

#8

410859

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Decay Data

T113-54-595
Project Officer,
Project 4.2

Task Unit 13

2 Apr 54

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1. The information in this DF has been collected by Captain Bennett for transmission to you.

2. Meter reading on flight deck, aft, U.S.S. Bairoko at B + 33 hrs + 2 made with ion chamber by Devlin 1/32" celluloid for Beta + Gamma, 1/4" polyethylene closed end cylinder placed around chamber for Gamma.

- At deck level Beta + Gamma = 2.5 RSP/hr (Gamma = 0.25 R/hr)
- At knee level Beta + Gamma = 1.2 RSP/hr (Gamma = 0.15 R/hr)
- At film badge level (~4') Beta + Gamma = 0.5 RSP/hr (Gamma = 0.1 R/hr)

3. Energies of Gamma determined with Pb absorption by Dr. Carl Miller at B + 12 days:

- 68% 0.1 - 0.2 Mev
- 18% 0.3 Mev
- 14% 1.2 Mev

Samples were too thick to measure Beta. Believe activity is 750% ^{239}Pu . The best estimate for B + 8 days is 66% ^{239}Pu .

4. Decay and absorption of samples from Rongelap at B + 12 days are the same as those of samples from Bikini at B + 12 days. From this, it is concluded that there is no significant difference between Bikini fallout and Rongelap fallout, however meter readings on Bairoko were made after deck had been washed down with sea water. Further salt water washdown reduced level on the Bairoko but did not alter the Beta/Gamma ratio.

STATUS VERIFIED UNCLASSIFIED

Dev *BN* 5/7/97
 AUTHORIZED DERIVATIVE CLASSIFIER DATE

NEIL E. KIBBELEY
 Captain, USN, USMC
 Deputy Commander

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CAUTION

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