^{7}Li(p,α) 2004Ti06

History

Type	Author	Citation	Literature Cutoff Date
Update	J. H. Kelley, J. L. Godwin, C. G. Sheu	ENSDF	31-Mar-2004

1964As04: ^{7}Li(p,α) E_P=2-3.5 MeV, polarized, measured asymmetry.
1964Ma25: ^{7}Li(p,α) E_P=0.85 MeV, measured α-spectrum (θ). ^{8}Be deduced absence of three reported levels.
1964Ma51: ^{7}Li(p,α) E=1-12 MeV, measured σ(E,θ). ^{8}Be deduced levels.
1964Mi10: ^{7}Li(p,α) E_P=0.50-2.0 MeV, measured α-, γ-spectra. ^{8}Be deduced levels.
1964Pr04: ^{7}Li(P,α γ) E_P=0.4-1.8 MeV, measured α-, γ-spectrum, α-γ-coin. ^{8}Be deduced levels.
1965Bo07: ^{7}Li(pol. p,α) E_P=3.2-5.3 MeV, measured $\sigma(E_\alpha,\theta)$. Deduced polarization.
1966Ma03: ^{7}Li(P,α γ) E=0.4-2.4 MeV, measured $\sigma(E,E_\alpha)$, γ-α-coin.
1968Du11: ^{7}Li(p,α) E=150 keV, measured $\sigma(E_\alpha,\theta)$. Deduced Q.
1968Le22: ^{7}Li(p,α) E=130 keV, measured $\sigma(E_\alpha,\theta(\alpha))$.
1968Pe03: ^{7}Li(pol. p,α) E=0.8-3.0 MeV, measured σ(E,θ). Deduced polarization analyzing power.
1968Pl01: ^{7}Li(p,α) E=3-10 MeV, measured polarization analyzing power (E,θ).
1969De04: ^{7}Li(p,α) E=30.3 MeV, measured $\sigma(\theta)$.
1969Sw01: ^{7}Li(p,α) E=0.44-2.45 MeV, measured σ(E,θ). Deduced direct reaction contribution. ^{8}Be deduced resonances, levels, Γ-level, γ-branching.
1971Sp05: ^{7}Li(p,α) E=130,271,416,561 keV, measured $\sigma(\theta)$. Deduced total σ.
1976Hi04: ^{7}Li(p,α) E=11.65-11.75 MeV, measured σ(E,θ). ^{8}Be deduced resonance parameters.
1986Ro13: ^{7}Li(p,α) $E_{C.M.}$=25-873 keV, measured $\sigma(\theta)$. Deduced σ, astrophysical S(E) factor.
1989Ba88: ^{7}Li(p,α) E=29.1-44.6 MeV, measured $\sigma(\theta)$. Deduced model parameters.
1989Ha14: ^{7}Li(p,α) E=20-250 keV, measured σ(E). Deduced astrophysical S-factor vs. E.
1990Ra28: ^{7}Li(p,α) $E_{C.M.}$=0.013-1 MeV, analyzed $\sigma(\theta)$, astrophysical S-factor vs. E. Deduced reaction mechanism At thermonuclear energy.
1991Ri03: ^{7}Li(p,α) E=low, analyzed reaction rate, astrophysical S-factor data.
1992En01: ^{7}Li(p,α) $E_{C.M.}$=10-1004 keV, measured σ(θ,E). Deduced astrophysical S-factor vs. E.
1999Sp09: ^{7}Li(p,α) E<0.4 MeV. Deduced $\sigma(\theta)$, astrophysical S-factor.
2000Ba89: ^{7}Li(p,α) $E_{C.M.}$=0-900 keV. Analyzed σ,$\sigma(\theta)$. ^{8}Be levels deduced R-matrix parameters.
2001La35: ^{7}Li(p,α) E≈10-400 keV. Deduced astrophysical S-factor.
2002Ba77: ^{7}Li(p,α) E=low, analyzed σ, related data. Deduced electron screening potential.
2002Gr09: ^{7}Li(p,α) E=100-200 keV, measured E_α.
2003Pi13, 2003Pi14, 2003Sp02: ^{7}Li(p,α) E(C.M.)≈10-1000 keV, analyzed astrophysical S-factors, electron screening potential energy.

^{8}Be Levels

E(level)	J^π	Comments
15.9×10^3	2^+	E(level): probably refers to the 16.6 MeV state.
19.7×10^3	0^+	
20.1×10^3	2^+	
21.8×10^3?	0^+	
22.2×10^3	2^+	
$\approx24.\times10^3$		
$25.\times10^3$	2^+	