SETAFLASH SMALL SCALE FLASH POINT

SETAFLASH SERIES 8 'ACTIVECOOL' CLOSED CUP TESTER 82100-0

ASTM D3278; D3828; D7236; E502; IP 523; IP 524; IP 534; ISO 3679; ISO 3680; BS 3900 Part 13; BS 6664 Parts 3 & 4; UN Class 3 Non-viscous Flammable Liquids; CHIPS Regulations; EPA 1020 A & B

- -20 to 130°C (-4 to 266°F) temperature range
- Small sample size, 2 or 4ml
- Flash/No Flash & Ramp modes
- Electric ignitor (with gas option)
- Automatic dipping and flash detection
- ActiveCool electronic Peltier cooling
- 64 Test memory & RS232 interface
- °C or °F temperature display

The Series 8 'ActiveCool' is an automated closed cup flash point tester with a temperature range of 10 to 130°C (50 to 266°F) with no external cooling required. When connected to a suitable water supply, the range is extended down to -20°C (-4°F).

There are two modes of operation; Flash/No Flash and Ramp. The ramp mode increases the sample temperature at a rate of 2°C/min and automatically dips the ignitor every 1°C up to 100°C (every 2°C above 100°C), until either a flash is detected or the end of test temperature is reached.

The automatic flash detection system is tuned to ignore halo and other false flash effects, enhancing precision and accuracy. Barometric pressure is measured by an internal barometer, and the correction is automatically applied to the test result.

Peltier cell technology is used for heating and cooling, ensuring precise temperature control and rapid cooldown after a test is completed. The ignitor uses a new electrical hot wire (a gas flame option is available).

The bright colour LCD display shows test parameters and the test result. The text and colour of the top line indicates instrument status. All functions are accessed via menus, navigated by the keypad. Up to 64 test results can be stored in memory, each tagged with a sample reference and operator name. Results can be downloaded to a PC or printer via the RS232C port (USB or LAN ports options available). The firmware is upgradeable for future developments.

SUPPLIED WITH: Ignitor, 2ml syringe, mains lead and instruction manual.





BIO-FUEL TESTING



CALIBRATION & VERIFICATION MATERIALS



SETAPLUS EXTENDED WARRANTY AVAILABLE



TECHNICAL DATASHEETS AVAILABLE



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there bearings are a	76.7
Sample ID : DEMO 1	THEY
Operator ID: STEVE	aring 1
Test no.: 000228 lg	mitor Wire

82150-0 SETAFLASH SERIES 8 'ACTIVECOOL' (CORROSION RESISTING)

Corrosion resisting stainless steel cup insert variant of 82100-0

Similar to the 82100-0 with a corrosion resisting insert in the sample cup. SUPPLIED WITH: Ignitor, 2ml syringe, mains lead and instruction manual.

ACCESSORIES - Setaflash Series 8							
OPTIONAL			82150-0	82000-0			
13747-0	SETA SOLID SAMPLE DISPENSER (for details see page 15).	•	•	•			
13770-311	SYRINGE, 4ml, for tests above 100°C.	•	•	•			
26000-0	LIQUID RECOVERY SYSTEM, with pump and trap to remove hot sample from cup, (for details see page 15).	•	•	•			
71001-0	SETA VENT, (for details see page 19).	•	•	•			
99300-2	LOW TEMPERATURE CIRCULATOR, for low temperature tests in high ambient temperatures (see page 139).	•	•				
45001-0	SETAPLUS EXTENDED 12 MONTH WARRANTY	•	•	•			
CALIBRATION, VERIFICATION & TRAINING							
99878-3	SMALL SCALE CERTIFIED FLASH POINT MATERIAL, (for details see page 15).	•	•	•			
99928-0	SETATHERM, digital thermometer, -20 to 150°C, (for details see page 129).	•	•	•			

Note: For gas options please contact Seta

SETAFLASH SMALL SCALE FLASH POINT

82000-0 SETAFLASH SERIES 8 CLOSED CUP TESTER

ASTM D3278; D3828; D7236; E502; IP 523; IP 524; IP 534; ISO 3679; ISO 3680; BS 3900 Part 13; BS 6664 Parts 3 & 4; UN Class 3 Non-viscous Flammable Liquids; CHIPS Regulations; EPA 1020 A & B

- Ambient +5 to 300°C (ambient +9 to 572°F) temperature range
- Small sample size, 2 or 4ml
- Flash/No Flash & Ramp modes
- Electric ignitor (with gas option)
- Automatic dipping and flash detection
- 64 Test Memory & RS232 Interface
- °C or °F Temperature Display
- Integral Barometer & Auto Correction

The Series 8 is an automated closed cup flash point tester with a temperature range of ambient +5 to 300° C (ambient +9 to 572° F). The instrument uses an electric hot wire ignitor (gas flame option).

There are two modes of operation; Flash/No Flash and Ramp. The ramp mode increases the sample temperature at a rate of 2°C/min, allowing determination of a flash point in accordance with ASTM D7236 and IP 534. The dipping sequence occurs automatically every 1°C up to 100°C (every 2°C rise above 100°C), until either a flash is detected or the end of test temperature is reached. The ignitor uses a new electrical hotwire (a gas flame option is available).

The bright colour LCD display shows test parameters and the test result. The text and colour of top line of the display indicates the instrument status. All functions are accessed via menus, navigated by the keypad. Audible prompts are given when an action is required from the operator.

The automatic flash detection system is tuned to ignore halo and other false flash effects, reducing the chance of mis-interpretation of the test result, and enhancing repeatability. Barometric pressure is measured by an internal barometer, and the correction is automatically applied to the test result. At the end of a test, the sample cup is cooled by forced air to reduce the cycle time between tests.

Up to 64 results can be stored in memory, tagged with operator and sample references, and can be downloaded to a PC or printer via the RS232C port (USB or LAN ports available as options). The firmware is upgradeable for future developments.

 $\label{eq:SUPPLIED WITH: Ignitor, 2ml syringe, mains lead and instruction manual.}$

















SPECIFICATIONS				
Seta Part No:	82100-0	82150-0	82000-0	
Temperature Range:	Air: 10 to 130°C (50 to 266°F) Water Assisted: -20 to 130°C (-4 to 266°F)	Air: 10 to 130°C (50 to 266°F) Water Assisted: -20 to 130°C (-4 to 266°F)	Ambient +5 to 300°C (Ambient +9 to 572°F)	
Sample Size:	2 or 4ml according to method	2 or 4ml according to method	2 or 4ml according to method	
Ignitor:	Electrical Hot Wire (optional Gas Flame)	Electrical Hot Wire (optional Gas Flame)	Electrical Hot Wire (optional Gas Flame)	
Test Modes:	Rapid Equilibrium and Ramp	Rapid Equilibrium and Ramp	Rapid Equilibrium and Ramp	
Test Duration Rapid Equilibrium Mode:	1 minute below 100°C, 2 minutes above 100°C, FAME 1 minute or user defined 1 to 99 minutes	1 minute below 100°C, 2 minutes above 100°C, FAME 1 minute or user defined 1 to 99 minutes	1 minute below 100°C, 2 minutes above 100°C, FAME 1 minute or user defined 1 to 99 minutes	
Test Duration Ramp Mode:	Typically 7 minutes	Typically 7 minutes	Typically 7 minutes	
Cool Down Time:	80 to 20°C (176 to 68°F) in 4 minutes	80 to 20°C (176 to 68°F) in 4 minutes	N/A	
Sample Cup Material:	Aluminium	Corrosion resisting steel insert, aluminium cup	Aluminium	
Heating/Cooling Method	Peltier Cell	Peltier Cell	Ceramic Pad, Forced Air (post-test cooldown)	
Computer Interface:	RS232C (USB & LAN options)	RS232C (USB & LAN options)	RS232C (USB & LAN options)	
Power:	300W (maximum)	300W (maximum)	300W (maximum)	
Voltage:	100 to 250V, 50/60Hz (2x AA dry cell batteries required for internal clock)	100 to 250V, 50/60Hz (2x AA dry cell batteries required for internal clock)	100 to 250V, 50/60Hz (2x AA dry cell batteries required for internal clock)	
Size (HxWxD):	30 x 34 x 38cm	30 x 34 x 38cm	30 x 34 x 38cm	
Weight:	8kg	8kg	8kg	