

# MAHLE

*Industrial Filtration*

Filter cartridge  
amaPure TS

## 1. Introduction

The amaPure TS filter cartridge is an absolute rated depth filter cartridge, ideal for food and beverage, cosmetics and chemical applications. The polypropylene depth filter media is made by winding polypropylene melt blown filter layers around an internal centre core. The decreasing porosity from the outside to the inside creates a high holding capacity. The larger particles will be retained in the outer layers and the smaller particles in the inner layers. The high efficiency and high dirt loading capacity makes the amaPure TS filter cartridge the ideal prefilter cartridge for a wide variety of applications.



## 2. Features

- Wide chemical compatibility
- High dirt holding capacity
- Absolute filter ratings ( $\beta$ -ratio  $\geq 5000$ )
- Construction materials chemically and biologically inert according to FDA and EC directives
- Steamable in situ
- Sanitisable with hot water

## 4. Product/Performance specifications

Filter medium : polypropylene  
 Hard ware : polypropylene  
 End cap seal : thermally welded  
 Gaskets / O-rings : silicone, EPDM, Viton®, polyethylene (only for X9) other materials on request

### Dimensions

External diameter : 68 mm  
 Length : see ordering information  
 Filtration area : 0.05 m<sup>2</sup>/10" cartridge

### Maximum recommended differential pressure

Design : 5.0 bar at 25 °C  
 Operating : 2.0 bar at 25 °C  
 Maximum operating temperature : 80 °C

## 3. Sterilisation/sanitation and Food safety

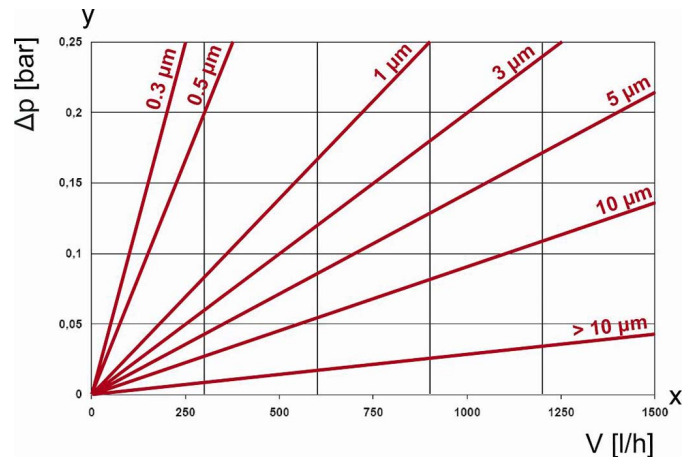
### Sterilisation/sanitisation

Steam sterilisation cumulative time is 50 hours at 125 °C with cycles of 30 minutes. Hot water sanitisation with max. 80 °C water.

### Food safety

The filter cartridges meet the European Directive 2002/72/EC for food contact and global migration. All materials used are listed in the FDA 21CFR regulations.

## 5. Water flow rate for 10" cartridge



x: Flow rate  
 y: Clean pressure drop

## 6. Ordering code

### Example

amaPure TS	1	10	U	X7	E
<b>Cartridge type</b>	<b>Micron rating</b>	<b>Nominal length [inch]</b>	<b>Hardware</b>	<b>Cartridge style</b>	<b>O-Ring material</b>
	0.3	10 (254 mm)	U=polypropylene centre core and outer cage	X3	S=Silicone
	0.5	20 (508 mm)		X4	E=EPDM
	1	30 (762 mm)		X7	V=Viton®
	3	40 (1016 mm)	<i>Outer cage not applicable for X9 cartridge style</i>	X8	
	5			X9	
	10	<i>Other lengths on request</i>			
	15				
	20				
	30				
	40				
	50				
	70				
	90				

X3 = SOE with external 222 O-rings, X4=DOE with flat gaskets, X7=SOE with fin end, bayonet and external 226 O-Rings, X8=SOE with fin end and external 222 O-Rings, X9=DOE with polyethylene soft gaskets