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April 18, 2013

NUCLEAR REGULATORY COMMISSION
Attn: Richard K. Struckmeyer, Health Physicist
WASHINGTON, DC 20555 – 0001

Subject: REQUEST FOR ADDITIONAL INFORMATION - APPLICATION FOR EXEMPT DISTRIBUTION
LICENSE NO. 12-23809-01 E

Dear Mr. Struckmeyer:

This letter is a follow-up to my previous letter dated April 9, 2013, and provides additional information for items 5 and 12.

Item 5 - Title 10, Code of Federal Regulations, Section 32.14(b)(4) requires procedures for and results of prototype testing to demonstrate that the byproduct material will not become detached from the product and that the byproduct material will not be released to the environment under the most severe conditions to be encountered in normal use of the product. Please provide these procedures and describe the prototype testing performed on the product.

The most severe condition likely to be encountered in normal use of the product is a fire. BRK Brands uses source AMM.1001H as stated on our various licenses. Included with this letter is documentation provided by QSA Global regarding the AMM.1001H source. This letter states in part that, "The AMM.1001H source is designed to withstand fire conditions without leakage. Fire tests...indicate that they do not leak if they are kept below 800C. At much higher temperature, the source materials may melt into spheres, but they still retain the vast majority of the radioactive contents."

Item 12 – Title 10, Code of Federal Regulations, Section 32.15(a){3} requires that each person licensed under § 32.14 shall visually inspect each unit in inspection lots. Any unit that has an observable physical defect that could affect containment of the byproduct material shall be considered as a defective unit. Please describe how you shall visually inspect each unit in inspection lots for defects.

In accordance with 32.15 (a)(3), drawings are provided that describe how containment is verified.

As shown on drawing IT-IO-014, 100% of production is visually and electronically checked to confirm that the source is properly installed.

As shown on drawing IT-IO-301, 100% of production is visually checked to confirm that the ionization chamber is secured to the circuit board.

As shown on drawing PP-IO-023, every ionization chamber assembly is subjected to a 2 lb pull-test to confirm integrity.

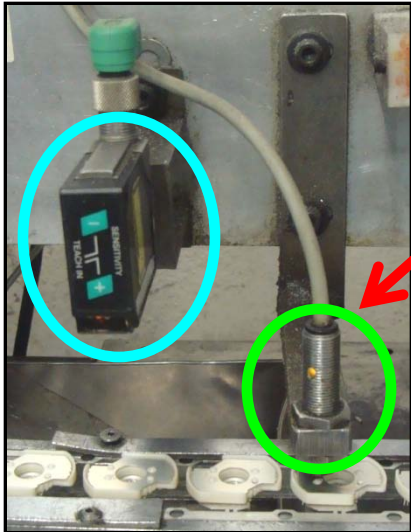



The procedures described above insure that all ionization chambers are secure that that the radioactive source is contained using visual, mechanical and electronic methods.



Sincerely,

Mark Dippner

Mark H. Dippner
Compliance Engineer, RSO
First Alert/BRK Brands, Inc.
Aurora, IL 60504-8122

Op. No.	▲ Requirements	■ Operation / Equipment	● Verification	Picture or Visual Aid
17	•Crestwood Valox Assy. Machine.	•The sensor in blue circle – PICTURE # 1 will detect the defective valox with missing radioactive source, and the sensor in green circle will detect the valox with missing plate. All defective valox will be dropped in a container – PICTURE # 2.	•Verify that the leads are free of any damage.	<div>PICTURE #1 </div> <div>Sensor checking for source in the valox</div>
18	•Packaging box free of damage or dots.	•The missing radioactive sources will be manually assembled to the valox, as referenced in IT, ENSPASIT-001.		<div>PICTURE #2 </div>
19	•Scale	•The accepted valox will be released by the ramp and dropped inside the box – PICTURE # 3.	•Verify that the box weight is correct.	
20	•Print JQ3-002	•Check the weight of the box, it must be of 41.60 and must be identified according to Print JQ3-002 – PICTURE # 4.		<div>PICTURE #3 </div> <div>PICTURE #4 </div>
21	•Forms	•Perform the indicated testing process every hour.		
22	FCP-097, FCP-066 & Piece x Hr.	•Verify the process every hour and notify to the Group Leader or Supervisor in case of a discrepancy.	•Verify by a visual inspection that the radioactive source is in place.	
		IMPORTANT: Fill in the forms FCP-097, FCP-066 and Piece x Hr.		

Mfg. Engineering:

Samuel Caraveo

Quality Assurance:

Julio Esparza

Production Supervisor:

Carlos Aguilar







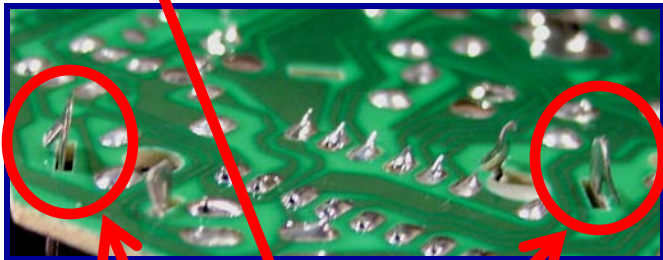
Originator :

Cristina Cano

Date:

14-MAY-2010

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		Work Inst. Title : ION CHAMBER ASSEMBLY TO PCBOARD			Document #	Copy # :	Cell # :	
		Facility 1	Family Various	Rev. B	IT-IO-301			
Op. No.	 Requirements	 Operation/Equipment	 Verification	Visual Aid or Picture				
1	<ul style="list-style-type: none"> • Ion chamber subassembly according to BOM list. 	<ul style="list-style-type: none"> • Take one PCBboard and ion chamber. 	<ul style="list-style-type: none"> • Verify the proper assembly of valox. 	<div> <p>Inside of Valox Assy.</p> <p>PICTURE #1</p>  <p>PICTURE #2</p>  <p>Mechanical lock and welding of chamber</p> </div>				
2	<ul style="list-style-type: none"> • PCBoard with valox assembled. 	<ul style="list-style-type: none"> • Place the ion chamber in the assigned area of PCBoard, in such a way that the longest lead of the ion chamber remains over the mark in the PCBoard bridge J1. Picture #1 	<ul style="list-style-type: none"> • Verify that the ion chamber is free of any damage, such as : <ul style="list-style-type: none"> A) Plastic flashes in the housing. B) Shapeless housing. C) Metal plate fully assembled to housing (black chamber). 					
3		<ul style="list-style-type: none"> • Press down over the upper side. 						
4		<ul style="list-style-type: none"> • The metal leads must fully cross the PCBoard width. Picture #2 	<ul style="list-style-type: none"> • Very that the ion chamber leads are properly oriented to prevent a damage in the PCBoard copper traces. 					
5		<ul style="list-style-type: none"> • Pull up the ion chamber carefully to verify that it has been properly assembled to the PCBoard. 	<ul style="list-style-type: none"> • Verify the proper assembly of the ion chamber. 					
Mfg. Engineering : <i>Cesar Santillan</i>		Quality Assurance: <i>Julio Esparza</i>	Production Supervisor: <i>Rosa Flores</i>	Originator : <i>Cesar Santillan</i> Date: 18-Julio-11				
								Page 1 of 1

Op. No. Process.Equip/Mach Parameter -Verification
(Mechanic, Hydraulic, Electric, etc)

Visual Aid or Picture

1

Unitek Equipment

Electrodes

LOCATION:	VARIABLES TO BE CONTROLLED :	LEFT	RIGHT
UNITEK-EQUIPMENT	SQUEEZE	20 to 100	20 to 100
UNITEK-EQUIPMENT	UP	2.0	2.0
UNITEK-EQUIPMENT	WELD	600 to 1000 KA	600 to 1000 KA
UNITEK-EQUIPMENT	PULSE1	2.0 to 10	2.0 to 10
UNITEK-EQUIPMENT	DOWN	1.0 to 3.0	1.0 to 3.0
UNITEK-EQUIPMENT	COOL	0.1 to 0.3	0.1 to 0.3
UNITEK-EQUIPMENT	HOLD	30 to 70	30 to 70
PULL TEST-EQUIPMENT	PULL TEST	30.8 to 31.2	30.8 to 31.2

Any adjustment in the machine out of these parameters will be considered as a failure.



Mfg. Engineer:

Israel Jimenez

Q.A. Engineer:

Julio Esparza

Maintenance Supervisor:

Javier Alvarez

Originator:

M. Lucio

Date:

28-Dec-11

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