

## ITEM OPPORTUNITY SYNOPSIS

<b>Scouting Number:</b>	2024-207
<b>Name of the item to be scouted:</b>	Flash Point Tester
<b>State item to be used in:</b>	Utah
<b>Describe the Item:</b>	
<b>Please describe the item application/the end use of the item.</b>	A Flash Point Tester is a device that determines the minimum temperature that an organic liquid with give off sufficient vapor to ignite in air.
<b>Supplier Information:</b>	
<b>Type of Supplier Being Sought (select from the list below):</b>	
Manufacturer	x
Contract Manufacturer	
Distributor	
Other (Please Specify)	
<b>Reason for Scouting Submission (select from the list below)</b>	
2nd Supplier	x
Price	
Re-Shore	
Past supplier no longer available	
New Product Startup	
BABA	
Other (Please Specify)	
<b>Summary of Technical Specifications and Performance Requirements:</b>	
<b>Describe the manufacturing processes (elaborate to provide as much detail as possible)</b>	A Flash Point Tester is a device that determines the minimum temperature that an organic liquid with give off sufficient vapor to ignite in air. A small aliquot of liquid is placed in the test chamber (2-4 ml). The sample is slowly heated and at regular intervals, a heated coil or other ignition source is introduced into the top of the test chamber. If sufficient organic vapor is present the sample will flash or ignite and the temperature at which this happens is the flashpoint of the liquid. If the liquid does not flash, then the temperature of the liquid is increased a small amount, and the liquid is tested again.
<b>Provide dimensions / size / tolerances / performance specifications of the item</b>	The flashpoint tester must contain the following: <ul style="list-style-type: none"> <li>• Instrument needs to be able to determine flashpoints of liquids in the temperature range of -30°C to 100°C.</li> <li>• Unit must internally cooling unit an external or separate cooling or chiller unit may be used for reaching lower temperatures.</li> <li>• Instrument needs to be a closed-cup style tester with the liquid in equilibrium with the vapor.</li> <li>• Regular sample size should be in the 2-4 milliliter range.</li> <li>• Ignition source is to be electric heating coil or similar style ignition source, not gas flame.</li> <li>• Automated flash detector.</li> <li>• Must have a ramp mode style testing.</li> </ul> Start testing at a set value and test continually degree by degree until either material flashes or an end temperature is reached. <ul style="list-style-type: none"> <li>• Automatic internal barometric pressure correction.</li> <li>• Corrosion resistant test chamber.</li> <li>• Data must be exportable to computer (PC).</li> <li>• Must meet the testing criteria found in ASTM D3828 and D3278 or ASTM D3934 and D3941.</li> </ul>
<b>List required materials needed to make the product, including materials of product components, if applicable</b>	Must have corrosion resistant test chamber
<b>Are there applicable certification requirements?</b>	
Yes	
No	x
<b>Please explain:</b>	
<b>Are there any applicable regulations that apply to the production of this item?</b>	
Yes	
No	x
<b>Please explain:</b>	
<b>Are there any other standards / requirements?</b>	
Yes	
No	x

<b>Please explain:</b>	
<b>NAICS CODES:</b>	
<b>NAICS 1</b>	541690 Other Scientific and Technical Consulting Services
<b>NAICS 2</b>	
<b>Additional Comments:</b>	
<b>Additional technical comments:</b>	No Pensky-Martens Closed Cup Testers. This is a different testing protocol (ASTM D93)
<b>Volume and Pricing:</b>	
<b>Estimated Potential Business Volume (i.e. #units per day, month, year):</b>	100 samples per year
<b>Estimated Target Price/Unit Cost Information:</b>	\$20,000.00 - \$45,000.00
<b>Delivery Requirements:</b>	
<b>When is it needed by? (Immediate, 30 days, 6 months, etc.)</b>	By end of 2024
<b>Describe packaging requirements (i.e. individually/group packaging, etc.)</b>	Standard package shipping
<b>Where will this item be shipped?</b>	Sandy, UT
<b>Additional Comments:</b>	
<b>Is there other information you would like to include?</b>	The following companies supply flashpoint testers of the type and quality that is needed. These are supplied for reference and guidance. <a href="https://www.anton-paar.com/us-en/products/details/tag/?sku=263887">https://www.anton-paar.com/us-en/products/details/tag/?sku=263887</a> <a href="https://www.stanhope-seta.co.uk/product/setaflash-series-8-activecool-flash-point-tester-corrosion-resisting-cup/#additional-info">https://www.stanhope-seta.co.uk/product/setaflash-series-8-activecool-flash-point-tester-corrosion-resisting-cup/#additional-info</a>

## **PRODUCT SPECIFICATIONS FOR THE PURCHASE OF A FLASH POINT TESTER**

### **1.0 Scope.**

The objective of the statement of work is to procure a Flashpoint tester to replace an end of service life device.

### **2.0 Overview.**

The SLTC has been using various Flashpoint testers and equipment since the 1970's. The flashpoint of a liquid is the minimum temperature at which a particular organic liquid gives off sufficient vapor to ignite in air. This test is used to support the OSHA safety standard found in CFR 1910.106, flammable liquids. Various flashpoint testers have been used over the year, with the latest, a SETAFLASH series 8, purchased in 2008. At this time, the instrument is reaching its end of service life and a new instrument is needed to maintain the ability to perform this analysis. Also, as laboratory technology is upgrading to a new LIMS system, the new instrument is necessary to communicate with the new LIMS system coming online at the SLTC.

### **3.0 Requirements.**

The DOL, OSHA, SLTC, Industrial Hygiene Chemistry (IHC) Division annually analyzes thousands of samples submitted by Compliance Safety and Health Officers (CSHOs) evaluating worker exposure to regulated chemicals in workplaces all over the United States and the territories of Puerto Rico, Virgin Islands, and Guam. Analytical results provided by SLTC to 2 CSHOs are often used as the basis for citations and these results must be accurate, precise, and defensible in court proceedings.

#### **3.1 Support Requirements**

The flashpoint tester must contain the following:

- Instrument needs to be able to determine flashpoints of liquids in the temperature range of -30°C - 100°C.
- Unit must internally cooling unit and not an external or separate cooling or chiller unit.
- Instrument needs to be a closed-cup style tester with the liquid in equilibrium with 2 the vapor.
- Regular sample size should be in the 2-4 milliliter range.
- Ignition source is to be electric heating coil or similar style ignition source, not gas flame.
- Automated flash detector.
- Must have a ramp mode style testing. Start testing at a set value and test continually degree by degree until either material flashes or an end temperature is reached.
- Automatic barometric pressure correction.
- Corrosion resistant test chamber.

- Data must be exportable to computer (PC).
- Must meet the testing criteria found in ASTM D3828 and D3278. The vendor will supply the flashpoint tester and all software and cabling needed to operate. In addition, on site set-up and training on operation and maintenance is required. Recommended spare parts for a year and a list with parts number of consumables and spare parts. Acceptance criteria will be the demonstration of operation and the ability of the instrument to produce correct results, based on samples of known values being tested and results found to be within known range offices.

Once the equipment is received at OTC and verified, if a problem exists with the equipment the vendor will issue a return authorization and pay to have the supplies shipped back to the vendor. The supplies will be repaired or replaced (at the discretion of the vendor) free of charge under warranty.

#### **4.0 Delivery.**

Products will be delivered 90 days after award. Supplier is responsible for the shipping costs.

#### **5.0 Delivery Location**

OSHA Technical Center  
8660 S Sandy Pkwy  
Sandy, UT 84070