EXTECH DV20 Non-Contact Voltage Detector and Flashlight User Manual

Contents

EXTECH

EXTECH DV20 Non-Contact Voltage Detector and Flashlight

Intended use

The “Non-contact voltage tester” detects steady state electrostatic field generated by AC voltage via insulation without requiring contact to the bare conductor. A red glow at the tip indicates the presence of voltage. The device must be operated exclusively by AAA batteries. Contact with moisture must be avoided by all means possible. This product fulfills European and national requirements related to electromagnetic compatibility (EMC). CE conformity has been verified and the relevant statements and documents have been deposited at the manufacturer.
Unauthorized conversion and/or modification of the device are inadmissible because of safety and approval reasons (CE).
Any usage other than described above is not permitted and can damage the product and lead to associated risks such as short-circuit, fire, electric shock, etc. Please read the operating instructions thoroughly and keep them for further reference.

Symbols explanation

An exclamation mark within an equilateral triangle indicates important information in the operating instructions. Carefully read the whole operating instructions before operating the device, otherwise there is risk of danger. The lightning symbol with arrowhead within an equilateral triangle is intended to alert the user to the presence of uninsulated voltage within the device’s enclosure that may be of sufficient magnitude to constitute a risk of electrical shock to persons. This device provides basic insulation with supplementary insulation. This device is designed to protect against transient voltages from fixed installations and for cases where the reliability and the availability of the equipment are subject to special requirements. Examples include building wiring, industrial equipment with permanent connection to fixed installation.

Safety instructions

We do not assume liability for resulting damages to property or personal injury if the product has been abused in any way or damaged by improper use or failure to observe these operating instructions. The warranty will then expire! The icon with exclamation mark indicates important information in the operating instructions. Carefully read the whole operating instructions before operating the device, otherwise there is risk of danger.

Product safety

- The voltage between the measuring device and earth must not exceed 600V in overvoltage category III.
- This device can be used in environment where only non-conductive pollution occurred or temporary conductivity caused by condensation occurred occasionally.

- The device must not be subjected to heavy mechanical stress.
- The device must not be exposed it to extreme temperatures, direct sunlight, intense vibration or dampness.
- The device must not be exposed to humidity or liquids. It must be used under appropriate weather conditions only or with appropriate protection in case of outdoor use.
- When operating the device, please equip proper protective equipment as required by local or national authorities.

Battery safety

- Correct polarity must be observed while inserting the batteries. (“+” = positive; “–” = negative).
- Batteries should be removed from the device if it is not used for a long period of time to avoid damage through leaking. Leaking or damaged batteries might cause acid burns when in contact with skin, therefore use suitable protective gloves to handle corrupted batteries.
- Batteries must be kept out of reach of children. Do not leave the battery lying around, as there is risk, that children or pets swallow it.
- All the batteries should be replaced at the same time. Mixing old and new batteries in the device can lead to battery leakage and device damage.
- Batteries must not be dismantled, short-circuited or thrown into fi re. Never recharge non-rechargeable batteries. There is a risk of explosion!

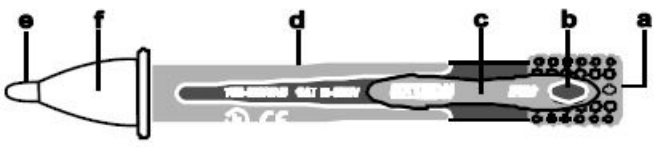
Miscellaneous

- The product is not a toy and should be kept out of reach of children and pets!
- On commercial premises, the accident prevention regulations of the Association of Industrial Professional Associations with respect to electrical systems and operating equipment must be observed.
- In schools, training centers, Hobby and DIY workshops, the handling of measuring appliances must be responsibly supervised by trained personnel.
- Servicing, adjustment, or repair works must only be carried out by a specialist/ specialist workshop.

Operating Elements

- Battery compartment cap
- LED light switch
- Detector clip
- Detector grip area
- Detector tip
- LED light

Operation



Before each use, test the device on known working circuit that is within the rating of this device. Place the tip of the device near an AC voltage. Upon detection, the tip will glow. If there is no indication, voltage could still be present. Operation may be affected by differences in socket design and insulation thickness and type. The device cannot detect voltage inside armored cable or cable in conduit, behind panels or in metallic enclosures. In additional, an LED flashlight can be turned on by pressing the LED light switch (b).

Battery replacement

If the indicator becomes dim, replace the battery as soon as practical.

1. Left the clip (c) up carefully and push the battery compartment cap (a) out.
2. Replace the used battery with two new AAA batteries.
3. Replace the cap (a) until engage audibly.
4. Device turns on once the batteries are inserted.

Disposal: Follow the valid legal stipulations in respect of the disposal of the device at the end of its lifecycle

Maintenance

Switch off the appliance before cleaning the appliance with dry, anti-static cloth only. Do not use abrasive or solvents!

Technical data

Voltage sensing range	100 – 600V~, 50/60Hz
Overvoltage category	600V, CAT III
Pollution degree	2
Operating temperature	32°F to 122°F
Battery type	2 x AAA (NEDA 24A, R03 or micro cell)

Two-year Warranty

Teledyne FLIR LLC warrants this Extech brand instrument to be free of defects in parts and workmanship for two years from date of shipment (a six-month limited warranty applies to sensors and cables). To view the full warranty text please visit: **http://www.extech.com/support/warranties.**

Calibration and Repair Services

Teledyne FLIR LLC offers calibration and repair services for the Extech brand products we sell. We offer NIST traceable calibration for most of our products. Contact us for information on calibration and repair availability, refer to the contact information below. Annual calibrations should be performed to verify meter performance and accuracy. Product specifications are subject to change without notice. Please visit our website for the most up-to-date product information: **www.extech.com.**

Contact Customer Support

- Customer Support Telephone List: **https://support.flir.com/contact**

- Calibration, Repair, and Returns: repair@extech.com
- Technical Support: https://support.flir.com

Documents / Resources

	EXTECH DV20 Non-Contact Voltage Detector and Flashlight [pdf] User Manual DV20 Non-Contact Voltage Detector and Flashlight, DV20, Non-Contact Voltage Detector and Flashlight, Flashlight, Voltage Detector

References

- Extech is now on FLIR.com | Teledyne FLIR
- Extech is now on FLIR.com | Teledyne FLIR
- Extech Product Warranty | Teledyne FLIR
- support.flir.com
- support.flir.com/
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