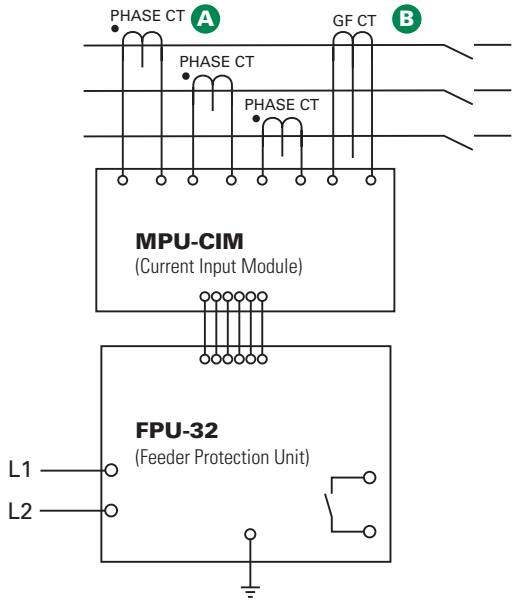
# FPU-32 SERIES (PGR-7200)

## Feeder Protection Unit


*NOTE: The FPU-32 consists of the Feeder Protection Unit (pictured above) and the MPU-CIM Current Input Module (not pictured).*

## Simplified Circuit Diagram




## Ordering Information

| ORDERING NUMBER | COMMUNICATIONS |
|---|---|
| FPU-32-00-00 | TIA-232 |
| FPU-32-01-00 | TIA-232 & RS-485 |
| FPU-32-02-00 | TIA-232 & DeviceNet™ |
| FPU-32-04-00 | TIA-232 & Ethernet |

*NOTE: One of the following is required: MPU-CIM-00-00 Current Input Module, or MPU-CTI-RT-00 Current Input Module with ring-tonque terminals.*

| ACCESSORIES | REQUIREMENT |
|---|---|
| Phase CTs | Recommended |
| Ground-Fault CT | Optional |
| MPU-16A-Y92A-96N | Optional |

## Description

The FPU-32 Feeder Protection Unit provides integrated protection, metering, and data-logging functions. It is an excellent choice for retrofitting and upgrading older relays because of its compact size and ability to use existing CTs. The FPU-32 is used to protect distribution feeders in processing, manufacturing, petroleum, chemical, and wastewater treatment facilities.

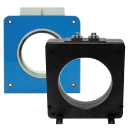
## Features & Benefits

| FEATURES | BENEFITS |
|---|---|
| **IEC & IEEE overcurrent protection curves** | Definite and inverse time settings for system coordination; prevents catastrophic failures |
| **Two setpoint groups** | Create distinctive settings for maintenance or for two different loads |
| **Reduced overcurrent mode** | Maintenance mode setting to reduce the risk of arc-flash hazards |
| **Data logging** | On-board 100-event recorder and remote data logging helps with system diagnostics |
| **Overload** | Thermal protection for connected load |
| **Phase loss/Phase reverse (current)** | Detects unhealthy supply conditions |
| **Unbalance (current)** | Prevents overheating due to unbalanced phases |
| **Communications** | Remotely view measured values, event records & reset trips |

## Accessories

A 

**Phase Current Transformers**
Phase CTs are required to detect phase currents.

B 

**Ground-Fault Transformer**
Zero-sequence current transformer detects ground-fault current. Available with 5-A and 30-A primary ratings for low-level pickup.

## Specifications

**Protective Functions (IEEE Device Numbers)**

| | |
|---|---|
| Overload (49, 51) | Definite-time overcurrent (50, 51) |
| Phase sequence (46) | Inverse-time overcurrent (50, 51) |
| Unbalance (46) | Ground fault (50G/N, 51G/N) |
| Phase loss (46) | RTD/PTC temperature (49) |

**Input Voltage** 65-265 Vac, 30 VA; 80-275 Vdc, 25 W
**Power-Up Time** 800 ms at 120 vac
**Ride-Through Time** 100 ms minimum
**24-Vdc Source** 400 mA maximum
**AC Measurements** True RMS and DFT, Peak 32 samples/cycle and positive and negative sequence of fundamental
**Frequency** 50, 60 Hz
**Output Contacts** Three Form C
**Approvals** CSA certified, CE, C-Tick (Australian), UL Recognized
**Communications** TIA-232 (standard); TIA-485, DeviceNet™, Ethernet (optional)
**Analog Output** 4-20 mA, programmable
**Conformally Coated** Standard feature
**Warranty** 10 years
**Mounting**
**(Control Unit)** Panel (standard)
Surface (with MPU-32-SMK converter kit)
**(Current Input Module)** DIN, Surface