

## Procedure 2.2.21 Peka-Tech Pressing System

Type of Procedure maintenance – injection procedure

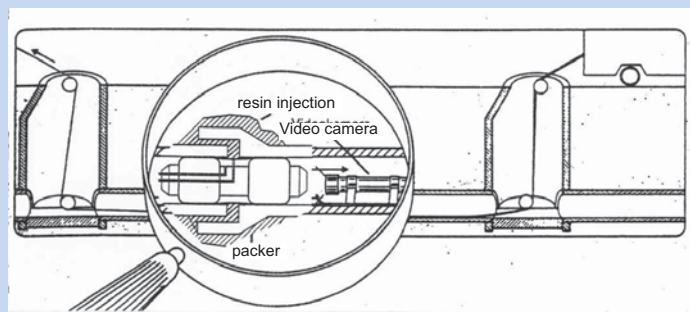
Notice general information on the relining procedures are contained in Section 4.2.3 of the IP Construction, maintenance of non walk-in sewage systems

Manufacturer KRT Engineering + Handel GmbH Sempach  
Buchen SIS Inc.

Bidder KRT Kanalsanierungs-Technik AG

Brief Description The sleeves identified by a sewage system remote control camera are pressed individually with the help of special units (packers) with air or water and thus possible pressure losses are established. In leaking sleeves, in the same workstep, a 2 component gel is pressed outward into the earth or into the surrounding material. The gel polymerises and forms outside the pipe a water-impervious layer. Thereafter the imperviousness is tested again.

Schematic Diagram



Materials 2 component polyurethane resin on an acrylic basis consisting of:  
- PUR prepolymer  
- Water  
- Additives

Standards Not standardized in Switzerland

First Applications Worldwide 1960 USA  
Switzerland 1985

### Area of Application

Damage Aspects Locally restricted leak points in particular in the sleeve area (infiltration, exfiltration)

Restrictions procedure only conditionally applicable for:  
- longitudinal cracks  
- very rough or uneven pipe walls  
- statically damaged pipes

# **KRT** Sewer Rehabilitation Technology

**Damage Aspects** sleeves:  
- leakiness  
- ruptures

lateral connections:  
- protruding connections  
- defects in connection area  
- closing and filling in dead connections  
- reconnecting in cases of relining procedures

**Restrictions** procedures only conditionally applicable for:  
- corroded pipe walls  
- ruptures or collapses  
- deviations in position

**Raw Materials** all materials, restrictions for plastics

**Cross-Section Forms** circular profiles

**Dimensions** circular profiles NW 200 mm to NW 800 mm  
egg-shaped 400/600

**Maximum Range** up to about 160 m

**Curves / U Bends** limitedly applicable

## **Preparatory Work**

**Excavations** not usually required; access via inspection shafts

**Pipe Cross-Section** high pressure cleaning

**Lateral Connections** no measures necessary in advance

**Groundwater** sealing required depending on the damage aspects

**Draining of Water** pumping out of wastewater necessary for tasks in the vicinity of the waterflow and for large amounts of water

## **Final Tasks**

**Inspection Shafts** no measures necessary

**Lateral Connections** no measures necessary

**Treatment** high pressure cleaning

**Acceptance / Quality Assurance** inspection with pipe remote camera  
tightness test as per SIA V 190, EN 1610, M 143 part 6, VSA appendix 6

**Remarks** no cross-section reduction

**Status** January 2000