

**DRAPER**

**EN**

Original Instructions  
Version 2  
January 2026

230V

# **BELT & DISC SANDER**

**53005**



**UK  
CA** **CE**

# 1. Preface

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**These are the original product instructions. Read the instruction manual in full and retain for future reference.**

Please visit [drapertools.com/manuals](http://drapertools.com/manuals) for the latest version of this manual and the associated parts list, if applicable.

## 1.1 Product Reference

**User Manual for:** 230V Belt & Disc Sander

**Stock No:** 53005

**Part No:** BDS150

## 1.2 Revisions

**Version 1:** July 2020

First release

**Version 2:** January 2026

## 1.3 Understanding the Safety Content of This Manual



**WARNING!** – Situations or actions that may result in personal injury or death.



**CAUTION!** – Situations or actions that may result in damage to the product or surroundings.

**Important:** – Information or instructions of particular importance.

## 1.4 Copyright © Notice

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<b>1. Preface</b>	<b>2</b>	7.4 Contour Sanding (Fig.16)	12
1.1 Product Reference	2	7.5 Disc Sanding (Fig.17)	13
1.2 Revisions	2	<b>8. Maintenance and Troubleshooting</b>	<b>13</b>
1.3 Understanding the Safety Content of This Manual	2	8.1 General Maintenance	13
1.4 Copyright © Notice	2	8.2 Replacing the Sanding Disc/Sheets (Fig.18)	13
<b>2. Contents</b>	<b>3</b>	8.3 Replacing the Sanding Belt and Adjusting the Tracking/Tension (Fig.19 – Fig.23)	14
<b>3. Product Introduction</b>	<b>4</b>	8.4 Troubleshooting	15
3.1 Intended Use	4	<b>9. Spares, Returns and Disposal</b>	<b>15</b>
3.2 Specification	4	<b>10. Warranty</b>	<b>15</b>
<b>4. Health and Safety Information</b>	<b>5</b>	<b>11. Explanation of Symbols</b>	<b>16</b>
4.1 General Health and Safety Precautions	5		
4.2 Additional Safety Instructions for Sanders	6		
4.3 Connection to the Power Supply	6		
4.4 Residual Risk	6		
<b>5. Identification and Unpacking</b>	<b>7</b>		
5.1 Product Overview	7		
5.2 What's in the Box?	8		
5.3 Packaging	8		
<b>6. Preparation Instructions</b>	<b>9</b>		
6.1 Attaching the Rear Disc Guard (Fig.1 – Fig.2)	9		
6.2 Attaching the Sanding Disc (Fig.3 – Fig.4)	9		
6.3 Attaching Front Cover to Disc Guard (Fig.5)	9		
6.4 Attaching the Feet (Fig.6)	10		
6.5 Attaching the Back Stop (Fig.7)	10		
6.6 Attaching Support Table to Sanding Disc (Fig.8)	10		
6.7 Vertical Belt Position (Fig.9)	10		
6.8 Attaching Work Support Table to Sanding Belt (Fig.10)	11		
6.9 Work Support Table Adjustments (Fig.11)	11		
6.10 Dust Extraction (Fig.12)	11		
<b>7. Operating Instructions</b>	<b>12</b>		
7.1 <b>ON/OFF</b> Buttons Operation (Fig.13)	12		
7.2 Sanding Belt Straight Sanding (Fig.14)	12		
7.3 Sanding Belt End Sanding (Fig.15)	12		

## 3. Product Introduction

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### 3.1 Intended Use

This belt and disc sander is designed for horizontal and vertical sanding operations including chamfers and compound mitres. Suitable for use with wood and non-ferrous metals.

Any other application beyond the conditions established for use will be considered misuse. Draper Tools accepts no responsibility for improper use of this product.

This product is intended for domestic and infrequent light-duty trade use.

Read this manual in full before attempting to assemble, operate or maintain the product, and retain it for later use.

### 3.2 Specification

<b>Stock No.:</b>	<b>53005</b>
<b>Part No.:</b>	<b>BDS150</b>
Rated voltage:	230V/50Hz
Rated input:	375W
Operating time:	Max 30mins
Belt size:	100 × 915mm
Belt speed:	4.6m/s
Disc size:	150mm
Disc speed:	1450rpm
Table size:	125 × 190mm (0 – 45°)
Noise emissions:	
Sound pressure level (LpA):	79dB (A)
Sound power level (LWA):	92dB (A)
Cord length (approx):	3M
Net weight:	11.5kg
Dimensions:	475 × 240 × 330mm

**Important:** The declared noise emissions values have been measured in accordance with a standard test method and may be used for comparing one tool with another. These values may also be used in a preliminary assessment of exposure.



**WARNING!** The noise emissions during actual use of the product can differ from the declared values depending on the type of work and the area upon which it is used. Before each use, estimate the likely exposure resulting from the actual conditions of use. Take into account all parts of the operation cycle in order to identify any safety measures required to protect the operator.

 **WARNING!** When using electric tools basic safety precautions should always be followed to reduce the risk of fire, electric shock and personal injury including the following:

Read all these instructions before attempting to operate this product and save these instructions.

### 4.1 General Health and Safety Precautions

- **Keep work area clean and well lit** – Cluttered or dark areas invite accidents.
- **DO NOT operate the tool in explosive atmospheres, such as in the presence of flammable liquids, gases or dust** – tools create sparks which may ignite the dust or fumes.
- **DO NOT** expose the sander to rain or wet conditions.
- **Avoid body contact with earthed or grounded surfaces, such as pipes, radiators, ranges and refrigerators** – There is an increased risk of electric shock if your body is earthed or grounded.
- **DO NOT** let persons, especially children, not involved in the work touch the tool or the extension cord and keep them away from the work area.
- Store idle tools out of the reach of children and **DO NOT** allow persons unfamiliar with the tool or these instructions to operate the tool.
- **DO NOT** force the tool – use the correct tool for your application.
- **Dress properly. DO NOT** wear loose clothing or jewellery. Keep your hair, clothing and gloves away from moving parts – loose clothes, jewellery or long hair can be caught in moving parts.
- **ALWAYS** wear a suitable dust mask and eye protection when operating the sander.
- If devices are provided for the connection of dust extraction and collection facilities, ensure these are connected and properly used. Use of dust collection can reduce dust-related hazards.
- **DO NOT** abuse the cord. **NEVER** use the cord for carrying, pulling or unplugging the tool.
- Keep cord away from heat, oil, sharp edges or moving parts.
- **DO NOT** overreach. Keep proper footing and balance at all times.
- Secure the workpiece - where possible use clamps or a vice to hold the work. It is safer than using your hand.

- Keep cutting tools sharp and clean for better and safer performance.
- Keep handles and grasping surfaces dry, clean and free from oil and grease.
- Remove any adjusting key or wrench before turning the tool on.
- Avoid unintentional starting - ensure switch is in 'OFF' position when plugging in.
- When operating an electric tool outdoors, use an extension cord suitable for outdoor use.
- Stay alert, watch what you are doing and use common sense when operating an electric tool.
- **DO NOT** use an electric tool while you are tired or under the influence of drugs, alcohol or medication.
- Check for worn or damaged parts before using the tool:
  - Carefully check to determine that it will operate properly and perform its intended function.
  - Check for alignment of moving parts, binding and breakage of parts, mounting and any other conditions that may affect its operation.
  - A guard or any other part that is damaged should be properly repaired or replaced by an authorised service centre unless otherwise indicated in this instruction manual.
  - Defective switches should be replaced by an authorised service centre.
  - **DO NOT** use the tool if the switch does not turn it on and off.



**WARNING! The use of any accessory or attachment not recommended in this instruction manual may present a risk of personal injury.**

- **ALWAYS** switch off and unplug the sander before carrying out any adjustment, changing accessories, servicing or maintenance.
- Inspect the tool cord and any extension cords regularly and if damaged have it repaired by an authorised service facility.
- Have your sander serviced by a qualified repair person using only identical replacement parts.

## 4. Health and Safety Information

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### 4.2 Additional Safety Instructions for Sanders



**WARNING! DO NOT** attempt to operate the belt and disc sander until it is correctly assembled according to these instructions.

- This sander is designed for use with wood and non-ferrous metals **ONLY**. Other material will cause damage and are a fire risk.
- **ALWAYS** wear a suitable dust mask and eye protection when operating the sander.
- It is recommended that the sander is bolted down to prevent it tipping over and moving during operation.
- The sander is intended for indoor use **ONLY**.
- The sander should be positioned so that the operator or casual observer are not forced to stand in line with the belt or disc.
- **ALWAYS** apply the workpiece left of centre when sanding on the disc. Applying the workpiece to the right side could cause it to kickback which could be dangerous.
- **DO NOT** sand pieces of material too small to hold comfortably by hand.
- When sanding a large piece of material, provide additional support at table height.
- **NEVER** stand on the sander.
- **ALWAYS** keep hands away from the moving disc or belt.
- Clear the belt and worktable of all objects before turning the sander on.
- Ensure the sanding belt runs in the right direction, following the directional arrows on the inside of the belt. **ALWAYS** adjust it correctly so that the belt does not run off the rollers.
- Hold the workpiece firmly when sanding on the belt and against the worktable when sanding on the disc.
- The worktable should be adjusted to within 2mm off the sanding disc or belt.
- **NEVER** leave the sander on unattended, wait until it comes to a complete stop before moving away.
- **DO NOT** sand with the workpiece unsupported. The only exception is when performing curved work on the outer end of the belt with roller idle.

### 4.3 Connection to the Power Supply



**CAUTION! Risk of electric shock. DO NOT OPEN**

This appliance is supplied with an approved plug and cord for your safety.

If the power supply cord is damaged, it must be replaced by Draper Tools, an authorised service agent or similarly qualified personnel in order to avoid a hazard.

The damaged or incomplete plug, when cut from the cord, shall be disabled to prevent connection to a live electrical outlet.

This appliance is Class I† and is designed for connection to a power supply matching that detailed on the rating label and compatible with the plug fitted.

The value of the fuse fitted is marked on the pin face of the plug. Should the fuse need replacing, use a small plain-slot screwdriver to remove the fuse cover. Ensure the substitute is of the correct rating, approved to BS1362 and ASTA or BS Kite marked. This should only be performed by suitably qualified personnel.

ASTA

BSI

Important: If an extension lead is required, use an approved and compatible lead rated for this appliance.

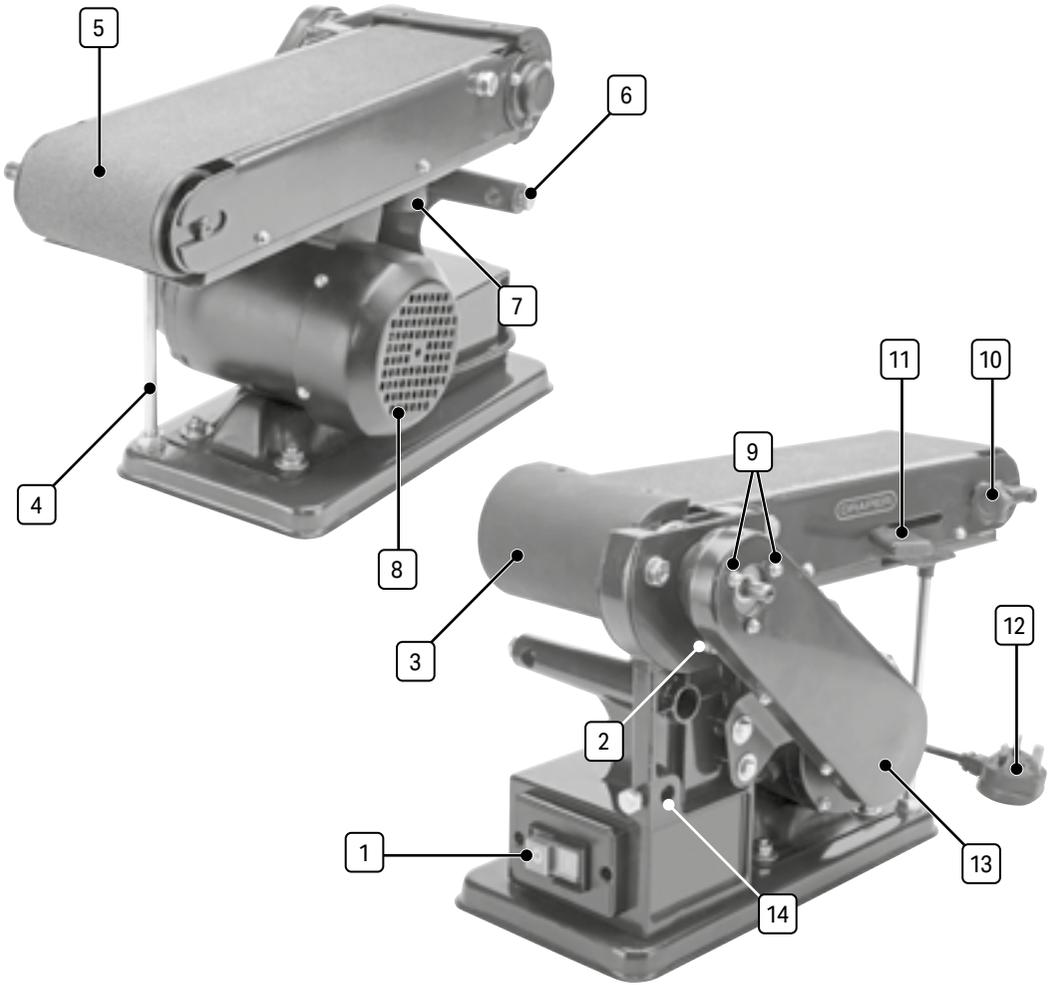
Unwind the entire cable and follow all the instructions supplied with the extension lead.

† Earthed : This product requires an earth connection to protect against electric shock from accessible conductive parts in the event of failure of the basic insulation.

### 4.4 Residual Risk

The safety instructions in this manual cannot account for all possible conditions and situations that may occur. Exercise common sense and caution when using this product and protect against any additional conceivable risks.

## 5.1 Product Overview



- 1 No-Volt/ON/OFF buttons
- 2 Belt position locking nut
- 3 Sanding drum guard
- 4 Belt horizontal support
- 5 Sanding belt
- 6 Vertical support table fixing point
- 7 Belt dust extraction outlet

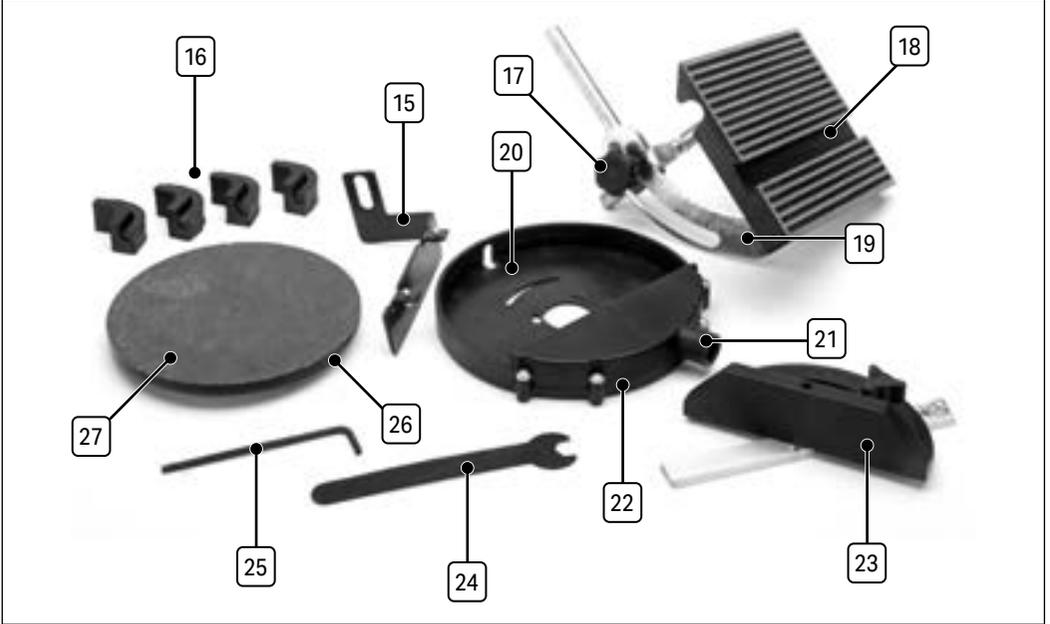
- 8 Motor
- 9 3 x Disc guard screws
- 10 Tracking adjustment knob
- 11 Belt tension lever
- 12 Cord and plug
- 13 Drive belt cover
- 14 Disc table support fixing point

# 5. Identification and Unpacking

## 5.2 What's in the Box?

Carefully remove the product from the packaging and examine it for any signs of damage that may have occurred during shipment.

Before assembling the product, lay the contents out and check them against the parts shown below. If any part is damaged or missing, **DO NOT** attempt to use the product. Please contact the Draper Helpline; contact details can be found at the back of this manual.



- 15 Back stop
- 16 4 x feet
- 17 Table tilting lock knob
- 18 Work support table
- 19 Bevel gauge
- 20 Rear disc guard
- 21 Disc dust extraction outlet
- 22 Front disc guard cover
- 23 Mitre gauge
- 24 14mm Spanner
- 25 4mm Hex key
- 26 Sanding disc holder
- 27 Sanding disc

## 5.3 Packaging

Keep the product packaging for the duration of the warranty period for reference should the product need to be returned for repair.

**WARNING! Keep packaging materials out of reach of children. Dispose of packaging correctly and responsibly and in accordance with local regulations.**

Please visit [drapertools.com](http://drapertools.com) for our full range of accessories and consumables.

**Important:** Before preparing or adjusting this product, read and understand all the safety instructions listed in this manual.

## 6.1 Attaching the Rear Disc Guard (Fig.1 – Fig.2)

1. Remove the three disc guard screws **9** from the belt drive cover **13**.

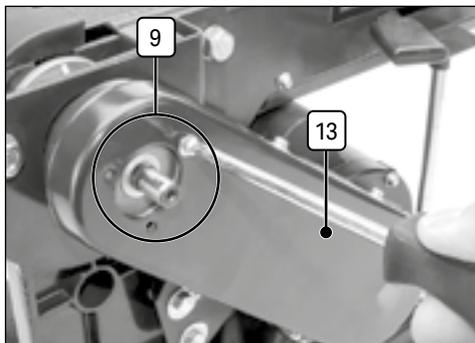


Fig. 1

2. Then use the three disc guard screws **9** to attach the back disc guard **20** to the belt driver cover **13**.

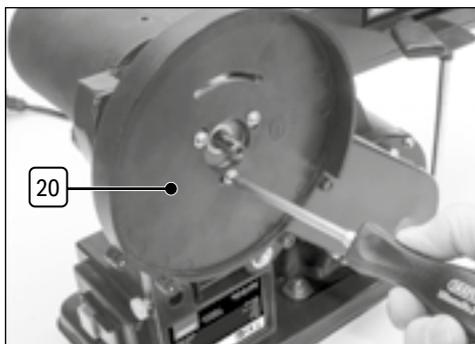


Fig. 2

## 6.2 Attaching the Sanding Disc (Fig.3 – Fig.4)

1. Remove the protective cover from the end of the drive shaft. Then slide the sanding disc holder **26** onto the drive shaft – ensuring the grub screw is at the top of the disc. Remove the adhesive backing from a sanding disc/sheet **27** and align on the holder.

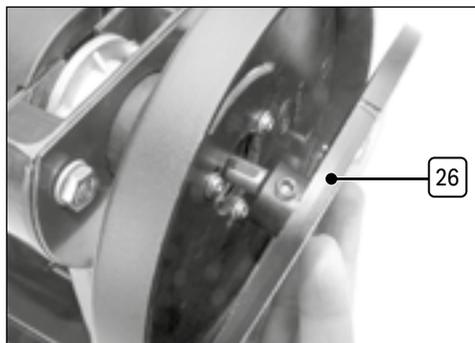


Fig. 3

2. Insert the hex key **25** supplied down through the slot **20.1** in the top of the disc guard **20** and secure the disc.

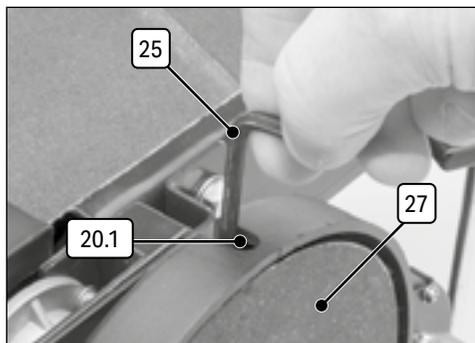


Fig. 4

## 6.3 Attaching Front Cover to Disc Guard (Fig.5)

- Attach the disc cover **22** with the dust outlet **21** using the four screws **20.2** attached to the rear disc guard **20**.

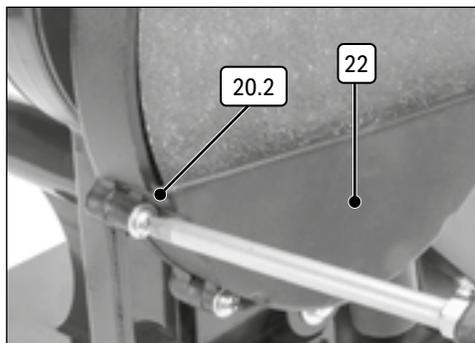


Fig. 5

## 6. Preparation

### 6.4 Attaching the Feet (Fig.6)

- To protect your worktop, fit the feet **16** by slotting into the underside corners of the sander.

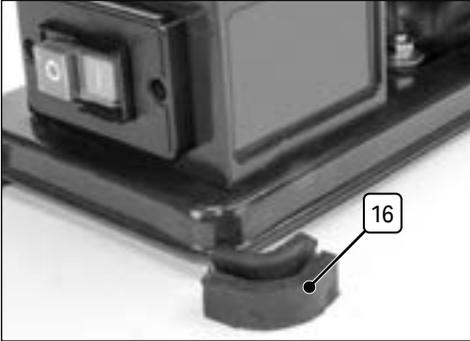


Fig. 6

### 6.5 Attaching the Back Stop (Fig.7)

- Use the back stop **15** when the sander is used in the horizontal position.

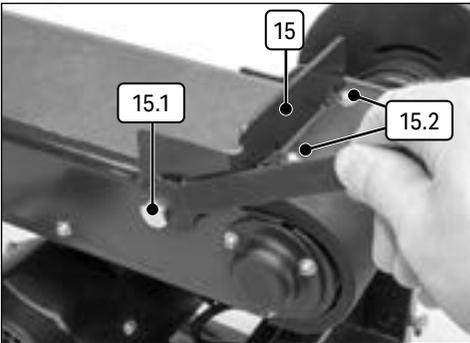


Fig. 7

- Loosely attach the back stop **15** with the bolt **15.1** pre-fitted to the sander.
- Then slide the back stop under the drum guard **3** and secure with the two screws **15.2**.
- Use the spanner **24** supplied to tighten the bolt ensuring a 1.5mm gap to allow sawdust to flow under the drum guard.

### 6.6 Attaching Support Table to Sanding Disc (Fig.8)

- Align the work support table **18** with the sander housing.

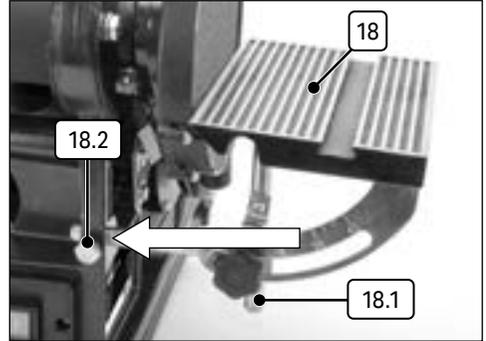


Fig. 8

- Insert the table support bar **18.1** into the hole in the housing and secure by using the hex key **25** supplied to tighten the grub screw **18.2**.
- Ensure there is a maximum distance of 1.5mm between the disc and table.

### 6.7 Vertical Belt Position (Fig.9)

- Use the spanner **24** supplied to loosen the belt position locking nut **2**.

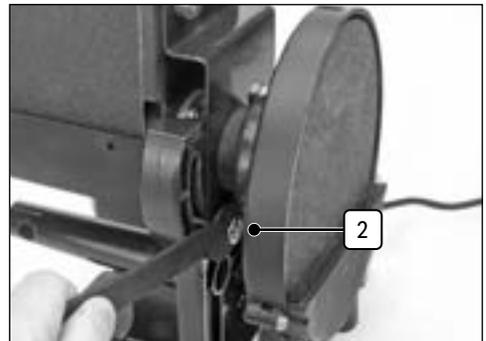


Fig. 9

- Lift the belt to the vertical position, then retighten the nut.

**Note:** To attach the work support table the back stop must be removed.

## 6.8 Attaching Work Support Table to Sanding Belt (Fig.10)

- Insert the work support table (18) bar into the fixing point (6) and tighten the grub screw using the hex key supplied.

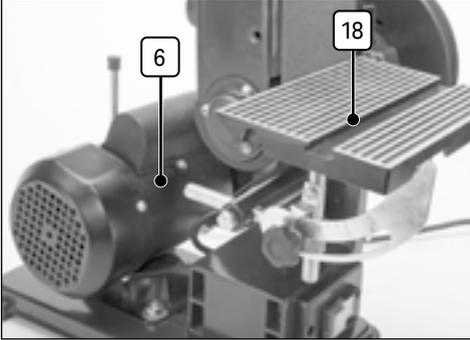


Fig. 10

- Ensure the maximum distance between the disc and table is 1.5mm.

## 6.9 Work Support Table Adjustments (Fig.11)

- Using an engineer's square, finely adjust the table with the hex key (25) supplied, so that '0' is square with the sander. Check that the table is running parallel across the disc face with a 1.5mm gap.

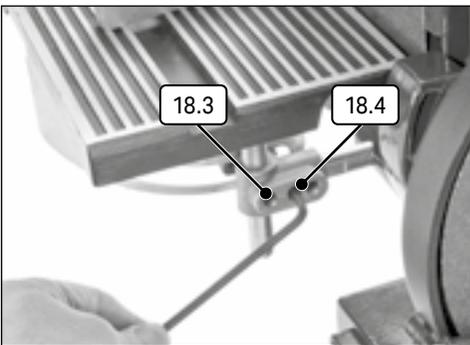


Fig. 11

- To adjust the two hex screws:
  - (18.3) shown to adjust the vertical.

- (18.4) shown to adjust the horizontal.

## 6.10 Dust Extraction (Fig.12)

- The dust extraction outlets (7) and (21) must be connected to a dust extraction machine when operating the sander.
- Due to the diameter of the outlet a size adaptor may be required.

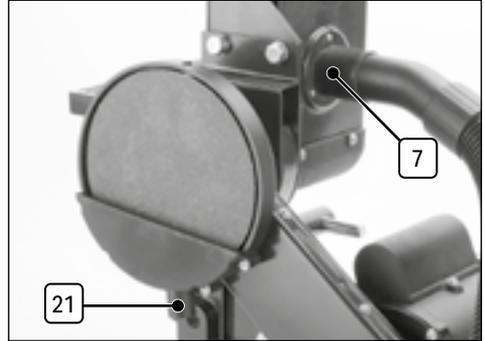


Fig. 12

- A suitable and correctly fitted dust mask must be worn with a rating of at least FFP2.

# 7. Operating Instructions

**Important:** Before operating this product, read and understand all the safety instructions listed in this manual. Ensure that the product is fully assembled and correctly prepared for use.

## 7.1 ON/OFF Buttons Operation (Fig.13)

- In the event of a power failure the sander will need to be restarted manually.

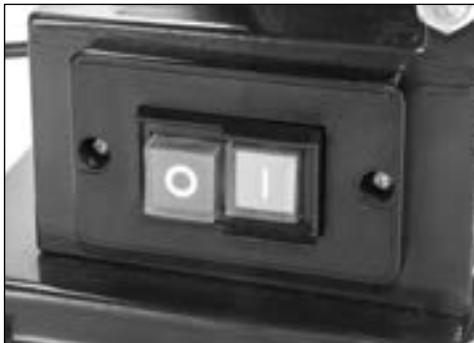


Fig. 13

- To switch **ON**- push the  **ON** button.
- To switch **OFF** - push the  **OFF** button

## 7.2 Sanding Belt Straight Sanding (Fig.14)

- Hold the workpiece firmly with both hands, keeping fingers away from the belt.

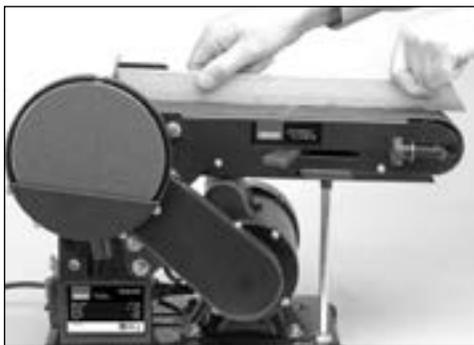


Fig. 14

- **To sand pieces shorter than the belt table** – hold the workpiece lightly against the belt and move it back and forth across the belt. Keep the end butted against the fence to prevent the workpiece from slipping off the table. Take extra care when sanding thin pieces.

- **When finishing long pieces remove the fence.**
  - Start the work at one end and gradually push to the other end.
  - Feed the workpiece slowly across the width and at the same time apply only enough pressure to allow the belt to remove material.
- If the belt stalls or the belt pulleys slip during sanding, the belt requires more tension – **see section 8.3.**

## 7.3 Sanding Belt End Sanding (Fig.15)

- To sand the end of long pieces, move the sanding belt into the vertical position.

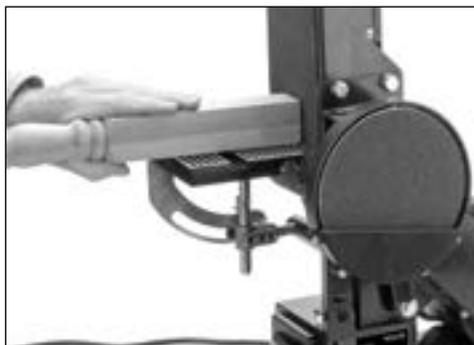


Fig. 15

- Move the workpiece across the sanding belt.

## 7.4 Contour Sanding (Fig.16)

- **Inside Contours:** Inside curves can be sanded on the drum at the end of the sander.



Fig. 16

- Hold the workpiece firmly and press the contour lightly against the drum on one side.
- Then move the workpiece slowly across the drum while moving up the contour against the drum.
- **Outside Contours:** Outside curves can be sanded on the unsupported side of the belt with the table in the vertical position.
  - Hold the workpiece firmly.
  - Begin the curve lightly against one side and feed the workpiece across the belt to the other side while moving up the contour of the workpiece.
  - End of a workpiece outside contours can be sanded with the sanding disc. Feed the workpiece lightly against the disc and move it back and forth from the centre of the disc to the outside edge.

### 7.5 Disc Sanding (Fig.17)

- Disc sanding should be done on the outer edge of the disc which revolves downwards.

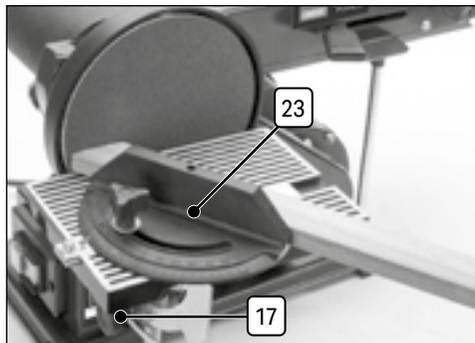


Fig. 17

- Applying the workpiece to the upside of the disc may cause it to fly upwards, which could be dangerous to the operator.
- Use the mitre gauge (23) as a guide when chamfering and finishing angle sanding. To adjust the bevel angle, release the table tilting locking knob (17) to tilt the worktable (18).

## 8. Maintenance and Troubleshooting

**Important:** ALWAYS switch off and unplug the sander before carrying out any adjustments, servicing or maintenance.

### 8.1 General Maintenance

- Regular inspection and cleaning will reduce the necessity for maintenance operations and will keep your sander in good working condition.
- The motor must be correctly ventilated during operation. Avoid blocking the air inlets and vacuum the ventilation slots regularly.

### 8.2 Replacing the Sanding Disc/Sheets (Fig.18)

1. Remove the disc cover (22) by undoing the four screws (20.2) attached to the disc guard (20).
2. Then peel off the sanding disc/sheet (27) from the sanding disc holder (26).
3. Attach a new sanding disc/sheet.

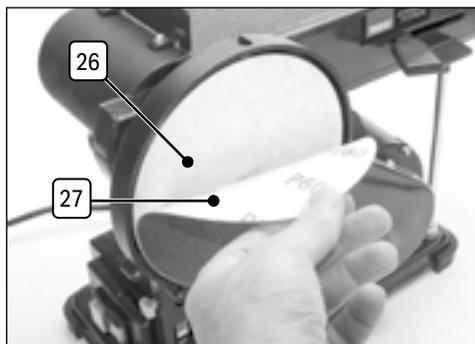


Fig. 18

## 8. Maintenance and Troubleshooting

### 8.3 Replacing the Sanding Belt and Adjusting the Tracking/Tension (Fig. 19 – Fig. 23)

 **WARNING!** To avoid injury from accidentally starting, switch off and unplug the sander before removing or fitting the sanding belt.

**Note:**

- Before the belt can be replaced, the drum guard, stop fence and belt side cover need to be removed.
- There are directional arrows on the inside of the sanding belt – ensure the belt runs in the correct direction, following the arrows.



Fig. 19

1. Loosen the back stop bolt and lift the sanding belt to approx. 45°.

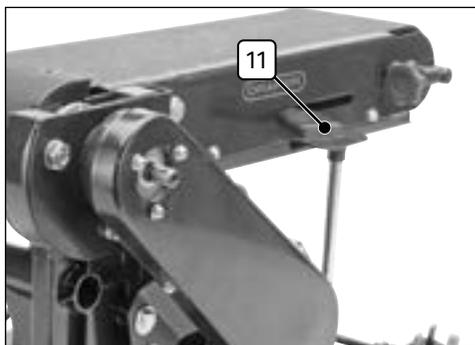


Fig. 20

2. Slide the tension lever (11) forward to release the belt tension.



Fig. 21



Fig. 22

3. Remove the screws from the drum guard and lower belt cover. Release the lower belt cover.
4. Place the new sanding belt (5) over the pulleys with the directional arrows pointing in an anticlockwise direction when looking at the sander from the disc side. Ensure the belt is centred on both pulleys.
5. Tension the sanding belt by sliding the tension lever (11) back.

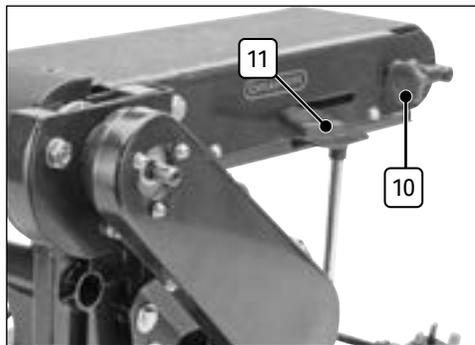


Fig. 23

6. Reconnect to the power supply and press the **ON** button on and then press in the **OFF** button immediately. Check the tracking and that the belt is secure and does not slide off the pulleys.
  - If the belt moves towards the sanding disc, turn the tracking adjustment knob **10** anticlockwise quarter of a turn.
  - If the belt moves away from the disc, turn the tracking adjustment knob **10** clockwise quarter of a turn.
  - Press the **'ON'** and **'OFF'** buttons again and check for any belt movement. Readjust if necessary.

## 8.4 Troubleshooting

Problem	Possible cause	Remedy
Motor does not start	Sander not plugged in	Check Sander is plugged in
	Plug fuse blown	Check plug fuse and replace if required
	<b>ON/OFF</b> buttons defective	Contact Draper Tools for advice
	Motor burnt out	Contact Draper Tools for advice
Motor slows during sanding	Sanding belt too tight	Decrease belt tension
	Too much pressure applied to workpiece	Only light pressure is required
Sanding belt runs off pulleys	Tracking incorrect	Adjust tracking
Wood burns while sanding	Sanding belt or disc glazed with sap	Replace disc or belt

## 9. Spares, Returns and Disposal

For spare parts, servicing, and repair and replacement options, please contact the Draper Tools Product Helpline for details of your nearest authorised agent.

Draper Tools will endeavour to hold any spare parts, if applicable, for seven years from the date that it sells the final matching stock item.

Any servicing or repairs carried out by unauthorised personnel or installation of spare parts not supplied by Draper Tools will invalidate your warranty.

At the end of its working life, dispose of the product responsibly and in line with local regulations. Recycle where possible.

- **DO NOT** dispose of this product with domestic waste; most local authorities provide appropriate recycling facilities.



## 10. Warranty

24 months from date of purchase – Visit [drapertools.com/warranty](http://drapertools.com/warranty) for more information. However, if the tools are hired out, the warranty period is 90 days from the date of purchase.

# 11. Explanation of Symbols



General Mandatory action required



Read the instruction manual



Wear ear defenders, mask and safety glasses



Warning!



Product wattage



Revolutions per minute



Sanding belt width



Sanding disc diameter



Table dimensions



Table tilting angle



Power cord length



Product weight



WEEE –  
Waste Electrical & Electronic Equipment  
Do not dispose of Waste Electrical & Electronic Equipment in with domestic rubbish



Class 1/Earthed product



European conformity



UK Conformity Assessed

## Contact Details

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