TCN18-026 (single exponential fit, with background subtracted, normalized to monitor detector) χ^2 / ndf 97.58 / 8 Prob 1.335e-17 p0 5.068 ± 0.04979 36.58 ± 0.3515

UCN-count-to-monitor ratio

 10^{-1}

20

40

60

80

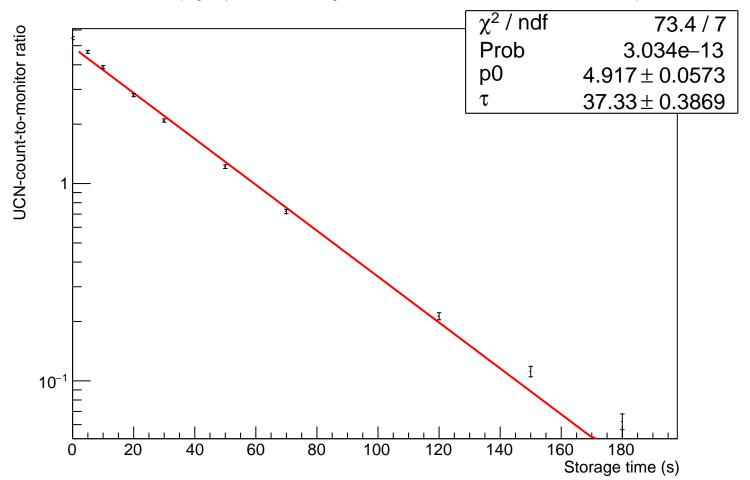
100

120

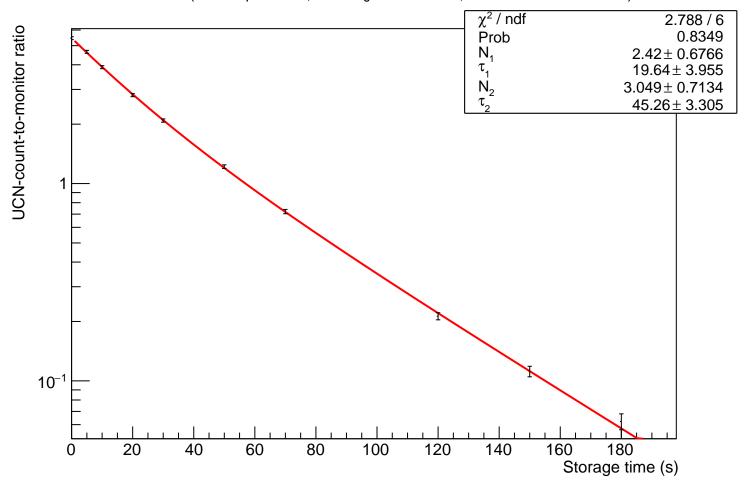
140

160

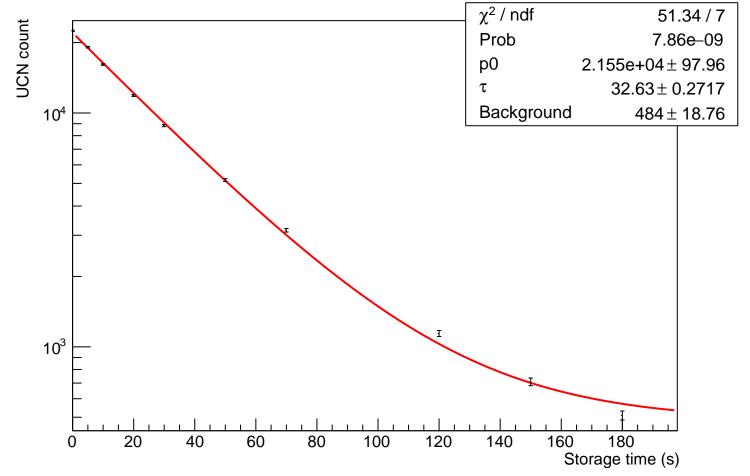
50 180 Storage time (s)

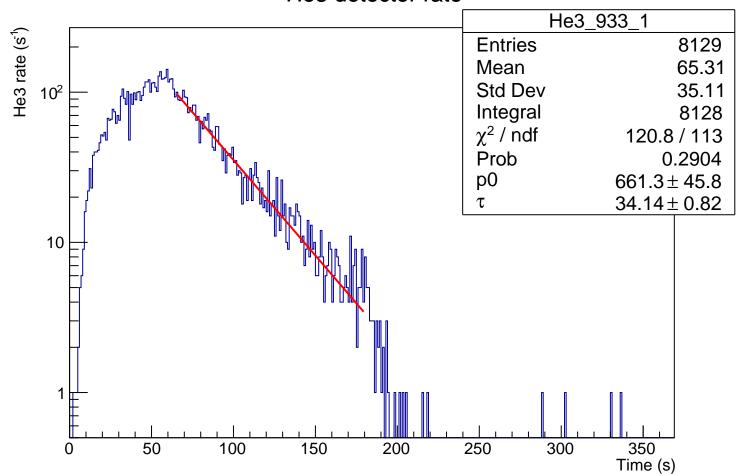


TCN18-026 (double exponential fit, with background subtracted, normalized to monitor detector)



TCN18-026 (single exponential fit + background, unnormalized)





He3 detector rate He3_933_3 He3 rate (s¹) **Entries** 7729 Mean 61.95 10^{2} Std Dev 29.45 Integral 7729 χ^2 / ndf 69.53 / 63 Prob 0.267 p0 589.2 ± 57.2 35.97 ± 1.40 10

200

250

300

350 Time (s)

50

100

150

He3 detector rate He3_933_4 He3 rate (s¹) **Entries** 6863 54.35 Mean 10^{2} Std Dev 22.59 Integral 6863 χ^2 / ndf 29.32 / 23 Prob 0.17 p0 1283 ± 340.7 26.55 ± 2.47 10

200

250

300

350

Time (s)

150

50

100

He3 detector rate He3_933_5 He3 rate (s¹) **Entries** 7487 Mean 58.61 10^{2} Std Dev 25.85 Integral 7486 χ^2 / ndf 50.62 / 43 Prob 0.198 p0 1046 ± 136.4 29.11± 1.33 10

200

250

350

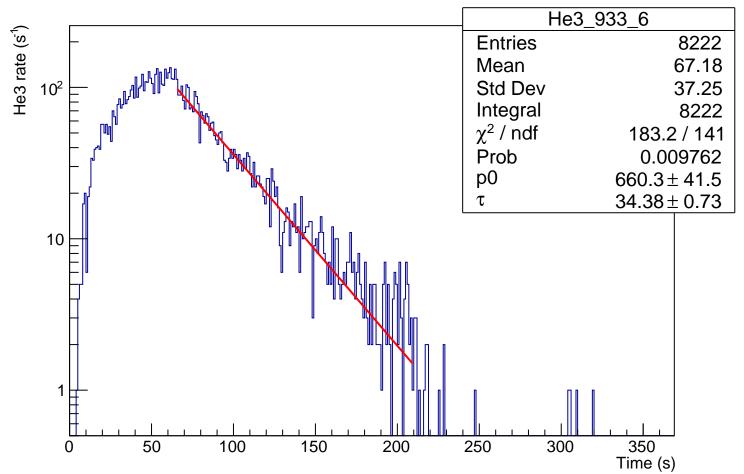
Time (s)

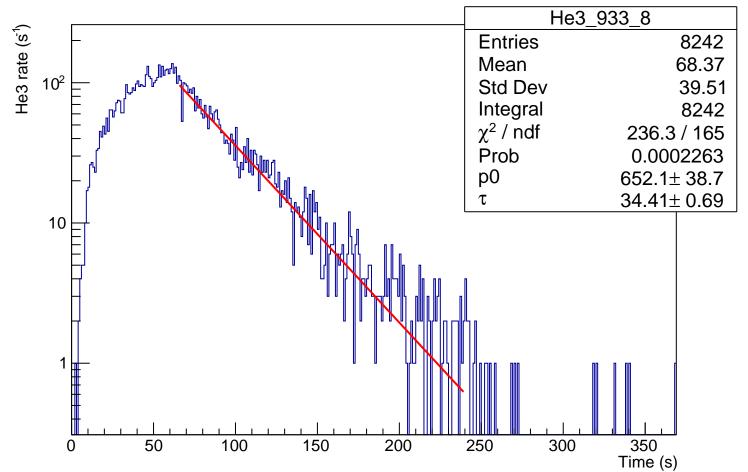
300

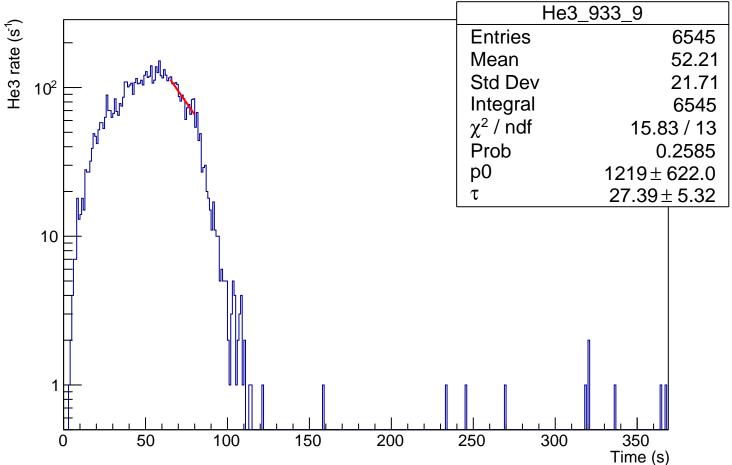
150

50

100







 τ = 33.7882846075 +/- 0.0220685205172 s

Average lifetime from He3 data: