



# Petroleum Testing Equipment

## 1.17 ASTM D1298 Density by Hydrometer

ASTM D287 - ASTM D1298 - ASTM D1429-B - ASTM D3142 - ASTM D6822 - IP 160 - ASTM E126 - API 2547 - ISO 3675

This test method covers following laboratory determinations by hydrometer method:

- Density,
- Relative density (specific gravity),
- American Petroleum Institute (gravity of crude petroleum and liquid petroleum products).

### Main Characteristics

A Tamson TLC15-5 refrigerator circulates a (cold) flow through the double walls of the cylinders. The TLC15-5 maintains the bath temperature within  $\pm 0.25^\circ\text{C}$  of the test temperature required by the method. The PTFE valves ensure fast drainage and cleaning of the cylinders. The easy detachable spill tray prevents that portions of the sample are spilled on the workbench. The rack offers full view on the hydrometer. Our special ASTM D1298 support eliminates the problem of mounting brackets or portions of a thermostatic bath blocking the view. The Tamson D1298 apparatus is a complete set-up existing of three jacketed glass cylinders, rack and TLC15-5 circulator. Our system offers an interesting price advantage compared to other solutions based on a combination of a thermostatic bath with an external chiller. The ASTM D1298 set-up can also be used for ASTM D287, ASTM D1429 procedure B, ASTM D3142 or ASTM D6822 test methods.



**ASTM D1298  
Apparatus**

Range	5°C....120°C	
Setting	0.01°C	
Stability $\pm$	Better than 0.1°C	
	<b>TLC15-5</b>	<b>Rack</b>
Bath volume	5 L	
Opening bath	85 x 150 mm (effective use)	
Depth bath	150 mm	
Length	420 mm (460 mm incl drain)	360 mm (front to back)
Width	265	320 (left to right)
Height	565	800 mm
Weight	30 kg	9 kg (glass parts included)
Power	1100 W (1 heater)	
Ambient temperature	15..28°C	

- ▶ ASTM D1298 apparatus **P/N** 00T2000 (230V/50Hz) • **P/N** 00T2001 (230V/60Hz) • **P/N** 00T2002 (115V/60Hz)
- ▶ An additional rack is available to get an apparatus for six positions with one circulator • **P/N** 00T1260
- ▶ Alternative for this setup is a TV2500 in combination with the TLC10-3. For further information, please see section 1.8.

### Accessories

P/N 25T0911BW	ASTM S12C thermometer
P/N 25T2153	Thermometer holder D1298

- ▶ **For hydrometers, please see the specification sheet.**