

BLACK+ **DECKER**TM

INSTRUCTION MANUAL

MOUSE[®] SANDER

BDEMS600

Thank you for choosing BLACK+DECKER!

Please read before returning this product for any reason.

Definitions: Safety Alert Symbols and Words

This instruction manual uses the following safety alert symbols and words to alert you to hazardous situations and your risk of personal injury or property damage.





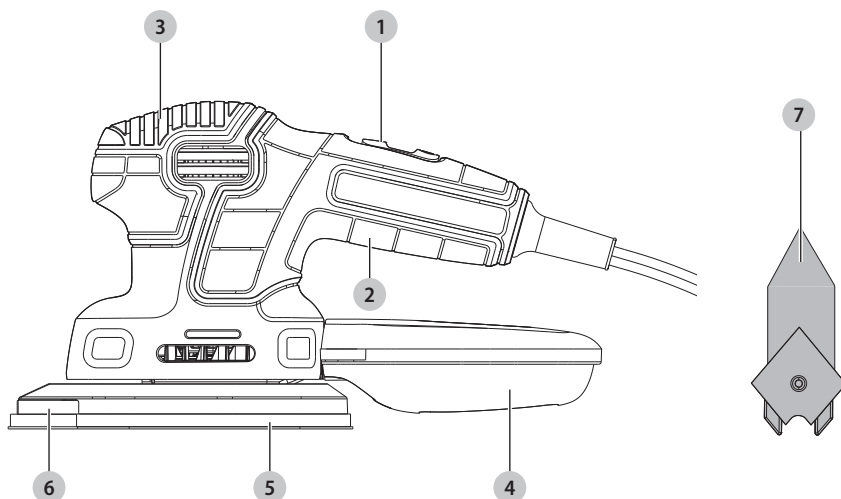


-  **DANGER:** Indicates an imminently hazardous situation which, if not avoided, **will** result in **death or serious injury**.
 -  **WARNING:** Indicates a potentially hazardous situation which, if not avoided, **could** result in **death or serious injury**.
 -  **CAUTION:** Indicates a potentially hazardous situation which, if not avoided, **may** result in **minor or moderate injury**.
 -  (Used without word) Indicates a safety related message.
- NOTICE:** Indicates a practice **not related to personal injury** which, if not avoided, **may** result in **property damage**.

Fig. A



- 1 On/off switch
- 2 Back handle
- 3 Front handle
- 4 Dust collection canister
- 5 Sanding pad
- 6 Removable pad tip
- 7 Finger attachment

 **WARNING! Read all safety warnings and all instructions.** Failure to follow the warnings and instructions may result in electric shock, fire and/or serious injury.

 **WARNING:** To reduce the risk of injury, read the instruction manual.

GENERAL POWER TOOL SAFETY WARNINGS



WARNING! Read all safety warnings and all instructions. Failure to follow the warnings and instructions may result in electric shock, fire and/or serious injury.

SAVE ALL WARNINGS AND INSTRUCTIONS FOR FUTURE REFERENCE

The term "power tool" in the warnings refers to your mains-operated (corded) power tool or battery-operated (cordless) power tool.

1) Work Area Safety

- a) **Keep work area clean and well lit.** Cluttered or dark areas invite accidents.
- b) **Do not operate power tools in explosive atmospheres, such as in the presence of flammable liquids, gases or dust.** Power tools create sparks which may ignite the dust or fumes.
- c) **Keep children and bystanders away while operating a power tool.** Distractions can cause you to lose control.

2) Electrical Safety

- a) **Power tool plugs must match the outlet.** Never modify the plug in any way. Do not use any adapter plugs with earthed (grounded) power tools. Unmodified plugs and matching outlets will reduce risk of electric shock.
- b) **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.
- c) **Do not expose power tools to rain or wet conditions.** Water entering a power tool will increase the risk of electric shock.
- d) **Do not abuse the cord.** Never use the cord for carrying, pulling or unplugging the power tool. Keep cord away from heat, oil, sharp edges or moving parts. Damaged or entangled cords increase the risk of electric shock.
- e) **When operating a power tool outdoors, use an extension cord suitable for outdoor use.** Use of a cord suitable for outdoor use reduces the risk of electric shock.
- f) **If operating a power tool in a damp location is unavoidable, use a ground fault circuit interrupter (GFCI) protected supply.** Use of a GFCI reduces the risk of electric shock.

3) Personal Safety

- a) **Stay alert, watch what you are doing and use common sense when operating a power tool.** Do not use a power tool while you are tired or under the influence of drugs, alcohol or medication. A moment of inattention while operating power tools may result in serious personal injury.

- b) **Use personal protective equipment.** Always wear eye protection. Protective equipment such as dust mask, non-skid safety shoes, hard hat, or hearing protection used for appropriate conditions will reduce personal injuries.
- c) **Prevent unintentional starting.** Ensure the switch is in the off position before connecting to power source and/or battery pack, picking up or carrying the tool. Carrying power tools with your finger on the switch or energizing power tools that have the switch on invites accidents.
- d) **Remove any adjusting key or wrench before turning the power tool on.** A wrench or a key left attached to a rotating part of the power tool may result in personal injury.
- e) **Do not overreach.** Keep proper footing and balance at all times. This enables better control of the power tool in unexpected situations.
- f) **Dress properly.** Do not wear loose clothing or jewelry. Keep your hair, clothing and gloves away from moving parts. Loose clothes, jewelry or long hair can be caught in moving parts.
- g) **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.

4) Power Tool Use and Care

- a) **Do not force the power tool.** Use the correct power tool for your application. The correct power tool will do the job better and safer at the rate for which it was designed.
- b) **Do not use the power tool if the switch does not turn it on and off.** Any power tool that cannot be controlled with the switch is dangerous and must be repaired.
- c) **Disconnect the plug from the power source and/or the battery pack from the power tool before making any adjustments, changing accessories, or storing power tools.** Such preventive safety measures reduce the risk of starting the power tool accidentally.
- d) **Store idle power tools out of the reach of children and do not allow persons unfamiliar with the power tool or these instructions to operate the power tool.** Power tools are dangerous in the hands of untrained users.
- e) **Maintain power tools.** Check for misalignment or binding of moving parts, breakage of parts and any other condition that may affect the power tool's operation. If damaged, have the power tool repaired before use. Many accidents are caused by poorly maintained power tools.
- f) **Keep cutting tools sharp and clean.** Properly maintained cutting tools with sharp cutting edges are less likely to bind and are easier to control.
- g) **Use the power tool, accessories and tool bits, etc. in accordance with these instructions, taking**

into account the working conditions and the work to be performed. Use of the power tool for operations different from those intended could result in a hazardous situation.

5) Service

- a) **Have your power tool serviced by a qualified repair person using only identical replacement parts.** This will ensure that the safety of the power tool is maintained.

SAFETY WARNINGS AND INSTRUCTIONS: SANDERS



ALWAYS WEAR EYE PROTECTION.

- Clean your tool out periodically.



CAUTION: Wear appropriate hearing protection during use. Under some conditions and duration of use, noise from this product may contribute to hearing loss.

OTHER IMPORTANT SAFETY WARNINGS AND INSTRUCTIONS

Sanding Lead based Paint

Sanding of lead based paint is NOT RECOMMENDED due to the difficulty of controlling the contaminated dust. The greatest danger of lead poisoning is to children and pregnant women.

Since it is difficult to identify whether or not a paint contains lead without a chemical analysis, we recommend the following precautions when sanding any paint:

PERSONAL SAFETY

- No children or pregnant women should enter the work area where the paint sanding is being done until all clean up is completed.
- A dust mask or respirator should be worn by all persons entering the work area. The filter should be replaced daily or whenever the wearer has difficulty breathing.

NOTE: Only those dust masks suitable for working with lead paint dust and fumes should be used. Ordinary painting masks do not offer this protection. See your local hardware dealer for the proper (NIOSH approved) mask.

- NO EATING, DRINKING or SMOKING should be done in the work area to prevent ingesting contaminated paint particles. Workers should wash and clean up BEFORE eating, drinking or smoking. Articles of food, drink, or smoking should not be left in the work area where dust would settle on them.

ENVIRONMENTAL SAFETY

- Paint should be removed in such a manner as to minimize the amount of dust generated.
- Areas where paint removal is occurring should be sealed with plastic sheeting of 4 mils thickness.
- Sanding should be done in a manner to reduce tracking of paint dust outside the work area.

CLEANING AND DISPOSAL

- All surfaces in the work area should be vacuumed and thoroughly cleaned daily for the duration of the sanding project. Vacuum filter bags should be changed frequently.
- Plastic drop cloths should be gathered up and disposed of along with any dust chips or other removal debris. They should be placed in sealed refuse receptacles and disposed of through regular trash pick-up procedures. During clean up, children and pregnant women should be kept away from the immediate work area.
- All toys, washable furniture and utensils used by children should be washed thoroughly before being used again.

SAVE THESE INSTRUCTIONS

Additional Safety Information



WARNING: ALWAYS use safety glasses. Everyday eyeglasses are NOT safety glasses. Also use face or dust mask if cutting operation is dusty. **ALWAYS WEAR CERTIFIED SAFETY EQUIPMENT:**

- ANSI Z87.1 eye protection (CAN/CSA Z94.3),
- ANSI S12.6 (S3.19) hearing protection,
- NIOSH/OSHA/MSHA respiratory protection.



WARNING: Some dust created by power sanding, sawing, grinding, drilling, and other construction activities contains chemicals known to the State of California to cause cancer, birth defects or other reproductive harm. Some examples of these chemicals are:

- lead from lead-based paints,
- crystalline silica from bricks and cement and other masonry products, and
- arsenic and chromium from chemically-treated lumber.

Your risk from these exposures varies, depending on how often you do this type of work. To reduce your exposure to these chemicals: work in a well ventilated area, and work with approved safety equipment, such as those dust masks that are specially designed to filter out microscopic particles.

- **Avoid prolonged contact with dust from power sanding, sawing, grinding, drilling, and other construction activities. Wear protective clothing and wash exposed areas with soap and water.** Allowing dust to get into your mouth, eyes, or lay on the skin may promote absorption of harmful chemicals.



WARNING: Use of this tool can generate and/or disperse dust, which may cause serious and permanent respiratory or other injury. Always use NIOSH/OSHA approved respiratory protection appropriate for the dust exposure. Direct particles away from face and body.



WARNING: Always wear proper personal hearing protection that conforms to ANSI S12.6 (S3.19) during use. Under some conditions and duration of use, noise from this product may contribute to hearing loss.

CAUTION: When not in use, place tool on its side on a stable surface where it will not cause a tripping or falling hazard. Some tools with large battery packs will stand upright on the battery pack but may be easily knocked over.

- **Air vents often cover moving parts and should be avoided.** Loose clothes, jewelry or long hair can be caught in moving parts.
- **An extension cord must have adequate wire size (AWG or American Wire Gauge) for safety.** The smaller the gauge number of the wire, the greater the capacity of the cable, that is, 16 gauge has more capacity than 18 gauge. An undersized cord will cause a drop in line voltage resulting in loss of power and overheating. When using more than one extension to make up the total length, be sure each individual extension contains at least the minimum wire size. The following table shows the correct size to use depending on cord length and nameplate ampere rating. If in doubt, use the next heavier gauge. The lower the gauge number, the heavier the cord.

Minimum Gauge for Cord Sets

Volts	Total Length of Cord in Feet (meters)					
	120 V	25 (7.6)	50 (15.2)	100 (30.5)	150 (45.7)	
240 V	50 (15.2)	100 (30.5)	200 (61.0)	300 (91.4)		
Ampere Rating		American Wire Gauge				
More Than	Not More Than					
0	6	18	16	16	14	
6	10	18	16	14	12	
10	12	16	16	14	12	
12	16	14	12	Not Recommended		

The label on your tool may include the following symbols. The symbols and their definitions are as follows:

- V volts
- Hz hertz
- min minutes
- or DC..... direct current
- Ⓜ Class I Construction (grounded)
- .../min..... per minute
- BPM beats per minute
- IPM impacts per minute
- RPM revolutions per minute
- sfpm surface feet per minute
- SPM strokes per minute
- A amperes
- W watts
- ~ or AC..... alternating current
- ⎓ or AC/DC... alternating or direct current
- Ⓜ Class II Construction (double insulated)
- n₀ no load speed
- n rated speed
- ⊕ earthing terminal
- ⚠ safety alert symbol
- ⚠ visible radiation
- ☹ wear respiratory protection
- ⦿ wear eye protection
- 👂 wear hearing protection
- 📖 read all documentation

Motor

Be sure your power supply agrees with the nameplate marking. Voltage decrease of more than 10% will cause loss of power and overheating. DeWALT tools are factory tested; if this tool does not operate, check power supply.

COMPONENTS (FIG. A)

WARNING: Never modify the power tool or any part of it. Damage or personal injury could result.

Refer to Figure A at the beginning of this manual for a complete list of components.

INTENDED USE

Your BLACK+DECKER random orbital sander has been designed for sanding wood, metal, plastics and painted surfaces. This product is intended for household, consumer use only.

DO NOT use under wet conditions or in presence of flammable liquids or gases.

DO NOT let children come into contact with the tool. Supervision is required when inexperienced operators use this tool.

OPERATION

WARNING: To reduce the risk of serious personal injury, turn unit off and disconnect it from power source before making any adjustments or removing/installing attachments or accessories. An accidental start-up can cause injury.

WARNING: To reduce the risk of serious personal injury, read and follow all important safety warnings and instructions prior to using this tool.

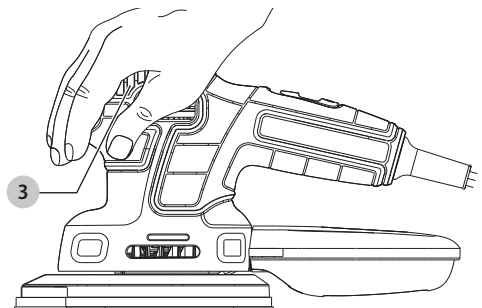
Proper Hand Position (Fig. B)

WARNING: To reduce the risk of serious personal injury, ALWAYS use proper hand position as shown.

WARNING: To reduce the risk of serious personal injury, ALWAYS hold securely in anticipation of a sudden reaction.

Proper hand position requires one hand on the main handle 3 as shown in Fig. B.

Fig. B



SAVE THESE INSTRUCTIONS FOR FUTURE USE

Switch (Fig. C, C1)

To turn the tool ON, hold it as shown in Figure C or C1 and push the on/off switch **1** toward the front of the tool. To turn the tool OFF, pull the on/off switch back toward the cord.

Fig. C

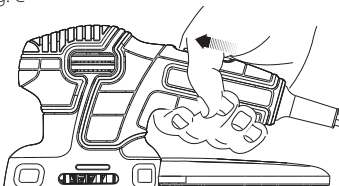
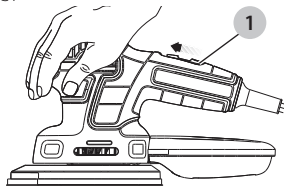


Fig. C1



Operation

Grasp product as shown in Fig. C or C1 and turn it on. **NOTE:** Do not rest fingers on platen during use. Move it in long sweeping strokes across the surface, letting it do the work. Light pressure is all that is required for sanding, polishing or scrubbing. Excessive pressure will slow the tool and produce inferior results. Check your work often, product is capable of removing material rapidly.

WARNING: Shock hazard. Under no circumstances should this product be used near water.

CAUTION: To reduce the risk of injury, turn off and unplug the tool before making any adjustments or removing or installing attachments or accessories.

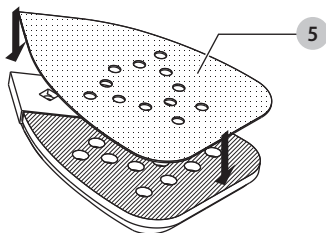
Detail Sanding

Your tool is equipped with a teardrop base which allows you to use it on large flat surfaces and tight spots or corners. The pad tips may wear unevenly, depending on use.

Fitting sanding sheets (Fig. D)

1. Hold the tool with the sanding pad **5** facing upward.
2. Place the sanding sheet onto the sanding base, ensuring all the holes of the paper line up with the holes in the sanding pad as shown in Fig. D.

Fig. D

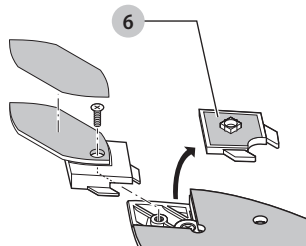


Finger Attachment (Fig. E)

The finger attachment is used for fine detail sanding.

1. Remove the screw.
2. Remove the diamond-shaped pad tip **6** from the base.
3. Fit the finger attachment onto the sanding base as shown in Fig. E.
4. Fit and tighten the screw.
5. Align the proper sanding sheet with the finger **7** attachment.

Fig. E



Dust Extraction (Fig. F)

To Empty Dust Canister:

CAUTION: Respiratory hazard. Never operate this tool for wood sanding unless the dust canister is in place. Sanding dust exhaust may create a breathing hazard.

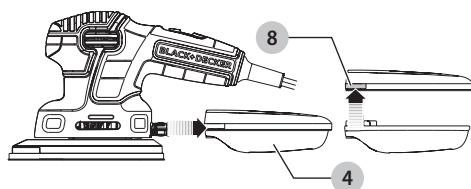
WARNING: Fire hazard. Collected sanding dust from sanding surface coatings (polyurethane, linseed oil, etc.) can self-ignite in sander dust canister or elsewhere and cause fire. To reduce risk, empty canister frequently and strictly follow sander manual and coating manufacturer's instructions.

WARNING: Fire hazard. When working on metal surfaces, do not use the dust canister or a vacuum cleaner because sparks are generated. Wear safety glasses and a dust mask. Due to the danger of fire, do not use your sander to sand magnesium surfaces. Do not use for wet sanding.

The dust collection canister **4** should be emptied after every 10 minutes of sanding.

1. While holding the sander, grasp the dust collection canister and pull it off of the sander as shown in Fig. F.
2. Hold the canister just inside a garbage can to ensure dust is contained.
3. Push up on tab **8** to separate the top of the canister from the bottom as shown in Fig. F.

Fig. F



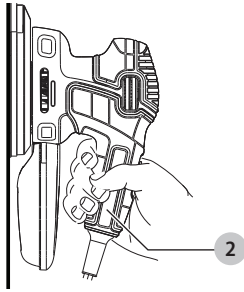
4. Gently shake or tap the top and bottom of the canister to empty.

5. Reattach the top and bottom and firmly push the canister back onto the sander.

Hints for optimum use (Fig. G)

- Do not place your hands over the ventilation slots.
- Do not exert too much pressure on the tool.
- Regularly check the condition of the sanding sheet. Replace when necessary.
- Always sand with the grain of the wood.
- When sanding new layers of paint before applying another layer, use extra fine grit.
- On very uneven surfaces, or when removing layers of paint, start with a coarse grit. On other surfaces, start with a medium grit. In both cases, gradually change to a fine grit for a smooth finish.
- When sanding on a vertical surface, hold the back handle **2** for better grip and control as shown in Fig. G.

Fig. G



MAINTENANCE

- WARNING:** To reduce the risk of serious personal injury, turn unit off and disconnect it from power source before making any adjustments or removing/installing attachments or accessories. An accidental start-up can cause injury.

Cleaning

- WARNING:** Blow dirt and dust out of all air vents with clean, dry air at least once a week. To minimize the risk of eye injury, always wear ANSI Z87.1 approved eye protection when performing this.
- WARNING:** Never use solvents or other harsh chemicals for cleaning the non-metallic parts of the tool. These chemicals may weaken the plastic materials used in these parts. Use a cloth dampened only with water and mild soap. Never let any liquid get inside the tool; never immerse any part of the tool into a liquid.

Repairs

The charger and battery pack are not serviceable.

- WARNING:** To assure product SAFETY and RELIABILITY, repairs, maintenance and adjustment (including brush inspection and replacement, when applicable) should be performed by a BLACK+DECKER factory service center or a BLACK+DECKER authorized service center. Always use identical replacement parts.

Register Online

Thank you for your purchase. Register your product now for:

- **WARRANTY SERVICE:** Registering your product will help you obtain more efficient warranty service in case there is a problem with your product.
- **CONFIRMATION OF OWNERSHIP:** In case of an insurance loss, such as fire, flood or theft, your registration of ownership will serve as your proof of purchase.
- **FOR YOUR SAFETY:** Registering your product will allow us to contact you in the unlikely event a safety notification is required under the Federal Consumer Safety Act.

ACCESSORIES

A variety of Mouse® accessories are available at extra cost. Listings per retailer may vary. Note: Use only sandpaper with holes in the same configuration as on the base of the sander. Sandpaper without holes will not allow dust to enter the canister.

The hook and loop pad and individual bases are replaceable parts. If they become worn, contact your local service center.

- WARNING:** The use of any accessory not recommended for use with this appliance could be hazardous.

APPLICATION / ACCESSORY MATRIX	
ACCESSORY	RECOMMENDED APPLICATIONS / USES
Medium grit sandpaper	Paint, varnish, rust removal
Fine grit sandpaper	Surface blending and finishing
Extra fine grit sandpaper	Sanding between coats of paint or varnish
Detail sanding tips	Corners / hard to reach places
1 OT polishing / stripping wool	Polishing metals / stripping varnish or urethane
4 OT fine polishing wool	Fine polishing, satin finish on paint / varnish / urethane
Grey foam pad	Applying and removing polish
White non-woven pad	Light scrubbing
Red non-woven pad	Heavy scrubbing / rust removal

Troubleshooting Guide

BE SURE TO FOLLOW SAFETY RULES AND INSTRUCTIONS

<i>PROBLEM</i>	<i>POSSIBLE CAUSE</i>	<i>POSSIBLE SOLUTION</i>
Unit will not start.	<p>Cord not plugged in.</p> <p>Circuit fuse is blown.</p> <p>Circuit breaker is tripped.</p> <p>Cord or switch is damaged.</p>	<p>Plug tool into a working outlet.</p> <p>Replace circuit fuse. (If the product repeatedly causes the circuit fuse to blow, discontinue use immediately and have it serviced at a BLACK+DECKER service center or authorized servicer.)</p> <p>Reset circuit breaker. (If the product repeatedly causes the circuit breaker to trip, discontinue use immediately and have it serviced at a BLACK+DECKER service center or authorized servicer.)</p> <p>Have cord or switch replaced at BLACK+DECKER Service Center or Authorized Servicer.</p>
Dust is not being collected.	<p>Sandpaper holes do not align.</p> <p>Dust canister is full.</p>	<p>Use Mouse[®] sandpaper with the appropriate hole configuration.</p> <p>Separate dust canister and gently shake or tap to empty.</p>