

Powder House Pass Installation Announcement



Photo by [Jon Sailer](#) on [Unsplash](#)



Powder House Pass WWTP, near Lead, South Dakota, is undergoing a second-phase expansion to handle seasonal demand from the Sturgis Motorcycle Rally. Phase 1, completed in 2021, installed three WavTex modules in a single IFAS train. Phase 2, completed in October 2024, added a reflection of that train, bringing the total to fourteen aerobic modules and increasing average treatment capacity six-fold, from 25,000 GPD to 150,000 GPD, with a peak hour flowrate of 0.60 MGD.

Entex supplied a packaged IFAS solution, including eleven new WavTex modules, aeration grids, clarifier internals, pumps, valves, and instrumentation. In addition to Entex's scope, a new EQ tank and filtration stage were also added.

Application

Meet seasonal demand surge from Sturgis Motorcycle Rally and maintain year-round nitrification

Solution

Entex packaged solution: 11 new WavTex IFAS modules, air grids, clarifier internals, pumps, valves, and instrumentation

Objective

Improve system stability and resiliency.

Effluent Goals:

- BOD < 10 mg/L
- NH₃-N < 1.0 mg/L