

## Wear resistant submersible drainage pumps for clear water and drainage water.

### H 119, H 121

#### Application

HOMA H 119 and H 121 are wear resistant submersible drainage pumps for pumping clear water or drainage water with abrasive sand or mud additives. They are used to pump surface water from sumps, subways and building sites, supply of industrial water, application on board ships etc.

**DIN EN 12050-2:** Conformity and design approved and controlled by LGA, certificate No. 0220119.

**Installation:** Transportable or permanent. Models with float switch control for automatic pump operation, depending on liquid level in the sump.

**Pumped liquid:** Clear water or drainage water containing solids up to 10 mm spherical clearance. Max. liquid temperature: 35°C, short term up to 60°C.

**Operation:** Permanent (S1).

#### Design

Fully submersible, compact integrated motor-pump unit consisting of:

**Pump:** Single stage centrifugal pump with horizontal discharge.

**Impeller:** Open multi-channel impeller, spherical clearance 10 mm. The distance between impeller and casing can be readjusted to maintain maximum performance.


**Motor:** Fully submersible, pressure tight electric motor, oil-filled. Insulation class H. Motor protection IP 68. Model W and Ex with thermal sensors embedded in motor winding.

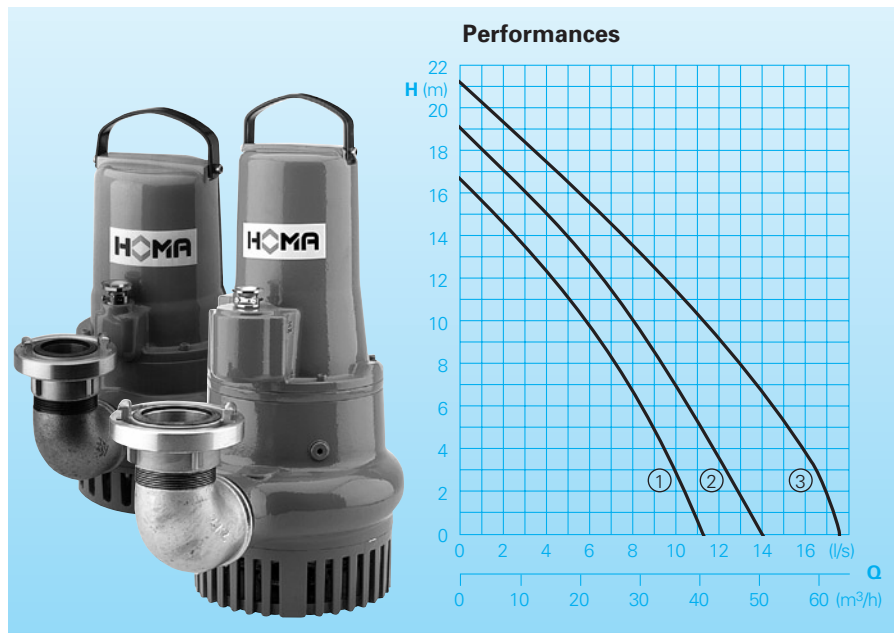
**Cable:** H07RN-F4G 1,5

**Model Ex:** H07RN-FPlus6G1,5

**Shaft/Bearing:** Large diameter stainless steel rotor shaft, prelubricated bearings, models H 121 lower bearing double-row type.

**Seals:** Combination of mechanical seals in a separate oil chamber. Oil check from outside. H 119 with 1 mechanical seal and 1 lip-seal. H 121 with 2 mechanical seals.

**Explosion protection:** All models are available with explosion proof motors according to  II 2 G EEx d [ib] IIBT4.



#### Technical Data

Curve No.	Pump type	Motor-input P <sub>1</sub> (kW)	Motor-output P <sub>2</sub> (kW)	Capacitor* (µF)	Nominal current (A)	Discharge	Weight (kg)
①	H 119 W G (A) (Ex)	1,6	1,2	30	7,8	BSP2" M	26
②	H 119 D G (A) (Ex)	1,6	1,2		2,9	BSP2" M	26
③	H 121 D (A) (Ex)	2,7	2,3		4,5	BSP2 1/2" M	40

**Speed:** 2900 rpm

**Model W:** 230-240V/1Ph

**Model D:** 400-415V/3Ph

**Model Ex:** Explosion proof

**Model A:** With automatic level control HOMA-Nivomatik

**\*Capacitor:** For the operation it is necessary to install a capacitor in the control box.

#### Materials:

Motor housing, pump housing, impeller, suction cover	Cast iron GG 25/EN-GJL-250
Rotor shaft, screws	Stainless steel
Mechanical seals	Silicon carbide
Seal kit	Perbonane

#### Equipment supplied

Pump with 90° elbow, STORZ-fixed coupling size C, model H 121: size B. With 15 m of cable, control box and plug.

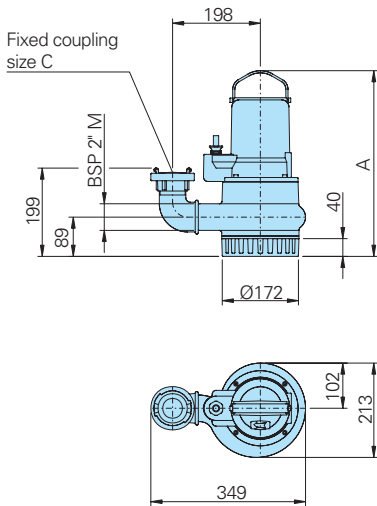
**Model W (230-240V/1Ph):** With control box W19; WT19 fitted with overload protection, capacitor, on-off-switch and plug.

**Model D (400-415V/3Ph):** With control box D32; DT32 fitted with overload protection, on-off-switch and phase inverter.

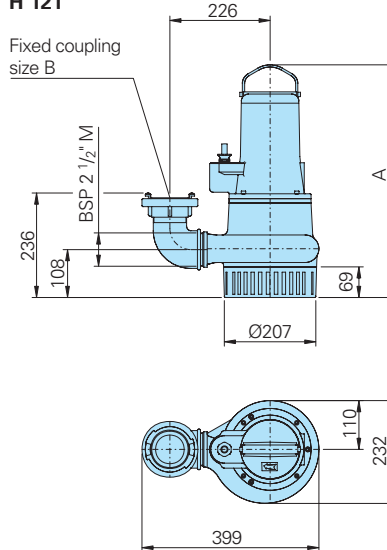
**Model A:** With additional automatic level control, AS float switch, manual-auto-switch, control box WA15/19; DA15/32; DA15/12.

## Dimensions

### H 119



### H 121

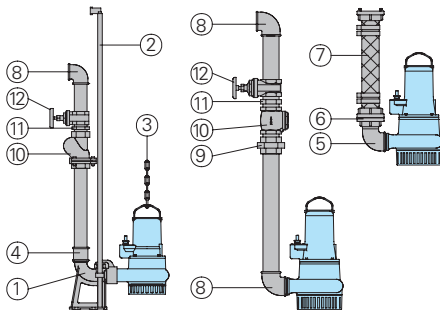


### Pump type

Pump type	Dim. A
H 119 WG	419
H 119 WG (Ex)	426
H 119 DG	419
H 119 DG (Ex)	426
H 121 D (Ex)	525

all dimensions in mm

## Accessories



Part Description	Dimension	Part No.
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① Auto-coupling system type KK50/R2" for H119, with:		8604005
- Cast iron auto-coupling with thread	BSP 2" M	
- Cast iron flanged pump coupling	BSP 2" F	
- Cast iron upper slide bracket	BSP 1/2"	
Type KK65/R 2 1/2" for H121, with:		8604015
- Cast iron auto-coupling with flange	DN 65	
- Cast iron flanged pump coupling	BSP 2 1/2" F	
- Cast iron upper slide rail bracket	BSP 1"	
○ Auto-coupling system complete or partial in stainless steel	all types	on request
○ Screw-kits for installation of coupling system		on request
② Guide rails, pair, per m, steel galvanized for KK50/R2"	1/2" dia.	2190085
for KK65/R2 1/2"	1" dia.	2190135
stainless steel for KK50/R2"	1/2" dia.	2190250
for KK65/R2 1/2"	1" dia.	2190252

Part Description	Dimension	Part No.
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③ Lifting chain, per m, steel galvanized	5 mm dia.	2800350
stainless steel	5 mm dia.	2800353
Shackle steel galvanized for chain 5 mm dia.		2801450
stainless steel for chain 5 mm dia.		2801390
④ Galvanized double nipple	BSP 2" F	2109102
Threaded flange	DN 65	
	BSP 2 1/2" F	2215060
⑤ 90° galvanized elbow	BSP 2" F/M	Equipment supplied H 119
	BSP 2 1/2" F/M	Equipment supplied H 121
⑥ STORZ-fixed coupling	C-BSP 2" F	Equipment supplied H 119
	B-BSP 2 1/2" F	Equipment supplied H 121
⑦ Synthetic pressure hose with rubber lining and couplings		
C - 52 dia.	10 m	2611310
	15 m	2611315
	20 m	2611320
	30 m	2611330
B - 75 dia.	10 m	2611210
	15 m	2611215
	20 m	2611220
	30 m	2611230
STORZ-hose-coupling with spigot	C - 52 dia.	2013003
	B - 75 dia.	2013502
Reinforced hose, per m	50 mm dia.	2632050
	75 mm dia.	2632075
Hose band	2"	2306009
	85/20	2308520
STORZ-reducer	B-C	2015423
	A-B	2015612
Coupling spanner	A, B, C	2016002

Part Description	Dimension	Part No.
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⑧ 90° galvanized elbow	BSP 2" F	2113606
	BSP 2 1/2" F	2113610
⑨ Galvanized pipe union	BSP 2" M/F	2114311
	BSP 2 1/2" M/F	2114312
⑩ Bronze non-return valve	BSP 2" F	2211413
	BSP 2 1/2" F	2211513
⑪ Galvanized double nipple	BSP 2" M	2009018
	BSP 2 1/2" M	2009025
⑫ Bronze gate valve	BSP 2" F	2216020
	BSP 2 1/2" F	2216025
○ HOMA-Nivomatik float switch level control conversion kit, - for 230-240 V/1Ph AZW 10/15	length 15 m	1435155
- for 400-415 V/3Ph AZD 10/15	length 15 m	1919452
○ Alarm device AL3 Mains-operated with connector for battery 9V (see below) for mains independent operation with integrated buzzer. Mains connection 230-240 V/1Ph		1586140
Battery for mains-independent operation 9V		1952215
Floatswitch MB, mercury free, on or off, with integrated counter weight		
Cable length	10 m	1465710
	15 m	1465715
○ HOMA 2 poles earth leakage circuit breaker Fi 16/0,03 A		1561160
○ Control panel for single or twin pump station for automatic operation		on request

**HOMA**  
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