

## Examples of special penstocks

Penstocks with adapted channel bottom



This XL4 penstock 2000 × 2000 mm seals directly on the concrete bottom. The channel bottom has a sink drain, which is sealed with a “nose” at the bottom of the plate. The design and dimensions from on-site bottom shape were transferred into a CAD system for designing and building the penstocks accurately for fitting in this channel.

Triangular channel penstocks



These penstocks with a triangular slide plate are used in a sand trap. They have a width of 750 mm, height of 400 mm and are sealing to a steel bottom.

High water penstock allows taking cooling water

Penstock with adapted flume at the bottom



After taken the dimensions on-site the XL4 penstock, sized 3000 × 2260 mm, was designed. The bottom is exactly adapted to the unusual flow channel. The XL4 meets its task as a flood protection penstock with very good tightness values.



This XL4 penstock sized 1800 × 1300 mm is used on the river Main in Germany for flood protection. In order to ensure the supply with cooling water from the river to an industrial company, lying behind the flood protection dyke, the XL4 plate was fitted with a SAFOX® DN 300 in front. The SAFOX® can be operated independently from the XL4. The industrial company can regardless of flood be supplied with cooling water and continuing its production.



## Housing for penstocks

### PROTECTION FOR PENSTOCKS PROTRUDING OUT OF THE BUILDING

To cover protruding parts of penstocks out of the building. The housing prevents the environment from exhausting emissions through building openings and the penstock from effects of the weather, especially from icing. The housing can be installed just with a few dowels afterwards. In case of frost protection the housing can be equipped with an additional insulation or heating. For maintenance purposes the housing can be furnished with openings, for access to grease the spindles.

#### Material

##### Housing

- 1.4301 (304) / 1.4404 (316L) / 1.0038-Feuerverzinkt

##### Maintenance openings

- 1.4301 (304) / 1.4404 (316L) / 1.0038-Feuerverzinkt

##### Insulation

- Depending on the application
- Other materials available on request



Maintenance opening



Housing for penstocks to protect penstocks protruding out of the building



### YOUR ADVANTAGES

#### • MOUNTING

Quick and easy installation, just doweling on the concrete floor, also available for two-spindle version penstocks

#### • OPERATION ADVANTAGES

Protects the environment from odours and exhausts

Secures everytime a successful operation, even in deepest temperatures while using additional insulation, additional heating available

Additional opening allows an easy access for maintenance work

Work safety: no contact with rotating or moving parts

Can be integrated into covers/cover systems of basins/channels

#### • PERFECT CORRSION PROTECTION

All welded stainless steel parts from our own pickling plant