When Joe Niehaus, lead energy auditor with West Central MN Communities Action (WCMCA), visits a house, he doesn’t look at what is visible on the outside of walls – the paint, curtains and decorations – he looks at what lies inside the walls.

While he doesn’t possess a special gift of sight, he does have an infrared camera. An infrared camera detects differences in surface temperature and represents them in colors, indicating where air leaks or missing insulation may be inside walls. Along with a blower door, a big fan that sucks air out of the house to show where outside air is getting in through leaks, this equipment provides WCMCA with the knowledge it needs to help reduce energy bills for income-eligible families across the region. This includes Red River Valley Co-op Power members living in Clay and Norman counties.

WCMCA’s weatherization program helps about 200 families per year cut their heating costs. First, an auditor like Niehaus performs an energy audit. Then, local contractors are hired to make weatherization improvements based off of the energy audit results. Finally, an energy auditor makes a final inspection to verify the completed work.

“Typically, we see a 30 percent reduction in the overall energy use of the home,” he said. “People are very grateful for our services. Some are brought to tears when you tell them you’ll be able to help.”

The energy improvements done at homes are varied and include insulation, air infiltration reduction, furnace improvements and safety measures like proper venting. Red River Valley Co-op Power, along with other utilities, is required to help fund the program. Red River’s contribution last year was about $21,000. Other funding comes from state and federal sources.

Niehaus likens each home he visits to a jigsaw puzzle. You can’t see the whole picture, he says, of where energy waste is going until you put each individual piece of the home together. Those pieces are typically insulation, furnace improvements and air sealing. Other pieces of the puzzle are often times little things like changing to more efficient lights, using Energy Star appliances, adjusting the thermostat and changing filters regularly. They can all add up to savings that help families stay in their homes.

“I enjoy the connection you make with clients and personally solving the riddle of each home,” Niehaus said. “It is gratifying when you see that big reduction.”

In addition to weatherization resources, WCMCA also helps members with energy assistance if they meet certain income guidelines. Tri-Valley Opportunity Council, located in Crookston, provides energy assistance to members living in Polk County.