

^{82}Kr $Z = 36$ $N = 46$ [link to full NNDC output](#)

Based on ENSDF from Dec 2018, and mass evaluation from 2016

BE = 714.275 (0.000) MeV

	Energy T	J+	J-	J-other	T1/2
82KR 1	0.000	0+			1 STABLE
82KR 2	0.777	2+			2 4.45 PS 14
82KR 3	1.475	2+			3 15 PS AP
82KR 4	1.488	0+			4 10 PS 3
82KR 5	1.821	4+			5 0.67 PS 25
82KR 6				1.885	6
82KR 7				1.957 (2+)	7 0.8 PS AP
82KR 8	2.094	3+			8
82KR 9	2.172	0+			9 2 PS AP
82KR 10				2.427 (4+)	10 0.57 PS 11
82KR 11				2.450 0(+),1,2	11
82KR 12				2.480 1+,2+	12
82KR 13				2.509	13
82KR 14				2.548 (3-)	14
82KR 15				2.556 (4+)	15 1.4 PS 4
82KR 16				2.562	16
82KR 17		2.648	4-		17 7 PS LT
82KR 18				2.656 1,2(+)	18
82KR 19				2.798	19
82KR 20				2.828 5(-)	20 14 PS 7
82KR 21				2.850 (4+)	21
82KR 22				2.920 (6+)	22 3 PS 1
82KR 23				2.944 (2)+	23
82KR 24				3.011 (5)-	24 2 PS 1
82KR 25				3.038 (6-)	25 0.58 NS 7
82KR 26				3.077	26
82KR 27				3.168 (6+)	27 0.76 PS 21
82KR 28				3.187 0+,1+,2+	28
82KR 29				3.187 (5+)	29
82KR 30				3.256 (6+)	30 0.36 PS 10
82KR 31		3.322	3-		31
82KR 32				3.348 (6-)	32
82KR 33				3.355 1,2(+)	33
82KR 34				3.392	34
82KR 35				3.457 1,2(+)	35
82KR 36				3.462 (8+)	36 96 PS 12
82KR 37				3.497 (7-)	37 14 PS +14-7
82KR 38				3.565 0(+),1,2	38

82KR 39				3.595	(7-)	39		
82KR 40				3.656	4(+),5,6(+)	40		

82KR 41				3.681		41		
82KR 42				3.709	(7+)	42		
82KR 43				3.717	0(+),1,2	43		
82KR 44				3.742		44		
82KR 45				3.815	1,2(+)	45		
82KR 46				3.836	1,2	46		
82KR 47				3.846		47		
82KR 48				3.881	1,2(+)	48		
82KR 49				3.911	1,2(+)	49		
82KR 50				3.951	4,5,6(+)	50		

82KR 51				3.956	1,2(+)	51		
82KR 52				3.998	4,5,6(+)	52		
82KR 53				4.016	(8+)	53	1.0 PS	+10-4
82KR 54				4.034		54	1.1 PS	3
82KR 55				4.063	4,5,6(+)	55		
82KR 56				4.068	4,5(+)	56		
82KR 57				4.125	(8+)	57	6 PS	2
82KR 58				4.136		58		
82KR 59				4.171	(8-)	59	2.4 PS	+24-8
82KR 60				4.343		60	1.0 PS	+24-3

82KR 61				4.438		61	0.17 PS	+8-4
82KR 62				4.610	(10+)	62	1.2 PS	+7-3
82KR 63				4.668	(9-)	63	1.1 PS	3
82KR 64				4.747	(9-)	64	0.6 PS	1
82KR 65				4.822	(10+)	65	1.2 PS	2
82KR 66				4.897		66		
82KR 67				5.012	(8+,9,10+)	67		
82KR 68				5.325	(10-)	68		
82KR 69				5.703		69		
S-alpha=	5.991	(0.000)	-----					
82KR 70				5.993		70	0.3 PS	1

82KR 71				6.010		71		
82KR 72				6.012		72	0.39 PS	7

S-p = 9.904 (0.001)-----
S-n = 10.967 (0.001)-----
S-2p = 17.410 (0.001)-----
S-2n = 18.841 (0.001)-----
S-alpha= 5.991 (0.000)-----

S+p = -5.768 (0.002)
S+n = -7.470 (0.000)
S+2p = -14.636 (0.001)

S+2n = -17.990 (0.000)
S+alpha = -6.356 (0.000)

gap p = 4.136 (0.003)
gap n = 3.497 (0.001)
gap 2p = 2.775 (0.002)
gap 2n = 0.851 (0.001)
gap alpha = -0.365 (0.000)