

GB - INTRODUCTION

ELECTRIC PUMP: Device consisting in three parts - mechanical, hydraulic and electric. The aim of these provisions for the use and maintenance of said electric pump is to set down regulations for the safety of people, and prevent damage being caused to the area around the pump.

This safety does not depend on observing these provisions alone, but on the correct installation, maintenance and use of the pump in conformity with its destination of use as well.

Read both these documents and any enclosures carefully before installing the pump. Installation and operation must conform to the safety standards in force in the country where the pump is installed. Operation must be carried out professionally.

WARNING: Users who do not respect these safety standards will not only create a dangerous situation for people and damage the pump itself, but forfeit the right to claim for work to be carried out under warranty, too. Carefully read, and make sure you thoroughly understand, this Instruction Booklet before using the pump. Anyone unable to do so, for any reason whatsoever must not be allowed to operate the pump.

RUSTPROOF ELECTRIC PUMPS FROM THE “NOVAX” RANG

The rustproof electric pumps from the “NOVAX” range are particularly suitable for pouring liquid foodstuffs. The hydraulic part of the pump is manufactured in a special solid rustproof alloy. This new technology enables ROVER POMPE to issue the important Certificate of Suitability for pouring wine and liquid foodstuffs with similar characteristics.

PRELIMINARY REMARKS

All the ROVER POMPE electric pumps manufactured for pouring liquids carry a warranty both for their operation and the materials used to manufacture them. When used correctly, therefore, following the instructions below, and subjected to ordinary maintenance, the pumps will perform as they were built to.

The pumps are extremely reliable, self-aspiring and/or self-priming, easy to clean and will satisfy difficult pouring demands. They can be used in any situation in which the conditions of corrosion do not call for the use of an acid-resistant pump. Being able to resist any kind of liquid for short periods of time, they can also be utilised in an emergency.

The special feature which makes ROVER POMPE pumps stand out from the others currently available on the market is the fact that they have an electric switch. This switch means the motor can rotate in two directions, namely clockwise and/or anticlockwise indifferently.

All products are covered by a general, two-year warranty, which starts the date the material is shipped.

PRELIMINARY INSPECTIONS

The electric pump is supplied, ready for installation, in sturdy cardboard boxes complete with an Instruction Booklet. Remove the pump from the wrapping and check it carefully. Contact the supplier if you should notice that any damage has been caused to the pump during transportation, and be ready to explain the nature of this damage.

WARNING: if you are doubtful of the safety of the machine do not use it.

LUBRICATION

All moving parts are lubricated in our factory during construction. Do not oil or grease moving parts as this could cause them irreparable damage.



TECHNICAL DATA

This is a classical self-aspiring, DUAL ROTATION pump, complete with lateral liquid ring, and star impeller. This particular kind of hydraulic solution means the pump has an extraordinary self-priming capacity, even when air bubbles or gases obstruct the smooth flow of the liquid in the suction tube.

The pump is particularly suitable for pouring and/or transferring liquids which have previously been decanted, such as:

WINE - MUST - VINEGAR - MILK – FRESH WATER - SALTWATER – ORGANIC SOLVENTS – EMULSION FERTILISERS - OIL, with a viscosity of no greater than 4 (four) ENGLER degrees or 30 (thirty) CENTISTOKES

The liquids to be poured must be both clean and neutral. However, they can contain a small percentage of solids (0.2–0.5% max) in suspension. The hardness and granulometry of the said suspension must be such that they do not wear out the internal surfaces of the pump. A filter with a very fine mesh mounted on the aspiration tube can be used in extreme cases.

WARNING: do not use the pump for pouring concentrated acids, petrol or solvents.

DECLARATION OF CONFORMITY:

Manufacturing company: ROVER POMPE Snc, Via dell'Artigianato, 4 Z.A., 35020 Polverara (Padua) Italy

ROVER POMPE Snc hereby declares that all the electric pumps manufactured in its factory in Polverara (Padua) Italy conform to the following safety standards for electrical appliances:

60335-1 / 60335-2 , B.T. 2006/95/CEE, 73/23 CEE, 98/37/CEE, 2006/42/CE, in 93/68/CEE, 2000/14/CE

Moreover, all the models in the BE-M 20, 25, 30, 40 / NOVAX 20, 25, 30, 40, range, carry another guarantee, namely the IMQ safety certificate, issued by the ITALIAN INSTITUTE OF QUALITY CERTIFICATES (www.imq.it). All models are tested individually, in order to guarantee they are safe for use. Each model is wrapped and sold with a printed test report.
E. Chiarello, Revision and updating: 2012

EQUIPMENT USE, APPLICATIONS AND SUPERVISION

This pump has been designed and constructed for domestic and industrial use. However, it is a device that constitutes a potential hazard to people. The device is not designed for use by persons (including children) whose physical, sensorial or mental capacity is impaired, or who lack the experience or knowledge of this product, unless these persons are supervised or duly trained in the use of the product by a person responsible for their safety. Always ensure that children do not play with this device.

These pumps are not suitable for use in corrosive or explosive atmospheres (dust, vapours or other gases).

The pumps used in particularly humid or hot climates (e.g. in tropical countries) require installation in cool and dry environments (see technical data)

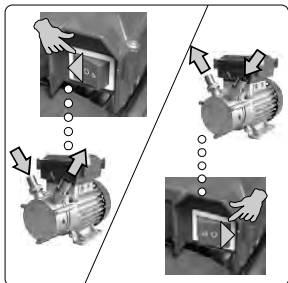
During operation, the pump does not cause disturbance to radio or television transmissions. The pump motor is designed for continuous duty.

START-UP EQUIPMENT

All electrical connections have been assembled in a wiring box set on the top of the pump. Said box is built of sturdy composite polymer, and thus resistant to fairly strong impact.

The start button or switch makes it easy for the user to choose which direction the motor will rotate in. Users can, therefore, connect the suction and delivery tubes on the hose adapter of the pump indifferently, and operate the electric motor in the direction required. They do this as follows:

(Look at the start button set on the back of the wiring box in order to better understand the descriptions below).



POS. "O" : rest position - pump disconnected: the pump does not operate nor is it live (see ELECTRICAL CONNECTION)

POS " > " : pump connected: clockwise rotation of the pump, the liquid is drafted and pumped as shown in the Figure.

POS " < " : pump connected: anticlockwise rotation of the pump, the liquid is drafted and pumped as shown in the Figure.

Manual operation of the switch is not dangerous, even in those situations where rotation inversion occurs whilst the motor is running (except for models BE-M 50 / BE-T50, NOVAX 50M / NOVAX 50T).

All the electrical components used to manufacture the pump carry international safety certificates which guarantee both their quality and durability.

Important: do not operate the switch if your hands are wet or very sweaty. You could experience an electric shock.

The pump must only be used for surface pouring. Do not use the pump for any kind of pouring where it must be immersed either partially or totally in the liquid being processed.

If the pump should stop suddenly during operation, pull the plug out of the socket before trying to understand the reason for this fault.

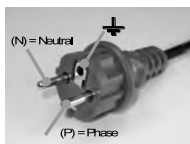
CHOICE OF POWER SUPPLY CABLE

The standard supply of single-phase ac pumps includes a power supply cable complete with Schuko plug with drip protection. The cable carries the H05 RN-F certificate.

Both the cable and the plug carry international <HAR> and IMQ safety certificates which guarantee the quality, durability and electrical safety of these components.

The standard supply of three-phase AC pumps includes a H05 RN-F quadrupole supply cable.

This cable carries international <HAR> and IMQ safety certificates which guarantee the quality, durability and electrical safety of this component.



WHY HAS ROVER POMPE CHOSEN A SCHUKO PLUG WITH DRIP PROTECTION? Today, this kind of plug offers the highest level of safety against electric shocks for electrical appliances. Moreover, it provides an important technical function. If you look at the plug as shown in the Figure, you will notice that there is only one direction in which to plug it into the wall socket. This ensures that the mains power supply is always and indeed only connected to the electric phase of the electric pump motor. If the electric pump overload cutout triggers, therefore, users can be certain it will cut off the voltage and not the neutral.

WARNING: this applies if the domestic electrical installation has been produced by professional. If in doubt, consult a specialised technician.

WARNING: cutting a plug to connect another one up to it is both incorrect and dangerous. Only use the adapters currently available on the market which carry safety certificates such as the IMQ.

Moreover, by cutting a standard plug you will forfeit the manufacturer's official guarantee.

If necessary, use an extension cord to power the pump. We recommend you use H05 RN-F marked cables, with a section of at least 1.5 mm².

WARNING: "Homemade" extension cords are potentially dangerous if made by unskilled persons with little or no experience with electric cables. Therefore, it is always preferable to purchase preassembled extension cords which carry an IMQ or equivalent safety certificate.

N.B.: These basic, general instructions have been provided because ROVER POMPE pumps are exported to a number of countries and continents. It is, therefore, imperative that the end user inquires about the specific local legislation regarding electrical appliances and considers the relative clauses in his/her own personal insurance policy for accidents.

Make sure the power supply cable is in good condition before using the pump. Replace the cable before starting up the pump if you notice any abrasion, cuts (you can see the copper wire) or other general damage.

WARNING: the power supply cable can only be replaced using special tools. Said tools are normally only available from the manufacturer, ROVER POMPE retailers and professional repairers.

ELECTRIC CONNECTIONS

Pumps are delivered ready for use.

PUMPS WITH SINGLE-PHASE MOTORS

The motors in single-phase pumps are protected against overloading by means of an amperometric device (overload cutout) which is fitted to the start-up equipment.

When necessary, the overload cutout will trigger automatically by disconnecting the phase voltage from the motor for as long as it takes the motor to cool down. The overload cutout will then reactivate, and reset normal pump operation.

WARNING: If you realise that the overload cutout triggers repeatedly, switch the pump off and remove the plug from the electric socket as this means the pump was operating in overload. If this overload was caused by the faulty operation of the pump, call in a professional technician to check said pump.

PUMPS WITH THREE-PHASE MOTORS

Three-phase motors must be protected by the end user by means of a special electrical supply and protection panel.

WARNING: Work on the electrical panel and the installation of the pump must be carried out by a specialised technician in conformity with the general electrical safety standards currently in force. The dimensioning of the devices for the electrical panel must be proportional to the electrical data specified on the pump plate.

N.B.: Installation of the pump may, at times, prove to be complex work. Before starting this work, users must consider both the local standards in force and use his or her common sense.

START-UP AND SELF-PRIMING

Position the pump horizontally, resting it on a steady non-slip base, away from heat sources and inflammable materials. The pump must be stable and rest entirely on its own feet.

Do not plug the plug into the socket.

If the pump body is empty, fill it with liquid before you start the pump in order to make priming easier.

The pump must be filled using one of the two pump hose adapters.

Connect the tubes up to the hose adapters, and fasten them using good quality hose clamps.

Use suitably sized pliers to tighten the ring nuts of the hose adapters. Do not damage the surface serration.

Set the start-up switch to the "0" rest position. Plug the plug into the socket, and turn the start-up switch in the direction required, clockwise or anticlockwise.

Once started, the pump will automatically draft the liquid. If suction does not occur within thirty seconds, switch the pump off, and remove the plug from the socket. Check both that the clamps and the hose adapter ring nuts are tight enough, and the general conditions of the tube. Check the suction tube is connected to the suction hose adapter correctly (see start-up equipment and Fig. 6).

WARNING: make sure the quality of the hose clamps is such that they will guarantee long-lasting seal. Poor quality clamps may cause leakage, or the tube may even slip off the hose adapter. This will cause obviously damage to the pump, the surrounding environment and the safety of any persons in the vicinity.

WARNING: If any liquid is accidentally spill on the pump during the manual filling phase, wipe it off immediately (using a dry cloth) before plugging the plug into the socket.

N.B.: WHEN CHOOSING THE TUBES TAKE INTO ACCOUNT THE KIND OF LIQUID WHICH IS TO BE TRANSFERRED. General tubes can be used for liquids which are not foodstuffs; non-toxic tubes which are specifically marked as being suitable for foodstuffs must be used for liquid foodstuffs.

The tube chosen for aspiration must be equipped with a metal reinforcement spiral. This is because during operation the pump will create a depression and a badly chosen tube may thus be crushed.

The anti-tapping or foot valve must be connected up to the free end of the suction tube either when the difference of level between the pump axis and the level of the liquid exceeds 3 metres in height (pump above the level of the liquid), or if the liquid has to be conveyed horizontally for long stretches. The suction tube must not let in air.

N.B.: The pump must be set as near to the level of the pumped liquid as possible during use. Do not use the pump when there is no liquid in the pump body.

The external temperature of the motor may reach 45° during normal operation. Although indeed this temperature is not dangerous, users may feel a burning sensation when they touch the device.

WARNING: The pump must be horizontal at all times. Do not move the pump while in operation.

Switch the pump off once pumping has been completed. This will block the flow of liquid, but the pump body will not empty. If you need to start pumping again, simply switch the pump on again, without refilling the body.

During priming, make sure that the by-pass valve in pumps with a by-pass (hydraulic regulator) is completely closed in order to ensure priming occurs.

WARNING: the suction and delivery tubes may move when the pump starts pumping, due to the dynamic flow of the liquid inside them. Make sure this does not occur.

WARNING: Make sure the ventilation grid on the cooling fan is not covered as this will cause overheating.

Once you have finished using the pump and before storing it, you must:

Clean the inside of the pump by pouring clean water or any other compatible liquid through it.

Pull the plug out.

Wait for the motor to cool down to room temperature.

Remove the tube from the hose adapters.

Empty the pump by turning it upside down.

Replace the pump and plug the hose adapters in order to prevent dust or insects entering the pumps during storage. Clingfilm or corks can be used to do this.

N.B.: Before installing a new pump, or if your pump has not been used for any given length of time, check that the drive shaft rotates freely, this will prevent the impeller or the seal on the shaft from jamming.

If there are any obstructions, open up the hydraulic part of the pump and try to rotate the shaft manually in both directions. This work must only be carried out once the plug has been removed from the socket.

MAINTENANCE

During normal operation, the electric pump will not require any maintenance work. The said pump must only be dismantled by specialised, qualified staff who have the requisites provided for by the standards currently in force.

Repair and maintenance work must only be carried out after the pump has been disconnected from the power supply.

MODIFICATIONS AND SPARE PARTS

Unauthorised modifications made to the pump will free the manufacturer of any kind of responsibility. All spare parts used for repair work must be original ROVER POMPE spare parts, and all accessories authorised by the manufacturer, in order to guarantee the maximum safety of both the machines and the systems they are fitted onto.

TRANSPORTATION

Always use the special accessories necessary for transporting the pump (handle, bracket, trolley)

WARNING: make sure the handle, bracket and trolleys are always well-fastened to the pump.

CLEANING AND MAINTENANCE

When the pump has been used to transfer dirty or corrosive liquids, it must operate for a few minutes pumping clean water only. Use a dry cloth to clean the outside surface of the pump. Protect the pump from damp during storage, particularly the electric motor.

Empty the remaining liquid out of the pump body completely if there is the risk that the ambient temperature will drop to below 4°C. This is necessary in order to prevent ice from forming inside the pump.

Do not dispose of this booklet after having read it. Look after it as carefully as you look after your pump.



ELECTRIC PUMPS WITH A BY-PASS

The By-Pass is a manual governor which enables the user to alter the capacity of the electric pump from the maximum value to approximately half this value. As this device must necessarily be installed in the factory, it cannot be ordered as an accessory.

Adjustment is carried out as follows: if you move the lever to the very left, the pump capacity will be at the very maximum; if you move the lever to the right, the value of the capacity will drop to about half.

The By-Pass valve must be closed during pump priming phase.



MULTIPURPOSE AND NOVAX DISPENSERS

DISPENSERS are supplied preassembled, complete with 5 metres of tubing and gun. The start-up and priming operations are the same as for the electric pumps. The suction pipe must be connected up to the unused hose adapter of the electric pump. Use of the guns: the gun is supplied with the dispenser, according to customer's choice. The Plastik and Metal models are MANUAL, that is the operator must cut off the flow. The Automatik gun closes AUTOMATICALLY, meaning that once the container has been filled, the gun will trigger and automatically cut the flow of liquid off. An operator is still needed, however, in order to check the system functions correctly.

WARNING: when the gun triggers, only the flow will be cut off, while the pump will continue to function. Switch the pump off within 2-3 minutes if no other filling operations are going to be carried out.



PUMP WITH PULLEY

The priming operation is the same as the one of the electric pumps. Use a V-shaped belt for connection to a motor. When calculating the pulley ratio between the motor and the pump, take into account that a maximum 2,500 g/1' (rpm), measured at the pump shaft is allowed.

WARNING: protection of the external motor for pulley pumps is at the user's expense.

TECHNICAL DATA

Absorbed power: please refer to the electrical data plate

Storage temperature: -10...+40 °C

Relative humidity during operation: max. 95%

Noise at maximum power: noise levels are kept within the limits provided for by Directive EC 89/392/CEE, and successive amendments (<70dB)

Minimum ambient temperature: +4° C

Maximum ambient temperature: +40° C

Maximum temperature of the pumped liquid: +35° C

Maximum geodesic suction height: -4m without a bottom valve, -9m with a bottom valve and full suction pipe

Maximum working pressure generated by the pump: 1.5 - 2 bar depending on the model

Maximum working pressure generated on the pump by the hydraulic system it operates in: +4 bar

Variation in voltage allowed: 5%

SAFETY OF ELECTRICAL PRODUCTS

The sale and installation of safe products is a matter involving professional ethics and seriousness towards customers.

Wholesalers and installers are unable to check the safety of a product themselves, as this practice would be both complicated and expensive. What can they do, therefore, to protect themselves against administrative and/or penal liabilities?

Concentrate on the reliability and seriousness of the manufacturers, and resist the temptation to purchase low cost goods of uncertain origin. Do not settle for the CE mark only as this is a self-certification issued by the manufacturer, and consequently unreliable if manufacturer is unreliable.

It is, therefore, important to check for the presence of a safety mark like the IMQ (www.imq.it)

Within the electrical sector, safety marks guarantee that:

the product has been tested by a competent, independent body, and acknowledged as conforming to the relative safety requirements before being launched on the market;

the production processes are checked continuously;

the certification body checks the products periodically in order to ascertain whether the level of quality has been maintained.

The safety mark is the main instrument which helps customers choose safe, reliable products at first glance. Moreover, the mark enables wholesalers, installers and end users to choose between safe and low quality products, thus improving their image in the eyes of their own clients.

ROVER POMPE products have carried the IMQ mark since 1996, which clearly demonstrates the commitment the company has to ensuring the safety of its products, and spreading the knowledge of their safety in daily use.

Safety marks in brief...

Installers and retailers are considered liable for their work by law and are thus obliged to sell and install safe electrical materials which conform to the provisions set down by law. They can be charged with administrative and penal sanctions for failing to do so.

Purchasing certified electrical products is the safest way of proving you have done all the necessary measures for ensuring safety.

The safety mark means that an independent body will control the product before it is sold on the market. The mark is issued by a third party and is not simply the manufacturer's self-certification, even though it is compulsory by law.

The safety mark means that prototypes are checked and standard production is kept under control.

The sale and installation of certified products guarantees a company's professionalism. Anyone who uses certified products guarantees both their own safety and the safety of those working with them.

CE MARK

The CE mark is the manufacturer's declaration that a product satisfies all the legislative requirements of the European Community which can be applied to it. This mark has the function of assuring the public authorities in European Union countries that a given product fully satisfies the legislative obligations in force at any time.

The CE mark does not replace the IMQ mark. CE marked goods may conform to the standards in force in Europe, whilst IMQ marked goods actually do conform, as they are checked by an independent, competent body. The safety of the IMQ mark increases the value of a product, even those which carry the CE mark.

The CE mark is compulsory. Manufacturers attach it to a product, and no controls are carried out by third parties. All goods sold in Europe must carry this mark and it is attached either to the product, the packaging or the warranty. All products must carry this mark, so consumers have no guarantee that the product is safe.

IMQ MARK

The IMQ mark is voluntary. It is issued by an independent body and, as such, is a guarantee for the consumer. It is recognised in all industrialised countries, and attached to the product.

The IMQ mark is preventive. It is issued for those products which really conform to the technical standards in force only, before they are placed on the market for sale. Production and the market itself are then both checked. It safeguards manufacturers and retailers who, as far as liability for the product is concerned, are given a way of maintaining their commitment to offering customers safe products, and are thus exempt from liability.

The IMQ mark follows a precise market logic, which requires the authoritative acknowledgement of a product which has been produced in conformity with the safety standards currently in force.

It is a "voluntary" mark, and companies are free to choose whether they want to apply for it, or not. There is no law which states that manufacturers must do so.

Marked products respond to international harmonised standards or national standards, wherever this harmonisation does not exist.

Marked products are kept under control by the Certification Body. In fact, being awarded the mark is not enough and companies must constantly maintain the same standards of quality, and guarantee the same levels of safety as those used for the very first production.

FALSE MARKS

Any wholesalers, installers and consumers who are unable to ascertain whether the marks on products are false or not can check this on the IMQ list of companies which have been awarded the mark, simply by accessing:

www.imq.it.

GUIDE TO THE IMQ MARKS ROVER POMPE PRODUCTS CARRY

IMQ MARK: used on equipment and components, and certifies that electrical products conform to the standards provided for by the CEI and EN Standards.

< HAR > MARK: certifies that cables conform to the harmonised European standards.

ROVER POMPE owes its reputation as a company which manufactures long-lasting-reliable pumps to a number of different factors. These include the continuous research the company carries out in order to improve the quality of the materials it utilises, and the design and production it uses. Said criteria have earned ROVER POMPE both international acknowledgement, and the trust of customers in a number of different countries. This is why the ROVER POMPE will continue its quest to find those materials which are able to successfully face the most demanding requirements and, as always, guarantee the long-lasting reliability of ROVER POMPE products.

WARNING: remove the plug from the socket before beginning any work on the pump. Work which involves repairing electrical parts must be carried out by qualified staff. Do not insert tools or your fingers into the hose adapters of the pump, nor between the fins of the cooling fan as this may cause serious injury.

FINDING AND SOLVING FAULTS

The pumps do not require any special maintenance. Nevertheless, during normal use, faults requiring maintenance may occur, the most frequent of which are listed below:

FAULT	PROBABLE CAUSE	SOLUTION
<i>The motor does not start</i>	- Power failure - Blocked Impeller - Capacitor is worn-out	- Plug the socket in correctly - Check the safety devices of the electric system - Remove the cover of the pump and clean the impeller - Replace the capacitor
<i>The motor runs without pumping</i>	- Air is being sucked in - Incorrect rotation direction - Aspiration height is excessive - Bottom valve is clogged up	- Check the clamps are tight enough. The suction pipe must be completely immersed in the liquid. - Use the switch to reset the correct rotation direction. - Move the pump closer to the static level of the liquid. - Clean or replace the valve.
<i>Insufficient capacity</i>	- The valve or suction pipe is blocked - Impeller is clogged up	- Clean or replace the valve or filter, and the suction pipe too, if necessary. - Remove the cover of the pump and clean the impeller
<i>Motor protection triggering</i>	- The motor overheats - Impeller clogging - Fault in the electrical motor	- Check the ventilation system is functioning correctly - The voltage is greater than the one specified on the label - Insufficient ventilation - Remove the cover of the pump and unclog the impeller. - Contact a qualified repairer.