

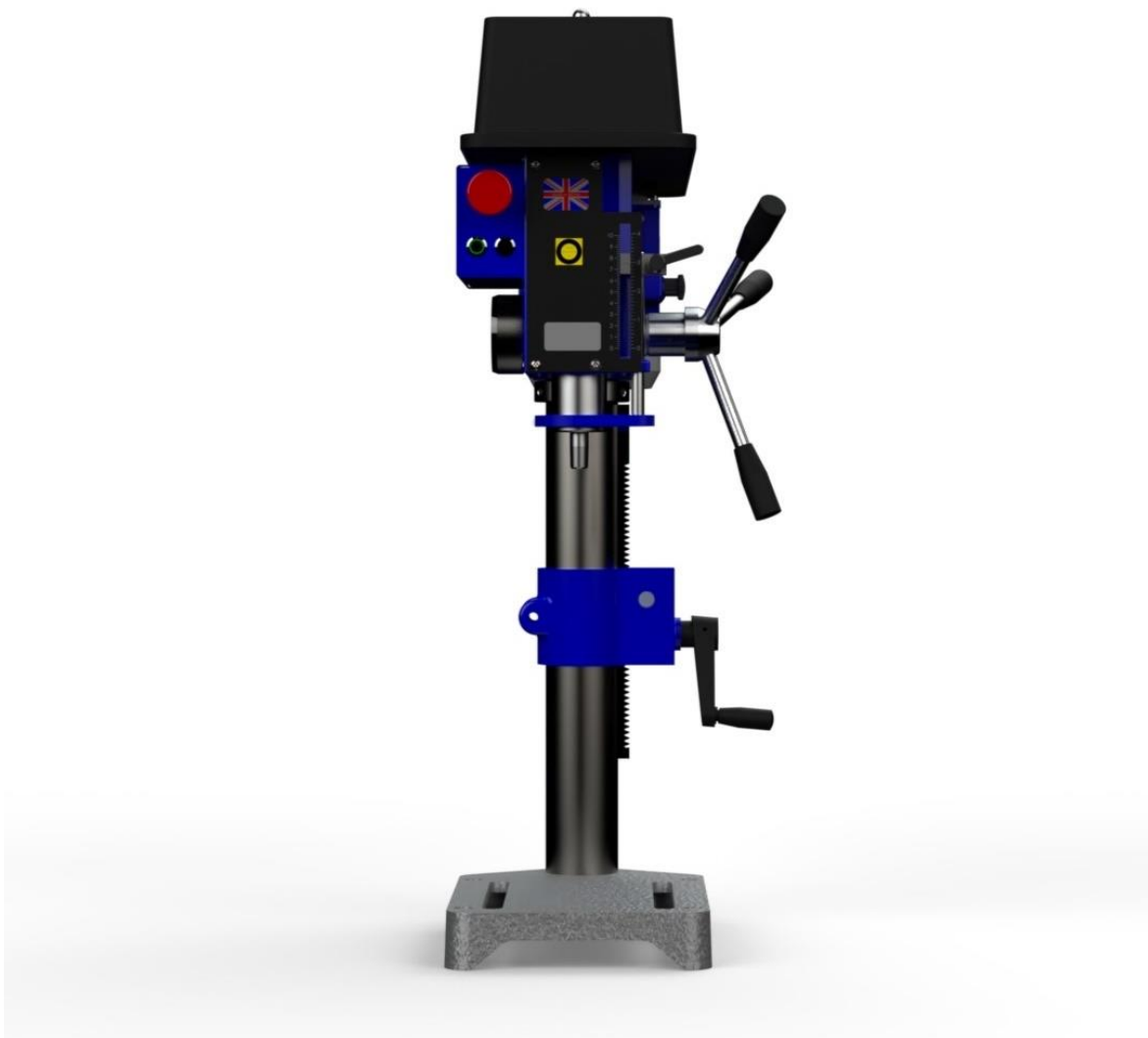
Compact Mk2 Manual (Iss. 02)

Compact Mk2 13mm Bench Drill

Compact Mk2 13mm Floor Drill

Compact Mk2 16mm Bench Drill

Compact Mk2 16mm Floor Drill



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SAFETY INSTRUCTIONS

Safety Symbols

The following symbols are used throughout this manual and on the products.



Read the Manual before use.



Eye protection must be worn.



Ear protection must be worn.



General hazard



Electrical hazard

ELECTRICAL SAFETY



IMPORTANT: Read these electrical safety instructions before connecting the drill to the mains supply.

This drill is designed to operate on a 230VAC 50Hz supply and connecting it to any other power source may cause damage.

1. The drill is fitted with a non-rewirable Type G plug, fitted with a 5A fuse. The fuse must not be changed for one with a different rating.
2. If the plug has to be changed because it is not suitable for your socket, or due to damage, it should be cut off and a replacement fitted, following the wiring instructions shown below. The old plug must be disposed of safely, as insertion into a mains socket could cause an electrical hazard.



WARNING! THE WIRES IN THE POWER CABLE OF THIS PRODUCT ARE COLOURED IN ACCORDANCE WITH THE FOLLOWING CODE:

BLUE = NEUTRAL

BROWN = LIVE

YELLOW & GREEN = EARTH

3. It is recommended that the drill connected to the mains supply via a Residual Current Device (RCD).
4. Inspect the cable and plug before use to ensure that neither are damaged, and repair if necessary.
5. Never remove the side cover unless the drill is disconnected from the power supply, and never use the drill with the side cover removed.
6. If in any doubt, consult a qualified electrician. **DO NOT** attempt any repairs yourself.

GENERAL SAFETY INSTRUCTIONS



IMPORTANT: Read the following instructions carefully. Failure to do so could lead to serious personal injury and / or damage to the drill.

This drill is designed for, and is only suitable for, the conventional drilling of wood, metal, and plastics. The drill must *not* be modified or used for any application other than that for which it was designed.



1. Always keep the drill and the work area clean & tidy, and ensure that the workplace is well lit. Ensure that lighting is placed so that you will not be working in your own shadow.
2. Ensure that you are comfortable before starting work. Never over-reach. Keep proper footing and balance at all times.
3. Never operate drill when under the influence of alcohol, drugs, or medication.
4. Do not use the drill if you are tired or distracted.
5. Wear appropriate safety goggles or glasses, ear defenders, and non-slip safety footwear at all times.
6. Do not wear loose clothing, neckties, rings, bracelets, or other jewellery, which may get caught in moving parts. Wear a protective hair covering to contain long hair. Roll up long sleeves to above the elbow.
7. Never store or use the drill in a wet/damp environment or expose to rain.
8. Keep children and untrained personnel away from the work area.
9. Always turn the drill off when not in use.
10. Do not use the drill within the designated safety areas of flammable liquid stores or in areas where there may be volatile gases.

GENERAL SAFETY INSTRUCTIONS FOR DRILLING MACHINES

1. Do not operate this drill unless you are thoroughly familiar with drilling machines and drilling techniques. If there is any doubt whatsoever you should consult a qualified person.
2. Do not operate the drill without a preliminary inspection to determine that it will operate correctly and perform its intended function. Check for alignment of moving parts, free running of moving parts, breakage of parts, and any other conditions that may affect its operation. Do not use until any issues have been corrected.
3. Ensure that the drill is secured to the surface on which it is placed.
4. Ensure that all guarding and covers are in place, undamaged, and working correctly. The drill must not be used until any issues have been corrected.
5. Ensure that all switches are undamaged and working correctly. The drill must not be used until any issues have been corrected.
6. Ensure that the drill speed is correct for the operation and that the drive belt cover is fitted and secured.
7. Ensure that the drill bit is the correct size and type for the operation, is clean and sharp, and is correctly fitted and tightened in the chuck.
8. Remove any tools (chuck key, spanners etc), that may have been used in setting up operations and put them away.
9. Ensure that workpieces are secured to prevent them from turning when drilling. Do not hold by hand.
10. Ensure that the drill head, and table where applicable, are securely locked off before use.
11. Keep your hands away from the rotating parts of the drill and do not attempt to remove swarf before the drill has stopped rotating.

SPECIFICATIONS

Model	Compact Mk2 13mm Bench
Power	250W 50Hz (230V 1ph)
Drive type	Belt
Spindle Speed Range	500-4000 rpm
Chuck Type	Jacobs Keyed (6JT taper)
Chuck Size	1-13 mm
Chuck Travel	100mm
Diameter of Column	69.8mm
Max Chuck to Table	N/A
Max Chuck to Base	250mm
Table Size	N/A
Base Size	400 x 230mm
Overall L x W x H	630 x 380 x 730mm
Weight	54.5kg

Model	Compact Mk2 13mm Floor
Power	250W 50Hz (230V 1ph)
Drive type	Belt
Spindle Speed Range	500-4000 rpm
Chuck Type	Jacobs Keyed (6JT taper)
Chuck Size	1-13 mm
Chuck Travel	100mm
Diameter of Column	69.8mm
Max Chuck to Table	390mm
Max Chuck to Base	1100mm
Table Size	400 x 230mm
Base Size	400 x 230mm
Overall L x W x H	630 x 380 x 1580mm
Weight	70kg

Model	Compact Mk2 16mm Bench
Power	370W 50Hz (230V 1ph)
Drive type	Belt
Spindle Speed Range	500-4000 rpm
Chuck Type	Jacobs Keyed (2MT taper)
Chuck Size	1-13 mm
Chuck Travel	100mm
Diameter of Column	69.8mm
Max Chuck to Table	N/A
Max Chuck to Base	235mm
Table Size	N/A
Base Size	400 x 230mm
Overall L x W x H	630 x 380 x 730mm
Weight	55.5kg

Model	Compact Mk2 16mm Floor
Power	370W 50Hz (230V 1ph)
Drive type	Belt
Spindle Speed Range	500-4000 rpm
Chuck Type	Jacobs Keyed (2MT taper)
Chuck Size	1-13 mm
Chuck Travel	100mm
Diameter of Column	69.8mm
Max Chuck to Table	375mm
Max Chuck to Base	1085mm
Table Size	400 x 230mm
Base Size	400 x 230mm
Overall L x W x H	630 x 380 x 1580mm
Weight	71kg

INSTALLATION

1. The drill must have all packaging removed, and checked for damage and completeness.
2. The drill must be secured to a flat, level surface that is capable of supporting the weight of the drill. Do not excessively tighten the securing fasteners in order to avoid causing stress to the base of the drill.
3. It should be noted that the drill has a high centre of gravity and so will require mechanical handling techniques appropriate to the weight and size of the product.
4. The column, table (where applicable), and base are coated in a corrosion resistant compound. This must be removed before use, using a petroleum solvent or alkaline process cleaner.
5. Connect the drill to a mains power supply – see Electrical Safety section.

OPERATION

SETTING THE HEAD HEIGHT (BENCH MODELS ONLY)

1. The head is locked into position using a locking bolt on the right-hand side of the head.
2. To adjust the head height, ensure that the head is supported by the rack, loosen the bolt, and then adjust the head up or down using the winding handle on the side of the column.
3. Once the height is correct, retighten the locking bolt.

SETTING THE TABLE HEIGHT (FLOOR MODELS ONLY)

1. The table is locked into position using a locking lever on the right-hand side of the table.
2. To adjust the table height, ensure that the table is supported by the rack, loosen the lever, and then adjust the table up or down using the winding handle on the side of the column.
3. Once the height is correct, retighten the locking lever.

ADJUSTING THE SPEED

1. Ensure that the drill is isolated from the mains supply, or that the emergency stop is engaged.
2. Remove the nut on the top of the belt cover and remove the cover.
3. Loosen the motor tensioner locking bolt, push the motor towards the drill head to slacken the tension on the belt, and then tighten the locking bolt to prevent the motor springing back and retensioning the belt.
4. Refer to the speed chart on side of the belt cover and select the correct belt position for the required speed. Turn the pulleys to check that the belt moves freely.
5. Loosen the motor tensioner locking bolt to allow the motor to move out to retension the belt, and then tighten the locking bolt.
6. Replace the belt cover and refit the nut.

FITTING A DRILL BIT

1. Ensure that the drill is isolated from the mains supply, or that the emergency stop is engaged.
2. Release the chuck guard by disengaging the spring-loaded plunger on the left-hand side of the guard, and lifting the hinged front.
3. Select the correct drill bit for the job and insert into the chuck. Tighten the chuck with the key provided, ensuring that the drill bit is correctly centred. Remove the chuck key.
4. Close the chuck guard ensuring correct reengagement of the spring-loaded plunger.
5. The length of the chuck guard can be adjusted by loosening the two thumbscrews on either side, moving the inner section to the correct height, and then retightening the thumbscrews.

ADJUSTING THE DEPTH STOP

1. Ensure that the drill is isolated from the mains supply, or that the emergency stop is engaged.
2. With drill bit fitted, lower the quill until the drill bit touches the workpiece at the point where the hole is to be drilled.
3. Holding the quill in this position, release the indicator, move to the desired drill depth, and retighten.
4. The drill depth will be reached when the indicator is at zero.

DRILLING OPERATION

1. Ensure that the workpiece is safely secured.
2. Ensure the emergency stop is released by rotating clockwise and that the ON & OFF switches underneath are illuminated.
3. Press the green switch to start the drill, and allow the drill to reach speed.
4. Slowly turn the feed handle to lower the chuck. Only moderate pressure should be required to drill, if excess force is needed, this could indicate either incorrect drill speed selection, an incorrect drill size, or blunt drill bit.
5. After drilling, release the feed handle slowly to return the chuck to its starting position.
6. Press the red switch or the emergency stop, to stop the drill.

NOTE: As a safety feature, the ON switch is a 'No Volt Release' type. This means that if the power is interrupted whilst the drill is switched ON, it will not automatically start when power is restored.

MAINTENANCE



IMPORTANT: Always isolate the drill from the electricity supply before carrying out any maintenance.

All bearings are packed with grease at the factory and require no further lubrication.

Recommended lubricants for routine maintenance are:

Grease: Shell Gadus S2 V100 3, or equivalent.

Oil: Shell Tonna S3 M 68, or equivalent.

MONTHLY MAINTENANCE

1. Clean the drill removing all swarf and dust from all surfaces.
2. Check the condition of the mains lead and plug.
3. Check the tightness of all mounting and locking bolts/levers.
4. Check the correct operation of the ON / OFF switches, and the emergency stop.
5. Check the correct operation of the safety switches, under the drive belt cover on all models, and on the chuck guard on the 16mm models only.
6. Check that the bolts holding the electrical enclosure to the head are secure.
7. Check the free movement of the feed handle & quill, and grease the quill and shaft if required.
8. Check the drive belt for signs of wear or damage, and replace if required.
9. Check the chuck guard for damage, and replace if required.

SIX MONTHLY MAINTENANCE

1. Lightly oil the column, base, and table (floor models only).
2. Remove the return spring cover and re-grease the spring. Replace the cover.
3. Grease the rack for the head raising mechanism. Apply grease through the grease nipple on the front of the mechanism, and apply oil to the hole above the handle.
4. On the floor models only, grease the rack for the table raising mechanism. Apply grease through the grease nipple on the front of the mechanism, and apply oil to the hole above the handle.

TROUBLESHOOTING

Problem	Probable Cause	Possible Solution
Motor won't start.	<ol style="list-style-type: none"> 1) Power supply. 2) Motor connection. 3) NVR switch connection faulty. 4) Faulty switch. 5) Motor windings burned. 6) Belt cover not closed. 7) Micro switch on cover not operating. 8) Micro switch on chuck guard not operating (16mm only). 	<ol style="list-style-type: none"> 1) Check mains lead/fuse. 2) Check motor connections. 3) Check switch connections. 4) Replace switch. 5) Replace motor. 6) Close belt cover. 7) Check operation of microswitch and renew/adjust as necessary. 8) Check operation of microswitch and renew/adjust as necessary.
Noisy operation	<ol style="list-style-type: none"> 1) Incorrect belt tension. 2) Dry spindle. 3) Loose pulley. 4) Loose belt. 5) Worn bearing. 	<ol style="list-style-type: none"> 1) Adjust tension. 2) Remove spindle and quill assembly and lubricate. 3) Tighten pulley. 4) Adjust belt tension. 5) Replace bearing.
Excessive drill runout	<ol style="list-style-type: none"> 1) Loose chuck. 2) Worn spindle or bearing. 3) Worn chuck. 4) Bent drill bit. 	<ol style="list-style-type: none"> 1) Tighten by pressing chuck down on to a block of wood against the table. 2) Replace the spindle shaft or bearing. 3) Replace chuck. 4) Replace drill bit.
Drill bit binds in workpiece	<ol style="list-style-type: none"> 1) Excessive feed pressure. 2) Loose belt. 3) Loose drill bit. 4) Incorrect bit speed. 	<ol style="list-style-type: none"> 1) Apply less pressure. 2) Check belt tension. 3) Tighten drill with key. 4) Adjust the drill speed.
Quill returns too slow or too fast	<ol style="list-style-type: none"> 1) Spring has improper tension. 2) Quill or shaft binding. 	<ol style="list-style-type: none"> 1) Adjust spring tension. 2) Clean and lubricate.
Table or head height difficult to adjust	<ol style="list-style-type: none"> 1) Requires lubrication. 2) Clamp too tight. 	<ol style="list-style-type: none"> 1) Clean and lubricate. 2) Loosen clamp.

GUARANTEE

1. All goods are guaranteed against defective workmanship and material for a period of twelve months from date of despatch.
Please refer to our full Terms & Conditions on our website: www.meddings.co.uk.
2. Any faults or defects must be reported to Meddings Machine Tools as soon as the fault or defect arises. No product can be returned to Meddings Machine Tools without prior authorisation and defective parts or assemblies must be returned to Meddings Machine Tools for inspection if requested. Parts which prove defective within this time under normal operations and service when owned by the original user, will be replaced, but no claim for expenditure upon them or for consequential damage will be entertained.
3. Replacements must be accepted as complete satisfaction of all conditions or warranties. Bought out components and proprietary items such as electric motors, starters, chucks, etc are not included in this guarantee. However, the purchaser will be entitled to receive from Meddings Machine Tools all rights and benefits derived from any guarantee given to us by the manufacturers of such items.
4. The guarantee does not include repair labour or parts replacement required because of misuse, abuse, or normal wear and tear. Repairs not made by our factory, relieve Meddings Machine Tools of further liability under this guarantee. This guarantee is made expressly in place of all other guarantees or warranties, expressed or implied, with respect to quality, merchantability, or fitness for a particular purpose.

AFTERSALES SERVICE

1. For aftersales service, including spares, accessories, and technical support, please contact our customer support either by 'phone on +44 (0) 1752 313323, or by email on sales@meddings.co.uk.

ENVIRONMENTAL



Through purchase of this product, the customer is taking on the obligation to deal with Waste Electrical and Electronic Equipment (WEEE) in accordance with the WEEE regulations in relation to the treatment, recycling & recovery, and environmentally sound disposal of the WEEE. In effect, this means that this product must not be disposed of with general household waste. It must be disposed of according to the laws governing Waste Electrical and Electronic Equipment (WEEE) at a recognised disposal facility.

DECLARATIONS OF CONFORMITY

Meddings Machine Tools
Declaration of Conformity



Product Model:

Compact Mk2

Name and address of the manufacturer:

Meddings Machine Tools
Kingsley Close, Lee Mill Industrial Estate
Ivybridge, Devon, PL21 9LL

This declaration is issued under the sole responsibility of the manufacturer.

Object of the declaration:

Compact Mk2 13mm Bench Drill
Compact Mk2 13mm Floor Drill
Compact Mk2 16mm Bench Drill
Compact Mk2 16mm Floor Drill

The object of the declaration described above is in conformity with the relevant UK Statutory Instruments (and their amendments):

Supply of Machinery (Safety) Regulations 2008 (as amended)
Electromagnetic Compatibility Regulations 2016 as amended)
The Electrical Equipment (Safety) Regulations 2016 (as amended)
The Restriction of the Use of Certain Hazardous Substances in Electrical and Electronic Equipment Regulations 2012 (as amended)

References to the relevant designated standards used or references to the other technical specifications in relation to which conformity is declared:

ISO 12100:2010 Safety of machinery - General principles for design - Risk assessment and risk reduction
12717:2001+A1:2009 Safety of machine tools - Drilling machines
BS EN 55014-1:2021 Electromagnetic compatibility - Requirements for household appliances, electric tools and similar apparatus Part 1: Emission
BS EN 55014-1:2021 Electromagnetic compatibility - Requirements for household appliances, electric tools and similar apparatus Part 2: Immunity
EN 60204-1:2018 Electrical equipment of machines - Part 1: General requirements (IEC 60204-1:2016, modified)

The technical documentation for the machinery is available from:

Meddings Machine Tools
Kingsley Close, Lee Mill Industrial Estate
Ivybridge, Devon, PL21 9LL

Signed for and on behalf of: Meddings Machine Tools

Place of issue: Ivybridge, Devon, United Kingdom

Date of issue: 03rd October 2023

Name: Mark Dibbens

Function: Managing Director

Signature:



Meddings Machine Tools Declaration of Conformity



Product Model:

Compact Mk2

Name and address of the manufacturer:

Meddings Machine Tools
Kingsley Close, Lee Mill Industrial Estate
Ivybridge, Devon, PL21 9LL

This declaration is issued under the sole responsibility of the manufacturer.

Object of the declaration:

Compact Mk2 13mm Bench Drill
Compact Mk2 13mm Floor Drill
Compact Mk2 16mm Bench Drill
Compact Mk2 16mm Floor Drill

The object of the declaration described above is in conformity with the relevant EU legislation:

2006/42/EU (as amended) Machinery Directive
2014/30/EU (as amended) EMC Directive
2014/35/EU (as amended) Low Voltage Directive
2011/65/EU (as amended) RoHS Directive

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