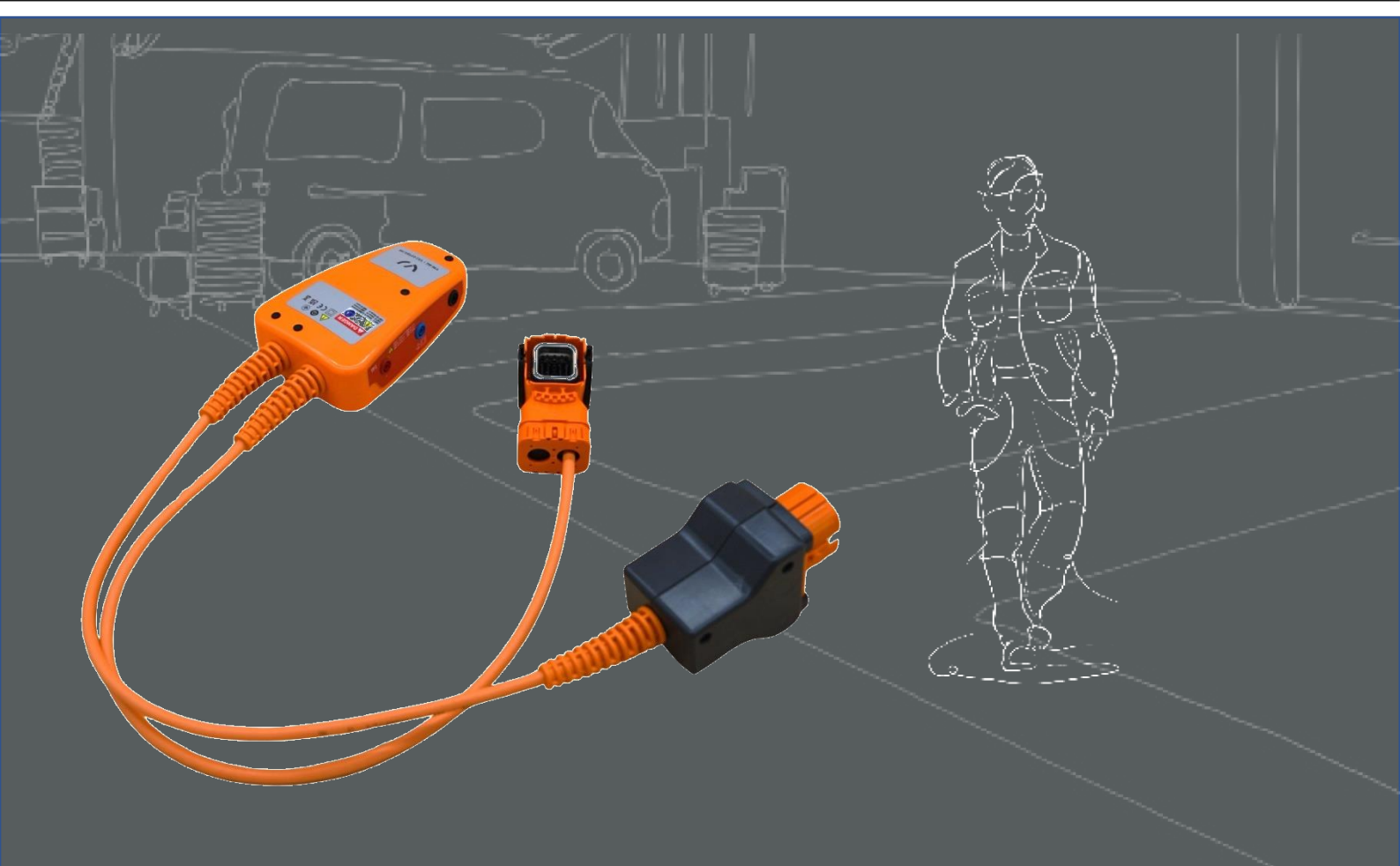


VOLKSWAGEN

AKTIENGESELLSCHAFT



Operating Manual

High-Voltage Test Adapter VAS 6558A/46



Revision	Date	Reason
V00	04.12.2023	First edition

Imprint

Manufacturer

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duplication

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Preliminary remarks

Read these operating instructions carefully before using the product.

The product comes with a USB stick on which the operating instructions are stored in various national languages. The current version and other national languages can be found on our homepage.

The operating instructions are an essential part of the product and must be kept together with the product. If the property is sold or transferred, the operating instructions must be handed over to the new operator.

In addition to these operating instructions, all relevant regulations for diagnosing or troubleshooting intrinsically safe high-voltage systems in road vehicles are binding. This includes, among other things, the instructions for the vehicle manufacturer's respective diagnostic systems as well as operational safety requirements and the state of the art in dealing with high-voltage systems.

Validity of the declaration of conformity

The issued declaration of conformity applies to the product described in the operating instructions. In the event of changes, conversions or extensions, the declaration of conformity and the risk assessment lose their validity.

Manufacturer information

Akkuteam Energietechnik GmbH

akkuteam is a specialist provider of battery and backup power technology. We ensure grid-independent electrical energy supply in mobile and stationary areas.

We are an owner-managed, medium-sized family business. Our GmbH can now look back on 25 years of company history, which has always been characterized by strong growth. With currently over 70 employees, we work at 2 locations in southern Lower Saxony and from there we offer a nationwide service and even a global service for the automotive sector.

Our core competencies consist of project planning, sales and maintenance of stationary and mobile battery systems as well as energy storage systems, static uninterruptible power supply systems, safety lighting systems and power generators. With our products, we serve an electrical power range from a few watts to several megawatts. We round off our product portfolio with a qualified range of services. With around 25 technical employees and fitters, we carry out all assembly, maintenance and repair work required for our product areas.

This safety chapter informs you about the following:

- Warning levels contained in this operating manual
- Important safety information about the product,
- Intended use of the product,
- Requirements for the target group.

These operating instructions are exclusively valid for the following product:

Item number: ASE 405 489 00 000

Designation: High-Voltage Test Adapter VAS 6558A/46

Warning levels

This chapter informs you about the warning levels that you will find in this operating manual.

DANGER

Failure to follow the safety instructions **WILL** result in death or serious bodily injury!

WARNING

Failure to follow the safety instructions **CAN** result in death or serious bodily injury!

CAUTION

If the safety instructions are ignored, minor physical injury **MAY** result!

DANGER

Failure to observe the safety instructions could result in damage to the product!

Important safety instructions

This chapter informs you about the safety instructions that must be observed when handling the product.



DANGER

Danger to life due to electrical voltage!

The electrical voltage in other systems is life-threatening and will result in death from electric shock!

- Do not use the product for measurements on mains circuits!
- Never attempt to power other devices via the product!



WARNING

Danger to life due to electrical voltage!

The electrical voltage in high-voltage systems is life-threatening and can lead to death from electric shock!

Short circuits can occur due to liquids, condensates and high humidity!

- Prevent the product from coming into contact with liquids!
- Only use the product in closed and dry rooms!



WARNING

Danger to life due to electrical voltage!

The electrical voltage in the product is dangerous and can lead to serious injury and death from electric shock!

Defective and damaged products cannot reliably guarantee protection against electrical voltage!

- Prevent the product from coming into contact with chemicals!
- Replace a defective or damaged product immediately!
- Never attempt to repair or tamper with the product!

Intended Use

Use the product exclusively in accordance with these operating instructions, otherwise the protection against electrical hazards provided for in the product is no longer guaranteed.

The product is used to adapt the high-voltage measuring module VAS 6558/VAS 6558A to the vehicle-side plug connection specified by the vehicle manufacturer in the guided troubleshooting.

The product may be used to check the absence of voltage!

The product is suitable for the following measurements:

- Insulation resistance measurement
- Continuity measurement

Vehicle manufacturers within the meaning of these operating instructions are exclusively vehicle manufacturers of the Volkswagen Group.

Any use beyond this is prohibited.

Requirements for the target group

Work on the product may only be carried out by qualified specialist personnel!

Qualified personnel as defined in these operating instructions meet all requirements applicable in the user country for work on high-voltage systems, accordingly:

- Regulations valid in the user country,
- Qualification according to DGUV 200-005 at least level 2 or equivalent,
- Vehicle manufacturer and operational specifications.

When using the product, the personal protective equipment specified by the vehicle manufacturer for work on high-voltage systems must be worn at all times.

Obligations of the operator

The operator must ensure that personnel working on the measuring adapter meet the requirements of the target group.

The operator is also responsible for compliance with the following points:

- The measuring adapter is always in perfect and defect-free condition.
- The regular test periods of the measuring adapter are adhered to and recorded.

Scope of delivery

Immediately check the condition and completeness of the scope of delivery. If there are any defects, contact the manufacturer immediately.



- (1) High-voltage test adapter
- (2) USB stick with operating instructions

Construction










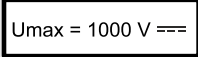


Structure of the product:



- (1) Connection plug
- (2) Connection socket
- (3) Test sockets (see circuit diagram on housing)

Symbols and connections




The following symbols are shown on the product:

Symbol	Meaning
	General warning signs
	Electrical hazard! Read the operating instructions!
	The serial number, together with the manufacturer part number, is used to identify the product.
	The manufacturer part number, together with the serial number, is used to identify the product.
	The product complies with protection class II and therefore has reinforced or double insulation between active and accessible parts in accordance with VDE 0100, part 410/412.1.
	The disposal instructions prohibit the disposal of the product with household waste. Always dispose of the product in compliance with all current local disposal regulations.
	The CE marking certifies that the product complies with all applicable European regulations and has undergone the prescribed conformity assessment procedure.
	The test seal indicates that the product is approved for use in the vehicle manufacturer's workshops and production facilities.
	The c-us mark identifies the product as a safe product tested and certified by an NRTL in accordance with applicable standards.
	Marking that the product is intended for measurements up to a maximum of 1000 V according to IEC 61010-31.
	Line identification as assignment to the connection area TP1.
	
	Circuit diagram scheme (see circuit diagram)

The product has the following connection areas:

- TP1

Each connection area has the following test sockets:

Connection	function
	Ground socket
	Plus socket
	Minus socket

Technical data

Rated data	Values
Manufacturer number	22104188
Maximum rated voltage	1000 V/DC
Maximum rated current	10 A
Protection class	II / double insulated
Weight	~ 1160g
Dimensions L/H/W	~600mm/400mm/400mm
Cable length	850 mm

Environmental conditions	Operation	storage	Transport
temperature	5°C to 40°C	-20°C to 60°C	-20°C to 60°C
Height above sea level	max. 2000 m	No restriction	
humidity	max. 80% to 31°C, decreasing linearly to 50% at 40°C	max. 85 %	
	No condensation allowed. Maximum allowable relative humidity 60% if corrosive gas/air is present.		

This chapter informs you about the following activities:

- Installation,
- loosening the plug connection,
- Cleaning,
- storage and transport,
- Disposal,
- Maintenance.



WARNING

Danger to life due to electrical voltage!

The electrical voltage in high-voltage systems is life-threatening and can lead to death from electric shock!

- Only use the product for the area of application intended by the vehicle manufacturer!



DANGER

Risk of damage!

Plug connections snap into place when connected.

- Unlock the plug connections before disconnecting them! (see chapter “ Releasing the plug connections ”)

Installation

Measurement

1. Follow the safety instructions.



2. Connect the connection socket to the removed plug of the connection to be tested.
 3. Lock the connection.
 4. Connect the high-voltage measuring module to the high-voltage test adapter according to the guided troubleshooting procedure. Use the test sockets in the red connection area.
- ✓ You can now carry out the measurements according to the guided troubleshooting.

Loosen the plug connections



WARNING

Danger of explosion!

Components of the product can cause sparks and arcs.

- Never disconnect plug connections of the high-voltage cables under load!
- Do not use the product in potentially explosive areas!
- Make sure that the product is at least 50 cm above the ground when in use!

The plug connections have automatic locking. To disconnect the respective plug connection:

1. Open the black latch.
2. Pull the plug connection completely apart.



- ✓ The plug connection is loosened.

Cleaning



DANGER

Danger to life due to electrical voltage!

The electrical voltage in high-voltage systems is life-threatening and will lead to death from electric shock!

- Disconnect the product from all power sources before cleaning the product!

Pay attention to the safety instructions!

The product may only be cleaned with a dry cloth.

Storage and transportation

When the product is not in use, store it in a dry and dust-free place.

Disposal

Pay attention to the safety instructions!

Always dispose of the product in compliance with all current local disposal regulations.

Maintenance

Pay attention to the safety instructions!

The national and local requirements for regular testing must be adhered to!

Check the product's functionality at intervals of no more than 24 months.

For a professional functional test, contact the manufacturer.

Warranty

The product comes with a warranty period of 24 months.

The warranty refers to a production defect or a clearly detectable defect in the product that is not due to user error.

All inquiries in this regard must be reported to the wholesaler with appropriate photo documentation, detailed description of the error and serial number.

Customer service

If you have general questions about usage and functionality, please contact the following support:

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