

A. Entanglement

Can anyone's hair, clothing, gloves, necktie, jewelry, cleaning brushes, rags or other materials become entangled with moving parts of the plant, or materials in motion?

Keep all foreign material and objects clear of blade during operation.

B. Crushing : Can anyone be crushed due to:

Uncontrolled or unexpected movement of the plant or its load?

Operator must have control of cutting head at all times when working.

Lack of capacity for the plant to be slowed, stopped or immobilized?

Ensure machine is secure before transporting

As above

The plant tipping or rolling over?

Ensure machine is secure before transporting and on level ground while operating.

Parts of the plant collapsing?

Ensure supports and wheels are in a sound condition.

Being trapped between the plant and materials or fixed structures?

Ensure all lock pins are secure and in place before operating.

Ensure adequate clearance around operator and tilesaw when working.

Other factors not mentioned?

The Tilesaw must never be operated in the transport position.

C. Cutting, Stabbing and Puncturing

Can anyone be cut, stabbed, or punctured due to:

Coming in contact with sharp or flying objects?

Ensure all relevant safety equipment is supplied and worn.

coming in contact with moving parts of the plant during testing, inspection, operation, maintenance, cleaning or repair of the plant?

As above.

The plant, parts of the plant or work pieces disintegrating?

As above.

Work pieces being ejected?

As above.

The mobility of the plant?

Secure cutting arm and transport wheels prior to transportation.

Uncontrolled or unexpected movement of the plant?

Ensure blade guard is sound and in good condition.

D. Shearing

Can anyone's body parts be sheared between two parts of the plant, or between a part of the plant and a work piece or structure?

Ensure blade guard is sound and in good condition.

E. Friction

Can anyone be burnt due to contact with moving parts or surfaces of the plant, or material handled by the plant?

Ensure all moving parts are guarded.

F. Striking

Can anyone be stuck by moving objects due to:

uncontrolled or unexpected movement of the plant or material handled by the plant?

Ensure all relevant safety equipment is supplied and worn.

the plant, parts of the plant or work piece disintegrating?

As above.

Work pieces being ejected?

As above.

Mobility of the plant?

Secure cutting arm prior to transportation.

H. Electrical

Can anyone be injured by electrical shock or burnt due to:

Overload of electrical circuits?

Check electrical supply if overload system is tripped.

Damaged or poorly maintained electrical leads and cable?

Ensure all cables and plugs are in good condition and tagged for compliance before starting.

Damaged electrical switches?

Ensure switch is in good condition (e.g. no cracks in cover) before starting saw.

Water near electrical equipment?

Ensure water is not sprayed directly onto electrics under high pressure.

Lack of isolation procedures?

Ensure unit is connected to an approved power source and overload circuit breakers are fitted.

J. Slipping, Tripping and Falling

Can anyone using the plant, or in the vicinity of the plant, slip, trip or fall due to:

Uneven or slippery work surfaces?

Care should be taken due to the presence of water on the work surface.

Poor housekeeping, eg. swarf in the vicinity of the plant, spillage not cleaned up?

Ensure all off cuts are placed in a container.

Obstacles being placed in the vicinity of the plant?

Ensure all material to be cut is neatly stacked.

DIMAS

Maintenance & Operating Instructions

Electrolux Construction Products Australia Pty. Ltd.

25-31 Kinkaid Avenue

North Plympton

South Australia 5037

TEL: +61 8 8375 1000

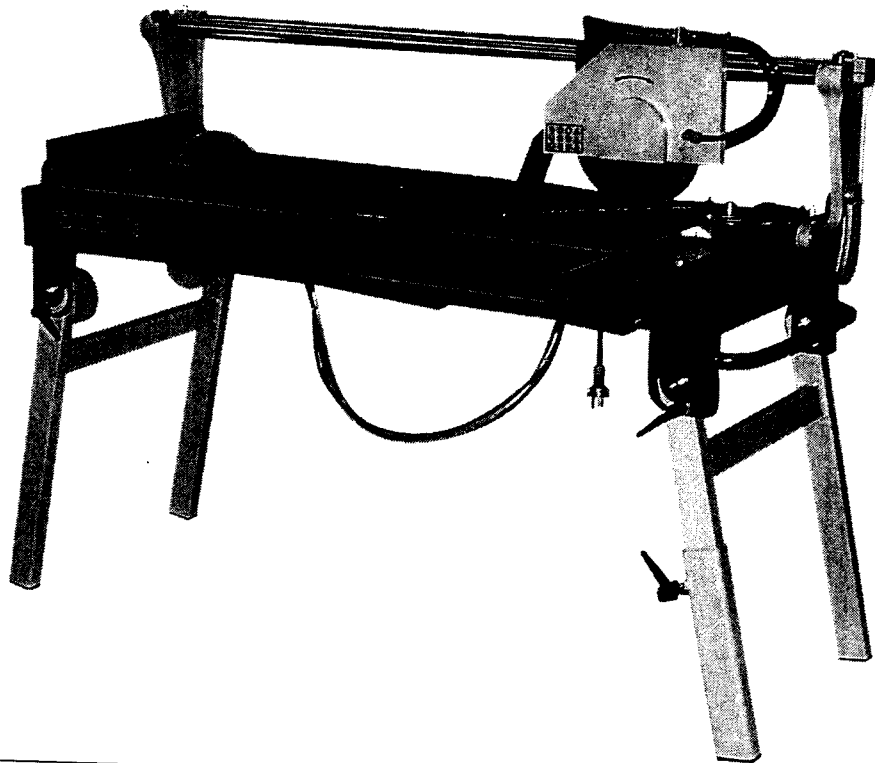
FREE CALL: 1800 241 461

FAX: +61 8 371 0990

FREE FAX: 1800 066 476

EMAIL: info@dimas.net.au

WEB: www.dimas.com.a



PART NOS	531214999 and 531214998
DESCRIPTION	Dimas TS95 & TS130 RAILSaws
DATE	August 2004

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Symbol Definitions

Symboles

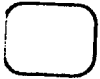
Definición De Los Simbolos



- Please read the instructions for use prior to operating the machine for the first time.
- Avant toute mise en service, lire attentivement la notice et se familiariser avec la machine.
- Antes de la puesta en marcha, lea detenidamente las instrucciones y familiarícese con la máquina.



- Mandatory
- Obligatoire
- Obligatorio



- Indication
- Indicazione
- Indicación



- Prohibition
- Interdiction
- Prohibición



- Warning Triangle
- Triangle d'avertissement
- Triángulo De Advertencia



- Wear Eye Protection
- Port obligatoire des lunettes de protection
- Usar Gafas De Protección



- Wear Head Protection
- Port Obligatoire Du Casque Et Des Écouteurs
- Usar Casco De Protección



- Wear Breathing Protection
- Port obligatoire d'un masque respiratoire protecteur
- Usar Máscara De Protección



- The Use Of Ear Protection Is Mandatory
- Port obligatoire da casque antibruit
- Es Obligatorio El Uso De Protección Auditiva



- Wear a Hard Hat
- Port Obligatoire Da Casque Antibruit
- Usar Casco Duro



- Wear Safety Shoes
- Port obligatoire des chaussures de sécurité
- Usar Zapatos De Seguridad



- Wear Appropriate Clothing
- Port obligatoire de la tenue appropriée
- Usar Ropa Adecuada



- Remove The Blade Prior To Hoisting, Loading, Unloading And Transporting The Machine On Jobsite.
- Démontage Obligatoire Du Disque En Cas D'élingage, De Chargement, De Déchargement Et De Transport Sur Le Chantier.
- Desmontar El Disco Antes De Desplazar, Cargar, Descargar O Transportar La Máquina En La Obra.



- Motor Off
- Arrêt Du Moteur
- Parar El Motor



- Use In Well Ventilated Area
- A Utiliser Dans Un Endroit Bien Ventilé
- Usar En Una Área Bien Ventilada



- Do Not Use In Flammable Areas
- Ne Pas Utiliser Dans Des Ambiances Comportant Un Risque D'incendie
- No Usar In Áreas Inflamables



- Machinery Hazard, Keep Hands And Feet Clear.
- Danger! Rester À Distance De La Machine
- Máquina Peligrosa - Mantenga Manos Y Pies Alejados De La Máquina



- No Non-working Personnel In Area
- Zone Interdite Au Personnel Non-Ouvrier
- Prohibido Para Personas Ajenas A La Obra



- No Smoking
- Défense De Fumer
- No Fumar



- Do Not Operate Without All Guards In Place
- Ne Pas Utiliser Avant D'avoir Installé Toutes Les Protections
- No Operar Sin Todas Las Protecciones In Su Sitio



- Always Keep the Blade Guards In Place
- Toujours Vérifier Que Les Protections De Disque Sont Bien En Place
- Mantenga Siempre Las Protecciones De La Hoja En Su Sitio



- Keep Work Area Clean/Well Lit, Remove All Safety Hazards
- La Zone De Travail Doit Toujours Être Propre, Bien Éclairée Et Ne Présenter Aucun Risque
- Mantenga Limpio El Sitio De Trabajo/Bien Iluminado, Elimine Todos Los Riesgos De Seguridad



- Dangerously High Noise Level
- Niveau De Bruit Dangereux
- Nivel De Ruido Elevadamente Peligroso



- Pay Extreme Attention To The Care And Protection Of The Machine Before Starting Up
- Accorder Une Très Grande Attention À La Sécurité Et À La Préparation De La Machine Avant De Commencer À Travailler
- Ponga Extrema Atención Al Cuidado Y Preparación De La Máquina Antes De Ponerla En Marcha



- Remove Tools From Area and Machine
- Enlever Les Outils De La Zone De Travail Et De La Machine
- Elimine Las Herramientas Del Área Y De La Máquina



- Electrical Switch - OFF
- Interrupteur électrique-arrêt
- Conmutador De Apagado Eléctrico



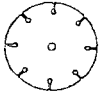
- Electrical Switch - ON
- Interrupteur électrique-marche
- Conmutador De Encendido Eléctrico



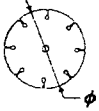
- Electrical Switch - Start
- Interrupteur électrique-démarrage
- Conmutador De Arranque Eléctrico



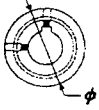
- Repairs Are To Be Done By An Authorized Dealer Only
- Les réparations ne peuvent être exécutées que par un distributeur agréé
- Las Reparaciones Deben Ser Efectuadas Únicamente Por Un Distribuidor Autorizado



- Diamond Blade
- Disque diamanté
- Sierra Diamantada



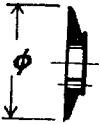
- Blade Diameter
- Diamètre De Disque
- Diámetro De La Hoja



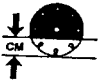
- Pulley Diameter
- Diamètre De Poulie
- Diámetro De La Correa



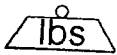
- Number of Revolutions Per Minute, Rotational Speed
- Nombre De Tours/Minutes, Vitesse De Rotation
- N° De Revoluciones Por Minuto, Velocidad De Rotación



- Blade Flange Diameter
- Diamètre Du Flaque De Disque
- Diámetro De La Brida De La Hoja



- Blade Cutting Depth
- Profondeur De Coupe Du Disque
- Profundidad De Corte De La Hoja



- Machine Mass (lbs)
- Poids De La Machine (en lbs)
- Masa De La Máquina (lbs)



- Electric Motor
- Moteur Électrique
- Motor eléctrico

WARNING

HEARING HAZARD

DURING NORMAL USE OF THIS MACHINE, OPERATOR MAY BE EXPOSED TO A NOISE LEVEL EQUAL OR SUPERIOR TO 85 dB (A)

ATTENTION!!!

RISQUE DE LÉSION POUR L'OUÏE.

DANS DES CONDITIONS NORMALES D'UTILISATION, CETTE MACHINE PEUT COM-
PORTER UNE EXPOSITION ACOUSTIQUE D'UN NIVEAU ÉGAL OU SUPÉRIEUR À
85 DB (A) POUR L'OPÉRATEUR PRÉPOSÉ.

ATENCIÓN

RIESGO DE DAÑO AUDITIVO

EN CONDICIONES NORMALES DE UTILIZACIÓN, EL OPERADOR DE ESTA MÁQUINA PUEDE
ESTAR EXPUESTO A UN NIVEL DE RUIDO IGUAL O SUPERIOR A 85 dB (A)

SAFETY FIRST!



WARNINGS DO's AND DO NOT's

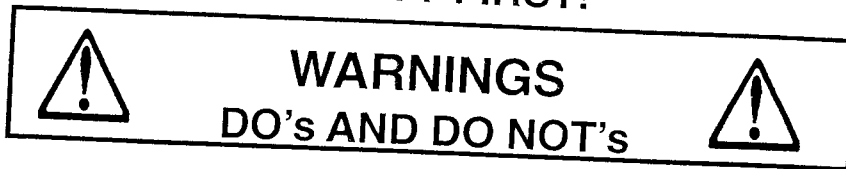


WARNING: FAILURE TO COMPLY WITH THESE WARNINGS AND OPERATING INSTRUCTIONS COULD RESULT IN DEATH OR SERIOUS BODILY INJURY.

DO

- DO read this entire operator's manual before operating this machine. Understand all warnings; instructions, and controls.
- DO keep all guards in place and in good condition.
- DO wear safety approved hearing, eye, head and respiratory protection.
- DO read and understand all warnings and instructions on the machine.
- DO read and understand the symbol definitions contained in this manual.
- DO keep all parts of your body away from the blade and all other moving parts.
- DO know how to stop the machine quickly in case of emergency.
- DO turn the "ON/OFF" switch to the "OFF" position prior to connecting the machine to the power source.
- DO inspect the blade, flanges and shafts for damage before installing the blade.
- DO use the blade flange size shown for each blade size.
- DO use only the blade flanges supplied with the saw. Never use damaged or worn blade flanges.
- DO use only blades marked with a maximum operating speed greater than the blade shaft speed. Verify speed by checking blade shaft rpm and pulley diameters and blade flange diameters.
- DO verify saw drive configuration by checking blade shaft RPM, pulley diameters, and blade flange diameter.
- DO read all safety materials and instructions that accompany any blade used with this machine.
- DO inspect each blade carefully before using it. If there are any signs of damage or unusual wear, **DO NOT USE THE BLADE.**
- DO mount the blade solidly and firmly. Wrench tighten the arbor nut.
- DO make sure the blade and flanges are clean and free of dirt and debris before mounting the blade on the saw.
- DO use the correct blade for the type of work being done. Check with blade manufacturer if you do not know if blade is correct.
- DO use caution and follow the instructions when loading and unloading the machine.
- DO operate this machine only in well ventilated areas.
- DO instruct bystanders on where to stand while the machine is in operation.
- DO establish a training program for all operators of this machine.
- DO clear the work area of unnecessary people. Never allow anyone to stand in front of or behind the blade while the motor is running.
- DO make sure the blade is not contacting anything before starting the motor.
- DO use caution when lifting and transporting this machine.
- DO always tie down the machine when transporting.
- DO use caution and follow instructions when setting up or transporting the machine.
- DO have all service performed by competent service personnel.
- DO make sure electric powered machines are plugged into a properly grounded circuit.
- DO make sure power cords are the proper size and in good condition.
- DO maintain a secure grip on the material being cut.
- DO clean the water tray frequently.
- DO verify the blade arbor hole matches the machine spindle before mounting the blade.
- DO clean the machine after each day's use.
- DO follow all electrical codes in your area.
- DO consider work area environment. Don't expose power tools to rain. Don't use power tools in wet locations.
- DO use caution to guard against electric shock. Prevent body contact with grounded surfaces (i.e., pipes, radiators, ranges, refrigerators).
- DO use correct voltage and proper extension cords. Never carry tool by cord or yank it to disconnect it from receptacle. Keep cord away from heat, oil and sharp edges.
- DO always carry the machine with the motor stopped.
- DO disconnect tools from power source when not in use, before servicing and when changing accessories.
- DO carefully maintain and clean for better and safer performance. Follow instructions for changing accessories. Inspect tool cords periodically and, if damaged, have repaired by authorized service facility.
- DO only cut in a straight line.
- DO only saw as deep as the job specifications require.
- DO always give a copy of this manual to the equipment user. If you need extra copies, call TOLL FREE 1-800-365-4003.

SAFETY FIRST!



WARNING: FAILURE TO COMPLY WITH THESE WARNINGS AND OPERATING INSTRUCTIONS COULD RESULT IN DEATH OR SERIOUS BODILY INJURY.

DO NOT

- DO NOT operate this machine unless you have read and understood this operator's manual.
- DO NOT operate this machine without the blade guard, or other protective guards in place.
- DO NOT stand behind or in front of the blade path while the motor is running.
- DO NOT leave this machine unattended while the motor is running.
- DO NOT operate this machine when you are tired or fatigued.
- DO NOT use a wet blade without adequate water supply to the blade.
- DO NOT exceed maximum blade speed shown for each blade size. Excessive speed could result in blade breakage.
- DO NOT operate the machine if you are uncertain of how to run the machine.
- DO NOT use damaged equipment or blades.
- DO NOT touch or try to stop a moving blade with your hand.
- DO NOT cock, jam, wedge or twist the blade in a cut.
- DO NOT transport a cutting machine with the blade mounted on the machine.
- DO NOT use a blade that has been dropped or damaged.
- DO NOT use carbide tipped blades.
- DO NOT use abrasive blades.
- DO NOT use conventional abrasive blades with water.
- DO NOT touch a dry cutting diamond blade immediately after use. These blades require several minutes to cool after each cut.
- DO NOT use damaged or worn blade flanges.
- DO NOT allow other persons to be near the machine when starting or when the machine is in operation.
- DO NOT operate this machine in an enclosed area unless it is properly vented.
- DO NOT operate this machine in the vicinity of anything that is flammable. Sparks could cause a fire or an explosion.
- DO NOT allow blade exposure from the guard to be more than 180 degrees.
- DO NOT operate this machine with the belt guard or blade guard removed.
- DO NOT operate this machine unless you are specifically trained to do so.
- DO NOT use a blade that has been over heated (Core has a bluish color).
- DO NOT jam material into the blade.
- DO NOT grind on the side of the blade.
- DO NOT lay power cords in or near the water.
- DO NOT replace the motor with any motor that does not have a special grounding connection.
- DO NOT cut deeper than 1" per pass with a dry blade. Step out to achieve deeper cuts.
- DO NOT start cutting with a saw until you have a clear work area and secure footing.
- DO NOT operate this machine while using drugs or alcohol.

This saw was designed for certain applications only. DO NOT modify this saw or use for any application other than for which it was designed. If you have any questions relative to its application, DO NOT use the saw until you have written Diamant Boart, Inc. and we have advised you.

Diamant Boart, Inc.
17400 West 119th Street
Olathe, Kansas 66061
In USA 1-800-365-4003

2.0 INTRODUCTION

2.1 DESCRIPTION OF MACHINE

Thank you for choosing one of our machines. The manufacturer designs and produces durable and reliable machines to solve all cutting processes.

FELKER RAIL SAWS are available in a range of models to cut material upto 51" in . They can be placed inside factories or used directly on building yards. These rail saws are designed to use diamond blades to cut marble or granite pieces with dimension, size and weight allowed by machines' structure.

Location and name of principal components (Fig.1)

- 1) Blade Guard
- 2) Guide Bars
- 3) Control Switch Box
- 4) Water Tank
- 5) Water Pump
- 6) Handwheel to adjust cutting depth - FRS-51
- 7) Table Legs
- 8) Tilting Bridge 0°- 45°

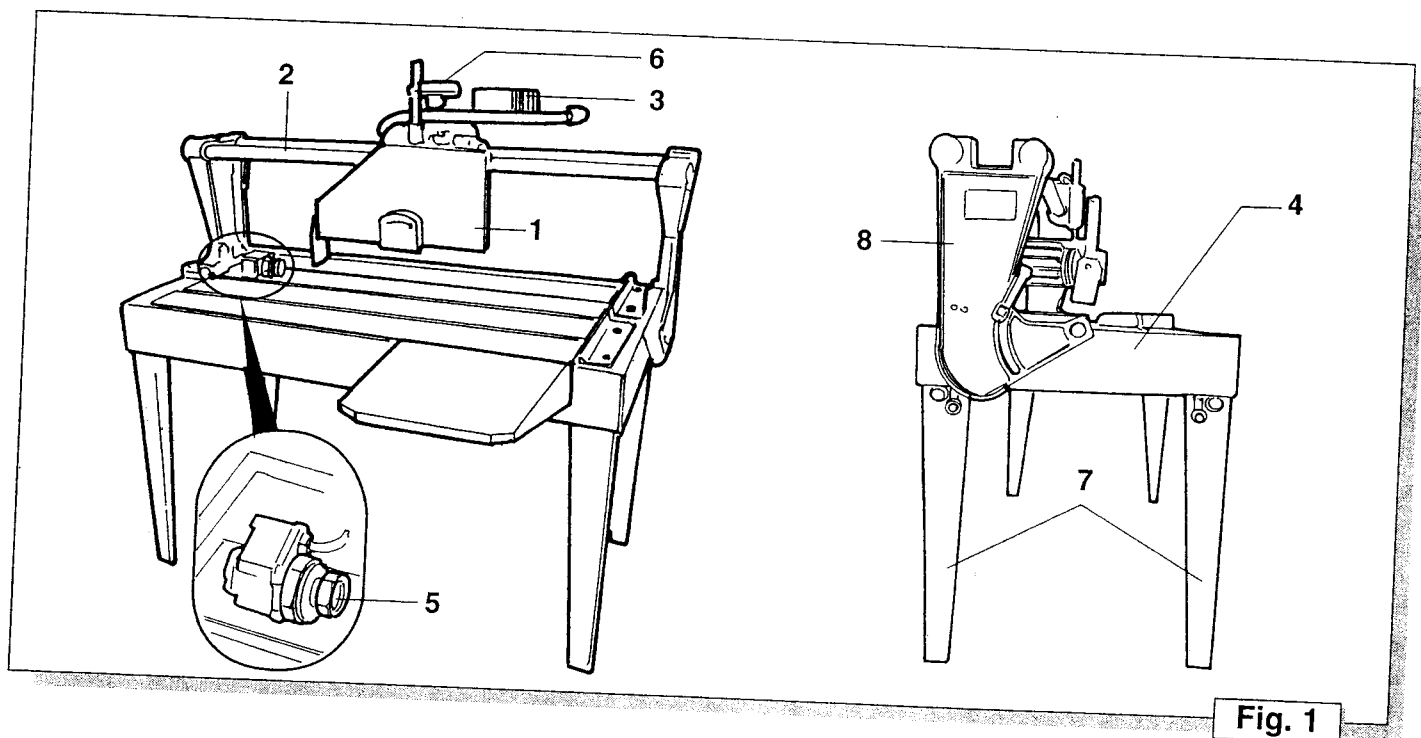
2.2 SECURITY WARNINGS ON THE MACHINE

The decals on the machine must always be kept clean and in a readable condition.

The safety warning decals are fixed on the blade guard as shown on page 7.

2.3 SAFETY SYSTEMS

- **Blade Guard:** a protection device that avoids accidental contacts with the blade. It is obligatory to have this device securely mounted before the machine is turned on.
- **Overload protection:** the overload protection stops the motor in case of overload. Wait a few minutes before turning the motor on again.
- **Control Switch:** easy access to the Start- Stop buttons. In case of interruption of electrical power, saw will remains OFF until Start button is again engaged. This prevents the saw from turning on accidentally when electrical power is restored.



2.4 STANDARD EQUIPMENT AND OPTION ACCESSORIES

Standard Equipment:

- Open End 30mm Wrench to change the blade
- Rip Fence
- Side Extension Table

Document equipment:

- Instruction manual

3.2 NOISE LEVEL

Noise produced from the machine on its own is less than 70dB (A).

General noise level could INCREASE when:

- multiple saws are in the surroundings
- saw is inside of a building
- materials are being cut; some material types produce more noise than others
- with use of improper acoustic safety devices.

Noise level could DECREASE by:

- reducing the speed rate of cut
- always using blades that are in good condition
- using silent core or Stealth™ Blades.

NOTE:

Acoustic pressure over 85 dB (A) could be dangerous for your hearing health, it is recommended to always use an approved hearing safety device while operating the saw.

3.0 TECHNICAL FEATURES

3.1 TECHNICAL DATA

MODEL	FRS 30	FRS 38	FRS 51
Power - HP	1.5	1.5	2
Supply voltage - Vac	115	115	230
Supply frequency - Hz	60	60	60
Phase	1	1	1
Full load amps - A	14.4	14.4	8.3
Blade motor - rpm	3400	3400	1700
Blade capacity - in. (mm)	10 (250)	10 (250)	14 (350)
Arbor size - in. (mm)	5/8 (15.9)	5/8 (15.9)	1 (25.4)
Length of Cut - in. (mm)	30 (750)	38 (950)	51 (130)
Depth of Cut at 90° - in. (mm)	2.6 (65)	2.6 (65)	4.1 (105)
Depth of Cut at 45° - in. (mm)	1.2 (30)	1.2 (30)	2.4 (60)
Cutting table	36.5 x 17.3	44.5 x 17.3	60 x 22.5
L x W - in. (mm)	(930 x 440)	(1130 x 440)	(1520x 570)
Side extension	12.1 x 11	12.1 x 11	15.7 x 13.8
L x W - in. (mm)	(310 x 280)	(310 x 280)	(400 x 350)
Saw dimension w/Leg & extension	48.4 x 30.7 x 47.2	56.3 x 30.7 x 47.2	66.9 x 39.4 x 50.8
L x W x H - in. (mm)	(1230x780x1200)	(1380x780x1200)	(1750x1000x1290)
Saw Weight uncrated - lb (kg)	145.5 (66)	154.3 (70)	317.2 (144)
Crated weight - lb (kg)	170 (77)	181 (82)	350.5 (159)

4.0 INSTALLATION

4.1 LIFTING SYSTEM AND TRANSPORT



Unpack the machine and check that no parts are missing or damaged. In case parts are damaged during shipping, immediately contact the carrier and manufacturer.

- Check that lifting device used is adequate to carry the weight of the machine. See chart in 3.1 Technical Data.
- Avoid lifting the machine over persons or things that could get seriously hurt or damaged in case of item falling.
- Before any lifting operations always announce it to those around.
- Before lifting the machine, always be sure that head is blocked in the center of the Guide Bars using the Limit Rings, I (Ref. 4.2, Fig. 4).

To reduce volume and make transport/lifting operations easier, dismantle all four legs.

The machine is packed inside a carton box.

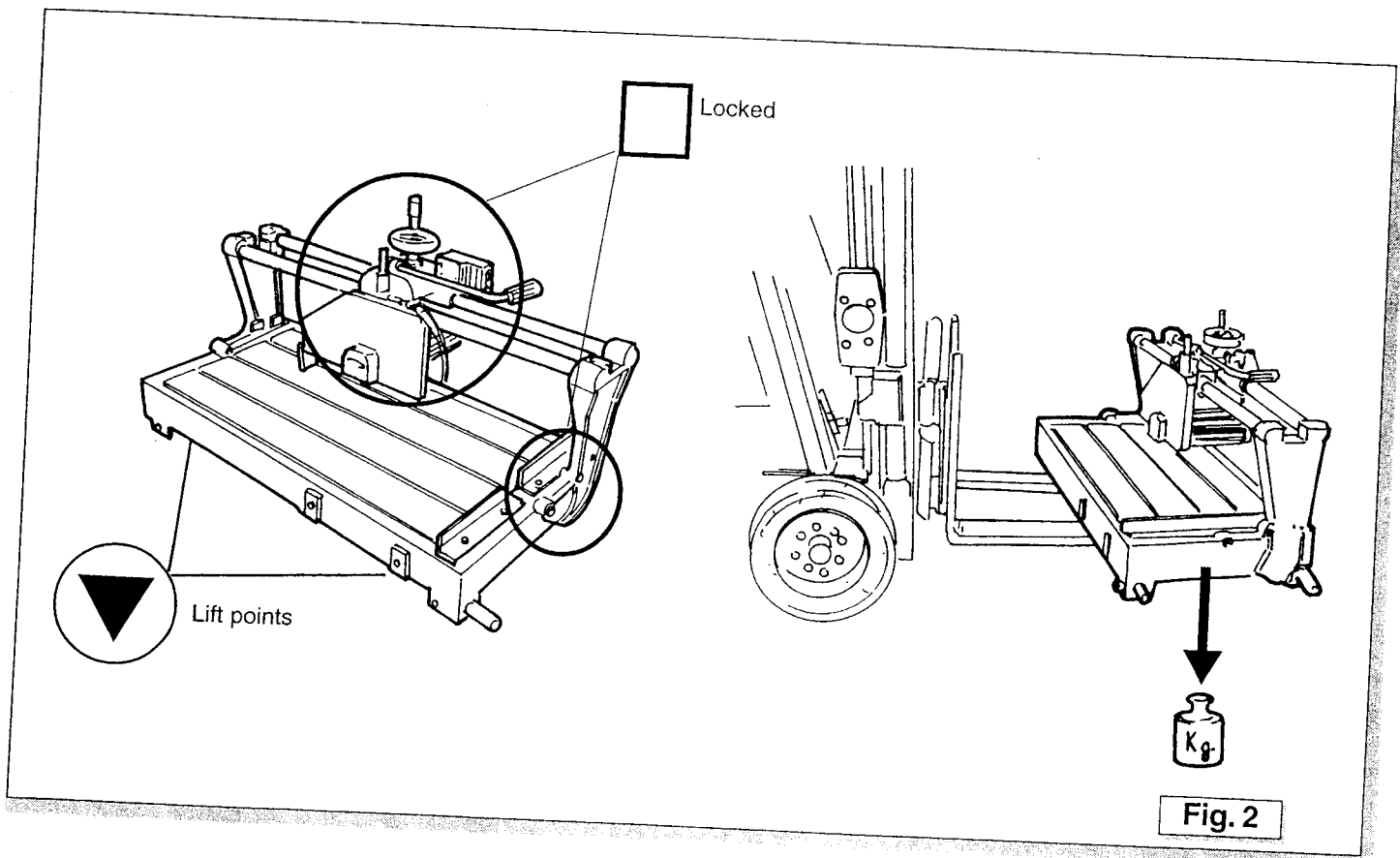
The machine is to be lifted by a forklift, placing it as shown on Fig. 2.

4.2 MOUNTING AND DISASSEMBLING



All mounting and disassembling operations must be done with machine "OFF" and unplugged.

- Proceed with mounting and disassembling operations very carefully wearing safety gloves and proper footwear.
- Before placing the machine on the floor, keep it on the forklift and screw on the legs with its proper key **A+B** (Fig. 3).
- Lower the arms of the forklift and set the machine carefully on the floor.
- Install the side table extension **C** (Fig. 3) and tighten the knobs **D** (Fig. 3).
- Mount the fence on side part **F+E** (Fig. 3) and hold it with proper Lever Knob **G** (Fig. 3).



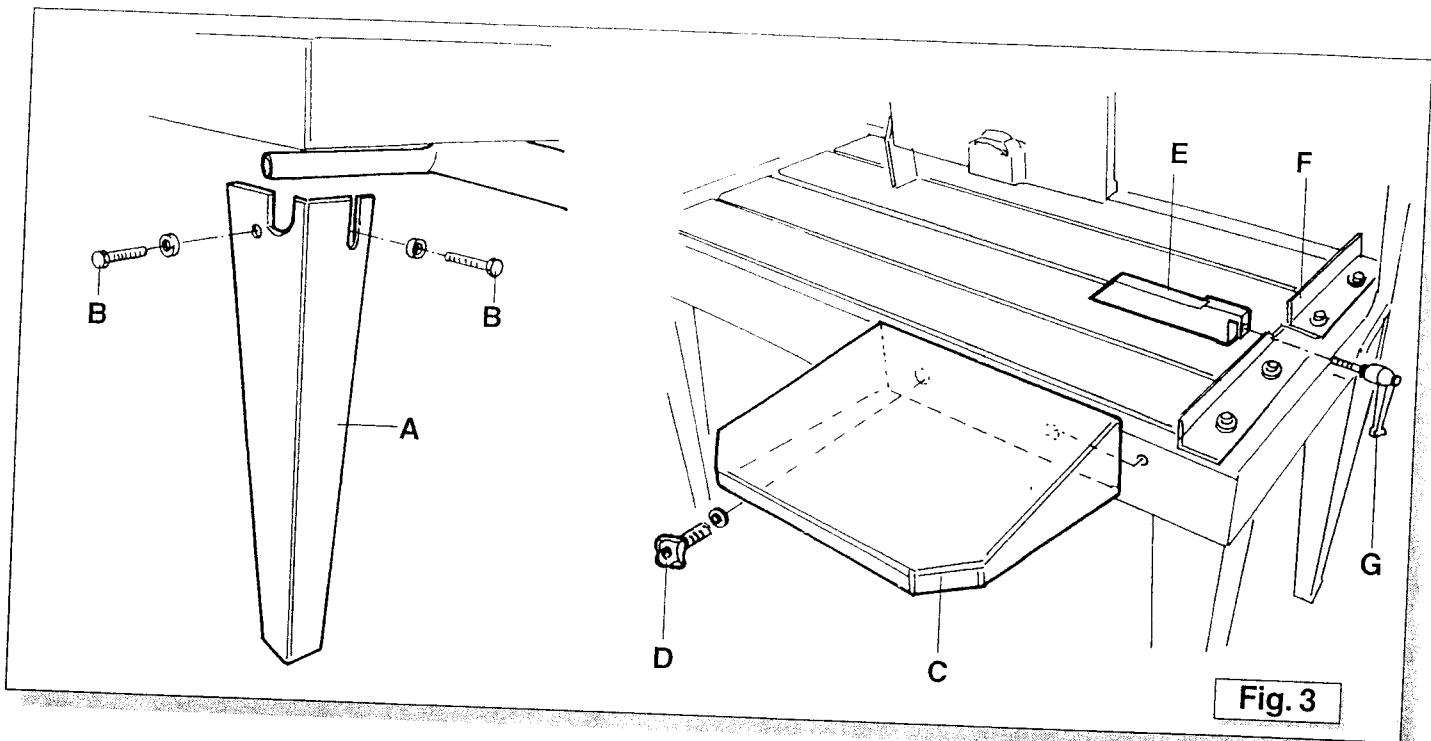


Fig. 3

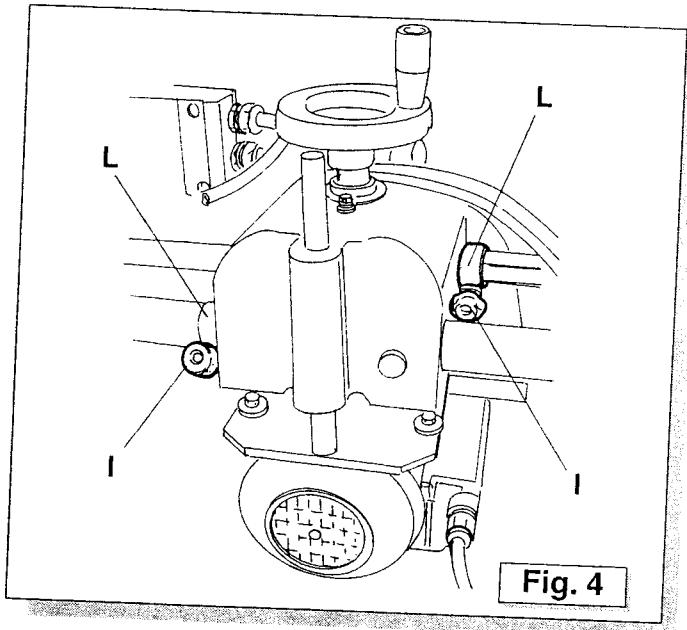


Fig. 4

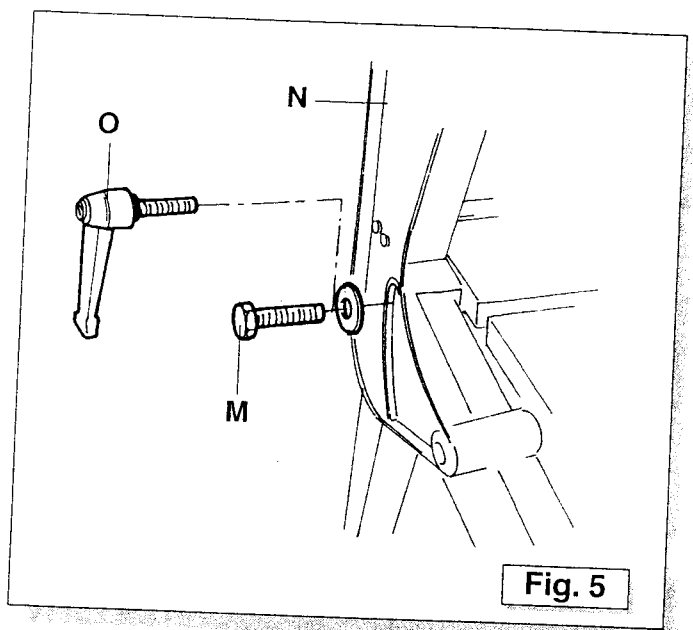


Fig. 5

- Unblock the head by loosening the knobs I (Fig. 4) and sliding the two limit rings L (Fig. 4) to the end of the Guide bars.
- Replace the screws M (Fig. 5) of the tilting bridge N (Fig. 5) with the M10 lever knobs O (Fig. 5) supplied loose with the machine.

4.3 ELECTRICAL CONNECTION



- **ONLY** a qualified electrician should connect the machine to the factory electric power supply per local electrical codes.
- All ground wires must be properly connected.
- Machine **MUST** be connected to electrical supply of the same power as the requirements indicated on motor ID plate or see 3.1 Technical Data.

The machine is equipped with a 3 meter long Power Cord and Plug.

In case the machine is placed inside a factory, install a properly sized magnetic circuit breaker and protect for the wiring as required by local codes.

When the the machine is used on temporary job sights, connect the machine to power source outlets with the plug installed on the machine respecting local safety regulations.

5.0 STARTING UP

5.1 MOVING – PLACING THE MACHINE



- Before moving the machine, disconnect it from the electrical power supply.
- Always use caution when moving the machine to prevent damage or personal injury.

Before moving the machine manually:

- Slide the head to the center of Guide Bars, so the weight is balanced
- Secure the head by tightening the knobs of the 2 limit rings
- Make sure that lever knobs locking the tilting bridge of the machine are tight.
- Empty the water tank.
- Pull out the lift handles **A** (Fig. 6) from under the table and carefully lift to a minimum height to move the machine.

Two or four men can move the machine (Fig. 6) (depending on the weight).

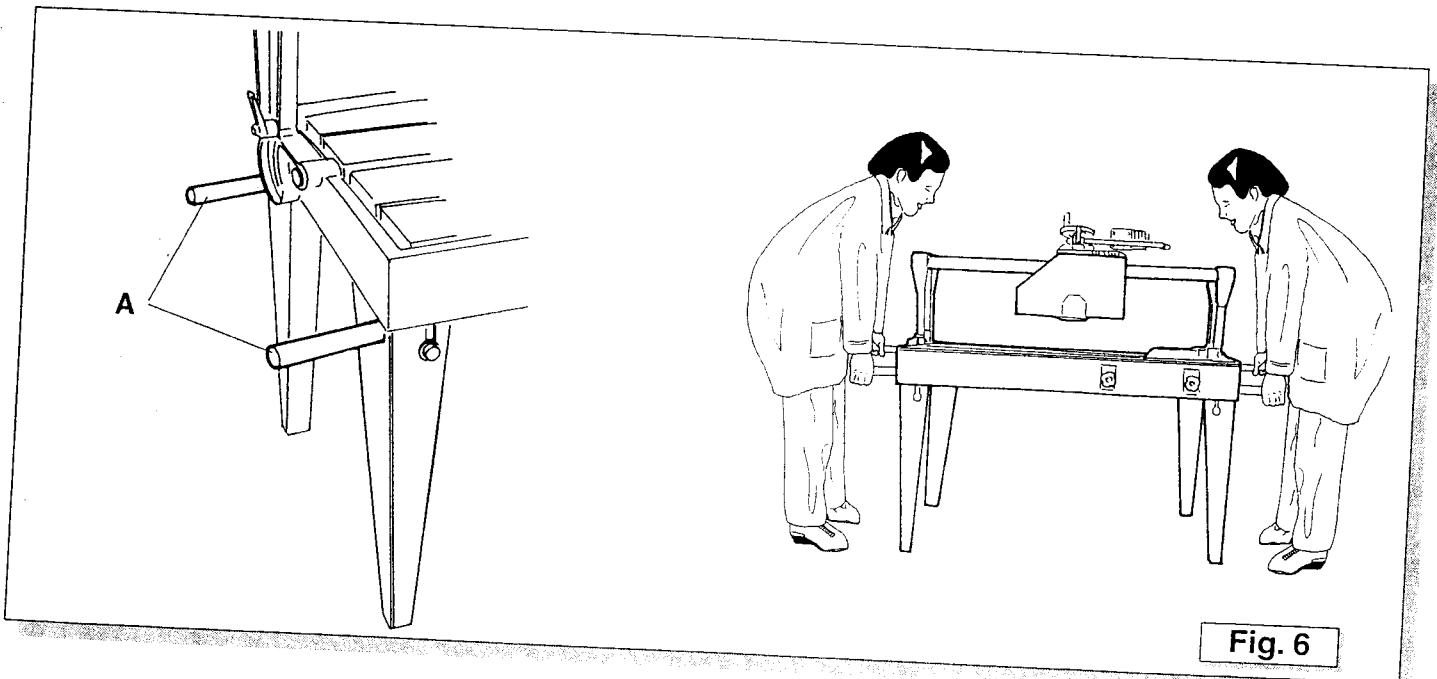


Fig. 6

5.2 INSTALLATION OF THE BLADE OR PROFILE WHEEL- USED ONLY ON FRS 51



- **ALWAYS** turn off the machine and disconnect the power source before installing or replacing the blade.
- **ONLY** use correct size tools for installing Blade.
- **ONLY** use good quality diamond blades according to machines features and for the material to be cut.
- Always use the required blade diameter because it affects the maximum cutting depth and the useful cutting length.
- Be sure the diamond blade is correctly balanced and tensioned and is properly tightened on arbor.
- Avoid cutting pieces of material that are too big, too small, or difficult to set properly on working table.

- The blade life depends on its daily use, type and thickness of piece to cut and proper water flow to keep it cool.
- The blade should be replaced whenever the cutting quality is not optimal because it could be worn out or deformed. Operating with a worn out or defective blade could be dangerous.
- Replace the blade or install the profile wheel by standing in front of the machine as follows.

1. Tilt the blade 45° and loosen the 2 screws **A** (Fig. 7) behind the blade guard with a 10mm wrench and remove the guard **B** (Fig. 7).

2. Hold the motor spindle **C** (Fig. 7) and unscrew the blade shaft nut (CW) clockwise using the 30mm wrench **D** (Fig. 7) supplied (only on FRS 51). For the FS-30 & 38, hold the motor shaft from turning with a 6mm hex key inserted into the back side of the motor and loosen the nut (CW) with a 19mm wrench.

3. Once the blade is removed, check the outer flange **E** (Fig. 7) and inner flange interior surfaces, and if needed, replace or clean them to remove any debris that might prevent the blade from properly seating inside the flanges.

Note: When using the thick-cored profile wheel on the FRS 51, do not use the outer flange **E** (Fig. 7).

4. Mount the new blade in the direction of the rotation arrow marked on the blade **F** (Fig. 7). It must be the same direction as the arrow on the blade guard. (clockwise from the front).

5. After installing the new blade or profile wheel, be sure to securely tighten the nut counter-clockwise with the correct wrench while holding the motor spindle.

6. **Before using the machine be sure the blade guard is securely in place.** Re-install the blade guard **B** (Fig. 7) and securely tighten the 2 screws **A** (Fig. 7) using an M10 wrench.

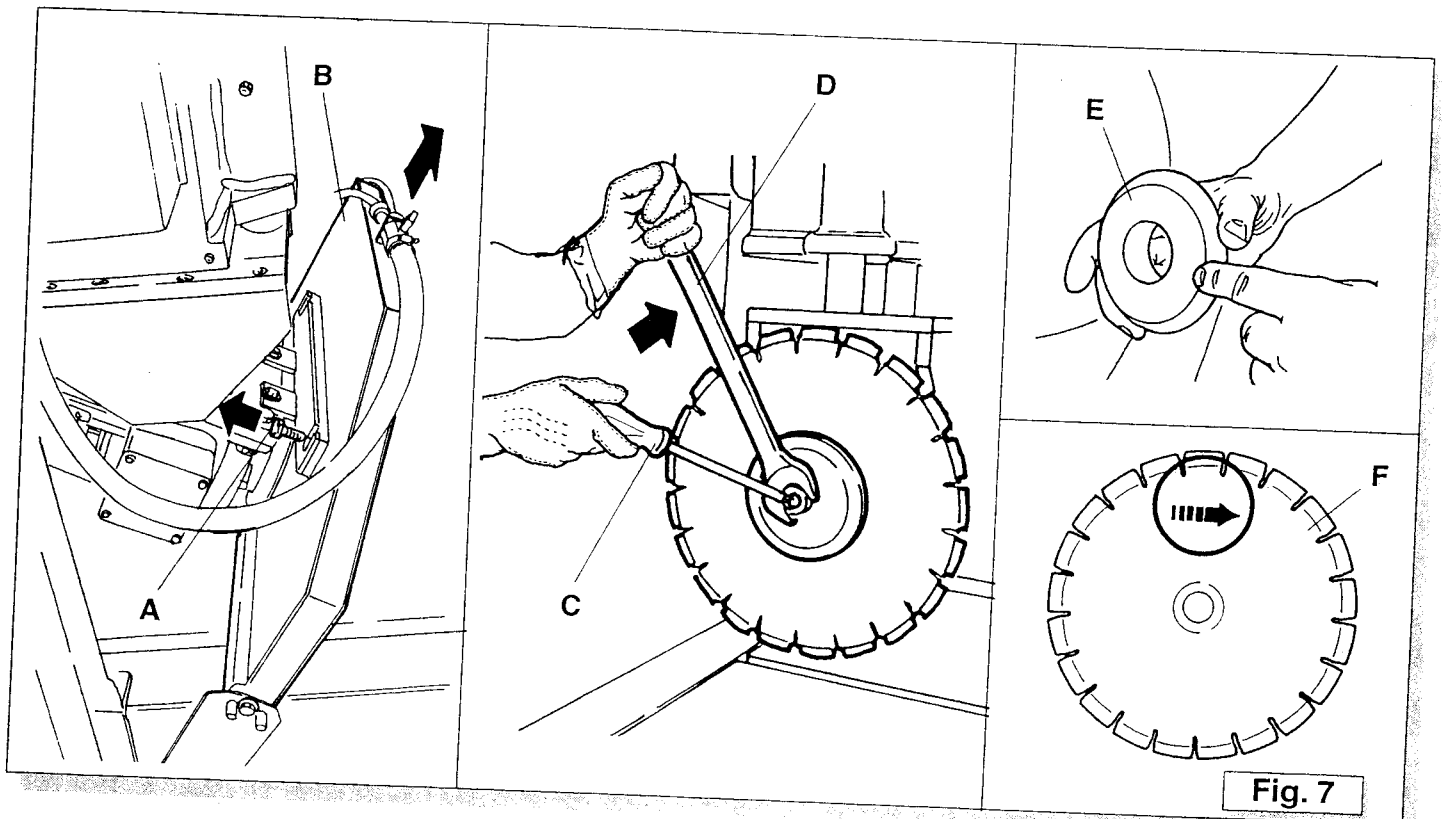


Fig. 7

5.3 START / STOP OPERATIONS

Your machine is equipped with an electrical control box, complete with a magnetic ON-OFF switch, composed of 2 buttons with the following functions (Fig. 8):

- (A) RED button: STOP
- (B) GREEN button: START

NOTE:

If the electrical power is interrupted, the machine will remain "OFF" when power is restored until operator again pushes the START button.

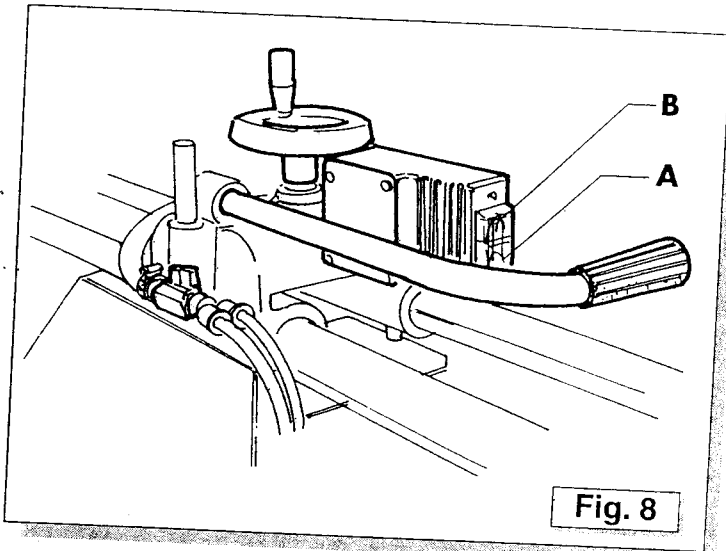


Fig. 8

5.4 HOW TO USE THE MACHINE



- Before starting the machine, be sure that blade and blade guard are securely tightened.
- Set the machine where nothing dangerous is around it that can interfere with cutting operations.

- Connect the machine to a properly protected and grounded power outlet.
- Before starting the machine, install the drain plug into the hole located in the bottom of the water tank. Fill the tank with clean water until it fully covers the water pump. Also flush tank and hoses with clean water to remove debris after cutting each day.
- Place the material to cut against the fence and in line with cutting plane of the blade.
- Lower/raise the handwheel C (Fig. 9) to adjust cutting height (FRS-51 only).

- Never place hands along cutting line of blade operation.
- To turn on the blade motor and water pump, push the "green" start button D (Fig. 9). Both the blade motor and water pump will start.
- Before starting the cutting operations, check for adequate water flow to the blade. Make adjustment to flow valve E (Fig. 9) as needed.

The pump **MUST ALWAYS** work with sufficient water in the tank (Pump should be fully submerged.) Water is used to cool the pump and the cutting blade. Without water, both could fail and be permanently damaged.

- Pull handle F (Fig. 9) carefully to advance the cutting blade to and through the material.

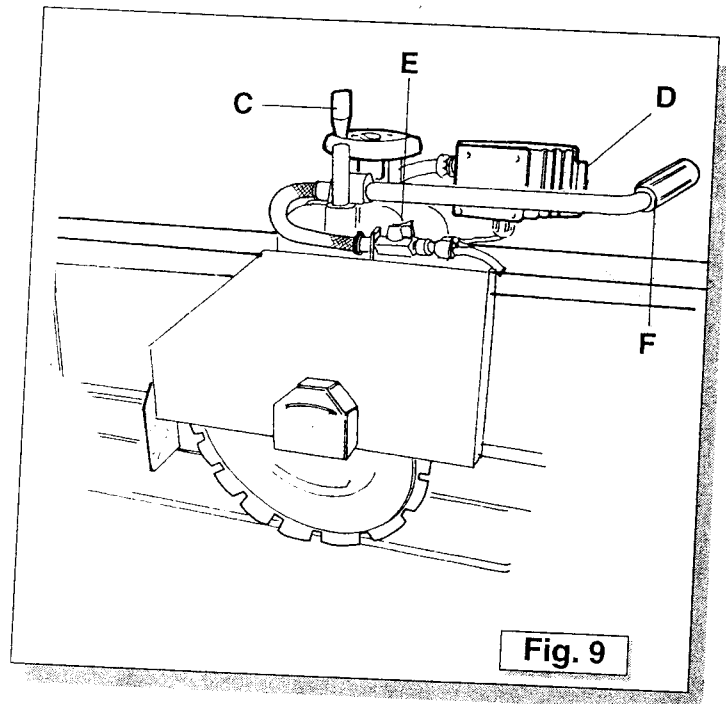


Fig. 9

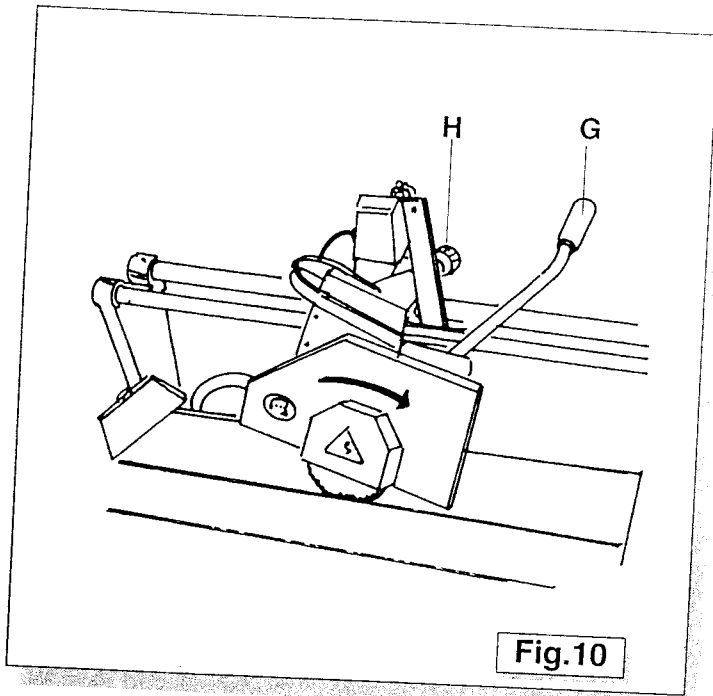


Fig.10

- On Models FRS-30 and FRS-38 you must pull the handle **G** (Fig. 10) downwards to set depth of cut and lock in position by tightening Knob **H** (Fig. 10).
- Carefully pull handle **F** (Fig. 10) & **G** (Fig. 10) to advance the cutting blade through the material.
- Make the cuts from left to right with the material with the material up against the backstop on the far right of the table.
- To tilt the head **J** (Fig.11) 0°- 45°, loosen the two side lever handles **K** (Fig. 11). Adjust to the angle needed and tighten the lever handles again.

NOTE:
To accurately set 0° tilt, adjust the micrometric screws **L** (Fig. 11).

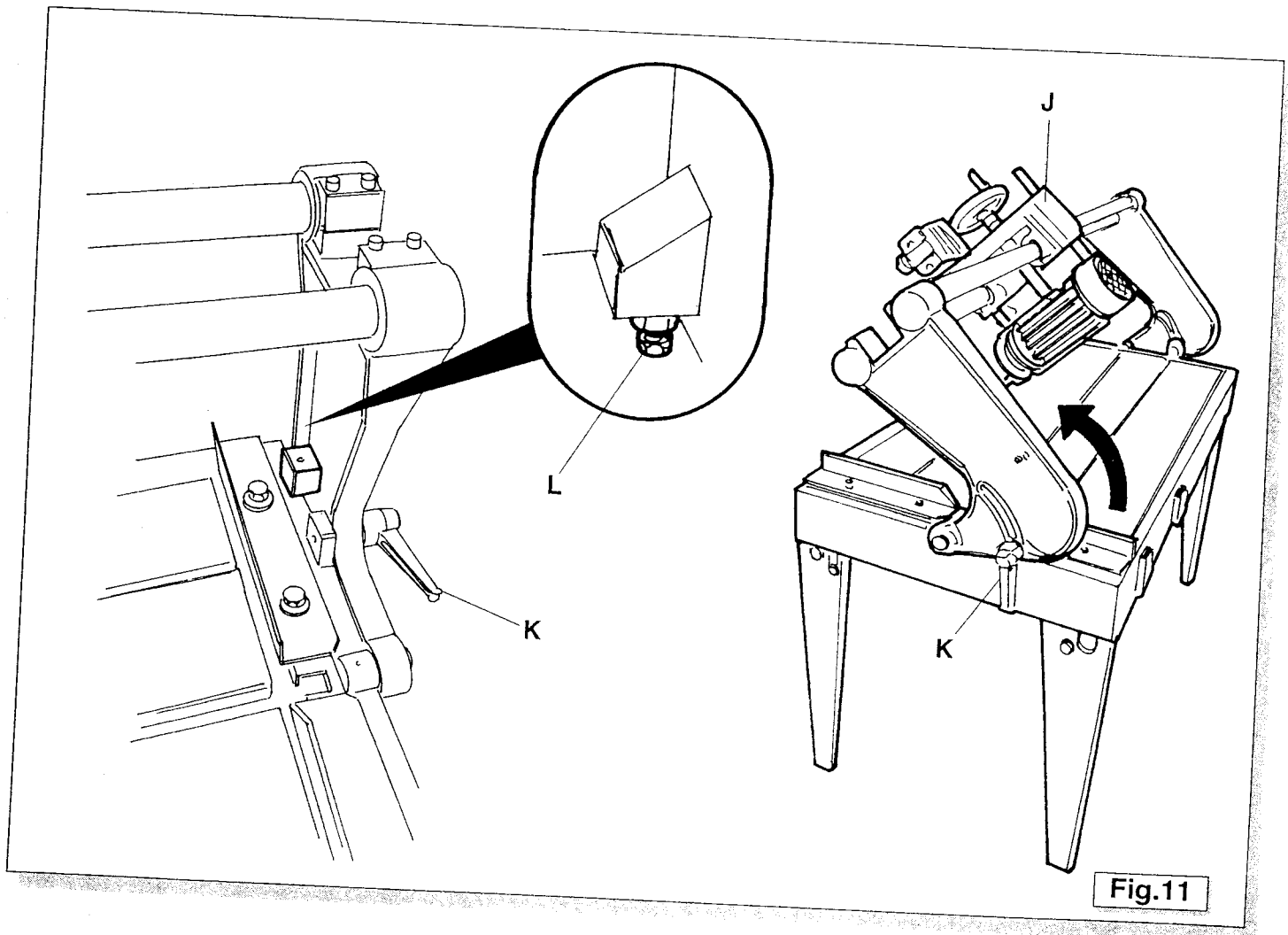


Fig.11

6.0 MAINTENANCE

6.1 ADVICE AND MAINTENANCE WARNINGS



- Before any service on the machine **ALWAYS** disconnect it from the electrical source.
- Never use flammable products to clean the machine.
- All services not described in this manual must be effected **ONLY** by qualified personnel.
- **ALWAYS** use proper safety equipment.

6.2 TYPICAL MAINTENANCE

DAILY:

- To keep the machine in good conditions clean following:
 - floor surrounding,
 - machines' components,
 - water tank,
 - water pump **E** (Fig. 12) inlet.
- Grease sliding guides at grease fittings **A** (Fig. 12) using a manual grease gun **B** (Fig. 12)
Recommended Grease: General purpose #2 Lithium based grease without molybdenum disulfide.

EVERY 2 WEEKS:

- Put grease on the vertical screw **C** (Fig. 12) using a small brush **D** (Fig. 12)
Recommended Grease: General purpose #2 Lithium based grease without molybdenum disulfide.

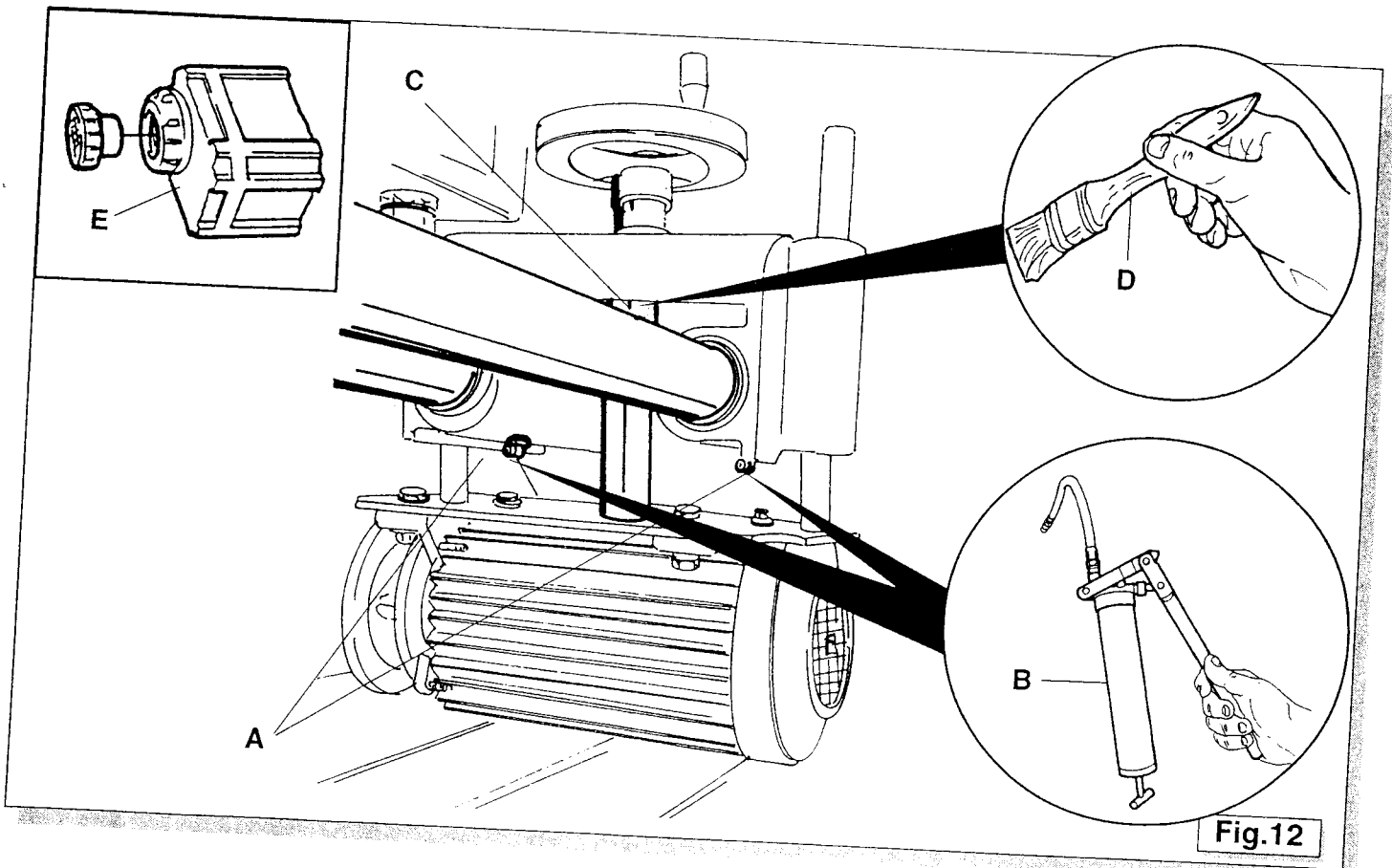


Fig.12

7.0 TROUBLE-SHOOTING

7.1 PROBLEMS, CAUSES AND SOLUTIONS

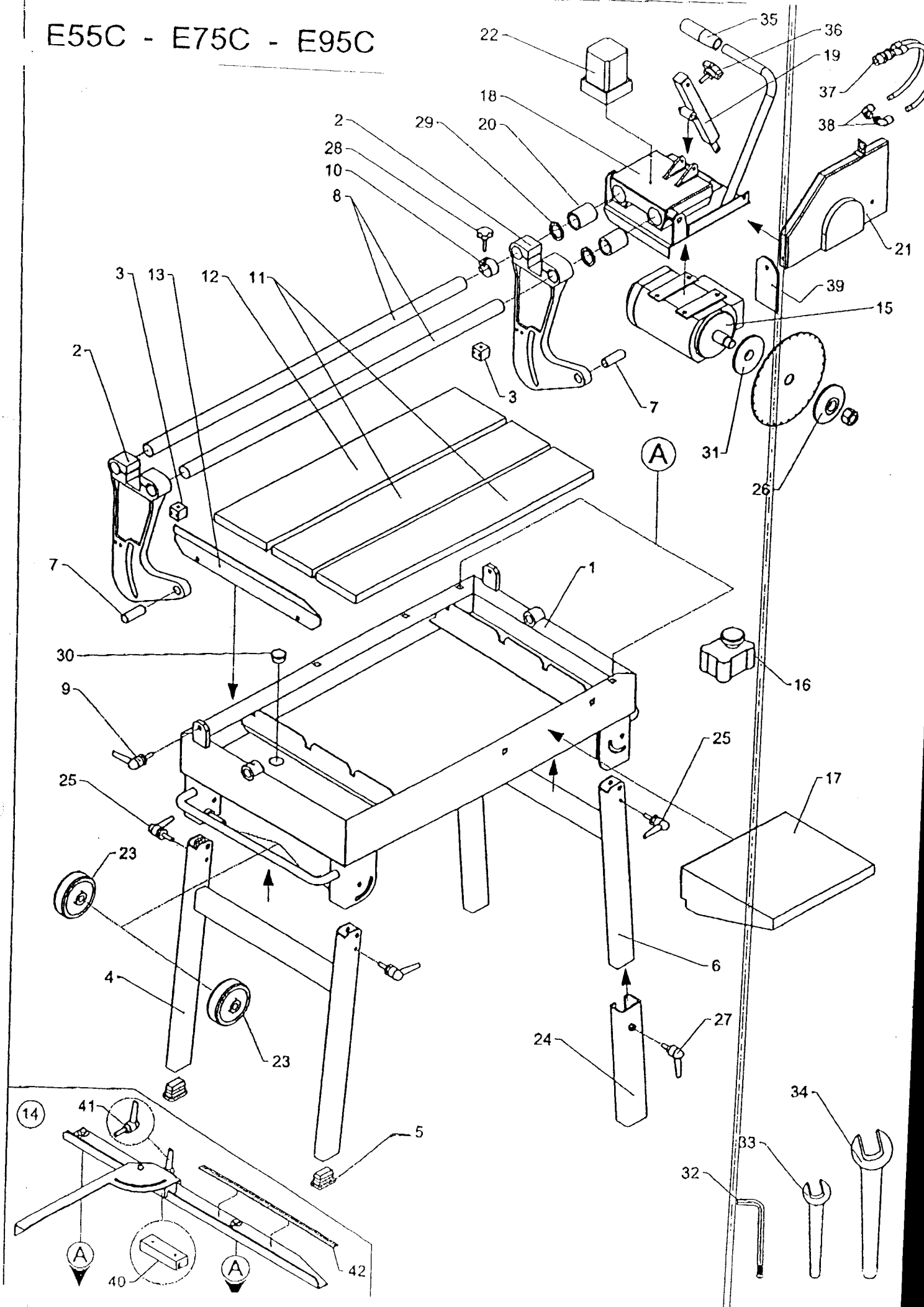
PROBLEMS	CAUSES	SOLUTIONS
After pushing the START button, the machine remains off.	<p>A) No electricity.</p> <p>B) Electric wire or switch damaged</p> <p>C) Fuses on electric line are burnt</p> <p>D) Machine not connected to correct voltage required.</p>	<p>A) Check: electrical connections, circuit protection device, magnetic switch inside control box.</p> <p>B) Repair or replace by qualified electrician</p> <p>C) Check fuses inside electric box</p> <p>D) Require assistance.</p>
The saw motor doesn't rotate.	<p>A) Wrong voltage</p> <p>B) Bad Motor capacitor.</p>	<p>A) Check electrical connection.</p> <p>B) Replace by qualified electrician.</p>
The saw motor loses power or stalls while cutting.	<p>A) Cutting feed rate is too fast</p> <p>B) Blade is dull or worn out.</p> <p>C) Voltage is too low.</p>	<p>A) Reduce cutting speed.</p> <p>B) Open blade to expose diamonds or replace blade.</p> <p>C) Extension cord may be too long. Or have electric power checked by qualified electrician.</p>
The blade motor works but insufficient or no water flows over the blade.	<p>A) Water hoses and connections are dirty.</p> <p>B) Water hose has kink.</p> <p>C) Insufficient water level for the pump.</p> <p>D) Filter of water pump is dirty</p>	<p>A) Flush hoses and connection parts with clear water to clean</p> <p>B) Straighten or replace hose.</p> <p>C) Add water to correct level.</p> <p>D) Clean filter of water pump</p>
Material cut is chipped when finished cutting.	<p>A) Diamond blade out of tension, bent or using incorrect blade for the material.</p> <p>B) Feed rate too fast at end of cut.</p> <p>C) Blade not fully penetrating through the material.</p>	<p>A) Replace with new, correct blade</p> <p>B) Slow the feed rate near end of cut.</p> <p>C) Increase depth of cut. Blade should extend about 1/4" beneath table surface.</p>

DIMAS

TS 095RE

REF:	QTY	DESCRIPTION	CODE
1	1	Frame - E-55	Emm- D0500134B
1	1	Frame - E-75	Emm- D0500135B
1	1	Frame - E-95	Emm- D0500136B
2	2	Shoulders E55,75, 95	Emm- D0650003B
3	2	Beat - Beating Shoulder	Emm- D0600008
4	1	Front Feet	Emm- D0450015
5	4	Plug, Foot	Emm- C5620002
6	1	Back Feet	Emm- D0450014
7	1	Shoudler Rotation Pivot Pins	Emm- D0200012
8	2	Crome Travel Bar D=30 E55C	Emm- D0150038
8	2	Crome Travel Bar D=30 E75C	Emm- D0150039
8	2	Crome Travel Bar D=30 E95C	Emm- D0150040
9	2	Quick Release Lever	Emm- C3700004
10	2	Slide Stop Collar	Emm- C3800001
11	2	Front Tray (Table) E=55	Emm- D0550003
11	2	Front Tray (Table) E=75	Emm- D0550007
11	2	Front Tray (Table) E=95	Emm- D0550008
12	1	Back Tray (Table) E=55	Emm- D0550002
12	1	Back Tray (Table) E=75	Emm- D0550005
12	1	Back Tray (Table) E=C2595	Emm- D0550006
13	1	Conveyor Rear	Emm- D1600001
14	1	Kit Complete (Square Kit)	Emm- G6600007
15	1	Motor KW1-1	Emm- C3900063
16	1	Water Pump	Emm- C5300009
17	1	Extra, Additional Tray (Table)	Emm- D0550004
18	1	Bogie Group	Emm- G6200006B
19	1	Raise + Lower Group	Emm- G6200005
20	4	Bearings	Emm- C3550003
21	1	Blade Guard	Emm- D0400005B
22	1	Switch	Emm- TRIPUS
23	2	Transport Wheels	Emm- C3420100
24	1	Adjustable Feet	Emm- D0450016
25	4	Lever (Fixed)	Emm- C3700013
26	2	External Motor Flange	Emm- C3900109
27	1	Lever (Fixed)	Emm- C3700014
28	2	Knob (For Item 10 Slide Stop Collar)	Emm- C3650002
29	4	(Bearing Seals)!!	Emm- C3760002
30	1	Plug, Stopper	Emm- C3850001
31	1	Inner Motor Flange	Emm- C3900108
32	1	Key (Allen)	Emm- C4390014
33	1	Key (Spanner)	Emm- C4390026
34	1	Key (Spanner)	Emm- C4390024
35	1	Push Fit Handle	Emm- C3700010
36	1	Knob	Emm- C3650010
37	1	Water Fitting & Hoses	Emm- G7100001
38	2	Jets (Water)	Emm- C5650003
39	1	Splash Black Rubber	Emm- D2000040
40	1	Block	Emm- D1850061
41	1	Lever	Emm- C3700006
42	1	Tape Measure (mm)	Emm- D1300005

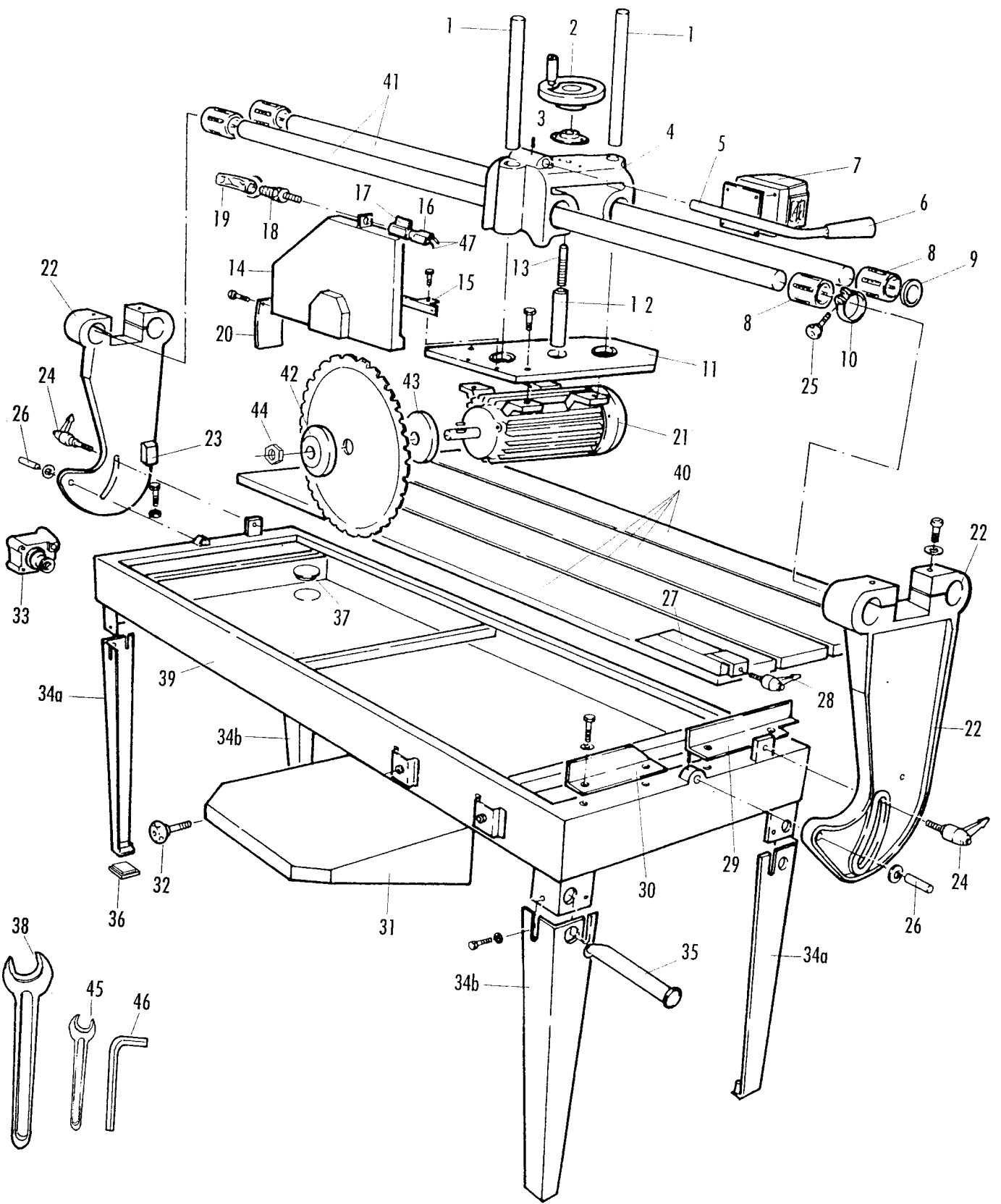
E55C - E75C - E95C



DIMAS TS 130RE

REF:	QTY	DESCRIPTION	CODE
1	2	Raise Lower Guide	
2	1	Handwheel	EMM-D0150033
3	1	Flange	EMM-D1100005
4	1	Head	EMM-C3410001
5	1	Arm	EMM-D0700005
6	1	Knob	EMM-D1100004
7	1	Switch	EMM-C3700010
8	4	Bearing - Set (4)	EMM-TRIPUS
9	4	Seal - Set (4)	EMM-C3550004
10	2	Limit Clamp	EMM-C3760003
11	1	Motor Support	EMM-C3800006
12	1	Threaded Housing	EMM-D0800007
13	1	Threaded Bar	EMM-D0900009
14	1	Blade Guard	EMM-D0900008
15	1	Blade Guard Bracket	EMM-D0400006
16	1	Water Flow Divider	EMM-D0300019
17	1	Water Tap	EMM-C5650019
18	1	Threaded Nozzle	EMM-C5400001
19	1	Hose	EMM-C5670001
20	1	Flap	EMM-C5870001
21	1	Electric Motor	EMM-D2000040
22	2	Shoulder	EMM-MOTOR
23	1	Shoulder Limiter	EMM-D0650006
24	2	Quick ReleaseLever	EMM-D0600035
25	2	Limit Clamp Locking Screw	EMM-C3700001
26	2	Pivot	EMM-C3650002
27	1	Mitre Guide	EMM-D0200028
28	1	Locking Lever	EMM-D0600009
29	1	Fence	EMM-C3700003
30	1	Fence	EMM-D0600034
31	1	Table Extension	EMM-D0600033
32	2	Locking Screw	EMM-D1200008
33	1	Water Pump	EMM-C3650010
34a	2	Legs (2)	EMM-PUMP
34b	2	Legs (2)	EMM-D0450007L
35	4	Lift Handle	EMM-D0450007R
36	4	Foot Plug	EMM-D1100003
37	1	Tank Plug	EMM-C5670010
38	1	Spanner	EMM-C3850001
39	1	Water Tank	EMM-C4390010
40	4	Table	EMM-D0500020
41	2	Travel Bar	EMM-D0550027
42	1	Outer Blade flange	EMM-C3900107
43	1	Inner Blade Flange	EMM-C3900106
44	1	Blade Nut	EMM-C3900110
45	1	Spanner	EMM-C4390026
46	1	Allan Key	EMM-C4390026
47	2	Water Pipe	EMM-C4390027
			EMM-C5860001

DIAGRAM for FRS 130



DICHIARAZIONE DI CONFORMITÀ

La sottoscritta **EMMEDUE S.r.l.**
Via Fondo AUSA, 23
47891 Dogana
Repubblica di San Marino

Dichiara sotto la sua esclusiva responsabilità che il prodotto:
MACCHINA *TAGLIERINA*

Mod. *FRS 38*

Matricola N. *0201009*

È conforme alle seguenti Direttive Comunitarie e Norme armonizzate:

- 73/23/CEE (Direttiva Bassa Tensione)
- 89/336/CEE (Direttiva EMC – compatibilità elettromagnetica)
- 98/37/CE (Direttiva Macchine)
- EN 60204 – 1
- EN 292 – 1
- EN 292 – 2
- EN 60439 – 1.

che ha piena autorità legale per rappresentare la società nell'ambito comunitario.

Data:

EMMEDUE S.r.l.

L'Amministratore Unico
Gian Paolo Montanari

