

Church Brothers unveils sustainable power system

By **Jim Offner** June 30, 2017 | 12:35 pm EDT



Photo by Church Brothers Farms

Church Brothers Farms unveiled its Clean Power Station as part of the 2017 Forbes AgTech Summit field tour at the True Leaf Farms processing plant in San Juan Bautista, Calif.

Cogeneration, also known as cogen or Combined Heat and Power (CHP), is the production of electricity and heat from a single fuel source. Powered by a natural

gas-fueled engine, a cogeneration system is seen as a way of capturing heat that would otherwise be lost during the production of electricity.

At Church Brothers, Salinas, Calif., the cogeneration plant has an additional step where thermal energy becomes cold with the use of an aqueous ammonia absorption chiller. As a result, the plant will generate 2 megawatts of electric power to run the processing facility.

The Clean Power Station at True Leaf Farms was created in partnership with Campbell, Calif.-based Concentric Power.

Tom and Steve Church, co-chairmen of Church Brothers Farms, are investors in Concentric Power.

The technology ties into existing refrigeration systems and captures heat that would otherwise be lost during the production of electricity. This provides a clean energy solution, saving on utilities and increasing long-term sustainability.

“A cogeneration system is flexible and reliable because of its efficient use of energy,” Steve Church said in a news release. “We decided to make this investment because it helps us do more with less, energy wise; it creates less emissions making our operation more sustainable; and gives us independence about how we procure our energy.”

The system at the True Leaf Farms processing facility can reduce the company’s carbon emissions by 25% and allow the company to return power to the grid, according to the release.

Cogen technology can effectively render an operation “energy-neutral,” said Brian Curtis, CEO and founder of Concentric Power.

The initial phase of Church Bros.’ project gets the company about halfway to that goal, Curtis said, providing about half the company’s energy load at peak times.

“At certain times, we serve 100% of their load, and we have provisions to expand as they grow,” he said in the release. “That’s typical of how we approach a project.”

Cogen fits multiple ways into the produce industry’s plan for a sustainable future, Curtis said.