

Measure Flash Point of Hydrocarbon Products Quickly,  
Accurately, and Completely On-Line!



# ON-LINE FLASH POINT MONITOR

**PSPI**  
by **PAC**

## ON-LINE FLASH POINT

The PSPI Flash Point Monitor is an on-stream process monitor for measuring flash points of liquid fuels over a range of 10° to 121° C (50° to 250° F).

The analyzer robust design and measurement principle (no catalyst used in the measurement) delivers reliable

measurements over time independently of fuel's sulfur content.

The 45607 Flash Point analyzer is completely microprocessor controlled with self-diagnostic capabilities, making it economical and simple to operate and maintain.



### ADVANTAGES

- Designed to measure Flash Point from 10°C to 121°C
- No catalyst used, performance is not impacted by sulfur content in the measured stream
- Microprocessor-controlled instrument with self-test and diagnostic capabilities
- Analyzer configuration can be changed without opening the explosion proof enclosure

### APPLICATION RANGE

Products Flash Point is one of the key final products specifications in the refineries. By having an online monitoring solutions refineries can optimize plants profitability while at the same time meeting quality requirements

### STANDARD METHODS

In correlation with:

- ASTM D56 Tag Closed Cup
- ASTM D93 Pensky-Martens Closed Cup



# solidpartners provensolutions

## U.S.A.

PAC, LP | 8824 Fallbrook Drive | Houston, Texas 77064  
T: +1 800.444.TEST | O: +1 281.940.1803 | F: +1 281.580.0719  
sales.usa@pacpl.com | service.usa@pacpl.com

## FRANCE

BP 70285 | Verson | 14653 CARPIQUET Cedex  
T: +33 231 264 300 | F: +33 321 266 293  
sales.france@pacpl.com | service.france@pacpl.com

## GERMANY

Badstrasse 3-5 | P.O.Box 1241 | D-97912 Lauda-Königshofen,  
T: +49 9343 6400 | F: +49 9343 640 101  
sales.germany@pacpl.com | service.germany@pacpl.com

## SINGAPORE

61 Science Park Road | #03-09/10 The Galen  
Singapore Science Park III | Singapore 117525  
T: +65 6412 0890 | F: +65 6412 0899  
sales.singapore@pacpl.com | service.singapore@pacpl.com

## NETHERLANDS

P.O.Box 10.054 | 3004 AB Rotterdam  
Innsbruckweg 35 | 3047 AG Rotterdam  
T: +31 10 462 4811 | F: +31 10 462 6330  
sales.netherlands@pacpl.com | service.netherlands@pacpl.com

## RUSSIA

Shabolovka Street | 34, Bldg. 2 | 115419 Moscow  
T: +7 495 617 10 86 | F: +7 495 913 97 65  
sales.russia@pacpl.com | service.russia@pacpl.com

## CHINA

Room 1003, Sunjoy Mansion | No. 6 RiTan Rd.  
Chao Yang District | Beijing 100020  
T: +86 10 650 72236 | F: +86 10 650 72454  
sales.china@pacpl.com | service.china@pacpl.com

## INDIA

1036 Regus | Trade Center, Level 1  
Bandra (E) - 400 051 | Mumbai  
T: +91 22 40 700 447 / 700 | F: +91 22 40 700 800  
sales.india@pacpl.com | service.india@pacpl.com

## MIDDLE EAST

A1 Quds Street, A1 Tawar road | LIU#H13 Dubai Airport Freezone  
Near Dubai Airport (terminal 2) | P.O.Box #54781 | Dubai, UAE  
T: +971 04 2947 995 | F: +971 04 2395 465  
sales.middleeast@pacpl.com | service.middleeast@pacpl.com

## SOUTH KOREA

#621 World Vision Building | 24-2, Youido-dong  
Seoul 150-010  
T: +82 2785 3900 | F: +82 2785 3977  
sales.southkorea@pacpl.com | service.southkorea@pacpl.com

## THAILAND

26th Floor, M. Thai Tower | All Seasons Place  
87 Wireless Road | Lumpini, Phatumwan | Bangkok 10330  
T: +66 2627 9410 | F: +662627 9401  
sales.thailand@pacpl.com | service.thailand@pacpl.com

PAC Authorized Representatives are also located in most countries worldwide. For more information visit [www.pacpl.com](http://www.pacpl.com)

# PSPi

by PAC

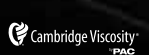
Copyright 2012/1 PAC L.P. All rights reserved  
00.00.172

[www.pacpl.com](http://www.pacpl.com)

## SPECIFICATIONS

General Information	
Ordering Information	45607 AT - 115: Process Flash Point 100-120 VAC 45607 AT - 230: Process Flash Point 220-240 VAC
Standard Test Method	Correlates to ASTM D56 and D93
Operation	
Analytical principle	Hydrocarbon Flash Point value determination
Response Time	Typically 1 – 7 minutes. Cycle time varies with process operating conditions. Application dependant
Application Range	
Measurement Ranges	10° to 121°C (50° to 250°F) <sup>1</sup>
Accuracy	Correlates to ASTM D 56 and D 93 - Repeatability +/- 1.0°C
Sample Conditions	
Sample Phase: Liquid	Sample Return Press.: Atmospheric pressure
Sample Flowrate: 30 to 50ml/minute	Sample Temperature: At least 15°C (59°F) below expected lowest flash point temperature (cooling may be required in sample conditioning system)
Sample Inlet Pressure: 5 - 10 psig	Sample Viscosity: No greater than 220cSt at 38 °C (100 °F)
Supply & Connections	
Instrument Air	Clean, dry and filtered a 600-1000 cc/minute and regulated at 10 psig
Power Requirements	
Voltage	100-120 or 220-240 VAC (+/-10%), 50/60 Hz, single phase
Power	500 W
Interface Specifications	
Remote Standby	Terminals available for customer-supplied dry contact control of instrument. Allows control room to take monitor "off-line"
Analog Output	Isolated 4-20mA for Flash Temperature (standard) Isolated 4-20mA for Sample Temperature (optional)
Alarm Relay	SPST fail-safe alarm relay
Digital Outputs	Modbus over RS-232C, RS-485, RS-422, Ethernet
"Come Read" Contact	Dry relay contact for end of measurement cycle notification (optional).
Environmental Conditions	
Operating temperature	0° to 40°C; weather protection required; no direct sunlight
Storage temperature	Consult Factory
Altitude	Sea level to 2,000 meters
Safety Characteristics	
ATEX	ATEX, IEC Ex: II 2 G Ex, IIB + H2 T4 Gb IP66
CSA	Designed to Class I Div I Group B, C, D, T4 Type 13, 4, 4x or AEx d IIB+H2 IP66 (certification on request)
CE	Compliant
Physical Specifications	
Dimensions	48x24x13 inches (uncrated) ; 54x29x17 inch (crated)
Weight	250 lbs (uncrated) ; 350 lbs (crated)

<sup>1</sup> Consult PAC for other temperature ranges  
Continuing research and development may result in specifications or appearance changes at any time



USA • FRANCE • GERMANY • NETHERLANDS • UAE • RUSSIA • CHINA • SINGAPORE • SOUTH KOREA • THAILAND • INDIA