

# MUST2 DSSD Energy Calibration Report

## 1 Calibration Summary

**Experiment :** MUGAST<sub>LISE23LaurieandHugo</sub>  
**Operator App. Date :** 24/05/23  
**Source :** 3 alpha peaks <sup>239</sup>Pu, <sup>241</sup>Am, <sup>244</sup>Cm  
**Dead Layer :** Al 0.3 $\mu$ m + Si 0 $\mu$ m  
**Comment :** MUST2

**Calibration Method :** ZeroExtrapolation  
**Telescope Treated :** 4  
**Strip Treated :** 1 to 128  
**DSSD Side :** Y

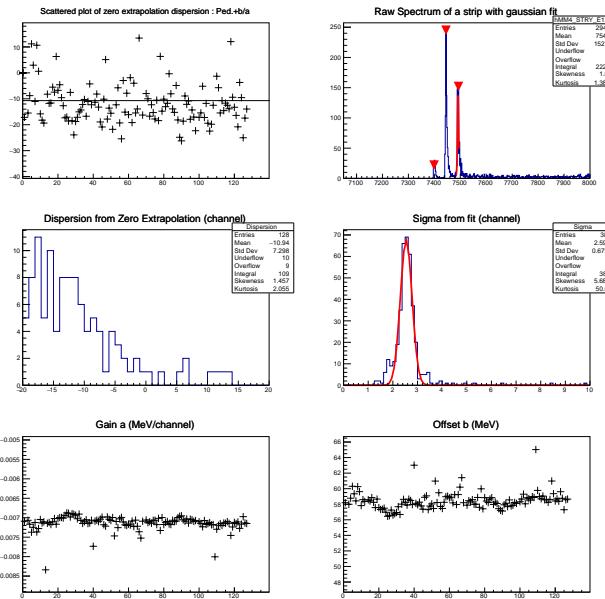
### Source Description :

Isotope	Original Energy (MeV)	Branching Ratio
<sup>239</sup> Pu	5.15659	70.77
<sup>239</sup> Pu	5.14438	17.11
<sup>239</sup> Pu	5.1055	11.94
<sup>241</sup> Am	5.48556	84.8
<sup>241</sup> Am	5.4428	13.1
<sup>241</sup> Am	5.388	1.66
<sup>244</sup> Cm	5.80477	76.4
<sup>244</sup> Cm	5.76264	23.6

## 2 Telescope 4

Bad Strip :

Strip Number	Problem
2	0 peak(s) found ; zero extrapolation too high :8181.16channels ;
13	zero extrapolation too high :98.2012channels ;
40	zero extrapolation too high :43.7892channels ;
69	zero extrapolation too high :171.735channels ;
99	zero extrapolation too high :191.544channels ;
109	zero extrapolation too high :68.2827channels ;
128	zero extrapolation too high :186.648channels ;



Sigma fit centroid : 2.5425  
Sigma fit sigma : 0.238579