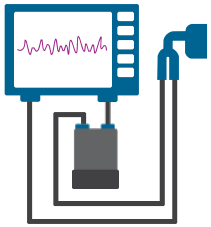
EtO Sterilization and Medical Devices

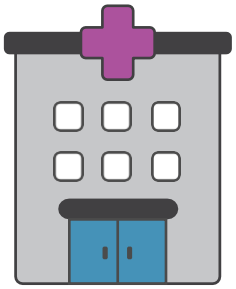
Ethylene Oxide (EtO) gas is often the only modality available for sterilizing certain medical devices. EtO ensures that device manufacturers can produce adequately sterilized products, preventing infections and guaranteeing that patients have access to safe surgeries and medical treatments. EtO sterilization is a highly regulated process and device manufacturers, hospitals and third-party sterilizers must follow rigorous controls established by FDA, EPA, OSHA and other government agencies to protect patients, workers and the environment.



PRE-CONDITIONING:
Medical devices are pre-conditioned using heat and humidity for optimal processing. This step may take place in a dedicated ancillary space or a processing chamber where the product is stored at elevated temperature and humidity for a prescribed amount of time.

STERILIZATION:
Following pre-conditioning, the medical devices are loaded in the processing chamber, and EtO enters the chamber from an ancillary source. The EtO gas saturates the product, resulting in sterilization.

AERATION:
After sterilization, product continues to give off small amounts of EtO. The medical devices are further degassed within the chamber or in a dedicated ancillary space. The remaining EtO is evacuated from the chamber and destroyed (abated) either by converting it to ethylene glycol or oxidation. The removed gas is destroyed in an environmentally responsible manner.



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