



# OPERATING INSTRUCTION MANUAL

## BFN-NGM-I

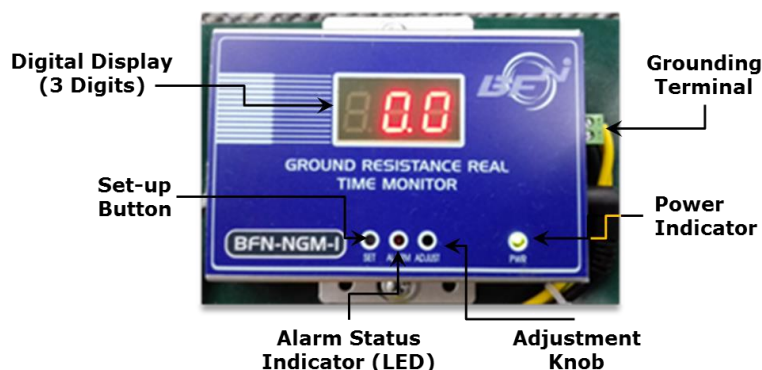
### PRODUCT INTRODUCTION

BFN-NGM-I uses a high-performance MCU and high quality chip MAX-485, interface, communications chip design, application of software system delivers real-time monitoring operation of the device and save the record of their conditions to facilitate centralized management and analysis of data. BFN-NGM-I also has sound and light alarm, smart monitoring, simple to use unique characteristics, displays actual resistance value, timely and accurate to determine the situation of equipment grounding, fault points and the cause of the failure.

### SPECIFICATION

<b>Working Voltage</b>	DC 12V	<b>Working Temp</b>	0°C ~ 50°C
<b>Default Alarm</b>	> 10 $\Omega$	<b>Working RH</b>	20% ~ 85%
<b>Accuracy</b>	$\pm 1 \Omega$	<b>Shell Material</b>	Iron
<b>Alarm Range</b>	1 – 50 $\Omega$ (manual set)	<b>Dimension (mm)</b>	L94 X W84 X H22.5

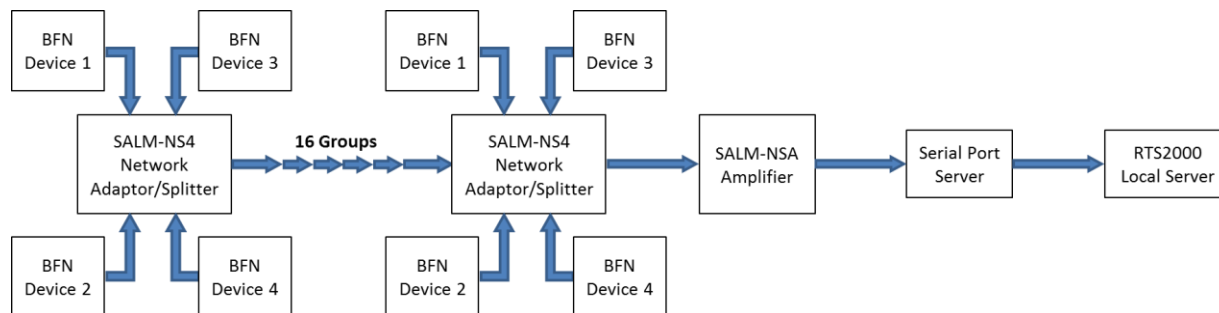
### STRUCTURE



### MONITORING DEVICE INSTALLATION

1. Static Grounding Cable Installation  
Use a screw driver to connect and lock the grounding wire in BFN-NGM-I at 'A' terminal point and the other end of the wire line to the Earth grounding point.
2. Installation of the equipment grounding  
With Screwdriver connect the bare copper wire in the "B" of the BFN-NGM-I grounding terminal port and the other end to the ground terminal in the production equipment.

### 3. Online monitoring system (RTS2000) – Optional Software



## **OPERATING GUIDE**

### 1. Power On

BFN-NGM-I After the installation is complete, plug the power adapter into the power supply to the machine jack (PWR), switch on the voltage to the grounding of real-time monitoring. If the machine has been switched on the BFN-NGM-I buzzer beeps sound and the red light is flashing, please check the device for proper grounding connection.

### 2. Alarm Features

BFN-NGM-I monitoring equipment grounding, the device monitors the equipment that connects to earth grounding, the LED display shows the value of resistance while the LED light shows performance of grounding being monitored.

GREEN LED light and no alarm sound shows grounding is within normal resistance range as per requirement. Flashing RED LED light corresponds to the bad grounding connection and out of resistance range as per requirement. The LED display shows "E99" and produced alarm beep sounds while RED LED light flashes means the resistance value is greater than 50 ohms.

### 3. Resistance Adjustment

Press "SET" button and digital display will flash with resistance alarm value.

Use screw driver to change the resistance alarm at the "ADJUST" knob

Press "SET" button again to finish the set-up.

## **PACKING LIST**

- |                                               |                                   |
|-----------------------------------------------|-----------------------------------|
| ■ BFN-NGM-I Main Monitor: 1 set               | ■ Operating (this manual): 1 copy |
| ■ Grounding Wire (Yellow): 1 set (1.2 meters) | ■ Warranty Card: 1 piece          |
| ■ DV 12V Power Supply Adaptor: 1 set          |                                   |

## **COMPONENTS**



**Fig 1:**  
**Monitoring Unit**



**Fig 2:**  
**Power Adaptor**



**Fig 3:**  
**Grounding Wire**

### **OPTIONAL SOFTWARE (RTS2000)**

Software designed to support multiple ESD control monitoring devices for BFN Products. This software will provide on-line alarm monitoring system through LAN or network connection. The system continuously monitors (24/7) with data recording function for more than 2000 ESD monitoring devices (exclusively for Horb devices only). DIP switch and COM port has been installed within the device for this purpose.



### **ATTENTION**

- When device set-up, please do make sure the device grounding connection is well connected to non-current grounding line.
- BFN-NGM-I has been factory adjusted and can work steadily. No adjustment is needed.
- It is recommended to conduct a periodic verification for the BFN-NGM-I tester.

### **MAINTENANCE**

BFN-NGM-I needs no maintenance and can be used continuously. If it does not work normally due to wrong operations and other reasons, please do notify the supplier immediately.

Note: Prohibit to personally taking it apart or making maintenance.

Operating manual is only for BFN-NGM-I users. It includes the tester's components, operation and some concerning information, some upgrading property with continuing stability, slightly difference will be allowed with operation and manual.



Suppliers Information

A large, empty rectangular box with a dotted border, intended for suppliers' information.

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