Clarke®



40-Piece Rotary Tool Kit

MODEL No: CRT40

Part Nos:6462001

USER INSTRUCTIONS

CE

GC06/09

INTRODUCTION

Thank you for purchasing this CLARKE 40-piece Rotary Tool Kit.

Please read this manual thoroughly and follow the instructions carefully. In doing so you will ensure the safety of yourself and that of others around you, and you can look forward to the product giving you long and satisfactory service.

GUARANTEE

This product is guaranteed against faulty manufacture for a period of 12 months from the date of purchase. Please keep your receipt which will be required as proof of purchase.

This guarantee is invalid if the product is found to have been abused or tampered with in any way, or not used for the purpose for which it was intended.

Faulty goods should be returned to their place of purchase, no product can be returned to us without prior permission.

This guarantee does not effect your statutory rights.

ENVIRONMENTAL PROTECTION



Do not dispose of this product with general household waste. It must be disposed of according to the laws governing Waste Electrical and Electronic Equipment, at a recognised disposal facility.

DECLARATION OF CONFORMITY

We declare that this product conforms to the following directives:

98/37/EC

For Serial/Batch No: Please See Product Data Plate.

Signed:

PACKAGE CONTENTS

The package contains:

1	Rotary Tool
1	Flexible Drive
1	Tool Stand Complete
1	Chuck spanner
37	Accessories/consumables
1	Case

SAFETY PRECAUTIONS

- **ALWAYS** keep the power cable away from the moving parts of the rotary tool.
- **ALWAYS** switch off the tool and allow it to stop fully before putting it down.
- In the event of power failure or disconnection of supply for whatever reason, when the tool is in operation...**ALWAYS** SWITCH OFF the tool before putting it down, then disconnect it from the mains supply.
- **ALWAYS** ensure the accessories used are rated for rotation at the maximum speed of the tool.
- **NEVER** attach an assembly wrench to your rotary tool with a piece of string or anything similar.
- **NEVER** press the drive shaft locking button when the rotary tool is operating.
- **ALWAYS** ensure that the mandrel diameter is the same as the collet diameter.
- **ALWAYS** use a clamping device for securing the work piece. Keep your hands away from the work piece.
- **ALWAYS** wear safety goggles, manufactured to the latest European Safety Standards. Everyday eyeglasses do not have impact resistant lenses, they are not safety glasses.
- **NEVER** force the tool, only light pressure is required to perform a task.
- **NEVER** overtighten the screw when mounting a grinding disc or cutting disc onto its mandrel.
- **NEVER** allow children to operate this tool.
- IF the tool begins to vibrate during operation, switch OFF immediately and investigate the cause.

ELECTRICAL CONNECTIONS

This product is provided with a 13 amp BS 1363 plug, fitted with a 13amp fuse and MUST be connected to a standard, 230 Volt (50Hz) electrical supply, preferably through an approved plug, or a suitably fused isolator switch.



WARNING: THIS APPLIANCE MUST BE EARTHED

IMPORTANT: The wires in the mains lead should be wired up in accordance with the following colour code:

Green & Yellow - Earth

Blue - Neutral

Brown - Live

As the colours of the flexible cable of this appliance may not correspond with the coloured markings identifying terminals in your plug, proceed as follows:

- Connect the GREEN & YELLOW coloured cord to the plug terminal marked with a letter E or Earth symbol "⏚" or coloured GREEN or GREEN & YELLOW.
- Connect the BROWN coloured cord to the plug terminal marked a letter "L" or coloured RED.
- Connect the BLUE coloured cord to the plug terminal marked a letter "N" or coloured BLACK

If this appliance is found to be fitted with a plug which is moulded on to the electric cable (i.e. non-rewireable) please note:

1. The plug must be thrown away if it is cut from the electric cable. There is a danger of electric shock if it is subsequently inserted into a socket outlet.
2. Never use the plug without the fuse cover fitted.
3. Should you wish to replace a detachable fuse carrier, ensure that the correct replacement is used (as indicated by marking or colour code).
4. Replacement fuse covers can be obtained from your local Clarke dealer or most electrical stockists.

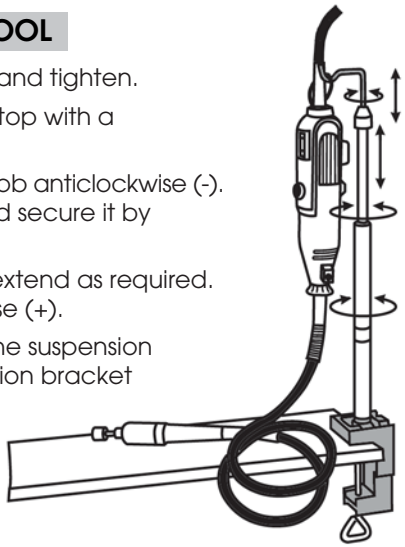
FUSE RATING

The fuse in the plug must be replaced with one of the same rating and this replacement must be ASTA approved to BS1362.

We strongly recommend that this machine is connected to the mains supply via a Residual Current Device (RCD).

ASSEMBLY OF COMPONENTS

1. STAND FOR THE ROTARY TOOL



Screw the telescopic tube into the bracket and tighten.

Clamp the bracket to a workbench or worktop with a maximum thickness at 2-1/8".

Slacken the top tube by turning the black knob anticlockwise (-). Draw the tube out to its maximum height and secure it by turning the knob clockwise (+).

Turn the middle tube anticlockwise (-) and extend as required. Lock in position by turning the tube clockwise (+).

The Rotary Tool can now be supported by the suspension bracket of the stand as shown. (the suspension bracket can be turned 360º).

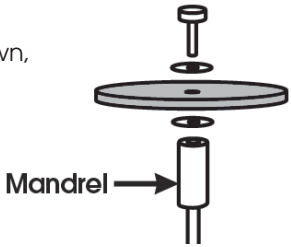
2. ASSEMBLING ACCESSORIES TO THE TOOL



IMPORTANT: Ensure the tool is switched OFF at the mains supply and at the tool switch.

- Press down on the drive shaft locking button (2), and hold down.
- Undo the chuck (1) using the spanner provided.
- Insert the mandrel of the tool to be used in to the chuck FULLY and tighten the chuck.

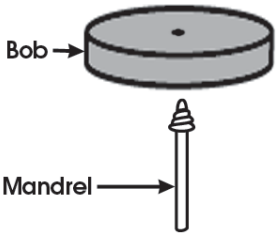
3. ASSEMBLING DISCS & GRINDING STONES TO THE MANDREL



- Mount the selected disc on to the mandrel as shown, ensuring the two washers are in place.

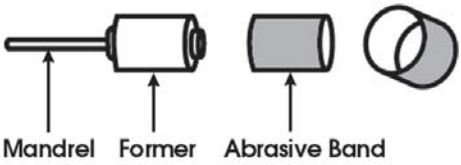
  DO NOT overtighten the screw.

4. ASSEMBLING POLISHING BOB



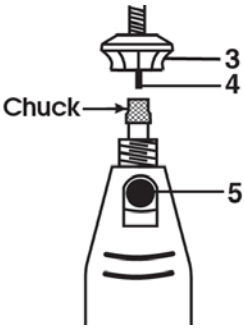
- Screw the Bob on to the mandrel firmly, but do not overdo it.

5. Assembling Abrasive Bands



- Slacken the screw on the end of the mandrel and slide the appropriate abrasive band on to the rubber former, fully.
- Tighten the screw to secure the band to the former.

6. ATTACHING THE FLEXIBLE DRIVE ASSEMBLY



- Unscrew and remove the Securing Ring (3) and retain.
- Slacken the chuck using the spanner provided, by pressing and holding the locking button (5).
- Slide the flexible drive through the chuck and **FULLY** into the collet**.**
- Hold back the Securing Ring (3), whilst tightening the chuck, thereby securing the flexible drive.
- Screw the Securing Ring (3) on to the end of the tool, **taking GREAT CARE to not to cross-thread it.**
- At the opposite end of the Flexible Drive, insert the mandrel of the tool to be used into the chuck.

  To undo the chuck, pull back on the sleeve in the direction of the arrow and hold back to lock the drive so that the spanner may be used.

  Insert the mandrel fully, then re-tighten the chuck.

  Release the sleeve to release the drive.



OPERATION

Assemble the tool as described previously.

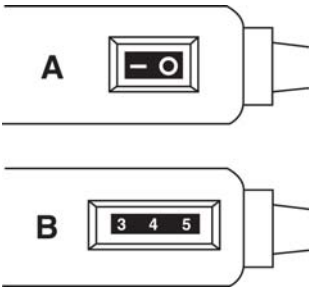
Holding the tool firmly, and ensuring your fingers are well away from the rotating parts, plug into the mains and switch ON by pressing 'I' (A).

Adjust the speed according to the job in hand, by turning the adjuster 'B', using the tables below for reference.

To switch OFF, press 'O' (A).

⚠ CAUTION! NEVER put the tool down until it has stopped completely.

DO NOT use force when using this tool; a light pressure is all that is required.



REFERENCE TABLES

- The following speeds are for guidance only.

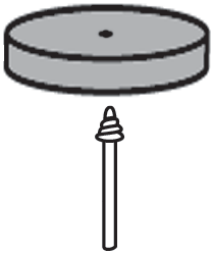
1. Grinding Stones

Material	Speed
Stone, Shell	1
Steel	5
Aluminium, Brass	2
Plastic	1



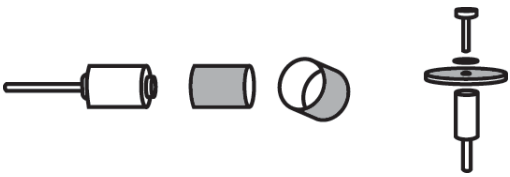
2. Polishing Bob

Material	Speed
Steel	5
Aluminium, Brass	3
Plastic	5



3. Sanding Band & Discs

Material	Speed
Wood	Max
Steel	1
Aluminium, Brass	3
Plastic	1



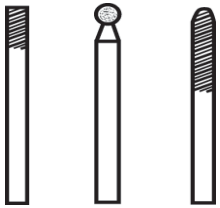
4. Stainless Steel Brushes & Bristle Brush

Material	Speed
Stone, Shell	2
Aluminium, Brass	2



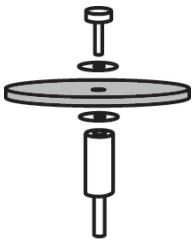
5. High Speed Cutter, Diamond Wheel & Drill

Material	Speed
Stone, Shell	Max
Steel	3
Aluminium, Brass	4
Plastic	1



6. Abrasive Disc

Material	Speed
Stone, Shell	Max
Steel	3
Aluminium, Brass	4
Plastic	1



VARIABLE SPEED CHART

Speed Indicator Position	RPM
1	17,500
2	18,500
3	24,500
4	27,800
5	31,000
MAX	35,000

MAINTENANCE

ALWAYS unplug the tool from the mains supply and ensure it is switched OFF when performing maintenance tasks.

The tool should be kept clean at all times. Ensure the ventilation ducts are clear and the power cable is in good condition. Get into the habit of cleaning thoroughly after each use and before storing.

Never clean with solvents, use a moist cloth with soapy water if necessary.

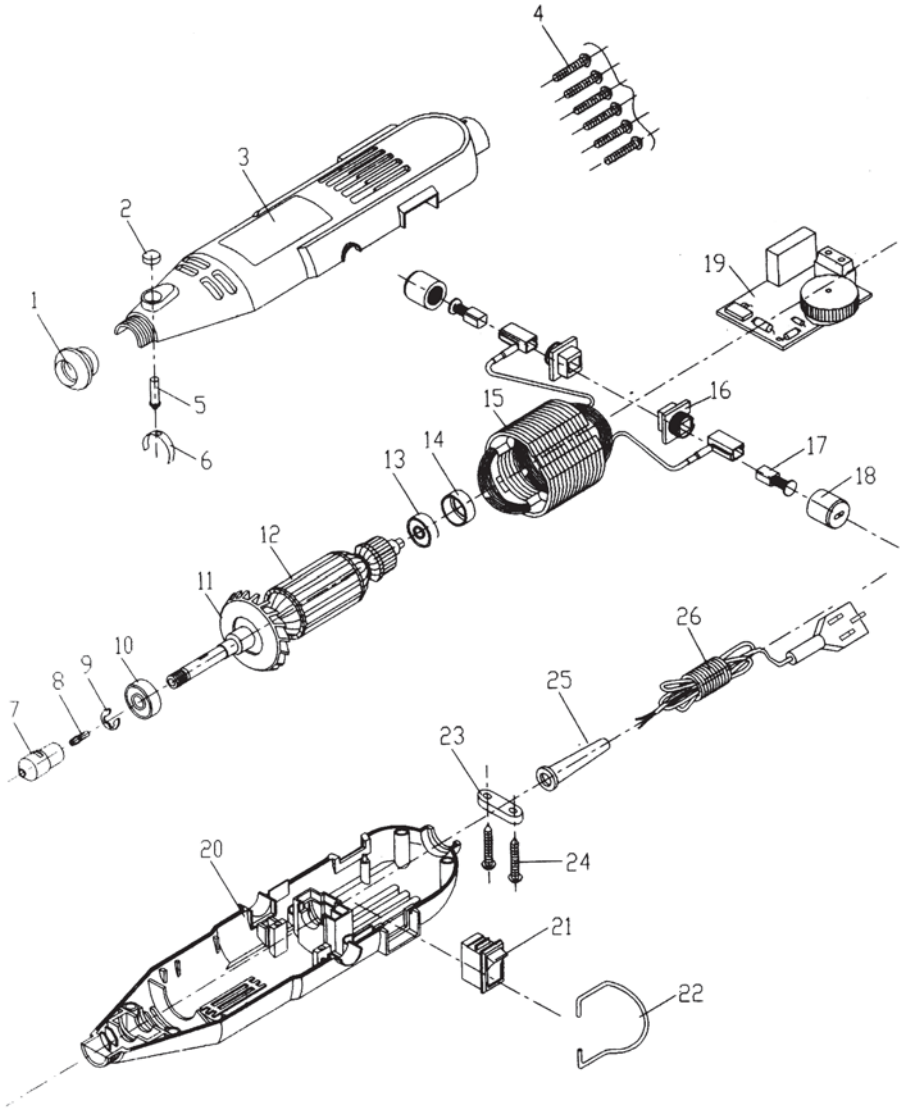
The tool does not require lubrication.

TECHNICAL SPECIFICATION

Item	Published Specification
Voltage	230V 50Hz 1ph
Power Rating	135 W
No-load Speed	15,000 - 35,000 rpm
Collet Capacity	1/8"
Weight	2.5 kg (packed)
Vibration	Less than 2.5 m/s^2

Please note that the details and specifications contained herein, are correct at the time of going to print. However, CLARKE International reserve the right to change specifications at any time without prior notice.

PARTS DIAGRAM



ACCESSORIES

A 100 piece Accessory Kit (CRT100A) is available from your Clarke dealer.

Please quote Part Number 6468025

PARTS LIST

1	Head Cap	TMCT4001
2	Push Button	TMCT4002
3	Housing	TMCT4003
5	Step Pin	TMCT4005
6	Spring Ring	TMCT4006
7	Hex Nut	TMCT4007
8	Collet	TMCT4008
9	Clip Ring	TMCT4009
10	Ball Bearing	TMCT4010
11	Cooling Fan	TMCT4011
12	Armature	TMCT4012
13	Ball Bearing	TMCT4013
14	Stator	TMCT4014
15	Brush Copper Sleeve	TMCT4015
16	Brush Holder	TMCT4016
17	Carbon Brush	TMCT4017
18	Brush Cap	TMCT4018
19	Printed Circuit Board	TMCT4019
20	Housing	TMCT4020
21	Switch	TMCT4021
22	Hook	TMCT4022
23	Cable Anchorage	TMCT4023
24	Screw	TMCT4024
25	Cable Sleeve	TMCT4025
26	Plug & Cable	TMCT4026

SPARE PARTS AND SERVICE CONTACTS

For parts & Servicing, please contact your nearest dealer, or CLARKE International, on one of the following numbers.

PARTS & SERVICE TEL: 020 8988 7400
PARTS & SERVICE FAX: 020 8558 3622
or e-mail as follows:
PARTS: Parts@clarkeinternational.com
SERVICE: Service@clarkeinternational.com

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