^{53}Fe $Z = 26$ $N = 27$ link to full NNDC output

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

BE = 458.386 (0.002) MeV
Qbeta+ = 3.743 (0.002) MeV

	Energy	T	J+		J-		J-other		T1/2	
53FE 1				0.000	7/2-			1	8.51 M	2
53FE 2				0.741	3/2-			2	63.5 NS	14
53FE 3				0.774	1/2-			3	2.0 NS	2
53FE 4				1.328	9/2-			4	17 FS	7
53FE 5				1.423	5/2-			5	2.8 PS	7
53FE 6				1.696	7/2-			6	1.4 PS	+21-7
53FE 7						1.896		7		
53FE 8				2.043	3/2-			8	0.24 PS	5
53FE 9	2.315		1/2+					9		
53FE 10				2.339	11/2-			10	53 FS	12
53FE 11				2.405	5/2-			11		
53FE 12						2.479		12	35 FS	8
53FE 13				2.557	9/2-			13		
53FE 14						2.680	3/2+,5/2+	14		
53FE 15						2.829		15	35 FS	14
53FE 16				2.843	11/2-			16		
53FE 17				2.845	7/2-			17	33 FS	12
53FE 18						2.892		18		
53FE 19						2.915	7/2-,5/2-	19		
53FE 20						2.926	(1/2+)	20		
53FE 21						2.944	3/2-,1/2-	21		
53FE 22	2.967		1/2+					22	78 FS	15
53FE 23				3.040	19/2-			23	2.54 M	2
53FE 24				3.176	13/2-			24	132 FS	LT
53FE 25				3.312	11/2-			25		
53FE 26				3.333	7/2-			26		
53FE 27	3.399		3/2+					27		
53FE 28				3.463	15/2-			28		
53FE 29				3.567	7/2-			29		
53FE 30						3.697	1/2-,3/2-	30		
53FE 31				3.774	13/2-			31		
53FE 32						3.776	5/2-,7/2-	32		
53FE 33						3.803	1/2-,3/2-	33		
53FE 34						3.852	1/2-,3/2-	34		
53FE 35						3.892	7/2-,5/2-	35		
53FE 36				4.005	17/2-			36		
53FE 37						4.149		37		

53FE	38					4.170	3/2+,5/2+	38	
53FE	39			4.250	7/2-			39	
53FE	40					4.253	(13/2-)	40	
53FE	41					4.451		41	
53FE	42			4.555	15/2-			42	
53FE	43					4.557	7/2-,5/2-	43	
53FE	44					4.575	3/2+,5/2+	44	
53FE	45					4.604		45	
53FE	46					4.637	7/2-,5/2-	46	
53FE	47					4.671		47	
53FE	48					4.698		48	
53FE	49					4.764		49	
53FE	50					4.785	13/2	50	
53FE	51					4.801		51	
53FE	52					4.813		52	
53FE	53					4.839	(7/2-,5/2-)	53	
53FE	54					4.884	7/2-,5/2-	54	
53FE	55					4.931	(15/2-)	55	
53FE	56					5.093		56	
53FE	57					5.185	3/2+,5/2+	57	
53FE	58			5.339	17/2-			58	
53FE	59					5.340	13/2-,15/2-	59	
53FE	60					5.454		60	
53FE	61					5.478	3/2+,5/2+	61	
53FE	62					5.536		62	
53FE	63					5.568	3/2+,5/2+	63	
53FE	64					5.606		64	
53FE	65					5.672		65	
53FE	66					5.722		66	
53FE	67					5.752		67	
53FE	68			5.897	15/2-			68	
53FE	69					5.960		69	
53FE	70					5.994		70	
53FE	71					6.072		71	
53FE	72					6.110		72	
53FE	73					6.152		73	
53FE	74					6.179		74	
53FE	75					6.294		75	
53FE	76			6.365	21/2-			76	2.8 PS LT
53FE	77	6.388	1/2+					77	
53FE	78					6.419		78	
53FE	79					6.449	3/2+,5/2+	79	
53FE	80	6.504	1/2+					80	
53FE	81					6.528	5/2-,7/2-	81	
53FE	82					6.569	(3/2)-	82	

```
 53FE  83 |                |   6.689     17/2-                                83
 53FE  84 |                |                  |   6.696     3/2+,5/2+        84
 53FE  85 |                |                  |   6.800                      85
 53FE  86 |                |   6.829     23/2-                                86
 53FE  87 |                |                  |   6.831                      87
 53FE  88 |                |   6.935     17/2-                                88
 53FE  89 |  6.942     1/2+ |                  |                              89
 53FE  90 |  7.028     1/2+ |                  |                              90
-----------                                                                  -----------------
 53FE  91 |  7.122     1/2+ |                  |                              91
 53FE  92 |                |                  |   7.139     (19/2-)          92
 53FE  93 |                |                  |   7.181     (21/2)-          93
 53FE  94 |                |                  |   7.213     3/2+,5/2+        94
 53FE  95 |                |                  |   7.214                      95
 53FE  96 |                |                  |   7.263     (3/2)+           96
 53FE  97 |                |                  |   7.304                      97
 53FE  98 |                |   7.328     25/2-                                98  18.2 PS   22
 53FE  99 |                |                  |   7.364     3/2+,5/2+        99
S-alpha=   8.039 ( 0.003)-------------------------------------------------------------------------
S-p    =   7.529 ( 0.002)-------------------------------------------------------------------------
 53FE 100 |                |   8.274     25/2-                               100  0.14 PS   LT
-----------                                                                   -----------------
 53FE 101 |                |   8.544     23/2-                               101
 53FE 102 |                |   9.098     27/2-                               102  0.14 PS   LT
 53FE 103 |                |                  |   9.288     (25/2-)          103
 53FE 104 |                |                  |   9.550     (25/2)           104
 53FE 105 |                |   9.881     27/2-                               105  0.14 PS   LT
S-n    =  10.688 ( 0.005)-------------------------------------------------------------------------
 53FE 106 |                |                  |  10.876     (27/2-)          106
 53FE 107 |                |                  |  11.192     (29/2-)          107  0.14 PS   LT
 53FE 108 |                |                  |  11.690     27/2             108
 53FE 109 |                |                  |  12.593                      109


S-p    =   7.529 ( 0.002)-------------------------------------------------------------------------
S-n    =  10.688 ( 0.005)-------------------------------------------------------------------------
S-2p   =  14.074 ( 0.002)-------------------------------------------------------------------------
S-2n   =  26.888 ( 0.009)-------------------------------------------------------------------------
S-alpha=   8.039 ( 0.003)-------------------------------------------------------------------------

S+p       =  -4.351 ( 0.002)
S+n       = -13.378 ( 0.002)
S+2p      =  -8.966 ( 0.002)
S+2n      = -22.676 ( 0.002)
S+alpha   =  -7.561 ( 0.002)

gap p     =   3.178 ( 0.003)
gap n     =  -2.690 ( 0.006)
gap 2p    =   5.108 ( 0.002)
gap 2n    =   4.211 ( 0.009)
```

```
gap alpha =   0.478 ( 0.003)
```