



## Ron Smith & Associates, Inc.

### Testing Division

www.RonSmithandAssociates.com | [testing@ronsmithandassociates.com](mailto:testing@ronsmithandassociates.com)

---

## Summary Report

CS Presumptive Blood Testing Proficiency Test #22600PBT

Issued: June 29, 2022

On April 8, 2022, Ron Smith and Associates, Inc. (RS&A) shipped the CS Presumptive Blood Testing Proficiency Test #22600PBT. Participants were required to submit their responses no later than May 20, 2022, in order for them to be included in this summary report.

A total of 80 tests were ordered and shipped, with 65 participants returning their responses. **This summary report is based on 260 individual responses (65 participants returning 4 responses each).** The test included four items for presumptive blood testing.

The results presented in this report reflect whether or not the participants' submitted results agree or disagree with the assigned values garnered from pre-distribution testing and outlined in *The Manufacturer's Report* (Appendix 1). The primary purpose of a Summary Report is to provide an overall documentation of all the submitted responses. It is RS&A's intention to go a step further by providing more meaningful statistical results through analyzing the submitted responses in relation to the demographics obtained from each of the analysts participating in this proficiency test. All results and statistics for this test will be outlined through graphs and charts found in the remainder of this report.

Prior to distribution of this test, all the expected responses were determined, by internal and external consensus, to be either "(+) Positive for Blood" or "(-) Negative for Blood"; however, we are aware that some agencies may allow for a conclusion of "Inconclusive" in their casework. In designing this Proficiency Test, there was no intention to force a participant to render a conclusion which goes beyond their considered opinion. To satisfy this option, participants were allowed to enter "Inconclusive" as a response. Due to the fact that a participant's "Inconclusive" response does not meet the assigned values, it will appear as an inconsistent response in this summary report and be incorporated as such in the statistical analysis. It will be up to each agency to decide if the participant's "Inconclusive" response qualifies as being acceptable under their policies and procedures.

RS&A strives to maintain the confidentiality of all its clients and participants. All results are obtained and published using randomly generated test codes. RS&A will not release the identity of any participant without the written consent of the participant and/or the agency involved.

For any questions or further information, please contact our Proficiency Testing Coordinator by emailing [testing@ronsmithandassociates.com](mailto:testing@ronsmithandassociates.com) or by calling toll free at 1-866-832-6772.

## Appendix 1

### **Test Manufacturer's Information** **CS Presumptive Blood Testing Proficiency Test #22600PBT**

This proficiency test consisted of four items labeled as Item #1 (Swatch of suspected blood), Item #2 (Swatch of suspected blood), Item #3 (Swatch of suspected blood) and Item #4 (Swatch of suspected blood). These items were similar to those normally encountered in crime scene processing. The participant was required to process the items for the presumptive presence or absence of blood. The assigned values are as follows:

<b>Item #</b>	<b>Assigned Value</b>
Item #1 (Blue Jeans)	(+) Presumptive Positive for Blood
Item #2 (Blue Jacket)	(+) Presumptive Positive for Blood
Item #3 (Red T-Shirt)	(-) Presumptive Negative for Blood
Item #4 (Black T-Shirt)	(+) Presumptive Positive for Blood

The assigned values were determined through the ground truth information and verified through unanimous agreement during pre-distribution testing.

**Known Substance used:**

**Item 1:** Human Blood, **Item 2:** Human Blood, **Item 3:** Non-Blood, **Item 4:** Human Blood

Individual reports will be provided to participants by mid-June 2022. The final summary report for this test will be posted on the Ron Smith and Associates website by late June 2022 using the following link:

[www.ronsmithandassociates.com/proficiency/crimesceneprocessing.html](http://www.ronsmithandassociates.com/proficiency/crimesceneprocessing.html)

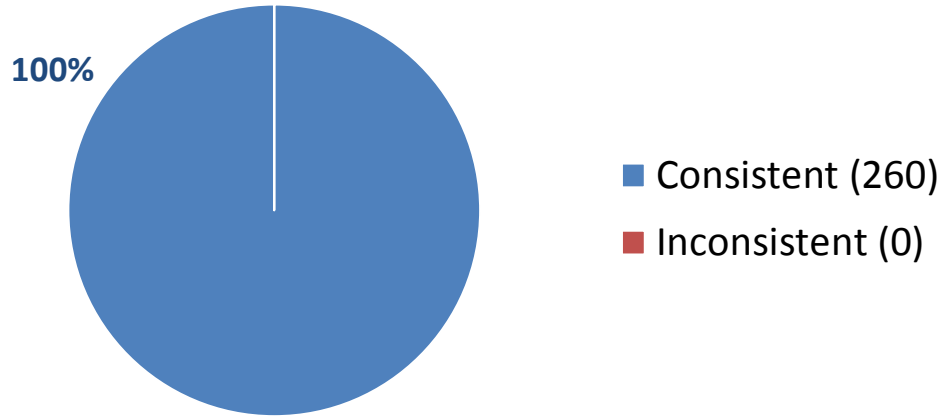
It is recommended to postpone evaluating an individual's performance until after you have received the statistical averages contained in the summary report.

For any questions or further information, contact the Proficiency Testing Coordinator by emailing [testing@ronsmithandassociates.com](mailto:testing@ronsmithandassociates.com) or call toll free at 1-866-832-6772.

**Authorized by:** Ron Smith, President  
**Issue Date:** June 1, 2022

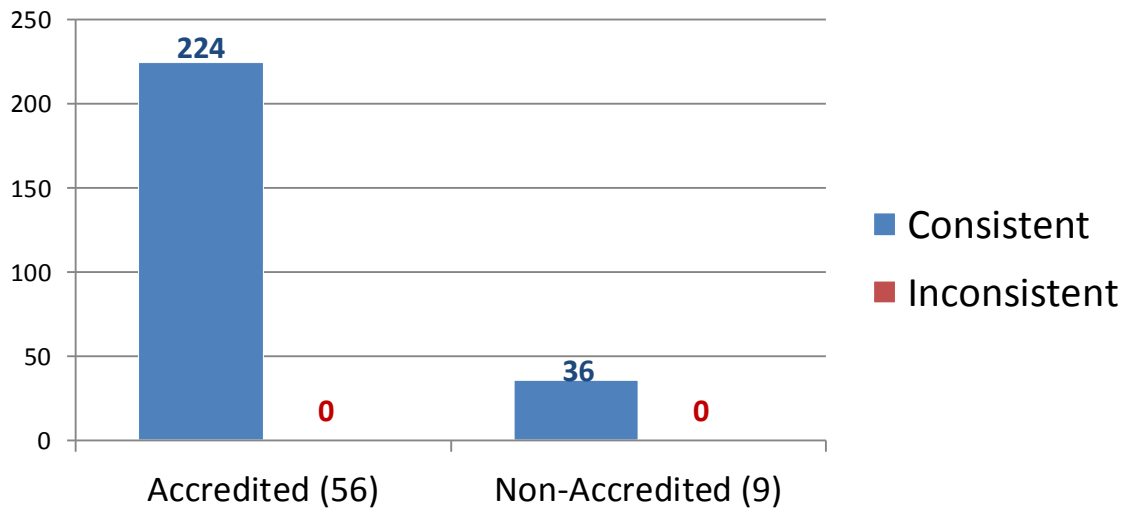
## Appendix 2

### Consistent vs Inconsistent Responses Compared to Assigned Values



## Appendix 3

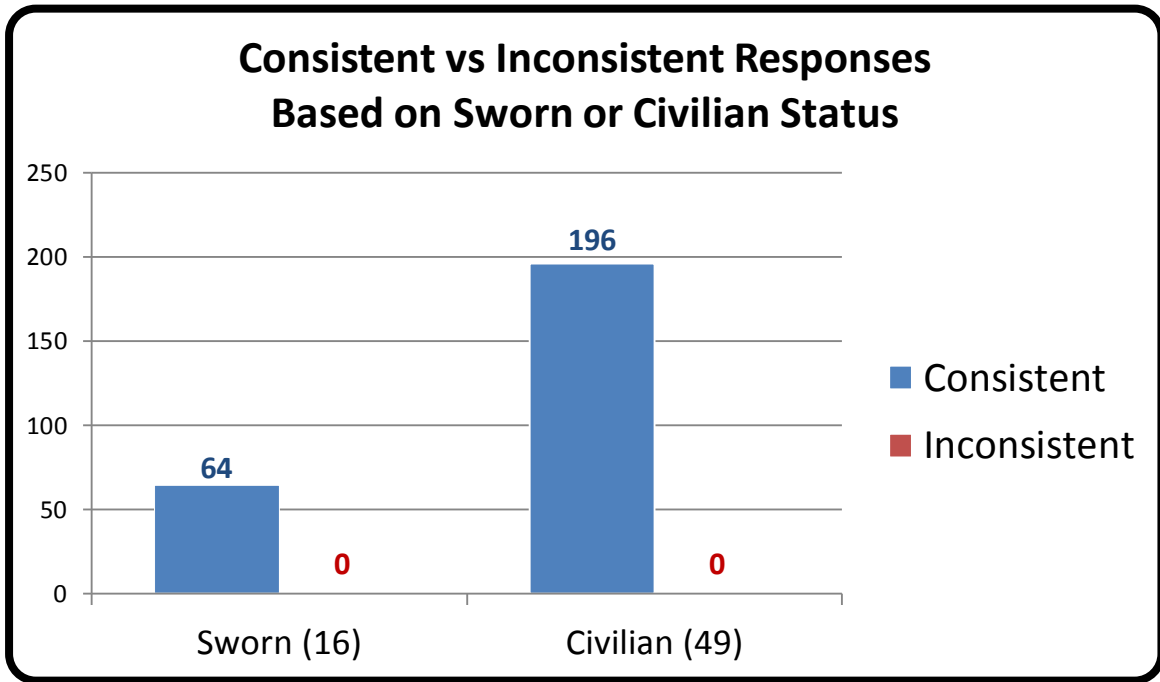
### Consistent vs Inconsistent Responses Based on Accreditation



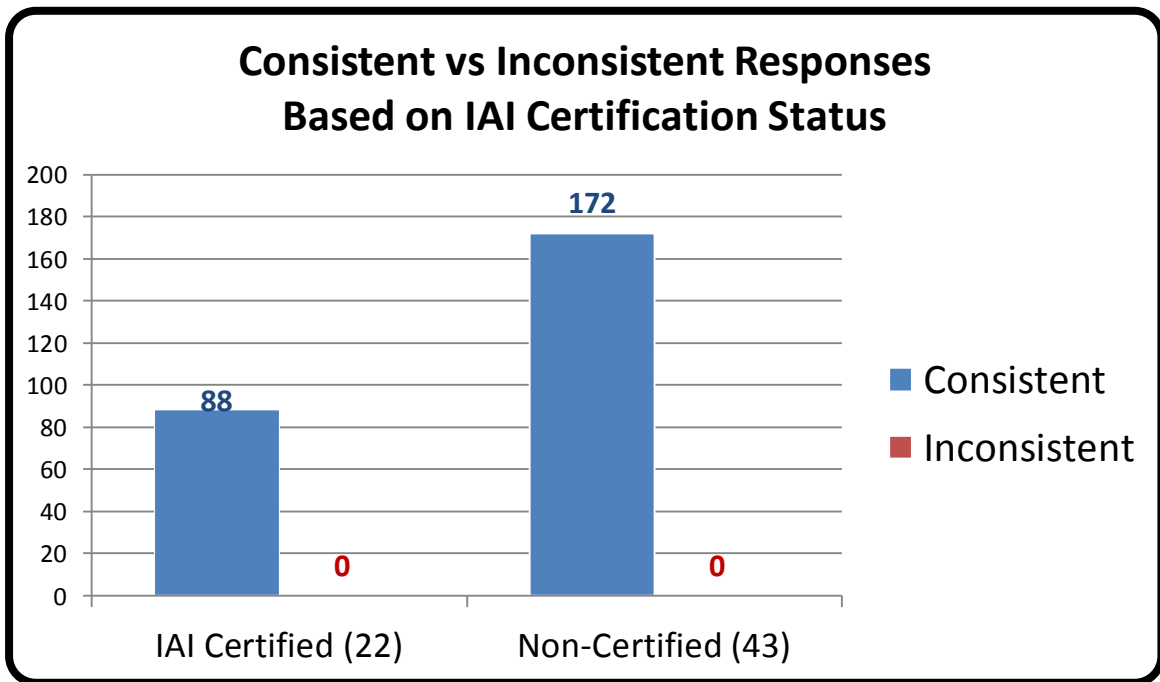
\*Numerical values shown are based on 65 participant submissions, each with 4 responses, equaling 260 total responses.

\*For further information, please read *Manufacturer's Additional Observations* on the final page of this report.

## Appendix 4



## Appendix 5

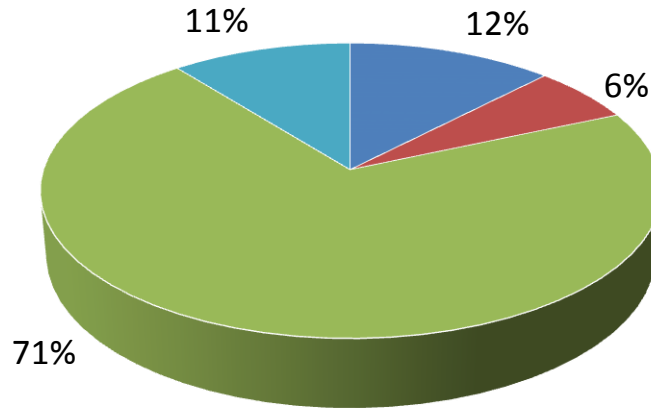


\*Numerical values shown are based on 65 participant submissions, each with 4 responses, equaling 260 total responses.

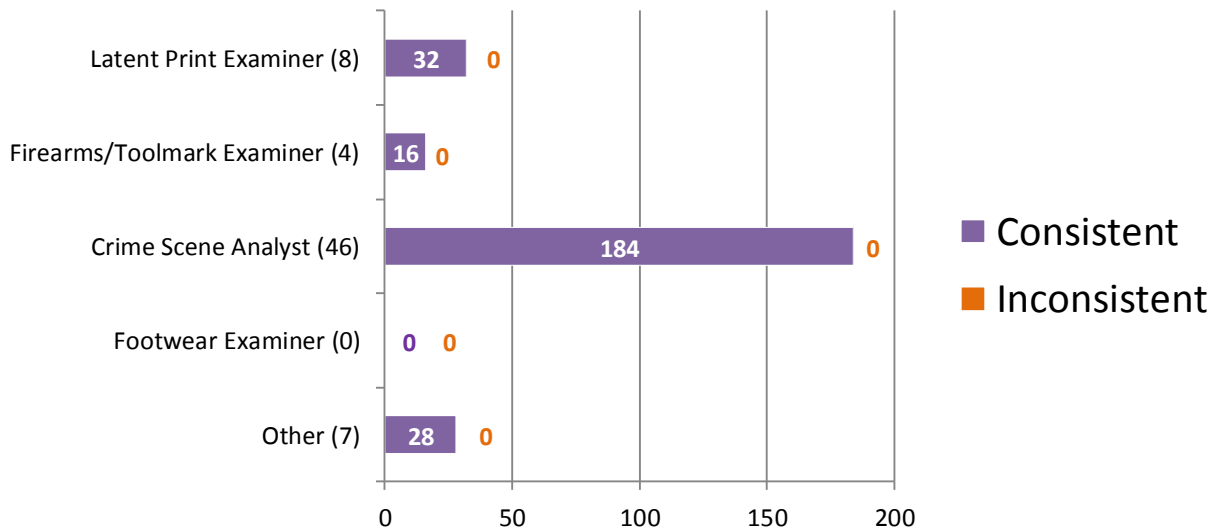
\*For further information, please read *Manufacturer's Additional Observations* on the final page of this report.

## Appendix 6

### Percentage of Participants Based on Primary Job Position



### Consistent vs Inconsistent Responses Based on Primary Job Position

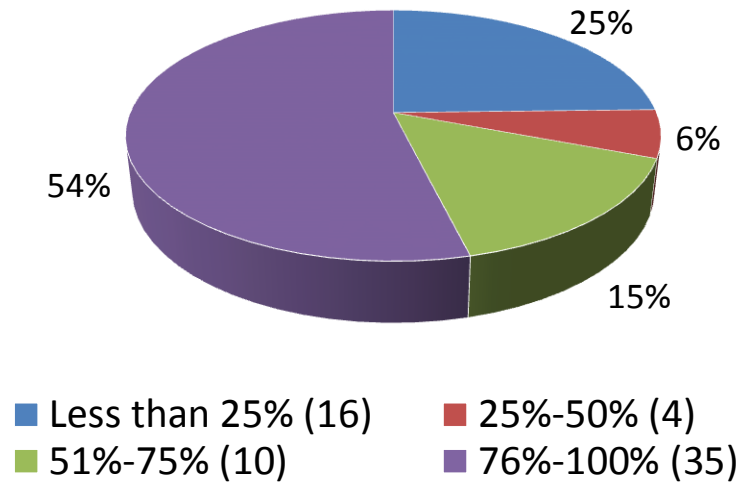


\*Numerical values shown are based on **65 participant submissions, each with 4 responses, equaling 260 total responses.**

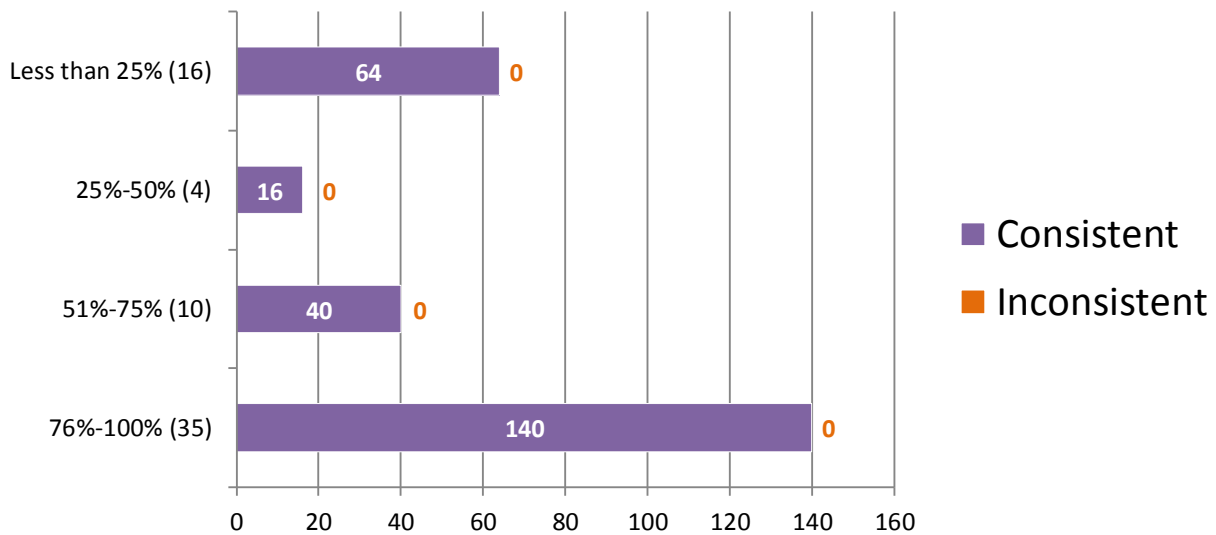
\*For further information, please read *Manufacturer's Additional Observations* on the final page of this report.

## Appendix 7

### Percentage of Participants Based on Time Devoted to Processing Crime Scenes



### Consistent vs Inconsistent Responses Based on Time Devoted to Processing Crime Scenes

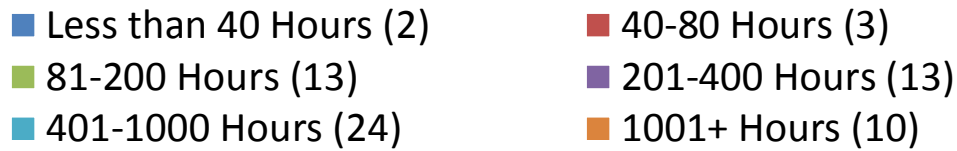
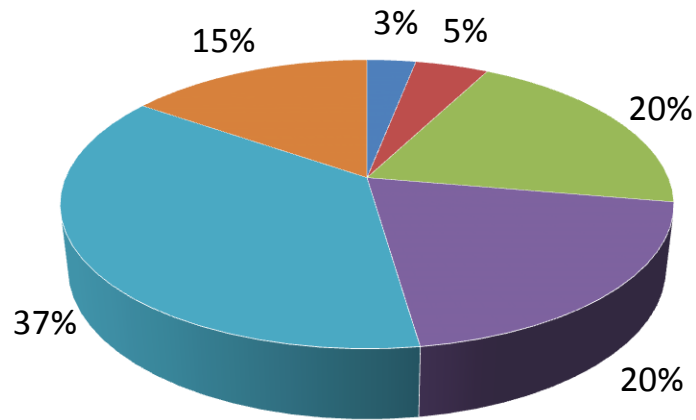


\*Numerical values shown are based on 65 participant submissions, each with 4 responses, equaling 260 total responses.

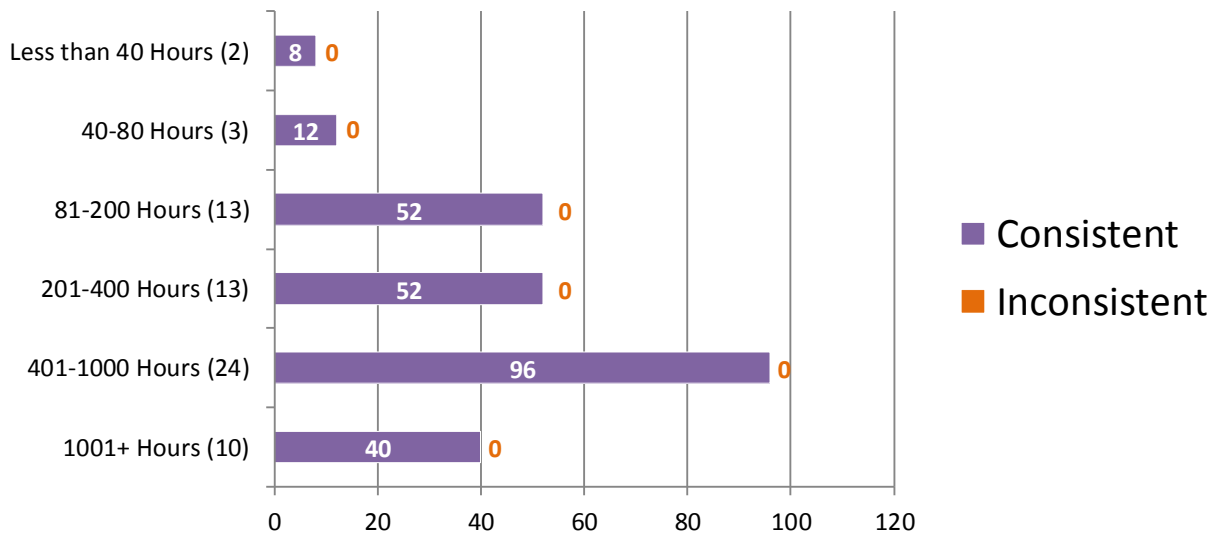
\*For further information, please read *Manufacturer's Additional Observations* on the final page of this report.

## Appendix 8

### Percentage of Participants Based on Hours of Formal Crime Scene Training Completed



### Consistent vs Inconsistent Responses Based on Hours of Formal Crime Scene Training Completed

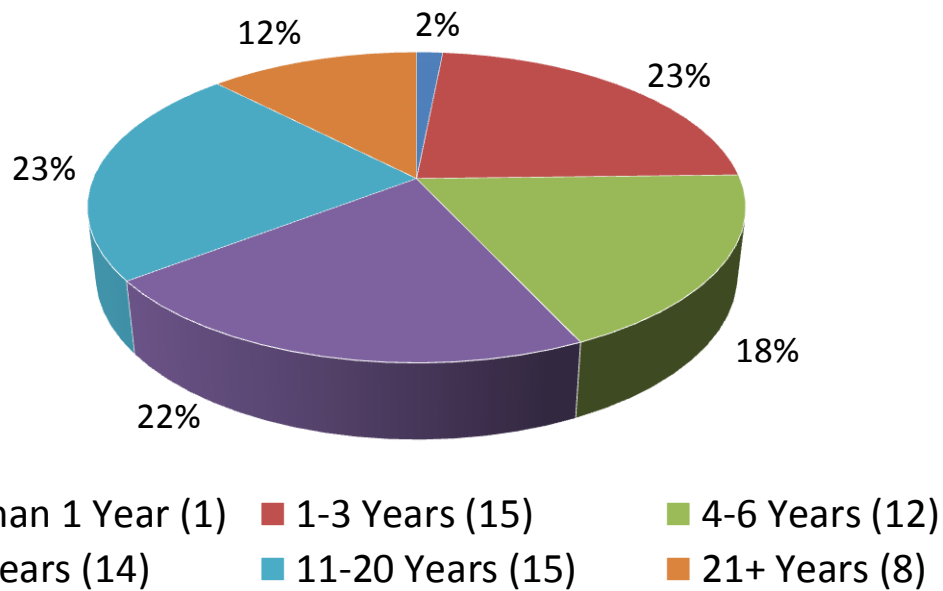


\*Numerical values shown are based on **65 participant submissions, each with 4 responses, equaling 260 total responses.**

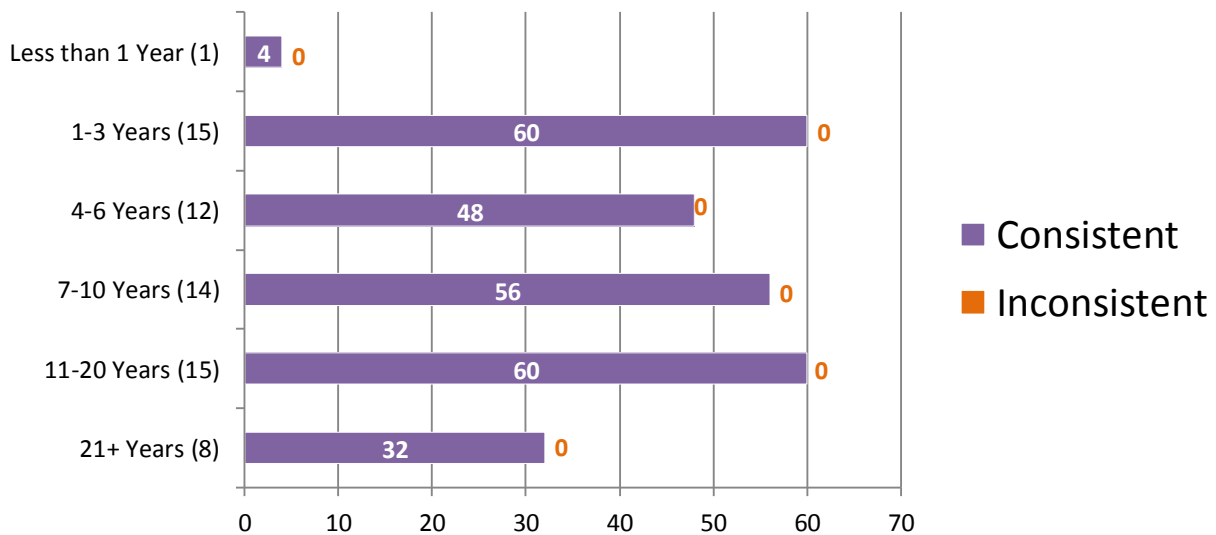
\*For further information, please read **Manufacturer's Additional Observations** on the final page of this report.

## Appendix 9

### Percentage of Participants Based on Years of Experience in Crime Scene Processing



### Consistent vs Inconsistent Responses Based on Years of Experience in Crime Scene Processing



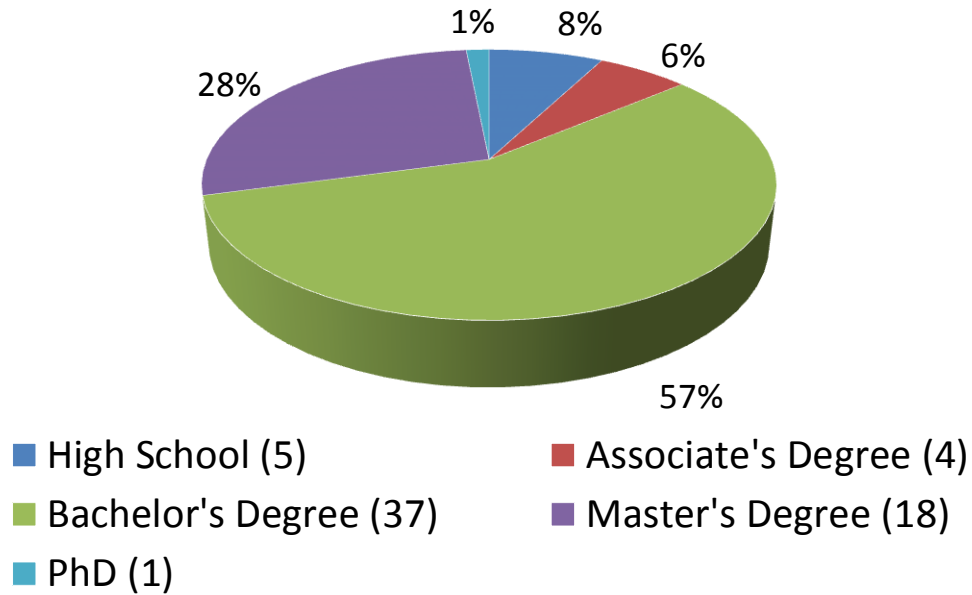
\*Numerical values shown are based on **65 participant submissions, each with 4 responses, equaling 260 total responses.**

\*For further information, please read **Manufacturer's Additional Observations** on the final page of this report.

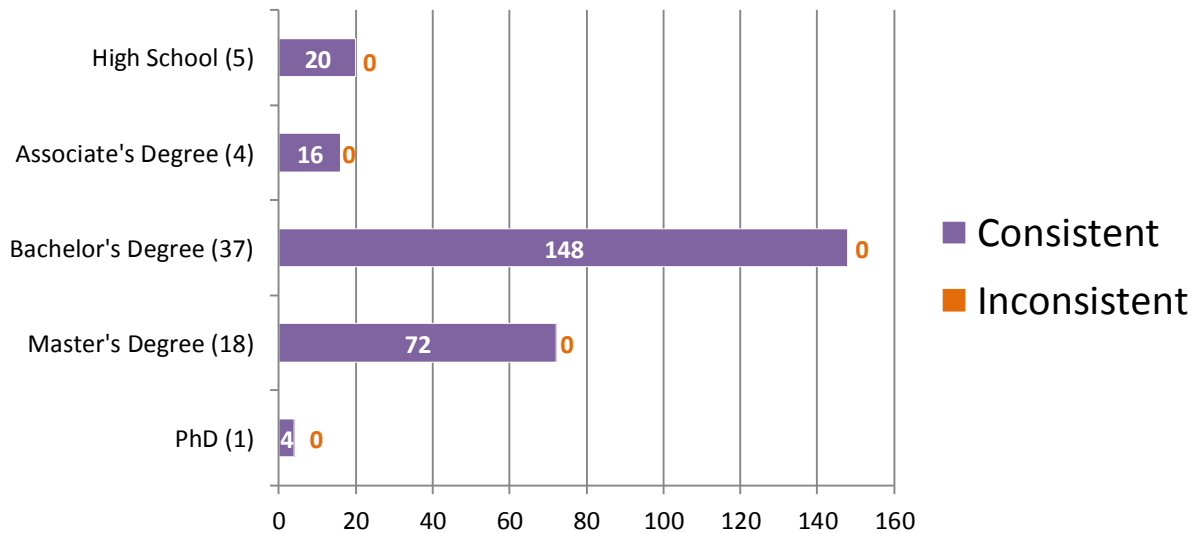


## Appendix 10

### Percentage of Participants Based on Highest Level of Education Completed



### Consistent vs Inconsistent Responses Based on Highest Level of Education Completed

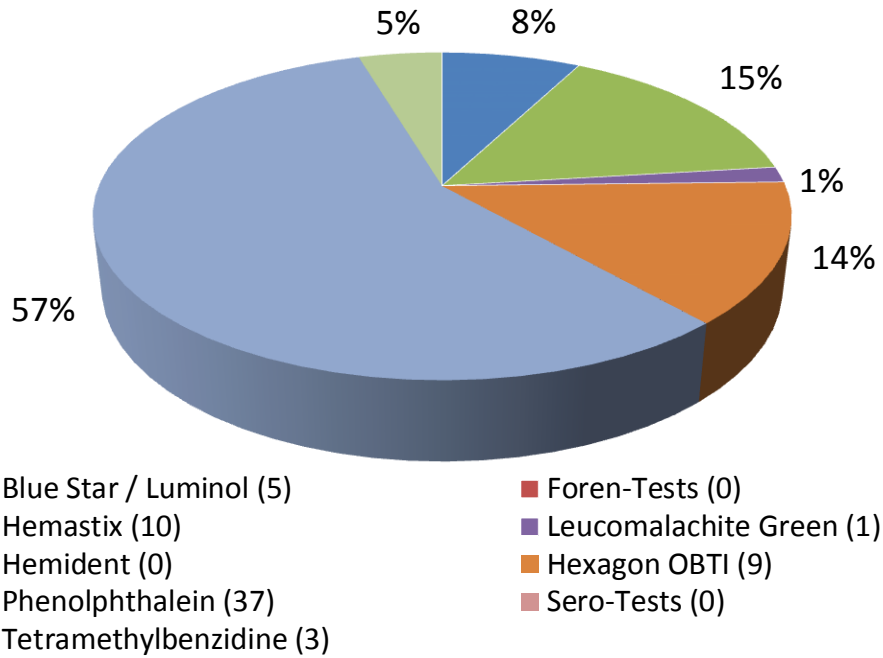


\*Numerical values shown are based on **65 participant submissions, each with 4 responses, equaling 260 total responses.**

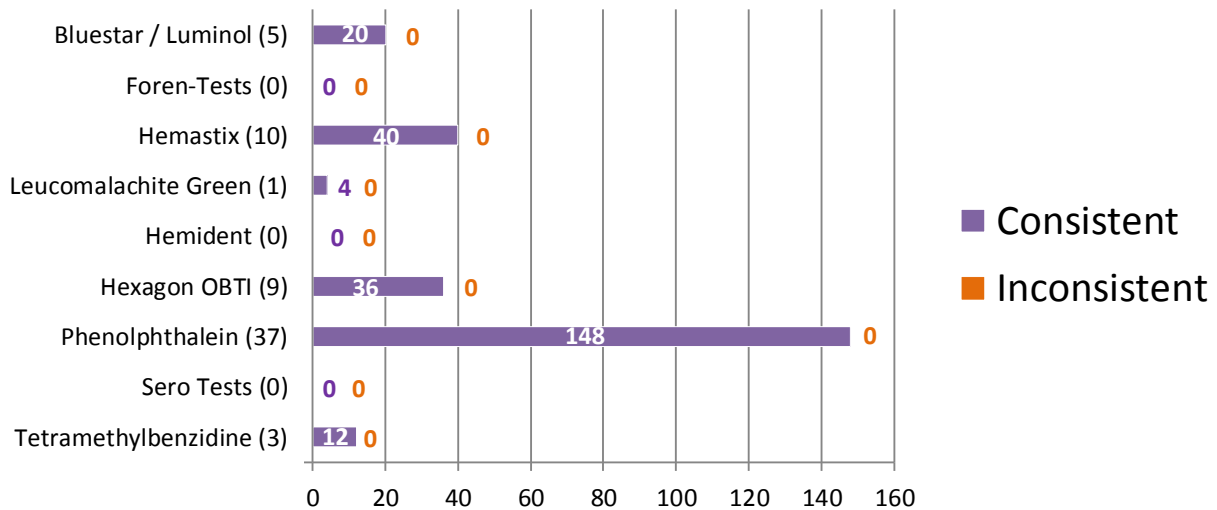
\*For further information, please read **Manufacturer's Additional Observations** on the final page of this report.

## Appendix 11

### Percentage of Participants Based on Presumptive Method Used



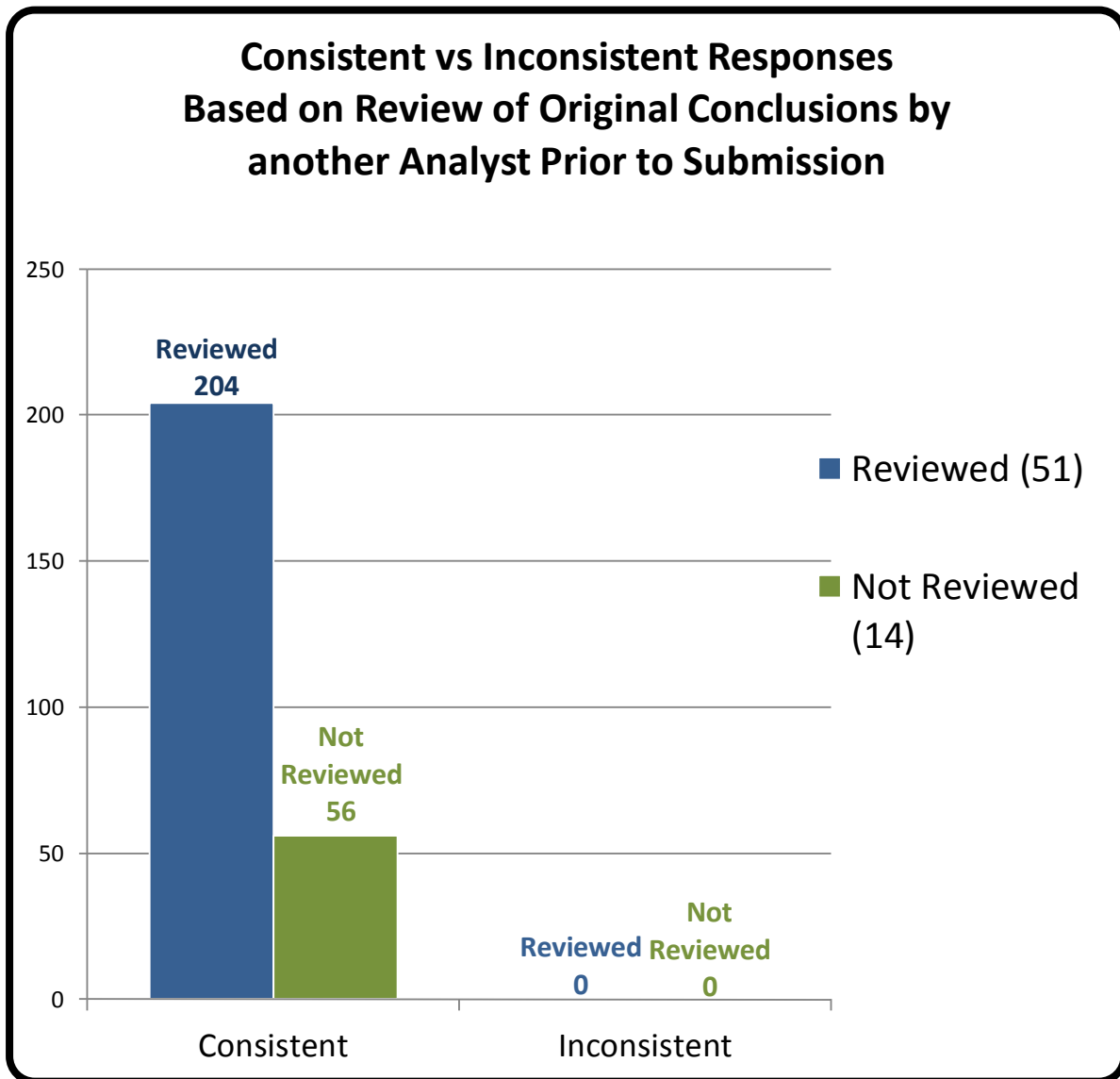
### Consistent vs Inconsistent Responses Based on Presumptive Method Used



\*Numerical values shown are based on **65 participant submissions, each with 4 responses, equaling 260 total responses.**

\*For further information, please read **Manufacturer's Additional Observations** on the final page of this report.

## Appendix 12



\*Numerical values shown are based on **65 participant submissions, each with 4 responses, equaling 260 total responses.**

\*For further information, please read ***Manufacturer's Additional Observations*** on the final page of this report.

## Appendix 13

### Participant Responses Listed by Test Code

Item #	Item #1	Item #2	Item #3	Item #4	
<b>Assigned Values</b>	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood	
Test Code	1935Y22600PBT	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
	9363P22600PBT	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
	2381J22600PBT	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
	5739K22600PBT	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
	7647W22600PBT	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
	9560F22600PBT	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
	560F22600PBT	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
	2011O22600PBT	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
	2268W22600PBT	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
	4899A22600PBT	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
	4186V22600PBT	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
	4574J22600PBT	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
2511H22600PBT	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood	

	<b>5337Z22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>3681K22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>4887N22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>3058C22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>847G22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>6416D22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>9955F22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>7874E22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>5731J22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>5484T22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>5064S22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>5273P22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>7037G22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>1292H22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>494B22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
	<b>8337N22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>

<b>1874E22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>9138K22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>4501D22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>4037H22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>4817C22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>9896M22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>1298M22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>7073F22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>8474Q22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>1095K22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>9855S22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>4181G22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>5221W22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>9591Z22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>9222Z22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>3952M22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>

<b>7880K22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>9949A22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>949J22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>1808X22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>2389V22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>6309R22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>3549M22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>9580D22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>4203Q22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>6312J22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>4472J22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>463Q22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>6651Q22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>8902D22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>1130H22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>
<b>7419X22600PBT</b>	<b>(+) Positive for Blood</b>	<b>(+) Positive for Blood</b>	<b>(-) Negative for Blood</b>	<b>(+) Positive for Blood</b>

	<b>9804G22600PBT</b>	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
	<b>3095Q22600PBT</b>	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
	<b>7862Q22600PBT</b>	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
	<b>9013O22600PBT</b>	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood

### Totals

Item #	Item #1	Item #2	Item #3	Item #4
<b>Assigned Values</b>	(+) Positive for Blood	(+) Positive for Blood	(-) Negative for Blood	(+) Positive for Blood
<b>Consistent Responses</b>	65	65	65	65
<b>Inconsistent Responses</b>	0	0	0	0
<b>Percentage of Consistent Responses</b>	100%	100%	100%	100%

### Participant's Additional Comments

Test ID	Comments
<b>2268W22600PBT</b>	Siemens Hemastix Reagent Strips Lot # 105050, exp. 11/20/2022
<b>4186V22600PBT</b>	THE REAGENT USED WAS BLUESTAR FORENSIC TABLETS
<b>4574J22600PBT</b>	Item 4 sequentially tested: 1st presumptive + luminol, 2nd presumptive + Phenolphthalein
<b>5337Z22600PBT</b>	None
<b>3681K22600PBT</b>	Item #1 - blue denim with red brown stain Item #2 - dark blue fabric with dark stain Item #3 - red fabric with black stain Item #4 - dark fabric with no visible stain (presumptive was faint +)
<b>847G22600PBT</b>	POSITIVE AND NEGATIVE CONTROLS AS EXPECTED
<b>6416D22600PBT</b>	item 1 very strong result. item 2 & 4 weak result.
<b>5064S22600PBT</b>	Item #4: IR camera P/C = Pass Phenol Q/C = +/- ok



	TMB Q/C = +/- ok
494B22600PBT	SE USO REACTIVO BLUESTAR QUE NO ESTA ENLISTADO COMO PRUEBA PRESUNTIVA USADA
8337N22600PBT	SE UTILIZA EL REACTIVO BLUESTAR NO CONTEMPLADO EN EL APARTADO PRUEBA PRESUNTIVA USADA
1874E22600PBT	QUE SE UTILIZO EL REACTIVO BLUESTAR FORENSIC NO ENLISTADO COMO PRUEBA PRESUNTIVA USADA
9138K22600PBT	SE HACE USO DEL REACTIVO BLUESTAR NO ENLISTADO DENTRO DE PRUEBA PRESUNTIVA USADA.
4501D22600PBT	Leucomalachite Green (LMG) was used
9896M22600PBT	Presumptive Test: ortho-tolidine
7073F22600PBT	Note: Participant used Hexagon OBTI for testing of all (4) items. This was not an option for Presumptive Test Used.
8474Q22600PBT	Note: Participant used Hexagon OBTI presumptive test for all (4) items. This was not a possible answer.
1095K22600PBT	Note: Participant used Hexagon OBTI presumptive test for all (4) items. This was not a possible answer.
9855S22600PBT	Note: Participant used Hexagon OBTI presumptive test for all (4) items. This was not a possible answer.
4181G22600PBT	Note: Participant used Hexagon OBTI presumptive test for all (4) items. This was not a possible answer.
5221W22600PBT	Note: Participant used Hexagon OBTI presumptive test for all (4) items. This was not a possible answer.
4203Q22600PBT	Positive Control: positive/pink color change reaction using known blood sample Negative Control on sterile swab: negative/no color change observed
6312J22600PBT	Positive and negative controls were completed prior to testing. Positive control with known blood sample turned a pink color indicating a presumptive positive. Negative control with a sterile swab showed no color change indicating a presumptive negative.
3095Q22600PBT	**Ortho-tolidine used for all stains, not Sero-Tests (unable to leave blank above)
7862Q22600PBT	**Ortho-tolidine used for all stains, not Sero-Tests (unable to leave blank above)
9013O22600PBT	Note: I tested all 4 items with both Kastle-Meyer and Hemastix. I would suggest changing the wording for the negative result to just "Negative for Blood".

## Manufacturer's Additional Observations

Based upon a review of the submitted responses, the following observations were noted:

1. Regardless of experience, education, training, certification, accreditation or employment status, no inconsistent answers were submitted.

**Authorized by:** Ron Smith, President  
**Date of Issue:** June 29, 2022