



Schunk Carbon Technology

# Industrial Motors and Mass Transit Technology

Carbon Brushes – Order Guide



# Carbon Brushes - Order Guide

With this information sheet we like to give our customers a tool to facilitate the order procedures of carbon brushes. It will show on the following pages the information required, to enable us to suggest the most appropriate carbon design and carbon grade for your application. It further assures a speedy and smooth handling of any order.

The easiest and fastest way for us to determine the correct design, is to receive a new or used sample of your present brush. This will eliminate the need to furnish other pertinent information regarding the proper design.

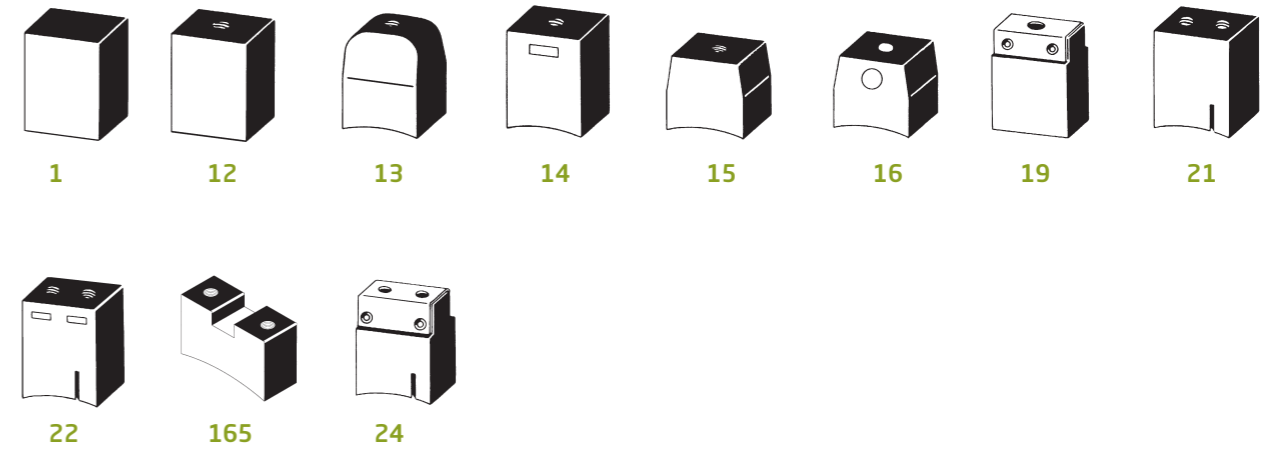
Should it however not be possible to provide an actual sample, we kindly request as much information as possible. This order guide will be a tool to help establish the required data.

We kindly ask you to fill out the Carbon Brush Order Guide as complete as possible and record in particular the presently used carbon grade.

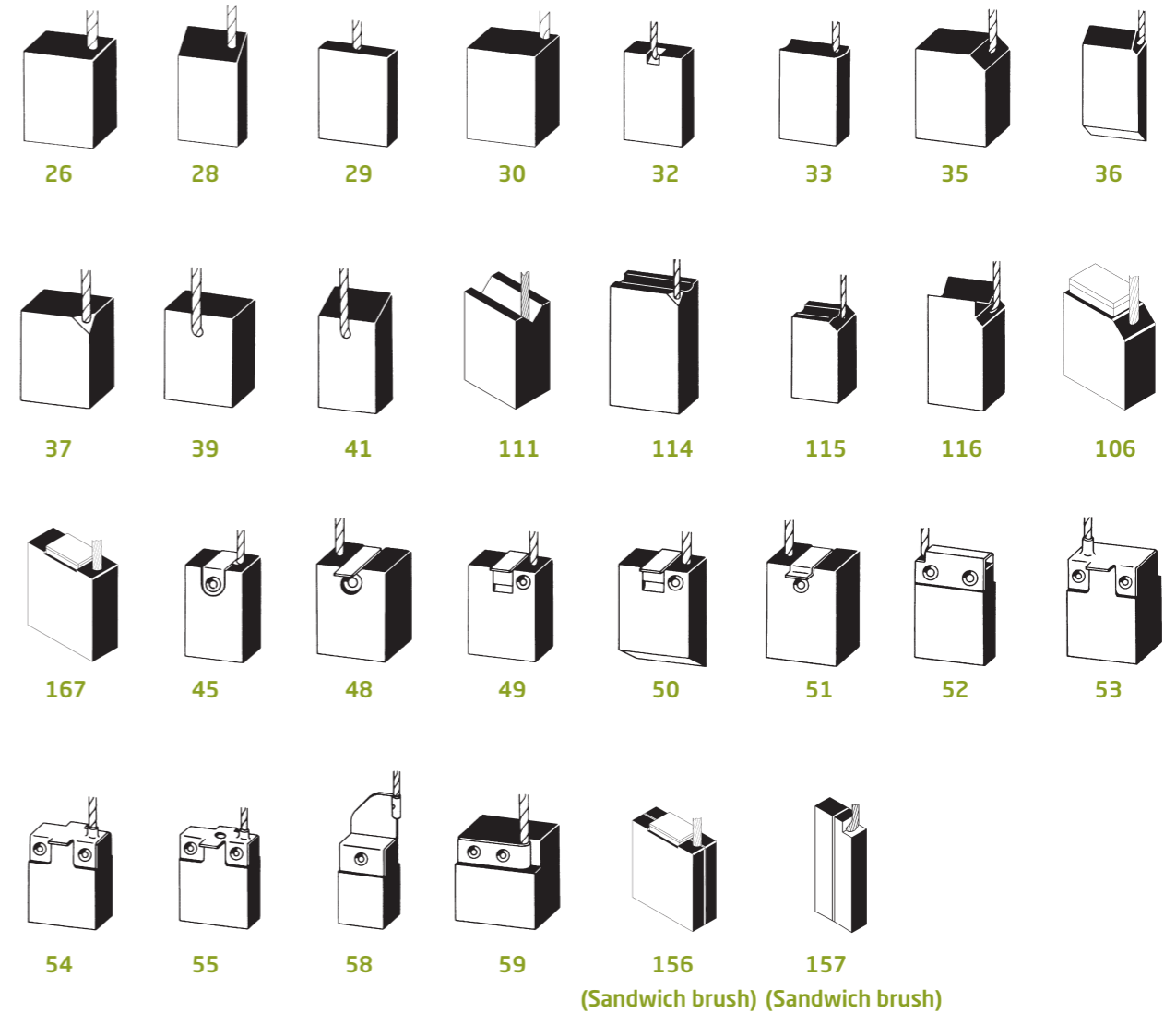
Our manufacturing program covers carbon brushes for any possible electro motor application. Many styles are available ex stock on short notice.

For carbon brushes with attachments we reserve the right to provide the most suitable method of mounting between carbon brush and shunt, and between shunt and shunt-terminal.

## Block brushes, without shunts



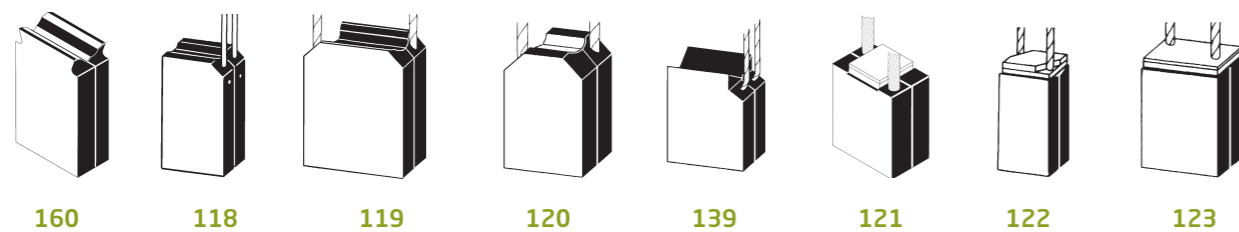
## Block brushes, one shunt



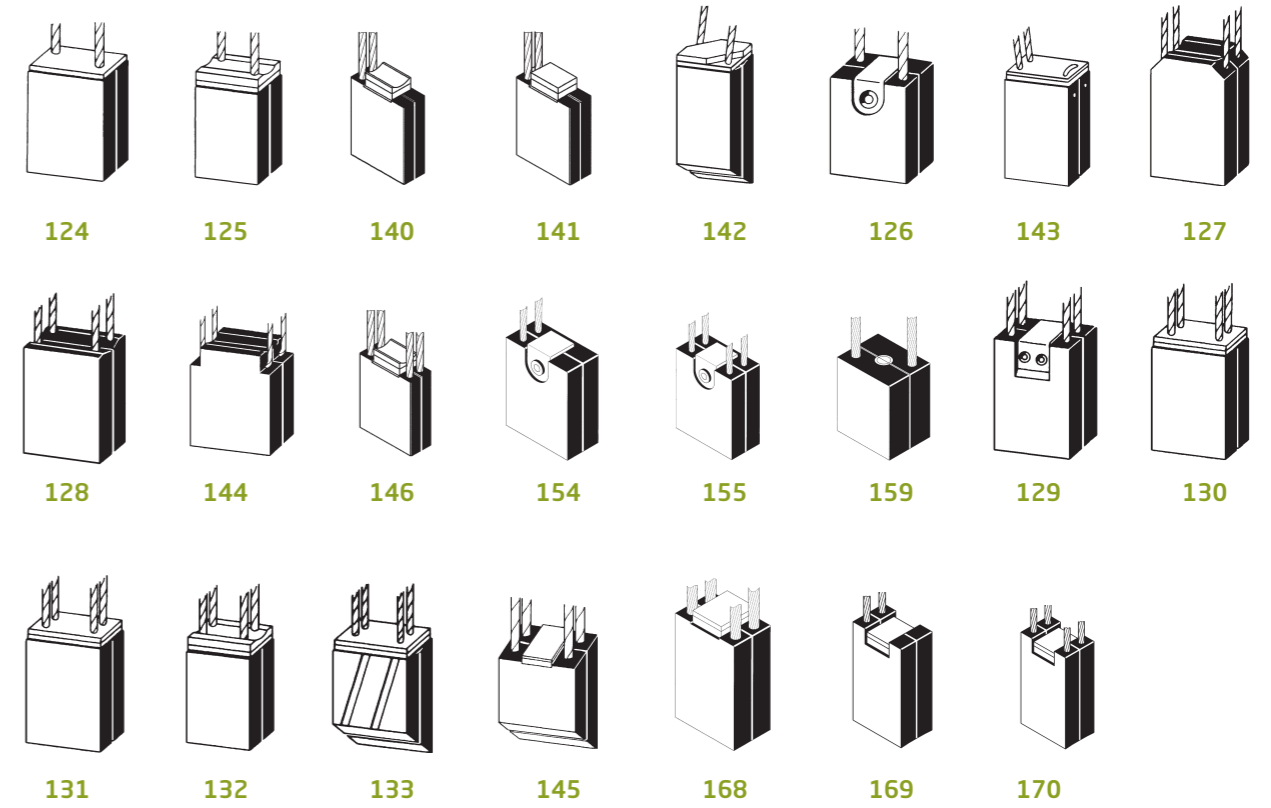
Block brushes, two or more shunts



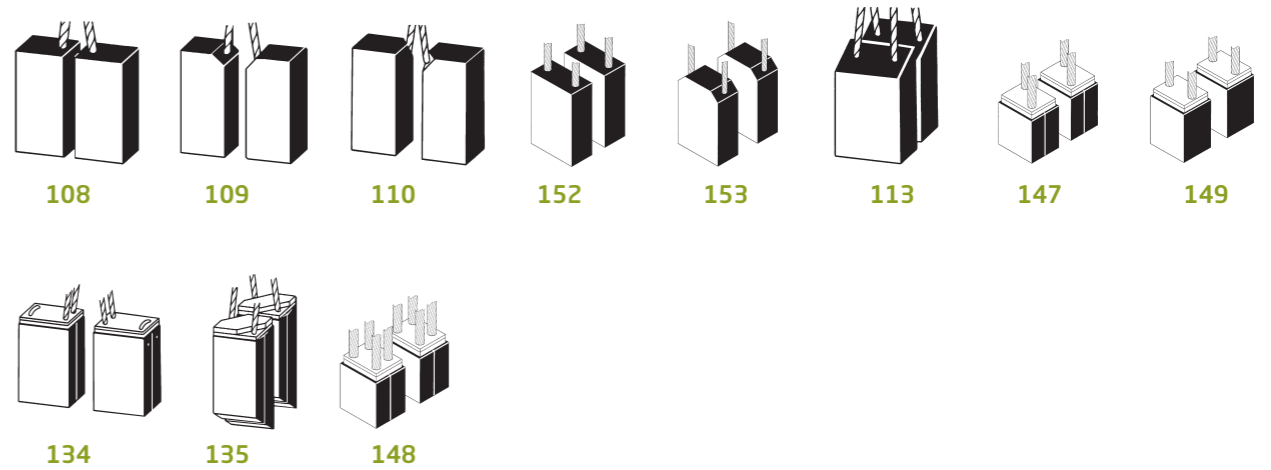
Twin brushes



Twin brushes or split brushes



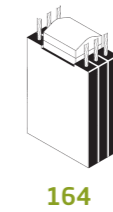
Pair brushes



Block brush - triple mounted

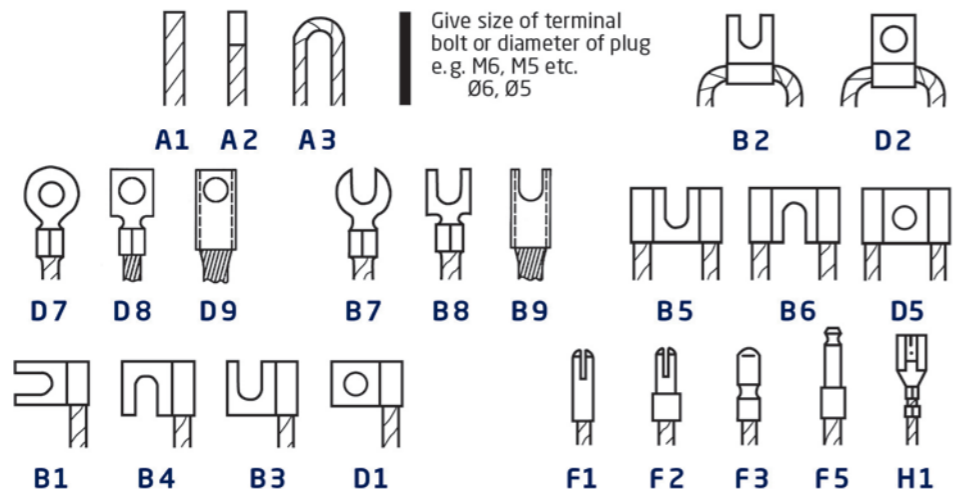


Triple brush



# Shunt

- Terminal
- Design

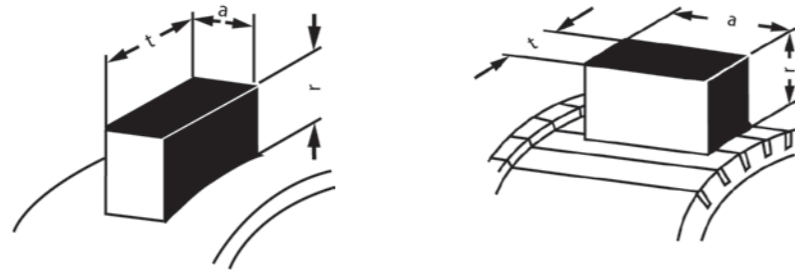


# Brush Dimensions

The dimensions of carbon brushes are measured in the following sequence

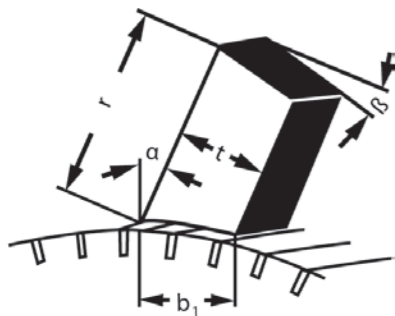
**t x a x r**

- t** = tangential (in direction of circumference - i. e. thickness)
- a** = axial (in direction of axle - i. e. width)
- r** = radial (in direction of diameter - i. e. length, incl. head plate)

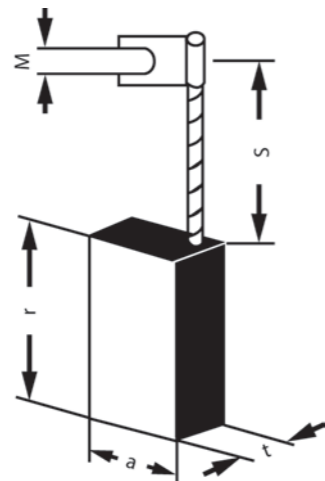


Please be request to indicate the dimensions in this sequence.

If other than rectangular designs of carbon brushes are required, please indicate additional information, e. g. bevel of contact surface, contact surface slots, etc. For beveled brushes please specify the angle of running- and head-bevel.



For carbon brushes with fittings additional information is required. Please see the following **example**:



Explanation:  
 S = Shunt length, measured from top of brush to center of terminal, respectively center of terminal bolt  
 M = Size of terminal bolt, e. g. "M6"

**Example**  
 Brush Design: Figure No. 26 (see page 3)  
 Brush Dimension:  
 t x a x r  
 e. g. 10 x 25 x 32mm  
 Shunt Length:  
 S = e. g. 75mm  
 Design of Terminal:  
 e. g. Figure No. B1  
 Width of Slot:  
 e. g. 6 mm (M6)

# Carbon Brushes Order guide

**Customer address**

Name \_\_\_\_\_  
 Street \_\_\_\_\_  
 Postal Code \_\_\_\_\_  
 City \_\_\_\_\_

RFQ / order no. \_\_\_\_\_  
 Quantity \_\_\_\_\_  
 Email \_\_\_\_\_

**Brush design**

Brush design  
 Figure no. \_\_\_\_\_

Brush dimensions  
 t \_\_\_\_ x a \_\_\_\_ x r \_\_\_\_ mm

Upper angle  
 7,5°  15°  30°

Lower angle  
 7,5°  15°  30°

if running surface radiused:  
 Commutator ø \_\_\_\_\_ mm  
 Slipring ø \_\_\_\_\_ mm

Flex  
 Length \_\_\_\_\_ mm  
 Insulation   
 Tinned   
 Plain

Terminal  
 Figure no. \_\_\_\_\_  
 Gap \_\_\_\_\_ mm  
 Hole ø \_\_\_\_\_ mm

**Brush grade**

(\* to be completed, if grade unknown)

Machine manufacturer\* \_\_\_\_\_

Commutator   
 Slipring

Machine type\*  
 Motor   
 Generator

Type of current  
 DC   
 AC

Normal voltage \_\_\_\_\_ V  
 Normal current \_\_\_\_\_ A

For DC-Machines - Number of poles \_\_\_\_\_  
 Number of carbon brushes per pole \_\_\_\_\_

For slip ring drives - Number of rings \_\_\_\_\_  
 Number of carbon brushes per ring \_\_\_\_\_

Current brush grade  
 \_\_\_\_\_

Notes  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_

## **Schunk Carbon Technology: Always by your side.**

Schunk Carbon Technology focuses on the development, manufacture and application of carbon and ceramic solutions. It combines an innovative spirit and technological expertise with exceptional customer service to provide a range of products and services unparalleled in the market.

With Schunk Carbon Technology, you have a partner who can offer all the technological possibilities of an international company and implement ideas tailor-made for your needs, both for high-volume industrial markets and highly specialized niche markets.

### **A Schunk Group division**

Enabling, idea-driven, cooperative - If you wish to apply technology to develop better products and capture new markets, we are the ideal partner.

The Schunk Group has been supporting customers with innovative technologies since 1913. As an idea-driven technology company, innovation is fundamental to our culture. We forge long-lasting, cooperative working relationships with our customers.

You will find our custom-made, high-tech products and systems in markets such as: carbon technology and ceramics, environment simulation and air-conditioning technology, sintered metal and ultrasonic welding. The Schunk Group is active in a large number of key industries, from automotive, rail, aviation and marine technologies to solar and wind energy, to the chemical and machine production industries. Our 8,500 employees in 29 countries are ready to serve you.

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