# ENOITALIA S.r.l.

### Instructions for use and technical manual

## **Self-priming electropumps "ENOS"**

#### DECLARATION OF E.C. COMPLIANCE

Enoitalia S.r.l. with registered office and operations in the municipalità of Cerreto Guidi (FI) Fraz. Pieve a Ripoli, via Prov. Pisana, 162, operating in the oenological sector as constructor and vendor of the following machines:-

CENTRIFUGAL PUMP ENOS 20-25-30-40

#### **HEREBY DECLARES**

under its own responsibility that the product mentioned above is compliant with the following EC regulations, including the latest changes, and with the relative national legislation that incorporates them.

2006/42CEE, 73/23CEE, 89/336CEE, 89/366CEE, 2000/14 CEE

Cerreto Guidi, 26/11/2020

Enoitalia srl Falorni Fabio

#### INTRODUCTION

WARNING!

Before installing the machine read the instructions that follow carefully as this manual is an integral part of the machine itself.

We suggest this electro-pump be used to pump filtered liquids suitable for human consumption and other liquids and, in particular, for pumping WINE, OIL, MILK, WATER.

It is not suitable for pumping inflammable liquids or to be operated in environments with an explosion hazard. Do not use with petrol, concentrated acids or solvents.

It is not suitable for pumping liquids containing solid parts in suspension of over 0,5% as these can wear the machine's internal components.

The constructor declines every responsibility for damage deriving from an improper user of the electropump, or from the user's failure to comply the instructions herein contained.

#### 1. DESCRIPTION

The centrifugal electro-pump is composed of the following parts:-

- Electrical motor
- bronze/ stainless steel pump body
- Bronze / stainless steel impeller

#### • Controls panel

The body of the pump can be opened easily by unscrewing the fastening screws, allowing maintenance and cleaning operations to be carried out quickly and efficiently.

WARNING!

Before starting any control or maintenance operation, remove tension from the electrical system and pull out the plug from the socket.

The pump is of the centrifugal, self-priming type able to function in both directions of rotation thanks to the electrical changeover switch placed on the controls panel.

The type of impeller fitted on the pump allows to pump liquids also in a non continuous way as there is no possibility of emptying the pump while it is being used.

The pump has been designed to be used by qualified personnel only as it can represent a considerable hazard to people present. It is therefore important never to leave the pump on without supervision.

#### 2. POSITIONING, TESTS AND INSTALLATION

The electro-pump must be firmly positioned in a stable place horizontally on the floor. The level of liquid to be pumped must be a maximum of 3 / 4 m. deep from the pump axis. The suction mouth must be placed at least 10-15 cm below the level of the liquid.

<u>2.1 PRELIMINARY TEST</u> The electro-pump is supplied packaged in a cardboard box containing: 1 electro-pump complete with pump body and controls box ready to be installed; 1 feeding cable with plug compliant with Schuko (single-phase version); 1 pair of hose fittings with hose adapter. Once the pump has been removed from the box, make sure it is in good condition and immediately inform the supplier if any obvious defect is found.

Check manually that the drive shaft is rotating freely and that there are no obstacles blocking the impeller. If necessary, open the pump body and try to manually rotate the drive shaft and the impeller in both directions.

2.2 TEST BEFORE INSTALLATION: Before connecting the machine, make sure that the voltage of the motor (indicated on the plate) corresponds to that of the mains and that the switch is located on the "zero" position. This machine is electrically safe only if connected to an effective earth grounding system executed in compliance with the electricity-related regulations in force. The testing and, if necessary, the installation of the required electrical components must be carried out by qualified personnel. We also advice against using multiple sockets or adapters. Should their use be indispensable, only products that comply with the safety regulations in force should be used, by respecting the capacity limit, in electrical power terms, and the maximum power limit.

<u>2.3 START-UP</u>: Once the pump has been positioned in a stable place and the supply cable has been disconnected, the pump body can be filled with the liquid to be pumped up to half of its body's capacity.

WARNING!

Never start the machine without any liquid in it as this would cause the machine components subject to chafing to wear. Before starting the machine for the first time, it is necessary to carry out a preliminary cleaning operation to remove any construction residue.

Once the pump has been filled, the hose adaptors must be fixed and the **<u>pumping hoses</u>** installed. The tubes must be of the rigid, reinforced type and must be fixed to the pump with specific hose clamps to prevent any choking from forming that could prevent the liquid from flowing normally.

The use of the clamps is very important as they guarantee the perfect functioning of the pump avoiding any leaking which could damage the pump and the people around it.

WARNING! Should there be any leaked liquid on top of the pump, stop the machine immediately, remove the plug and clean immediately with a dry cloth. *The pump is absolutely not suitable to be used in immersion.* 

Proceed by checking that the switch is in the central "0" position, put plug into the electric socket and press the switch in the desired priming position. The pump should start priming the liquid within 20/30 seconds. If this does not happen, make sure that the direction of rotation is the desired one and that the suction tube is perfectly connected to the suction end-fitting, then, once the pump has been turned off and the plug disconnected from the mains, check that the clamps are correctly blocked and that the hose end-fitting are securely fastened with the rings.

WARNING!

During normal functioning the external temperature of the motor can reach 45°C. Therefore a burning sensation may be experienced when touching the machine. Avoid blocking the motor air suction grid as this would cause the motor to overheat.

2.4 <u>STOPPING THE MACHINE</u>. Once you have finished pumping, turn off the pump. The body of the pump does empty itself so it is not necessary to refill the body of the pump before turning it back on again.

#### 3. CLEANING, MAINTENANCE, RESTARTING

Once the pumping operation is complete, if the machine is not to be used again, wash the pump body by simply pumping fresh water. Thus the machine is kept in perfect mechanical and hygienic conditions. Then, once the machine plug has been disconnected from the mains, remove the tubes and connections and remove all liquid from the pump body and dry.

The moving parts require no lubrication: do not introduce oils or greases inside the body of the pump as these could damage the pump and cause malfunctioning.

Pump attachments should be lubricated to facilitate the assembly of the hose fittings and avoid seizures.

warning! all repair work must be executed directly by Enoitalia srl or by qualified and specialized personnel

In case of any repair work, only the original exchange parts must be used which can be obtained by contact the reseller or constructor.

#### 4. POSSIBLE CAUSES OF MALFUNCTION

PROBLEMS	REMEDIES
Insufficient pumping pressure	Check the state of wear of the impeller
	Check that there are no obstructions in the
	suction tube.
Leaking from the pump body	Check and if necessary replace the rings used to
	secure end fittings.
No pump suction	Check the correct direction of rotation of the
	pump
	Check that hose clamps are tightly fastened.
	Check that the priming height is not too high and

	if necessary move pump closer to the liquid.
The machine does not start	Check that the machine is powered by the correct
	tension. Do not use extension leads with an
	insufficient section which could cause drops in
	tension.
	Check any safety devices of the electric system
	Ensure that the impeller is not blocked and clean
	it.
	Replace the condenser.

#### 5. WARNING

- Place the machine in a dry environment, away from weather conditions and protected against humidity.
- Do not use the machine to pump inflammable liquids, explosives or in an inflammable atmosphere as the motor is not explosion-proof.
- The temperature of liquids to be pumped must be between +5°C and 35°C; higher temperatures would cause the overall impeller performance to worsen.
- The noise level detected is within the limits set by directive 2006/42 EEC (<85Db)
- Before starting the machine make sure it has not undergone any damage during transportation (breakages or denting) that could affect its operation.
- Never plug in the machine, operate the controls or perform any operation on electrical parts with wet hands.
- Never remove the motor protection casing while the machine is in operation and during cleaning.
- Read every part of this manual carefully before using the machine and keep it for future reference.
- Enoitalia S.r.l. is not responsible for damage caused by changes made to the machine by third parties.
- Enoitalia S.r.l. reserves the right to make construction changes at any time without being obliged to communicate that such changes are being made.

Enoitalia S.r.l.
Via Provinciale Pisana, 162 Fraz. Pieve a Ripoli 50050 Cerreto Guidi- (FI)
Tel: +39 0571588031 Fax:+39 0571588080

www.enoitalia.net info@enoitalia.net