

# HL 358

## Forced air gas burner training panel



The illustration shows a similar unit

### Learning objectives/experiments

- familiarisation with components for heating systems
- starting a gas burner
- nominal load adjustment on a gas burner
- fault-finding and fixing
- calculation of the gas flow rate / operating volume

### Description

- practical nominal load adjustment
- display of the most important operating pressures
- burner control sequence
- hazard-free due to operation with air

The trainer contains a commercially available forced air gas burner. The elements for a gas controlled system are combined into one compact fitting.

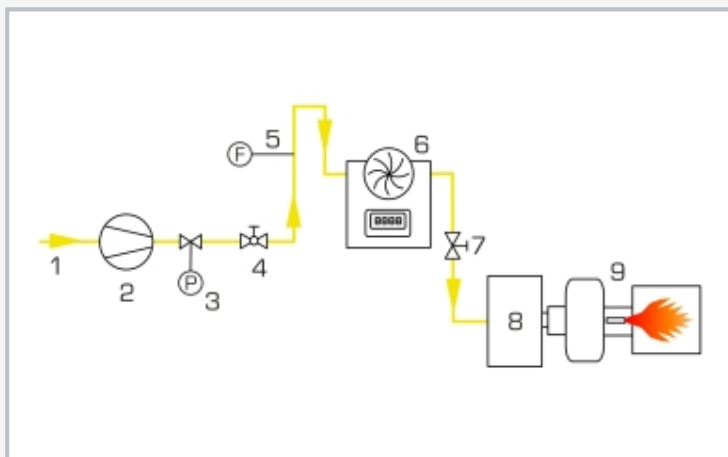
The burner function is simulated using air making it possible to use the unit in training rooms without hazard. The compressed air is supplied by a small integrated compressor.

# HL 358

## Forced air gas burner training panel



1 flow meter, 2 manometer, 3 valve for gas quantity, 4 gas meter, 5 ball valve, 6 compact fitting, 7 burner, 8 control elements for heating, 9 burner control sequence



Process schematic: 1 inlet gas, 2 diaphragm pump for pressure generation, 3 pressure-reducing valve, 4 valve, 5 flow meter, 6 gas meter, 7 ball valve, 8 compact fitting, 9 burner

### Specification

- [1] simulation of the operation of a gas burner
- [2] hazard-free operation of the burner with air
- [3] diaphragm pump for pressure generation, pumping medium: air
- [4] display of the most important operating pressures
- [5] indication of burner operation using a flickering light
- [6] monitoring of burner operation using flame safeguard
- [7] EXCEL-file for calculating the operating volume included in the delivery

### Technical data

#### Gas burner

- rating class: 15...45kW

#### Gas pressure controller

- admission pressure: 0,4bar
- outlet pressure: 0,04bar

#### Diaphragm pump

- power consumption: 70W
- max. flow rate: 70L/min at 230mbar

#### Measuring ranges

- flow rate: 0,5...5,5Nm<sup>3</sup>/h [air]
- pressure: 3x 0...60mbar

230V, 50Hz, 1 phase

230V, 60Hz, 1 phase; 120V, 60Hz, 1 phase

UL/CSA optional

LxWxH: 1750x700x1850mm

Weight: approx. 120kg

### Required for operation

PC with Windows recommended

### Scope of delivery

- 1 trainer
- 1 CD with Excel-file
- 1 set of tools
- 1 manual