

Polyamide 6 (PA6) technology

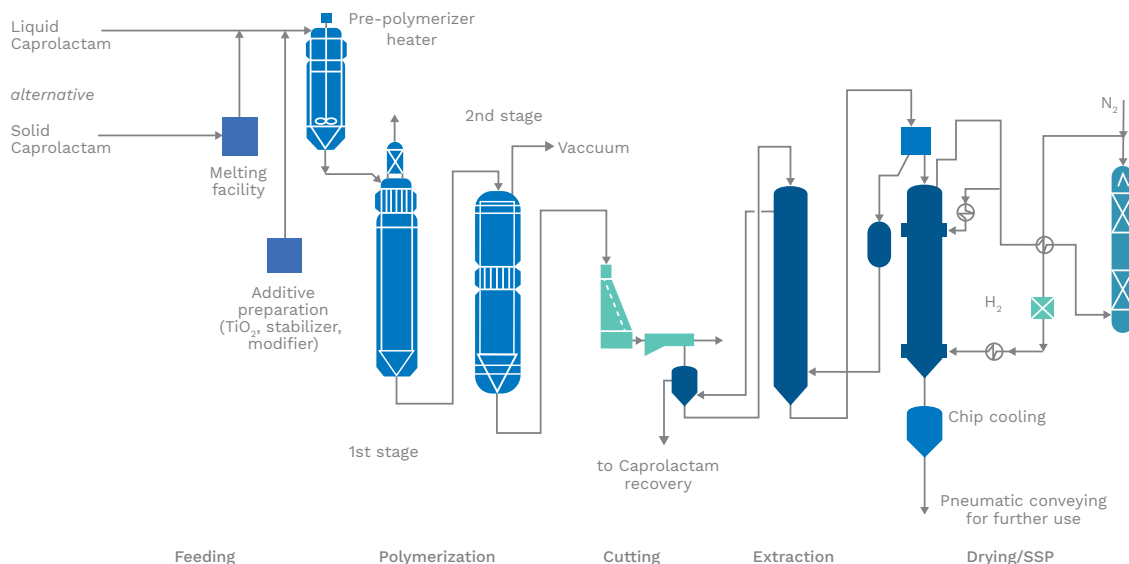
A reliable process for high quality polyamide 6 products



For top-quality polyamide, there's no better choice than Zimmer® technology. Our experience includes more than 160 tailor-made plants built since 1953. Through ongoing research and development activities, Zimmer continues to build upon its technologies and engineering, resulting in process optimization and quality improvements.

Depending on capacity and product range, Technip Energies offers both one and two-stage PA6 technology. We offer standard capacities (100|130|200|260|390 tons per day), as well as customized solutions.

The typical product range comprises textile, engineering plastic and film applications. For film applications we provide dry-blending technology. Our latest development, in-line compounding enables us to offer high operation flexibility with various products out of one polymerization line.



A two-stage polymerization process

The solid and/or liquid lactam feedstock is fed to the pre-polymerizer for the ring opening reaction of lactam. In the final polymerizer reactor the chain length grows to the desired length until the specified viscosity is reached. Zimmer PA6 technology is known for low consumption of utilities and minimal waste.

Caprolactam recovery system (CRS)

Our CRS recovers the caprolactam from the extraction water. The recovered caprolactam can be reused as feedstock for PA6 production even for high quality textile applications. In addition, our patented Flexi Recovery® enables cost-efficient recovery of caprolactam to match the preferred product range for your plant.

Technip Energies Zimmer Polymers Technology

We provide technology, engineering, project management and procurement services for polyesters (PET, PBT, PTT, PBS) and polyamide (PA6, PA6.6) production plants. We are focused on our customers' needs. Over the last 60 years, our engineers have worked to enhance our portfolio of well-proven technologies using in-house research and development facilities. This dedication to quality has helped us to build an outstanding track record of placing our technologies in more than 800 plants.

As part of a global network of centers which manages the company's expanding portfolio of onshore process technologies in petrochemicals, refining, hydrogen and syngas, polymers, gas monetization and renewables, we have access to Technip Energies' leading global engineering, procurement, project management and construction network. Technip Energies operates in 48 countries around the world with more than 37,000 employees.

