

EDUCATION, SCIENCE AND TRAINING

SENATE LEGISLATION COMMITTEE - QUESTIONS ON NOTICE 2003-2004 BUDGET ESTIMATES HEARING

Outcome: 3

Output Group: 3.2 – Assistance for science collaboration and innovation

DEST Question No. E147_04

Senator Allison asked on 4 June 2003, EWRE Hansard page 382

Question:

The report says on page 132 that the amount of plutonium consigned to the pit et cetera was 650 grams. In other parts, there is reference to the Cornish report and the estimate of two to 20 kilograms. It is my understanding that the figure is more likely to be 3.1 kilograms overall on the site. Why was the figure of 650 grams so precise, given the range which the Cornish report identified?

Answer:

Plutonium in Taranaki pits

Various estimates were made of the amount of plutonium in the Taranaki pits prior to the Maralinga Rehabilitation Project. Table 3.9 of the MARTAC report lists eleven estimates made for the contents of the Taranaki pits by various authors prior to the start of the project. These estimates range from 20 kg (Pearce 1964 and Pearce 1968) through to 1-3 kg (Carter 1980). Cornish estimated that there was between 2-20 kg of plutonium in the pits.

Page 128 of the MARTAC report lists difficulties associated with the estimates.

The MARTAC estimate of 650 grams for the amount of plutonium in the Taranaki pits is, of course, a post-project estimate, and the relevant data is reported in Tables 4.9 and 4.17 in the MARTAC report. The extensive field data that underpins these two tables are in Attachments 4.8 and 4.10.

Table 6.1 of the MARTAC report provides the approximate distribution of plutonium in Section 400 after the completion of the project. The total amounts to 4.15 kg over the site.