

# MicroDrop®

**Design and function**

PAH 63/80 are pumps for providing high water pressure.

The pump is based on the axial piston principle, which enables a very light and compact design.

The pump is designed so that lubrication of the moving parts of the pump is provided by the water itself.

All parts included in the pump are designed for a long lifetime. This means with constant Good efficiency, and in general a minimum of service.

**Features**

- Very compact and light pump (can be installed with a direct connection to as electrical motor).
- No preventive maintenance (periodic service including oil changes and replacement of wear parts not required).
- Long life time
- All parts of the pump are made of non-corrosive material and the surface is easy to clean.
- Few wearing parts

**Examples of application**

- Hydraulic systems
- High-pressure cleaners
- Fire extinguishing
- Flushing and cleaning processes
- Moisture checking device

**Connection**

Water supply to the pump can be either directly from the mains or from a water tank, placed above the pump.

The pressure at the pump inlet must be max. 5 bar abs and min. 0.9 bar abs to prevent cavitation.

**HIGH PRESSURE WATER MIST  
COMPONENT DATA SHEET**

**Pump Unit - Pump PAH63/80  
Data Sheet Number - 01B**

**Issue Date  
APRIL  
2009**

**Page  
2 of 3**

**Technical data**

PAH type		4	6.3	10	12.5	25	32	63	80
Geometric displacement	cm <sup>3</sup> /min <sup>-1</sup>	4	6.3	10	12.5	25	32	63	80
Max. pressure, cont.	bar	140	140	160	160	160	160	160	160
Max. speed, cont*	min <sup>-1</sup>	1500	1500	1500	1500	1500	1500	1500	1500
Min. speed	min <sup>-1</sup>	700	700	700	700	700	700	700	700
Max. flow, cont. at max. press.	l/min	5	8	13.5	17	34	44	86	112
Max. power requirement	kW	1.6	2.5	4.2	5.3	10.5	13.5	26	33
Weight	kg	3.7	3.7	7.0	7.0	9.7	9.7	20.5	20.5

For higher speeds contact Danfoss Sales Organization for water hydraulics.

**Temperature**

Fluid temperature:  
Min. +3°C to max. +50°C.

Ambient temperature:  
Min. 0°C to max. 50°C.

In case of lower operating temperatures,  
please contact the Danfoss Sales  
Organization for Water Hydraulics.

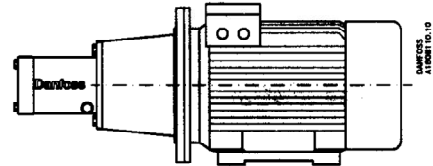
Storage temperature:  
Min. -40°C to max. +70°C.

**Shaft load**

The pump must not be exposed to neither  
axial nor radial loads. We therefore recom-  
mend a flexible coupling to connect the  
electric motor.

**Mounting**

The pump is connected to the electrical motor  
by means of a bell-housing and an elastic  
coupling on the input shaft.  
Direction of rotation is cw, seen from the shaft  
end and appears from either the mounting or  
the connection flange.  
The pump should be installed below the tank  
level.



**Code numbers**

PAH 4	180B0022
PAH 6,3	180B0023
PAH 10	180B0008
PAH 12,5	180B0007
PAH 25	180B0015
PAH 32	180B0016
PAH 63	180B0017
PAH 80	180B0018

**tyco**

*Fire & Integrated  
Solutions*

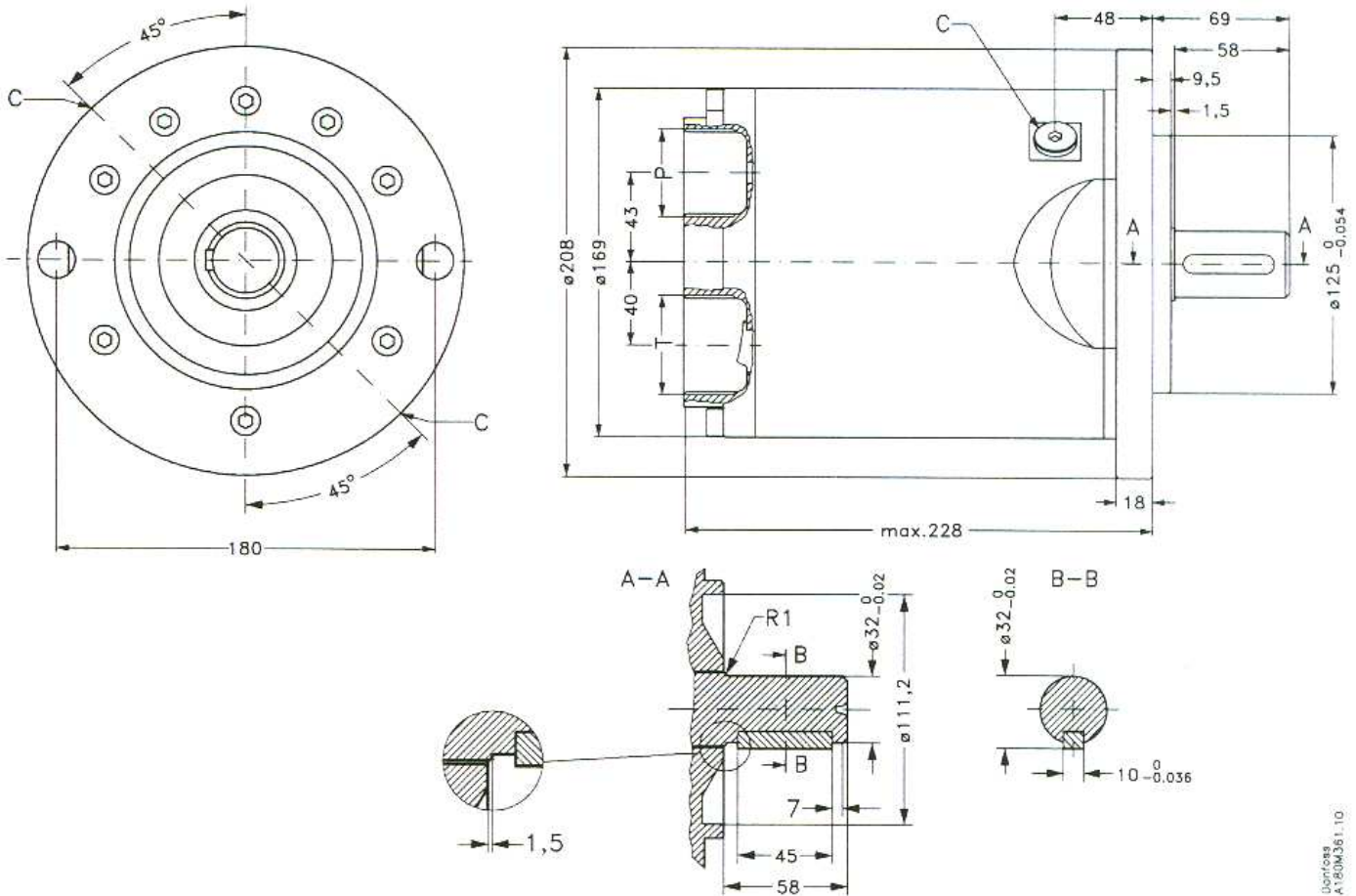
**HIGH PRESSURE WATER MIST  
COMPONENT DATA SHEET**

**Pump Unit - Pump PAH63/80  
Data Sheet Number - 01B**

**Issue Date  
APRIL  
2009**

**Page  
3 of 3**

**DIMENSIONS FOR PAH 63 AND PAH 80 (STAINLESS STEEL)**



Danfoss  
A180M361.10