# Stainless steel centrifugal pump



Clean water



Domestic use



\_\_\_\_\_\_ Agricultural use



Industrial use



# **PERFORMANCE RANGE**

- Maximum flow rate 160 l/min (9.6 m<sup>3</sup>/h)
- Maximum head 23 m

### **APPLICATION LIMITS**

- Manometric suction lift up to 7 m
- Liquid temperature between -10 °C and +90 °C
- Ambient temperature between -10 °C and +40 °C
- Max. working pressure 4 bar
- Continuous service S1

#### **CONSTRUCTION AND SAFETY STANDARDS**

EN 60034-1 EN 60335-1 IEC 60335-1 IEC 60034-1 CEI 61-150 **CEI 2-3** 

**EU REGULATION N. 547/2012** 

### **CERTIFICATIONS**

Company with management system certified DNV

ISO 9001: QUALITY

ISO 14001: ENVIRONMENT AND SAFETY





# **INSTALLATION AND USE**

Suitable for use with clean water and with liquids that are not chemically aggressive towards the materials from which the pump is made. Because of its design features this centrifugal pump is recommended for use in domestic, agricultural and industrial applications. All the components in contact with the pumped liquid are in stainless steel AISI 304 thus guaranteeing complete hygiene and maximum resistance against corrosion.

The pump should be installed in an enclosed environment or sheltered from inclement weather.

#### **PATENTS - TRADE MARKS - MODELS**

Registered Trade Mark n. 0001575587 AL-RED®

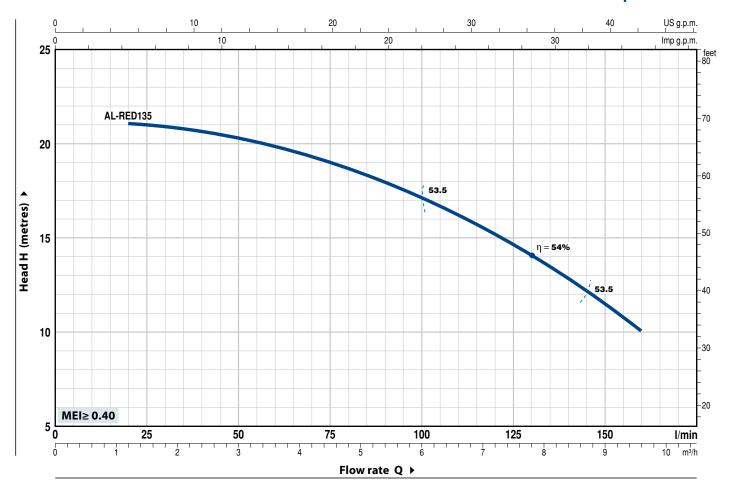
#### **OPTIONS AVAILABLE ON REQUEST**

- Special mechanical seal
- EN 10088-3 1.4401 (AISI 316) stainless steel pump shaft
- Other voltages or 60 Hz frequency
- IP X5 class protection



# **CHARACTERISTIC CURVES AND PERFORMANCE DATA**

# **50 Hz n= 2900 rpm** HS= 0 m



MODEL		POWE	R (P2)	m³/h	0	1.2	2.4	3.6	4.8	6.0	7.2	8.4	9.6
Single-phase	Three-phase	kW	HP	l/min	0	20	40	60	80	100	120	140	160
AL-RED 135m	AL-RED 135	0.75	1	<b>H</b> metres	23	21	20.5	20	18.5	17	15	13	10

**Q** = Flow rate **H** = Total manometric head **HS** = Suction height

Tolerance of characteristic curves in compliance with EN ISO 9906 Grade 3B.



# POS. COMPONENT **CONSTRUCTION CHARACTERISTICS PUMP BODY** Stainless steel AISI 304 complete with threaded ports in compliance with ISO 228/1 2 **BODY BACKPLATE** Stainless steel AISI 304 **IMPELLER** Stainless steel AISI 304 3 **MOTOR SHAFT** Stainless steel EN 10088-3 - 1.4104 **MECHANICAL SEAL** Shaft Seal Materials Model Diameter Rotational ring Stationary ring Elastomer **AR-14** Ø 14 mm Graphite **NBR** Ceramic **BEARINGS** 6203 ZZ / 6203 ZZ

(110 V)

**60** μF - 300 VL

## 8 ELECTRIC MOTOR

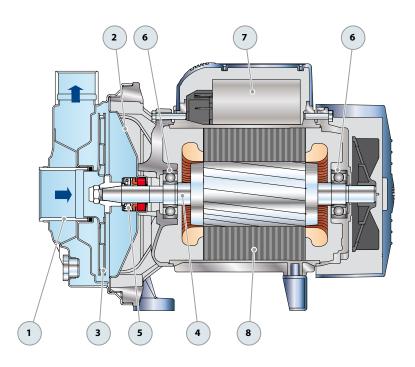
**CAPACITOR** 

**AL-RED 135m**: single-phase 230 V - 50 Hz with thermal overload protector incorporated into the winding. **AL-RED 135**: three-phase 230/400 V - 50 Hz.

- **➡** The three-phase pump is fitted with a high performance motor in class IE2 (IEC 60034-30)
- Insulation: class F
- Protection: IP X4

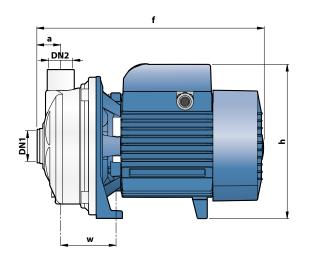
Capacitance (230 V or 240 V)

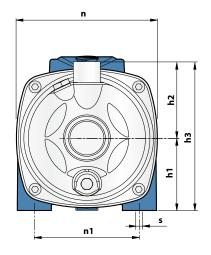
**20** μF - 450 VL





# **DIMENSIONS AND WEIGHT**





MODEL		PORTS		DIMENSIONS mm							kg				
Single-phase	Three-phase	DN1	DN2	a	f	h	h1	h2	h3	n	n1	w	s	1~	3~
AL-RED 135m	AL-RED 135	1¼″	1″	31	296	206	97	103	200	186	135	73.5	10	9.1	9.0

# **ABSORPTION**

MODEL	VOLTAGE							
Single-phase	230 V	240 V	110 V					
AL-RED 135m	<b>5.0</b> A	<b>4.8</b> A	<b>10.0</b> A					

MODEL	VOLTAGE								
Three-phase	230 V	400 V	690 V	240 V	415 V	720 V			
AL-RED 135	<b>3.1</b> A	<b>1.8</b> A	<b>1.0</b> A	<b>3.0</b> A	<b>1.7</b> A	<b>0.9</b> A			