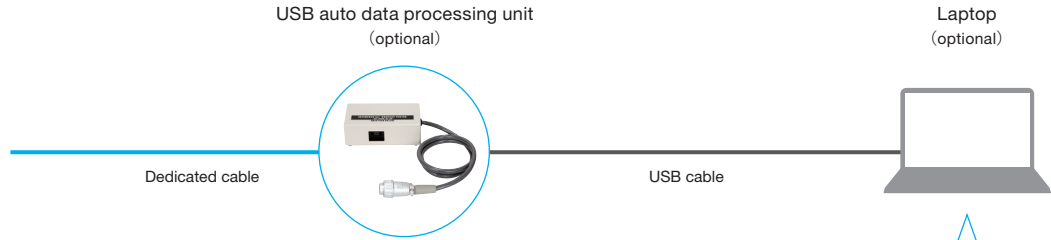


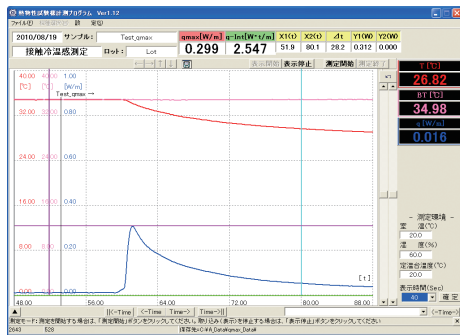


SYSTEM CONFIGURATION DIAGRAM / MEASUREMENT DATA

KES-F7



Sample Measurement Software Screens



▲ Thermal Properties ( $q_{max}$ )

Obtainable Data

Item	Characteristic value	Description	Reading the data
Thermal Properties	$q_{max}$	Peak heat flux	(with selection switch set to Cool) Higher values mean a colder feeling
	k	Thermal conductivity	Higher values mean heat is more easily transferred
	%	Heat retention properties	Higher values mean higher heat retention properties

KES-F7 Thermo Labo

<b>Dimensions/Weight (approx.)</b>	<ul style="list-style-type: none"> <li>Thermo Labo (<math>q_{max}</math> / thermal conductivity measurement unit): W230 × D360 × H80 (mm) / 3 kg</li> <li>*With BT-box and T-box set on base plate</li> <li>Electronic unit: W180 × D400 × H400 (mm) / 15 kg</li> <li>Wind tunnel unit (heat retention property measurement)*: W460 × D320 × H1100 (mm) / 7 kg</li> <li>Wind tunnel amplifier unit: W140 × D240 × H180 (mm) / 2.5 kg</li> <li>Thermo Cool: W180 × D180 × H110 (mm) / 2.5 kg</li> <li>Thermo Cool amplifier W230 × D310 × H220 (mm) / 5 kg</li> </ul>
<b>Power source</b>	100 VAC (Thermo Labo unit) Max. power consumption: 50W (Wind tunnel unit) Max. power consumption: 20W* (Thermo Cool unit) Max. power consumption: 20W
<b>Measurement environment temperature and humidity</b>	20 to 30°C / 50 to 70% RH. (No condensation.) Temperature and humidity should be kept constant during measurement. (Standard temperature and humidity conditions: 20°C / 65% RH) *The instrument should be located to minimize influence from wind or vibrations.

\*Optional accessory: Wind tunnel device specification (heat retention property measurement)

<b>Measurement unit configuration</b>	T-Box: (T-plate 3 × 3 cm) 5 cm BT-Box: (BT plate 5 × 5 cm) 10 cm BT-Box: (BT plate 10 × 10 cm)*
<b>Temperature display</b>	Unit: Degrees Celsius Min. display: 0.1°C Max. temperature set point: 40°C
<b>Evaluated coldness/warmth feeling value</b>	$q_{max}$ [W/cm <sup>2</sup> ]
<b>Heater control method</b>	Output in voltage proportional to temperature difference
<b>Heat-loss display</b>	Max. usable range (200mW range): Approx. 200mW Max. usable range (2W range): Approx. 2W Max. usable range (20W range): Approx. 10W * Do not use the 200W range.
<b>Measurement range</b>	Thermo Labo unit: Max. 10 W (stable measurable range: 3 W (1.2 kW/m <sup>2</sup> ) or less) Wind tunnel speed: Max. 1 m/sec* Thermo Cool: Min. temperature setting (5°C) to room temperature
<b>Specimen size</b>	Dimensions: 20 × 20 cm, Thickness: 2 mm (max.)

**⚠ Precaution** For safety use, please read the operation manual / the instruction carefully and thoroughly before using the tester.

Specification details recorded here are subject to change without notice. We appreciate your understanding.

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