

Technical Specifications

NETZSCH

TG 309 Libra®			
	Classic	Select	Supreme
Temperature range	(10°C) RT to 1025°C	(10°C) RT to 1025°C/1100°C	(10°C) RT to 1100°C
Heating rate	0.001 K/min to 300 K/min	0.001 K/min to 300 K/min	0.001 K/min to 300 K/min
Balance resolution	50 ng	20 ng	10 ng
Cooling time ¹	In nitrogen: ≈ 12 min from 1100°C to 100°C In helium: ≈ 5 min from 1100°C to 100°C, ≈ 10 min to 25°C		
Max. sample weight/ measuring range	2 g (including crucible)	2 g (including crucible)	2 g (including crucible)
<i>AutoVac</i>	Automatic evacuation and refilling of purge gas; optionally available if MFC is selected		
Temperature resolution	0.001 K	0.001 K	0.001 K
Temperature accuracy ²	± 0.3 K (after calibration by c-DTA®, indium)		
Temperature calibration	c-DTA®, also for detection of endo- and exothermal effects; Curie standards		
Temperature stability ³	Peak-to-peak: 0.03 K RMS: 0.005 K	Peak-to-peak: 0.03 K RMS: 0.005 K	Peak-to-peak: 0.03 K RMS: 0.005 K
Temperature precision ⁴	0.15 K	0.15 K	0.15 K
Vacuum-tightness	1 mbar	<< 10 ⁻¹ mbar	<< 10 ⁻¹ mbar
Integrated 4-fold MFC	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Integrated 3-fold MFC	<input type="checkbox"/>	<input type="checkbox"/>	-
Evolved Gas Analysis	-	<input type="checkbox"/>	<input type="checkbox"/>
192+12-position ASC	-	<input type="checkbox"/>	<input type="checkbox"/>
20-position ASC	<input type="checkbox"/>	-	-
Piercing device	-	<input type="checkbox"/>	<input type="checkbox"/>
Color touch display	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>
Unlimited warranty ⁵	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

1 21°C chiller temperature, 200 ml/min He (purge + protective gas); the maximum temperature of the TGA system depends on the He gas flow: at 200 ml/min, T_{max} is 1020°C.

2 Maximum deviation between measured and literature value (indium)

3 Measurement at different isothermal temperatures

4 Standard deviation based on 10 measurements

5 In connection with maintenance contract

included
 optional