



Green Notes: Colorado Congregation Leads the Way in Carbon Reduction

Wow! We are inspired by Mountain View UMC in Boulder, Colo., where the Green Earth Team worked on several energy-saving upgrades over the past decade, and achieved a 40 percent reduction in the church's carbon footprint. That means they prevented 70 tons of greenhouse gas emissions from entering the atmosphere each year.

Here's how: The church installed 187 solar panels in 2010-2011, replaced outdated fluorescent lighting, installed 36 LED exit signs, replaced old refrigerators and a freezer, installed LED spotlights in the sanctuary, and upgraded the HVAC unit – among other projects.

One unique element in their plan was an energy management system that monitors peak loads to keep the church's electric use under 25kW – so Mountain View doesn't exceed their power company's limit for lower, energy-saving rates.

The Rev. Stephanie Kidwell explained the congregation's thinking: "As members of the United Methodist Church, we are committed to approaching creation, energy production and especially creation's resources in a responsible, careful and economic way. We call upon all to take measures to save energy

– this is part of the United Methodist Social Principles. Mountain View takes this charge seriously, and continually looks for ways to do this.”

The Boulder church’s largest project to date was the solar installation. Even a decade ago, the price tag was \$74,800, or \$400 per panel.

In an article for the [Cool Congregations website](#), reporter Sarah Paulos said Mountain View’s Green Earth Team used the financial payback as a selling point for the project. The 187 panels provide all of the building’s electricity, a savings of \$10,000 annually, and produce another 12,000 kWh that flows onto the grid for other users.

Church members bought 100 of the 187 solar panels. The remaining \$34,800 was covered via a 15-year second mortgage. Bottom line: The church’s monthly utility bill plus the second mortgage cost less than Mountain View paid under the old, non-renewable system. In addition, Green Team member Gary Schmidt saved the church another \$7,000 a year by installing an energy management system.

“The management system could turn off an air conditioner for 15 minutes, for example, or switch off the 6-kilowatt commercial dishwasher until the other loads had dropped,” Paulos explained in her story. “Normally, this wasn’t necessary, but on a hot summer Sunday with sudden cloud cover this was crucial to stay under the 25-kilowatt threshold (required for the power company’s lower rate).”

Thank you, Mountain View UMC, for your example as all of us at Missoula First UMC await word from NorthWestern Energy on our application for an E+ Renewable Energy grant needed to achieve our own solar installation. We look forward to joining you as solar power producers!