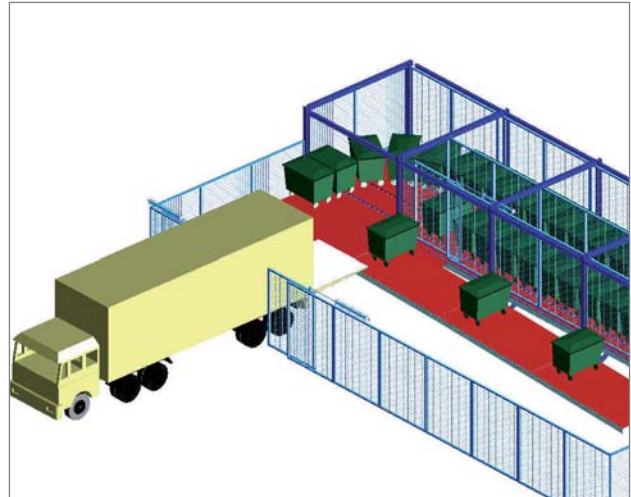


## Special Waste Transport for Waste Incineration Plants

PlantWare supplies transport systems for special waste; i.e. hospital waste or classified documents, for waste incineration plants as either an engineering/procurement or EPC contract. The transport system will be adapted to fit the local container system for waste collection, and will have automatic loading of full containers and automatic unloading of empty containers.

The containers are transported on a conveyer system. The conveyer is designed to enable full emptying for all containers in case of faults in e.g. electric power; as waste from hospitals would need to be in cold storage within 4 hours after the fault occurs.



## High-Pressure Pipe Design

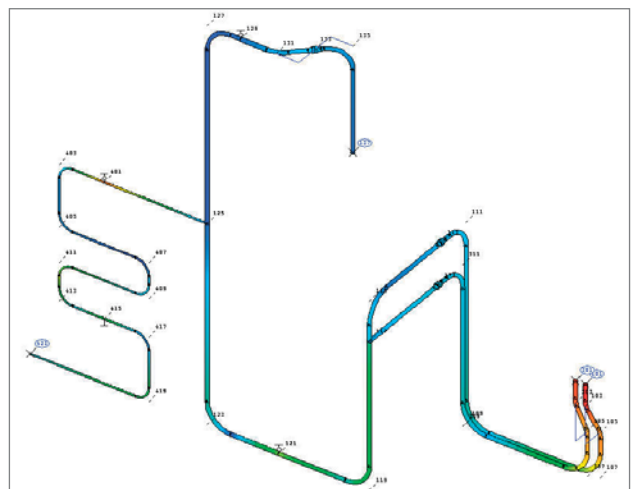
**SCF Technologies A/S, Denmark**  
[www.scf-technologies.com](http://www.scf-technologies.com)

PlantWare has produced pipe designs for SCF Technologies for the CATLIQ BioDiesel process. The design parameters for the pipes were 325 Bar @ 400°C. The piping was manufactured in Inconel® 625.

PlantWare performed:

- Pipe stress analyses according to PED/EN 13480 using ROHR2 from German SIGMA GmbH ([www.sigma.de](http://www.sigma.de))
- Design of pipe, pipe bends and set-on outlets according to PED/EN 13480
- Design of flanges, gaskets and bolts according to EN 1511
- Pipe supports design using LICAD software from LISEGA GmbH ([www.lisega.de](http://www.lisega.de))

Danish FORCE Technology stood for the 3rd party design approval.



ROHR2: Pipe stress calculation of pipe system

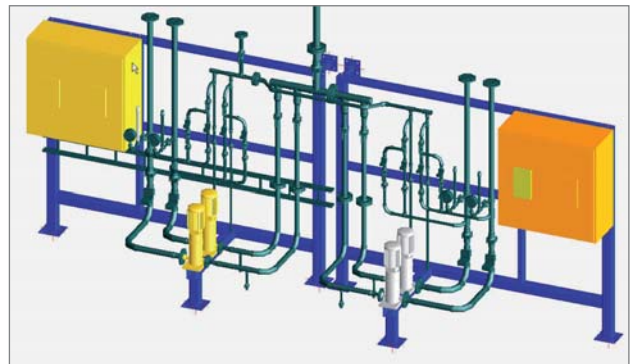


## Fogger System for e.g. Temperature Control in Furnaces

**I/S Vestforbrænding, Denmark**  
[www.vestfor.dk](http://www.vestfor.dk)

PlantWare has delivered fogger systems for Vestforbrænding I/S - the largest waste incineration plant in Denmark - for both Unit 3 and Unit 4. When the waste contains more and more plastic and highly flammable items, the temperature in the furnace gets too high - above 1350°C. Then the ashes smelt to the brick walls and the grate. Based on infrared temperature measurement in the furnace the combustion temperature can be controlled with the fogger unit.

The water is injected into the combustion zone in the furnace via nozzles in the wall. The nozzles in the boiler wall are protected with a flow of primary air around the nozzle. When the nozzles are not in use the nozzle itself is cooled with compressed air flow. The unit is equipped with block'n'bleed valves to ensure, that no water slips into the compressed air system. The fogger system is delivered skid mounted in a unit with control cabinet, pumps, control valves, flow measurement etc.



## WFI Skid Mounted Unit

**CHRIST Nordic AB, Sweden**  
[www.christ.se](http://www.christ.se)

Mechanical design of a skid mounted unit for WFI water for a Danish Pharmaceutical plant. The unit is prepared for both heating and cooling of the WFI loop.

Designs of skid mounted units are one of PlantWare's specialities. We design the units either by AVEVA PDMS, SolidWorks® or Inventor® after client's specification.

