

## Power Measurement using two wattmeter method Trainer Kit

## Introduction

Power Measurement by Two Wattmeter Method is an exclusive and useful product for Electrical laboratories. It is designed to explain the students, how total power is measured in a three phase circuit using only two wattmeter method.

With this product, student can study the power flow in three phase system and correspondingly calculate Active, Reactive and Apparent power. Apart from this student can easily understand different three phase parameters like Line Voltage, Line Current, Phase Voltage, Phase Current and their mutual relationships to verify star and delta properties in three phase circuit.



## **Product Features**

All terminals of controller are brought on front panel and the terminals are properly labelled for easy connections.

- Control panel with digital microcontroller based measuring devices with high accuracy and resolution
- Built-in different values of Resistive, Inductive and Capacitive loads
- Screen printed diagrammatic representation for the ease of connections.
- Front board consist of MS Material with power coating / epoxy paint to avoid any rust
- Separate auxiliary supply will be required to actuate digital measuring devices
- Specially designed BS10 Terminals and patch cords for electrical safety
- Provided with suitable protection such as fuses, MCB, etc wherever requires
- Equipped with supply indication lamp
- Earthing screw provided at the back side of the control set-up
- Product should be provided with protection fuses, colored patch cords, single phase cords, learning manual having theory operating procedure with connecting diagram, FAQ, Glossary, etc.

## **Technical Specifications**

Mains Supply	: Three Phase, 415VAC ±10%, 50Hz
R, L, C Load	: Built-In
Digital Meters Used	
Technology Used	: Microcontroller based
AC Voltmeter	: 1no.
AC Ammeter	: 1no.
Wattmeter	: 2nos.
Protection Devices	
MCB (TPN)	: 1No.
Glass Fuse	: 3Nos.
Grounding Nut	: Available at the rear side of the panel

**Experiments Can be performed:** 

- To measure three phase powers and power factor at resistive load
- To measure three phase power and power factor at resistive and inductive load
- To study improvement of power and power factor using capacitive load

**Supporting Accessories supplied with Product** 

• Patch Cords of different color scheme, Three Phase Mains Cord, Extra Glass Fuses, Learning Material Manual (softcopy), 6A, Three Phase Auto-Transformer (Optional)

\*\*Please feel free to share your requirements by filling your details in ask query section or request a Quote section on the website, we will be happy to cater your requirement.

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