

Reactor Cool down

The hydrocarbon processing industry adopts a complex sequence of processes in order to reduce crude to useable end products. Historically, many of these processes utilized catalysts to improve effectiveness and efficiency. Increasing usage of catalysts decreases quality of crude. This increasing usage of catalysts focuses on catalysts turnaround and handling time.

Enhanced nitrogen reactor cool downs are executed in order to speed up the reactor cool down process.

This method delivers:

- Fast cool down to minimize downtime
- Lower cost over conventional methods
- Safe, Controlled operation
- Lower reactor entry temperatures for safer faster work
- Optimized cool downs through advance planning

Catalysts in these processes are contained in large reactors. During operation, a catalysts' effectiveness is reduced. This reduction is primarily due to coke formation.

Eventually, this catalysts must be removed and replaced with a fresh catalyst. In order to facilitate this removal, the reactor must first be cooled from the operating temperature of 260 - 485 degrees to less than 38 degrees.

Cool down of a reactor is a time consuming process, often requiring up to four days in conventional method.

This cool down time however can be shortened by several days using the accelerated cool down technique at a fraction of the cost.

