

APPENDIX III: Calculation of mean uranium and boron contents of various groups of samples.

The mean  $m$  is defined for  $n$  measurements,  $x_1, x_2, x_3 \dots x_1 \dots, x_n$ , by the relation,

$$m \equiv \frac{\sum_{i=1}^n x_i}{n}$$

with a limited number  $n$  of trial measurements, the experimental or sample standard deviation  $S$  is defined as

$$S \equiv \left[ \frac{\sum_{i=1}^n (x_i - m)^2}{n} \right]^{1/2}$$

The standard deviation in the mean or standard error  $S_m$  from the  $n$  measurements of a single set, is given as

$$S_m = \frac{S}{\sqrt{n}}$$

In computing the mean  $m$  in this work, the values which lie beyond  $(3 \times S)$ , have been excluded. Such cases are, ofcourse, very few.