# PE & PTFE series pumps

Tapflo pumps made from polyethylene (PE) or PTFE are suitable for handling almost any kind of liquid whether it is viscous, chemically aggressive or with solids.



#### Polyethylene pumps

Polyethylene (PE HD) has a superior wear resistance which is 6 – 7 times better than for polypropylene (PP). This fact makes the pump suitable for handling abrasive slurries etc. PE is resistant to most kind of aggressive chemicals such as concentrated acids and alkalis. Maximum liquid temperature is 70°C. Tapflo uses different grades of PE depending on the part. For valve seats and ball stoppers, which are most vulnerable to wear - UHMW PE1000 is used for best mechanical strength and abrasion resistance.

#### **PTFE** pumps

PTFE (virgin polytetrafluorethylene) is a thermoplastic polymer with superior chemical resistance. The PTFE pump will handle even the most aggressive acids, for instance concentrated nitric acid. Maximum liquid temperature is up to 100°C.



**EN 10204** 



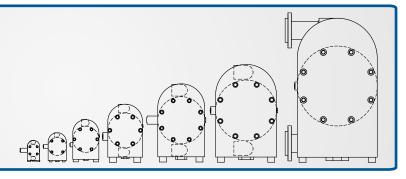






#### The PE & PTFE pump range

- >> TR9 11 l/min, 1/4"
- >> TR20 24 l/min, 3/8"
- >> T50 60 l/min, 1/2"
- >> T100 125 I/min, 1"
- >> T200 330 l/min, 1 1/2"
- >> T400 570 l/min, 2"
- >> T800 820 l/min, 3"



## **Typical applications**

Industry	Example of applications
>> Chemistry	Acids, alkalis, alcohol, solvents, latex, emulsions
>>> Food	CIP fluid, flavoring, pigments
>>> Pulp & Paper	Glue, slurries, adhesives, dispersions, resins, sodium silicate, titanium oxide
>> Surface conditioning	Electroplating baths, various acids, solvents, anodic sludge, varnish, enamels
>>> Water treatment	Sludge handling, filter press applications, neutralization and flocculants
>> Electronics	Carrier fluids, ultra-pure liquids, electroplating solutions, mercury, solvents
>>> Print & paint	Glue, additives, varnish, ink, paint, latex, acid, resins, pigments

# The ingenious Tapflo design

Few components and a simple but ingenious design is peculiar for all Tapflo pumps. It is a compact pump, easy and quick to maintain, keeping your service costs and process down time to a minimum.

### **Flexible installations**

The connections may be rotated 180°. Simply turn the connections to fit your piping system. Threaded BSP or NPT plastic connections is standard, AISI 316 or other connections types are also available.

#### Solid and strong

The pump body is machined from solid PE or PTFE. The solid design will stand against mechanical forces as well as aggressive chemicals.



#### Low air consumption

The air distribution system is designed with shortest possible air distribution ways. This eliminates "dead spaces", resulting in high efficiency and low air consumption.

#### **Chemical design**

The compound diaphragm has a completely smooth liquid side surface and with no metal in contact with the liquid. Ideal for a safe chemical handling.



**PE pumps** - suitable for most chemicals and abrasive medias



**PTFE pumps** - suitable for the most aggressive chemicals

# **Special versions**



## **Drum pumps** | TD series

It is fitted with a drum tube in polypropylene (PP) or PTFE and a handle in stainless steel AISI 316L.

The drum tube is delivered in any length up to 2 m.

Handle your liquids comfortable. You will easily move your Tapflo drum pump between drums and containers.

#### The PE & PTFE drum pumps range

- >> TRD20 24 I/min, ½" suction, ¾" discharge
- >> TD50 60 I/min, 1" suction, ½" discharge
- >> TD100 125 I/min, 1" suction and discharge

## **Features & Benefits**

- No rotating parts

Gentle liquid handling – ideal for shear sensitive liquids or abrasive products. Adjustable suction pipe length.

- - High pressure

Able to handle even high viscous products



Infinitely variable flow

Easy to adjust the flow for a safe fluid handling



# **Integrated flanges** | 3D/3A

Pumps with integrated flanges are a robust and solid design. When there is a risk of transferring of vibration from the installation to the pump, the solid manifolds provide better stability and sealing for the pump.

More material and robust construction is a perfect solution for most demanding applications such as in TF Filter press pumps where pump operates at higher pressures.

- **Available for sizes:** T50, T100, T200, T400
- **Available materials:** PE, PE cond., PTFE, PTFE cond.
- >> Flange standard 3A = ANSI flanges 3D = DIN flanges

# **Special versions**



## **Explosion proof pumps** | TX series

The ATEX directive 2014/34/EC (also known as ATEX 114) is applicable on products used in explosion hazardous zones.

Tapflo pumps made from conductive (carbon filled) plastics PE or PTFE are made for use in explosion hazardous environments. They can be used in Ex-zone 1. The conductive material ensures that no electrostatic loads will be accumulated in the pump. The conductive pigments in the material reduces the surface resistance. Transfer of alcohol and solvents are examples of applications for the Tapflo TX pumps.

#### Pumps certified according to 2014/34/EC (ATEX)

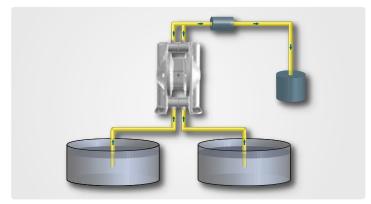
2G/2D Category: Apparatus group: IIB Temperature class:



# Twin pumps | TT series

Tapflo PE & PTFE series pumps may be fitted with double in/outlet to achieve "two pumps in one" for blending, mixing or recirculation of liquids.

The liquid in one pump chamber is separated from the other one.



#### **Example of applications**

- >> Mixing of two liquids with one pump (50/50 ratio) (installation example above)
- >> Transfer and return of printing ink from storage to ink tray
- >> Transfer and agitation of liquids with one pump