# **Hydrogen Fuel Cell** 579593 (8803-00)



LabVolt Series

Datasheet



# **Table of Contents**

General Description	_ 3
Specifications	_ 3

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# **General Description**

The Hydrogen Fuel Cell module is a fuel cell stack comprising a fuel cell controller, a hydrogen flow meter, a dcto-dc converter (required to obtain a regulated dc output from the fuel cell stack), an air supply, and seven LED displays for visualizing all essential system parameters (e.g., current, voltage, temperature, fuel, air supply).

A USB port on the front panel enables use of the included data acquisition software to perform further analysis on the fuel cell stack. This software provides support for the experiments (visualization, data logging, fully automated experiments) in the manual.

## **Specifications**

Parameter	Value
Rated Output	40 W
Maximum Output	50 W
No-Load Voltage	9 V
Current at Rated Output	8 A
Hydrogen Consumption at Rated Output	580 sml/min
Hydrogen Purity for Operation	A minimum of 4.0 (99.99%)
Permissible Hydrogen Pressure	0.4 – 0.8 bar
Permissible Ambient Temperature during Operation	5–35°C (41-95°F)
Communication Port	USB
Pressure Regulator	
Description	Two-stage, hydrogen
Inlet Pressure	Max. 19 bar
Outlet Pressure	0.6 ± 0.1 bar
Accessories	
	Leak detection kit
	Safety connection leads
	Software
Physical Characteristics	
Dimensions (H x W x D)	307 x 579 x 533 mm (12.1 x 22.8 x 21 in)
Net Weight	TBE

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