

BLACK+DECKER 70-615

BLACK+DECKER 70-615 8-Inch Coarse Wire Wheel Instruction Manual

For use with compatible bench grinders

1. INTRODUCTION

This manual provides essential information for the safe and effective use of your BLACK+DECKER 70-615 8-inch Coarse Wire Wheel. This accessory is designed for various surface preparation tasks when mounted on a compatible bench grinder. Please read and understand all instructions before installation and operation. The BLACK+DECKER 70-615 wire wheel is constructed from high-quality alloy steel, featuring crimped wire bristles for tough applications such as:

- Removal of rust and paint from wood and metal surfaces.
- General surface preparation prior to painting or other treatments.
- Metal finishing and polishing.

2. SAFETY INFORMATION

WARNING: Always observe basic safety precautions to reduce the risk of personal injury when using power tools and accessories. Failure to follow these warnings may result in serious injury.

- **Eye Protection:** **ALWAYS WEAR EYE PROTECTION** (safety glasses or goggles) that comply with ANSI Z87.1 standards. This is critical to protect against flying debris and detached wire bristles.
- **Operating Area Safety:** **WARN OTHERS IN OPERATING AREA** to maintain a safe distance from the bench grinder during operation. Ensure no bystanders are in the path of potential flying debris.
- **Maximum RPM:** Do not exceed the maximum operating speed of **4500 RPM** for this wire wheel. Exceeding this speed can cause the wheel to disintegrate, leading to severe injury. Ensure your bench grinder's RPM does not exceed this limit.
- **Proper Mounting:** Ensure the wire wheel is securely mounted on the bench grinder spindle according to the grinder's instructions. An improperly mounted wheel can become dislodged during operation.
- **Inspect Before Use:** Before each use, inspect the wire wheel for any damage, loose bristles, or excessive wear. Do not use a damaged wheel.
- **Workpiece Security:** Always secure the workpiece firmly. Never hold small pieces by hand directly against

the wheel.

- **Ventilation:** Work in a well-ventilated area to avoid inhaling dust and debris generated during operation.
- **Gloves:** Wear appropriate work gloves to protect hands from sharp bristles and the workpiece.

3. SETUP AND INSTALLATION

Follow these steps to safely install the BLACK+DECKER 70-615 Wire Wheel onto your bench grinder:

1. **Disconnect Power:** Ensure the bench grinder is unplugged from the power source before attempting any installation or maintenance.
2. **Remove Existing Wheel (if applicable):** If replacing an old wheel, carefully remove it according to your bench grinder's instruction manual.
3. **Inspect Spindle and Flanges:** Clean the grinder's spindle and flanges. Ensure they are free from debris, rust, or damage. The flanges should be flat and parallel.
4. **Mount Wire Wheel:** Place the BLACK+DECKER 70-615 Wire Wheel onto the grinder's spindle. Ensure the wheel fits snugly and is centered. Use any provided washers or spacers as recommended by your bench grinder's manufacturer to ensure proper fit and balance. The wheel's arbor hole is designed to fit standard bench grinder spindles.
5. **Secure with Nut:** Install the retaining nut onto the spindle and tighten it firmly with a wrench. Do not overtighten, as this can damage the wheel or spindle. The wheel should be held securely without wobbling.
6. **Adjust Tool Rests and Guards:** Adjust the tool rests to be approximately 1/16 inch (1.6 mm) from the wire wheel surface. Position the spark guards for maximum protection.
7. **Test Run:** Before using the wheel on a workpiece, stand to the side and briefly turn on the grinder to check for excessive vibration or wobble. If any issues are observed, immediately turn off the grinder, unplug it, and re-inspect the installation.



Figure 1: The BLACK+DECKER 70-615 8-inch Coarse Wire Wheel in its original packaging. This image displays the product's appearance, brand, model number (70-615), size (8"), and grit type (Coarse), along with safety warnings such as "WEAR EYE PROTECTION" and "MAX 4500 RPM".

4. OPERATING INSTRUCTIONS

Once the wire wheel is properly installed and safety precautions are in place, you can begin operation:

1. **Personal Protective Equipment:** Always wear safety glasses, hearing protection, and appropriate work gloves.

2. **Power On:** Plug in the bench grinder and turn it on. Allow the wire wheel to reach full operating speed before contacting the workpiece.
3. **Apply Workpiece:** Gently bring the workpiece into contact with the rotating wire wheel. Apply light, even pressure. Avoid excessive force, which can cause the bristles to bend or break prematurely, or cause the workpiece to kick back.
4. **Work Area:** Work on the face of the wheel, not the side, for optimal performance and safety.
5. **Direction of Rotation:** Always work on the side of the wheel where the rotation is moving downwards into the tool rest. This helps prevent the workpiece from being thrown upwards.
6. **Avoid Overheating:** Do not allow the workpiece or the wire wheel to overheat. Take breaks if necessary.
7. **Clean Regularly:** Periodically clean accumulated debris from the workpiece and the work area.
8. **Power Off:** When finished, turn off the bench grinder and wait for the wheel to come to a complete stop before leaving the machine or performing any adjustments.

5. MAINTENANCE

Proper maintenance extends the life of your wire wheel and ensures safe operation:

- **Inspection:** Regularly inspect the wire wheel for wear, damage, or missing bristles. A worn wheel will be less effective and potentially unsafe.
- **Cleaning:** After use, gently brush off any accumulated debris or material from the bristles. Do not use harsh chemicals that could damage the wire.
- **Storage:** Store the wire wheel in a dry, clean environment away from moisture and corrosive materials. Protect it from impacts that could deform the bristles.
- **Replacement:** Replace the wire wheel when bristles become excessively worn, bent, or missing, or if the wheel shows signs of damage or imbalance.

6. TROUBLESHOOTING

If you encounter issues during operation, consider the following:

- **Excessive Vibration/Wobble:**
 - Ensure the wheel is properly seated and the retaining nut is tightened.
 - Check for debris between the wheel and flanges.
 - Inspect the wheel for damage or imbalance. Replace if necessary.
- **Ineffective Cleaning/Stripping:**
 - The wire wheel may be worn out and require replacement.
 - Ensure you are applying appropriate, light pressure.
 - Verify the bench grinder is operating at an adequate speed (within the 4500 RPM limit).
- **Excessive Bristle Loss:**
 - You might be applying too much pressure.
 - The wheel may be operating at too high an RPM.
 - The wheel may be nearing the end of its service life.

7. SPECIFICATIONS

Model Number	70-615
Brand	BLACK+DECKER
Wheel Diameter	8 inches (203.2 mm)
Grit Type	Coarse
Bristle Type	Crimped Wire
Material	Alloy Steel
Maximum RPM	4500 RPM
Item Weight	1.6 pounds (0.73 kg)
UPC	028877545011

8. WARRANTY AND SUPPORT

Warranty: This BLACK+DECKER 70-615 Wire Wheel is covered by a 90-Day Money Back Guarantee. Please retain your proof of purchase for warranty claims.

For further assistance, technical support, or to inquire about warranty service, please visit the official BLACK+DECKER website or contact their customer service department. Contact information can typically be found on the product packaging or the manufacturer's official website.

You can find more information and support at the [BLACK+DECKER Store on Amazon](#).