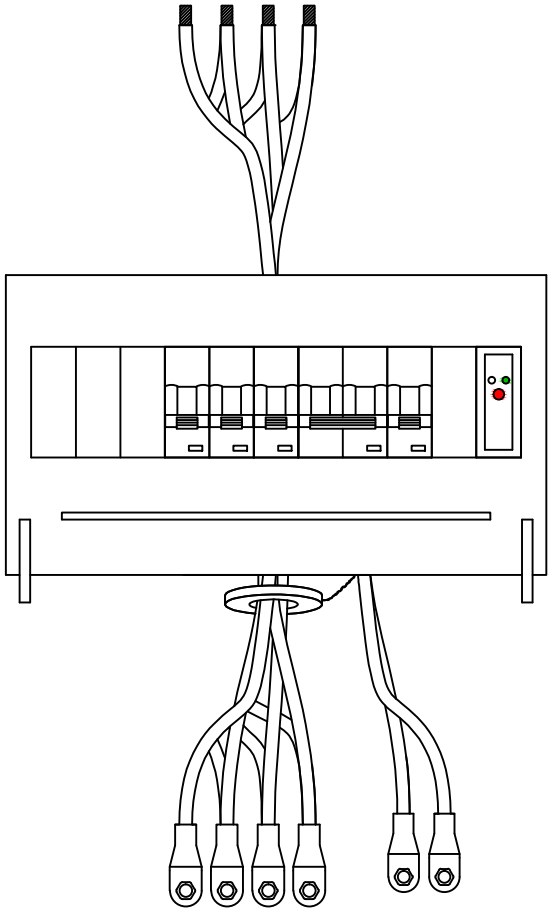


# RetroSafe Model RS General Specifications



Patent Pending

Marina Electrical Equipment, Inc.  
1715 Merrimac Trail  
Williamsburg, VA 23185  
Toll Free: 1-855-258-3939  
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CONFORMS TO STD. ANSI/UL1053  
CERT. TO CUL STAD.C22.2  
NO 144

# General Specifications - RetroSafe Model RS

## SECTION A: ACCEPTABLE MANUFACTURERS:

Marina Electrical Equipment, Inc.  
1715 Merrimac Trail  
Williamsburg, VA 23185  
Toll Free: 1-855-258-3939  
Web: [www.marinaee.com](http://www.marinaee.com)

## SECTION B: GENERAL REQUIREMENTS

1. The RetroSafe assembly is designed for installation in new or existing power outlet panels, as manufactured by Marina Electrical Equipment and various other manufacturers to provide shore power ground fault protection for personnel or equipment to comply with NEC Article 555.35.
2. RetroSafe assemblies shall be listed and marked, tested and certified to conform to Standard UL® 1053 entitled "Ground Fault Relay Sensing Equipment" and CUL Standard C22.2 No. 144 entitled "Standard Ground Fault Circuit Interrupter."
3. Shall be compliant with NEC 250.20, 555.3 entitled "Ground-Fault Protection"
4. Circuit Breaker(s) shall be listed and marked, tested and certified to conform to Standard UL® 489 entitled Molded-Case Circuit Breakers, Molded-Case Switches.
5. Circuit Breaker(s) shall be miniature molded case thermal-magnetic type with SCCR of 10 kAIC.

## SECTION C: CONSTRUCTION REQUIREMENTS

1. All materials and components used in the construction of the ground fault relay shall be listed.
2. Main Housing: Shall be constructed of listed UL® 94 V-0 materials, shall be tamper-resistant and shall be listed as a NEMA® 1 enclosure.
3. User Interface: Shall be constructed of UL® 94 V-0 materials with indicator LED's and reset button.
4. Ground Fault Relay Trip Value: shall be factory set.
5. Trip Time: 5 mA and 30 mA:  $\leq 25$  mS; 100 mA: 100 mS.
6. Mounting: ground fault relay and circuit breakers shall be mounted on din rail in, at minimum, a NEMA® 3R enclosure.
7. Operational Range: 0-500A, up to 480V in single or three phase systems, 60Hz.
8. Protection: Shall provide surge protection to on-board components using an internal resettable MOV.

## SECTION D: USER INTERFACE AND INDICATOR LIGHTS

1. The ground fault relay shall have 2 indicator lights indicating proper operation or fault.
2. Shall have a labeled test/reset button visible.
3. Leads provided for 12VDC external indicator lights. (Optional)
4. All circuit breakers and associated shunts shall be common-trip.

## SECTION E: WIRING

1. RetroSafe Assembly: Shall be factory assembled and installed from the factory with 120V N/O shunt-trip breakers to provide ground fault protection for shorepower.
2. CT: Shall be factory placed around all hot leads and neutral (if present) while excluding the ground lead. A yellow test wire shall be installed through the CT. .
3. Shall be provided with line-side and load-side pig-tails for field-termination to the power outlet panel terminal block and receptacles.

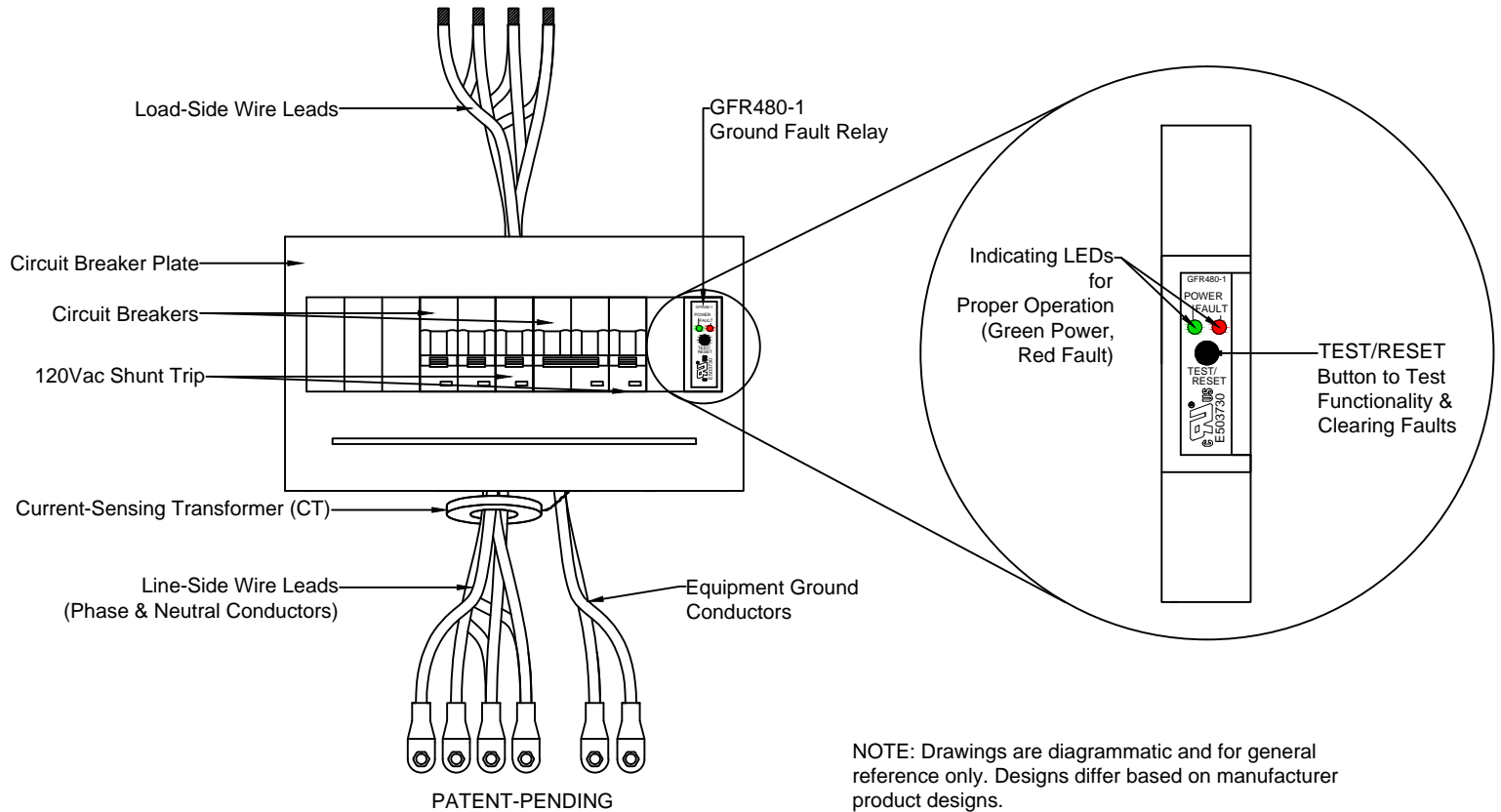
## SECTION F: SETTINGS

1. **Trip Setting:** Shall be set from the factory in accordance to current NEC regulations and sealed to prevent tampering.
2. **Range:** Can be set at 5mA, 30mA or 100mA (other settings may be available - consult factory for details).
3. **Function:** Common-trip; all shore power circuit breakers in the single assembly shall trip when ground fault trip value is met or exceeded.

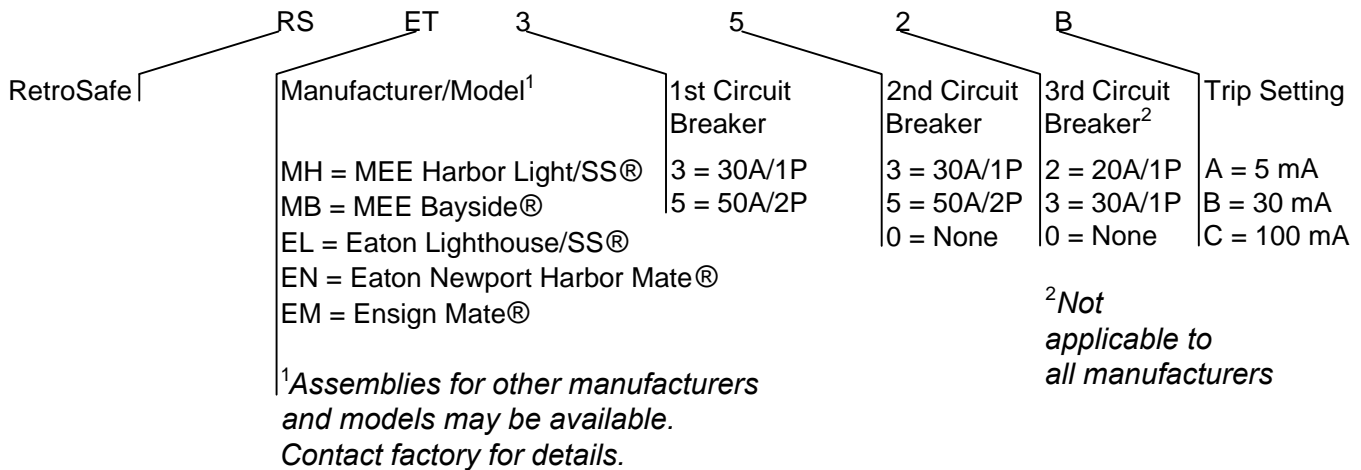
END OF SECTION

# General Specifications - RetroSafe Model RS

## SECTION G: ASSEMBLY COMPONENTS (PATENT PENDING)



## SECTION H: MODEL NUMBER STRUCTURE



Specifications Subject to Change Without Notice

END OF SECTION

# General Specifications - RetroSafe Model RS

## SECTION K: WARRANTY POLICY

### Assembly:

Marina Electrical Equipment, Inc. (MEE) warrants that the complete RetroSafe assembly will be free from failure resulting from defects in material and/or workmanship, and are covered by a limited warranty of one (1) year. Should any of the associated parts fail to comply with the above-mentioned warranty, MEE will either repair or replace the defective part(s), or credit the purchaser for the purchase price of the part.

### Ground Fault Relay:

Although the GFR480-1 Ground Fault Relay contains integrated surge protection, MEE and IIM will not warrant the product against severe over-voltage conditions such as lightning strikes or abnormal utility surges. Should a ground fault relay fail to comply with the above-mentioned warranty, MEE will either repair or replace the defective part(s)/components, or credit the purchaser for the purchase price of the part. This warranty is voided if the damage to any or all of the components is the result of abuse, misuse, or Force Majeure. This warranty is voided if the factory seal is broken or manipulated.

This warranty policy does not cover damage or failure resulting from abuse, misuse, negligence or Force Majeure. All warranty claims must be made in writing and all defective products shall be returned to MEE for evaluation unless stated otherwise by MEE. MEE will not be responsible for reimbursing the purchaser for any sort of expense incurred by the purchaser as a result of the repair or replacement of a warranty claim.

Send all warranty claims to:

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1715 Merrimac Trail  
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END OF SECTION