

Tritium Laboratory
12 August 2010

SWAB REPORT # 552

SWAB DATE: 29 July 2010

RV Atlantis
and Radioisotope Van

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Distribution:
SWAB Committee
David Fisichella

REPORT FOR SWAB # 552

LOCATION: Astoria, OR
 TECHNICIAN: Charlene Grall
 VESSEL/LAB: *R/V Atlantis*

DATE: 29 July 2010
 STATUS: See Comments

SAMPLE #	SAMPLE IDENTIFICATION	NET ACTIVITY EXTRACTED	
		³ H dpm/m ²	¹⁴ C dpm/m ²
1	Machine blank	0	0
2	Initial bucket blank C.O. #1	0	0
<u>Main Lab (See Figure 1)</u>			
3	Deck in front of Revco freezers	5	1
4	Deck below stbd computer area	0	0
5	Deck in front of stbd refrigerator	0	0
6	Inside stbd. freezer top (coal dust)	0	1
7	Inside stbd. fridge bottom	58	11
8	Port sink area	26	0
9	Deck inside fwd. port entrance	0	0
10	Deck in front of port sink	0	7
11	Deck inside aft. port entrance	0	0
12	Deck in front of stbd. sink	80	68 *
13	Inside fume hood	1	0
14	Deck in front of hood	9	0
<u>Bio/Analytical Lab (See Figure 1)</u>			
15	Inside top freezer	0	0
16	Inside bottom freezer	0	0
17	Fwd. benchtop, Scope area	0	0
18	Deck in front of freezer	0	0
19	Deck inside stbd entrance	21	0
20	Deck inside aft entrance	32	0
21	Deck in front of fume hood	0	0
22	Aft. benchtop and sink area	0	0
<u>Miscellaneous Areas (See Figure 2)</u>			
23	Deck outside walk-in freezers	0	0
24	Deck inside fwd. walk- in freezer	0	0

25	Aft. benchtop of fwd walk-in	0	0
26	Deck inside Science Office entrance	0	1
27	Companionway btwn Main and Bio-A Labs	0	0
<u>Electronics/Computer Lab (See Figure 2)</u>			
28	Deck inside fwd entrance	0	0
29	Deck betwb map filecabinet and bench	0	0
30	Deck inside stbd entrance	0	0
31	Final bucket blank C.O. #1	0	0
32	Initial bucket blank C.O. #2	0	0
<u>Wet Lab See Figure 3)</u>			
33	Inside fume hood	13	0
34	Fwd sink area	0	0
35	Deck in center near port entrance	0	0
<u>Hydro Lab (See Figure 3)</u>			
36	Deck in front of stbd sink area	0	0
37	Deck inside stbd door	0	0
38	Deck in front of port sink	0	0
39	Deck below freezers/refrigerators	13	0
<u>Radioisotope Van (See Figure 4)</u>			
40	Deck outside van port entrance	36	0
41	Deck outside van aft entrance	0	5
42	Deck inside aft and port doors	1349 *	2218 *
43	Bench top above refrigerator	259	460 *
44	Sink area	1915 *	3630 *
45	Benchtop across fume hood	124	317 *
46	Benchtop above freezer	382	738 *
47	Inside refrigerator	1354 *	2647 *
48	Inside freezer	45	151 *
49	Inside fume hood	458	833 *
50	Deck under escape hatch	1138 *	2085 *
51	Deck center of van	1217 *	2187 *
52	Benchtop across from sink	200	364 *
53	Final bucket blank C.O. #2	0	0

Comments

All areas tested on the the ship were free of radioisotope contamination, except for deck

under starboard sink in the main lab where minor ^{14}C contamination was found. This area should be cleaned before any natural tracer work. Minor ^{14}C and ^3H contamination was found in the rad van. We recommend the deck areas be cleaned to prevent tracking into the ship.

