

$^{52}\text{V}$        $Z = 23$        $N = 29$       adopted link      ENSDF link

Based on ENSDF from Oct 2022, and mass evaluation from 2020

BE = 453.158 ( 0.000) MeV

Qbeta- = 3.976 ( 0.000) MeV

	Energy T	J+	J-	J-other	T1/2
52V 1	0.000	3+			1 3.743 M 5
52V 2				0.017 2+,3+	2 1.08 NS 22
52V 3				0.023 +	3
52V 4	0.142	1+			4
52V 5				0.148 +	5
52V 6	0.437	2+			6
52V 7	0.794	3+			7
52V 8	0.846	4+			8
52V 9				0.881	9
52V 10				1.290 (1)+	10
52V 11	1.419	3+			11
52V 12				1.493 +	12 1.8 PS 10
52V 13	1.559	4+			13
52V 14				1.579	14
52V 15	1.664	1+			15
52V 16				1.733 (-)	16
52V 17	1.760	3+			17
52V 18				1.770	18
52V 19	1.795	2+			19
52V 20				1.843 +	20
52V 21	2.101	3+			21
52V 22	2.152	1+			22
52V 23	2.169	4+			23
52V 24	2.318	3+			24
52V 25				2.347	25
52V 26				2.396 0+, (1+)	26
52V 27				2.428 2+,3+	27
52V 28				2.473	28
52V 29				2.539 +	29
52V 30				2.543 (9+)	30 5.5 PS 4
52V 31				2.559	31
52V 32	2.591	1+			32
52V 33				2.697 0+, (1+)	33
52V 34				2.743	34
52V 35				2.776 +	35
52V 36				2.825	36
52V 37				2.859 +	37

52V	38					2.881	1+,2+,3+	38
52V	39					2.910	+	39
52V	40					2.987		40
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52V	41					3.009	+	41
52V	42					3.060	(2,3)+	42
52V	43					3.149	1+,2+,3+	43
52V	44					3.184		44
52V	45		3.194	4+				45
52V	46					3.199		46
52V	47					3.243	+	47
52V	48					3.315	+	48
52V	49					3.333		49
52V	50					3.450	-	50
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52V	51					3.474	+	51
52V	52					3.509	-	52
52V	53					3.539	-	53
52V	54		3.576	3+				54
52V	55					3.645	+	55
52V	56					3.687	-	56
52V	57		3.730	3+				57
52V	58					3.733	+	58
52V	59					3.777	-	59
52V	60					3.809	+	60
-----								
52V	61					3.875	+	61
52V	62					3.940	-	62
52V	63					3.960	+	63
52V	64					4.034	-	64
52V	65					4.109		65
52V	66					4.120	-	66
52V	67					4.279	-	67
52V	68					4.285		68
52V	69					4.327	(8)-	69
52V	70					4.420		70
-----								
52V	71					4.455	-	71
52V	72					4.483		72
52V	73					4.519		73
52V	74					4.533	-	74
52V	75					4.557	1+,2+,3+	75
52V	76		4.609	1+				76
52V	77					4.717	+	77
52V	78					4.755		78
52V	79					4.772	+	79
52V	80					4.904	+	80
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52V	81					4.951		81
52V	82					4.986	(1,2,3)+	82

52V 83			5.039		83
52V 84			5.080	-	84
52V 85			5.096		85
52V 86			5.187	-	86
52V 87			5.233		87
52V 88			5.276	+	88
52V 89			5.344	+	89
52V 90			5.410	(1+,2+,3+)	90
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52V 91			5.488	+	91
52V 92			5.548	-	92
52V 93			5.600		93
52V 94			5.646	+	94
52V 95			5.711		95
52V 96			5.744	(1,2,3)+	96
52V 97			5.813		97
52V 98			5.851	+	98
52V 99			5.946	+	99
52V 100			6.021		100
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52V 101			6.086	+	101
52V 102			6.167	+	102
52V 103			6.225		103
52V 104			6.277	+	104
52V 105			6.326		105
52V 106			6.374		106
52V 107			6.406	+	107
52V 108			6.472		108
52V 109			6.519	+	109
52V 110			6.557		110
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52V 111			6.590		111
52V 112			6.640	1+,2+,3+	112
52V 113			6.675		113
52V 114			6.744		114
52V 115			6.809		115
52V 116			6.844		116
52V 117			6.887		117
52V 118			6.919		118
52V 119			7.110		119
52V 120			7.311		120
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S-n	=	7.311 ( 0.000)	-----		
52V 121			7.540		121
52V 122			7.850		122
52V 123			8.050		123
52V 124			8.250		124 3.7 KEV 4
52V 125			8.400		125
52V 126			8.620		126 3.3 KEV 4
52V 127			8.760		127

52V 128		8.838 4	0+					128
S-p	=	8.999	( 0.001)	-----				
52V 129						9.060		129
52V 130						9.310		130
-----								
S-alpha=		9.364	( 0.005)	-----				
52V 131						9.510		131
52V 132						9.600		132 11.7 KEV 12

S-p	=	8.999	( 0.001)	-----				
S-n	=	7.311	( 0.000)	-----				
S-2p	=	21.484	( 0.003)	-----				
S-2n	=	18.362	( 0.000)	-----				
S-alpha=		9.364	( 0.005)	-----				

S+p	=	-11.134	( 0.000)
S+n	=	-8.480	( 0.003)
S+2p	=	-18.693	( 0.001)
S+2n	=	-14.598	( 0.011)
S+alpha	=	-7.894	( 0.000)

gap p	=	-2.135	( 0.001)
gap n	=	-1.169	( 0.003)
gap 2p	=	2.791	( 0.003)
gap 2n	=	3.765	( 0.011)
gap alpha	=	1.470	( 0.005)