

<sup>128</sup>Sb IT decay (10.4 min) 1975Im01

| Type            | Author                        | History | Citation           | Literature Cutoff Date |
|-----------------|-------------------------------|---------|--------------------|------------------------|
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Parent: <sup>128</sup>Sb: E=0.0+x; J<sup>π</sup>=5<sup>+</sup>; T<sub>1/2</sub>=10.4 min 18; %IT decay=3.6 10

<sup>128</sup>Sb-%IT decay: branching ratio of isomeric transition is deduced from the intensity ratio of 59.07 min (equilibrium of <sup>128</sup>Sb isomer with <sup>128</sup>Sn) and 9.01 h components grown from chemically purified <sup>128</sup>Sn (1975Im01). Other: %IT=3.1 2 (1974Fo07).

1975Im01: <sup>235</sup>U(n,F) chemical separation; Ge detector, γγ.

<sup>128</sup>Sb Levels

| E(level) | J <sup>π</sup> † | T <sub>1/2</sub> † | Comments  |
|----------|------------------|--------------------|---|
| 0.0      | 8 <sup>-</sup>   | 9.05 h 4           |   |
| 0.0+x    | 5 <sup>+</sup>   | 10.4 min 2         | %IT=3.6; %β <sup>-</sup> =96.4<br>E(level): energy difference between this level and ground state is estimated to be ≤20 keV from T <sub>1/2</sub> systematics for E3 transitions of even Sb isotopes (1975Im01). The fact that no K x ray of <sup>128</sup> Sb is found in IT decay partially supports the above result. |

† From Adopted Levels.

γ(<sup>128</sup>Sb)

| E <sub>γ</sub> | E <sub>i</sub> (level) | J <sub>i</sub> <sup>π</sup> | E <sub>f</sub> | J <sub>f</sub> <sup>π</sup> | Mult. | I <sub>(γ+ce)</sub> † | Comments   |
|----------------|------------------------|-----------------------------|----------------|-----------------------------|-------|-----------------------|--|
| (<20.0)        | 0.0+x                  | 5 <sup>+</sup>              | 0.0            | 8 <sup>-</sup>              | [E3]  | 100                   | Mult.: from spin and parity change of relevant states. |

† For absolute intensity per 100 decays, multiply by 0.036 10.

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Legend

Decay Scheme

%IT=3.6 10

-----▶ γ Decay (Uncertain)

