment and the people who work in them.



Erosion Control

During the construction process at Prairie Ridge, we kept the earth disturbance to a minimum in order to control erosion. In addition, there are no impervious surfaces on the Outdoor Classroom; thus all the rainwater is collected, reducing soil erosion around and under the building.

Photovoltaic Panels

Our solar panels provide electricity for the Outdoor Classroom and will supply our planned residential center. Taking energy straight from the sun, we eliminate the need to use energy from nonrenewable sources, reducing our impact on the environment.

Recycled Materials

Tables are made from wheat scraps, instead of wood. The concrete masonry of the foundation is 100% recycled material, which saves energy and water. For mulch, we use untreated scrap lumber, reducing the need for newly cut trees.

Water Harvesting

Our cistern stores rainwater that is collected from the roof of the Outdoor Classroom. This water is used for flushing the toilets inside the building and limits our use of local freshwater sources. This technology is called water harvesting.

Dual-Flush Toilets

A typical toilet uses 1.6 gallons per flush (gpf) and older toilets use even more—about 3.5 gpf. Our toilets have two flush options, one for liquid waste (0.8 gpf) and the other for solid waste (1.6 gpf). Install these toilets in your home to conserve water and reduce your utility bill.

Parallel Strand Lumber

Parallel Strand Lumber, also known as Parallam or PSL, is made from a composite of many small trees, reducing the need to use wood from old growth forests that typically provide large timbers. The Outdoor Classroom uses Parallam, which minimizes our impact on older forests.

Green Building Design

The orientation of the building and its south-facing overhang maximize sunlight in the winter, shade in the summer and a yearlong southwesterly breeze, conserving energy that would typically be used for lighting and climate control.

NORTH CAROLINA Museum of Natural Sciences

For technical specifications for these features contact **Frank Harmon Architect PA**