24 AUG 1979

VISAM 856(R) SSWI/USI/J24 24 August 1979

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TPC VISIT REPORT Α.

> Discussion of Grapple Crave Subject:

and & Radioflash measurements.

В. Type of Meeting: JOWOG 24 - 14-17 August 1979.

> Participants: UK បន

C. Purpose of Meeting: To review the data obtained from measurements made at F and D sites on Grapple Z which represent the closest data for any nuclear test.

D. Information exchanged:

> The records under consideration consisted of very wide band oscilloscope and distributive amplifier measurements made to obtain the multiplication rate and of the balloon shots round: 1 and 4 Grapple Z, and in of the balloon shots round: 1 and 4 Grapple 2, and in particular one measurement which was made with a number of such equipments to form a time-correlated record covering a large number of generations. It should be noted that the early time history of a radioflash measurement contains many components, some of which are dependent upon the magnetic bearing as a generation mechanism is related to the magnetic field and some of which have opposite polarities. The particular mixing of these waveforms will determine the final polarity. In this particular case we also have a direct IEMP effect of gamma-induced electrons in the antenna. The polarity of this signal is also very difficult to determine.

The UK radioflash measurements made at D and F sites, and in particular F were discussed in great detail with particular importance being paid to whether or not the polarity of the signal was correct. All the UK radioflash information has been carefully tabulated and stored, and resides in a special cabinet in the AWRE Library. A great deal of this information, together with original log books and circuit diagrams were studied to confirm the accuracy and polarity of these measurements made 21 years ago.

Circuit diagrams of the instrumentation, details from log books and photographs of the site, aerial systems and calibrations were given to the US.

E. Accomplishments:

> were fully satisfied with explanations The visitor from given and no further meetings are thought to be necessary.

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