7104-M008-0_R

G1200.3
G1200.3IT

INSTRUCTION MANUAL

GB TRANSLATION FROM THE ORIGINAL INSTRUCTIONS

For spare parts drawings refer to the section " LIST OF COMPONENTS" enclosed to this manual.

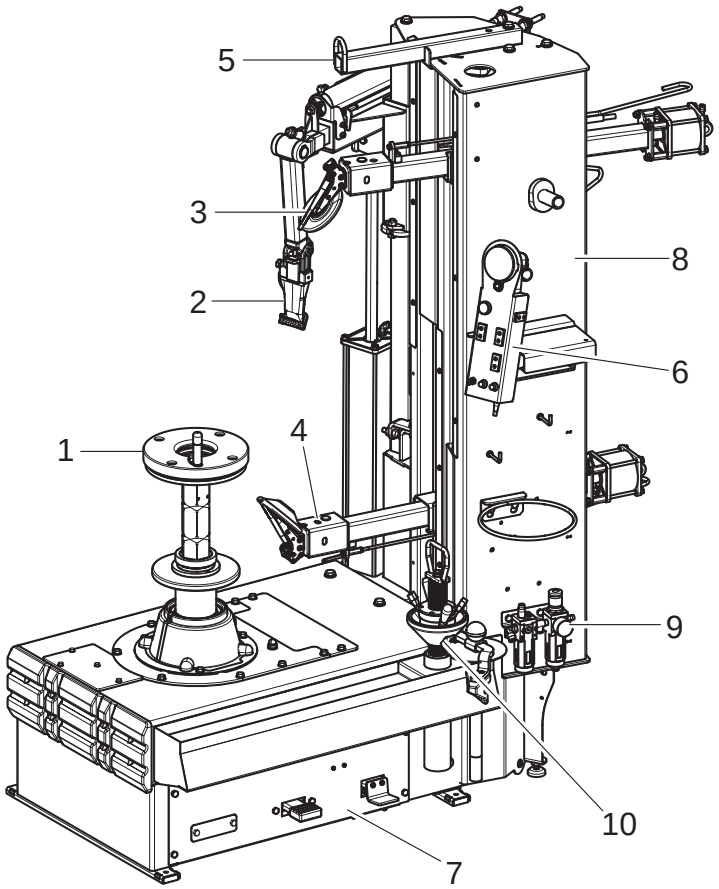
• For any further information please contact your local dealer or call:

Technical services: **RAVAGLIOLI S.p.A.** - Via 1° Maggio, 3 - 40037 Pontecchio Marconi - Bologna Italy
Phone (+39) 051 6781511 - Telex 510697 RAV I - Fax (+39) 051 846349 - e-mail: aftersales@ravaglioli.com

7104-M008-0_R - Rev. n. 0 (04/2016)

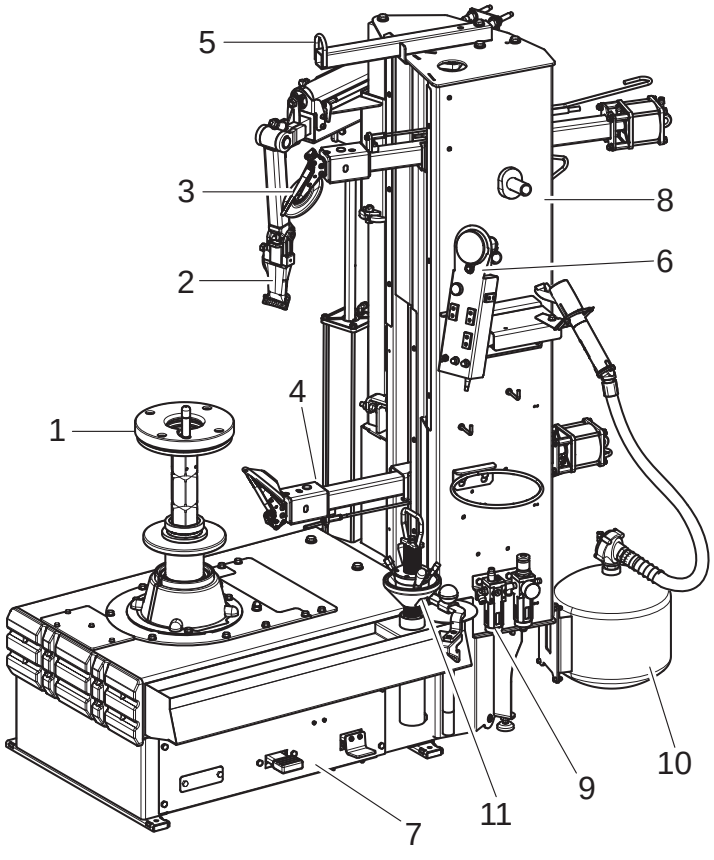
SUMMARY

Fig. 1 - G1200.3



KEY
1 – Mandrel
2 – Upper tool
3 – Upper bead breaker
4 – Lower bead breaker
5 – Lifting device (on demand)
6 – Control panel
7 – Pedalboard
8 – Complete column
9 – Filter unit - pressure reducer
10 – Locking device

Fig. 2 - G1200.3IT



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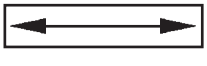
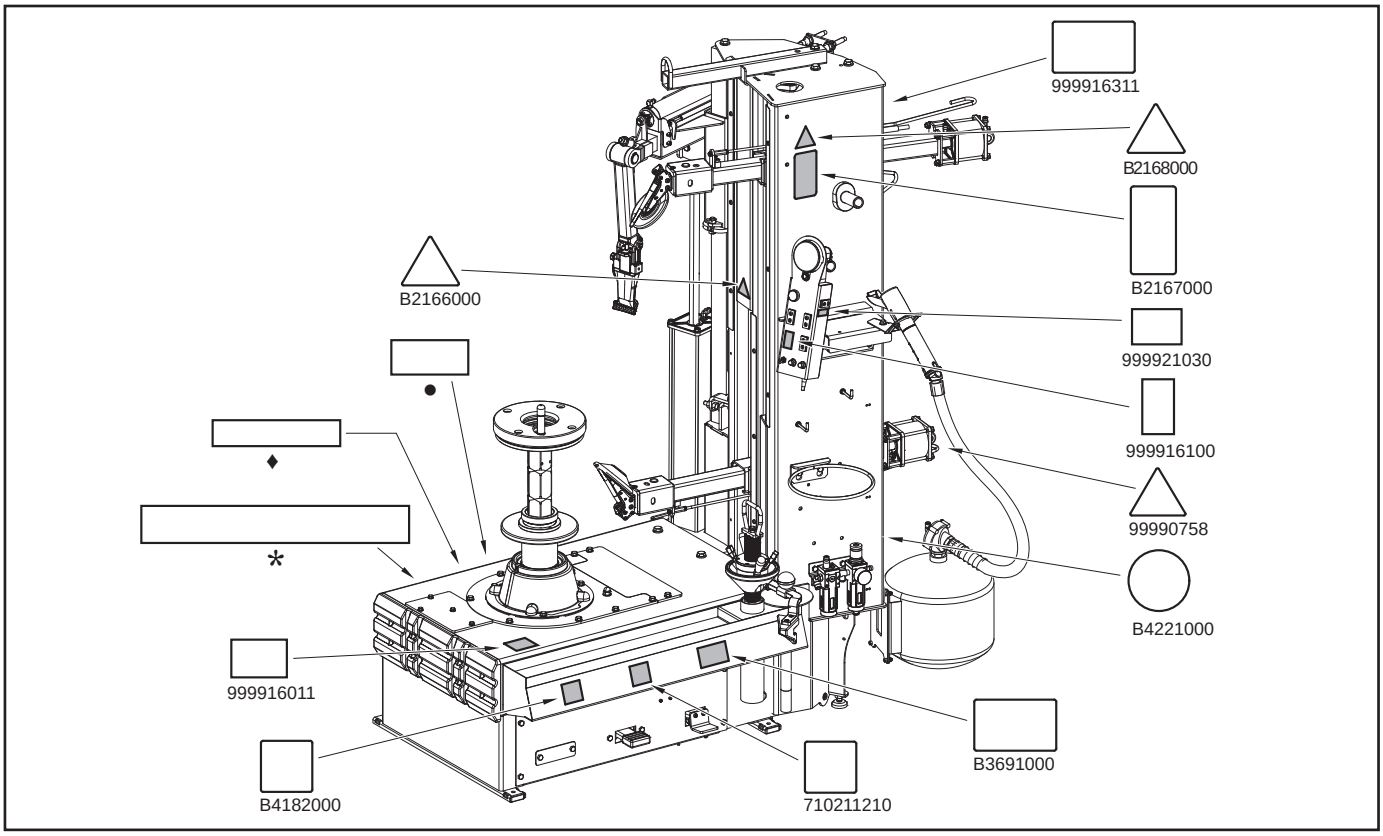
9 – Filter unit - pressure reducer
10 – Tubeless inflation unit
11 – Locking device

SYMBOLS USED IN THE MANUAL AND ON THE MACHINE

Symbols	Description
	Read instruction manual.
	FORBIDDEN!
 2167000	Wear work gloves.
	Wear work shoes.
 2167000	Wear safety goggles.
	Wear safety earcaps.
 99990758	Shock hazard.
 999911770	Danger! Moving mechanical parts.
	Caution: hanging loads.
	Mandatory. Operations or jobs to be performed compulsorily.
	Warning. Be particularly careful (possible material damages).

Symbols	Description
	Danger! Be particularly careful.
	Move with fork lift truck or pallet truck.
	Lift from above.
 1541000	General danger.
	Technical assistance necessary. Do not perform any intervention.
 999912860	Risk of limb crushing.
 2166000	Risk of hands crushing.
 999912090	Danger: tyres could drop.
 6419000	Mandrel rotation index plate.
 999912840	Risk of crushing and collisions.
	Note. Indication and/or useful information.

INFORMATION PLATE LOCATION TABLE



Code numbers of plates	
B1541000	*Danger plate*
B1594000	*Date indicating plate*
B2166000	*Hand crushing danger plate*
B2167000	*Obligation to wear protective clothing plate*
B2168000	*Tyre burst plate*
B3691000	*Inflation pedal plate*
B4182000	*Electric motor specifications plate*
B4221000	*Grounding plate*
B4244000	*Rotating parts danger plate*
99990758	*Electricity danger plate*
710211210	*Rotation direction plate*
999921030	*Lateral key plate*
999912430	*230V 50 Hz plate*
999916011	*Motoinverter plate*
999916100	*AUTO/MAN plate*
999916311	*Rubbish skip label*
999920990	*Controls plate*
•	*Serial number plate*
*	*Machine nameplate*
♦	*Manufacturer name plate*

IF ONE OR MORE PLATES DISAPPEARS FROM THE MACHINE OR BECOMES DIFFICULT TO READ. REPLACE IT AND QUOTE ITS/THEIR CODE NUIMBER/S WHEN REORDERING.

SOME OF THE PICTURES PRESENT IN THIS MANUAL HAVE BEEN OBTAINED FROM PICTURES OF PROTOTYPES, THEREFORE THE STANDARD PRODUCTION MACHINES AND ACCESSORIES CAN BE DIFFERENT IN SOME COMPONENTS.

1.0 GENERAL INTRODUCTION

This manual is an integral part of the product and must be retained for the whole operating life of the machine.

Carefully study the warnings and instructions contained in this manual. It contains important instructions regarding **FUNCTIONING, SAFE USE and MAINTENANCE.**

KEEP THE MANUAL IN A KNOWN, EASILY ACCESSIBLE PLACE FOR ALL ACCESSORY OPERATORS TO CONSULT IT WHENEVER IN DOUBT.

THE MANUFACTURER DISCLAIMS ALL RESPONSIBILITY FOR ANY DAMAGE OCCURRED WHEN THE INDICATIONS GIVEN IN THIS MANUAL ARE NOT RESPECTED: AS A MATTER OF FACT, THE NON-COMPLIANCE WITH SUCH INDICATIONS MIGHT LEAD TO EVEN SERIOUS DANGERS.

1.1 Introduction

Thank you for preferring this electro-hydraulic tyre changer. We feel sure you will not regret your decision. This machine has been designed for use in professional workshops and in particular it stands out for its reliability and easy, safe and rapid operation: with just a small degree of maintenance and care, this tyre changer will give you many years of trouble-free service and lots of satisfaction.

2.0 INTENDED USE

The model **G1200.3,** machine and relative versions is a tyre-changer for car tires projected to be used exclusively for the mounting, demounting, and inflation of wheels with dimensions of max. diameter of 54" and max. width of 15".

THIS ACCESSORY MUST ONLY BE USED FOR THE PURPOSE FOR WHICH IT IS SPECIFICALLY DESIGNED.
ANY OTHER USE IS CONSIDERED IMPROPER AND THEREFORE UNACCEPTABLE.

THE MANUFACTURER CANNOT BE HELD RESPONSIBLE FOR ANY DAMAGE CAUSED BY IMPROPER, ERRONEOUS, OR UNACCEPTABLE USE.

AN INTENSIVE USE OF THE EQUIPMENT IN INDUSTRIAL ENVIRONMENT IS NOT RECOMMENDED.

2.1 Staff training

The machine may be operated only by suitably trained and authorized personnel.

Given the complexity of the operations necessary to manage the machine and to carry out the operations safely and efficiently, the personnel must be trained in such a way that they learn all the information necessary to operate the machine as intended by the manufacturer.

A CAREFUL READING OF THIS INSTRUCTION MANUAL FOR USE AND MAINTENANCE AND A SHORT PERIOD OF TRAINING WITH SKILLED PERSONNEL CAN BE AN ENOUGH PREVENTIVE PREPARATION.

3.0 SAFETY DEVICES

PERIODICALLY, AT LEAST MONTHLY, CHECK THE INTEGRITY AND THE FUNCTIONALITY OF THE SAFETY AND PROTECTION DEVICES ON THE MACHINE.

All the machines are equipped with:

- man-operated controls (immediate stop of operation when the control is released) for all operating devices;
- mandrel rotation;
- tool translation;
- bead breaking roller translation.
- **Non-adjustable pressure limiter.**

  This allows inflation of tyres in reasonable safety. Inflation of tyres to over 4,2 ± 0,2 bar (60 PSI) is not allowed.
- **Controls logic disposition**

  Its function is to prevent the operator from dangerous mistakes.
- **Motor protection devices**

  The new "Invemotor" motor is equipped with electronic protection devices. They stop the motor if working defected conditions appear to avoid that the motor itself can be damaged and that the operator safety can be compromised (overvoltage, overload, overtemperature). For other details, see the chapt. 14 "Fault-Finding".

3.1 Residual risks

The machine was subjected to a complete analysis of risks according to reference standard EN ISO 12100. Risks are as reduced as possible in relation with technology and product functionality.
This manual stresses possible residual risks, also highlighted in pictograms on the present manual and adhesive warning signals placed on the machine: their location is represented in "PLATE LOCATION ON MACHINE INFORMATION TABLE" on page 5.

4.0 GENERAL SAFETY RULES

- Any tampering with or modification to the machine not previously authorized by the manufacturer exempts the latter from all responsibility for damage caused by or derived from said actions.
- Removing of or tampering with the safety devices or with the warning signals placed on the machine leads to serious dangers and represents a transgression of European safety rules.
- Use of the machine is only permitted in places free from **explosion** or **fire** hazard and in **dry places under cover**.
- Original spare parts and accessories should be used.

THE MANUFACTURER DENIES ANY RESPONSIBILITY IN CASE OF DAMAGES CAUSED BY UNAUTHORIZED MODIFICATIONS OR BY THE USE OF NON ORIGINAL COMPONENTS OR EQUIPMENT.

- Installation must be conducted only by qualified personnel exactly according to the instructions that are given below.
- Ensure that there are no dangerous situations during the machine operating manoeuvres. Immediately stop the machine if it miss-functions and contact the assistance service of an authorized dealer.
- In emergency situations and before carrying out any maintenance or repairs, disconnect all supplies to the machine by using the main switch.
- The machine electrical supply system must be equipped with an appropriate earthing, to which the yellow-green machine protection wire must be connected.
- Ensure that the work area around the machine is free of potentially dangerous objects and that there is no oil since this could damage the tyre. Oil on the floor is also a potential danger for the operator.

OPERATORS MUST WEAR SUITABLE WORK CLOTHES, PROTECTIVE GLASSES AND GLOVES, AGAINST THE DANGER FROM THE SPRAYING OF DANGEROUS DUST, AND POSSIBLY LOWER BACK SUPPORTS FOR THE LIFTING OF HEAVY PARTS. DANGLING OBJECTS LIKE BRACELETS MUST NOT BE WORN, AND LONG HAIR MUST BE TIED UP. FOOTWEAR SHOULD BE ADEQUATE FOR THE TYPE OF OPERATIONS TO BE CARRIED OUT.

- The machine handles and operating grips must be kept clean and free from oil.
- The workshop must be kept clean and dry. Make sure that the working premises are properly lit.
  The machine can be operated by a single operator. Unauthorised personnel must remain outside the working area, as shown in **Fig. 5**.
  Avoid any hazardous situations. Do not use air-operated or electrical equipment when the shop is damp or the floor slippery and do not expose such tools to atmospheric agents.
- During inflation do not lean on the tyre or remain above it. When beading in the tyre, keep hands away from tyre and the rim edge.
- During inflation always stay to the side of the machine and never in front of it.
- When operating and servicing this machine, carefully follow all applicable safety and accident-prevention precautions.
  The machine must not be operated by professionally unskilled persons.

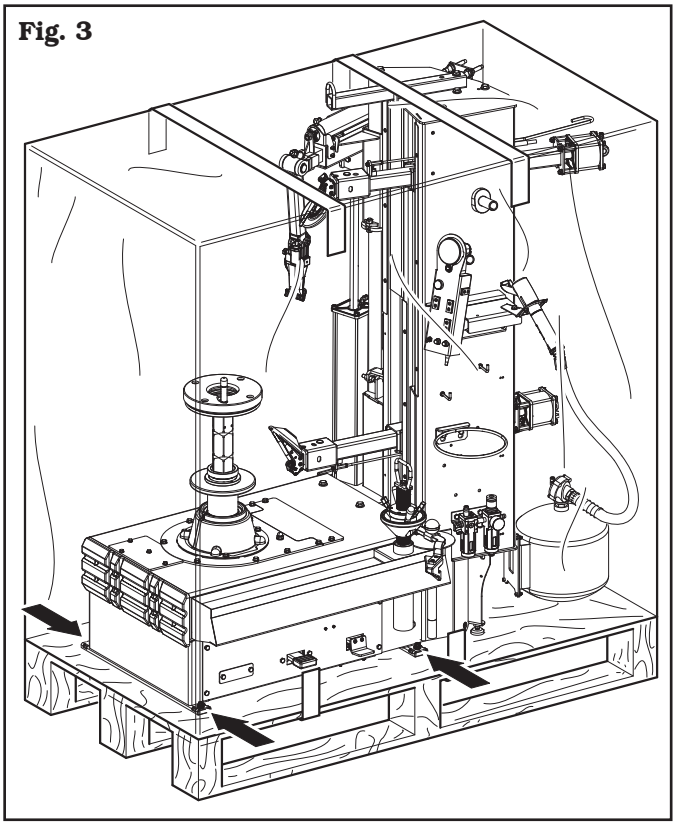
IN CASE OF A CHANCE SUPPLY FAILURE (WHETHER ELECTRICITY OR COMPRESSED AIR), MOVE THE PEDALS TO THE NEUTRAL POSITION.

5.0 PACKING AND MOBILIZATION FOR TRANSPORT

HAVE THE MACHINE HANDLED BY SKILLED PERSONNEL ONLY.
THE LIFTING EQUIPMENT MUST WITHSTAND A MINIMUM RATED LOAD EQUAL TO THE WEIGHT OF THE PACKED MACHINE (see paragraph "TECHNICAL SPECIFICATIONS").

The machine is packed completely assembled. The machine is inside a carton box which size is mm 1440x1104x1880.
Movement must be by pallet-lift or fork-lift trolley.
The fork lifting points are indicated on the packing.

Fig. 3



6.0 UNPACKING

DURING UNPACKING, ALWAYS WEAR GLOVES TO PREVENT ANY INJURY CAUSED BY CONTACT WITH PACKAGING MATERIAL (NAILS, ETC.).

The cardboard box is supported with plastic strapping. Cut the strapping with suitable scissors. Use a small knife to cut along the lateral axis of the box and open it like a fan.
It is also possible to unnail the cardboard box from the pallet it is fixed to. After removing the packing, and in the case of the machine packed fully assembled, check that the machine is complete and that there is no visible damage.
If in doubt **do not use the machine** and refer to professionally qualified personnel (to the seller).
The packing (plastic bags, expanded polystyrene, nails, screws, timber, etc.) should not be left within reach of children since it is potentially dangerous. These materials should be deposited in the relevant collection points if they are pollutants or non biodegradable.

THE BOX CONTAINING THE FIXTURES IS CONTAINED IN THE WRAPPING. DO NOT THROW IT AWAY WITH THE PACKING.

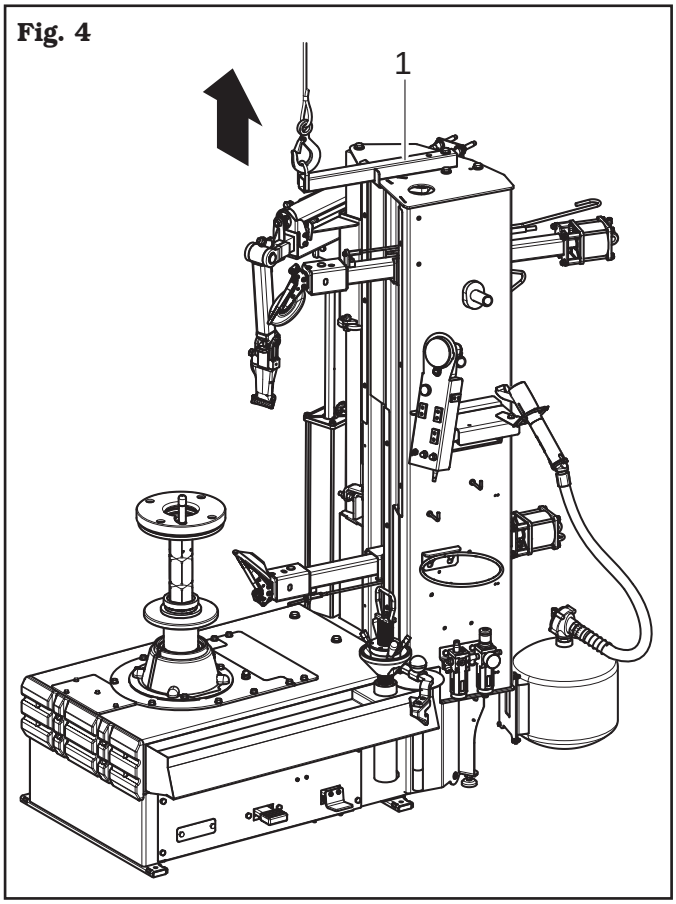
7.0 MOBILIZATION

THE LIFTING EQUIPMENT MUST WITHSTAND A MINIMUM RATED LOAD EQUAL TO THE WEIGHT OF THE MACHINE (SEE PARAGRAPH TECHNICAL SPECIFICATIONS). DO NOT ALLOW THE LIFTED MACHINE TO SWING.

During the machine handling from the unpacking position to the installation one, follow the instructions listed below.

- Protect the exposed corners with suitable material (Pluribol/cardboard).
- Do not use metallic cables for lifting.
- Make sure that the electricity supply is not connected.
- Sling with belts long at least 450 cm and with a capacity load greater than 2500 kg.
  Then carry out the lifting using the bracket (**Fig. 4 ref. 1**).

Fig. 4



8.0 WORKING ENVIRONMENT CONDITIONS

The machine must be operated under proper conditions as follows:

- temperature: 0° + 55° C
- relative humidity 30 - 95% (dew-free)

atmospheric pressure: 860 - 1060 hPa (mbar).

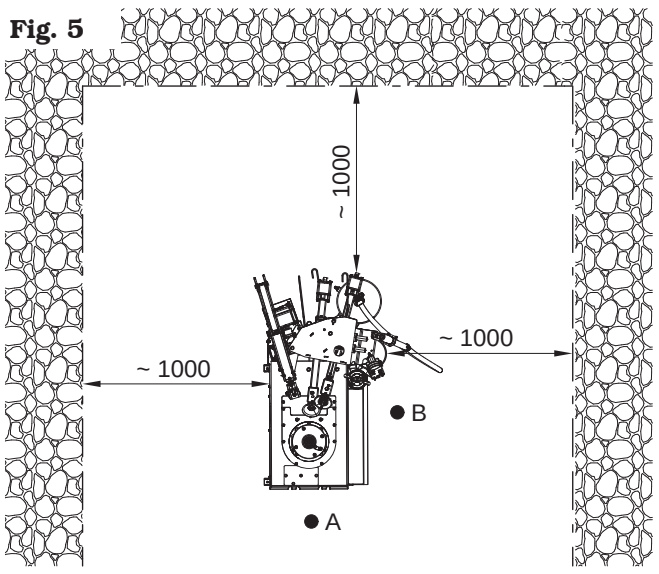
The use of the machine in ambient conditions other than those specified above is only allowed after prior agreement with and approval of the manufacturer.

8.1 Working position

In **Figure 5** it's possible to define work positions **A** and **B** which will be referred to during the description of the machine operating phases.
Position **A** is the main position for wheel fitting and removal with the mandrel, while position **B** is ideal to follow tyre inflation operations.
Working in these positions allows better precision and speed during operating phases as well as greater safety for the operator.

8.2 Working area

Fig. 5



USE THE MACHINE INDOORS OR IN A ROOFED AREA. PLACE OF INSTALLATION MUST BE DRY, ADEQUATELY LIT AND IN COMPLIANCE WITH APPLICABLE SAFETY REGULATIONS.

The location of the machine requires a usable space as indicated in **Figure 5**. The positioning of the machine must be according to the distances shown. From the control position the operator is able to observe all the machine and surrounding area. He must prevent unauthorized personnel or objects that could be dangerous from entering the area. The machine must be fixed on a flat floor surface, preferably of cement or tiled. Avoid yielding or irregular surfaces. The base floor must be able to support the loads transmitted during operation. This surface must have a strength of at least 500 kg/m^2.

The depth of the solid floor must be sufficient to guarantee that the anchoring bolts hold.

8.3 Lighting

The machine does not require its own lighting for normal working operations. However, it must be used in an adequately lit environment.
In case of poor lighting use lamps having total power 800/1200 Watt.

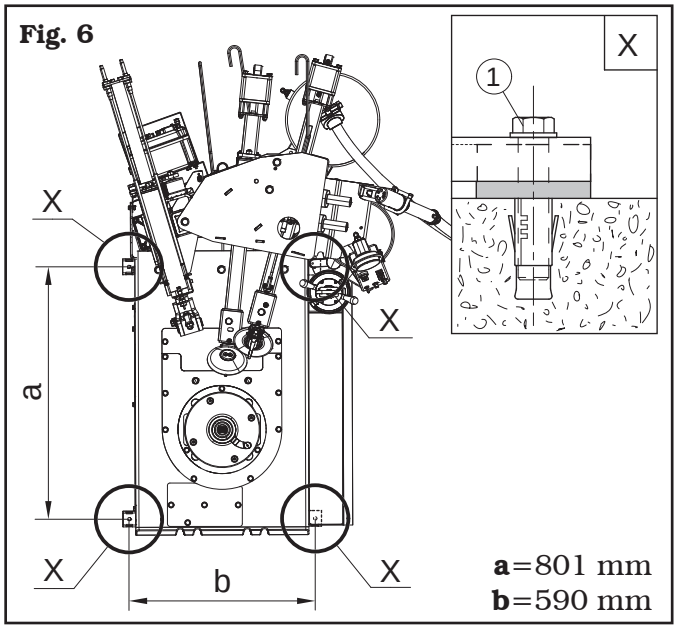
9.0 MACHINE ASSEMBLY

After having freed the various components from the packing check that they are complete, and that there are no anomalies, then comply with the following instructions for the assembly of the components making use of the attached series of illustrations.

9.1 Anchoring system

The packed machine is fixed to the support pallet through the holes prearranged on the frame. Such holes can be used also to fix the machine to the ground, through floor anchor small blocks (excluded from supply). Before carrying out the definitive fixing, check that all the anchor points are laid down flat and correctly in contact with the fixing surface itself. If not so, insert shimming profiles between the machine and the fixing lower surface, as indicated in **Fig. 6**.

Fig. 6



- Execute 4 holes with 12 mm diameter on the floor by the holes on the bottom floor;
- insert the small blocks (excluded from supply) into the holes;
- fix the machine to the ground with 4 M12x120 mm screws (excluded from supply) (**Fig. 6 ref. 1**) (or with 4 12x80 mm stud bolts (excluded from supply)). Tighten the screws with an approximate tightening torque of 70 Nm.
- Before clamping completely the machine to the floor, level its rear part rotating the feet (**Fig. 7 ref. 1**).

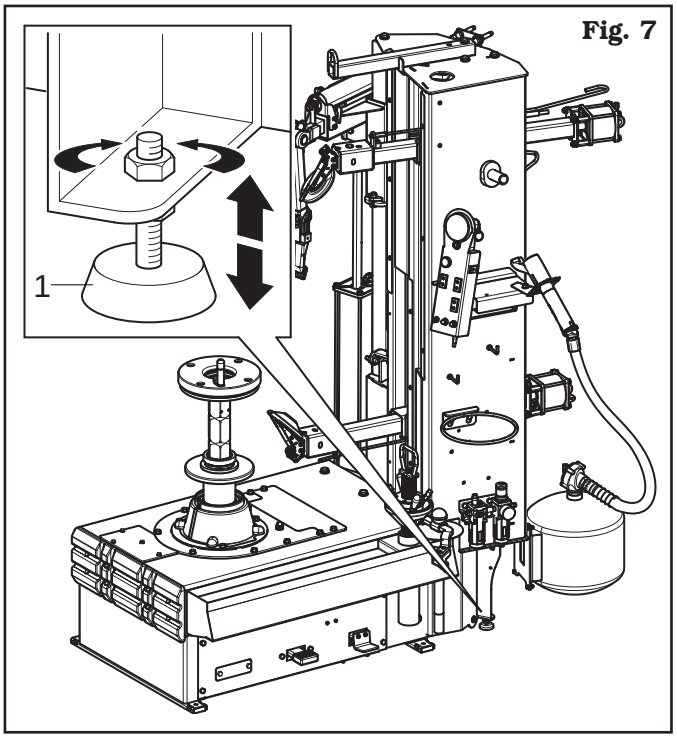


Fig. 7

9.2 Fixtures contained in the packing

The packing case contains also the fixtures box. Check that all the parts listed are there.

Code	Description	N.
B1157000	*Two-faced cone*	**1**
710013421	*Reverse wheels protection*	**1**
710090730	*Bead depressor with entrainer*	**1**
730093670	*Locking shaft unit*	**1**

9.3 Assembly procedures

1. Assemble "Tubeless inflation" unit to the machine keeping to the following instructions:

   - fix the tank (**Fig. 8 ref. 6**) to the support flange (**Fig. 8 ref. 7**) using the screws (**Fig. 8 ref. 4**) and nuts (**Fig. 8 ref. 5**) equipped on issue;

   - fix the flange (**Fig. 8 ref. 7**) to the machine (**Fig. 8 ref. 3**) using the screws (**Fig. 8 ref. 1**) and nuts (**Fig. 8 ref. 2**) equipped on issue;

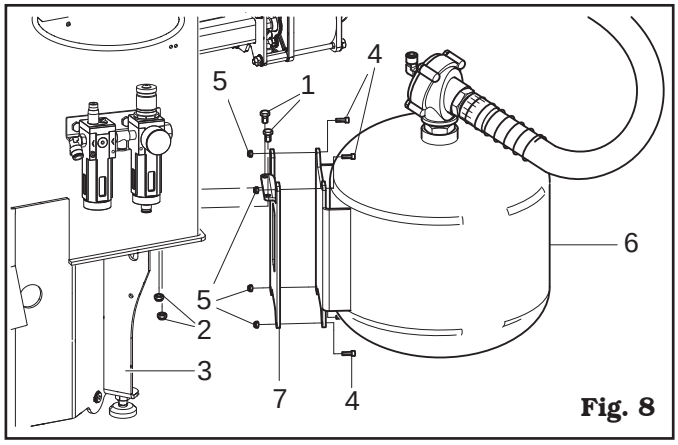
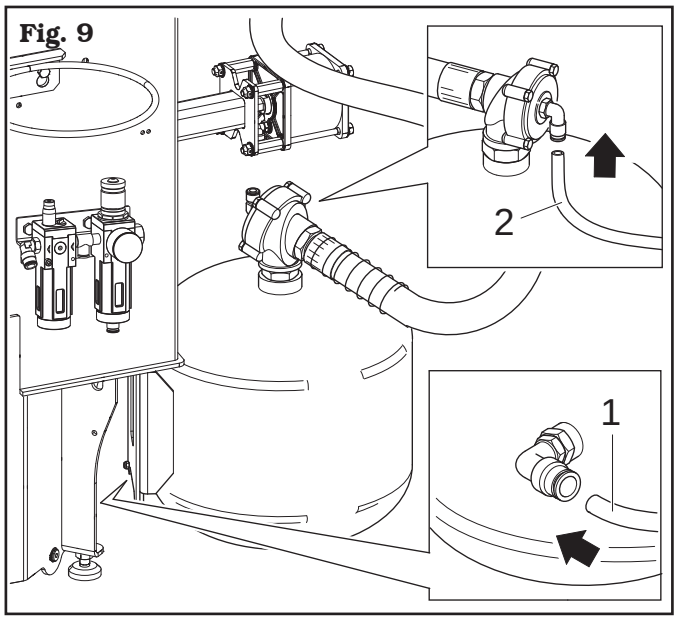


Fig. 8

2. Connect the black pipe (**Fig. 9 ref. 1**) and the blue pipe (**Fig. 9 ref. 2**) on the provided quick couplings as shown in **Figure 9**.



IN CASE OF A CHANCE SUPPLY FAILURE, AND/OR BEFORE ANY PNEUMATIC CONNECTIONS, MOVE THE CONTROLS TO THE NEUTRAL POSITION.

4 - Connect the mains pneumatic power supply by using the union placed on filter unit of the machine. The pressurized pipe coming from the mains must have a section of 10x19 (see **Fig. 10**).

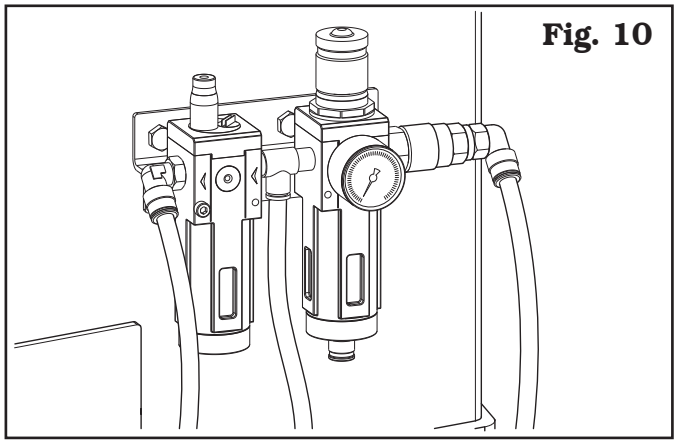


Fig. 10

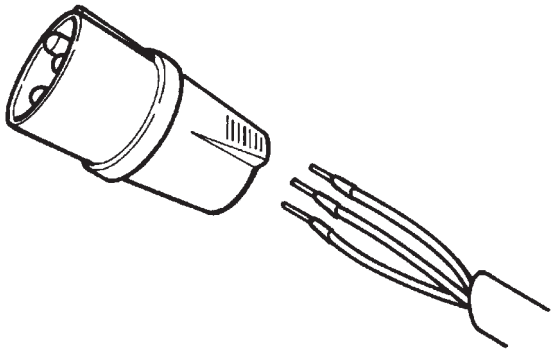
10.0 ELECTRICAL CONNECTION

EVEN THE TINIEST PROCEDURE OF AN ELECTRICAL NATURE MUST BE CARRIED OUT BY PROFESSIONALLY QUALIFIED STAFF.

BEFORE CONNECTING THE MACHINE MAKE SURE THAT:

- **THE MAIN POWER RATING CORRESPONDS TO THE MACHINE RATING AS SHOWN ON THE MACHINE PLATE;**
- **ALL MAIN POWER COMPONENTS ARE IN GOOD CONDITION;**
- **THE ELECTRICAL SYSTEM IS PROPERLY GROUNDED (GROUND WIRE MUST BE THE SAME CROSS-SECTION AREA AS THE LARGEST POWER SUPPLY CABLES OR GREATER);**
- **MAKE SURE THAT THE ELECTRICAL SYSTEM FEATURES A CUTOUT WITH DIFFERENTIAL PROTECTION SET AT 30 mA.**

As envisaged by the regulations in force, the machine is not equipped with a master circuit breaker, but simply has a plug-socket connection to the electrical mains.



The machine is supplied with **3** mt. of free cable. A plug corresponding to the following requirements must be connected to the cable:

- Conformity to Norm **IEC 309**
- **230 Volt – 16A**
- **2P + Ground**
- **IP 44**

FIT A TYPE-APPROVED PLUG TO THE MACHINE CABLE (THE GROUND WIRE IS YELLOW/GREEN AND MUST NEVER BE CONNECTED TO THE PHASE LEADS).
MAKE SURE THAT THE ELECTRICAL SYSTEM IS COMPATIBLE WITH THE RATED POWER ABSORPTION SPECIFIED IN THIS MANUAL AND APT TO ENSURE THAT VOLTAGE DROP UNDER FULL LOAD WILL NOT EXCEED 4% OF RATED VOLTAGE (10% UPON START-UP).

VERSION WITH SINGLE-PHASE MOTOR

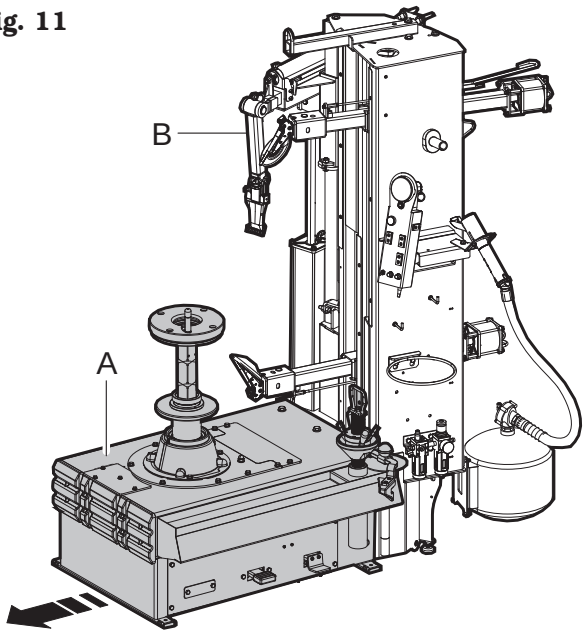
On delivery, the machine is pre-set to operate at a single-phase voltage of 200 ÷ 265 V - 50/60 Hz.

FAILURE TO OBSERVE THE ABOVE INSTRUCTIONS WILL IMMEDIATELY INVALIDATE THE WARRANTY.

10.1 Working area modification

After the delivery, the machine is prearranged to operate on wheel of 50" maximum diameter and a rim diameter (10" - 30"). It's also possible to move the tools column to enlarge the working area from 52" (with rim diameter of 12" - 32") up to 54" (with rim diameter of 14" - 34") (see **Figure 11**).

Fig. 11



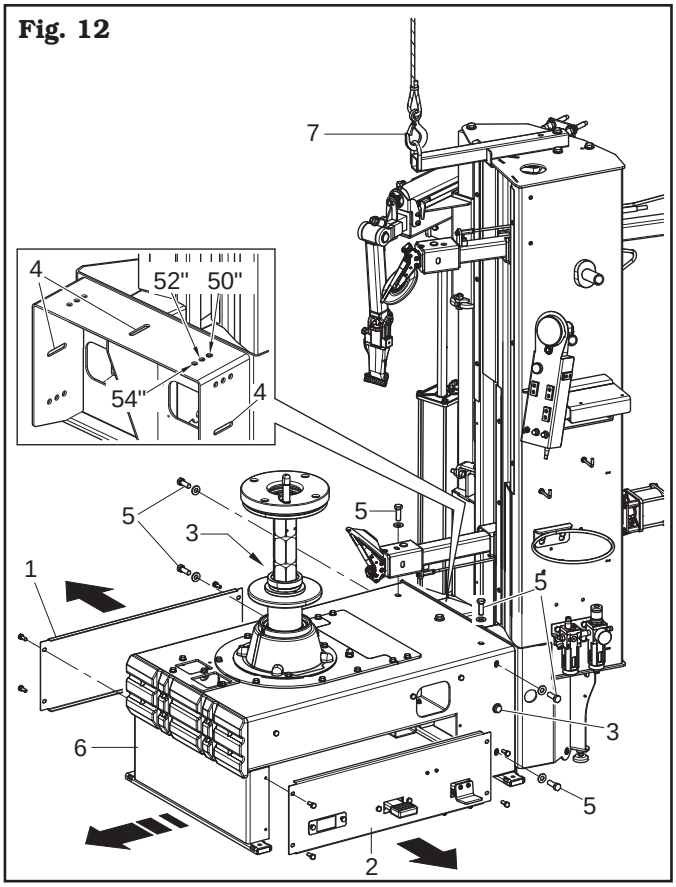
The column is moved by unloosing the fixing screws of the base (**Fig. 11 ref. A**) to the column (**Fig. 11 ref. B**) and by sliding the base (**Fig. 11 ref. A**) into the proper slots until the required measure.

MAKE SURE THAT THE TYRE-CHANGER COLUMN IS STABLE BY USING A CABLE, HELD BY A HOIST, TO BE HOOKED TO THE APPROPRIATE LIFTING TRAVERSE (FIG. 12 REF. 7).

1. Remove the lateral guards (**Fig. 12 ref. 1-2**) of the machine.
2. Unscrew the screws (**Fig. 12 ref. 3**) and the nuts near the central slots (**Fig. 12 ref. 4**) paying attention not to remove the nuts from the proper screws.
3. Remove the six remaining screws (**Fig. 12 ref. 5**).
4. Move the base (**Fig. 12 ref. 6**) into the required position (to 52" or 54") and if necessary, use a lifting device (**Fig. 12 ref. 7**).
5. Lock the base three screws (**Fig. 12 ref. 3**) with a couple of 80 Nm.
6. Place six screws (**Fig. 12 ref. 5**) previously removed and lock them on the bases side with a couple of 80 Nm.
7. Remount the lateral guards (**Fig. 12 ref. 1-2**) of the machine.

NOTE: after the assembly, check the correct position of the tools. Lock the rim on the mandrel centre. With the bead breaker arm, check that the distance between the roll and the rim edges (upper and lower) is the same. Repeat all the procedures starting from point 1 if the distance is not the same.

Fig. 12



10.2 Electrical checks

BEFORE STARTING UP THE TYRE-CHANGER, BE SURE TO BECOME FAMILIAR WITH THE LOCATION AND OPERATION OF ALL CONTROLS AND CHECK THEIR PROPER OPERATION (SEE PAR. "CONTROLS").

CARRY OUT A DAILY CHECK OF MAINTAINED-TYPE CONTROLS CORRECT FUNCTIONING, BEFORE STARTING MACHINE OPERATION.

11.0 CONTROLS

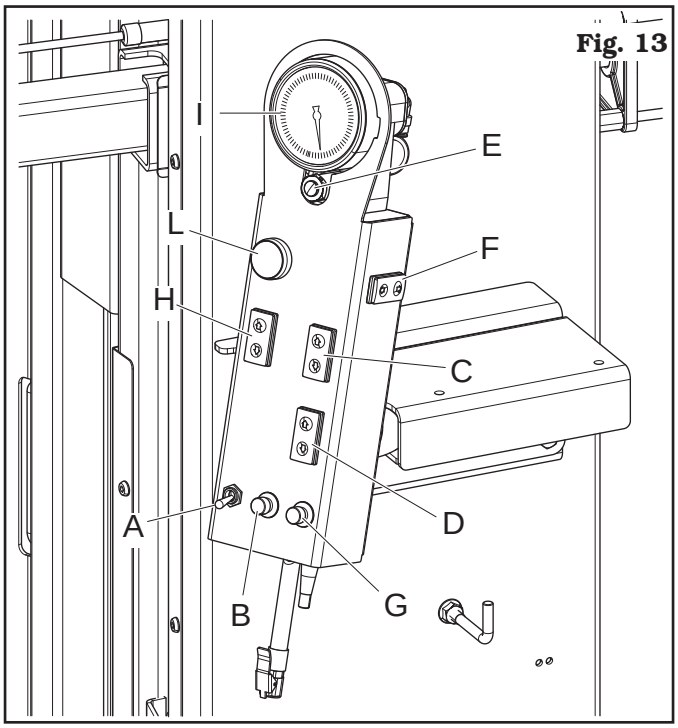


Fig. 13

11.1 Control device (see Fig. 13)

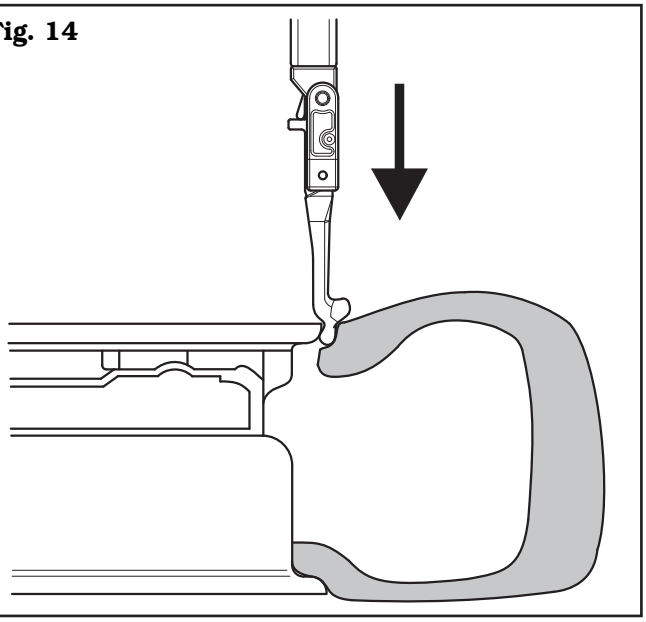
The control device consists of a panel with integrated keys and push buttons.

- The selector **"A"** allows the machine working selection: automatic or manual.
  - Automatic: it allows to enable the functioning of the feeler pins placed on the bead breaking rolls.
  - Manual: it allows to carry out all the bead breaking operations without the checking of the feeler pins.
- The inflation pressure gauge **"I"** for the pressure reading into the tyre.
- The inflation push-button **"E"** , if pushed it allows to deflate the tyre at the required pressure.
- The push-button **"B"** has one mechanically hold position and once pushed it controls the operation of the upper bead breaking roll cam for its insertion into the rim in "Manual" mode. In the "Automatic" model the push-button is disabled.
- The push-button **"G"** has one mechanically hold position and once pushed it controls the operation of the lower bead breaking roll cam for its insertion into the rim in "Manual" mode. In the "Automatic" model the push-button is disabled.
- Arms automatic return from the working position. In AUTO mode, pushing at the same time the **"G"** and **"B"** keys, the tools arms automatically return into the limit switch position. To stop the automatism, to push the keys to control the arms vertical translation.
- The push-button **"F"** has one hold position and once pushed (⬅) it controls the ahead translation of the tools. If pushed (➡) it controls the backwards translation of the tools.
- The push-button **"C"** has one hold position and it controls the vertical shifting of the upper bead breaking roll. If pushed on its lower part (⬇), it will control the downwards translation. If pushed on its upper part (⬆), it controls upward translation. Keeping it pushed for more than one second, translation carries on automatically until the arm reaches the stroke limit. To stop automatism, push again push button "**C**".
- The push-button **"D"** has one mechanically hold position and once pushed it controls the vertical shifting of the lower bead breaking roll. If pushed on its lower part (⬇), it will control the downwards translation. If pushed on its upper part (⬆), it controls upward translation. Keeping it pushed for more than one second, translation carries on automatically until the arm reaches the stroke limit. To stop automatism, push again push button **"D"**.
- The push-button **"H"** has one mechanically hold position and it controls the upper tool vertical shift. If pushed on its lower part (⬇), it will control the downwards translation. If pushed on its upper part (⬆), it controls upward translation.
- The backlighted push button **"L"** allows the storing of the height position of the tool arm, so that by merely pressing the same, the tool comes back to the previously stored position (see paragraph 11.2).

11.2 Storing of tool vertical position

Place the upper tool next to the rim's edge (see **Figure 14**).

Fig. 14



Press the storing push button (**Fig. 15 ref. 1**) and keep it pressed until the same switches on. When it is switched on, tool position storing operation is completed.

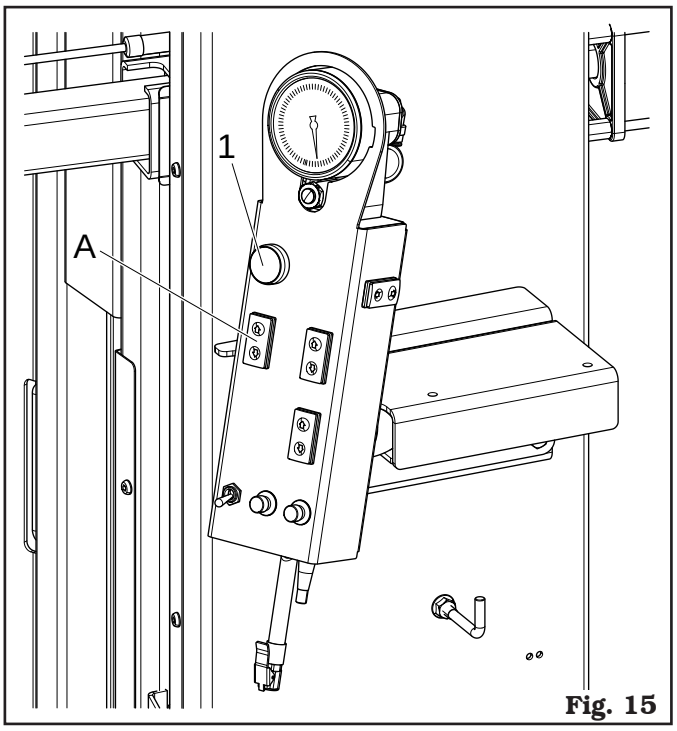


Fig. 15

11.2.1 Return of tool vertical position

Press storing push button (**Fig. 15 ref. 1**) in order to automatically move the upper tool in the previously stored position next to the rim's edge (see **Figure 14**). During the repositioning of the upper tool, the storing push button starts blinking. Once the stored position has been reached, the push button light will become fixed.

IN ORDER TO STOP THE UPPER TOOL MOVEMENT, RETURNED THROUGH THE STORING FUNCTION, PRESS KEY "A" IN FIG. 15.

ONLY THE VERTICAL POSITION OF THE UPPER TOOL CAN BE STORED. IF THE TOOL IS HORIZONTALLY POSITIONED, BY PRESSING THE RETURN PUSH BUTTON, IT COULD HIT THE RIM OF THE TYRE IN AN INCORRECT POSITION.

11.2.2 Erasure of tool stored position

Press the storing push button (**Fig. 15 ref. 1**) and keep it pressed until the same switches off.

11.2.3 Reset of tool stored position

In order to modify the stored position of the upper tool, use tool vertical movement push button (**Fig. 13 ref. H**) in order to move the same in the new required position. Press the storing push button (**Fig. 15 ref. 1**) and keep it pressed until the same switches off. When the button is kept pressed, it lights up again, indicating the storing of the new position.

11.3 Pedalboard (see Fig. 16)

"Pedal A" has two maintained action operative positions. When it is pushed downwards it controls mandrel motor clockwise rotary movement. When the pedal is lifted upwards it operates the opposite movement.

NOTE: The mandrel unit speed can be continuously adjusted up to the maximum speed through a progressive pressure on the pedal, only in clockwise direction.

"Pedal B" has a different function according to the version present on the machine.

Version with inflation with pressure gauge

The inflation pedal in this version has only one function. A continuous pressure supplies air at a controlled pressure (max 4.2 ± 0,2 bar 60 PSI).

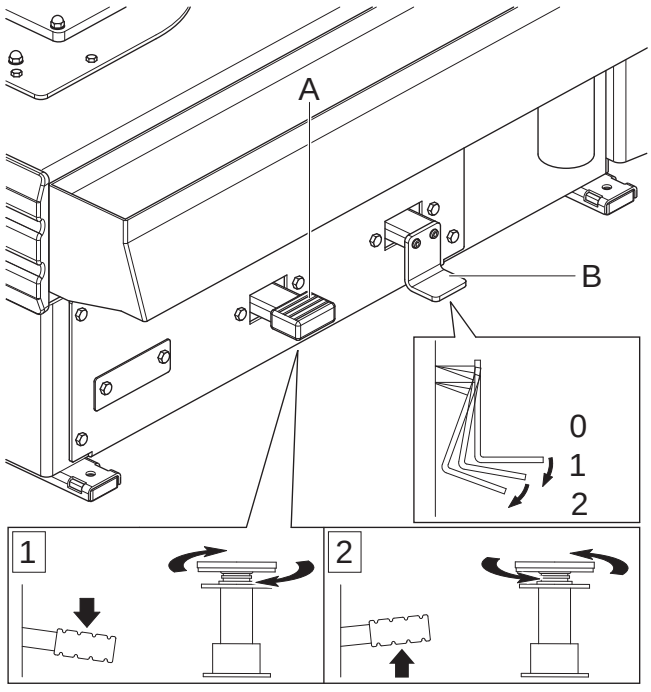
DO NOT CHANGE THE SET OPERATING PRESSURE VALUE BY MEANS OF THE MAXIMUM PRESSURE VALVES. THE MANUFACTURER SHALL NOT BE RESPONSIBLE FOR INJURY OR DAMAGE ARISING FROM UNAUTHORISED CHANGES.

Version with tubeless inflation

The inflation pedal has two functions. The supply of air at a controlled pressure as in the previous version, and a second function of a jet of air from the inflation nozzle to assist the beading in of the tyre.

DO NOT CHANGE THE SET OPERATING PRESSURE VALUE BY MEANS OF THE MAXIMUM PRESSURE VALVES. THE MANUFACTURER SHALL NOT BE RESPONSIBLE FOR INJURY OR DAMAGE ARISING FROM UNAUTHORISED CHANGES.

Fig. 16



KEY (pedal **ref. B**)
ref. 1 - Tyre inflation with pressure gauge
ref. 2 - Tyre inflation with pressure gauge + inflation nozzle

12.0 USING THE MACHINE

12.1 Precaution measures during tyre removal and fitting

Before fitting a tyre, observe the following safety rules:

- rim and tyre must be clean, dry and in good condition. If necessary, remove the balancing weights and clean the rim. Check:
  - neither the bead nor the tread of the tyre are damaged;
  - the rim does not produce dents and/or deformation (especially for alloy rims, dents can cause internal micro-fractures, that pass unobserved at visual inspection, and can compromise the solidity of the rim and constitute danger even during inflation);
- adequately lubricate the contact surface of rim and tyre bead. Use specific tyre lubricants only;
- replace the inner tube valve with a new valve. If the tyre tube has a metal valve, replace the grommet;
- make sure that the tyre is the right size for the rim. Never fit a tyre unless you are sure it is the right size (the rated size of the rim and tyre is usually printed directly on each of them);
- do not use compressed air or water jets to clean the wheels on the machine.

12.2 Preliminary operations - Preparing the wheel

- Remove the wheel balancing weights from both sides of the wheel.

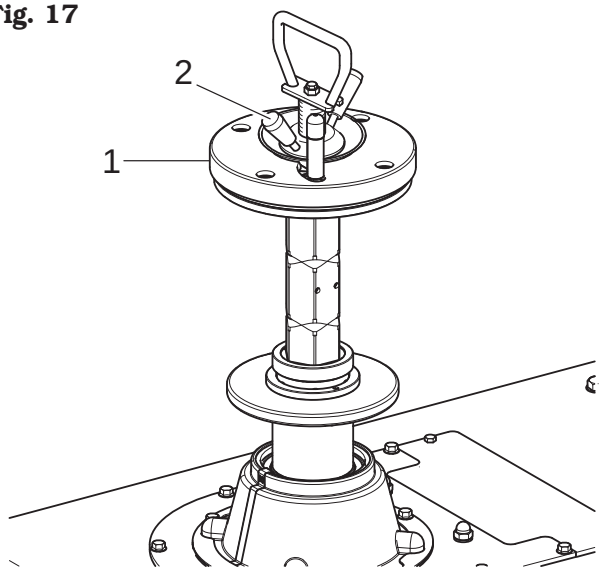
REMOVE THE VALVE STEM AND ALLOW THE TYRE TO COMPLETELY DEFLATE.

- Establish from which side the tyre should be demounted, checking the position of the groove.
- Find the rim locking type.
- Try to establish the special types of wheels, such as “EH2” and “EH2+”, in order to improve locking, bead breaking, assembly and disassembly performances.

12.3 Wheel clamping

All wheels must be locked on the rubber plate (**Fig. 17 ref. 1**) through the central hole using the proper locking device (**Fig. 17 ref. 2**).

Fig. 17

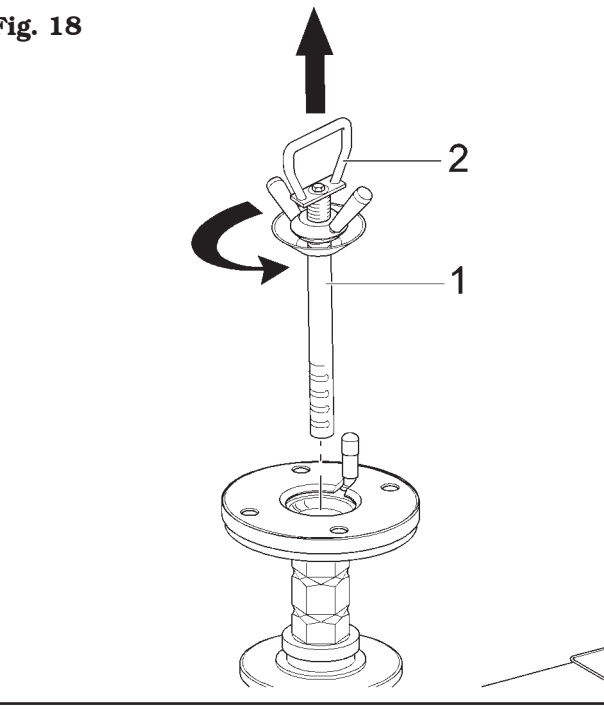


NOTE: in case of use of rims without central hole, it's necessary to use the proper fixture (available on demand).

To lock a rim proceed as follows:

1. Extract the central locking shaft and its cone (**Fig. 18 ref. 1**) through the proper handle (**Fig. 18 ref. 2**) and, if necessary, turn it to make easy the extraction.

Fig. 18



2. Dowel the wheel (**Fig. 19 ref. 1**) in the locking platform and check that the dragging pin (**Fig. 19 ref. 2**) enter in a hole placed on the rim hub.

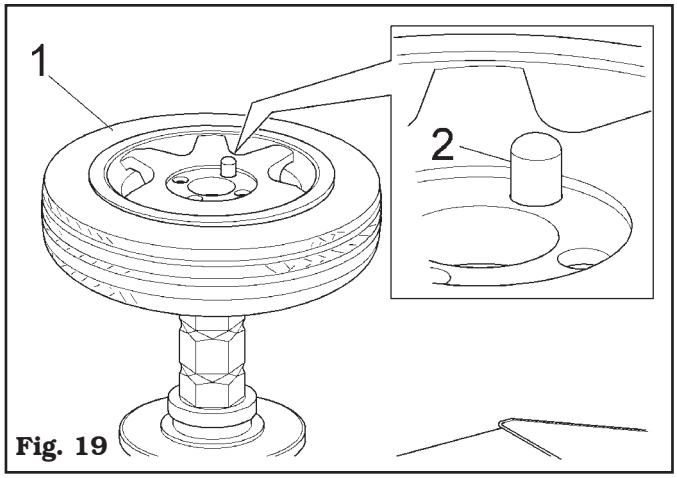
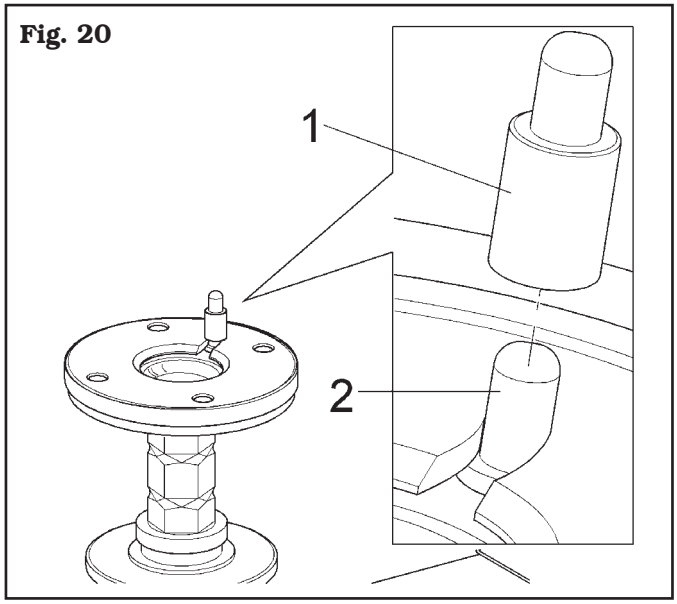


Fig. 19

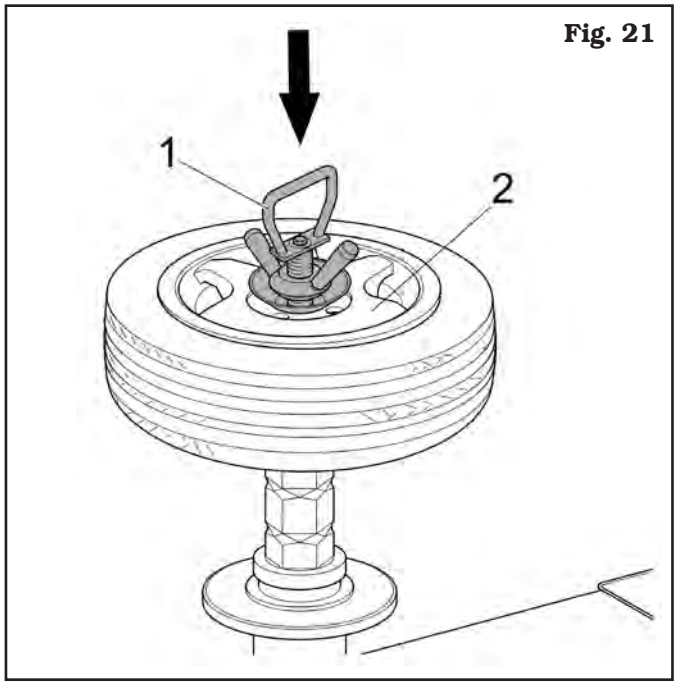
3. If the wheel hub is higher then the dragger (**Fig. 20 ref. 2**), use the extension (**Fig. 20 ref. 1**) supplied on issue.

Fig. 20



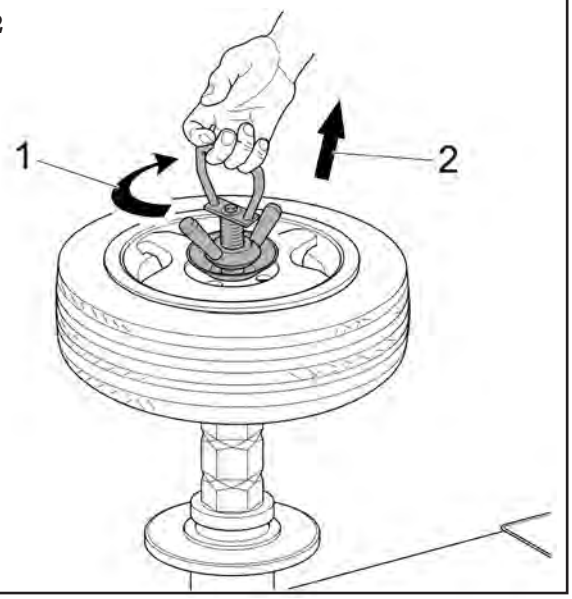
4. Insert the shaft and the relative cone (**Fig. 21 ref. 1**) on the rim (**Fig. 21 ref. 2**).

Fig. 21



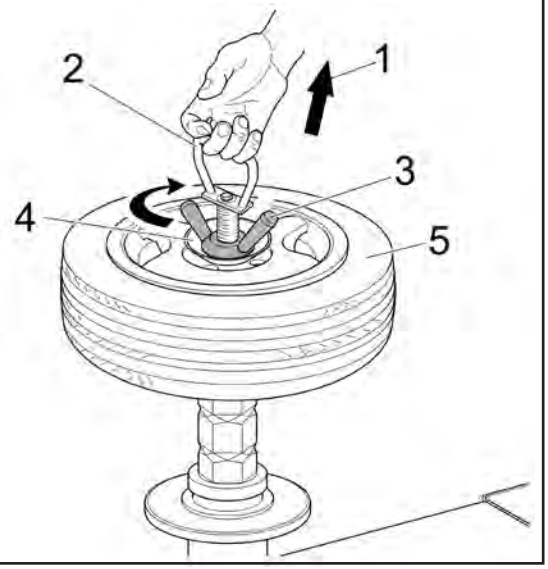
5. Turn through 90° (**Fig. 22 ref. 1**) and lift the shaft (**Fig. 22 ref. 2**) to hook it inside the hole.

Fig. 22



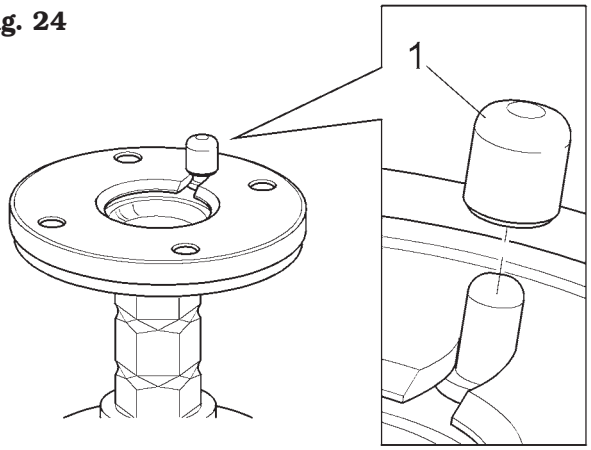
6. Keeping the shaft lifted (**Fig. 23 ref. 1**) through the handle provided (**Fig. 23 ref. 2**), rotate the ring nut (**Fig. 23 ref. 3**) up to the complete tightening of the cone (**Fig. 23 ref. 4**) on the wheel (**Fig. 23 ref. 5**).

Fig. 23



7. For wheels with alloy rims, use the proper plastic guard (**Fig. 24 ref. 1**) (optional).

Fig. 24



NEVER LEAVE THE WHEEL FITTED ON THE MACHINE FOR A PERIOD LONGER THAN NECESSARY FOR CARRYING WORK AND IN ANY CASE NEVER LEAVE IT UNATTENDED.

To release the wheel, carry out the previously operations on the contrary way.

12.3.1 Mandrel height adjustment

The mandrel with central locking has 3 different height mode. A "quick release" system allows to remove the mandrel mobile part and to dowel the support plate at the required height.
The adjustment through the sliding shaft is possible following three phases as indicated on the enclosed photo:

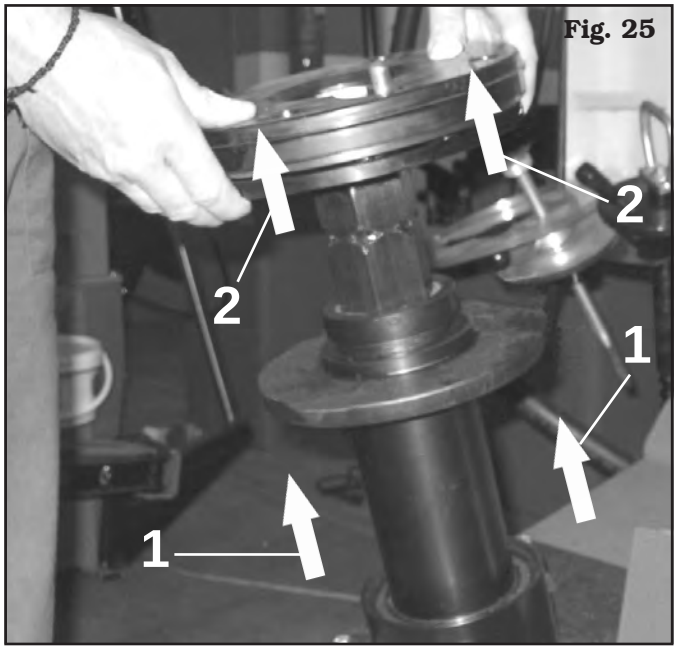
1- Lift the flange as indicated by the arrows (**Fig. 25 ref. 1**).

2 - At the same time release and then lift the wheel support as indicated by the arrows (**Fig. 25 ref. 2**).

3 - Check that the flange return into the coupler position.

Now it's possible to place the tyre in the right way with the working tools.

Fig. 25



12.3.2 Reverse wheel pan protection

In case of use of reverse wheels, to protect the rim, apply on the rubber platform a protection made of a transparent plastic material available on demand (**Fig. 26 ref. 1**). We suggest you a constant replacement of it and in any case if there are visible damages (see **Fig. 26**).

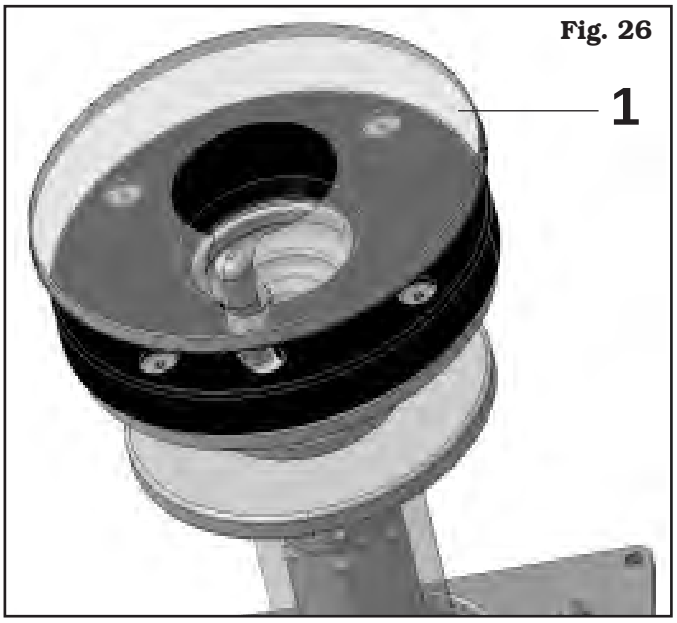


Fig. 26

12.4 Bead breaking through vertical rollers

For what concerns bead breaking, there are two different options, which can be activated through the selector (**Fig. 27 ref. 1**).

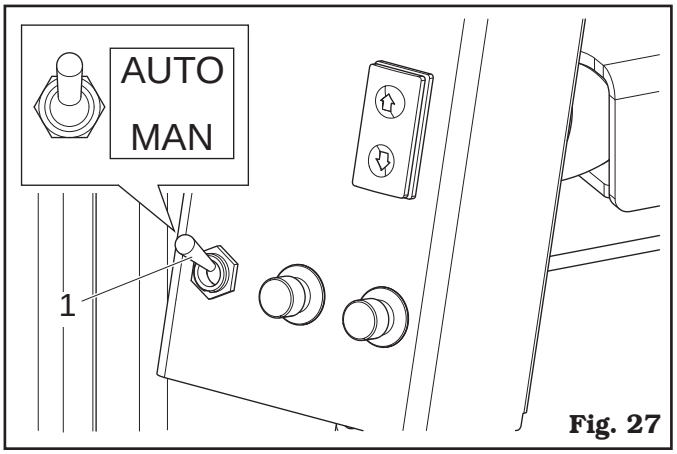


Fig. 27

AUTOMATIC (AUTO)

1. After the wheel has been locked, move the upper bead breaking roller (**Fig. 28 ref. 2**) near rim edge; pressing the push button (**Fig. 13 ref. C**)(⬇).

MOVE VERY CAREFULLY THE VERTICAL BEAD BREAKING ARMS TO WORKING POSITION, IN ORDER TO AVOID POSSIBLE HANDS CRUSHING.

2. Establish the diameter with the help of laser (**Fig. 28 ref. 1**) using the button (**Fig. 13 ref. F**).

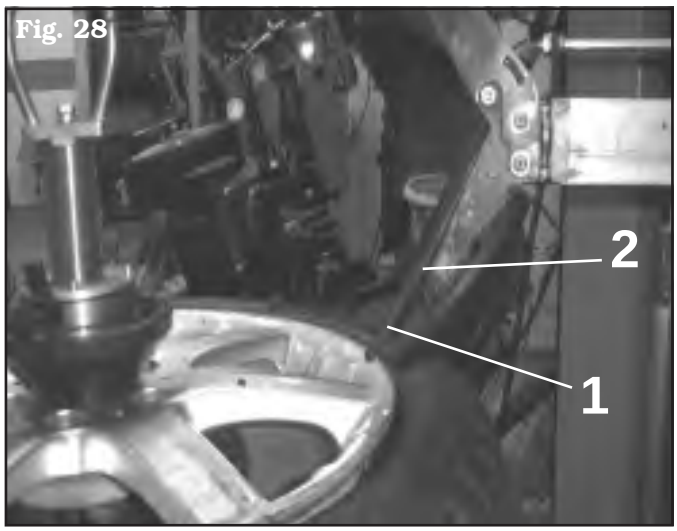


Fig. 28

3. Go on with the approaching movement activating the wheel rotation in clockwise direction. The contact between feeler pin and rim edge will automatically activate the progress of the roll (**Fig. 29 ref. 1**), which will be inserted between the rim (**Fig. 29 ref. 2**) and the tyre (**Fig. 29 ref. 3**). The same automatism can be applied to the lower roll as well.

THE BEADING DISC MUST EXERT PRESSURE ON THE TYRE BEAD BUT NEVER ON THE RIM.

USE VERY CAREFULLY THE VERTICAL BEAD BREAKING ROLLERS IN ORDER TO AVOID POSSIBLE HANDS CRUSHING.

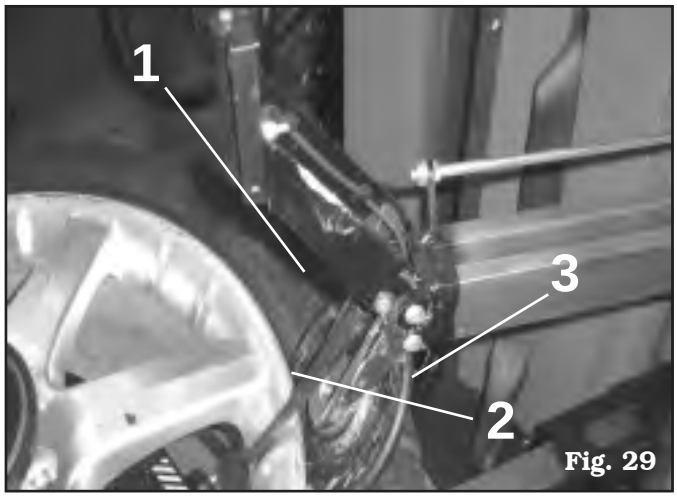


Fig. 29

4. Move the lower roll close (**Fig. 30 ref. 1**) with the key (**Fig. 13 ref. D**) (⬆).

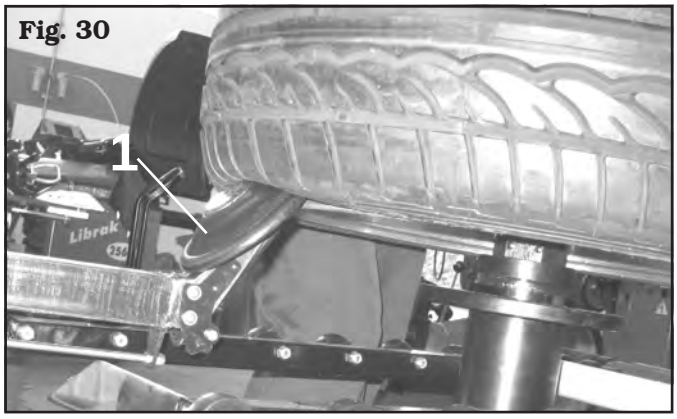


Fig. 30

5. Only now turn the wheel clockwise pressing the pedal (**Fig. 14 ref. A**) and, at the same time, operate the push button (**Fig. 13 ref. D**) (⬆), keeping it pressed until there's room enough for bead breaking.

WHILE THIS OPERATION IS BEING CARRIED OUT PAY ATTENTION NOT TO DEFORM THE TYRE SIDE. GREASE THE BEAD BEFORE THE ROLL RE-ENTERS.

6. Once bead breaking in the lower part has been completed, move the lower roll to rest position activating the push-button (**Fig. 13 ref. D**) (⬇). The roll re-enters automatically nullifying the approaching movement described at point 3). This automatism can be applied on both arms.
7. Rotate the rim until the valve is positioned on the immediate right of the roll.
8. Carry out upper edge bead breaking, in the same way, keeping the push button pushed (**Fig. 13 ref. C**) (⬇) (see **Fig. 31**).

WHILE THIS OPERATION IS BEING CARRIED OUT PAY ATTENTION NOT TO DEFORM THE TYRE SIDE. GREASE THE BEAD BEFORE THE ROLL RE-ENTERS.

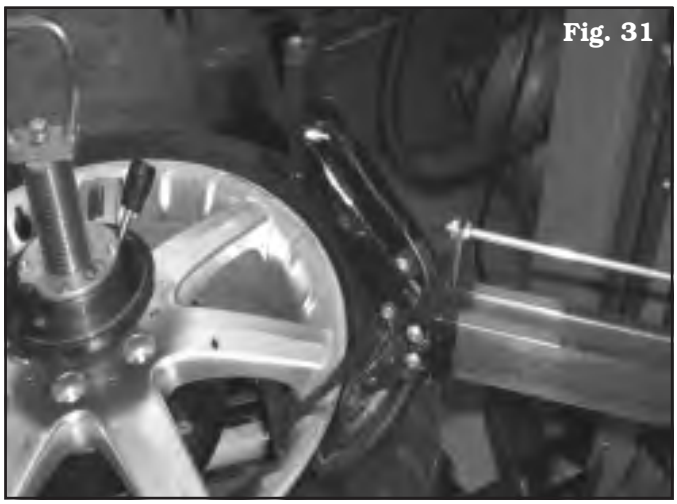


Fig. 31

NOTE: until both upper and lower rolls are not back in rest position (**Fig. 28**) is not possible to carry out a new diameter adjustment, as described at point 2).

For some types of tyres/rims the feeler pin might not work in a short lack of time as it should, causing the tyre turnover or the lacking of bead breaking. To solve this trouble, carry out manual bead breaking (see related paragraph).

MANUAL (MAN)

The same operations described in the *automatic* bead breaking must be followed until point 2. Then, continue the process as follows:

3. Go on with the approaching movement activating the wheel rotation in clockwise direction.
4. Move the lower roll close (**Fig. 30 ref. 1**) with the key (**Fig. 13 ref. D**) (⬆).

USE VERY CAREFULLY THE VERTICAL BEAD BREAKING ROLLERS IN ORDER TO AVOID POSSIBLE HANDS CRUSHING.

5. Press the pedal to rotate the wheel in a clockwise direction (**Fig. 14 ref. A**) and at the same time operate the push-button (**Fig. 13 ref. D**) (⬆), keeping it pressed until creating a space large enough for the roll to progress with the manual cam. Activate the lower cam pushing the push button (**Fig. 13 ref. G**) and keep on bead breaking until the operation is complete.

Points 6 and 7 do not change, while for the upper edge bead breaking the instructions described above must be followed, but using the push buttons related to the upper roll (**Fig. 13 ref. C** (⬇) **and B**).

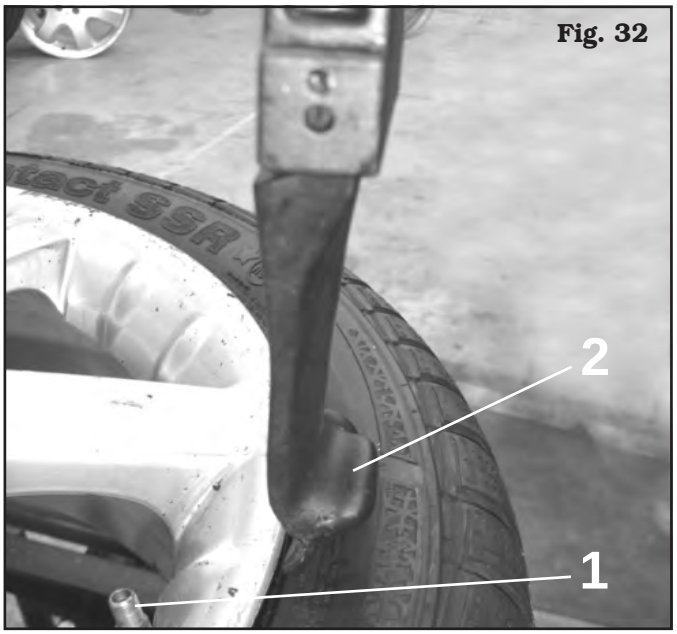
UNTIL BOTH UPPER AND LOWER ROLLS DO NOT RE-ENTER, IS NOT POSSIBLE TO CARRY OUT A NEW DIAMETER ADJUSTMENT, AS DESCRIBED AT POINT 2) IN THE PREVIOUS PAGE.

12.5 Demounting the tyre

When both beads are broken, the tyre can be demounted.

1. Press the pedal (**Fig. 16 ref. A**) to rotate the wheel clockwise until the valve stem reaches "hour 1" position (**Fig. 32 ref. 1**).

Fig. 32



2. Position the upper tool (**Fig. 32 ref. 2**) just next the rim edge using the provided control (**Fig. 13 ref. H**) (⬇) (upper tool descent) (see **Fig. 35**). While this phase is being carried out, stay just next to a zone in the tyre where bead breaking has been effectuated.

MAKE SURE THE STORING FUNCTION IS NOT ACTIVE (LIGHT OF PUSH BUTTON "1" IN FIG.15 TURNED OFF) BEFORE PRESSING STORING PUSH BUTTON TO STORE THE POSITION REACHED BY THE TOOL ON THE RIM'S EDGE (SEE CHAP. 11.2).

MOVE VERY CAREFULLY THE TOOLS HOLDER ARM TO WORKING POSITION, IN ORDER TO AVOID POSSIBLE HANDS CRUSHING.

WHILE THIS OPERATION IS BEING CARRIED OUT PAY ATTENTION NOT TO DEFORM THE TYRE SIDE. GREASE THE BEAD BEFORE THE ROLL RE-ENTERS.

USE ONLY TYRE LUBRICANTS. SUITABLE LUBRICANTS CONTAIN NO WATER, HYDROCARBONS, OR SILICON.

Wheels with rim protector

With this type of tire, there could be cases where the rim protector doesn't allow the upper tool to insert between the rim and the tire (as represented in **Figure 33**).

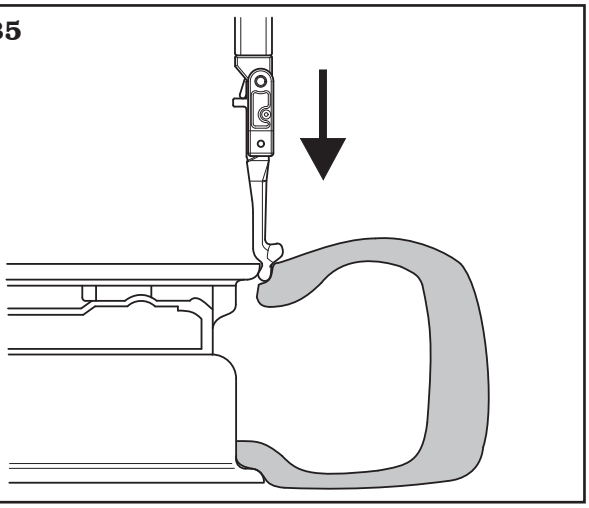
Fig. 33

In these cases, it's necessary to let the wheel turn clockwise and to apply a slight pressure through the tool as represented in **Figure 34**. In case of rim protectors with particular shapes, let the wheel turn counter-clockwise.

Fig. 34

WHILE THIS OPERATION IS BEING CARRIED OUT PAY ATTENTION NOT TO DEFORM THE TYRE SIDE. GREASE THE BEAD BEFORE THE ROLL RE-ENTERS.

Fig. 35



3. Move forward the tool so that it penetrates between the rim and the tyre (see **Fig. 36**). While this operation is being effectuated, the tool rotates around the rim edge until it hooks the tyre bead (see **Fig. 37**).

Fig. 36

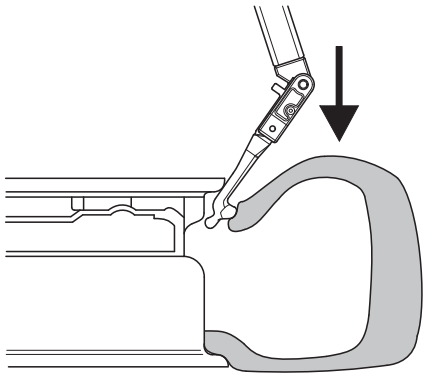
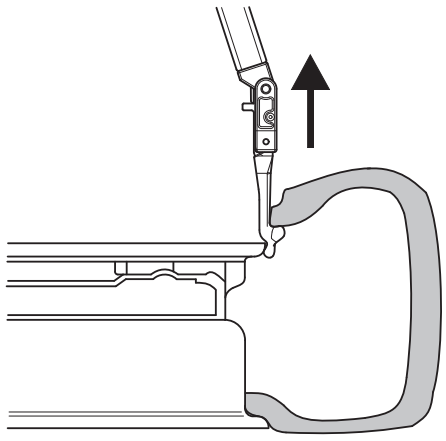


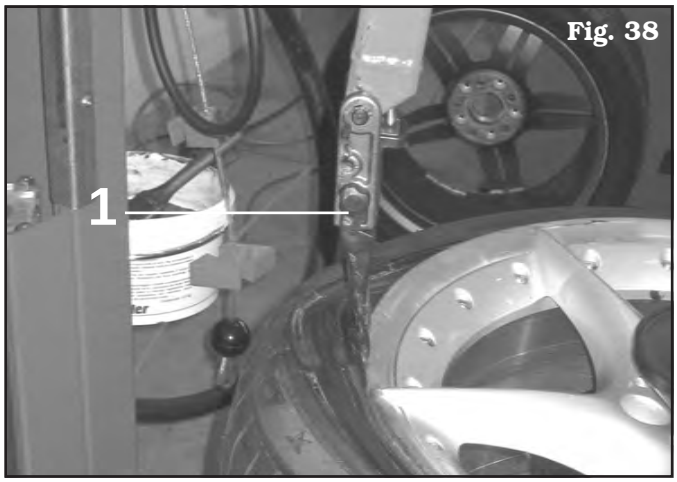
Fig. 37



4. Lift the tool through the provided control (**Fig. 13 ref. H**). When the tool reaches a vertical position related to the rim (**Fig. 38 ref. 1**), rotate the mandrel so that the tyre enters the rim groove. Keep on lifting the tool until the bead is on the rim edge (see **Fig. 37**).

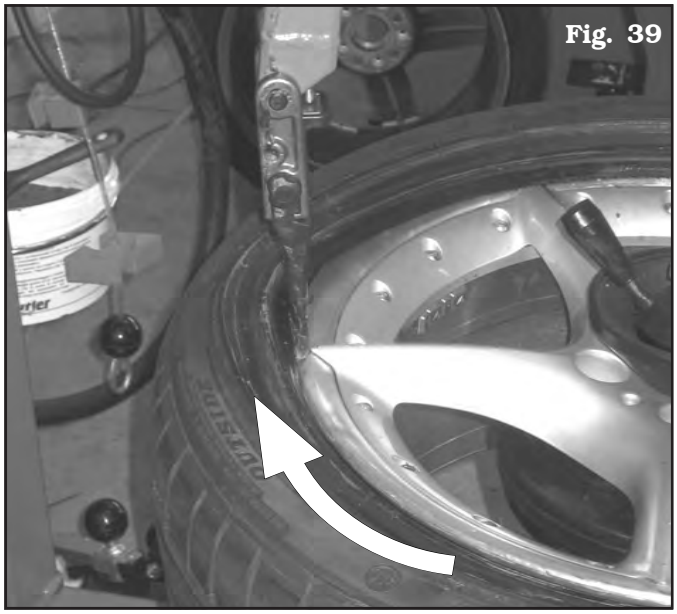
MAKE SURE THAT THE TOOL IS ON DEMOUNTING POSITION (FIG. 37) BEFORE STARTING MANDREL ROTATION.

Fig. 38



5. Rotate clockwise until the upper bead is completely disassembled (see **Fig. 39**).

Fig. 39



6. Lift the tool (see **Fig. 40 ref. 1**) keeping it coupled to the upper bead of the tyre with the bead breaking roller.

Fig. 40

7. Place the tool (see **Fig. 41, ref 1**) near the rim edge. Using the lower bead breaking roller, load the lower bead on the tool in demounting position.

Fig. 41

8. Rotate the mandrel clockwise until the tyre is completely disassembled.

Demounting the lower bead

To disassemble the lower tyre the bead breaking roller can be used alternatively. Lift the tool and go away from the working area.

1. Lift the roll and the tyre just next to the rim edge (see **Fig. 42**) using the push button (**Fig. 13 ref. D**) (⬆).


Fig. 42

2. Therefore, move forward the roll through the provided control (**Fig. 13 ref. D**) (⬆) so that it is inserted between the rim edge and the lower bead (see **Fig. 43**).

THE BEADING DISC MUST EXERT PRESSURE ON THE TYRE BEAD BUT NEVER ON THE RIM.

USE VERY CAREFULLY THE VERTICAL BEAD BREAKING ROLLERS IN ORDER TO AVOID POSSIBLE HANDS CRUSHING.


Fig. 43

3. Then, rotate and complete bead disassembly (see **Fig. 44**).


Fig. 44

WHEN THE BEADS COME OUT OF THE RIM THE TYRE MIGHT FALL. CARRY OUT VERY CAREFULLY THESE OPERATIONS.

12.6 Mounting the tyre

1. Lubricate the tyre's beads.

USE ONLY TYRE LUBRICANTS. SUITABLE LUBRICANTS CONTAIN NO WATER, HYDROCARBONS, OR SILICON.

2. Position the tool (**Fig. 45 ref. 1**) on the rim edge.

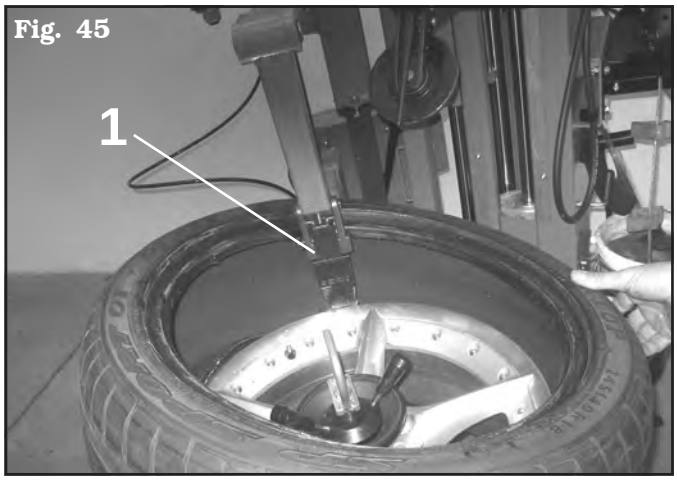


Fig. 45

3. Hook the lower bead on the tool then rotate clockwise until the complete assembly.

4. Then, position the upper bead on the tool assembly area (**Fig. 46 ref. 1**).

Fig. 46

5. Assemble the extension with entrainer near the rim edge (see **Fig. 47**).


Fig. 47

6. Lower the upper bead breaker roll so that the tyre bead is kept at the same height of the rim groove (see **Fig. 48**).

Fig. 48

THE BEADING DISC MUST EXERT PRESSURE ON THE TYRE BEAD BUT NEVER ON THE RIM.

USE VERY CAREFULLY THE VERTICAL BEAD BREAKING ROLLERS IN ORDER TO AVOID POSSIBLE HANDS CRUSHING.

7. Rotate clockwise until tyre complete assembly (see **Fig. 49**).

FOR THE MOUNTING OF VERY DIFFICULT WHEELS, USE THE EXTENSION OF THE BEAD DEPRESSOR (FIG. 48 REF. 1).


Fig. 49

8. When the operations have been completed move all the tools in rest position.

12.7 Special use of the bead-breaker

In addition to its use during mounting and demounting, the bead-breaker roll can also be used for matching the tyre to the rim. To conduct this operation carry out the following instructions.

- Clamp the tyre between the bead breaker roll.
- Turn the motor clockwise until the reference point on the tyre coincides with the reference point on the rim (usually the valve) (see **Fig. 50**).

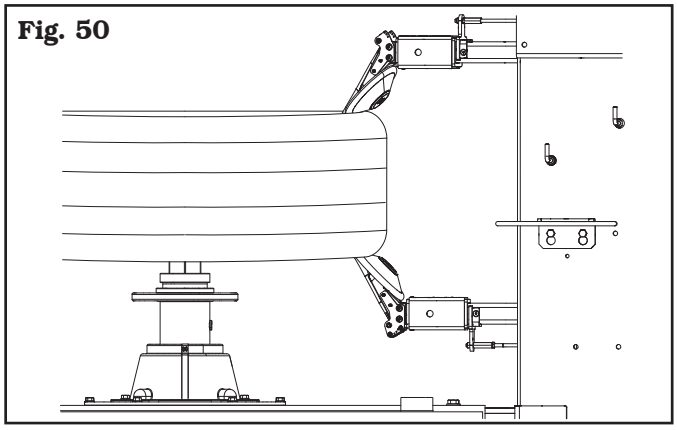


Fig. 50

13.0 ROUTINE MAINTENANCE

BEFORE CARRYING OUT ANY ROUTINE MAINTENANCE OR ADJUSTMENT PROCEDURE, DISCONNECT THE MACHINE FROM THE ELECTRICITY SUPPLY USING THE SOCKET/PLUG COMBINATION AND CHECK THAT ALL MOBILE PARTS ARE AT A STANDSTILL.

BEFORE EXECUTING ANY MAINTENANCE OPERATION, MAKE SURE THERE ARE NO WHEELS LOCKED ONTO THE SELF-CENTRER.

To guarantee the efficiency and correct functioning of the machine, it is essential to carry out daily or weekly cleaning and weekly routine maintenance, as described below.
Cleaning and routine maintenance must be conducted by authorized personnel and according to the instructions given below.

- Disconnect the mains power supply before starting any cleaning operation.
- Remove deposits of tyre powder and other waste materials with a vacuum cleaner.

DO NOT BLOW IT WITH COMPRESSED AIR.

- Do not use solvents to clean the pressure regulator.
- The conditioning unit is equipped with an automatic vacuum-operated drain therefore it requires no manual intervention by the operator (see **Fig. 51**).

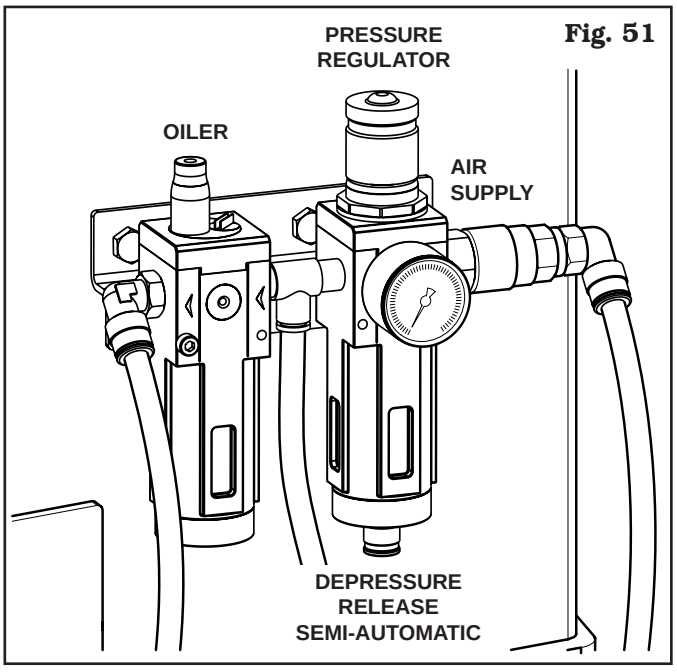


Fig. 51

IN ORDER TO ENSURE A GOOD FUNCTIONING AND TO AVOID THE PRESENCE OF CONDENSATION IN THE AIR TREATMENT UNITS WITH SEMI-AUTOMATIC DRAIN, IT'S NECESSARY TO MAKE SURE ABOUT THE CORRECT POSITION OF THE VALVE (FIG. 53 REF. 1), PLACED UNDER THE CAP. TO ACTIVATE A CORRECT DRAIN FUNCTION, THE CAP MUST BE ROTATED IN THE RIGHT WAY.

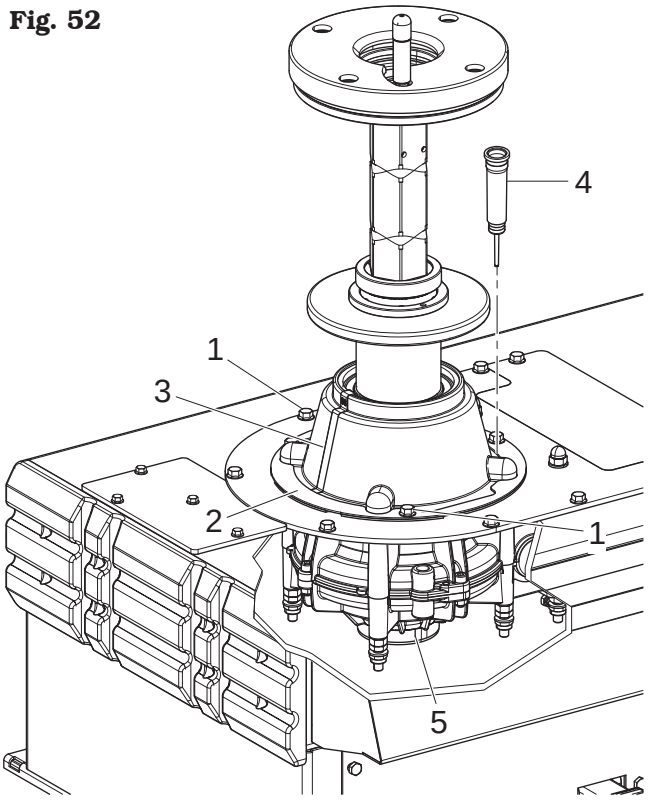
IN ORDER TO ALLOW A LONGER LIFE OF THE FILTER AND OF ALL MOVING PNEUMATIC DEVICES, YOU HAVE TO MAKE SURE THAT THE SUPPLIED AIR IS:
- **EXEMPT FROM THE LUBRICATING OIL OF THE COMPRESSOR;**
- **EXEMPT FROM HUMIDITY;**
- **EXEMPT FROM IMPURITY.**

- Periodically, with a frequency of at least once a month, lubricate the arms of the bead breaking roller and of the tools.
- Immediately replace worn parts, bead breaking rolls, assembly tools, feeler pins.
- At regular intervals, at least every two months, verify the rubber protections conditions, in relation to point 3.0 Safety devices. If necessary replace damaged parts requesting for them to the supplier.
- Every **week** and/or when necessary, top up the oil tank using the filler hole provided, closed by a cap or screw, on the lubricator filter.

NOTE: This operation should not be carried out by unscrewing the cup of the lubricator filter.

- The use of synthetic oil might damage the pressure regulator filter.
- Periodically (at least every 100 working hours) check reduction gear lubricating oil level (**Fig. 52 ref. 5**). Such operation must be effectuated unscrewing the screws (**Fig. 52 ref. 1**), removing the flange (**Fig. 52 ref. 2**), the guard (**Fig. 52 ref. 3**) and the plug (**Fig. 52 ref. 4**) on the reduction gear.

Fig. 52



ANY DAMAGE TO THE MACHINE DEVICES RESULTING FROM THE USE OF LUBRICANTS OTHER THAN THOSE RECOMMENDED IN THIS MANUAL WILL RELEASE THE MANUFACTURER FROM ANY LIABILITY!!

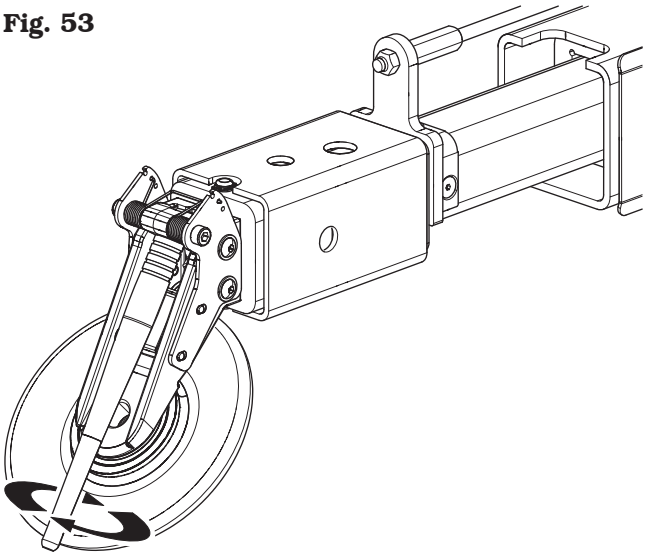
13.1 Replacement of the feeler pin

After a certain number of operations it's possible that the (upper and/or lower) feeler pin can deform so that it can't ensure a proper functioning; in this case its replacement can be carried out following these simple operations (**Fig. 53**):

- Unscrew the deformed feeler pin
- Replace it by a new feeler pin, keeping the head of the screw pressed in order to facilitate this operation.

THE FEELER PINS MUST BE ABSOLUTELY ORIGINAL; DON'T REPLACE THEM WITH IMPROVISED FEELER PINS, DON'T MODIFY THE ORIGINAL FEELER PINS.

Fig. 53



13.2 Lubricants

Special lubricant for mandrel movement control gearbox. Use **ESSO GEAR OIL GX140**.
Lubricate slides and screws/nut screws or racks and pinion with a soft brush using lubricant of ESSO GP.

ANY DAMAGE TO THE MACHINE DEVICES RESULTING FROM THE USE OF LUBRICANTS OTHER THAN THOSE RECOMMENDED IN THIS MANUAL WILL RELEASE THE MANUFACTURER FROM ANY LIABILITY.

14.0 TROUBLESHOOTING TABLE

Possible troubles which might occur to the tyre-changer are listed below. The manufacturer disclaims all responsibility for damages to people, animals or objects due to improper operation by non-unauthorised personnel. In case of trouble, call Technical Service Department for instructions on how to service and/or adjust the machine in full safety to avoid any risk of damage to people, animals or objects.

In an emergency and before maintenance on tyre-changer, set the main switch to "0" and lock it in this position.

CONTACT AUTHORIZED TECHNICAL SERVICE

do not try and service alone

Problem	Possible cause	Remedy
The bead breaking arms do not hold their position once they are adjusted on a diameter.	1. Compressed air supply pressure below 6 Bar. 2. The positioning cylinder is badly adjusted.	1. Check supply pressure. 2. Call for technical assistance. 
The arm advance cam (in automatic position) is immediately activated.	1. The feeler pin is unscrewed. 2. The connectors are extracted. 3. The feeler pin position is badly adjusted.	1. Screw the feeler pin well. 2. Check the connectors in the rear part of the arm 3. Set the feeler pin position
The nozzle doesn't supply air when the inflation pedal is pressed (only for IT version).	The inflation pedal is badly adjusted.	Call for technical assistance. 
The mandrel doesn't rotate.	Inverter overload alarm *Or* Inverter undervoltage alarm *Or* Inverter overvoltage alarm	Shorten the lenght of a possible machine extension cable or increase the conductors section (disconnect and connect again). Lift the motor pedal and wait for the automatic reset.
	Overtemperature alarm.	Wait until the motor system cools (the machine does not restart if the temperature level does not go below the set safety threshold).
The mandrel does not reach the maximum rotation speed.	The mechanical resistance of the gearmotor system has increased.	Turn the mandrel without wheel for a few minutes so that the system heats, thus reducing frictions. If in the end the mandrel does not accelerate again, call for technical assistance. 
The mandrel does not rotate in counter-clockwise direction.	Pedalboard microswitch breakage.	Replace microswitch.
The mandrel doesn't rotate, but it attempts rotation when the machine is switched on again.	Pedalboard irreversible de-calibration.	Call for technical assistance. 

Problem	Possible cause	Remedy
The mandrel rotates slowly but it does not operate on the motor pedal.	Pedalboard reversible de-calibration.	1. Keep the pedal in rest position. 2. Keep the machine connected to the net. 3. Wait for 30 seconds that the pedalboard recalibration automatic attempt ends.

15.0 TECHNICAL DATA

Recommended air supply pressure: ..... **8 - 10 bar**
Invemotor Speed: ..... **15 rpm**
Invemotor Power: ..... **1,5 kW**
Recommended electric supply: ..... **single-phase 200÷265V - 50/60 Hz**
Wheel maximum diameter: ..... **50”/52”/54”**
Wheel maximum width: ..... **15”**
Rim locking diameter: ..... **10”-30”÷12”-32”÷14”-34”**
Bead-breaking power per roll (10 bar): ..... **1200 kg**
Vertical bead breaker max. opening: ..... **900 mm**
Gear noise: ..... **dBA 76**

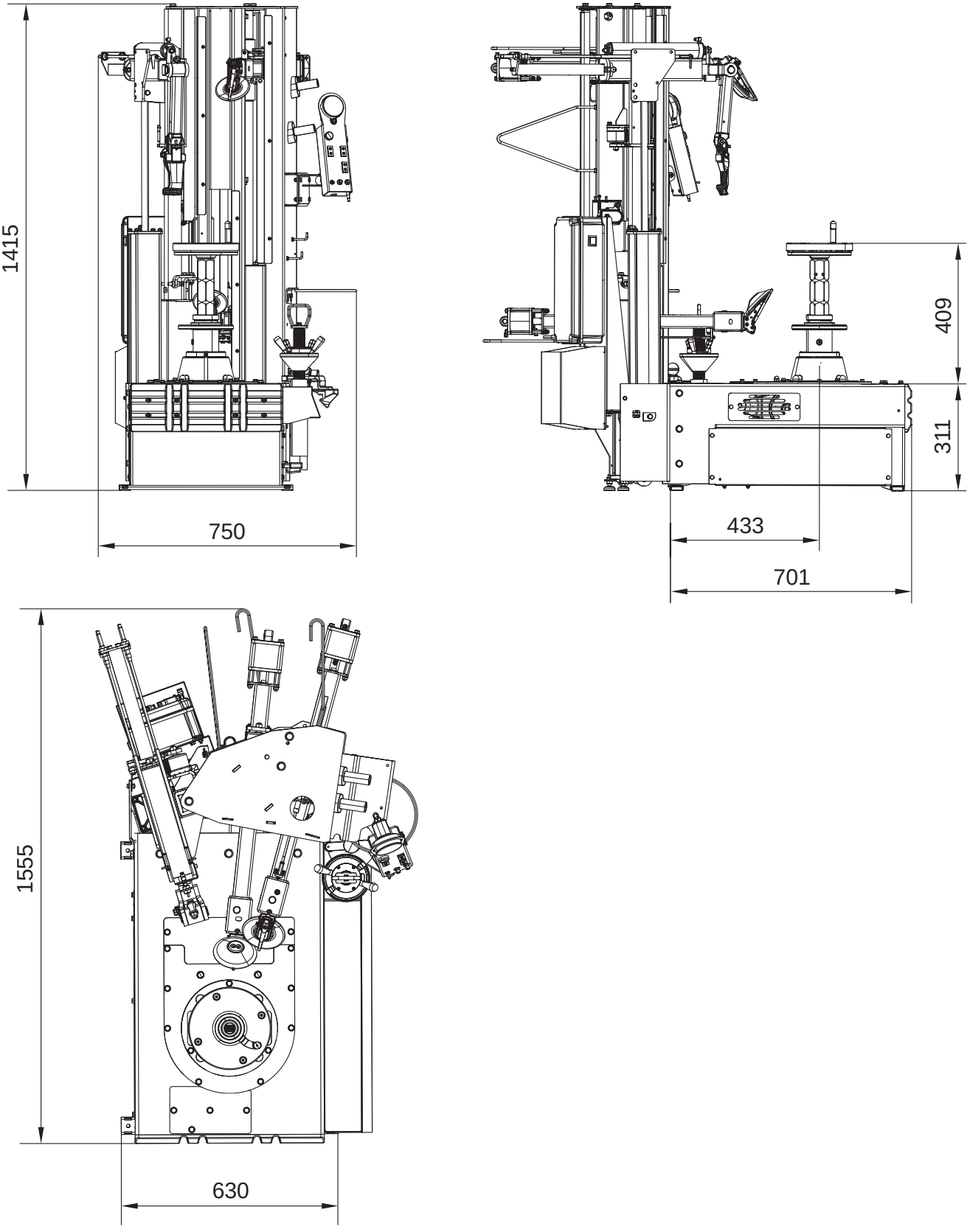
15.1 Weight

Model without tubeless inflation: ..... **330 kg**
Model with tubeless inflation: ..... **336 kg**

15.2 Dimensions

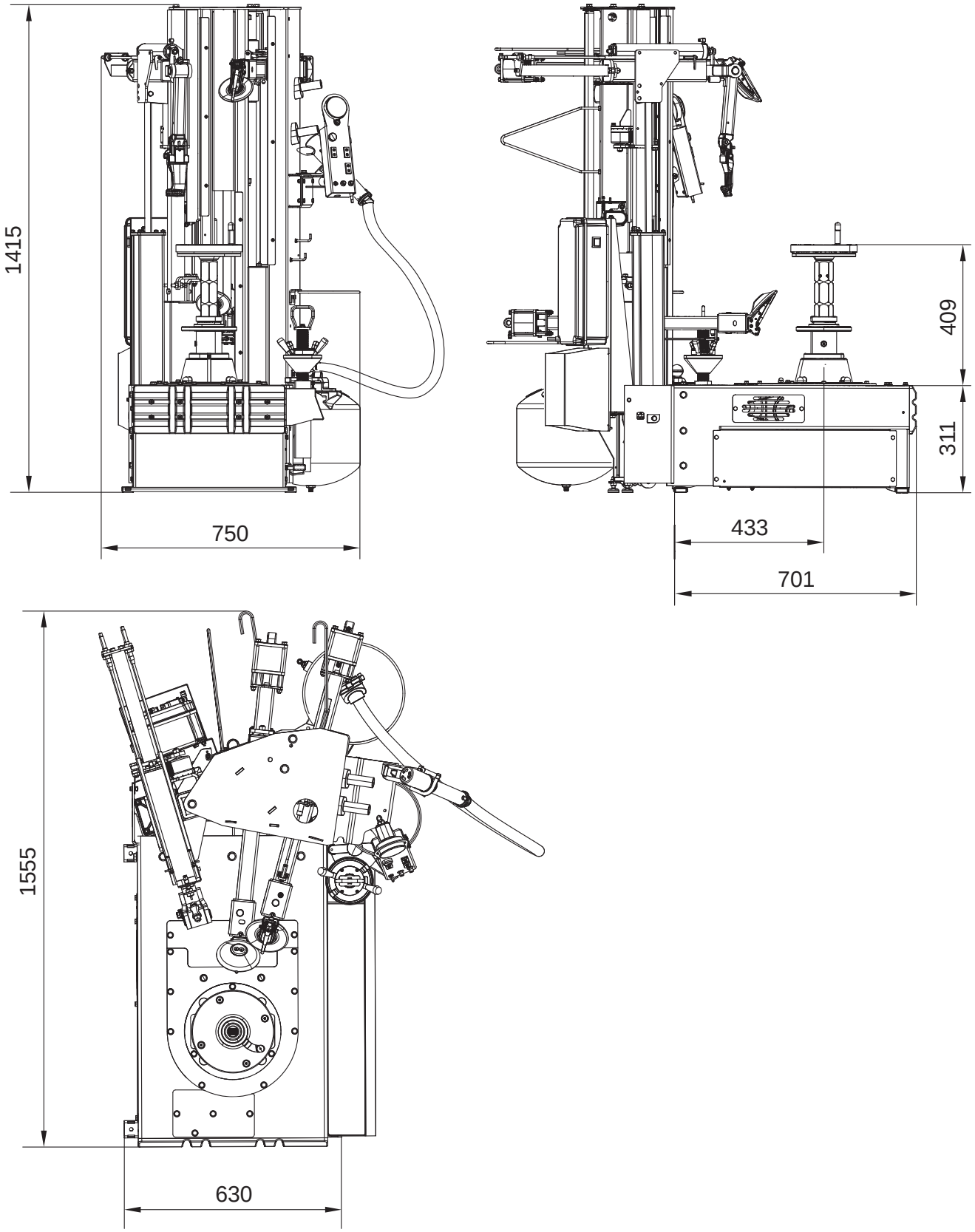
G1200.3

Fig. 54



G1200.3IT

Fig. 55



16.0 STORING

If storing for long periods disconnect the main power supply and take measures to protect the machine from dust build-up. Lubricate parts that could be damaged from drying out. When putting the machine back into operation replace the rubber pads and the mounting tool.

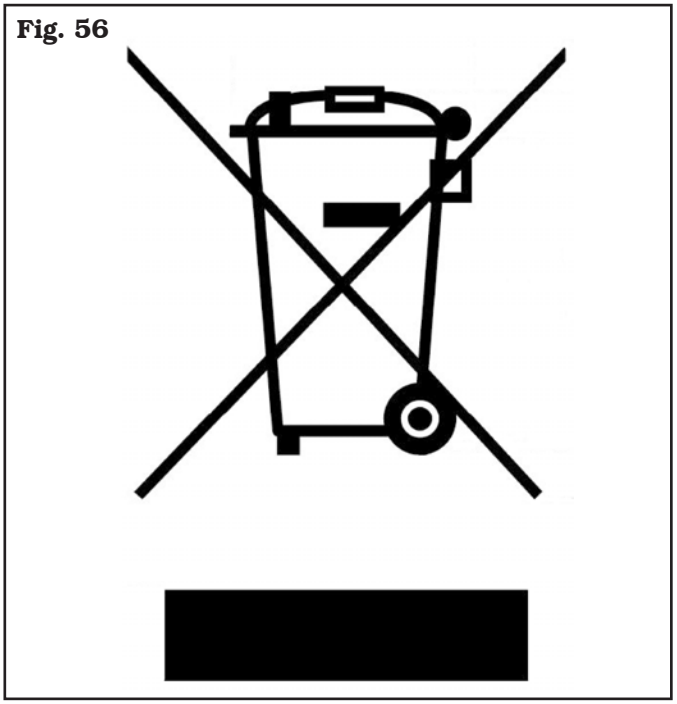
17.0 SCRAPPING

When the decision is taken not to make further use of the machine, it is advisable to make it inoperative by removing the connection pressure hoses. The machine is to be considered as special waste and should be dismantled into homogeneous parts. Dispose of it in accordance with current legislation.

Instructions for the correct management of waste from electric and electronic equipment (WEEE) according to the Italian legislative decree 49/14 and subsequent amendments.

In order to inform the users on the correct way to dispose the product (as required by the article 26, paragraph 1 of the Italian legislative decree 49/14 and subsequent amendments), we communicate what follows: the meaning of the crossed dustbin symbol reported on the equipment indicates that the product must not be thrown among the undifferentiated rubbish (that is to say together with the "mixed urban waste"), but it has to be managed separately, to let the WEEE go through special operations for their reuse or treatment, in order to remove and dispose safely the waste that could be dangerous for the environment and to extract and recycle the raw materials to be reused.

Fig. 56



18.0 REGISTRATION PLATE DATA

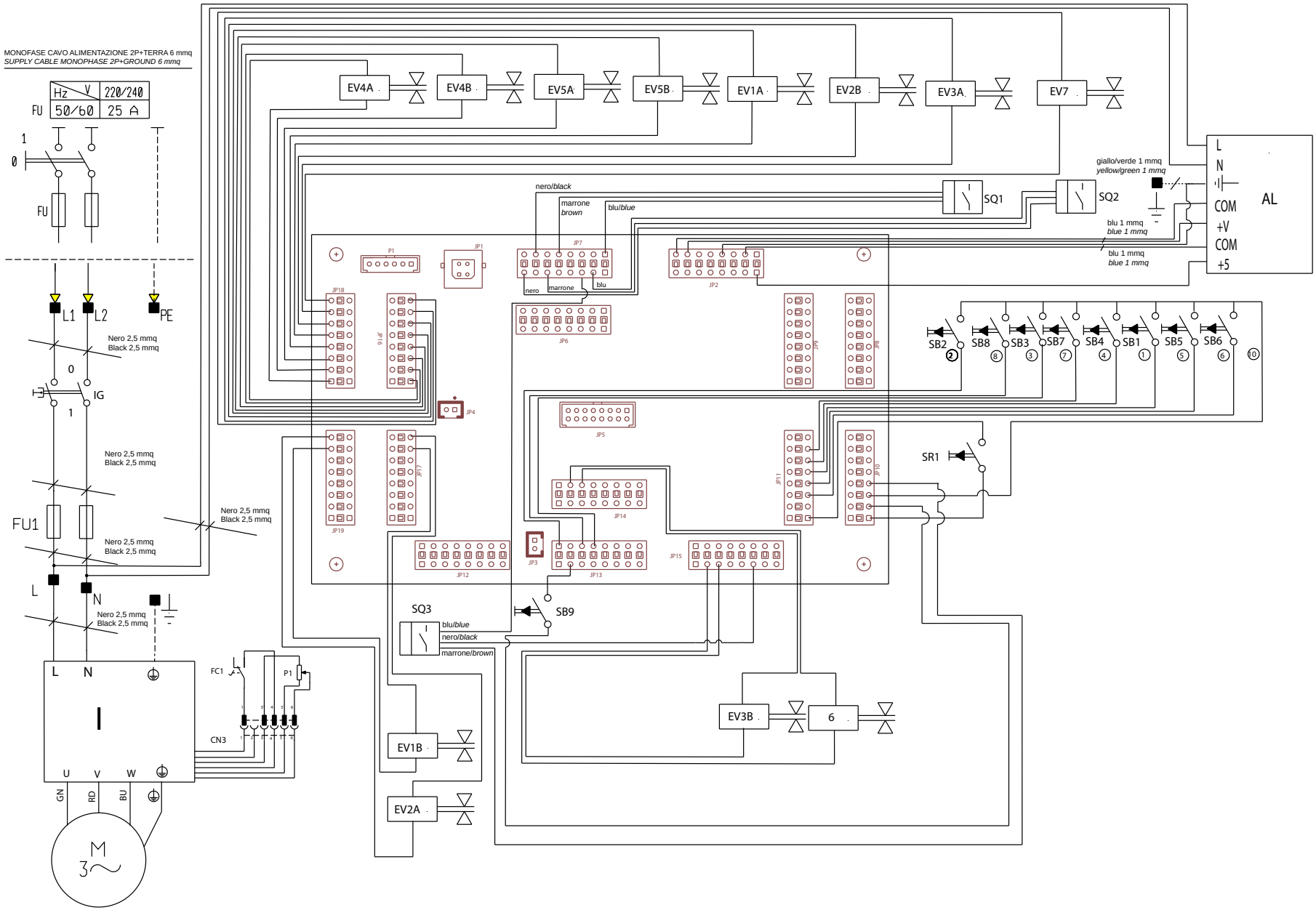
The validity of the Conformity Declaration enclosed to this manual is also extended to products and/or devices the machine model object of the Conformity Declaration can be equipped with.
Said plate must always be kept clean from grease residues or filth generally.

ATTENTION: TAMPERING WITH, CARVING, CHANGING ANYHOW OR EVEN REMOVING MACHINE IDENTIFICATION PLATE IS ABSOLUTELY FORBIDDEN; DO NOT COVER IT WITH TEMPORARY PANELS, ETC., SINCE IT MUST ALWAYS BE VISIBLE.

WARNING: Should the plate be accidentally damaged (removed from the machine, damaged or even partially illegible) inform immediately the manufacturer.

19.0 FUNCTIONAL DIAGRAMS

Here follows a list of the machine functional diagrams.



RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*SCHEMA ELETTRICO 1/3 ELECTRICAL SCHEME 1/3 SCHALTPLAN 1/3 SCHEMA ELECTRIQUE 1/3 ESQUEMA ELECTRICO 1/3*	***Pag. 32 di 40***
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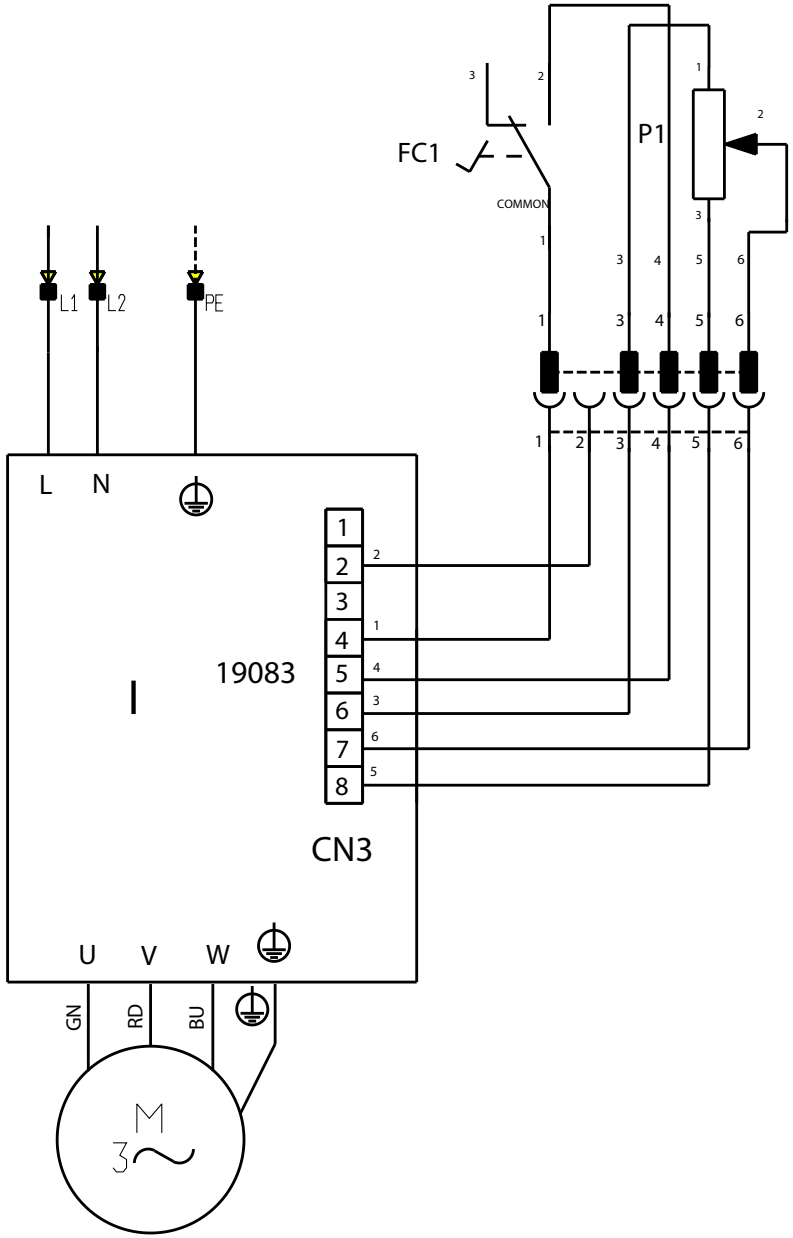
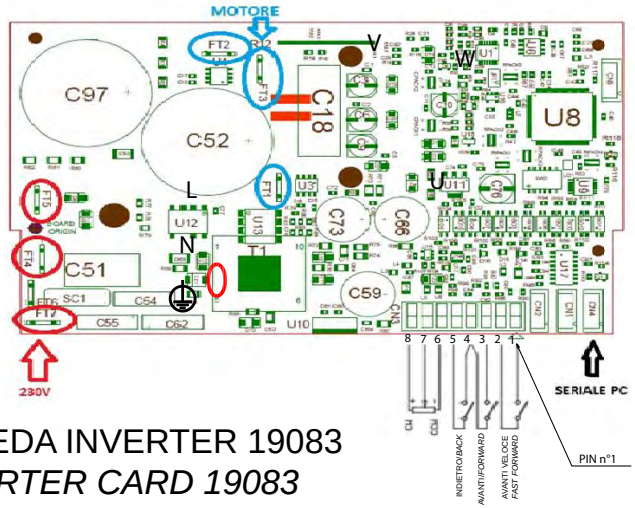
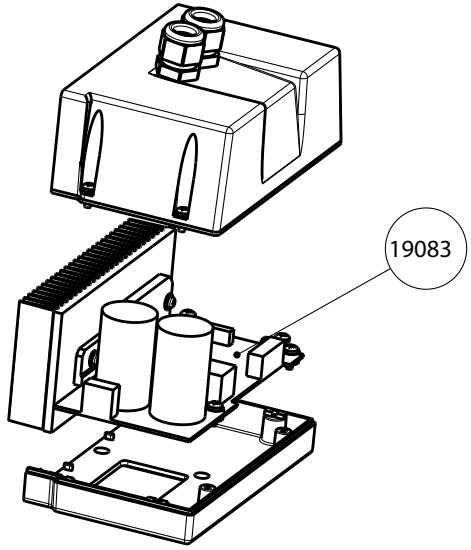
7104-M008-0_R



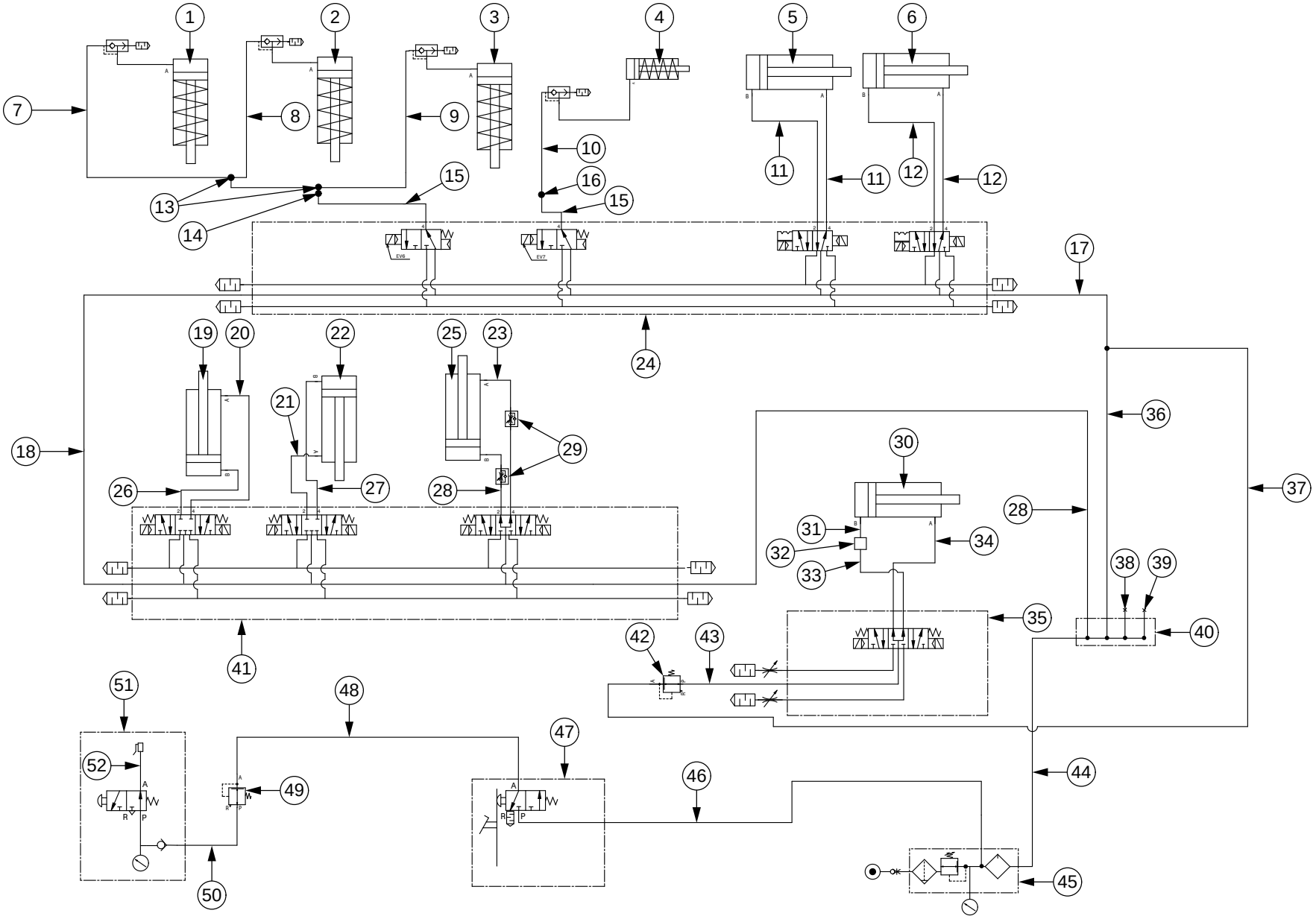


SCHEDA INVERTER 19083
INVERTER CARD 19083



RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*SCHEMA ELETTRICO 2/3 ELECTRICAL SCHEME 2/3 SCHALTPLAN 2/3 SCHEMA ELECTRIQUE 2/3 ESQUEMA ELECTRICO 2/3*	***Pag. 33 di 40***
	Tavola N°A - Rev. 0	**710105513**		**G1200.3 - G1200.3IT**

N°	Cod.	Descrizione	Description	Beschreibung	Description	Descripción
	AL	*Alimentatore*	*Power supply*	*Speiseleitung*	*Alimentateur*	*Alimentador*
	CN3	*Conn. connessione micro+potenz.*	*Micro connector+potentiometer*	*Verbinder Mikro+Potenziometer*	*Conn. micro+potentiomètre*	*Conec. conex. micro+potenciómetro*
	EV1A	*Elett. mov. braccio stall. sup. salita*	*Rising upper bead breaking sv*	*Elekt. oberer Abdrückarm Anstieg*	*Elect. décolle-talons sup. montée*	*Elec. mov. brazo dest. sup. subida*
	EV1B	*Elett. mov. braccio stall. sup. discesa*	*Descent upper bead breaking sv*	*Elekt. oberer Abdrückarm Abstieg*	*Elect. décolle-talons sup. descente*	*Elec. mov. brazo dest. sup. bajada*
	EV2A	*Elett. mov. braccio stall. inf. salita*	*Rising lower bead breaking sv*	*Elekt. unterer Abdrückarm Anstieg*	*Elect. décolle-talons inf. montée*	*Elec. mov. brazo destal. inf. subida*
	EV2B	*Elett. mov. braccio stall. inf. discesa*	*Descent lower bead breaking sv*	*Elekt. unterer Abdrückarm Abstieg*	*Elect. décolle-talons inf. descente*	*Elec. mov. brazo destal. inf. bajada*
	EV3A	*Elett. mov. braccio uten. salita*	*Rising tool solenoid valve*	*Elekt. Werkzeugarm Anstieg*	*Elect. mov. bras outil montée*	*Elec. mov. brazo utens. subida*
	EV3B	*Elett. mov. braccio uten. discesa*	*Descent tool solenoid valve*	*Elekt. Werkzeugarm Abstieg*	*Elect. mov. bras outil descente*	*Elec. mov. brazo utens. bajada*
	EV4A	*Elett. movim. camma sup. avanti*	*Forward upper cam solenoid valve*	*Voraus Elekt. oberer Nocke*	*Elect. mov. came sup. en avant*	*Elec. movim. leva sup. adelante*
	EV4B	*Elett. movim. camma sup. indietro*	*Backward upper cam solenoid valve*	*Züruck Elekt. oberer Nocke*	*Elect. mov. came sup. en arrière*	*Elec. movim. leva sup. atrás*
	EV5A	*Elett. movim. camma inf. avanti*	*Forward lower cam solenoid valve*	*Voraus Elekt. unterer Nocke*	*Elect. mov. came inf. en avant*	*Elec. movim. leva inf. adelante*
	EV5B	*Elett. movim. camma inf. indietro*	*Backward lower cam solenoid valve*	*Züruck Elekt. unterer Nocke*	*Elect. mov. came inf. en arrière*	*Elec. movim. leva inf. atrás*
	EV6	*Elettrovalvola sblocco bracci*	*Arm unlocking solenoid valve*	*Elektroventil Lösung Armen*	*Electrovanne déblocage bras*	*Electroválvula desbloqueo brazos*
	EV7	*Elettrovalvola blocca stelo*	*Rod locking solenoid valve*	*Elektoventil Sperrung Schaft*	*Electrovanne blocage tige*	*Electroválvula bloqueo asta*
	FC1	*Micro interruttore comando motore*	*Motor control microswitch*	*Mikroregulador Motorbefehl*	*Micro-inter. commande moteur*	*Micro regulador mando motor*
	FU1	*Fusibile protezione linea*	*Line guard fuse*	*Linieschmelzsicherung*	*Fusible protection ligne*	*Fusible protección linea*
	I	*Inverter comando motore*	*Motor control inverter*	*Frequenumformerantriebmotor*	*Variateur commande moteur*	*Inversor mando motor*
	M	*Motore asincrono trifase*	*Threephase asynchronous motor*	*Dreiphasen Asynchronmotor*	*Moteur asynchrone triphasé*	*Motor asincrónico trifásico*
	P1	*Potenziometro reg. velocità motore*	*Moteur speed adj. potentiometer*	*Motorgeschw. Potenziometerreg.*	*Potentiomètre reg. vitesse moteur*	*Potenciómetro reg. velocidad motor*
	SR1	*Selettore auto-man*	*Auto-man selector*	*Schalter Auto/Man*	*Sélecteur auto-man*	*Selector Auto/Man*
	SB1	*Puls. com. braccio stallon. sup. salita*	*Rising upper bead breaking button*	*Abdrückerknopf oberer Anstieg*	*Pous. décolle-talons sup. montée*	*Puls. mando brazo dest. sup. subida*
	SB2	*Puls.com. braccio stallon.sup.discesa*	*Descent upper bead breaking button*	*Abdrückerknopf oberer Abstieg*	*Pous. décolle-talons sup. descente*	*Puls. mando brazo dest. sup. bajada*
	SB3	*Puls. com. braccio stallon. inf. salita*	*Rising lower bead breaking button*	*Abdrückerknopf unterer Anstieg*	*Pous. décolle-talons inf. montée*	*Puls. mando brazo dest. inf. subida*
	SB4	*Puls. com. braccio stall. inf. discesa*	*Descent lower bead breaking button*	*Abdrückerknopf unterer Abstieg*	*Pous. décolle-talons inf. descente*	*Puls. mando brazo dest. inf. bajada*
	SB5	*Puls. inserimento camma superiore*	*Upper cam insertion push button*	*Oberer Nocke Einsteckenknopf*	*Pous. insertion came supérieur*	*Puls. Inserción leva superior*
	SB6	*Puls. inserimento camma inferiore*	*Lower cam insertion push button*	*Unterer Nocke Einsteckenknopf*	*Pous. insertion came inférieur*	*Pulsador inserción leva inferior*
	SB7	*Puls. com. braccio uten. salita*	*Rising tool push button*	*Knopf Werkzeug Anstieg*	*Pous. com. bras outil montée*	*Puls. mando brazo uten. subida*
	SB8	*Puls. com. braccio uten. discesa*	*Descent tool push button*	*Knopf Werkzeug Abstieg*	*Pous. com. bras outil descente*	*Puls. mando brazo uten. bajada*
	SB9	*Pulsante comando sblocco bracci*	*Arm unlocking control push button*	*Befehlknopf Armenlösung*	*Pous. commande déblocage bras*	*Pulsador mando debloqueo brazos*
	SCS	*Scheda controllo smontagomme*	*Tyre changing machine control card*	*Karte Kontrolle Kraftfahrzeugreifen*	*Carte contrôle démonte-pneus*	*Ficha control desmontasgomas*
	SQ1	*Sensore di hall superiore*	*Upper hall sensor*	*Oberer sensor Hall*	*Capteur hall supérieur*	*Sensor hall superior*
	SQ2	*Sensore di hall inferiore*	*Lower hall sensor*	*Unterer sensor Hall*	*Capteur hall inférieur*	*Sensor hall inferior*
	SQ3	*Sensore di hall sollevamento*	*Lifting hall sensor*	*Heben Hallsensor*	*Capteur hall soulèvement*	*Sensor hall de levantación*
	IG	*Interruttore generale*	*Main switch*	*Schalter general*	*Interrupteur general*	*Interruptor general*
	▪	*Morsetto*	*Clamp*	*Klemme*	*Borne*	*Abrazadera*



RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*SCHEMA PNEUMATICO 1/3 PNEUMATIC CIRCUIT DIAGRAM 1/3 PNEUMATIKPLAN 1/3 SCHEMA PNEUMATIQUE 1/3 ESQUEMA NEUMATICO 1/3*	***Pag. 35 di 40***
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RAVAGLIOLI S.p.A.

LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE
LISTE DES PIECES DETACHEES - LISTA DE PIEZAS

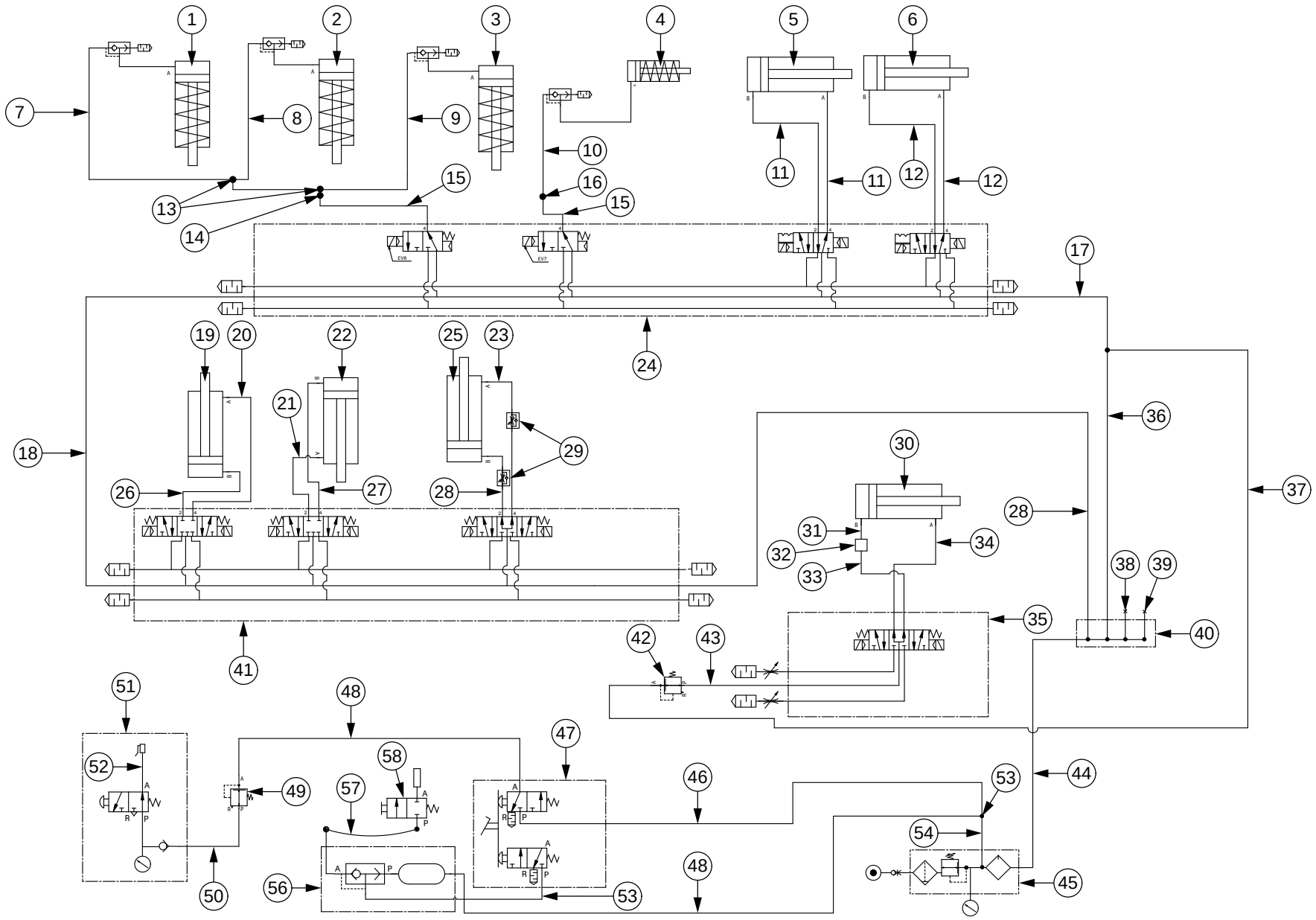
Tavola N°B - Rev. 0 | **710105100**

SCHEMA PNEUMATICO 2/3
PNEUMATIC CIRCUIT DIAGRAM 2/3
PNEUMATIKPLAN 2/3
SCHEMA PNEUMATIQUE 2/3
ESQUEMA NEUMATICO 2/3

G1200.3 - G1200.3IT

N°	Cod.	Descrizione	Description	Beschreibung	Description	Descripción
1		Cilindro blocco braccio C sup. sx (cil. Ø60)	Lh C upper arm lock cylinder (cyl. Ø60)	Oberer Arm C Blockzylinder links (Zyl. Ø60)	Cyl. blocage bras C supérieur gauche (cyl. Ø60)	Cil. bloqueo brazo C superior izq (cil. Ø60)
2		Cilindro blocco braccio C inf. sx (cil. Ø60)	Lh C lower arm lock cylinder (cyl. Ø60)	Unterer Arm C Blockzylinder links (Zyl. Ø60)	Cyl. blocage bras C inférieur gauche (cyl. Ø60)	Cil. bloqueo brazo C inferior izq (cil. Ø60)
3		Cilindro blocco braccio utensile (cil. Ø60)	Lower tool arm lock cylinder (cyl. Ø60)	Unterer Werkzeugsarm Blockzylinder (Zyl. Ø60)	Cyl. blocage bras outil inférieur (cyl. Ø60)	Cil. bloqueo brazo utensilio inferior (cil. Ø60)
4		Cilindro blocco vert. per utensile (cil. Ø60)	Vertical lock cylinder for tool (cyl. Ø60)	Vertikaler Blockzylinder für Werzeug (Zyl. Ø60)	Cylindre blocage vertical pour outil (cyl. Ø60)	Cil. bloqueo vertical para utensilio (cil. Ø60)
5		Cilindro camma superiore dx (cil. Ø70)	Rh upper cam cylinder (cyl. Ø70)	Oberer Nockenzylinder rechts (Zyl. Ø70)	Cylindre came supérieur droite (cyl. Ø70	Cilindro leva superior dra (cil. Ø70)
6		Cilindro camma inferiore dx (cil. Ø70)	Rh lower cam cylinder (cyl. Ø70)	Unterer Nockenzylinder rechts (Zyl. Ø70)	Cylindre came inférieur droite (cyl. Ø70)	Cilindro leva inferior dra (cil. Ø70)
7	317006	Tubo rilsan 6x4 nero L=3000	Rilsan pipe 6x4 L=3000 black	Rilsan Schlauch 6x4 schwarz L=3000	Tuyau rilsan 6x4 noir L=3000	Tubo rilsan 6x4 negro L=3000
8	317006	Tubo rilsan 6x4 nero L=2200	Rilsan pipe 6x4 L=2200 black	Rilsan Schlauch 6x4 schwarz L=2200	Tuyau rilsan 6x4 noir L=2200	Tubo rilsan 6x4 negro L=2200
9	317006	Tubo rilsan 6x4 nero L=2000	Rilsan pipe 6x4 L=2000 black	Rilsan Schlauch 6x4 schwarz L=2000	Tuyau rilsan 6x4 noir L=2000	Tubo rilsan 6x4 negro L=2000
10	317006	Tubo rilsan 6x4 nero L=2100	Rilsan pipe 6x4 L=2100 black	Rilsan Schlauch 6x4 schwarz L=2100	Tuyau rilsan 6x4 noir L=2100	Tubo rilsan 6x4 negro L=2100
11	317006	Tubo rilsan 6x4 nero L=2700	Rilsan pipe 6x4 L=2700 black	Rilsan Schlauch 6x4 schwarz L=2700	Tuyau rilsan 6x4 noir L=2700	Tubo rilsan 6x4 negro L=2700
12	317006	Tubo rilsan 6x4 nero L=1900	Rilsan pipe 6x4 L=1900 black	Rilsan Schlauch 6x4 schwarz L=1900	Tuyau rilsan 6x4 noir L=1900	Tubo rilsan 6x4 negro L=1900
13		Raccordo pneumatico V 6	V 6 pneumatic union	Pneumatischer Anschluss V 6	Raccord pneumatique V 6	Enlace neumático V 6
14	B0171000	Raccordo riduzione fissa 6-4	6-4 Fixed reduction union	Feststehender Verjüngungsanschluss 6-4	Raccord reduction fixe 6-4	Conector reducción fijo 6-4
15	317026	Tubo rilsan 4x2,7 nero L=200	Rilsan pipe 4x2,7 L=200 black	Rilsan Schlauch 4x2,7 schwarz L=200	Tuyau rilsan 4x2,7 noir L=200	Tubo rilsan 4x2,7 negro L=200
16	325086	Riduzione intermedia D.6 - D.4	Intermediate reduction D.6 - D.4	Mittlere Reduktion D.6 - D.4	Reduction intermédiaire D.6 - D.4	Reducción intermedia D.6 - D.4
17	317007	Tubo rilsan 8x6 nero L=400	Rilsan pipe 8x6 L=400 black	Rilsan Schlauch 8x6 schwarz L=400	Tuyau rilsan 8x6 noir L=400	Tubo rilsan 8x6 negro L=400
18	317007	Tubo rilsan 8x6 nero L=300	Rilsan pipe 8x6 L=300 black	Rilsan Schlauch 8x6 schwarz L=300	Tuyau rilsan 8x6 noir L=300	Tubo rilsan 8x6 negro L=300
19		Braccio stallonatore sup. dx (cil. Ø125)	Rh upper bead breaker arm (cyl. Ø125)	Oberer Abdrückarm rechts (Zyl. Ø125)	Bras décolle-talons supérieur droite (cyl. Ø125)	Brazo destalonador superior dra (cil. Ø125)
20	317007	Tubo rilsan 8x6 nero L=1500	Rilsan pipe 8x6 L=1500 black	Rilsan Schlauch 8x6 schwarz L=1500	Tuyau rilsan 8x6 noir L=1500	Tubo rilsan 8x6 negro L=1500
21	317007	Tubo rilsan 8x6 nero L=2680	Rilsan pipe 8x6 L=2680 black	Rilsan Schlauch 8x6 schwarz L=2680	Tuyau rilsan 8x6 noir L=2680	Tubo rilsan 8x6 negro L=2680
22		Braccio stallonatore inf. dx (cil. Ø125)	Rh lower bead breaker arm (cyl. Ø125)	Unterer Abdrückarm rechts (Zyl. Ø125)	Bras décolle-talons inférieur droite (cyl. Ø125)	Brazo destalonador inferior dra (cil. Ø125)
23	317007	Tubo rilsan 8x6 nero L=1150	Rilsan pipe 8x6 L=1150 black	Rilsan Schlauch 8x6 schwarz L=1150	Tuyau rilsan 8x6 noir L=1150	Tubo rilsan 8x6 negro L=1150
24	710190450	Centralina pneumatica principale	Main pneumatic power unit	Hauptpneumatischer Steuerung	Distributeur pneumatique principal	Centralita neumática principal
25		Braccio utensile (cil. Ø100)	Tool arm (cyl. Ø100)	Werkzeugarm (Zyl. Ø100)	Bras outil (cyl. Ø100)	Brazo utensillo (cil. Ø100)
26	317007	Tubo rilsan 8x6 nero L=750	Rilsan pipe 8x6 L=750 black	Rilsan Schlauch 8x6 schwarz L=750	Tuyau rilsan 8x6 noir L=750	Tubo rilsan 8x6 negro L=750
27	317007	Tubo rilsan 8x6 nero L=2100	Rilsan pipe 8x6 L=2100 black	Rilsan Schlauch 8x6 schwarz L=2100	Tuyau rilsan 8x6 noir L=2100	Tubo rilsan 8x6 negro L=2100
28	317007	Tubo rilsan 8x6 nero L=450	Rilsan pipe 8x6 L=450 black	Rilsan Schlauch 8x6 schwarz L=450	Tuyau rilsan 8x6 noir L=450	Tubo rilsan 8x6 negro L=450
29	399284	Regolatore di flusso	Flow regulator	Flussregel	Regulateur de débit	Regulación de flujo
30		Sistema movimentazione cavi	Cable handling system	Bewegungssystem Kabel	Système mouvement câbles	Sistema movimentación cables
31	317006	Tubo rilsan 6x4 nero L=50	Rilsan pipe 6x4 black L=50	Rilsan Schlauch 6x4 schwarz L=50	Tuyau rilsan 6x4 noir L=50	Tubo rilsan 6x4 negro L=50
32	B1371800	Riduttore	Reduction gear	Reducteur	Untersetzer	Reductor
33	317006	Tubo rilsan 6x4 nero L=2300	Rilsan pipe 6x4 L=2300 black	Rilsan Schlauch 6x4 schwarz L=2300	Tuyau rilsan 6x4 noir L=2300	Tubo rilsan 6x4 negro L=2300
34	317006	Tubo rilsan 6x4 nero L=2750	Rilsan pipe 6x4 L=2750 black	Rilsan Schlauch 6x4 schwarz L=2750	Tuyau rilsan 6x4 noir L=2750	Tubo rilsan 6x4 negro L=2750
35	710090850	Valvola pneumatica	Pneumatic valve	Pneumatische Ventil	Vanne pneumatique	Válvula neumática
36	317007	Tubo rilsan 8x6 nero L=200	Rilsan pipe 8x6 L=200 black	Rilsan Schlauch 8x6 schwarz L=200	Tuyau rilsan 8x6 noir L=200	Tubo rilsan 8x6 negro L=200
37	317007	Tubo rilsan 8x6 nero L=500	Rilsan pipe 8x6 L=500 black	Rilsan Schlauch 8x6 schwarz L=500	Tuyau rilsan 8x6 noir L=500	Tubo rilsan 8x6 negro L=500
38		Optional sollevatore	Lifter optional	Optionelle Hubvorrichtung	Soulèvateur option	Levantador opcional
39		Optional PLUS91	PLUS91 optional	PLUS91 Optionelle	Option PLUS91	PLUS91 opcional
40		Ripartitore aria 5 vie	5-ways air distribution frame	5 Wege Luftverteiler	Répartiteur air à 5 voies	Tablero distribución aire de 5 vías
41	710090661	Centralina pneumatica stallonatori	Bead breakers pneumatic power unit	Abdrückpneumatischer Steuerung	Distributeur pneumatique décolle-talons	Centralita neumática destalonadores
42	710090760	Microregolatore	Microregulator	Mikroregulator	Microregulateur	Microregulador
43	325181	Raccordo a V8	V8 union	V-Verbindung 8	Raccord à V8	Enlace a V8
44	317010	Tubo rilsan 10x8 nero L=550	Rilsan pipe 10x8 L=550 black	Rilsan Schlauch 10x8 schwarz L=550	Tuyau rilsan 10x8 noir L=550	Tubo rilsan 10x8 negro L=550

N°	Cod.	Descrizione	Description	Beschreibung	Description	Descripción
45		*Gr. filtro regolazione lubrificazione*	*Lubrication regulation filter unit*	*Filtersatz Schmierungsregelung*	*Groupe filtre régulation lubrification*	*Grupo filtro regulación lubricación*
46	317009	*Tubo rilsan 8x6 blu L=750*	*Rilsan pipe 8x6 L=1000 blue*	*Rilsan Schlauch 8x6 blau L=1000*	*Tuyau rilsan 8x6 bleu L=1000*	*Tubo rilsan 8x6 azul L=1000*
47		*Valvole pedale di gonfiaggio*	*Inflation pedal valve*	*Ventile des Aufpumppedals*	*Vannes pédales de direction de gonflage*	*Válvulas pedal de inflado*
48	317009	*Tubo rilsan 8x6 blu L=350*	*Rilsan pipe 8x6 L=350 blue*	*Rilsan Schlauch 8x6 blau L=350*	*Tuyau rilsan 8x6 bleu L=350*	*Tubo rilsan 8x6 azul L=350*
49		*Valvola bilanciatrice*	*Balancing valve*	*Ventil Waage*	*Vanne balancement*	*Válvula balanceo*
50	317008	*Tubo rilsan 8x6 rosso L=2600*	*Rilsan pipe 8x6 L=2600 red*	*Rilsan Schlauch 8x6 röt L=2600*	*Tuyau rilsan 8x6 rouge L=2600*	*Tubo rilsan 8x6 rojo L=2600*
51		*Gruppo gonfiaggio con manometro*	*Inflation unit with pressure gauge*	*Aufpumpsatz mit Manometer*	*Groupe gonflage avec manomètre*	*Grupo inflado con manómetro*
52	317008	*Tubo rilsan 8x6 rosso L=850*	*Rilsan pipe 8x6 L=850 red*	*Rilsan Schlauch 8x6 röt L=850*	*Tuyau rilsan 8x6 rouge L=850*	*Tubo rilsan 8x6 rojo L=850*



RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*SCHEMA PNEUMATICO IT 1/3 IT PNEUMATIC CIRCUIT DIAGRAM 1/3 PNEUMATIKPLAN IT 1/3 SCHEMA PNEUMATIQUE IT 1/3 ESQUEMA NEUMATICO IT 1/3*	***Pag. 38 di 40***
	Tavola N°C - Rev. 0	**710105110**		**G1200.3 - G1200.3IT**

N°	Cod.	Descrizione	Description	Beschreibung	Description	Descripción
1		Cilindro blocco braccio C sup. sx (cil. Ø60)	Lh C upper arm lock cylinder (cyl. Ø60)	Oberer Arm C Blockzylinder links (Zyl. Ø60)	Cyl. blocage bras C supérieur gauche (cyl. Ø60)	Cil. bloqueo brazo C superior izq (cil. Ø60)
2		Cilindro blocco braccio C inf. sx (cil. Ø60)	Lh C lower arm lock cylinder (cyl. Ø60)	Unterer Arm C Blockzylinder links (Zyl. Ø60)	Cyl. blocage bras C inférieur gauche (cyl. Ø60)	Cil. bloqueo brazo C inferior izq (cil. Ø60)
3		Cilindro blocco braccio utensile (cil. Ø60)	Lower tool arm lock cylinder (cyl. Ø60)	Unterer Werkzeugsarm Blockzylinder (Zyl. Ø60)	Cyl. blocage bras outil inférieur (cyl. Ø60)	Cil. bloqueo brazo utensilio inferior (cil. Ø60)
4		Cilindro blocco vert. per utensile (cil. Ø60)	Vertical lock cylinder for tool (cyl. Ø60)	Vertikaler Blockzylinder für Werzeug (Zyl. Ø60)	Cylindre blocage vertical pour outil (cyl. Ø60)	Cil. bloqueo vertical para utensilio (cil. Ø60)
5		Cilindro camma superiore dx (cil. Ø70)	Rh upper cam cylinder (cyl. Ø70)	Oberer Nockenzylinder rechts (Zyl. Ø70)	Cylindre came supérieur droite (cyl. Ø70	Cilindro leva superior dra (cil. Ø70)
6		Cilindro camma inferiore dx (cil. Ø70)	Rh lower cam cylinder (cyl. Ø70)	Unterer Nockenzylinder rechts (Zyl. Ø70)	Cylindre came inférieur droite (cyl. Ø70)	Cilindro leva inferior dra (cil. Ø70)
7	317006	Tubo rilsan 6x4 nero L=3000	Rilsan pipe 6x4 L=3000 black	Rilsan Schlauch 6x4 schwarz L=3000	Tuyau rilsan 6x4 noir L=3000	Tubo rilsan 6x4 negro L=3000
8	317006	Tubo rilsan 6x4 nero L=2200	Rilsan pipe 6x4 L=2200 black	Rilsan Schlauch 6x4 schwarz L=2200	Tuyau rilsan 6x4 noir L=2200	Tubo rilsan 6x4 negro L=2200
9	317006	Tubo rilsan 6x4 nero L=2000	Rilsan pipe 6x4 L=2000 black	Rilsan Schlauch 6x4 schwarz L=2000	Tuyau rilsan 6x4 noir L=2000	Tubo rilsan 6x4 negro L=2000
10	317006	Tubo rilsan 6x4 nero L=2100	Rilsan pipe 6x4 L=2100 black	Rilsan Schlauch 6x4 schwarz L=2100	Tuyau rilsan 6x4 noir L=2100	Tubo rilsan 6x4 negro L=2100
11	317006	Tubo rilsan 6x4 nero L=2700	Rilsan pipe 6x4 L=2700 black	Rilsan Schlauch 6x4 schwarz L=2700	Tuyau rilsan 6x4 noir L=2700	Tubo rilsan 6x4 negro L=2700
12	317006	Tubo rilsan 6x4 nero L=1900	Rilsan pipe 6x4 L=1900 black	Rilsan Schlauch 6x4 schwarz L=1900	Tuyau rilsan 6x4 noir L=1900	Tubo rilsan 6x4 negro L=1900
13		Raccordo pneumatico V 6	V 6 pneumatic union	Pneumatischer Anschluss V 6	Raccord pneumatique V 6	Enlace neumático V 6
14	B0171000	Raccordo riduzione fissa 6-4	6-4 Fixed reduction union	Feststehender Verjüngungsanschluss 6-4	Raccord reduction fixe 6-4	Conector reducción fijo 6-4
15	317026	Tubo rilsan 4x2,7 nero L=200	Rilsan pipe 4x2,7 L=200 black	Rilsan Schlauch 4x2,7 schwarz L=200	Tuyau rilsan 4x2,7 noir L=200	Tubo rilsan 4x2,7 negro L=200
16	325086	Riduzione intermedia D.6 - D.4	Intermediate reduction D.6 - D.4	Mittlere Reduktion D.6 - D.4	Reduction intermédiaire D.6 - D.4	Reducción intermedia D.6 - D.4
17	317007	Tubo rilsan 8x6 nero L=400	Rilsan pipe 8x6 L=400 black	Rilsan Schlauch 8x6 schwarz L=400	Tuyau rilsan 8x6 noir L=400	Tubo rilsan 8x6 negro L=400
18	317007	Tubo rilsan 8x6 nero L=300	Rilsan pipe 8x6 L=300 black	Rilsan Schlauch 8x6 schwarz L=300	Tuyau rilsan 8x6 noir L=300	Tubo rilsan 8x6 negro L=300
19		Braccio stallonatore sup. dx (cil. Ø125)	Rh upper bead breaker arm (cyl. Ø125)	Oberer Abdrückarm rechts (Zyl. Ø125)	Bras décolle-talons supérieur droite (cyl. Ø125)	Brazo destalonador superior dra (cil. Ø125)
20	317007	Tubo rilsan 8x6 nero L=1500	Rilsan pipe 8x6 L=1500 black	Rilsan Schlauch 8x6 schwarz L=1500	Tuyau rilsan 8x6 noir L=1500	Tubo rilsan 8x6 negro L=1500
21	317007	Tubo rilsan 8x6 nero L=2680	Rilsan pipe 8x6 L=2680 black	Rilsan Schlauch 8x6 schwarz L=2680	Tuyau rilsan 8x6 noir L=2680	Tubo rilsan 8x6 negro L=2680
22		Braccio stallonatore inf. dx (cil. Ø125)	Rh lower bead breaker arm (cyl. Ø125)	Unterer Abdrückarm rechts (Zyl. Ø125)	Bras décolle-talons inférieur droite (cyl. Ø125)	Brazo destalonador inferior dra (cil. Ø125)
23	317007	Tubo rilsan 8x6 nero L=1150	Rilsan pipe 8x6 L=1150 black	Rilsan Schlauch 8x6 schwarz L=1150	Tuyau rilsan 8x6 noir L=1150	Tubo rilsan 8x6 negro L=1150
24	710190450	Centralina pneumatica principale	Main pneumatic power unit	Hauptpneumatischer Steuerung	Distributeur pneumatique principal	Centralita neumática principal
25		Braccio utensile (cil. Ø100)	Tool arm (cyl. Ø100)	Werkzeugarm (Zyl. Ø100)	Bras outil (cyl. Ø100)	Brazo utensillo (cil. Ø100)
26	317007	Tubo rilsan 8x6 nero L=750	Rilsan pipe 8x6 L=750 black	Rilsan Schlauch 8x6 schwarz L=750	Tuyau rilsan 8x6 noir L=750	Tubo rilsan 8x6 negro L=750
27	317007	Tubo rilsan 8x6 nero L=2100	Rilsan pipe 8x6 L=2100 black	Rilsan Schlauch 8x6 schwarz L=2100	Tuyau rilsan 8x6 noir L=2100	Tubo rilsan 8x6 negro L=2100
28	317007	Tubo rilsan 8x6 nero L=450	Rilsan pipe 8x6 L=450 black	Rilsan Schlauch 8x6 schwarz L=450	Tuyau rilsan 8x6 noir L=450	Tubo rilsan 8x6 negro L=450
29	399284	Regolatore di flusso	Flow regulator	Flussregel	Regulateur de débit	Regulación de flujo
30		Sistema movimentazione cavi	Cable handling system	Bewegungssystem Kabel	Système mouvement câbles	Sistema movimentación cables
31	317006	Tubo rilsan 6x4 nero L=50	Rilsan pipe 6x4 black L=50	Rilsan Schlauch 6x4 schwarz L=50	Tuyau rilsan 6x4 noir L=50	Tubo rilsan 6x4 negro L=50
32	B1371800	Riduttore	Reduction gear	Reducteur	Untersetzer	Reductor
33	317006	Tubo rilsan 6x4 nero L=2300	Rilsan pipe 6x4 L=2300 black	Rilsan Schlauch 6x4 schwarz L=2300	Tuyau rilsan 6x4 noir L=2300	Tubo rilsan 6x4 negro L=2300
34	317006	Tubo rilsan 6x4 nero L=2750	Rilsan pipe 6x4 L=2750 black	Rilsan Schlauch 6x4 schwarz L=2750	Tuyau rilsan 6x4 noir L=2750	Tubo rilsan 6x4 negro L=2750
35	710090850	Valvola pneumatica	Pneumatic valve	Pneumatische Ventil	Vanne pneumatique	Válvula neumática
36	317007	Tubo rilsan 8x6 nero L=200	Rilsan pipe 8x6 L=200 black	Rilsan Schlauch 8x6 schwarz L=200	Tuyau rilsan 8x6 noir L=200	Tubo rilsan 8x6 negro L=200
37	317007	Tubo rilsan 8x6 nero L=500	Rilsan pipe 8x6 L=500 black	Rilsan Schlauch 8x6 schwarz L=500	Tuyau rilsan 8x6 noir L=500	Tubo rilsan 8x6 negro L=500
38		Optional sollevatore	Lifter optional	Optionelle Hubvorrichtung	Soulèvateur option	Levantador opcional
39		Optional PLUS91	PLUS91 optional	PLUS91 Optionelle	Option PLUS91	PLUS91 opcional
40		Ripartitore aria 5 vie	5-ways air distribution frame	5 Wege Luftverteiler	Répartiteur air à 5 voies	Tablero distribución aire de 5 vías
41	710090661	Centralina pneumatica stallonatori	Bead breakers pneumatic power unit	Abdrückpneumatischer Steuerung	Distributeur pneumatique décolle-talons	Centralita neumática destalonadores
42	710090760	Microregolatore	Microregulator	Mikroregulator	Microregulateur	Microregulador
43	325181	Raccordo a V8	V8 union	V-Verbindung 8	Raccord à V8	Enlace a V8
44	317010	Tubo rilsan 10x8 nero L=550	Rilsan pipe 10x8 L=550 black	Rilsan Schlauch 10x8 schwarz L=550	Tuyau rilsan 10x8 noir L=550	Tubo rilsan 10x8 negro L=550

N°	Cod.	Descrizione	Description	Beschreibung	Description	Descripción
45		*Gr. filtro regolazione lubrificazione*	*Lubrication regulation filter unit*	*Filtersatz Schmierungsregelung*	*Groupe filtre régulation lubrification*	*Grupo filtro regulación lubricación*
46	317009	*Tubo rilsan 8x6 blu L=750*	*Rilsan pipe 8x6 L=1000 blue*	*Rilsan Schlauch 8x6 blau L=1000*	*Tuyau rilsan 8x6 bleu L=1000*	*Tubo rilsan 8x6 azul L=1000*
47		*Valvole pedale di gonfiaggio*	*Inflation pedal valve*	*Ventile des Aufpumppedals*	*Vannes pédales de direction de gonflage*	*Válvulas pedal de inflado*
48	317009	*Tubo rilsan 8x6 blu L=350*	*Rilsan pipe 8x6 L=350 blue*	*Rilsan Schlauch 8x6 blau L=350*	*Tuyau rilsan 8x6 bleu L=350*	*Tubo rilsan 8x6 azul L=350*
49		*Valvola bilanciatrice*	*Balancing valve*	*Ventil Waage*	*Vanne balancement*	*Válvula balanceo*
50	317008	*Tubo rilsan 8x6 rosso L=2600*	*Rilsan pipe 8x6 L=2600 red*	*Rilsan Schlauch 8x6 röt L=2600*	*Tuyau rilsan 8x6 rouge L=2600*	*Tubo rilsan 8x6 rojo L=2600*
51		*Gruppo gonfiaggio con manometro*	*Inflation unit with pressure gauge*	*Aufpumpsatz mit Manometer*	*Groupe gonflage avec manomètre*	*Grupo inflado con manómetro*
52	317008	*Tubo rilsan 8x6 rosso L=850*	*Rilsan pipe 8x6 L=850 red*	*Rilsan Schlauch 8x6 röt L=850*	*Tuyau rilsan 8x6 rouge L=850*	*Tubo rilsan 8x6 rojo L=850*
53	325181	*Raccordo a V8*	*V8 union*	*V-Verbindung 8*	*Raccord à V8*	*Enlace a V8*
54	317009	*Tubo Rilsan 8x6 L=650 blu*	*Rilsan pipe 8x6 L=650 blue*	*Rilsan Schlauch 8x6 blau L=650*	*Tuyau rilsan 8x6 bleu L=650*	*Tubo rilsan 8x6 azul L=650*
55	317007	*Tubo Rilsan 8x6 L=1600 nero*	*Rilsan pipe 8x6 L=1600 black*	*Rilsan Schlauch 8x6 schwarz L=1600*	*Tuyau rilsan 8x6 noir L=1600*	*Tubo rilsan 8x6 negro L=1600*
56		*Gruppo serbatoio*	*Tank unit*	*Tanksatz*	*Groupe réservoir*	*Grupo tanque*
57	790090060	*Tubo cianfrinato*	*Pipe*	*Tuyau*	*Schlauch*	*Tubo*
58		*Ugello di gonfiaggio*	*Inflation nozzle*	*Aufpumpedüse*	*Gicleur de gonflage*	*Boquilla de inflado*

7104-R008-0_R

G1200.3
G1200.3IT

I	20.0 LISTA DEI COMPONENTI
GB	20.0 LIST OF COMPONENTS
D	20.0 TEILELISTE
F	20.0 LISTE DES PIECES DETACHEES
E	20.0 LISTA DE PIEZAS

GLI ESPLOSI SERVONO SOLO PER L'IDENTIFICAZIONE DELLE PARTI DA SOSTITUIRE. LA SOSTITUZIONE DEVE ESSERE EFFETTUATA DA PERSONALE PROFESSIONALMENTE QUALIFICATO.

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- For any further information please contact your local dealer or call:
- Im Zweifelsfall ober bei Rückfragen wenden Sie sich bitte an den nächsten Wiederverkäufer oder direkt an:
- Pour tout renseignement complémentaire s'adresser au revendeur le Plus proche ou directement à:
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SOMMARIO - SUMMARY - INHALT
SOMMAIRE - SUMARIO

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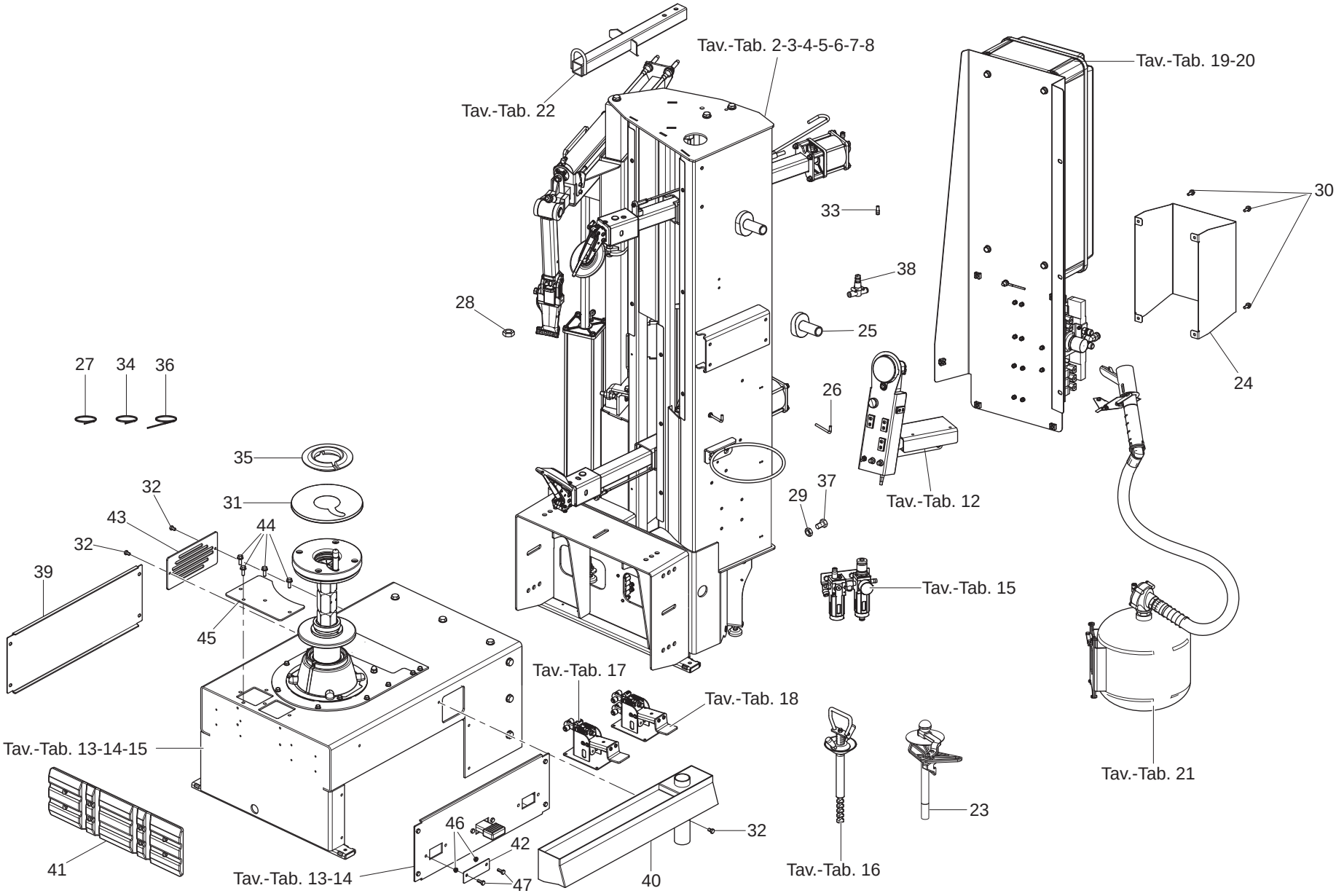
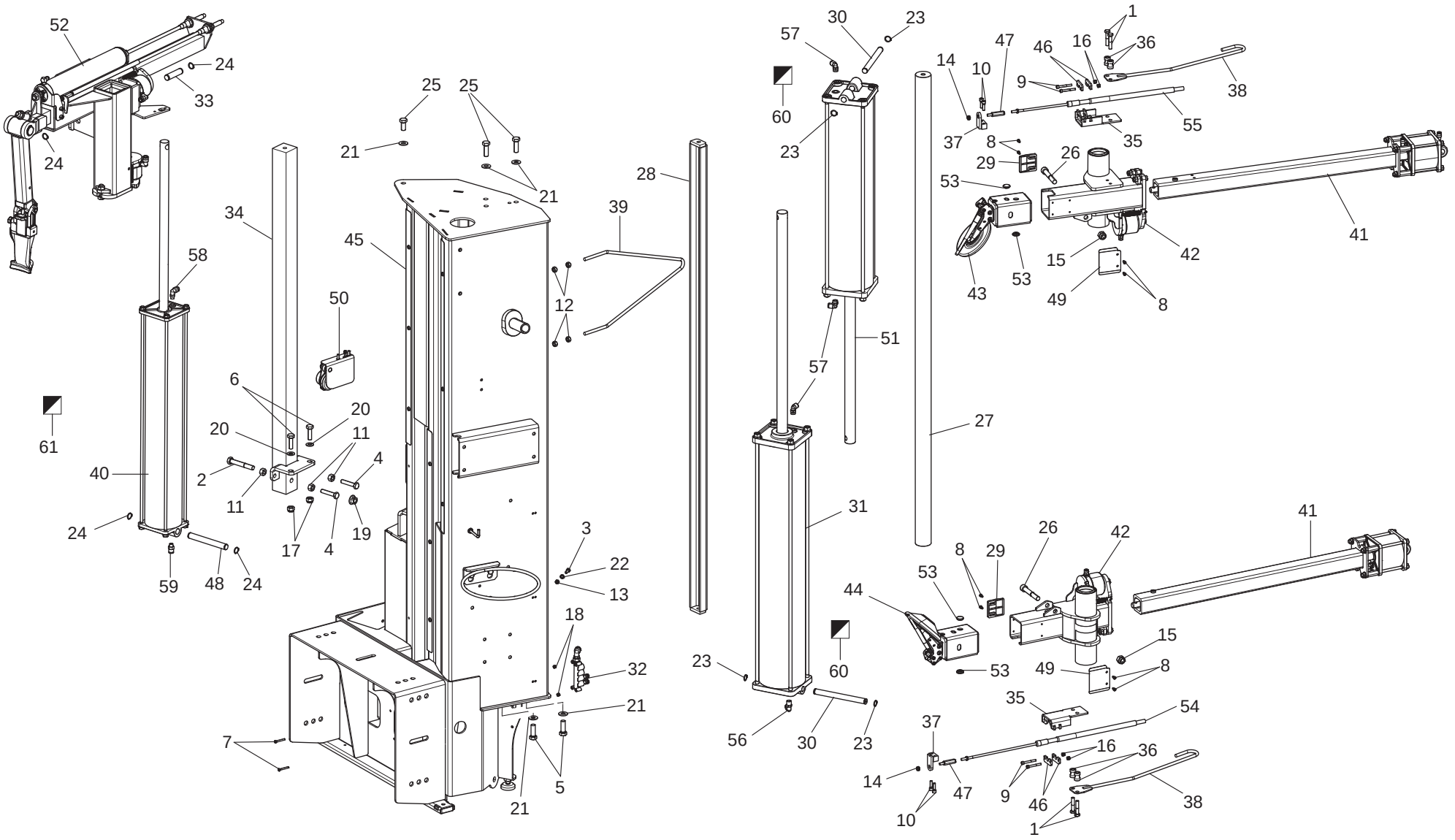
PREMITALLONE 28" C/TRAZIONE
BEAD DEPRESSING 28" WITH ENTRAINER
WULSTABDRÜCKERVORRICHTUNG MIT FÜHRUNGSPIN
POUSSE-TALON AVEC GALET
PRESIONATALÓN CON TRANSPORTADOR



RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**	*ASSIEME GENERALE MAIN ASSEMBLY GENERALSATZ ASSEMBLAGE GENERAL JUNTO GENERAL*	***Pag. 4 di 28***
	Tavola N°1 - Rev. 0		**G1200.3 G1200.3IT**

Tav.	*Cod.*	*Pos.*	*G1200.3*	*G1200.3IT*	
2	710491360		●	●	
3	710191210		●	●	
4	710491410		●	●	
5	710191090		●	●	
6	710191080		●	●	
7	710191110		●	●	
8	710490670		●	●	
9	710190341		●	●	
10	710591251		●	●	
11	710591070		●	●	
12	710491300		●	●	
13	710190261		●	●	
14	710190251		●	●	
15	710090920		●	●	
16	710090223		●	●	
17	B4127300		●		
18	140990371			●	
19	710491420		●	●	
20	710403120		●	●	
21	790090180			●	
22	710090720		●	●	
23	710090730		●	●	
	710112870	24	●	●	
	129311670	25	●	●	
	140330740	26	●	●	
	B4063100	27	●	●	

Tav.	*Cod.*	*Pos.*	*G1200.3*	*G1200.3IT*	
	224015	28	●	●	
	226007	29	●	●	
	272019	30	●	●	
	710013421	31	●	●	
	203172	32	●	●	
	B0171000	33	●	●	
	B0178000	34	●	●	
	B1157000	35	●	●	
	B1949000	36	●	●	
	203019	37	●	●	
	B1371800	38	●	●	
	710111470	39	●	●	
	710411810	40	●	●	
	710411810	41	●	●	
	710011710	42	●	●	
	710413440	43	●	●	
	272172	44	●	●	
	710114870	45	●	●	
	228501	46	●	●	
	203035	47	●	●	



G1200.3	G1200.3IT	
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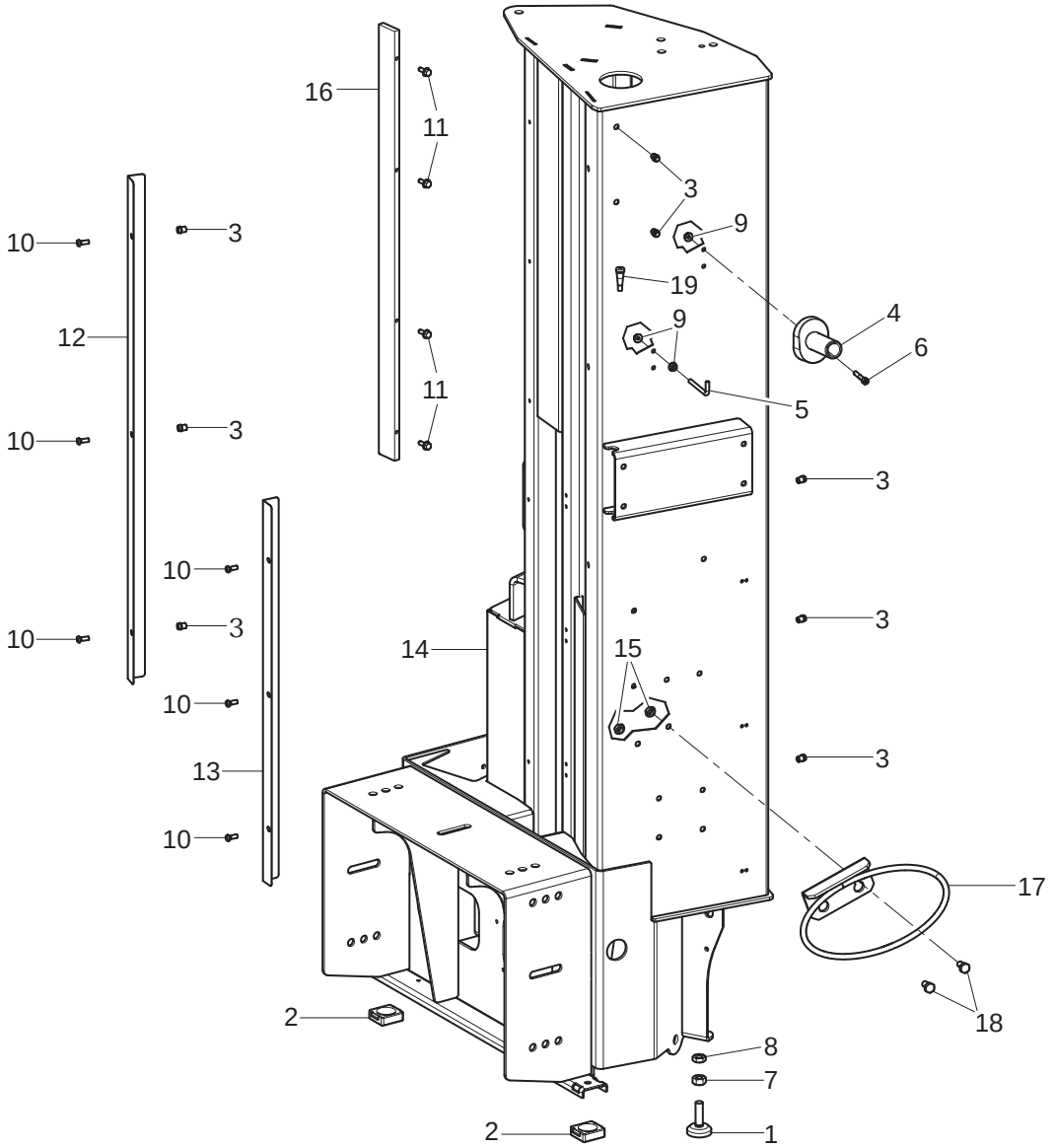
RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*GRUPPO COLONNA COLUMN UNIT SÄULESATZ GROUPE COLONNE GRUPO COLUMNA*	***Pag. 7 di 28***
	Tavola N°2 - Rev. 0	**710491360**		**G1200.3 G1200.3IT**

7104-R008-0_R



G1200.3	G1200.3IT	
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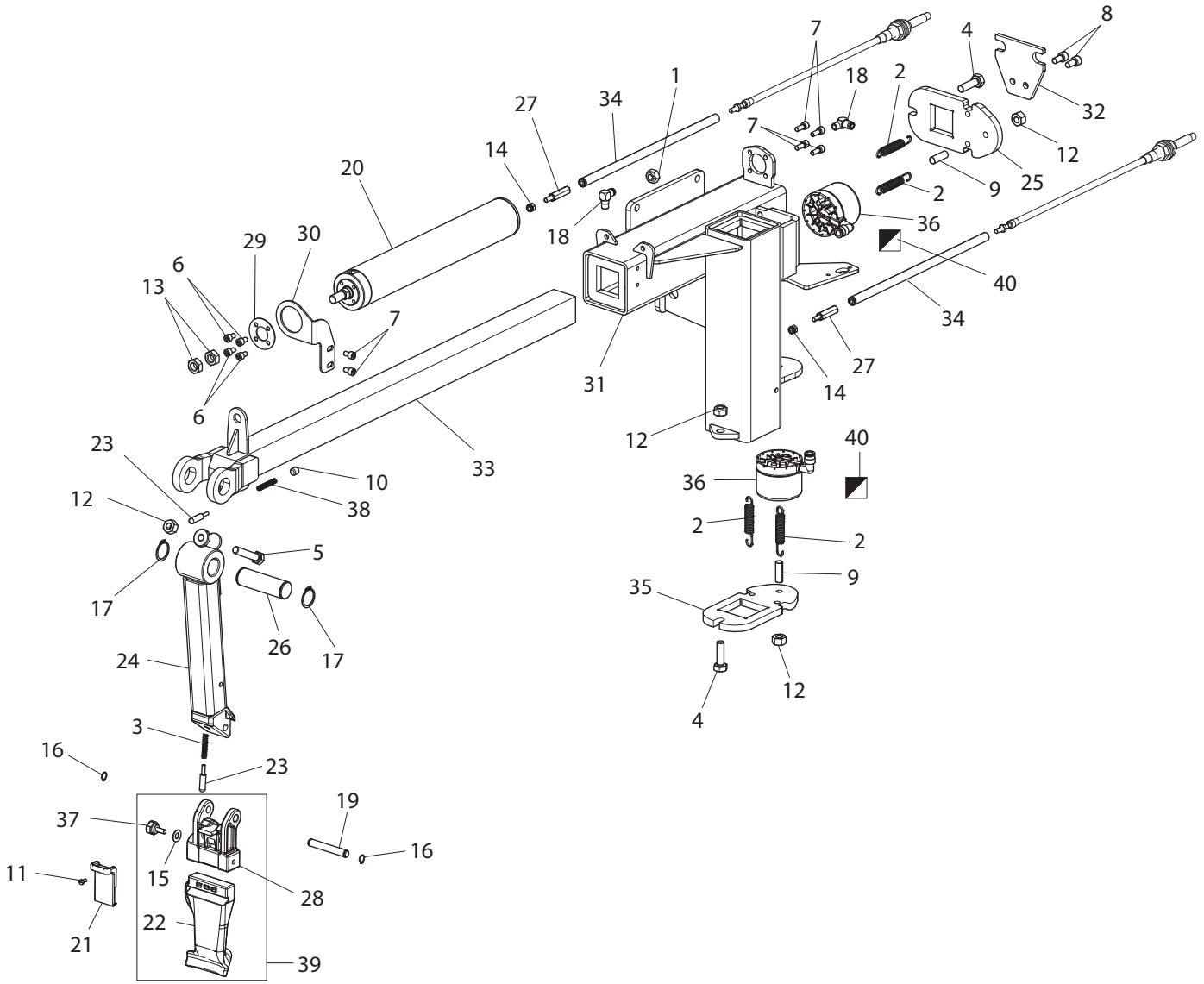
RAVAGLIOLI S.p.A.

LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE
LISTE DES PIECES DETACHEES - LISTA DE PIEZAS

Tavola N°3 - Rev. 0 | **710191210**

GRUPPO COLONNA CON INSERTI
COLUMN GROUP WITH INSERTIONS
SÄULESATZ MIT WENDEPLATTEN
GROUPE COLONNE AVEC INSERTS
GRUPO COLUMNA CON INSERCIÓNES

G1200.3
G1200.3IT



G1200.3	G1200.3IT	
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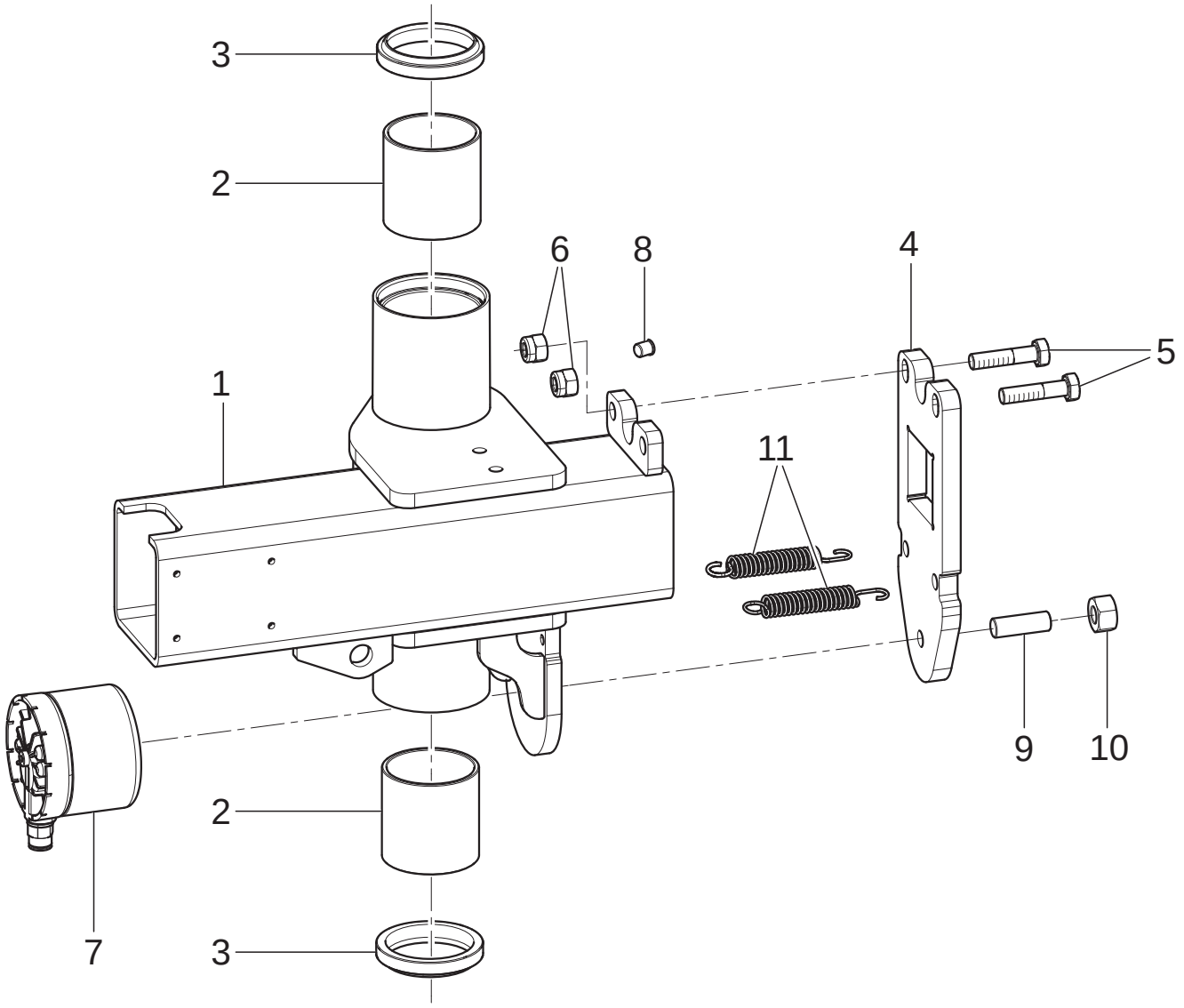
RAVAGLIOLI S.p.A.

LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE
LISTE DES PIECES DETACHEES - LISTA DE PIEZAS

Tavola N°4 - Rev. 0 | **710491410**

GRUPPO DOPPIA GUIDA
DOUBLE GUIDE UNIT
DOPPELTE FÜHRUNGSATZ
GROUPE DOUBLE GUIDE
GRUPO DOBLE GUÍA



G1200.3	G1200.3IT	
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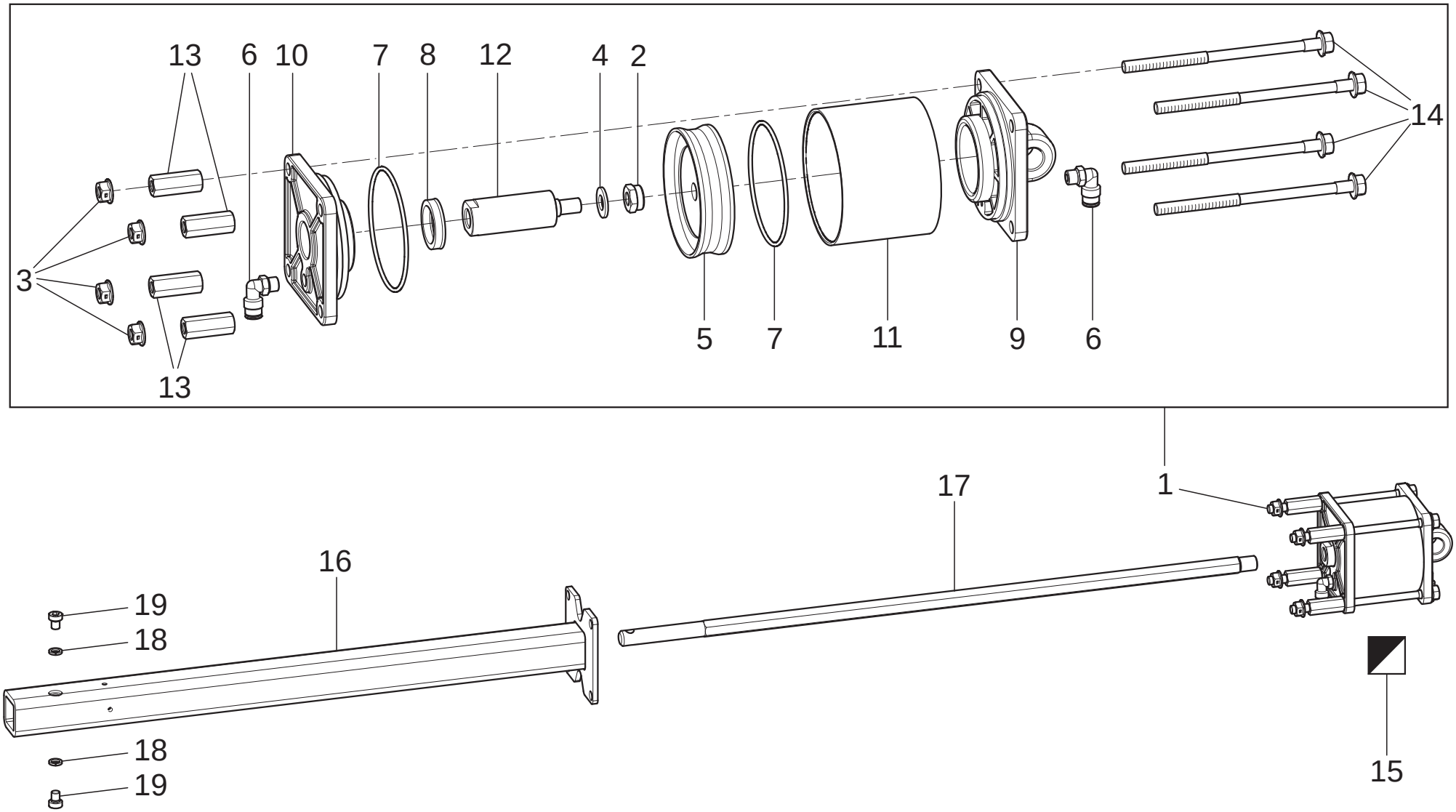
RAVAGLIOLI S.p.A.

LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE
LISTE DES PIECES DETACHEES - LISTA DE PIEZAS

Tavola N°5 - Rev. 0 | **710191090**

GRUPPO SUPPORTO BRACCIO STALLONATORE
BEAD BREAKER ARM SUPPORT UNIT
ABDRÜCKARMSTRÄGERSATZ
GROUPE SUPPORT BRAS DÉCOLLE-TALONS
GRUPO SOPORTE BRAZO DESTALONADOR

G1200.3
G1200.3IT



G1200.3	G1200.3IT	
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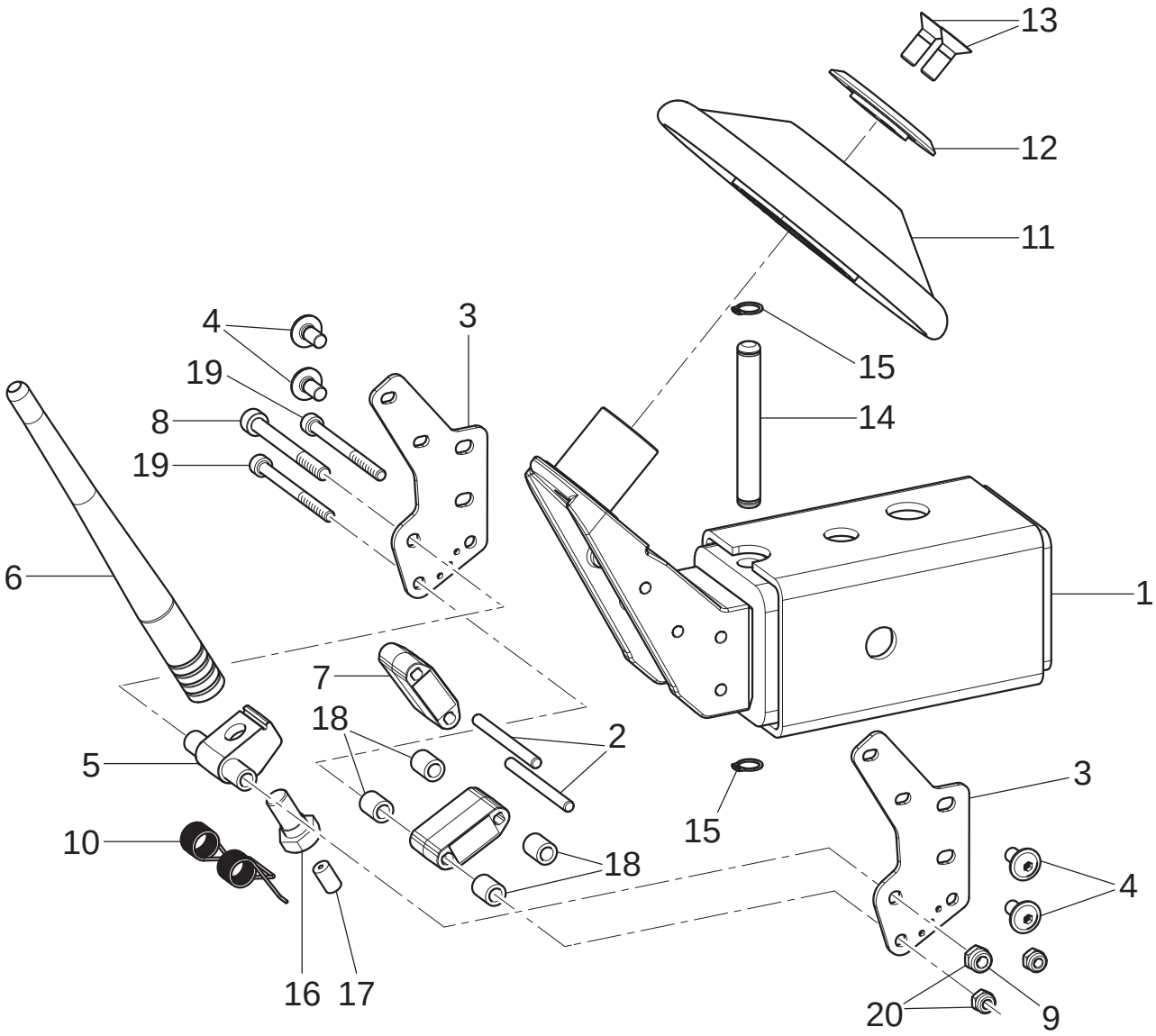
RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*GRUPPO BRACCIO CON CILINDRO ARM UNIT WITH CYLINDER ARMSATZ MIT ZYLINDER GROUPE BRAS AVEC CYLINDRE GRUPO BRAZO CON CILINDRO*	***Pag. 11 di 28***
	Tavola N°6 - Rev. 0	**710191080**		**G1200.3 G1200.3IT**



G1200.3	G1200.3IT	
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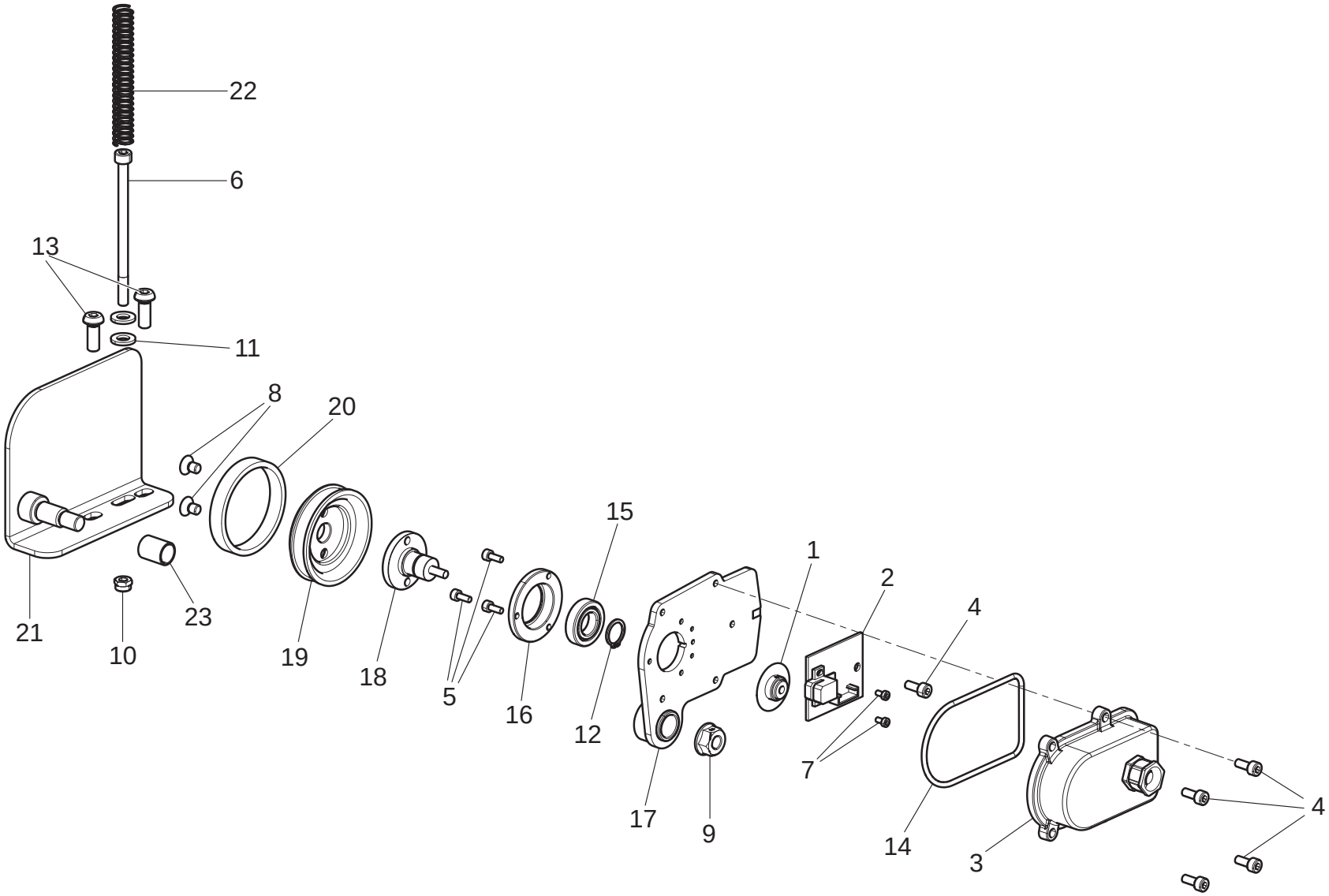
RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**	*GRUPPO GUIDA INFERIORE LOWER GUIDE UNIT UNTERE FÜHRUNGSATZ GROUPE GUIDE INFÉRIEURE GRUPO GUÍA INFERIOR*	***Pag. 12 di 28***
	Tavola N°7 - Rev. 0 / **710191110**		**G1200.3 G1200.3IT**



G1200.3	G1200.3IT	
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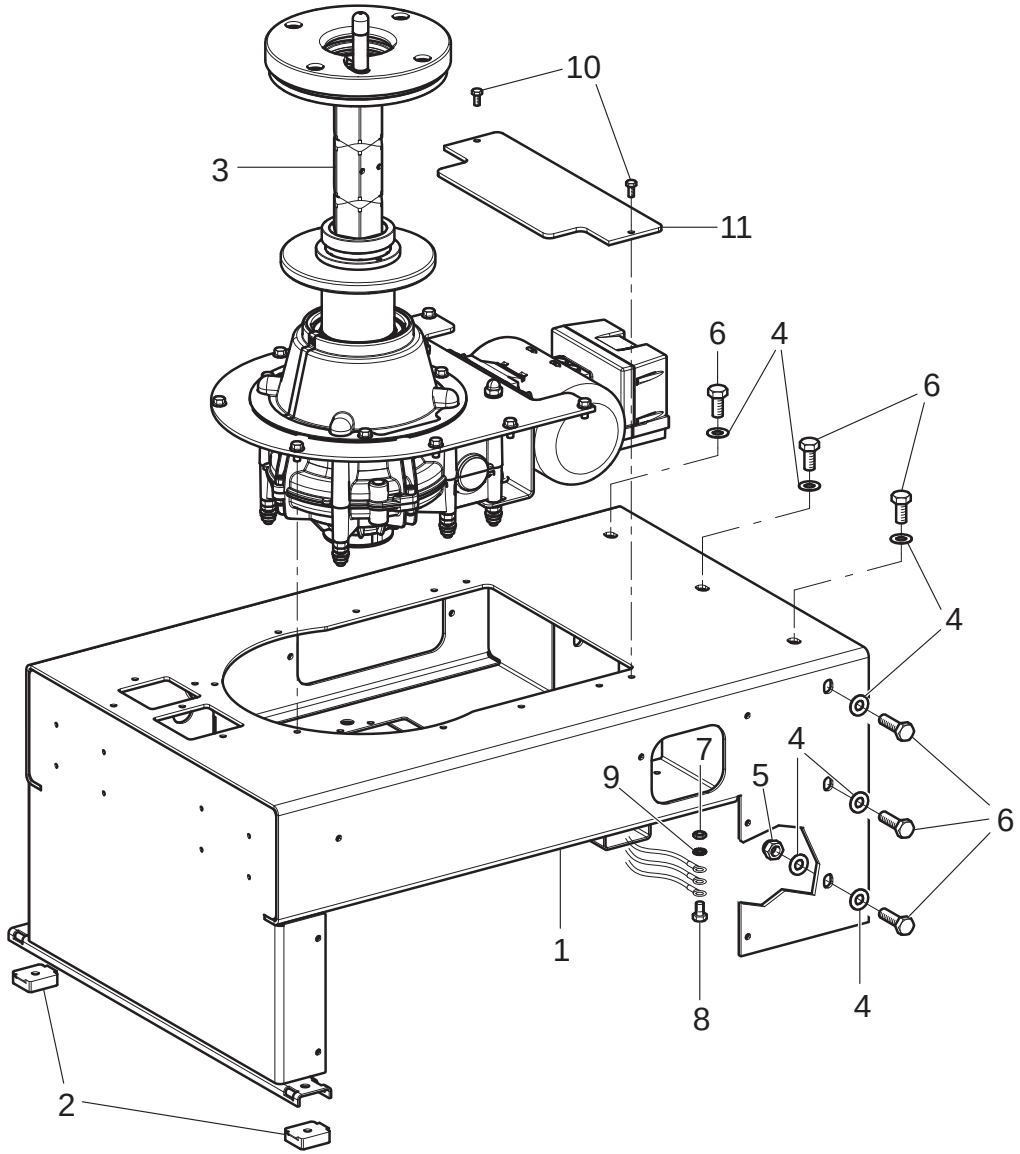
RAVAGLIOLI S.p.A.

LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE
LISTE DES PIECES DETACHEES - LISTA DE PIEZAS

Tavola N°8 - Rev. 0 | **710490670**

GRUPPO ENCODER UTENSILE SUPERIORE
UPPER TOOL ENCODER UNIT
OBERER WERKZEUGENENCODERSATZ
GROUPE ENCODER OUTIL SUPÉRIEUR
GRUPO ENCODER UTENSILIO SUPERIOR



G1200.3	G1200.3IT	
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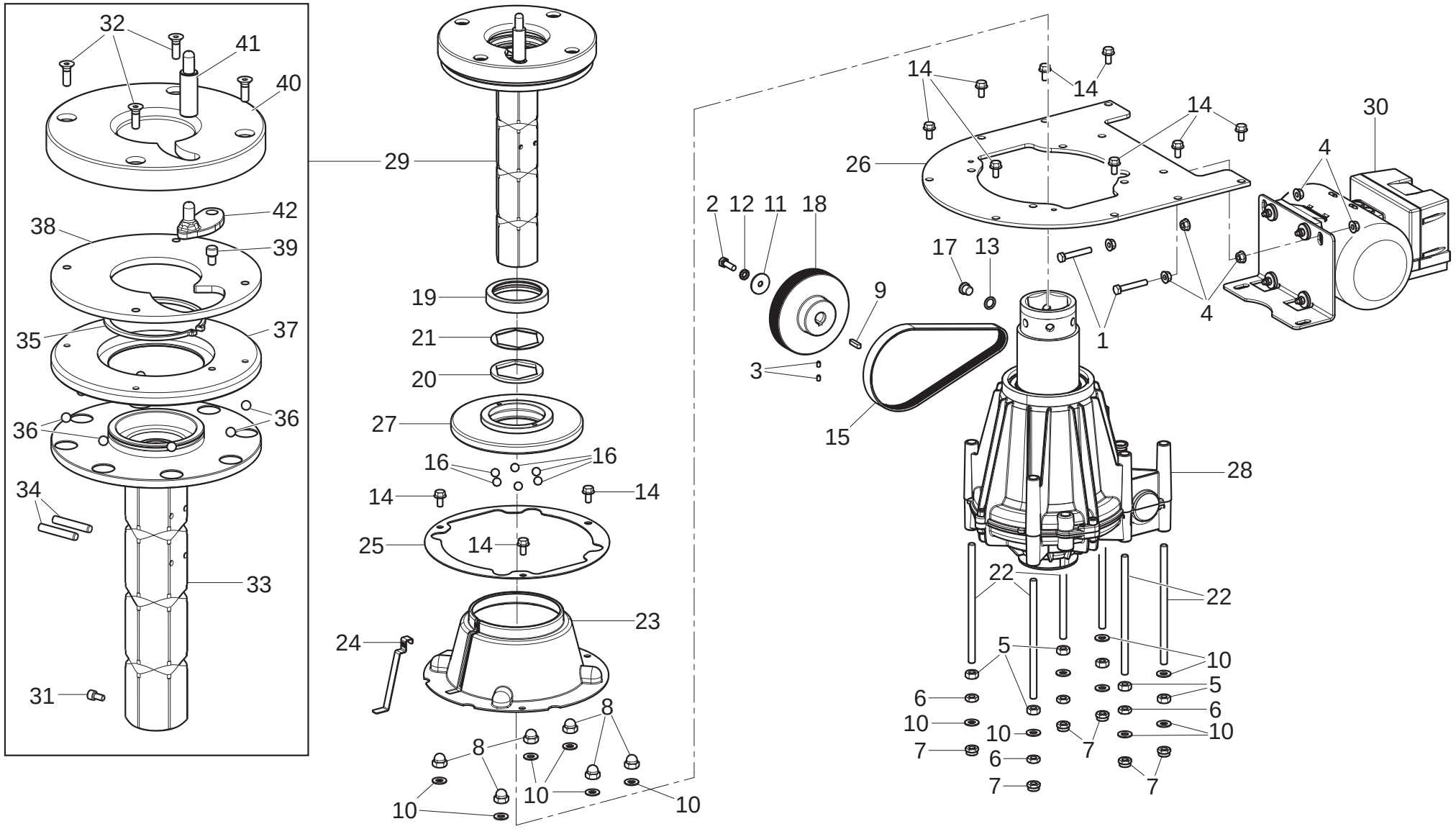
RAVAGLIOLI S.p.A.

LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE
LISTE DES PIECES DETACHEES - LISTA DE PIEZAS

Tavola N°9 - Rev. 0 | **710190341**

GRUPPO BASAMENTO
BASE UNIT
GRUNDPLATTESATZ
GROUPE BATI
GRUPO BASAMIENTO

G1200.3
G1200.3IT



G1200.3	G1200.3IT	
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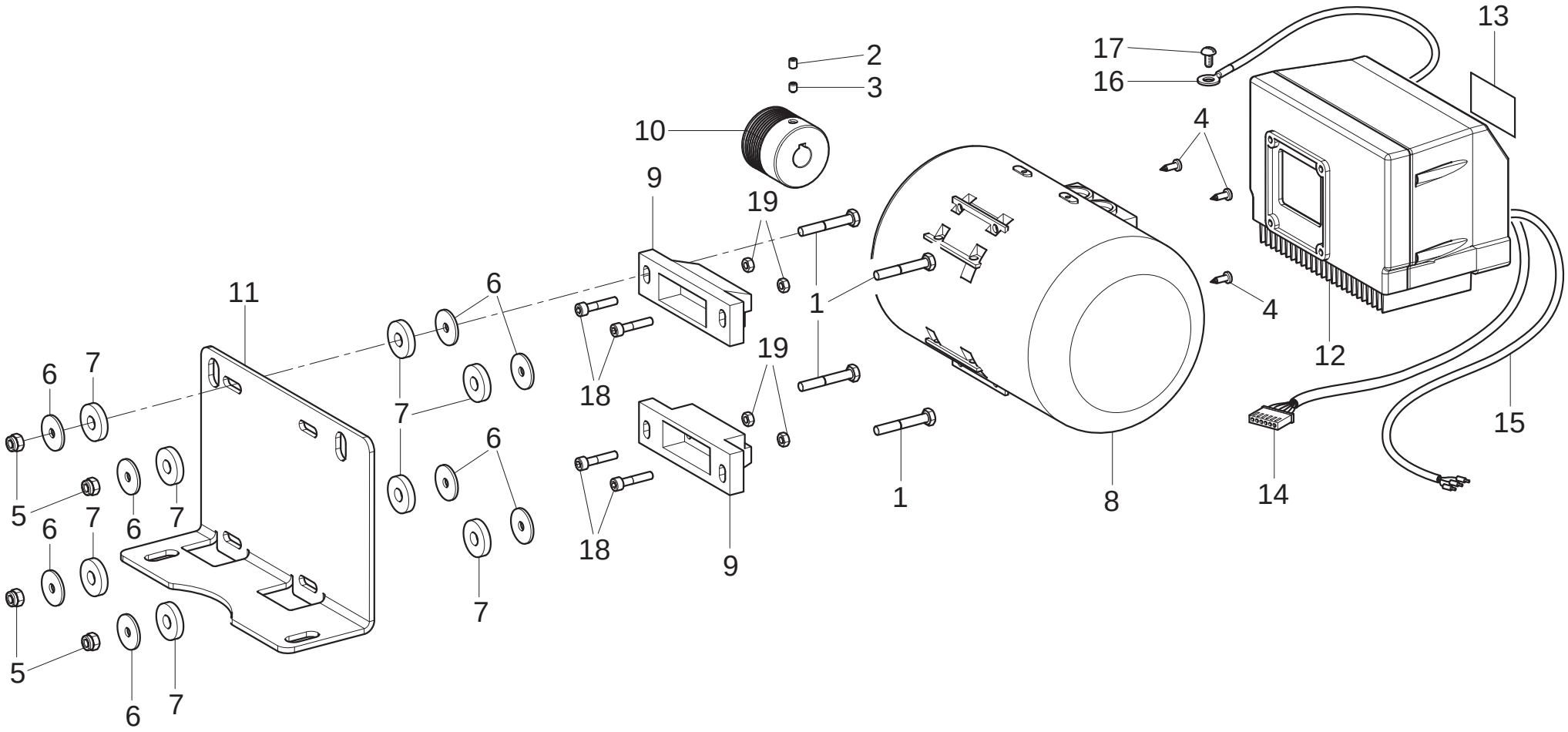
RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*GRUPPO AUTOCENTRANTE SELFCENTERING CHUCK UNIT AUTOZENTRIERESATZ GROUPE AUTOCENTREUR GRUPO AUTOCENTRANTE*	***Pag. 15 di 28***
	Tavola N°10 - Rev. 0	**710591251**		**G1200.3 G1200.3IT**



G1200.3	G1200.3IT	
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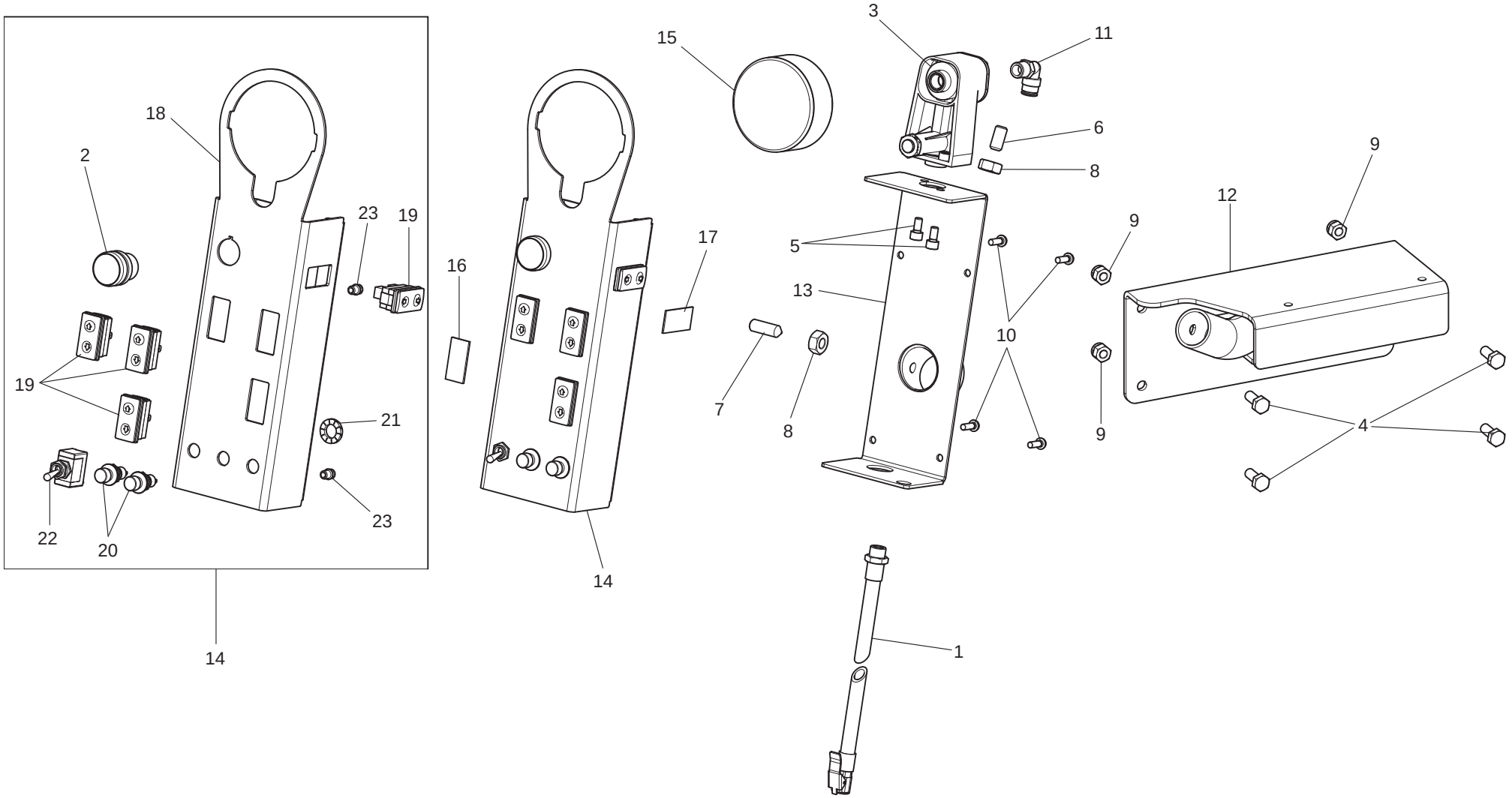
RAVAGLIOLI S.p.A.

LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE
LISTE DES PIECES DETACHEES - LISTA DE PIEZAS

Tavola N°11 - Rev. 0 | **710591070**

GRUPPO MOTORE INVERTER
INVERTER MOTOR UNIT
FREQUENUMFORMER DES MOTORSATZES
GROUPE MOTEUR VARIATEUR
GRUPO MOTOR INVERSOR



G1200.3	G1200.3IT	
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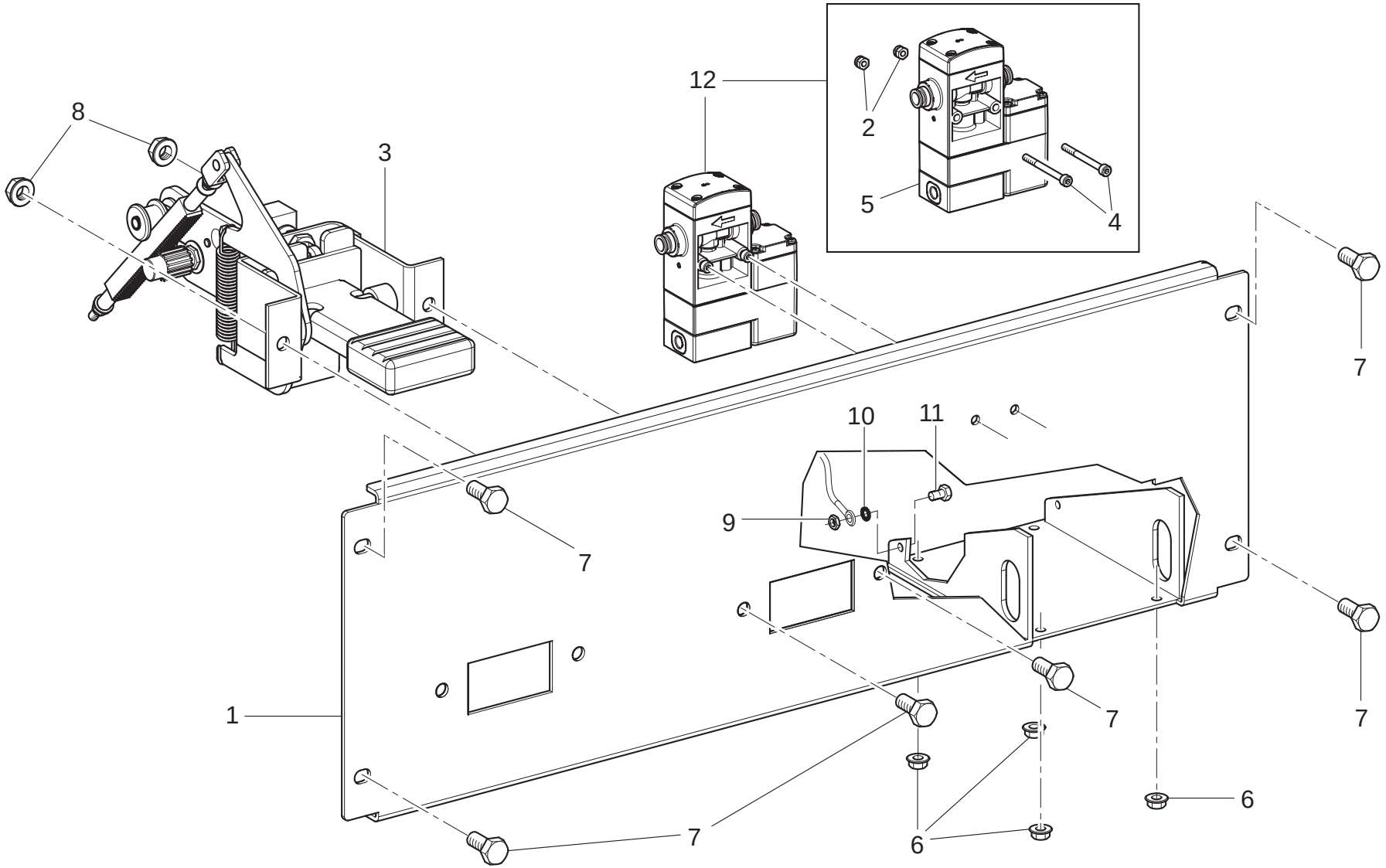
RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*UNITÁ DI COMANDO CONTROL UNIT ANTRIEBSATZ UNITÉ DE COMMANDE UNIDAD DE MANDO*	***Pag. 17 di 28***
	Tavola N°12 - Rev. 0	**710491300**		**G1200.3 G1200.3IT**

7104-R008-0_R



G1200.3	G1200.3IT	
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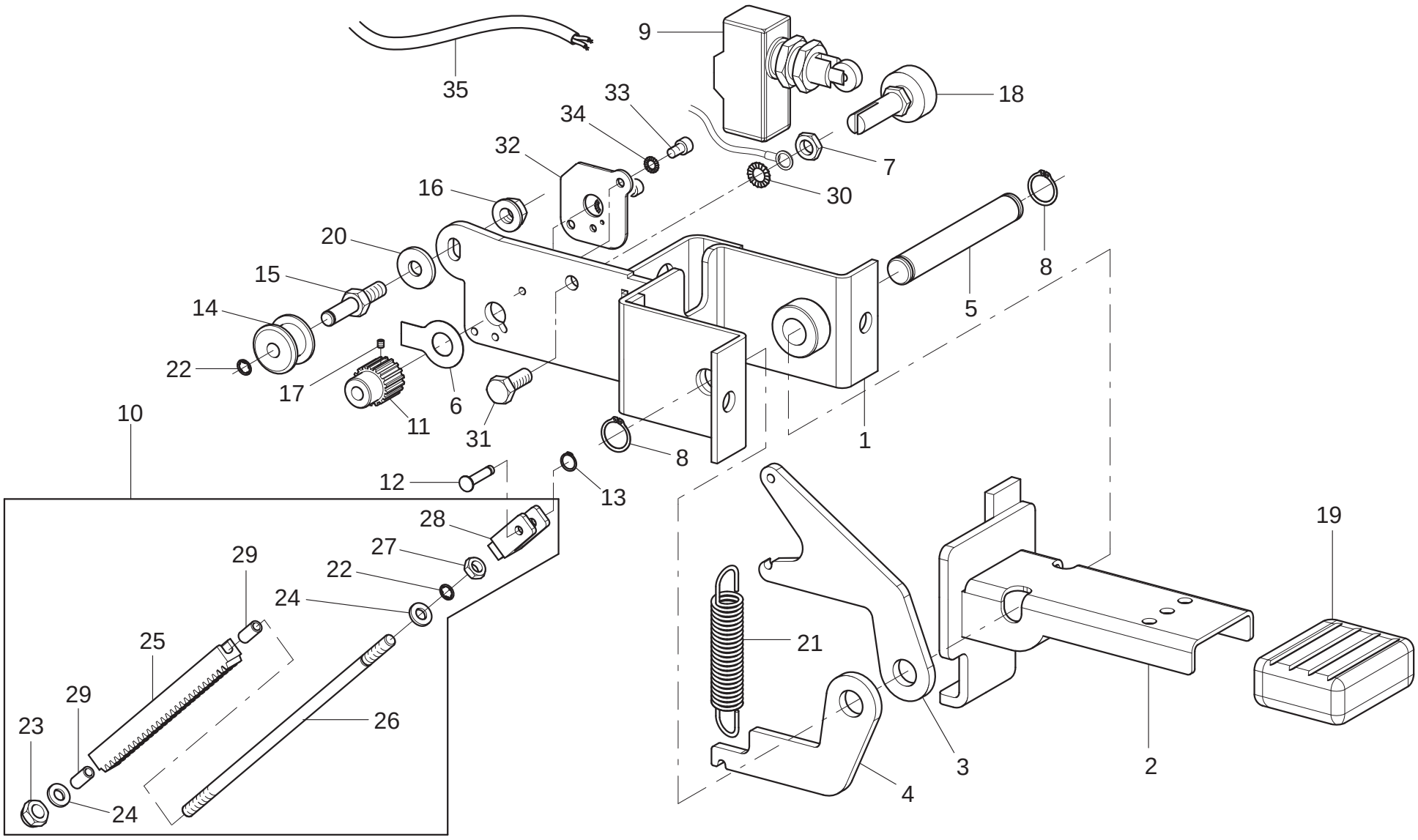
RAVAGLIOLI S.p.A.

LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE
LISTE DES PIECES DETACHEES - LISTA DE PIEZAS

Tavola N°13 - Rev. 0 | **710190261**

COFANO CON PEDALIERE
CASING WITH PEDALBOARD
HAUBE MIT PEDALLEISTE
COFFRE AVEC PÉDALES DE DIRECTION
CAPOT CON PEDALERA

G1200.3
G1200.3IT



G1200.3	G1200.3IT	
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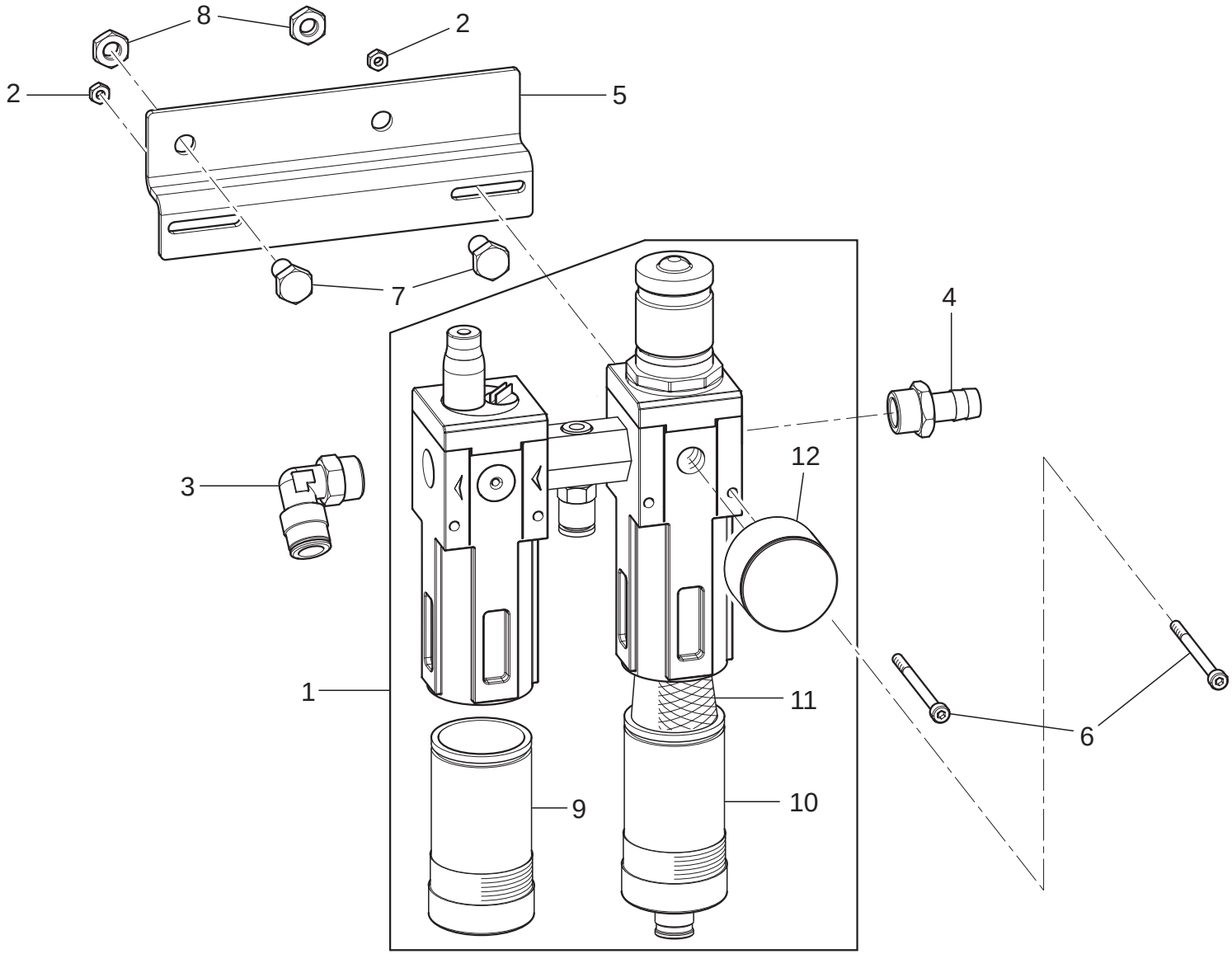
RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*PEDALIERA MOTORE MOTOR PEDAL BOARD MOTORPEDALERIE PÉDALES DE DIRECTION MOTEUR PEDALERA MOTOR*	***Pag. 19 di 28***
	Tavola N°14 - Rev. 0	**710190251**		**G1200.3 G1200.3IT**



G1200.3	G1200.3IT	
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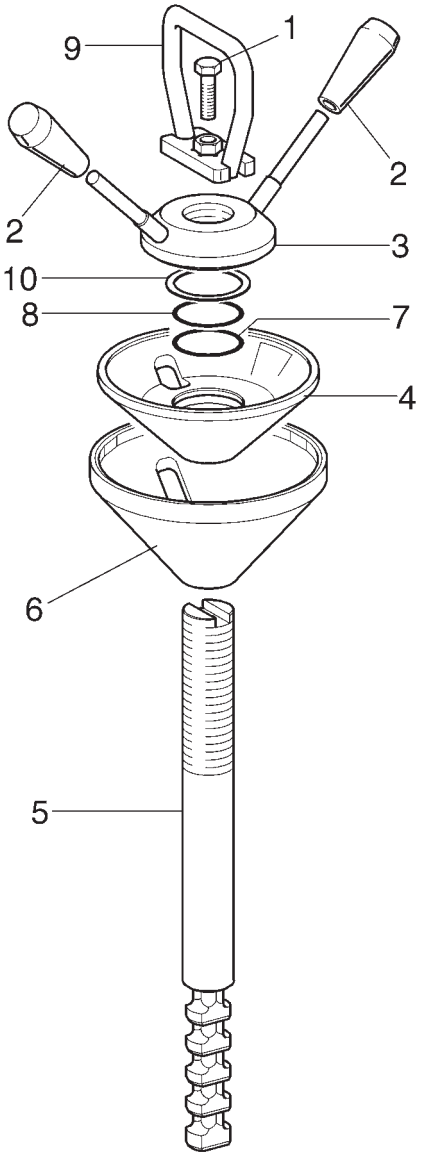
RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*GRUPPO TRATTAMENTO ARIA AIR TREATMENT UNIT AUFBEREITUNGLUFTSATZ GROUPE TRAITEMENT AIR GRUPO TRATAMIENTO AIRE*	***Pag. 20 di 28***
	Tavola N°15 - Rev. 0	**710090920**		**G1200.3 G1200.3IT**



G1200.3	G1200.3IT	
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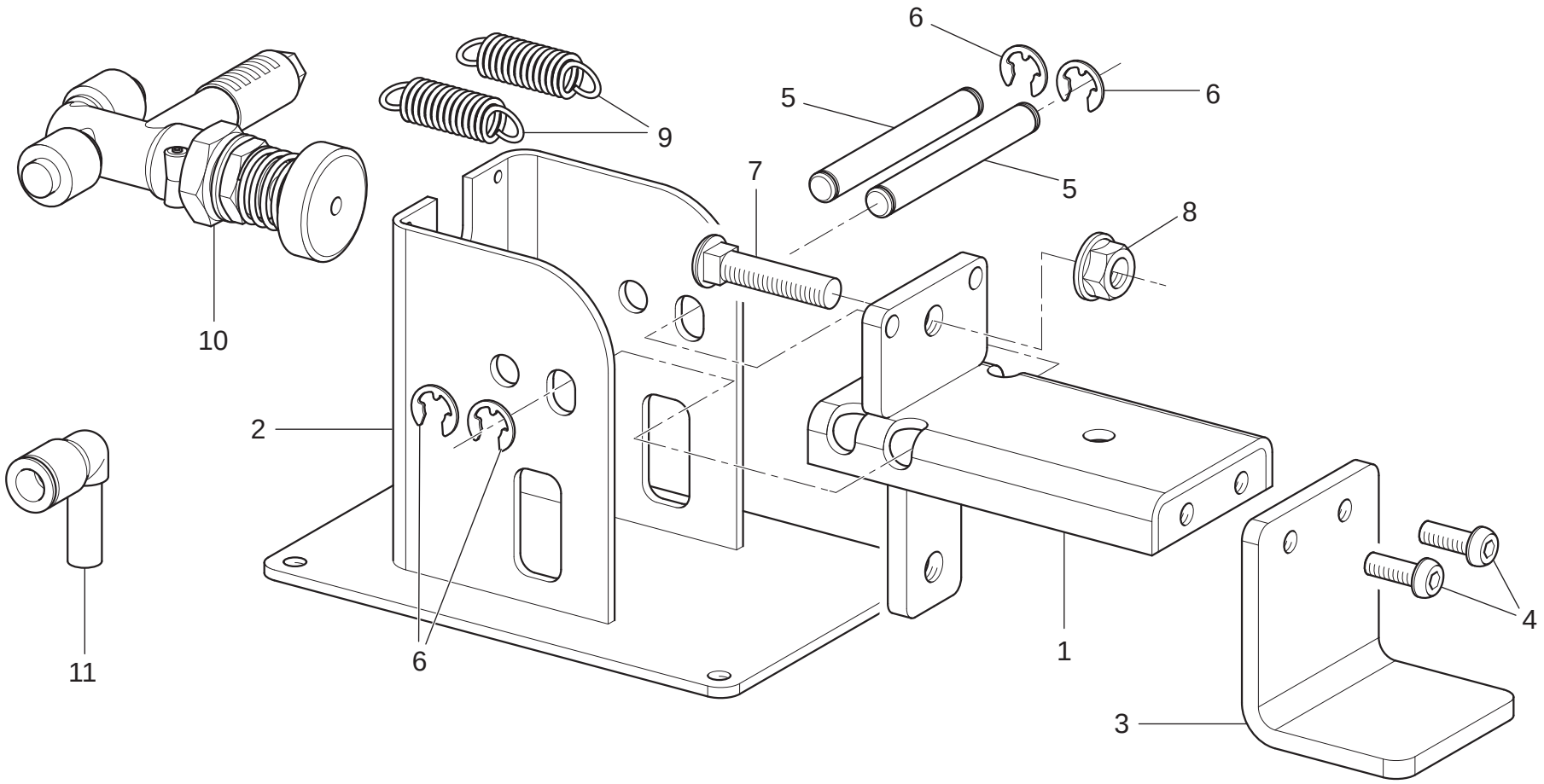
RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*ATTACCO RAPIDO QUICK COUPLING SCHNELLANSCHLUSS BRANCHEMENT RAPID CONNEXIÓN RÁPIDA*	***Pag. 21 di 28***
	Tavola N°16 - Rev. 0	**710090223**		**G1200.3 G1200.3IT**



G1200.3	G1200.3IT	
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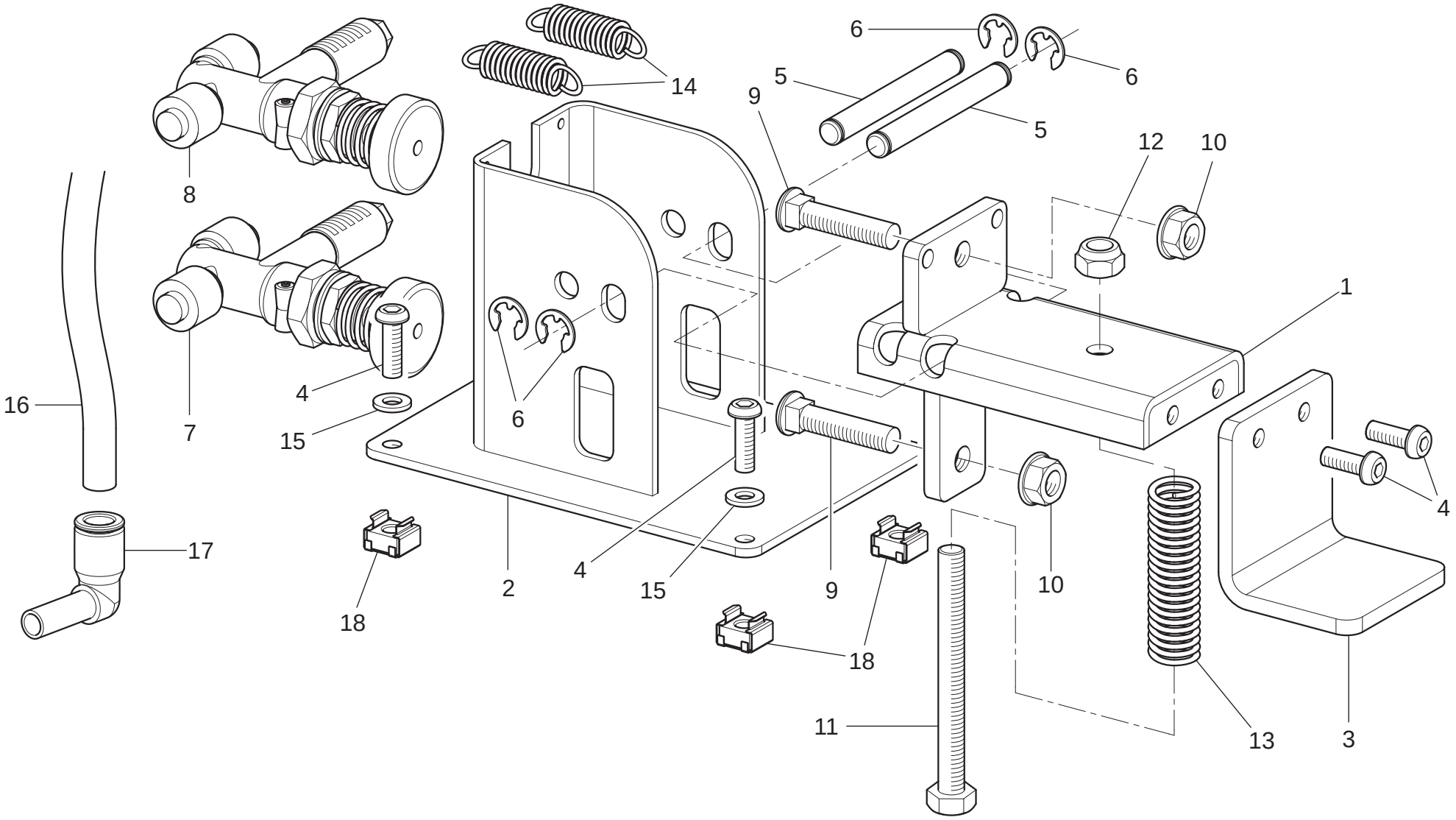
RAVAGLIOLI S.p.A.

LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE
LISTE DES PIECES DETACHEES - LISTA DE PIEZAS

Tavola N°17 - Rev. 0 | **B4127300**

PEDALIERA DI GONFIAGGIO
INFLATION PEDALBOARD
AUFPUMPENPEDALLEISTE
PÉDALES DE DIRECTION DE GONFLAGE
PEDALERA DE INFLADO

G1200.3
G1200.3IT



G1200.3	G1200.3IT	
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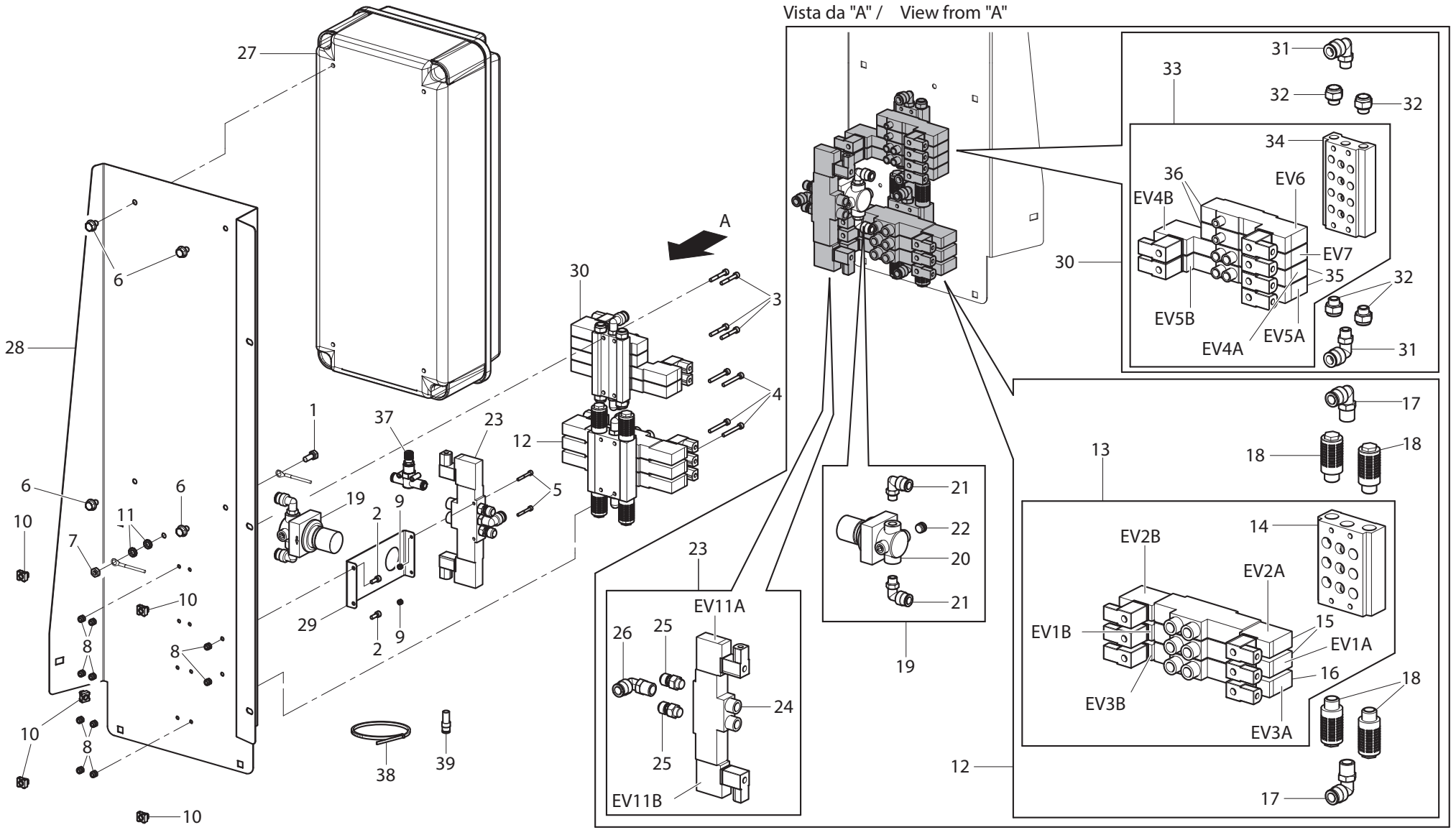
RAVAGLIOLI S.p.A.

LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE
LISTE DES PIECES DETACHEES - LISTA DE PIEZAS

Tavola N°18 - Rev. 0 | **140990371**

GRUPPO PEDALIERA GONFIATUBELESS
TUBELESS INFLATION PEDALBOARD UNIT
PEDALLEISTE AUFPUMPEN TUBELESS SATZ
GROUPE PÉDALES DE DIRECTION GONFLAGE TUBELESS
GRUPO PEDALERA INFLADO TUBELESS



G1200.3	G1200.3IT	
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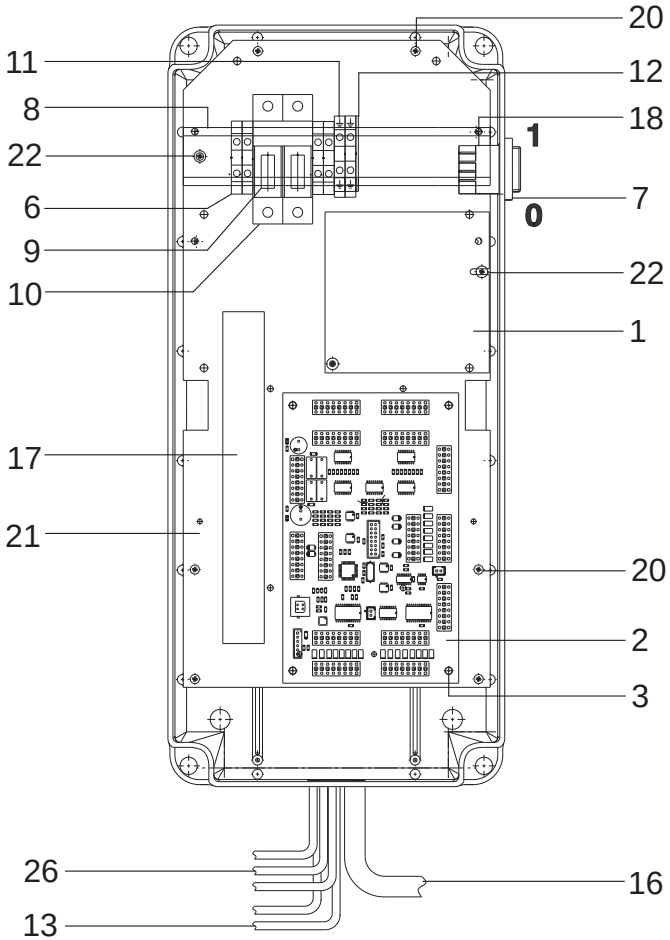
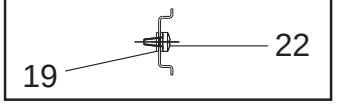
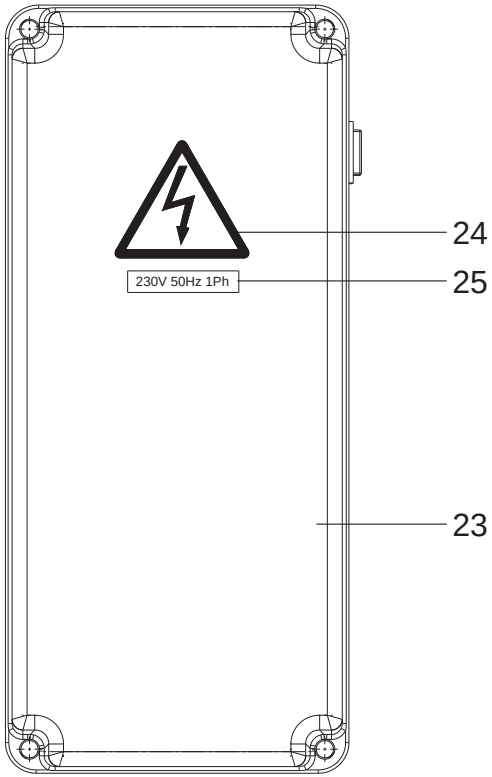
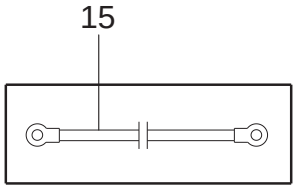
RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*GRUPPO IMPIANTO ELETTRICO ELECTRICAL SYSTEM UNIT GROUPE INSTALLATION ÉLECTRIQUE SATZ VON ELEKTROANLAGE GRUPO INSTALACIÓN ELÉCTRICA*	***Pag. 24 di 28***
	Tavola N°19 - Rev. 0	**710491420**		**G1200.3 G1200.3IT**



Fissaggio dei supporti componenti
Components support fixing
Befestigung von Elemententräger
Fixage des supports composants
Fijación soportes elementos







Bloccare tutti i cavi che entrano nella cassetta al supporto di sinistra
Lock all the cables entering into the box to the left support
Blockieren ganz die Kebeln um die Kiste am den linken Träger
Bloquer tous les câbles qui entrent dans le boiter au support de gauche
Bloquear todos los cables en la caja en el soporte izquierde

G1200.3	G1200.3IT	
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RAVAGLIOLI S.p.A.

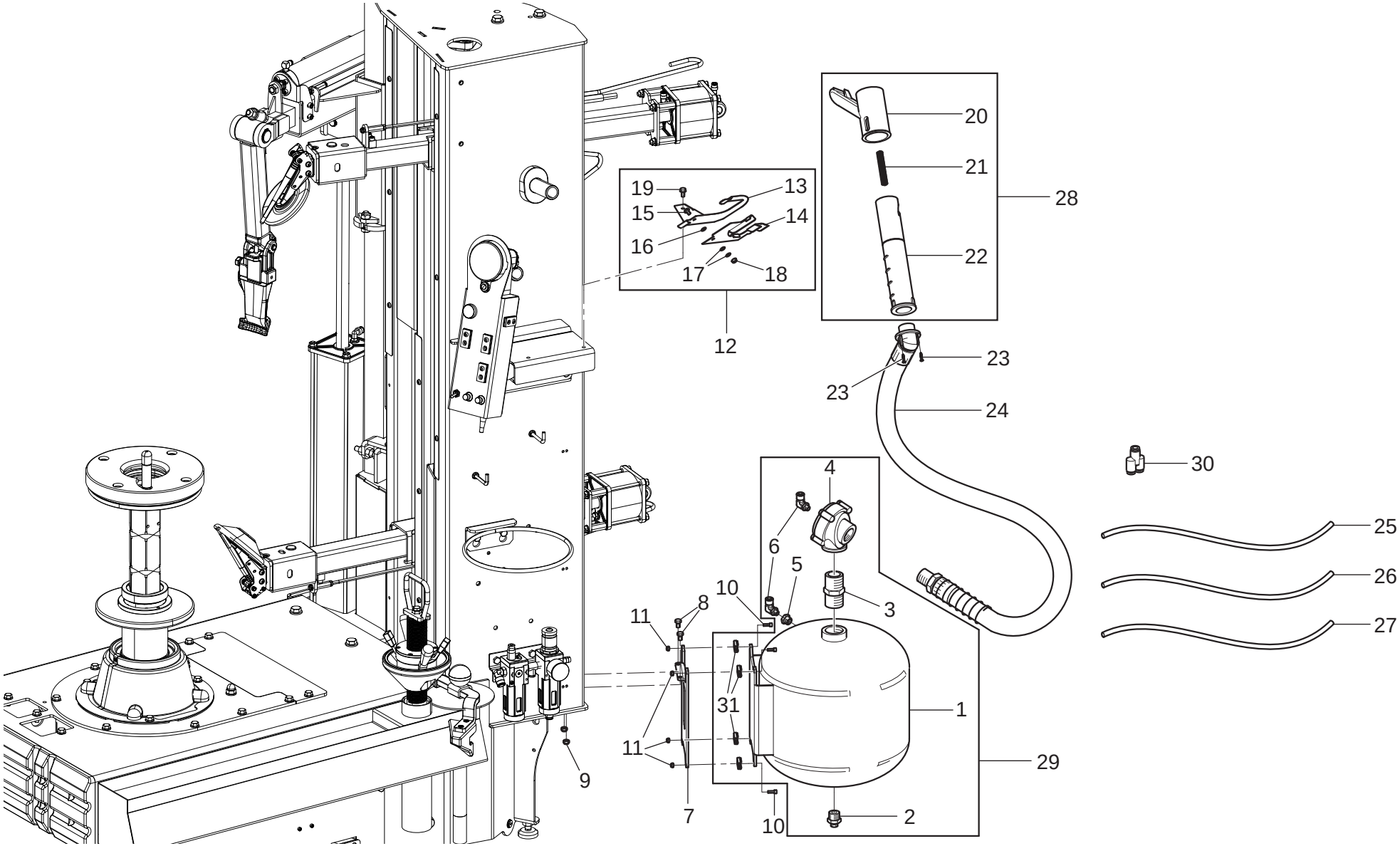
LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE
LISTE DES PIECES DETACHEES - LISTA DE PIEZAS

Tavola N°20 - Rev. 0 | **710403120**

INSIEME MTG CASSETTA ELETTRICA
MTG ELECTRICAL BOX ASSEMBLY
ENSEMBLE MTG ELEKTRISCHEKISTE
ASSEMBLAGE MTG BOITIER ÉLECTRIQUE
JUNTO MTG CAJITA ELECTRICA

G1200.3
G1200.3IT

7104-R008-0_R



G1200.3	G1200.3IT	
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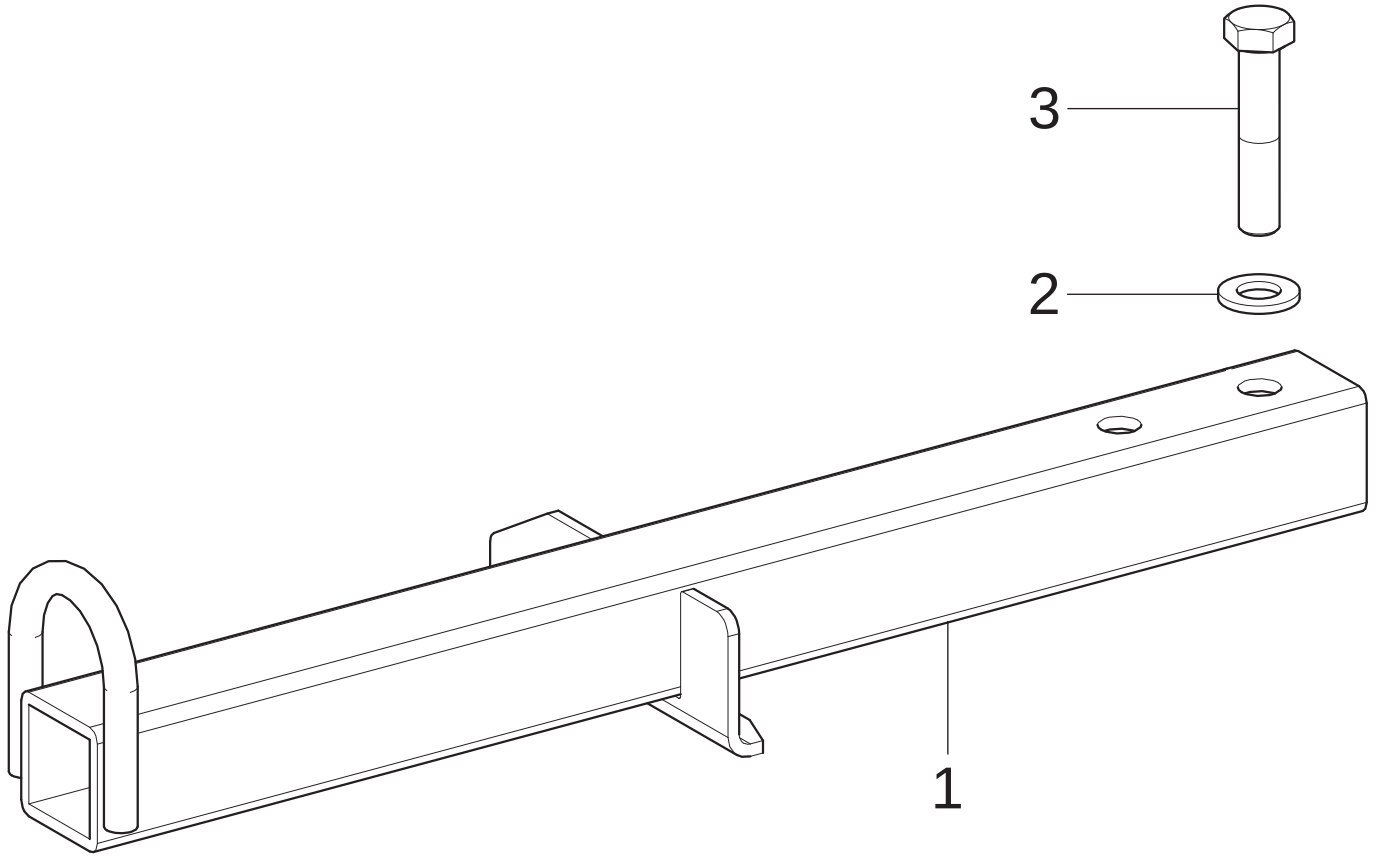
RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*GRUPPO GONFIAGGIO INFLATION GROUP AUFPUMPENSATZ GROUPE DE GONFLAGE GRUPO DE INFLADO*	***Pag. 26 di 28***
	Tavola N°21 - Rev. 0	**790090180**		**G1200.3 G1200.3IT**



G1200.3	G1200.3IT	
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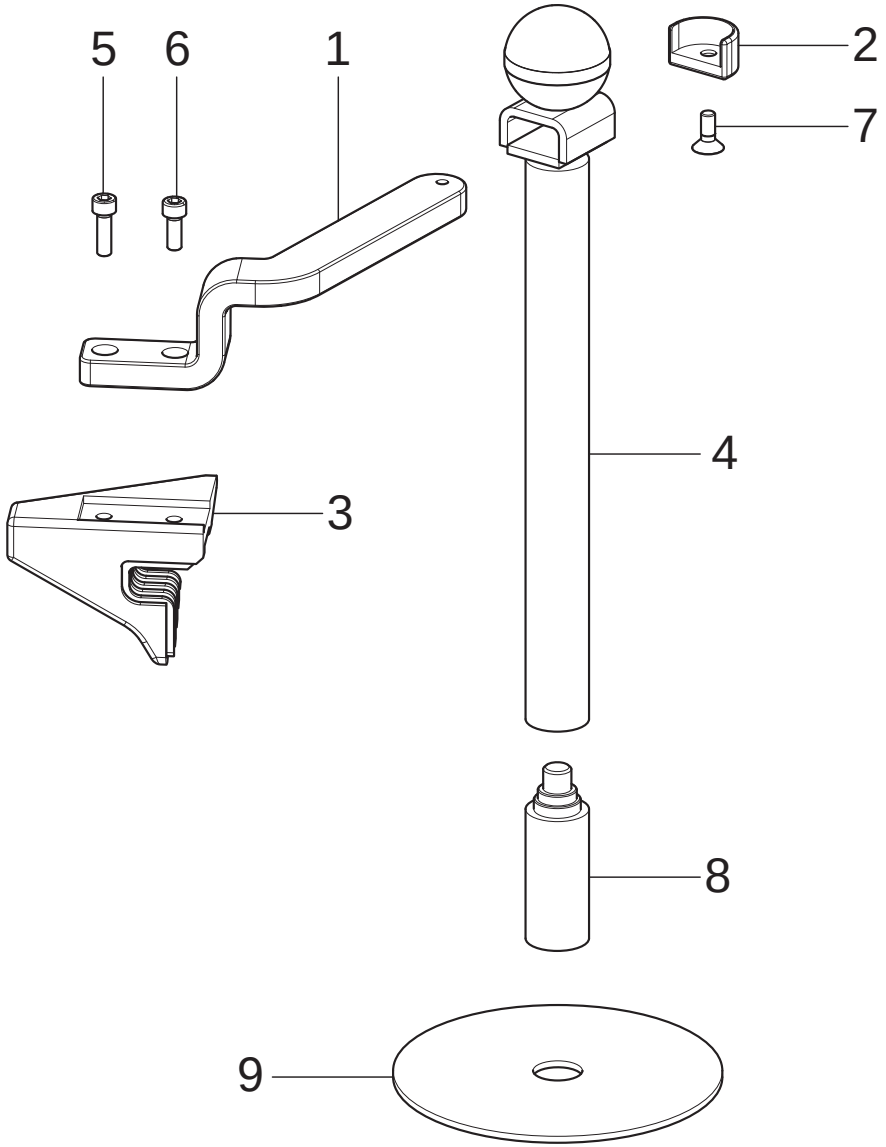
RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*GRUPPO STAFFA SOLLEVAMENTO LIFTING DEVICE BRACKET UNIT ABZIGVORRICHTUNGBÜGELSATZ GROUPE BRIDE SOULÈVEMENT GRUPO BRIDA LEVANTAMIENTO*	***Pag. 27 di 28***
	Tavola N°22 - Rev. 0	**710090720**		**G1200.3 G1200.3IT**



G1200.3	G1200.3IT	
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RAVAGLIOLI S.p.A.	**LISTA DEI COMPONENTI - LIST OF COMPONENTS - TEILELISTE LISTE DES PIECES DETACHEES - LISTA DE PIEZAS**		*PREMITALLONE 28" C/TRAZIONE BEAD DEPRESSING 28" WITH ENTRAINER WULSTABDRÜCKERVORRICHTUNG MIT FÜHRUNGSPIN POUSSE-TALON AVEC GALET PRESIONATALÓN CON TRANSPORTADOR*	***Pag. 28 di 28***
	Tavola N°23 - Rev. 0	**710090730**		**G1200.3 G1200.3IT**