

¹⁶⁹Re ε+β⁺ decay (8.1 s) 1992Me10

Type	Author	Citation	Literature Cutoff Date
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Parent: ¹⁶⁹Re: E=0.0; J^π=(9/2⁻); T_{1/2}=8.1 s 5; Q(ε)=6509 19; %ε+%β⁺ decay≈100

¹⁶⁹Re-J^π,T_{1/2}: from ¹⁶⁹Re Adopted Levels.

¹⁶⁹Re-Q(ε+β⁺): from 2021Wa16.

1992Me10: sources produced by ¹⁴¹Pr+³²S, E(³²S)≈178 MeV; measured E_γ, I_γ, γγ coin, γ(t), γ and α excitation functions.

Insufficient information was obtained by 1992Me10 to enable them to construct a decay scheme, primarily because the 101γ is a doublet. See 1992Me10 for detailed γγ coin information.

¹⁶⁹W Levels

E(level)	J ^π †
0.0+x	(9/2 ⁻)
145.3+x 3	(11/2 ⁻)

† From Adopted Levels.

γ(¹⁶⁹W)

I_γ normalization: decay scheme is incomplete and so it is not normalized.

With the exception of the 124γ and 361γ, all lines observed by 1992Me10 are coincident with W x rays, and all but the 124γ are coincident with a 101γ.

E _γ	I _γ †	E _i (level)	J _i ^π	E _f	J _f ^π	Mult.	α‡	Comments
^x 26.5	33 2							Doublet; γ is self-coincident. Assigned to ¹⁶⁹ Re ε decay based on measured 101γ excitation function (1992Me10).
^x 101.2 2	100							
^x 123.7 4	≈10							α(K)=0.9 5; α(L)=0.32 10; α(M)=0.077 28 α(N)=0.018 7; α(O)=0.0027 8; α(P)=8 Mult.: from Adopted Gammas. Placed in accord with adopted placement of a 145γ from the (²⁰ Ne,5ny) study in 1985Re06.
145.3 2	17 3	145.3+x	(11/2 ⁻)	0.0+x	(9/2 ⁻)	(M1+E2)	1.29 35	
^x 210.9 2	20 3							
^x 254.1 4	14 1							
^x 360.5 4	5 1							
^x 392.6 2	14 2							
^x 492.9 2	11 2							
^x 1054.1 4	15 2							

† Photon intensity relative to I_γ=100 for the 101-keV doublet.

‡ Additional information 1.

^x γ ray not placed in level scheme.

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Decay Scheme

Intensities: Relative I_γ 