

PRESTO® W92tt

Heating a 100 liters reactor from 0 °C to +20 °C

Objective

This case study tests the heating power of PRESTO® W92tt with a 100 liters glass reactor. The PRESTO® W92tt is connected to the reactor via two 3 m metal tubings. The PRESTO® W92tt is programmed to heat up from 0 °C to +20 °C.

Environment

Room temperature +20 °C
 Humidity 45%
 Voltage 400 V / 50 Hz

Test Conditions

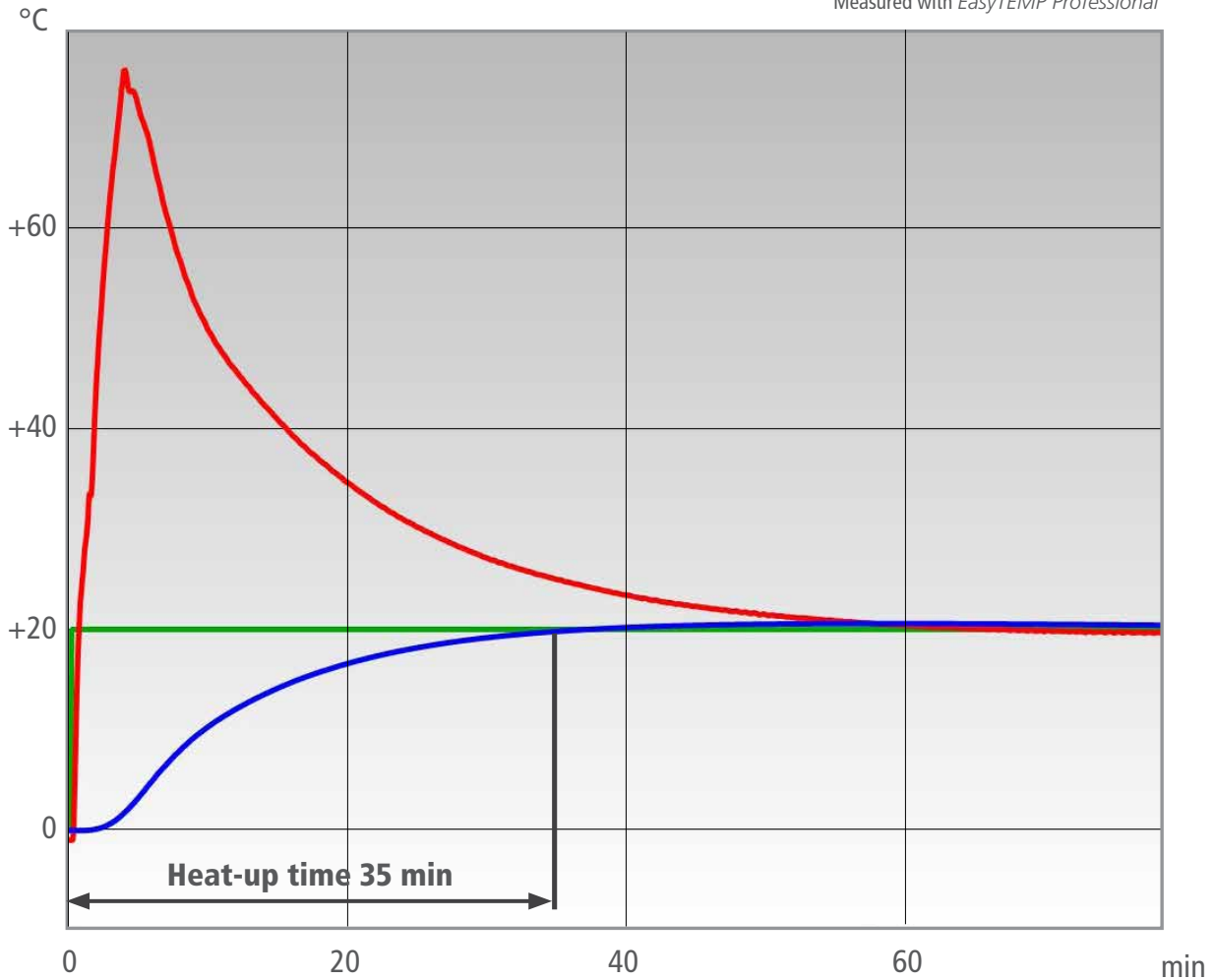
JULABO unit	PRESTO® W92tt
Cooling power	+20 °C 19 kW 0 °C 15.5 kW -20 °C 9.5 kW
Heating capacity	36 kW
Band limit	with
Flow pressure	0.5 bar
Bath fluid	Thermal HL80
Reactor	100 liters glass reactor (Büchiglas) filled with 70 l Ethanol
Jacket volume	30 l
Control	External (ICC)



Test Results

The PRESTO® W92tt heating process from 0 °C to +20°C in 35 min without overshoot.

Measured with *EasyTEMP Professional*



- Setpoint
- Temperature in reactor's interior
- Temperature in reactor's jacket

Tip

You can also use the robust Pt100 with PTFE coating.



Tip

Use the free of charge *EasyTEMP* software to control the units with the PC and to show the temperature curves graphically.

EasyTEMP

