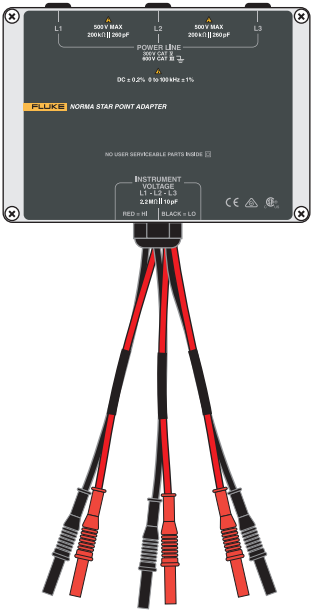
Norma Star Point Adapter

Instructions

Introduction

The Norma Star Point Adapter (the Product) generates a virtual star point in 3-phase delta systems without neutral for measuring purposes and provides:

- Maximum 500 V Phase-to-Phase
- High frequency range 100 kHz
- Compensated phase angle
- Basic uncertainty ±0.2 %
- Insulation 600 V CAT III
- Safety input plugs
- Insulated safety output connectors



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How to contact Fluke

To contact Fluke, call one of the following telephone numbers:

- Technical Support USA: 1-800-44-FLUKE (1-800-443-5853)
- Calibration/Repair USA: 1-888-99-FLUKE (1-888-993-5853)
- Canada: 1-800-36-FLUKE (1-800-363-5853)
- Europe: +31 402-675-200
- Japan: +81-3-6714-3114
- Singapore: +65-6799-5566
- Anywhere in the world: +1-425-446-5500

Or, visit Fluke's website at www.fluke.com.

Go to www.fluke.com to register your product and find more information.

To view, print, or download the latest manual supplement, visit http://us.fluke.com/usen/support/manuals.

Safety

A **Warning** identifies conditions and procedures that are dangerous to the user.

⚠⚠ Warning

To prevent possible electrical shock, fire, or personal injury:

- **Read all safety information before you use the Product.**
- **Carefully read all instructions.**
- **Have an approved technician repair the Product.**
- **Do not alter the Product and use only as specified, or the protection supplied by the Product can be compromised.**
- **Comply with local and national safety codes. Use personal protective equipment (approved rubber gloves, face protection, and flame-resistant clothes) to prevent shock and arc blast injury where hazardous live conductors are exposed.**
- **Examine the case before you use the Product. Look for cracks or missing plastic. Carefully look at the insulation around the terminals.**
- **Do not use the Product if it is altered or damaged.**
- **Do not exceed the Measurement Category (CAT) rating of the lowest rated individual component of a Product, probe, or accessory.**
- **Limit operation to the specified measurement category, voltage, or amperage ratings.**
- **Do not use the Product around explosive gas, vapor, or in damp or wet environments.**
- **Connect the Product to the measurement instrument before you connect it to the distribution system.**

Symbols

The table below is a list of symbols used on the Product or in this document.

Symbol	Definition
	WARNING - RISK OF DANGER. Consult user documentation.
	WARNING. HAZARDOUS VOLTAGE. Risk of electric shock.
	Consult user documentation.
	Double Insulated
	Earth
	Conforms to relevant Australian Safety and EMC standards.
	Certified by CSA Group to North American safety standards.
CE	Conforms to European Union directives.
CAT III	Measurement Category III is applicable to test and measuring circuits connected to the distribution part of the building's low-voltage MAINS installation.
CAT IV	Measurement Category IV is applicable to test and measuring circuits connected at the source of the building's low-voltage MAINS installation.
	This product complies with the WEEE Directive marking requirements. The affixed label indicates that you must not discard this electrical/electronic product in domestic household waste. Product Category: With reference to the equipment types in the WEEE Directive Annex I, this product is classed as category 9 "Monitoring and Control Instrumentation" product. Do not dispose of this product as unsorted municipal waste.

Instructions

Safe operation of the Product requires:

- careful transportation
- professional storage and installation
- careful operation and maintenance

Maintenance

With correct use, the Product does not require special maintenance. Repair should only be done at a Fluke Service Center by trained and qualified personnel within the guarantee period. See www.fluke.com for locations and contact information of Fluke Service Centers worldwide.

To clean the housing:

1. Disconnect the Product from the measuring circuit.
2. Wipe the housing with a damp cloth and mild detergent.
3. Do not use abrasives or other solvents. No fluid should enter the device.

Specifications

Maximum Voltage between any Terminal and Earth Ground	600 V
Nominal Resistance between phases	200 kΩ // 260 pF
Max. Voltage between phases	500 V
Basic Uncertainty	±0.2 %
Uncertainty at 100 kHz	±1 %
Safety	
General	IEC 61010-1: Pollution Degree 2
Measurement	IEC 61010-2-030: CAT IV 300 V/ CAT III 600 V
Dimensions	195 mm x 125 mm x 57 mm
Weight	445 g
Protection	IP 40
Operating Temperature	–10 °C to +40 °C
Storage Temperature	–10 °C to +70 °C
Altitude	≤2000 m
Humidity	≤40 °C, 75 % ≤30 °C, 95 % ≤10 °C non-condensing

LIMITED WARRANTY AND LIMITATION OF LIABILITY

This Fluke product will be free from defects in material and workmanship for one year from the date of purchase. This warranty does not cover fuses, disposable batteries, or damage from accident, neglect, misuse, alteration, contamination, or abnormal conditions of operation or handling. Resellers are not authorized to extend any other warranty on Fluke's behalf. To obtain service during the warranty period, contact your nearest Fluke authorized service center to obtain return authorization information, then send the product to that Service Center with a description of the problem.

THIS WARRANTY IS YOUR ONLY REMEDY. NO OTHER WARRANTIES, SUCH AS FITNESS FOR A PARTICULAR PURPOSE, ARE EXPRESSED OR IMPLIED. FLUKE IS NOT LIABLE FOR ANY SPECIAL, INDIRECT, INCIDENTAL OR CONSEQUENTIAL DAMAGES OR LOSSES, ARISING FROM ANY CAUSE OR THEORY. Since some states or countries do not allow the exclusion or limitation of an implied warranty or of incidental or consequential damages, this limitation of liability may not apply to you.

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