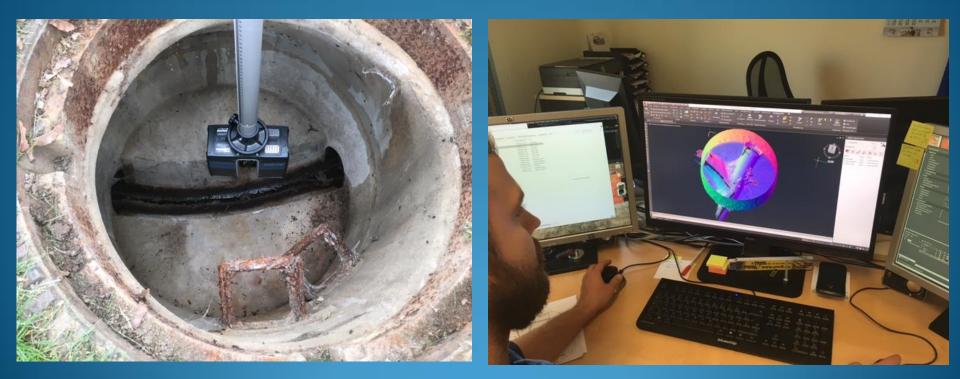
FLEXLINER transforms old manholes in new hemispheres



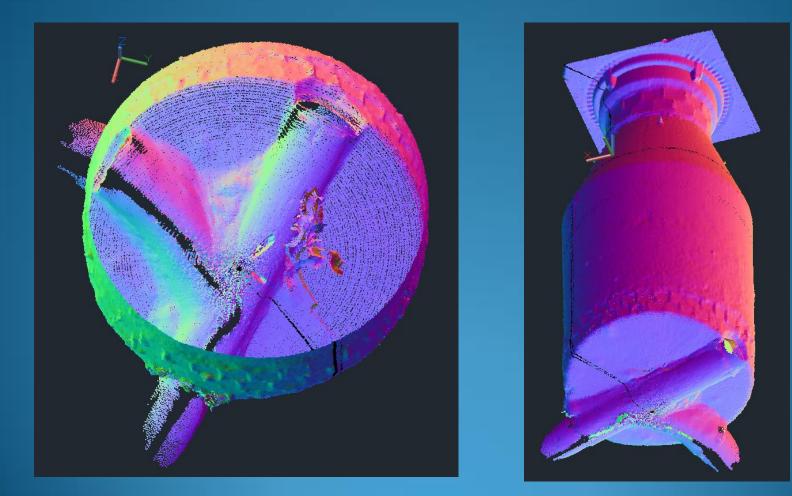


Yes we scan - 3D FARO Laser scanner



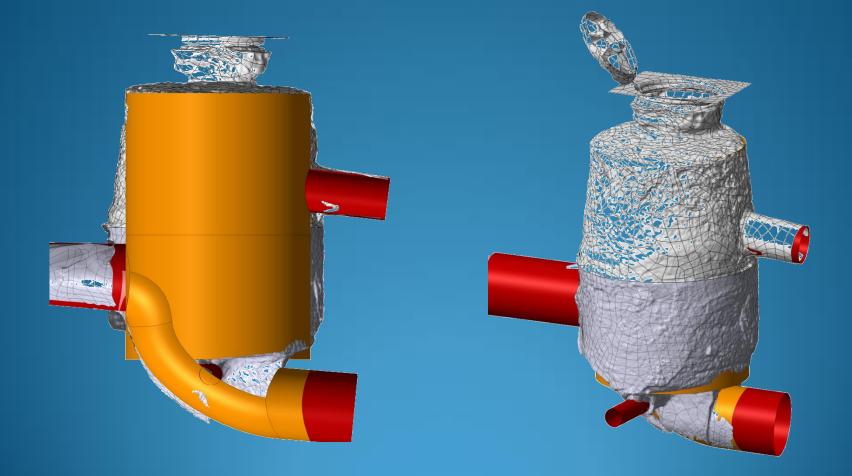


scanned data model



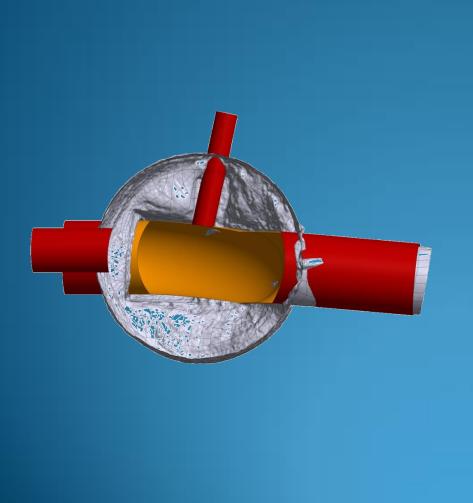


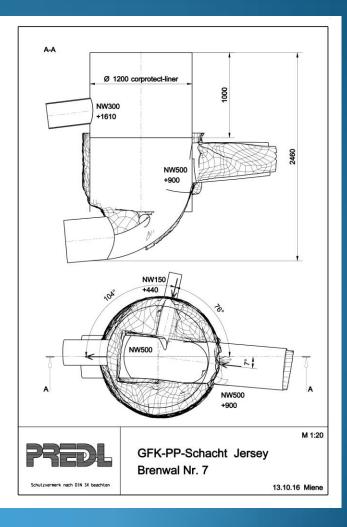
modelling scene/ pointsence





CAD/CAM modelling survey







CNC-robot-milling station





Styrofoam negative – an exact copy of the old manhole





Polymer spraying





Liner connection to concrete





FLEXLINER - a copy of the old manhole





FLEXLINER-extremely flexible







FLEXLINER and Styrofoam-negative

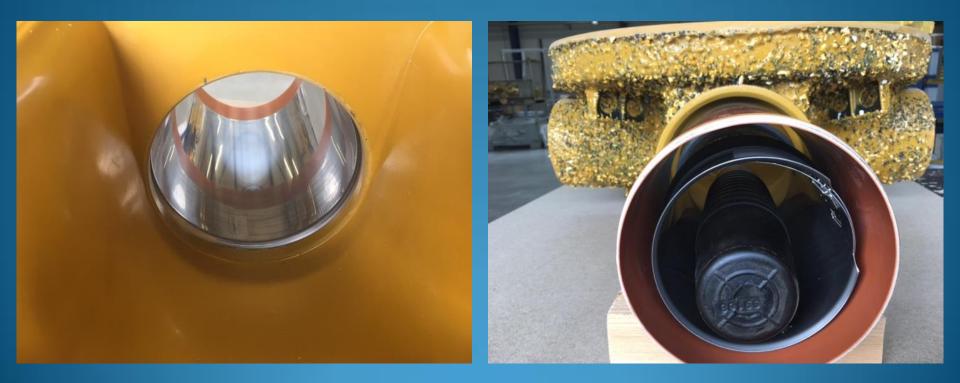




negative support for installation



FLEXLINER cuffs and Quick-Locks for a watertight connection to the old pipes





Building site - keep it clean!





Tension belt keeps the FLEXLINER folded for installation





FLEXLINER dive





Steel telescope (or seat strut) is a precious installation help





Styrofoam-negative and steel telescope keep the FLEXLINER in position



SC-concrete hand mixed and fill funnel allow a fast mix and pour





Remove support 30 min after pouring





FLEXLINER can be a two hour installation job





FLEXLINER catches all complicated geometries





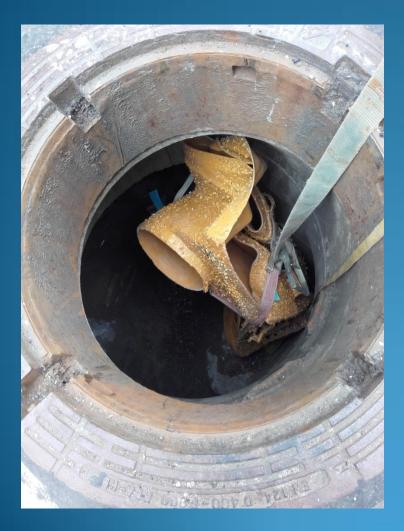


FLEXLINER transforms old into new





A rectangular FLEXLINER is no problem







FLEXLINER, how is this possible?!



