



## M&S-Angular filter general information

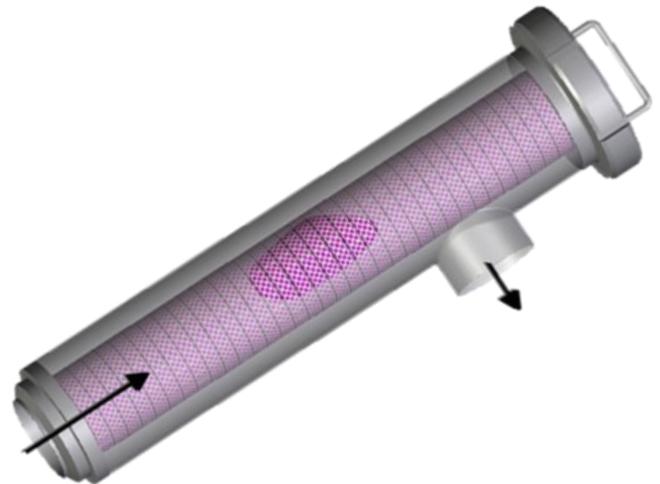
M&S-angular filters are used for the filtration of pumpable media in a pipeline. Unwanted components are filtered out so that downstream components are protected. Basically, they consist of a cylindrical housing with a cylindrical strainer insert made of perforated plate, gauze or slotted tube.

The open areas of the screen inserts are dimensioned in such a way that the pressure loss is as low as possible. The design of the angular housing favours easy removal and cleaning of the strainer insert without having to dismantle the actual pipeline.

### M&S-Angular filter



### Flow direction



### Usage

- Retention and removal of unwanted components by size in pumpable media.
- Protection against foreign particles in sensitive system parts, such as pumps, apparatus and valves.
- Ensuring the desired product quality.

### Features

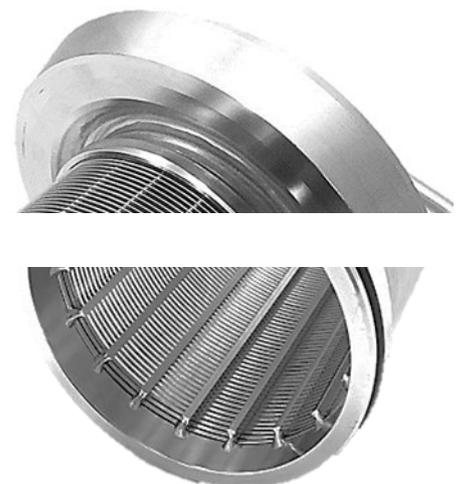
### Versions

### Usage

- High flow rate due to large open area.
- Flow in both directions possible with perforated plate or sandwich version.
- Simple assembly and handling.
- Very easy to clean and sterilise.
- Sieve cleaning without removing the housing.
- Sieve body with cover and support ring partially or seal welded, depending on the version.
- Hygienic sealing of the sieve seat by means of an O-ring.
- Stable design of the strainer.

### Features

### Versions





Usage	Features	Versions
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- Sizes: DN 25 to DN 150.
- Permissible operating pressure
  - \* DN 25-100 (10 bar), DN 125 (6 bar), DN 150 (4 bar).
- Process connections
  - \* Weld ends according to EN10357.
  - \* Connecting elements from the M&S portfolio or others according to customer requirements.
- Materials
  - \* Housing: 1.4301/AISI 304, 1.4404/AISI 316L, other stainless steels, titanium or hastelloy.
  - \* Gaskets: EPDM, FKM, HNBR (basically FDA compliant).
- Surfaces: mat blasted or polished (grinded).

• **Strainer insert**

- \* Welded version (standard).
- \* Plugged version with O-ring seal.
- \* Screwed version with round thread screwed into blind cover.

• **Sieve body**

- \* Perforated plate (perforation 0,5 mm to 10 mm, figure 1).
- \* Perforated plate with gauze (45 µm to 1000 µm). Internal or external, depending on the inflow direction.
- \* Sandwich version: combination of perforated plate/gauze/perforated plate (figure 2).
- \* Slotted screen from 10 µm to 5000 µm (0,01 mm to 5 mm) (figure 3).
  - ◆ Flow direction inside to outside (FITO).
  - ◆ Flow direction outside to inside (FOTI).

The slotted tube screen consists of a radially arranged wedge-shaped profile wire, which is welded on the inside with support wires.

The filter fineness is determined by the spacing of the profile wire (figure 4).

The profile wire is impinged on the head side and the impurities are retained. The wedge-shaped geometry prevents blocking on the opposite side of the wire.

The stable design and the wedge-shaped geometry of the slotted tube screen allow very good backwashability.

Fig. 1

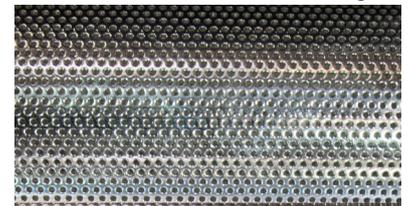


Fig. 2

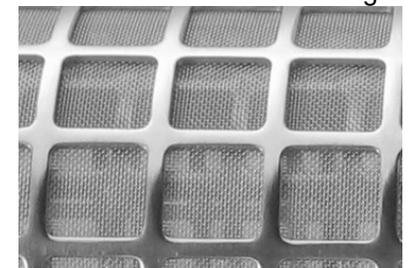


Fig. 3

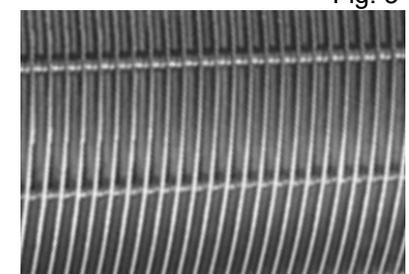
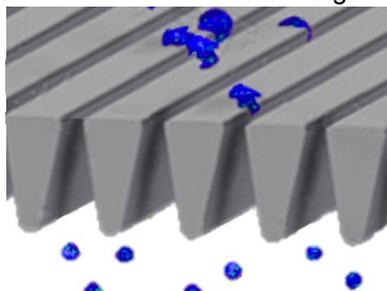


Fig. 4



Versions with modifications for different requirements available  
(see further product information sieves: safety, process, handling, hygiene)