

AS OB9030

AS OB9030 Autostarter Carbon Brush Instruction Manual

INTRODUCTION

Welcome to the instruction manual for the AS OB9030 Autostarter Carbon Brush. This document provides essential information for the proper installation, function, and maintenance of your carbon brushes. Please read this manual thoroughly before proceeding with installation or use.

PRODUCT OVERVIEW

The AS OB9030 carbon brushes are critical components designed for starter motors, facilitating the electrical connection between the stationary and rotating parts of the motor. Proper functioning of these brushes is essential for reliable engine starting. These brushes are manufactured by Autostarter under the AS brand, ensuring compatibility and performance.



Image: Two AS OB9030 Autostarter Carbon Brushes. These brushes are typically made of carbon or graphite and feature a braided copper wire for electrical connection.

SAFETY INFORMATION

Always prioritize safety when working with automotive electrical components. Failure to follow these safety guidelines may result in injury or damage to the vehicle.

- Always disconnect the negative terminal of the vehicle's battery before performing any work on the starter motor or electrical system to prevent electrical shock or short circuits.
- Wear appropriate personal protective equipment (PPE), such as safety glasses and gloves, during installation.
- Ensure the work area is well-lit and free from obstructions.
- If you are unsure about any step or lack the necessary tools, consult a qualified automotive technician.

INSTALLATION INSTRUCTIONS

Replacing carbon brushes in a starter motor requires mechanical aptitude and specific tools. If you are not comfortable with this procedure, seek professional assistance.

1. **Preparation:** Disconnect the negative terminal of the vehicle's battery. Locate and remove the starter motor from the vehicle according to your vehicle's specific service manual.
2. **Disassembly:** Carefully disassemble the starter motor to access the brush holder assembly. Pay close attention to the orientation and connection points of the old brushes.
3. **Old Brush Removal:** Desolder or unclip the old carbon brushes from their connections. Thoroughly clean any carbon dust or debris from the commutator and brush holder using a non-conductive cleaner.
4. **New Brush Installation:** Install the new AS OB9030 carbon brushes into the brush holder. Ensure they slide freely and make proper, firm contact with the commutator.
5. **Connection:** Securely solder or clip the new brushes to their respective connection points, ensuring a strong and reliable electrical connection.
6. **Reassembly:** Carefully reassemble the starter motor, ensuring all components are correctly seated and tightened to manufacturer specifications.
7. **Testing:** Reinstall the starter motor into the vehicle and reconnect the battery. Test the starter motor's operation by attempting to start the engine.

OPERATING PRINCIPLES

Carbon brushes are consumable components that conduct electrical current from the stationary part of the starter motor to its rotating armature. This current creates the magnetic field necessary for the motor to turn. Over time, brushes wear down due to friction and electrical arcing. When brushes become too short, they can no longer make consistent contact with the commutator, leading to reduced performance or complete starter motor failure. The AS OB9030 brushes are designed for optimal conductivity and durability within compatible starter motor systems, ensuring efficient power transfer.

MAINTENANCE

Carbon brushes are wear items and do not typically require routine maintenance beyond their initial installation. However, regular inspection of the starter motor during other vehicle maintenance can help identify excessive brush wear or carbon dust buildup. If the starter motor exhibits symptoms such as slow cranking, intermittent operation, or failure to engage, brush inspection is recommended as a primary diagnostic step.

TROUBLESHOOTING COMMON ISSUES

If you experience issues with your starter motor after brush replacement, consider the following:

- **Starter Motor Clicks but Doesn't Turn:** This could indicate worn brushes (if not replaced correctly), a faulty solenoid, or a weak battery. Re-inspect brushes for proper contact and length.
- **Slow Cranking:** May be caused by insufficient brush contact, a weak battery, or poor electrical connections. Verify brush length and ensure all connections are clean and tight.
- **No Starter Response:** Could be due to completely worn brushes (if the issue persists), an open circuit in the wiring, or a faulty ignition switch. Verify brush continuity and all electrical paths.

Always ensure the vehicle's battery is fully charged and all electrical connections are clean and tight

before diagnosing starter motor issues.

PRODUCT SPECIFICATIONS

Feature	Detail
Brand	AS
Model Number	OB9030
Manufacturer	Autostarter
Item Weight	10 g
Package Dimensions	2.5 x 2 x 1 cm
Assembly Required	No (for the brush itself; installation into a starter motor requires assembly)
First Available Date	28 November 2019

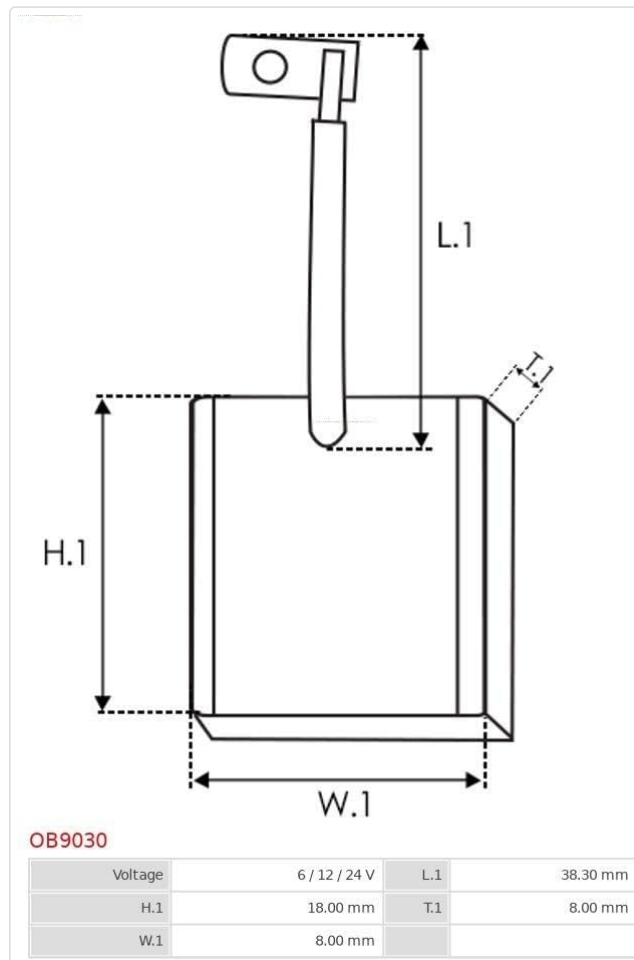


Image: Technical drawing illustrating the dimensions of the AS OB9030 carbon brush, including voltage compatibility (6/12/24V) and physical measurements (H.1: 18.00 mm, W.1: 8.00 mm, L.1: 38.30 mm, T.1: 8.00 mm).

WARRANTY AND SUPPORT

For specific warranty information or technical support regarding the AS OB9030 carbon brushes, please refer to the manufacturer's official documentation that accompanied your purchase or contact your point

of purchase directly. Manufacturer contact details may also be available on the product packaging.

This manual is for informational purposes only. AS and Autostarter are not responsible for any damage or injury resulting from improper installation or use of this product.