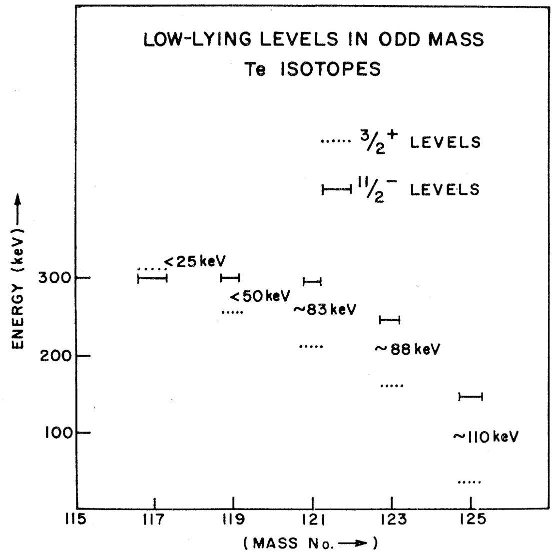


FIG. 9. Low-lying levels in Te isotopes. The 11/2⁻ levels for $Te^{117}$ and $Te^{119}$ are extrapolated from the neighboring isotopes.

In the latter case, a sum peak of 260+511 keV could easily be mistaken as a weak $\gamma$ ray. The half-life value of $18\pm0.5$ min is in good agreement with the value reported by Andersson *et al.*[2]

The log*ft* values both for $I^{117}$ and $I^{119}$ are based on the assumption that there is no $\beta^+$ feeding to the ground states of the daughter nuclides. Because of a small amount of $I^{118}$ ($\beta^+$ end-point energy of 5.45 MeV) present in our samples, it is not possible to find the ground-to-ground-state $\beta^+$ transitions. Hence, it is possible that with sufficient feeding to the ground states, the log*ft* values would increase and could become first forbidden transitions.

It should be pointed out that the decay of $I^{119}$ as well as $I^{117}$ is probably not as simple as we have found. As seen from the systematics in this region, there will be many very weak, high-energy transitions in $I^{117}$ as well as in $I^{119}$. Gfoller and Langhoff[5] investigated the decay of $I^{121}$ and found up to 60 transitions. The intensities of these $\gamma$ rays, compared to the two main transitions, are very low. In some cases they are down by a factor of 10, or, in most cases, by a factor of 100 to 1000. Recently Sergolle *et al.*[6] confirmed the findings of Ref. 5. In our experiments, we were limited by the strength of the sources and the short half-lives, as well as by the contamination of $I^{118}$ in our sources of $I^{119}$. Furthermore, a strong limitation was due to the use of the small 3.6-$cm^3$ Ge(Li) detector.

It is of interest to compare the low-lying levels with the calculation of Kisslinger and Sorensen,[7] in which a pairing-plus-quadrupole interaction is assumed. It is seen that the positions of the $\frac{1}{2}^+$, $\frac{3}{2}^+$, and $\frac{11}{2}^-$ states are fitted adequately in the Te region. As seen in Fig. 9, excited states of $J=\frac{3}{2}^+$ and $\frac{11}{2}^-$ can be seen to migrate upward in energy with decreasing neutron number. It would be interesting to locate the positions of the $\frac{11}{2}^-$ isomers in $Te^{117}$ and $Te^{119}$. However, these isomers will not be populated by the $\beta$ decay of iodine.

## ACKNOWLEDGMENT

The authors thank the technical staff of the Heavy-Ion Accelerator for their assistance.

[5] D. Gfoller and H. Langhoff, Z. Physik **211**, 317 (1968).
[6] H. Sergolle, G. Albouy, J. Bouloumie, J. M. Lagrange, L. Marcus, and M. Pautrat, J. Phys. (Paris) **28**, 383 (1967).
[7] L. S. Kisslinger and R. A. Sorensen, Rev. Mod. Phys. **35**, 853 (1963).

# Errata

**Use of the *K* Matrix in Nuclear Reaction Theories,** W. TOBOCMAN AND M. A. NAGARAJAN [Phys. Rev. **163,** 1011 (1967)]. Professor T. Tamura has very kindly pointed out to us an error in the paper for which this erratum is written. To correct this error: (a) Replace the symbol $\hat{G}_\alpha^{(\pm)}$ that appears in Eqs. (31), (34), and (35) by another symbol, say, $\tilde{G}_\alpha^{(\pm)}$. (b) Replace the phrase following Eq. (40) by the phrase "By the definition given in Eq. (4), $\hat{G}=\hat{\Gamma}-i\pi\hat{\Delta}$, so that. . . ."

**$^{208}$Pb(*d*, *t*) and (*d*, $^3$He) Reactions with 50-MeV Deuterons,** W. C PARKINSON *et al.* [Phys. Rev. **178,** 1976 (1969)]. It was stated erroneously in this paper that the expected spectroscopic factors for neutron pickup were $C^2S=(44/45)(2j+1)$. This should be $C^2S=2j+1$.