#### **ZOOM**

# **GRADE AC137**

## CARBON BRUSHES FOR TRACTION MOTORS



### **AC137, MERSEN'S RELIABLE SOLUTION**

Mersen is a world leader in the manufacturing of carbon brushes for all types of motors and generators.

After extensive years of experience, grade AC137 has been developed specifically for railway and transit traction motors. Today AC137 is used worldwide and provides a good technical and economical performance.

### **TAILORED BRUSH FEATURES**

Mersen can supply you with carbon brushes of various designs, including shapes, components and sizes, with a high quality of manufacturing, in particular cable connection by tamping.

When required, we could adjust the design (grade, cable, top pad, wafer size...) to adapt the carbon brush specifically to your DC motor for its application.

### MERSEN PROPERTY

### AC137 advantages:

- Impregnated grade for higher mechanical strength
  - Good operation in severe conditions
  - Low wear rate
  - Consistent brush life
- Good commutation over a wide range of speeds and environmental conditions
  - Consistent commutating performance
  - No flashovers or other damaging events

With good commutation ability, no abrasiveness, and special impregnation, the grade **does not** attack the commutator:

- Longer maintenance periods between rectifications
- Longer commutator life



### **GRADE SPECIFICATION**

PHYSICAL CHARACTERISTICS according to IEC 60413:1972			
Classification	ELECTROGRAPHITE		
Metal content	0%		
Resistivity	5,100 / 0.002	μΩ.cm / Ω.in	
Flexural strength	41 / 5,800	MPa / PSI	
Shore hardness	80	-	
Bulk density	1.72	-	

RECOMMENDED RUNNING CONDITIONS			
Current density	8 – 12 / 52 - 77	A/cm <sup>2</sup> / A/in <sup>2</sup>	
Peripheral speed	<50 / <10,000	m/s / ft/min	
Pressure	Depending on application		

Contact us to request our complete technical data sheets as well as our safety data sheets.

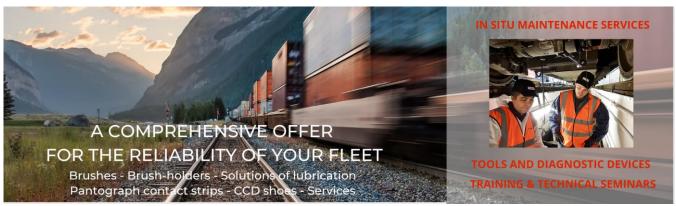
#### A WORLD-RENOWNED GRADE

Operational properties can be optimized by enhancing the mechanical stability (shape, components, friction coefficient) and performances (voltage drop at contact, commutation ability, load capacity), reducing the sensitivity to environmental condition (protecting / polishing / lubricating action on the commutator skin), etc. The function of a good brush is further explained in our technical data sheet reference TDS-01.

### MERSEN SERVICES

Mersen, as a reference supplier of electric motor manufacturers, also offers dedicated services of refurbishment, replacement of brushes and brush-holders, re-engineering and trainings.





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PTT-AC137-EN-2208

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