

TCN18-382 (single exponential fit, with background subtracted, normalized to monitor detector)

UCN-count-to-monitor ratio

χ^2 / ndf

197.3 / 7

Prob

4.356e-39

p0

8.947 ± 0.07915

τ

52.14 ± 0.4777

10

1

0

20

40

60

80

100

120

140

160

180

200

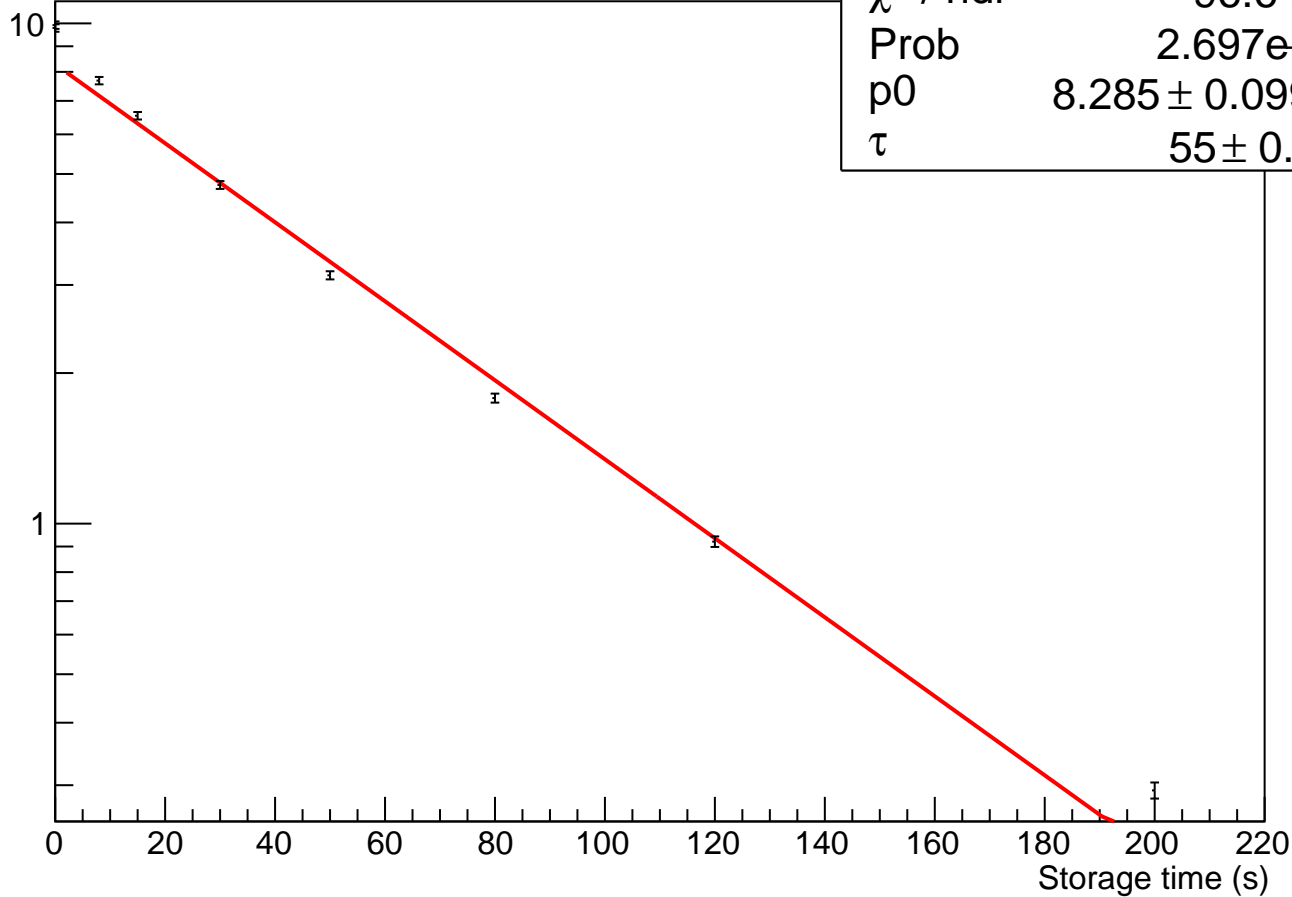
220

Storage time (s)

TCN18-382 (single exponential fit, with background subtracted, normalized to monitor detector, 0s excluded)

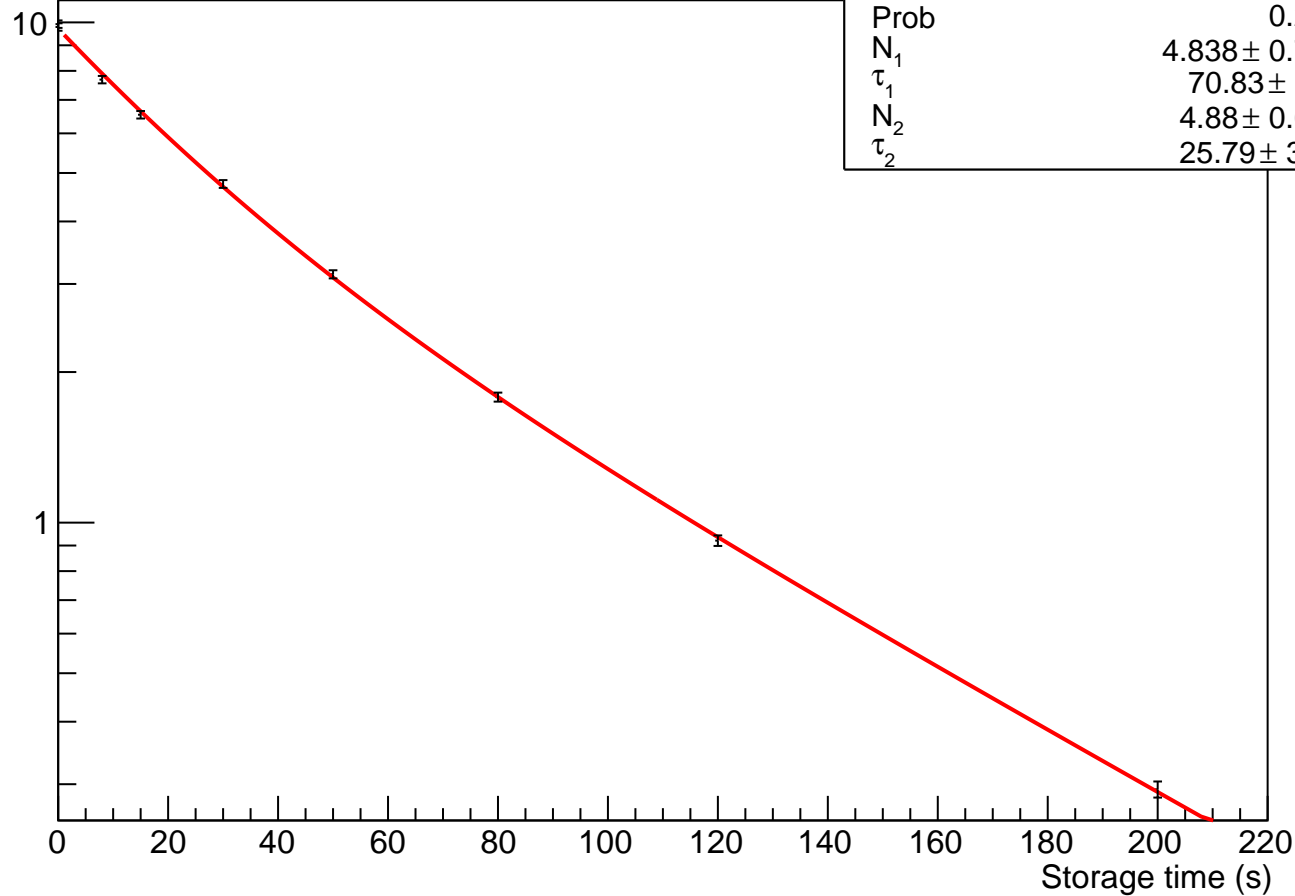
UCN-count-to-monitor ratio

χ^2 / ndf	96.64 / 5
Prob	2.697e-19
p0	8.285 ± 0.09918
τ	55 ± 0.581



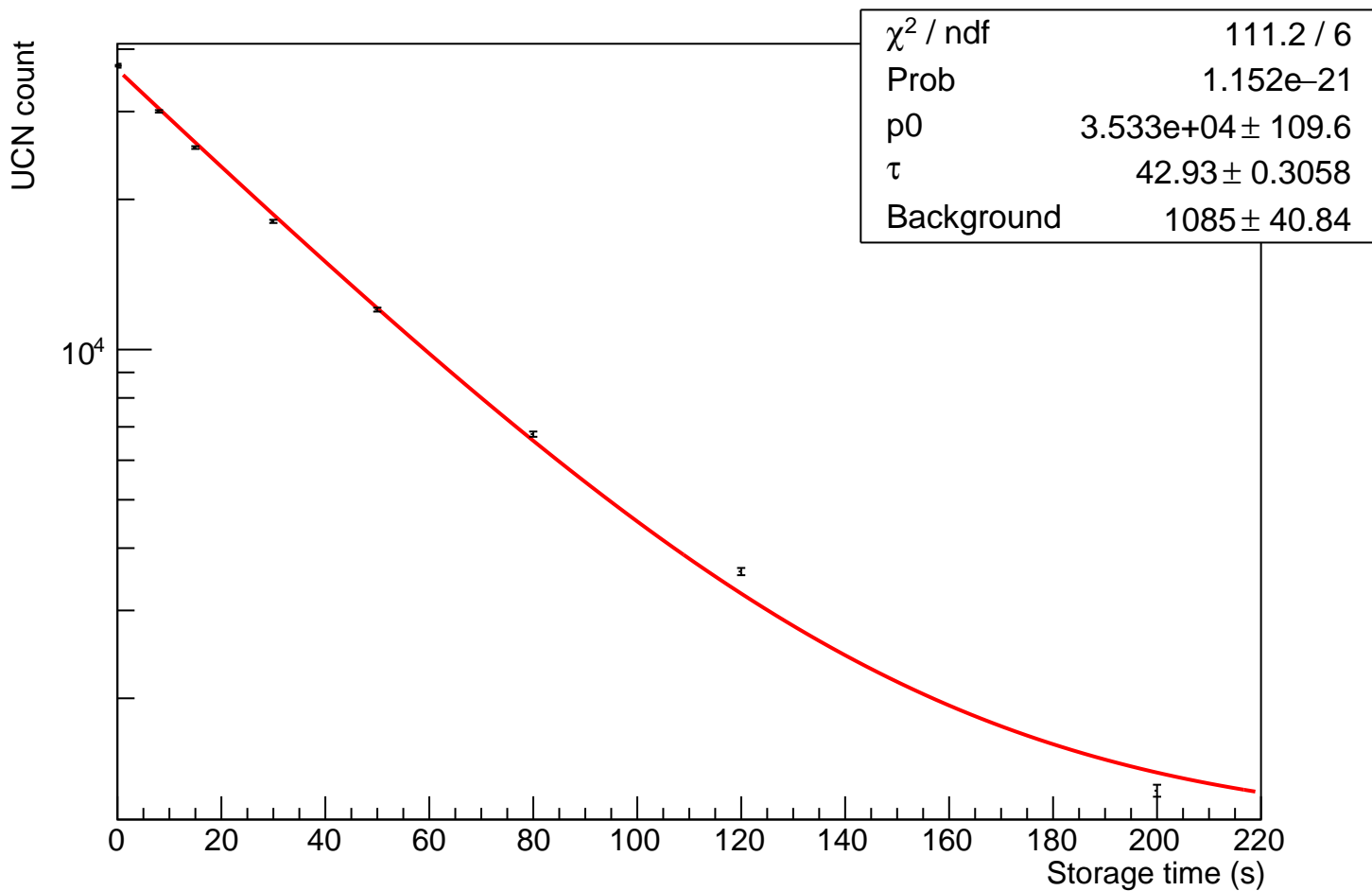
TCN18-382 (double exponential fit, with background subtracted, normalized to monitor detector)

UCN-count-to-monitor ratio

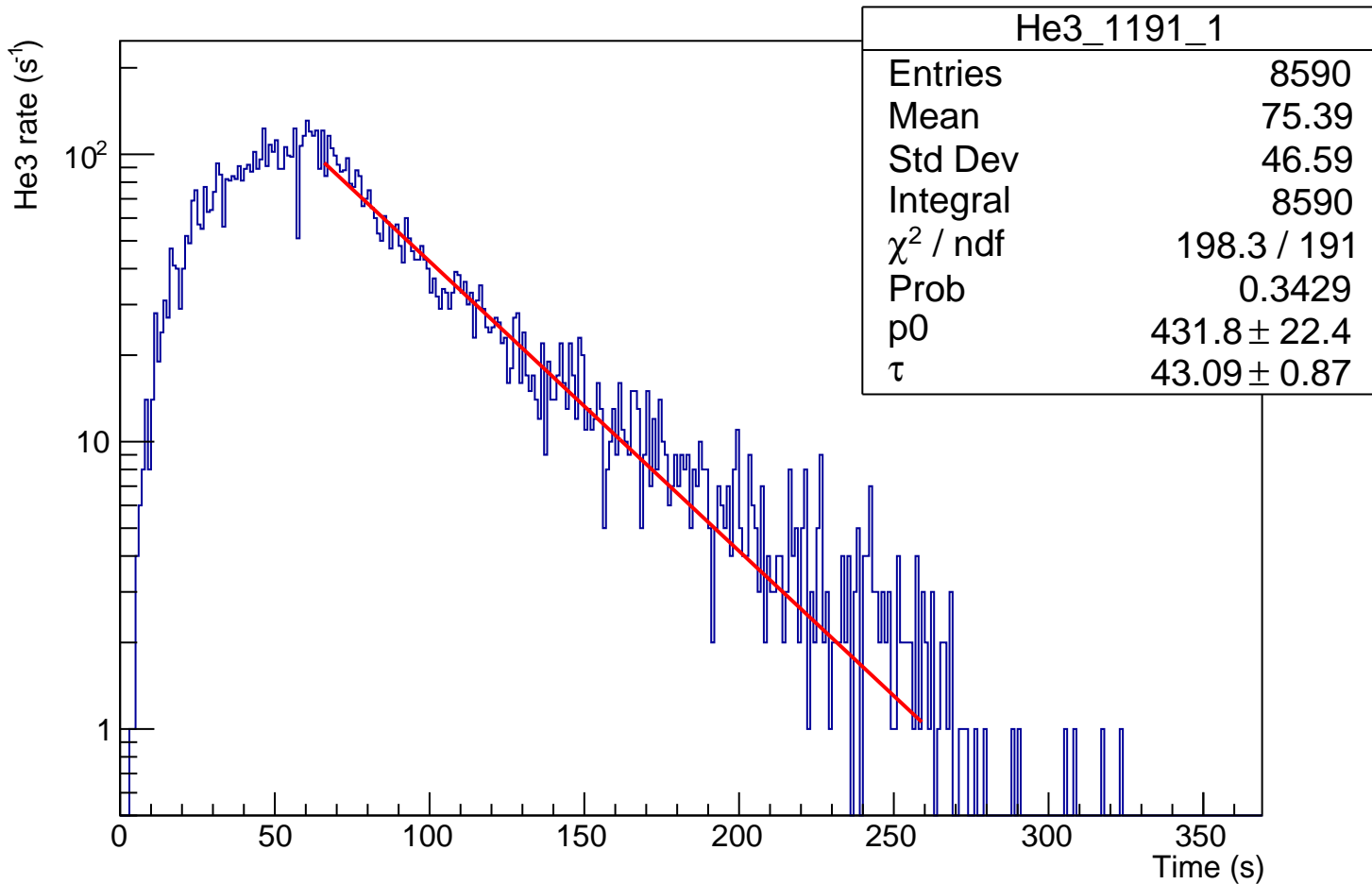


χ^2 / ndf	6.833 / 5
Prob	0.2334
N_1	4.838 ± 0.7106
τ_1	70.83 ± 4.17
N_2	4.88 ± 0.6783
τ_2	25.79 ± 3.176

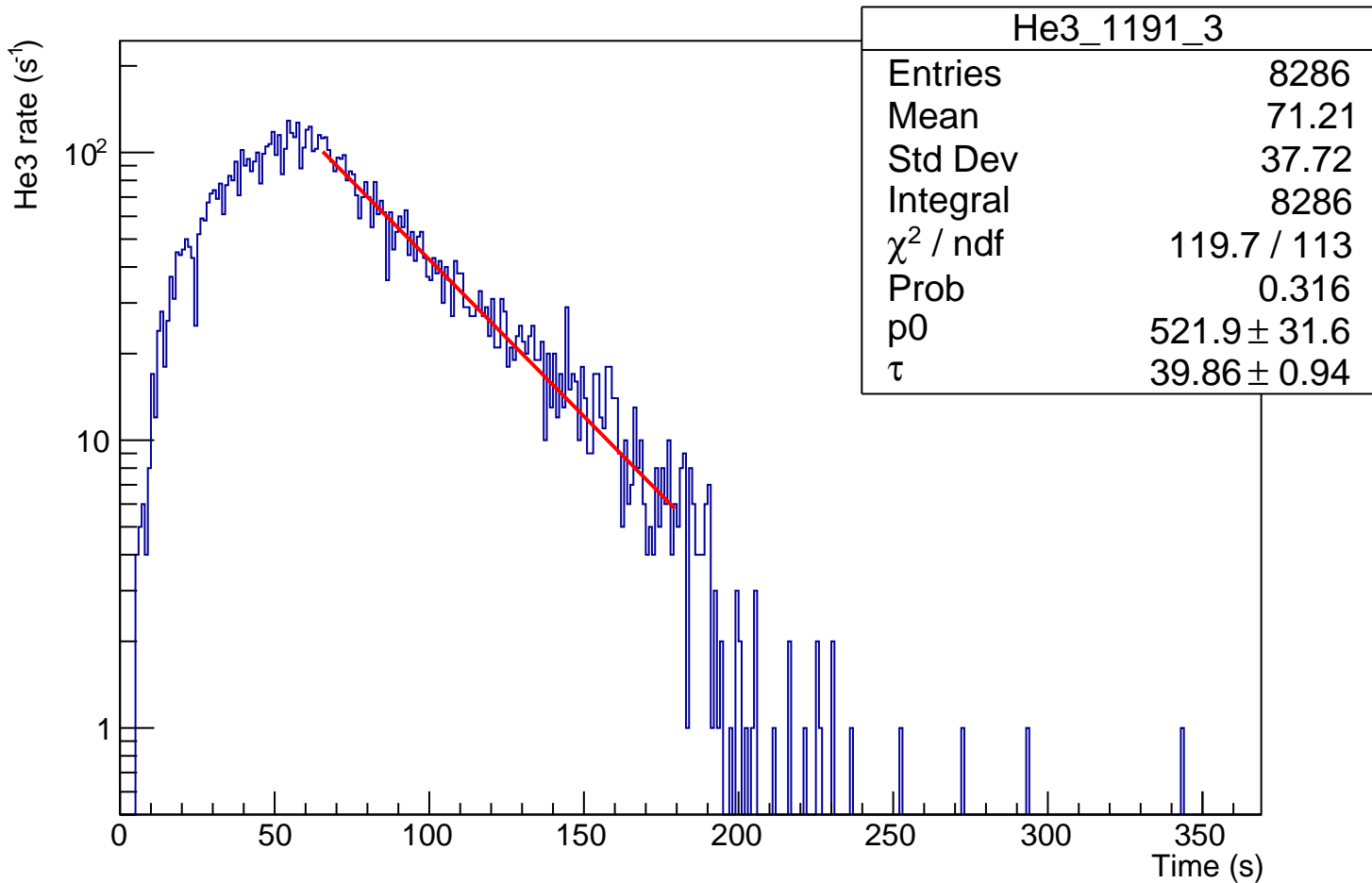
TCN18-382 (single exponential fit + background, unnormalized)



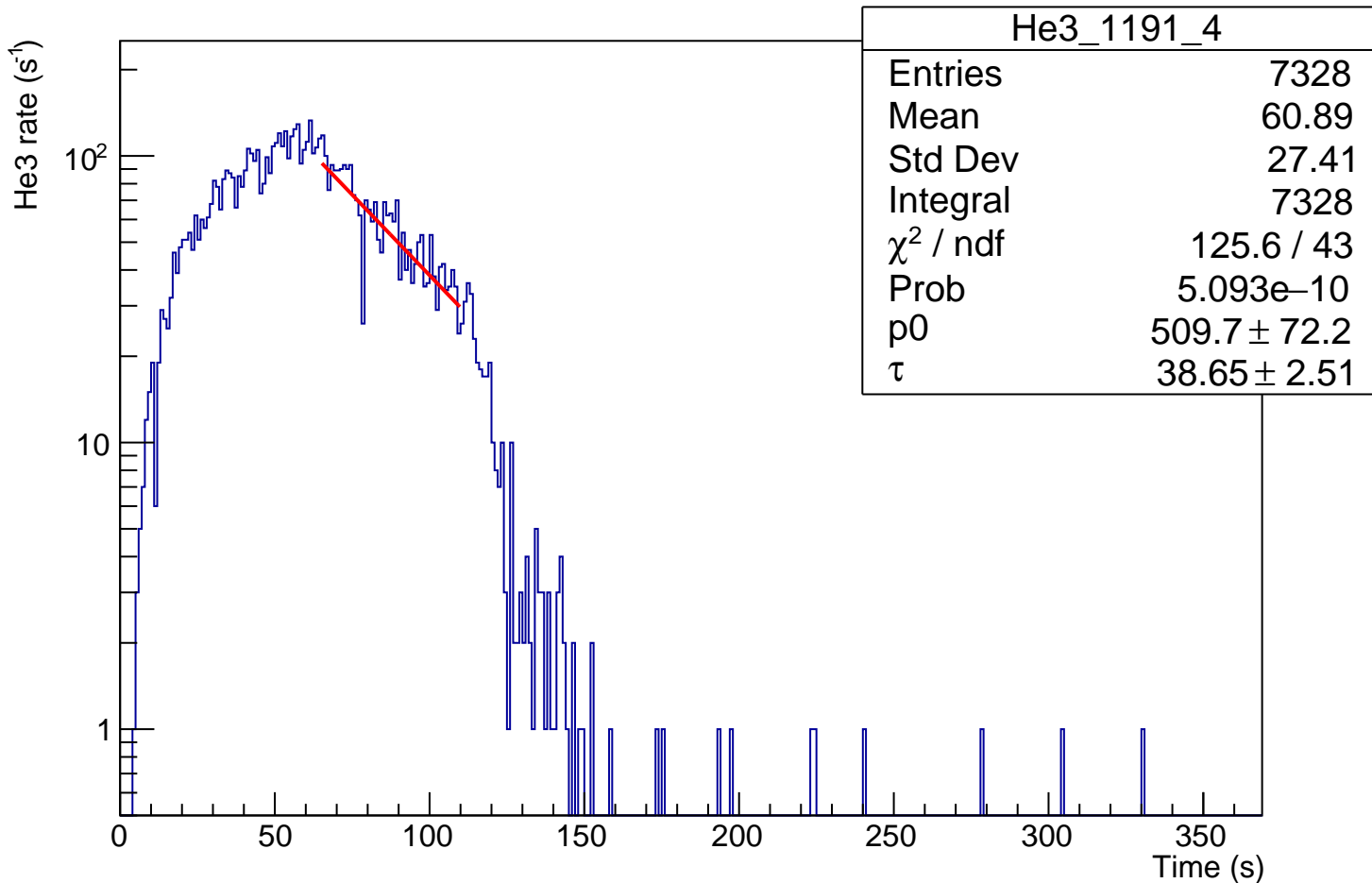
He3 detector rate



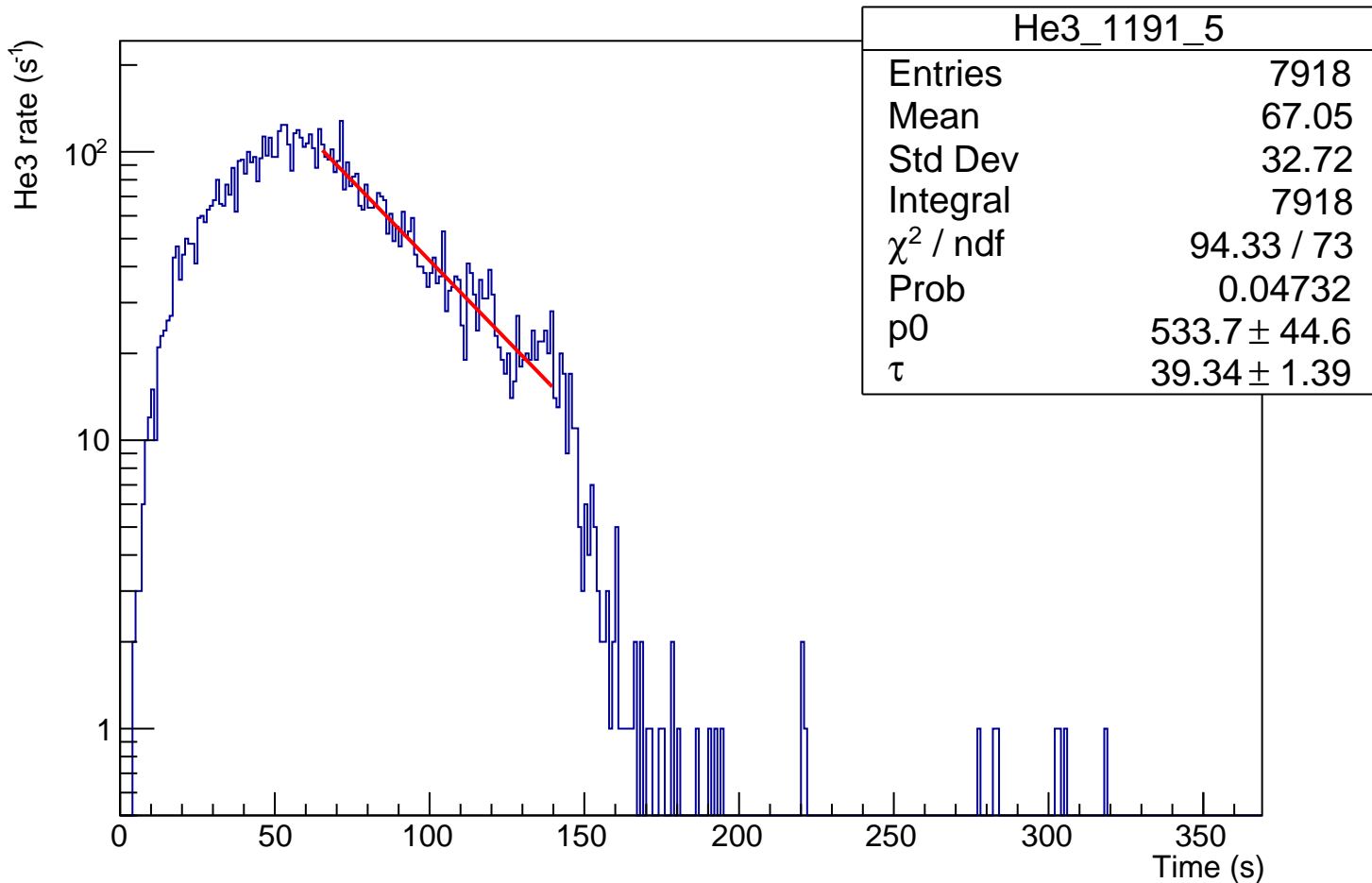
He3 detector rate



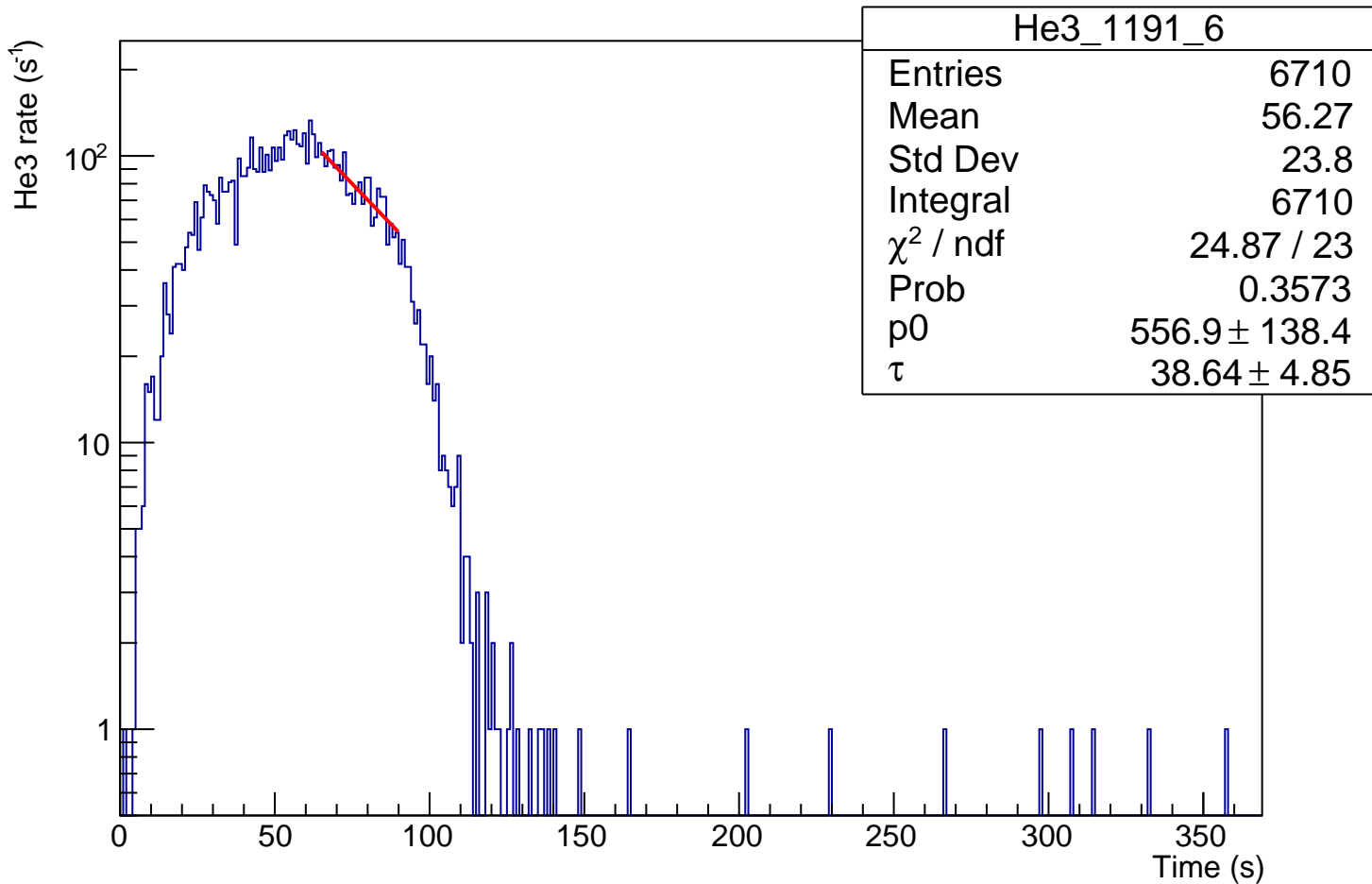
He3 detector rate



He3 detector rate



He3 detector rate



Average lifetime from He3 data:

$$\tau = 41.0475977261 \pm 0.0995853431809 \text{ s}$$