

## \*\*COMPLETE THIS FORM TO INITIATE SUPPLIER SCOUTING\*\*

### MEPNN Supplier Scouting Opportunity Synopsis

\*The submitting organization (MEP Center, requesting company, federal/state agency) agrees to notify NIST MEP of the status of actions taken as a result of this scouting instance within 30 days after receiving a results report. Notification should be via email to [scouting@nist.gov](mailto:scouting@nist.gov), indicating the following:

- Contact with matches identified in report complete and supply contract awarded, process complete
- Contact with matches identified in report complete and no supply contract awarded, process complete
- Contact with matches identified in report complete and supply negotiations underway, process in progress
- Contact with matches identified in report underway; supply negotiations not yet begun; process in progress
- Contact with matches identified in report not yet begun, process in progress
- Contact with matches identified in report will not occur within the next 6-months, process complete

\_\_\_\_\_ days  
Opportunities will be posted for 30 days unless specified

Item to be Scouted

Please describe the item application/ the end use of item.\* Provide the item number if applicable: (N95 Mask vs Protective Mask).

*The stereomicroscope will be used for locating and identifying the shapes and sizes of microplastics in various matrices. A connected camera will take photographs of the microplastics particles.*

Supplier Scouting Number (NIST MEP use)

Scouting customer/product [NAICS Code](#), if known

<b>TECHNICAL INFORMATION:</b>	<b>1. Supplier Information</b>	<b>a. Type of supplier being sought*</b>
		<input checked="" type="checkbox"/> <b>Manufacturer</b> <input type="checkbox"/> <b>Contract Manufacturer</b> <input type="checkbox"/> <b>Distributor</b> <input type="checkbox"/> <b>Other</b> _____
	<b>2. Summary of Technical Specifications and Performance Requirements:</b>	<b>b. Reason for scouting submission*</b>
		<input type="checkbox"/> <b>2<sup>nd</sup> Supplier</b> <input type="checkbox"/> <b>Price</b> <input type="checkbox"/> <b>Re-shore</b> <input type="checkbox"/> <b>Past supplier no longer available</b> <input type="checkbox"/> <b>New Product Startup</b> <input checked="" type="checkbox"/> <b>Other</b> <u>Commercial off the shelf product</u>
		<b>a. Describe the manufacturing processes (elaborate to provide as much detail as possible).*</b>
		<i>Scientific device processes, typically electronic and mechanical assembly.</i>
<b>b. Provide dimensions / size / tolerances / performance specifications for the item.*</b>		
<i>0.5 – 10x optical zoom range.</i>		
<b>c. List required materials needed to make the product, including materials of product components.*</b>		
<i>Components list are as follows: High performance color camera, with image control/processing software with advanced image processing. Fluorescence illuminator with Nile red filter cube.</i>		

2. Summary of Technical Specifications and Performance Requirements cont:	d. Are there applicable certification requirements? * <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No Please explain	
	<i>N/A</i>	
	e. Are there applicable regulations? * <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No Please explain	
	<i>N/A</i>	
	f. Are there any other standards, requirements, etc.? * <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No Please explain	
	<i>N/A</i>	
	g. Additional Comments: Is there other information that would impact the item's performance or usefulness? Please explain. After extensive search, EPA was unable to find any similar products made in the United States.	
BUSINESS INFORMATION:	3. Volume and Pricing	3a. Estimated potential business volume (i.e., # Units Per Day, Month, Year) *: <i>1 Each; one time purchase</i>
		b. Estimated target price / unit cost information (if unknown, explain) *: <i>\$50,000</i>
	4. Delivery Requirements:	a. When is it needed by? (Immediate, 30 Days, 6 months, etc.) * <i>2 months</i>
		b. Describe packaging requirements (i.e., individually/group packaging) * <i>Flexible</i>
		c. Where will this item be shipped? * <i>AWBERC, 26 W. Martin Luther King Dr., Cincinnati, OH 45268</i>
	5. Additional Comments:	Is there other information you would like to include?

Photos or diagrams of the item (helpful but not required).

## MANDATORY TECHNICAL REQUIREMENTS

### A. Equipment Specific Requirements

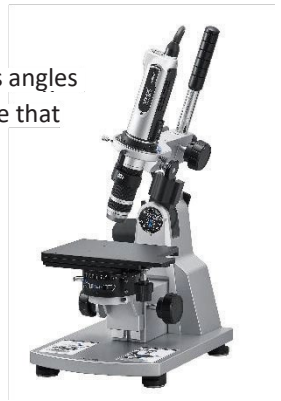
1. 4K Resolution
2. Minimum 27" UHD LCD Monitor (3840 x 2160 pixels)
3. .1x - 5,000x optical magnification WITHOUT switching lenses
4. Integrated Focus View camera
5. Windows 10 Operating System
6. No external PC
7. 1 Terabyte hard disk drive
8. Must be powered by 100-120V AC
9. Built in training videos

### B. Performance Requirements

1. CMOS camera capable of 30 frames/second
2. Availability for 2 cameras to be connected at same time
3. Multi-scan camera with up to 2,000 TV lines and excellent color reproducibility
4. Dedicated LCD display screen pre-installed with Windows 10 operating system that allows full accessibility to PC functionality, including ability to install Microsoft Office and anti-virus software
5. License free Keyence viewer software with an unlimited number of copy licenses with the following functionality:
  - Simple data transfer from VHX to PC
  - Reproducibility of 3D images
  - 2D measurement with engineering assist tools
  - One click consolidation of .csv data into excel file.
6. System interface available via LAN connection or 8 total USB ports (two 3.0 Series A ports and six 2.0 Series A ports)
7. Motorized Z with .1-micron resolution
8. **Infinite Depth of Field**
  - Naturally 20x greater than traditional optical systems
  - Real-time depth composition allows for instant observation of any object entirely in focus
  - Integration with CMOS camera allows for fastest in the industry for the depth composition and 3D modeling features.

## 9. Free-angle stand

- Tilts a total of 150° with 360° rotation in the XY stage. Observing a target from various angles is possible without having to manipulate or move the part. Eucentric design to ensure that the target stays centered in the field of view, even if the lens is tilted or rotated.



## 10. Adjustable Zoom Lenses- Wide Magnification Range

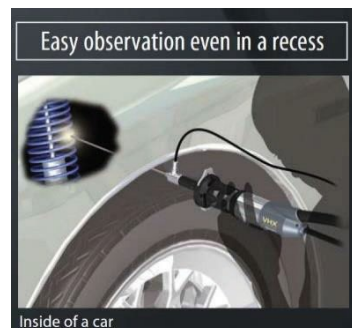
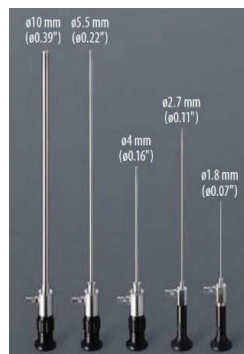
- **HP Camera**

- I. 9 available lenses cover magnification range of 0.1-5000x, allowing unique operation as a stereoscope, metallograph, measurement microscope, and SEM pre-cursor in a single unit.
- II. Bright-Field, Dark-Field, Polarized/Cross-polarized, Diffused, Variable Angle, and DIC (Differential Interference Contrast) lighting options.



## 15. Borescope/Fiberscope Compatible

- Range in diameter from 1.8 to 11.1 mm, and can be either rigid or flexible. Mirrored sleeves allow for 90-degree sidewall inspection for the borescopes. Fiberscope heads can flex up to 135 degrees.



## 11. All-in-one Portable Unit

With built-in LED illumination connected through fiber optic cables, the camera and lens can be disconnected from the stand and used in a hand held operation to view large samples that can't fit on a traditional microscope stand. There are protective contact adapters for the lenses and the camera fiber optic cables are available in 2m, 5m, and 10m lengths.

