

# Power Line Series Compensation Demonstrator (Add-on to EMS) 586477 (8362-A0)

**FESTO**

LabVolt Series

Datasheet



\* The product images shown in this document are for illustration purposes; actual products may vary. Please refer to the Specifications section of each product/item for all details. Festo Didactic reserves the right to change product images and specifications at any time without notice.

Festo Didactic  
en 120 V - 60 Hz  
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## General Description

The Power Line Series Compensation Demonstrator (EMS Version) is a variant of the Power Line Series Compensation Demonstrator, Model 8362, that does not include any test equipment, leads, or power supply. It is mounted in a full-size EMS module and requires a Data Acquisition and Control Interface, with the Power Line Series Compensation Function Set and the LVDAC-EMS software for all the required measurements.

## Manual

### Description

### Manual number

Power Line Series Compensation Demonstrator (User Guide) \_\_\_\_\_ 584246 (31993-E0)

## Table of Contents of the Manual(s)

### Power Line Series Compensation Demonstrator (User Guide) (584246 (31993-E0))

- 1 Power Transfer Capability of a Transmission Line
- 2 Effects of Series Compensation on Power Transfer Capability and System Stability
- 3 Effect of Series Compensation on Regulation of the Receiver Voltage
- 4 Reduction of the Transmission Losses on Parallel Lines Using Series Compensation

## Additional Equipment Required to Perform the Exercises (Purchased separately)

### Qty Description

### Model number

1 Power Line Series Compensation Function Set \_\_\_\_\_ 581461 (9069-S0) <sup>1</sup>

## Specifications

Parameter	Value
<b>Power Requirement</b>	
Current	2 A (circuit-breaker protected)
Service Installation	Standard single-phase ac outlet
<b>Line 1</b>	
Simulation Length	200 km
Simulated Nominal Power	4500 MW
<b>Line 2</b>	
Simulation Length	300 km
Simulated Nominal Power	3000 MW
<b>Compensation</b>	17 %, 25 %, and 34 %
<b>Front panel switches for various system configurations</b>	Toggle type (16), rotary type (1)
<b>Physical Characteristics</b>	
Intended Location	On a table able to support the weight of the equipment
Dimensions (H x W x D)	308 x 291 x 440 mm (12.1 x 11.5 x 17.3 in)
Net Weight	TBE

<sup>1</sup> For the required data acquisition.

## Module Options Description

### Power Line Series Compensation Function Set 581461 (9069-S0)



The Power Line Series Compensation Function Set enables the Series Compensation function in LVDAC-EMS.

### Additional Equipment Required to Perform the Exercises (Purchased separately)

Qty	Description	Model number
1	Power Line Series Compensation Demonstrator (Add-on to EMS)	586477 (8362-A0)

Reflecting the commitment of Festo Didactic to high quality standards in product, design, development, production, installation, and service, our manufacturing and distribution facility has received the ISO 9001 certification.

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**Festo Didactic SE**

Rechbergstrasse 3  
73770 Denkendorf  
Germany

P. +49(0)711/3467-0  
F. +49(0)711/347-54-88500

**Festo Didactic Inc.**

607 Industrial Way West  
Eatontown, NJ 07724  
United States

P. +1-732-938-2000  
F. +1-732-774-8573

**Festo Didactic Ltée/Ltd**

675 rue du Carbone  
Québec QC G2N 2K7  
Canada

P. +1-418-849-1000  
F. +1-418-849-1666

**[www.labvolt.com](http://www.labvolt.com)**

**[www.festo-didactic.com](http://www.festo-didactic.com)**