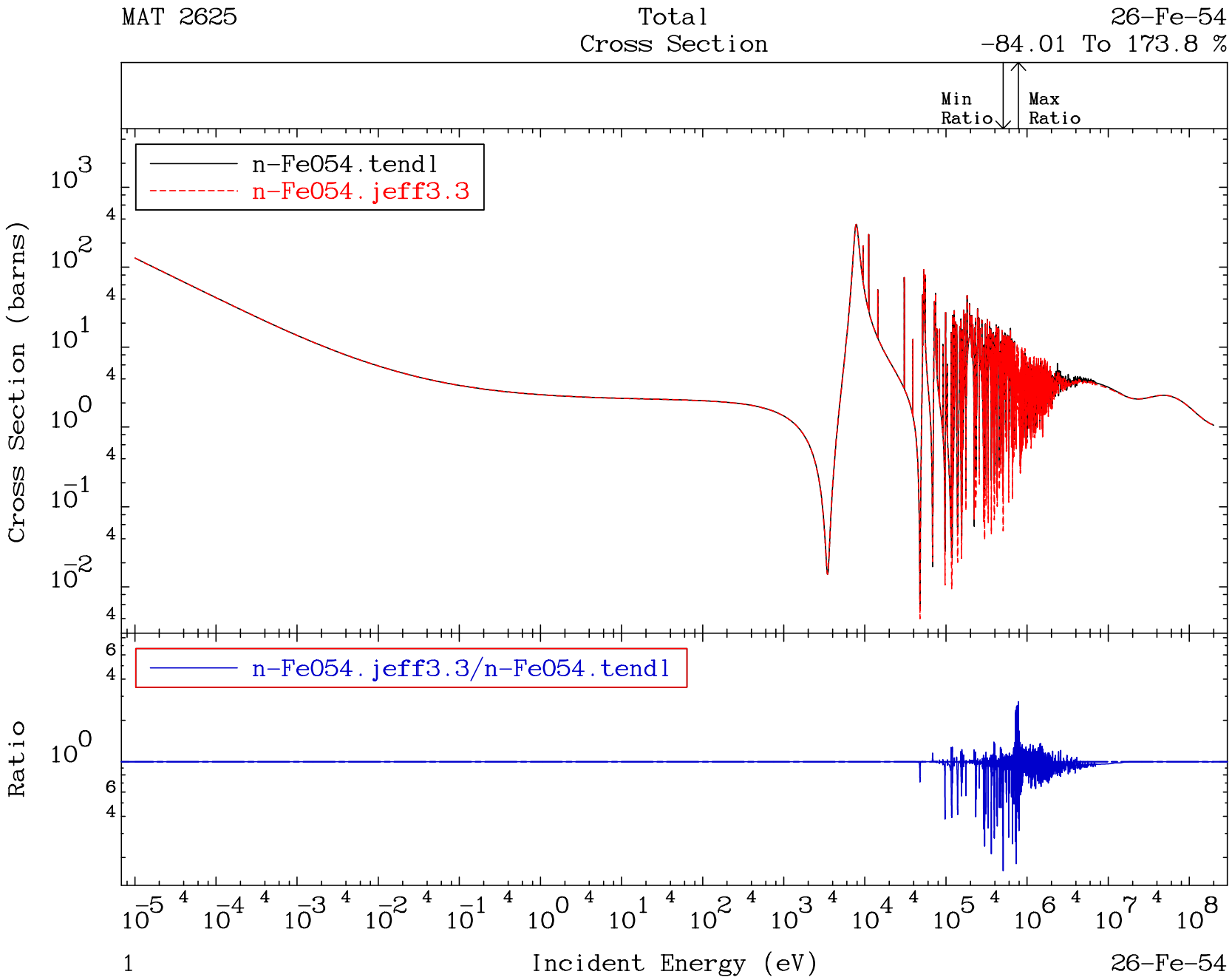
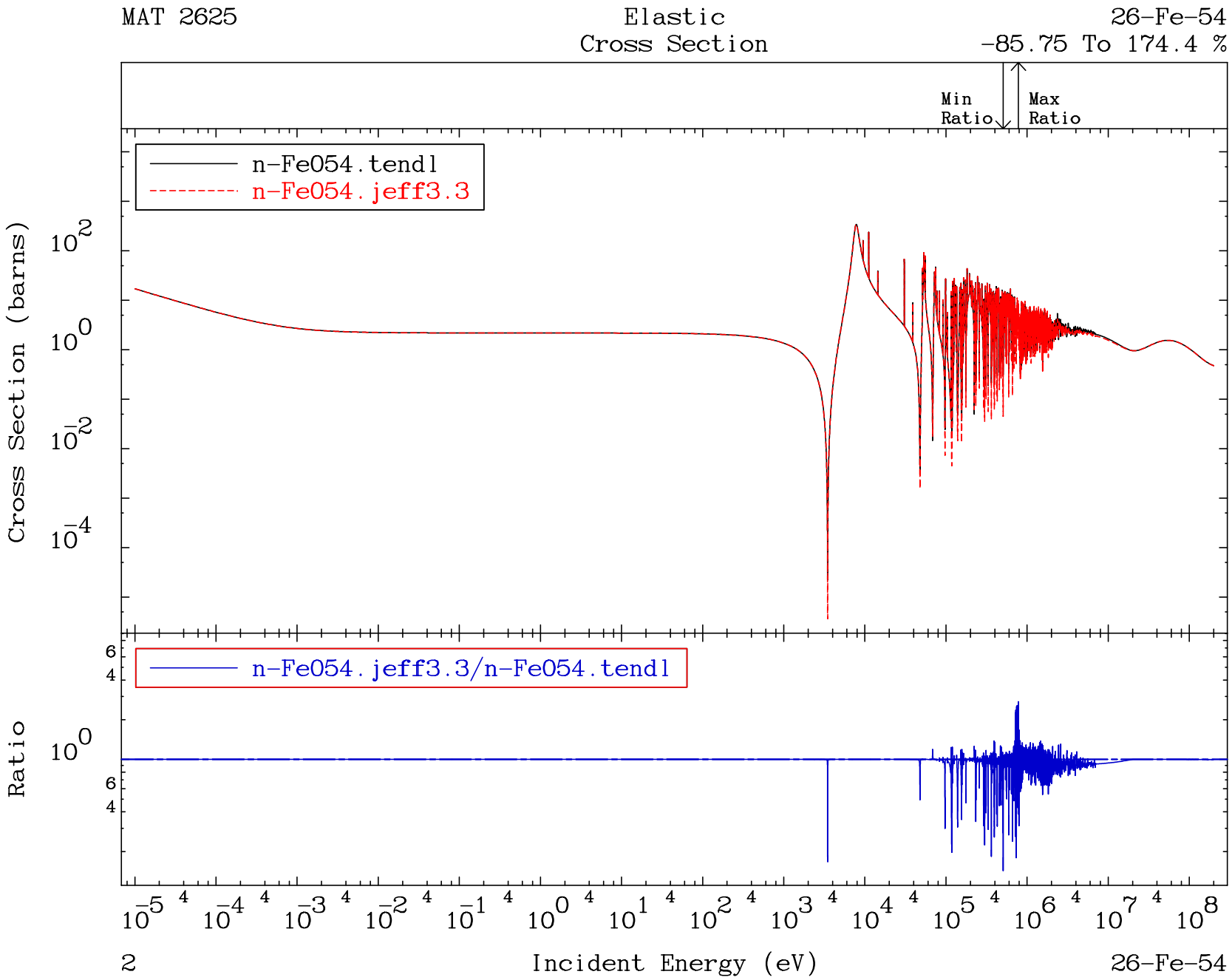
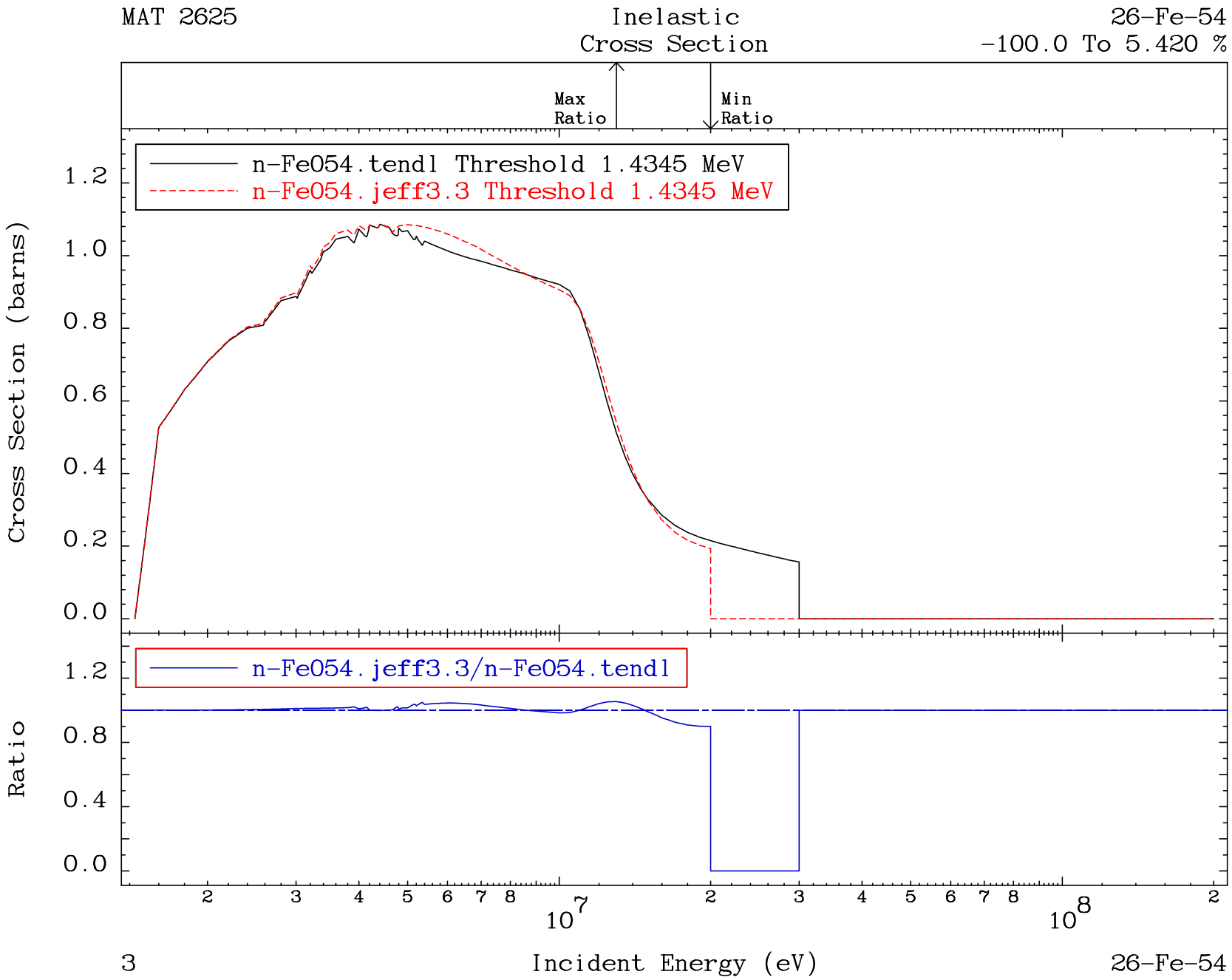
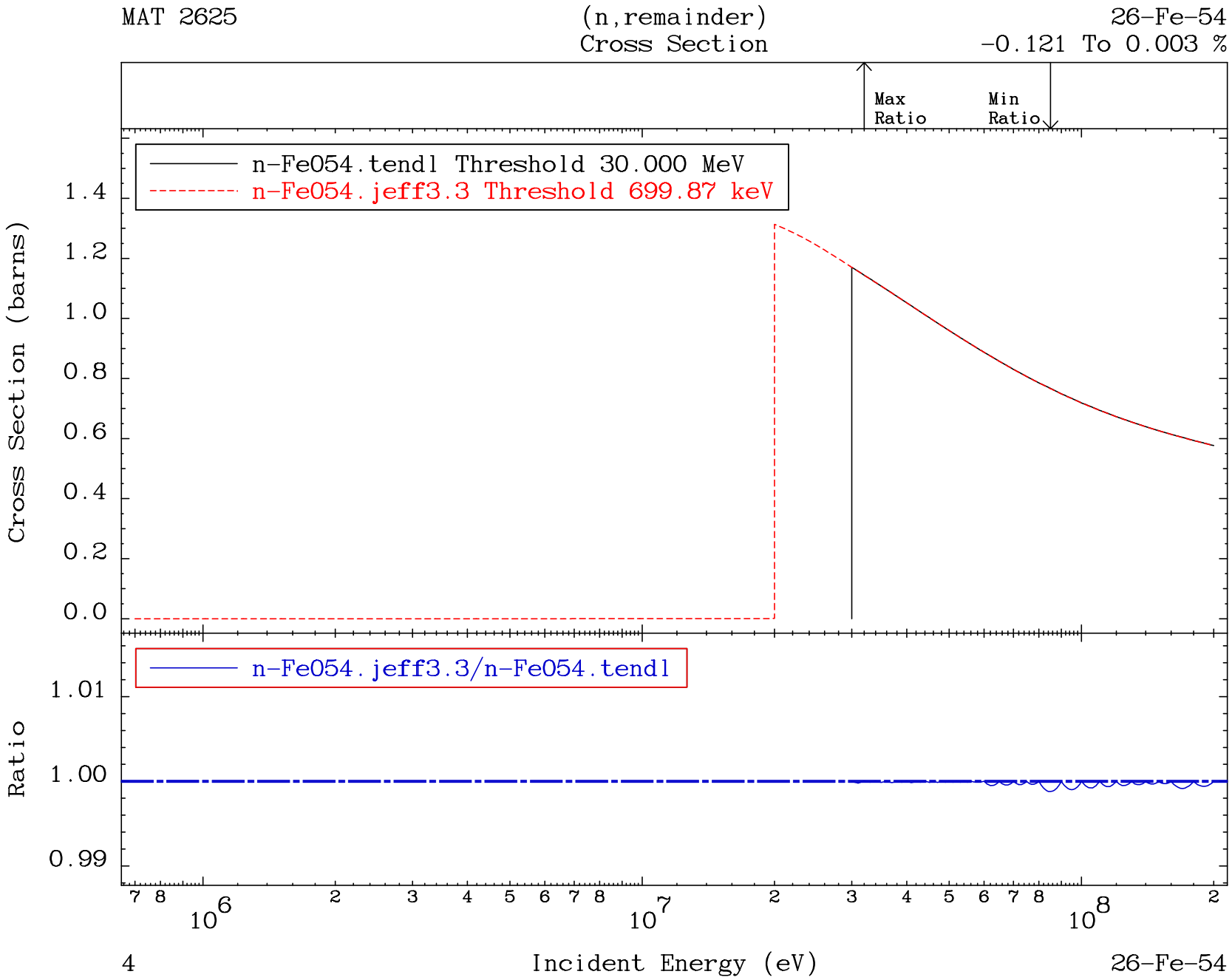
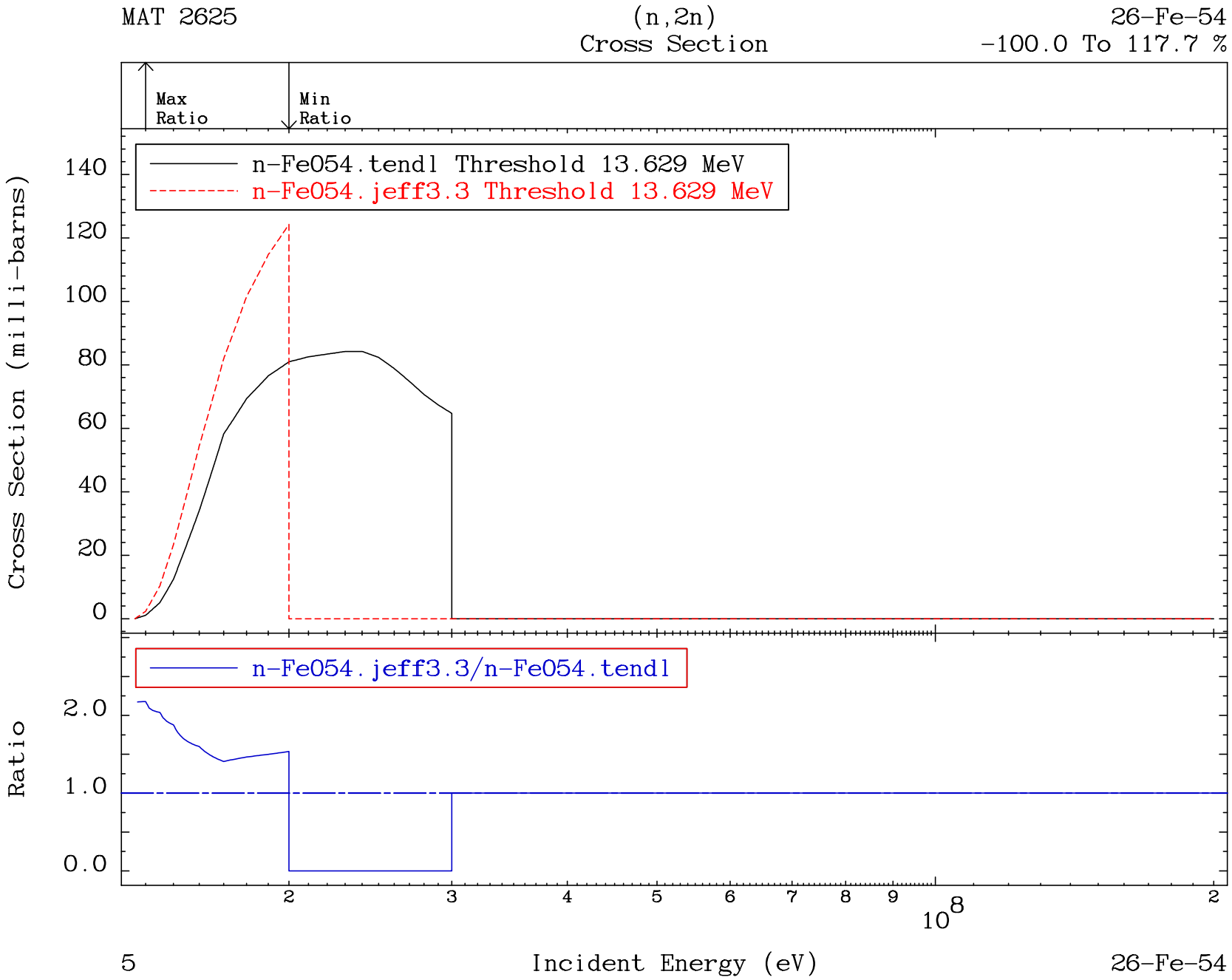
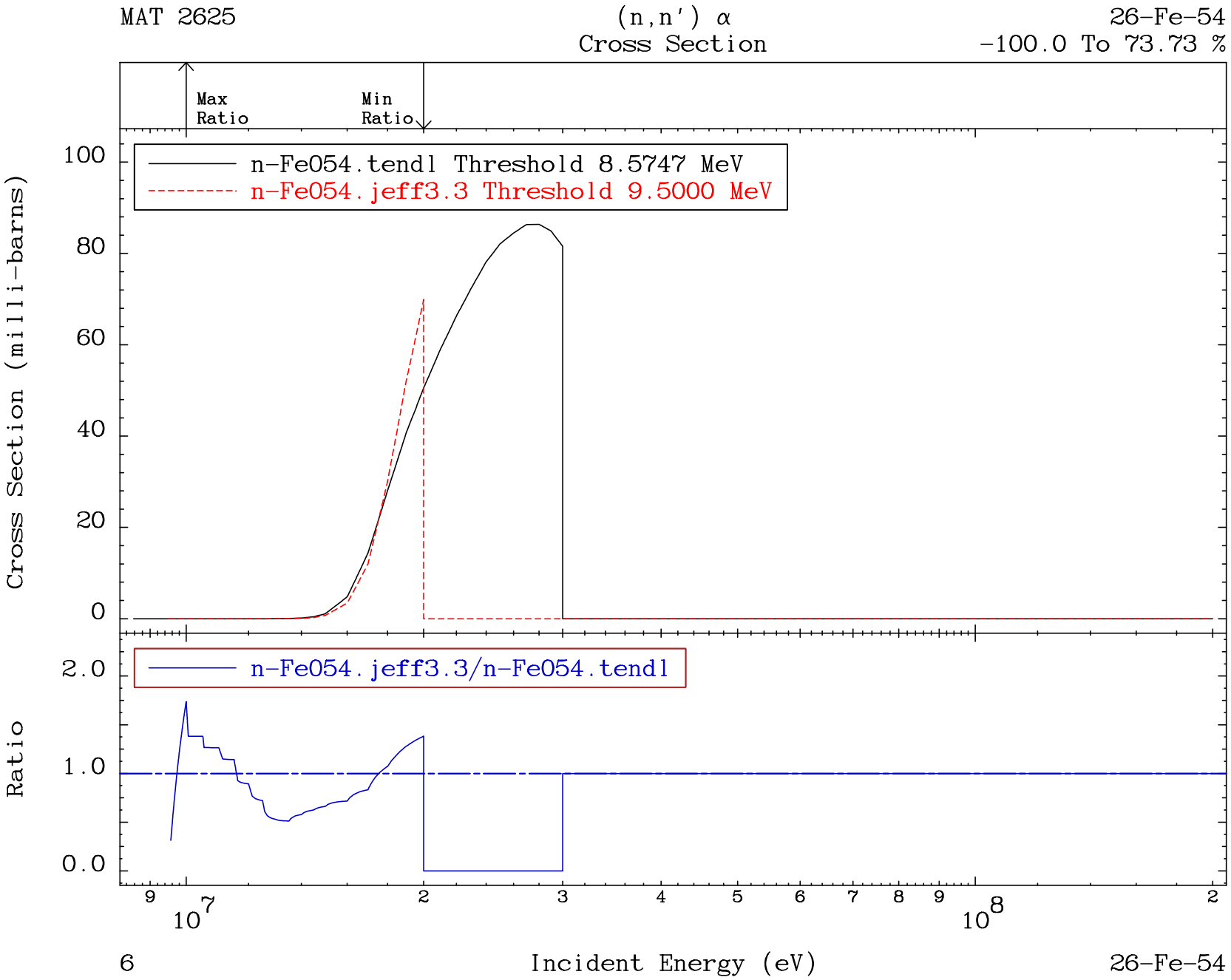

MAT 2625
Total
Cross Section
26-Fe-54
-84.01 To 173.8 %
Min Ratio
Max Ratio
n-Fe054.tendl
n-Fe054.jeff3.3
Cross Section (barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
1
26-Fe-54

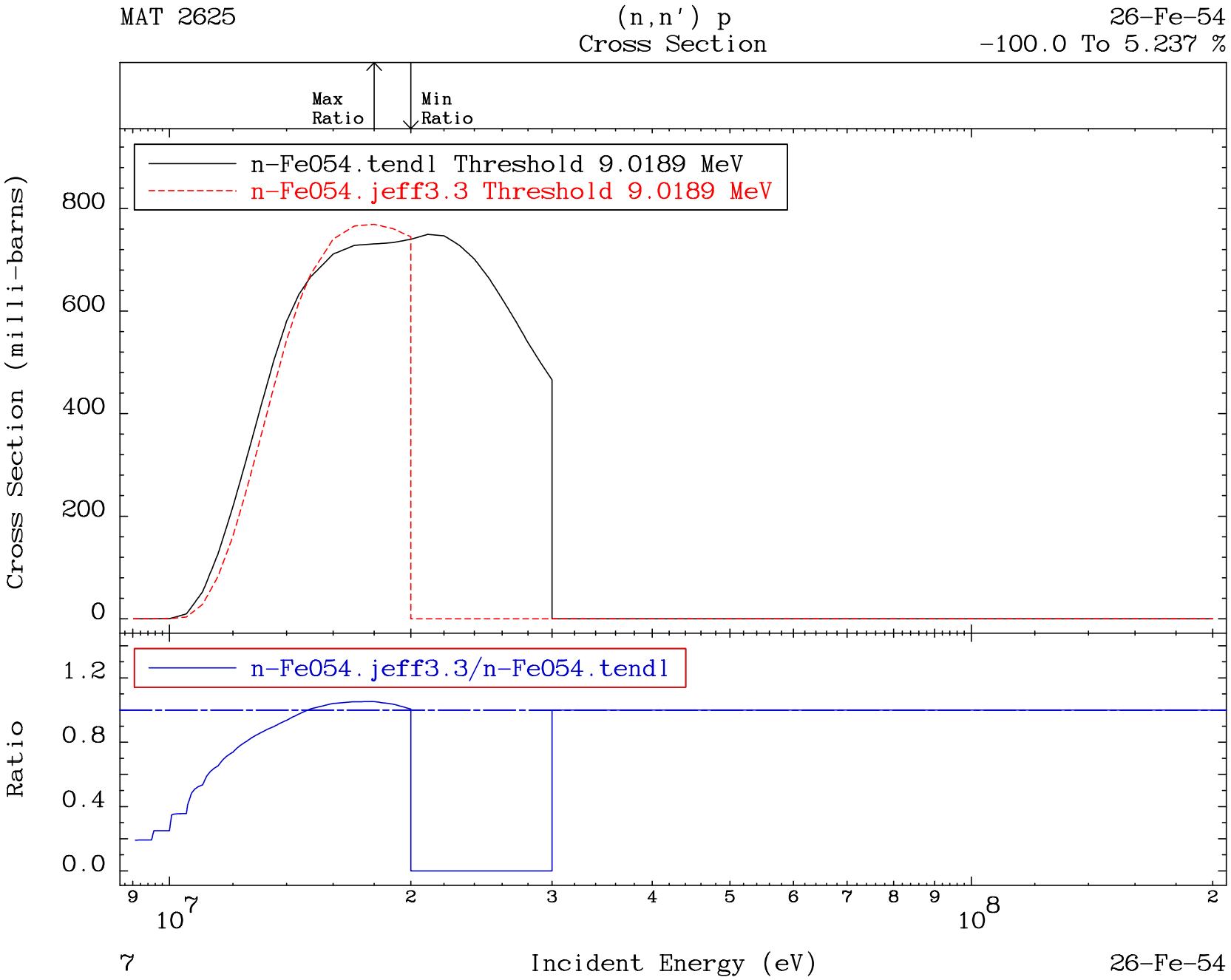

MAT 2625
Elastic
Cross Section
26-Fe-54
-85.75 To 174.4 %
Min Ratio
Max Ratio
n-Fe054.tendl
n-Fe054.jeff3.3
Cross Section (barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
2
26-Fe-54

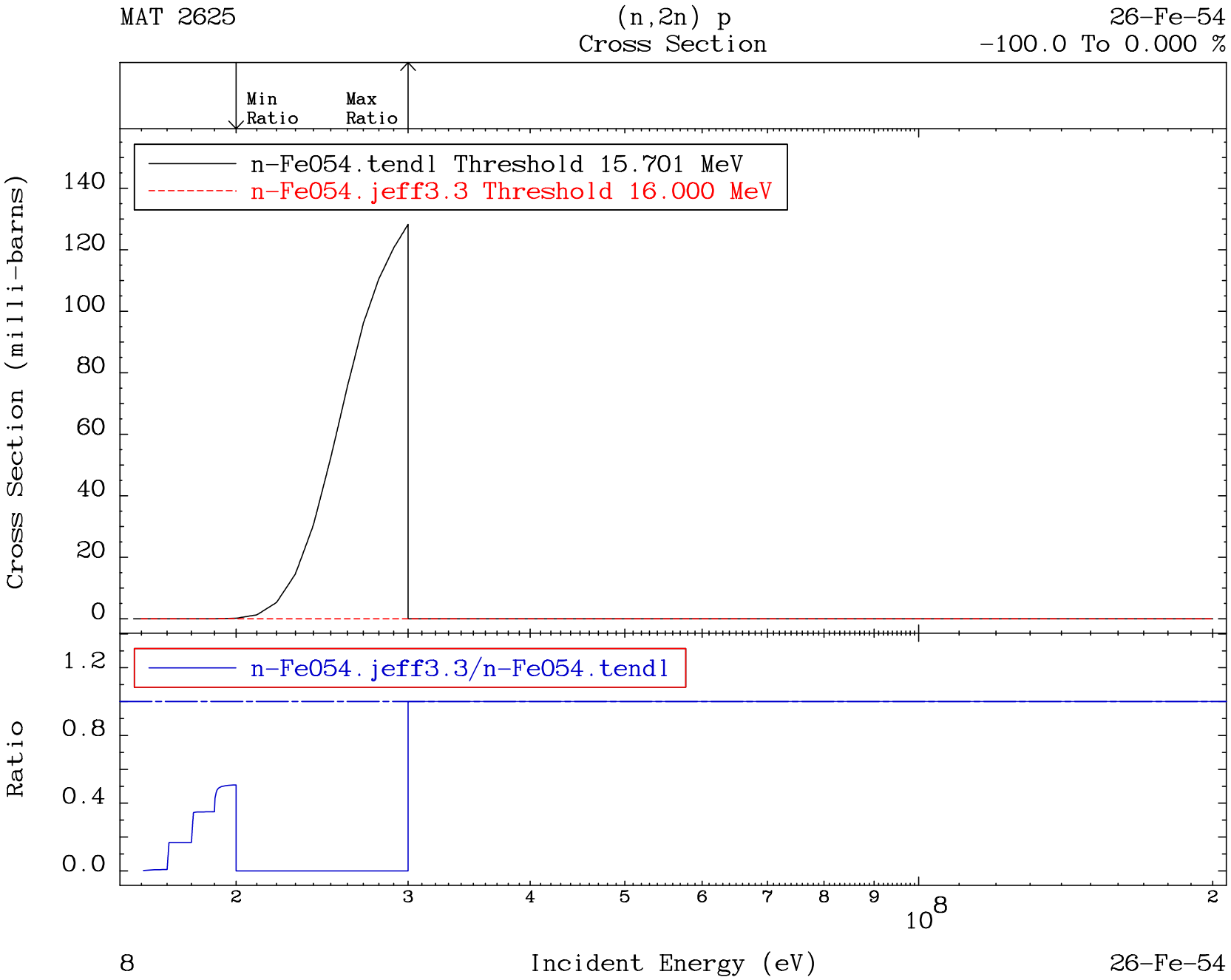

MAT 2625
Inelastic
Cross Section
26-Fe-54
-100.0 To 5.420 %
Max
Ratio
Min
Ratio
n-Fe054.tendl Threshold 1.4345 MeV
n-Fe054.jeff3.3 Threshold 1.4345 MeV
Cross Section (barns)
1.2
1.0
0.8
0.6
0.4
0.2
0.0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
1.2
0.8
0.4
0.0
2 3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
3
Incident Energy (eV)
26-Fe-54

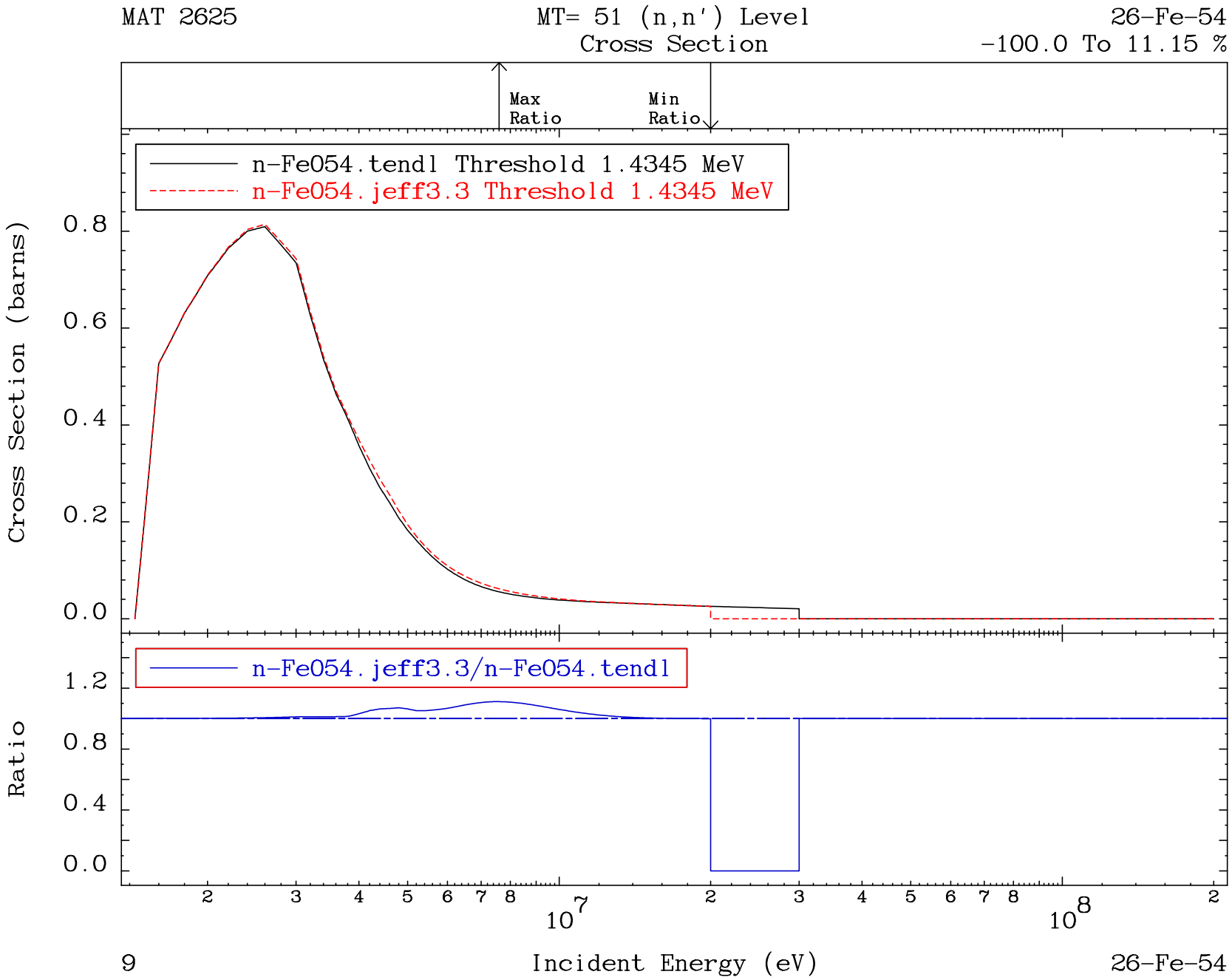

MAT 2625
(n,remainder)
Cross Section
26-Fe-54
-0.121 To 0.003 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 30.000 MeV
n-Fe054.jeff3.3 Threshold 699.87 keV
Cross Section (barns)
1.4
1.2
1.0
0.8
0.6
0.4
0.2
0.0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
1.01
1.00
0.99
7 8 10^6 2 3 4 5 6 7 8 10^7 2 3 4 5 6 7 8 10^8 2
4
Incident Energy (eV)
26-Fe-54

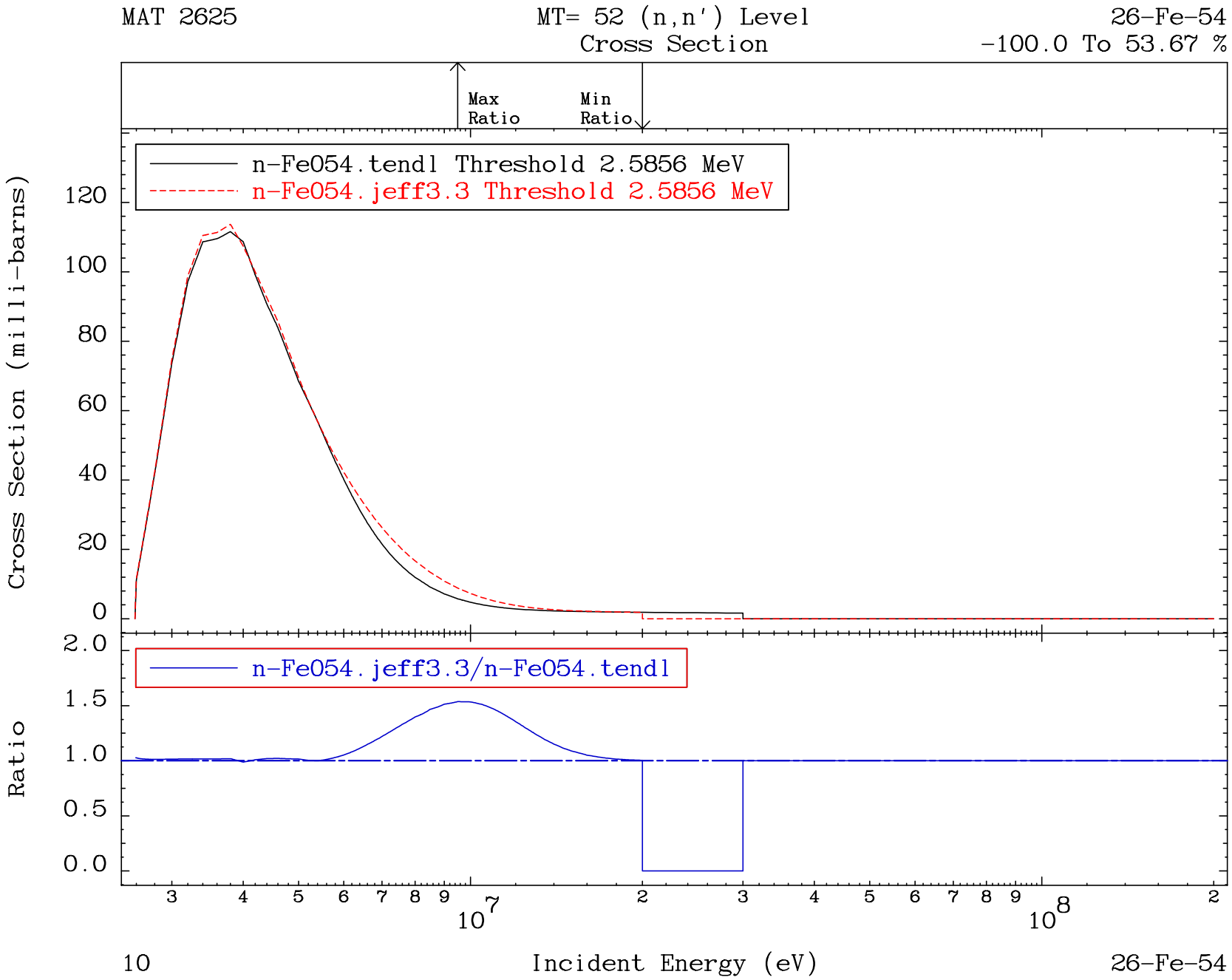

MAT 2625
(n,2n)
Cross Section
26-Fe-54
-100.0 To 117.7 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 13.629 MeV
n-Fe054.jeff3.3 Threshold 13.629 MeV
Cross Section (milli-barns)
140
120
100
80
60
40
20
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
2.0
1.0
0.0
2
3
4
5
6
7
8
9
10^8
2
5
Incident Energy (eV)
26-Fe-54

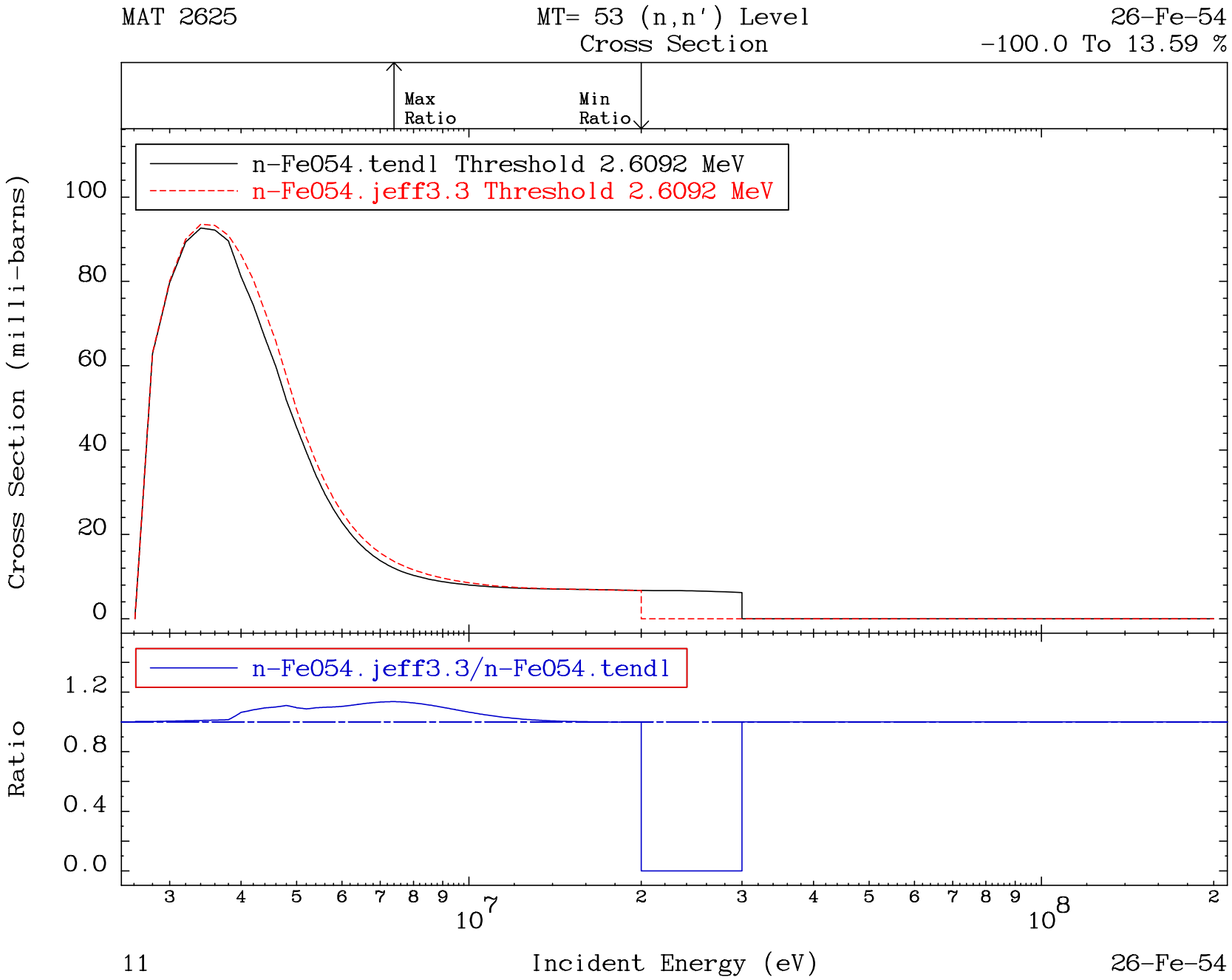

MAT 2625
(n,n') α
Cross Section
26-Fe-54
-100.0 To 73.73 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 8.5747 MeV
n-Fe054.jeff3.3 Threshold 9.5000 MeV
Cross Section (milli-barns)
100
80
60
40
20
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
2.0
1.0
0.0
9
10^7
2
3
4
5
6
7
8
9
10^8
2
6
Incident Energy (eV)
26-Fe-54

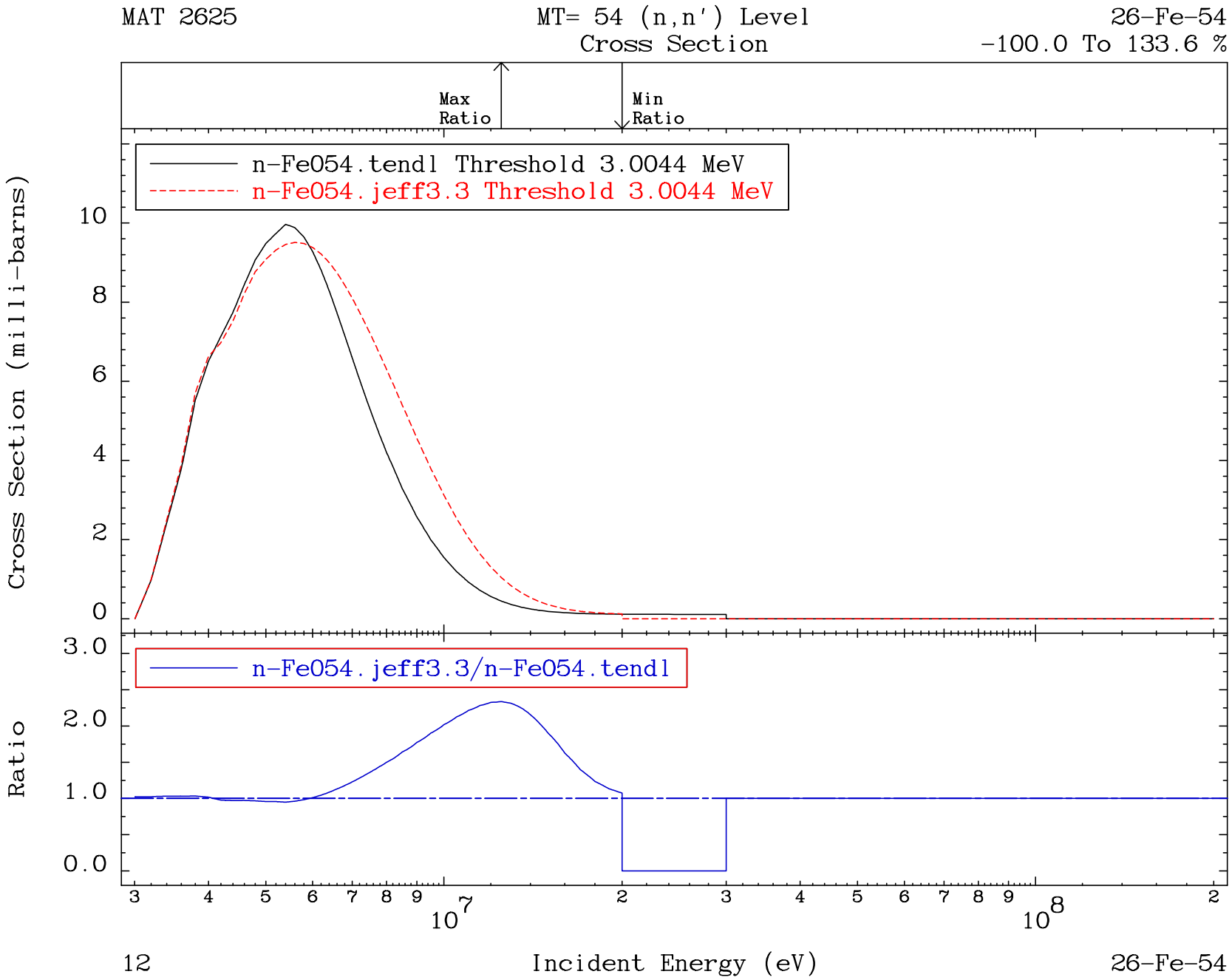

MAT 2625
(n,n') p
Cross Section
26-Fe-54
-100.0 To 5.237 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 9.0189 MeV
n-Fe054.jeff3.3 Threshold 9.0189 MeV
Cross Section (milli-barns)
800
600
400
200
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
1.2
0.8
0.4
0.0
9
10^7
2
3
4
5
6
7
8
9
10^8
2
7
Incident Energy (eV)
26-Fe-54

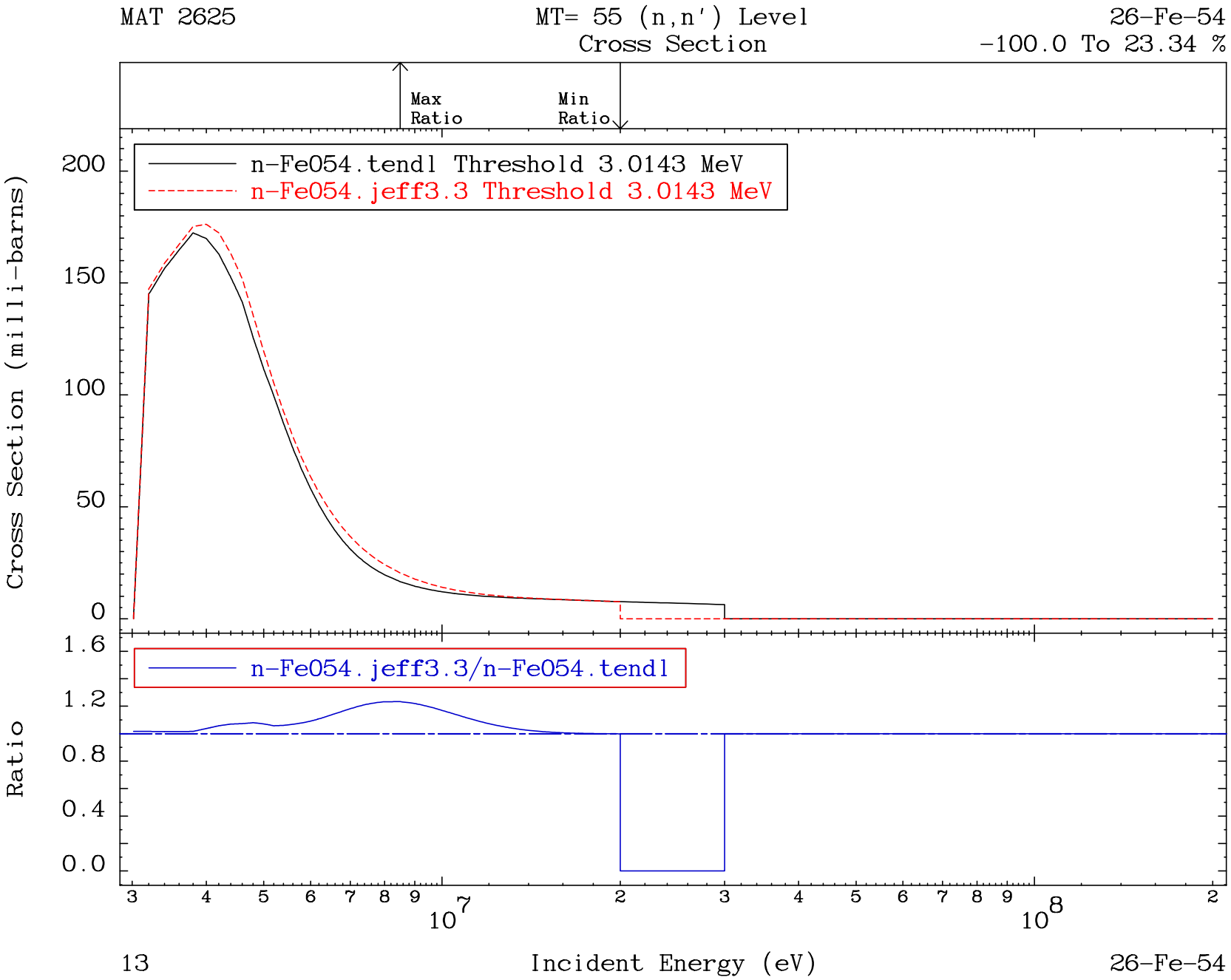

MAT 2625
(n,2n) p
Cross Section
26-Fe-54
-100.0 To 0.000 %
Min Ratio
Max Ratio
n-Fe054.tendl Threshold 15.701 MeV
n-Fe054.jeff3.3 Threshold 16.000 MeV
Cross Section (milli-barns)
140
120
100
80
60
40
20
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
1.2
0.8
0.4
0.0
2
3
4
5
6
7
8
9
10^8
2
8
Incident Energy (eV)
26-Fe-54

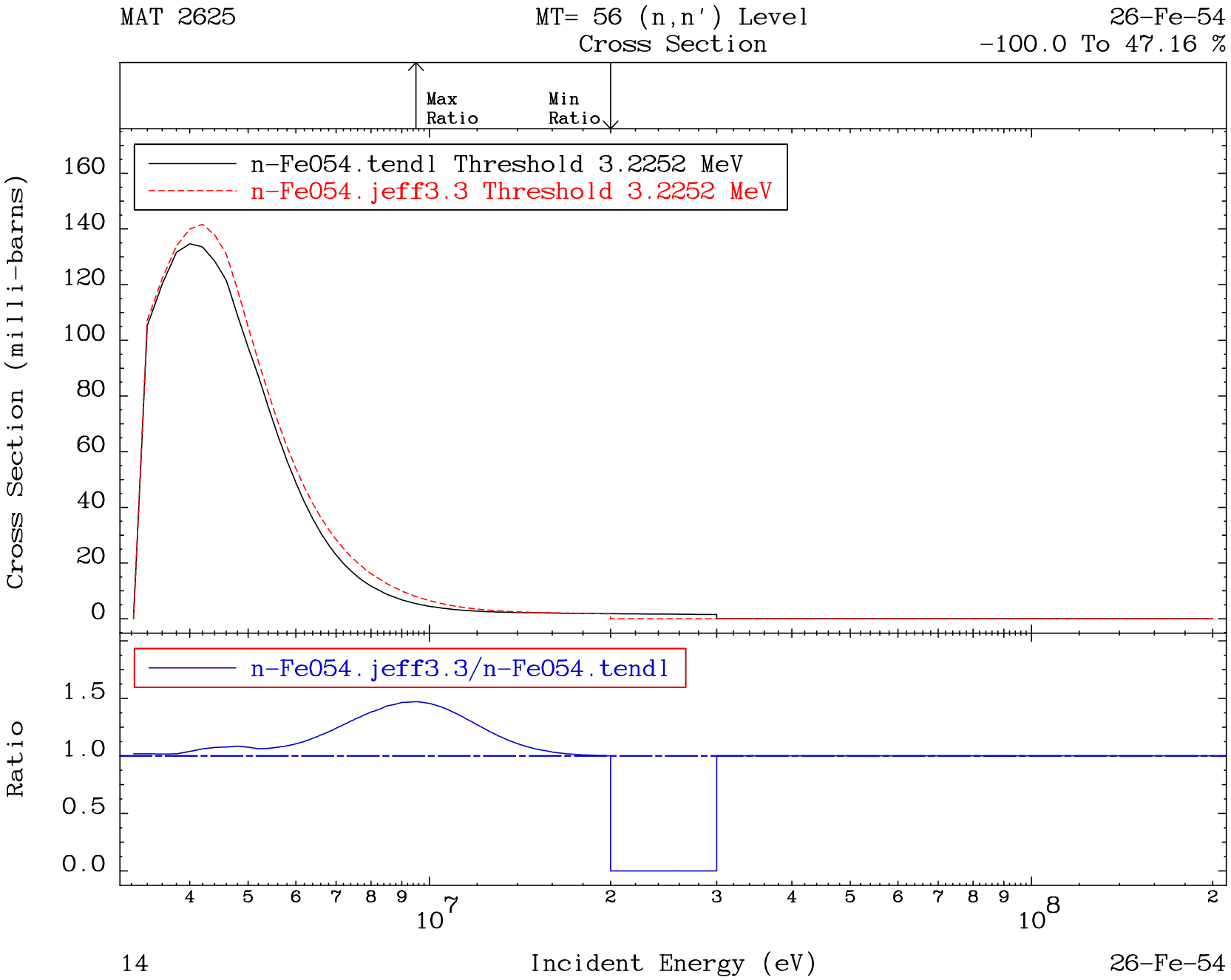

MAT 2625
MT= 51 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 11.15 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 1.4345 MeV
n-Fe054.jeff3.3 Threshold 1.4345 MeV
Cross Section (barns)
0.0
0.2
0.4
0.6
0.8
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
0.0
0.4
0.8
1.2
2 3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
9
Incident Energy (eV)
26-Fe-54

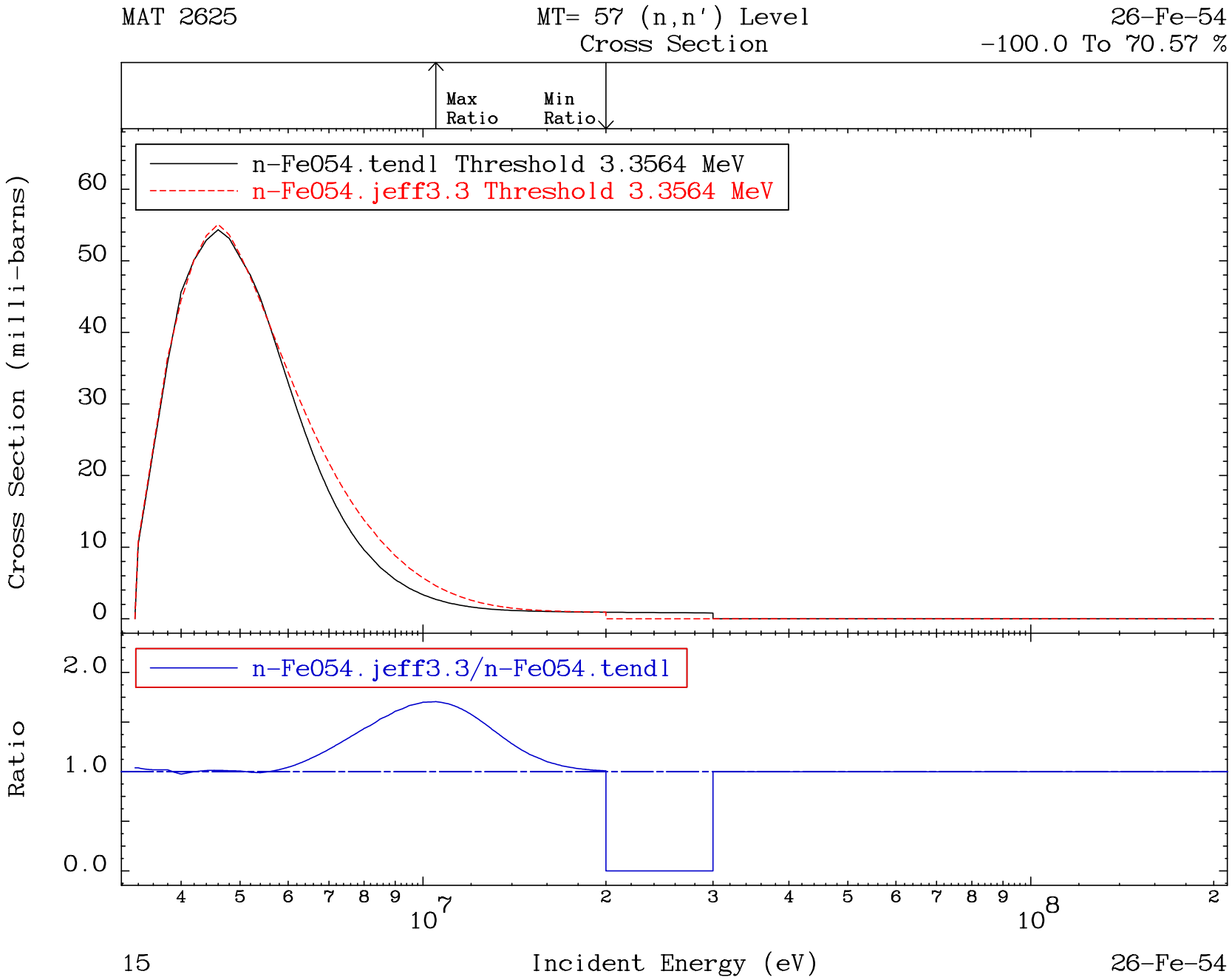

MAT 2625
MT= 52 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 53.67 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 2.5856 MeV
n-Fe054.jeff3.3 Threshold 2.5856 MeV
Cross Section (milli-barns)
120
100
80
60
40
20
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
2.0
1.5
1.0
0.5
0.0
3 4 5 6 7 8 9
10^7
2 3 4 5 6 7 8 9
10^8
2
10
Incident Energy (eV)
26-Fe-54

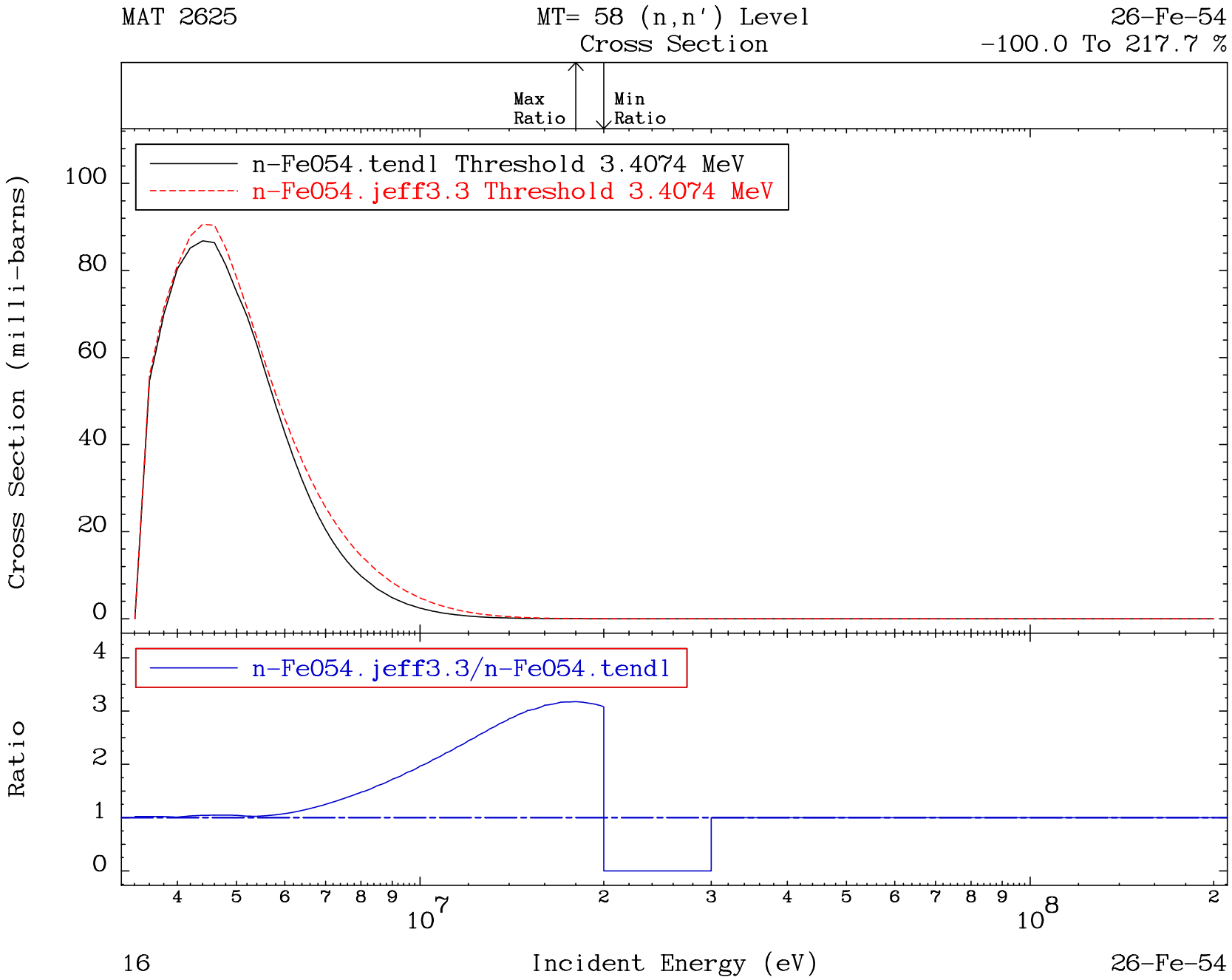

MAT 2625
MT= 53 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 13.59 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 2.6092 MeV
n-Fe054.jeff3.3 Threshold 2.6092 MeV
Cross Section (milli-barns)
100
80
60
40
20
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
1.2
0.8
0.4
0.0
3 4 5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
11
Incident Energy (eV)
26-Fe-54

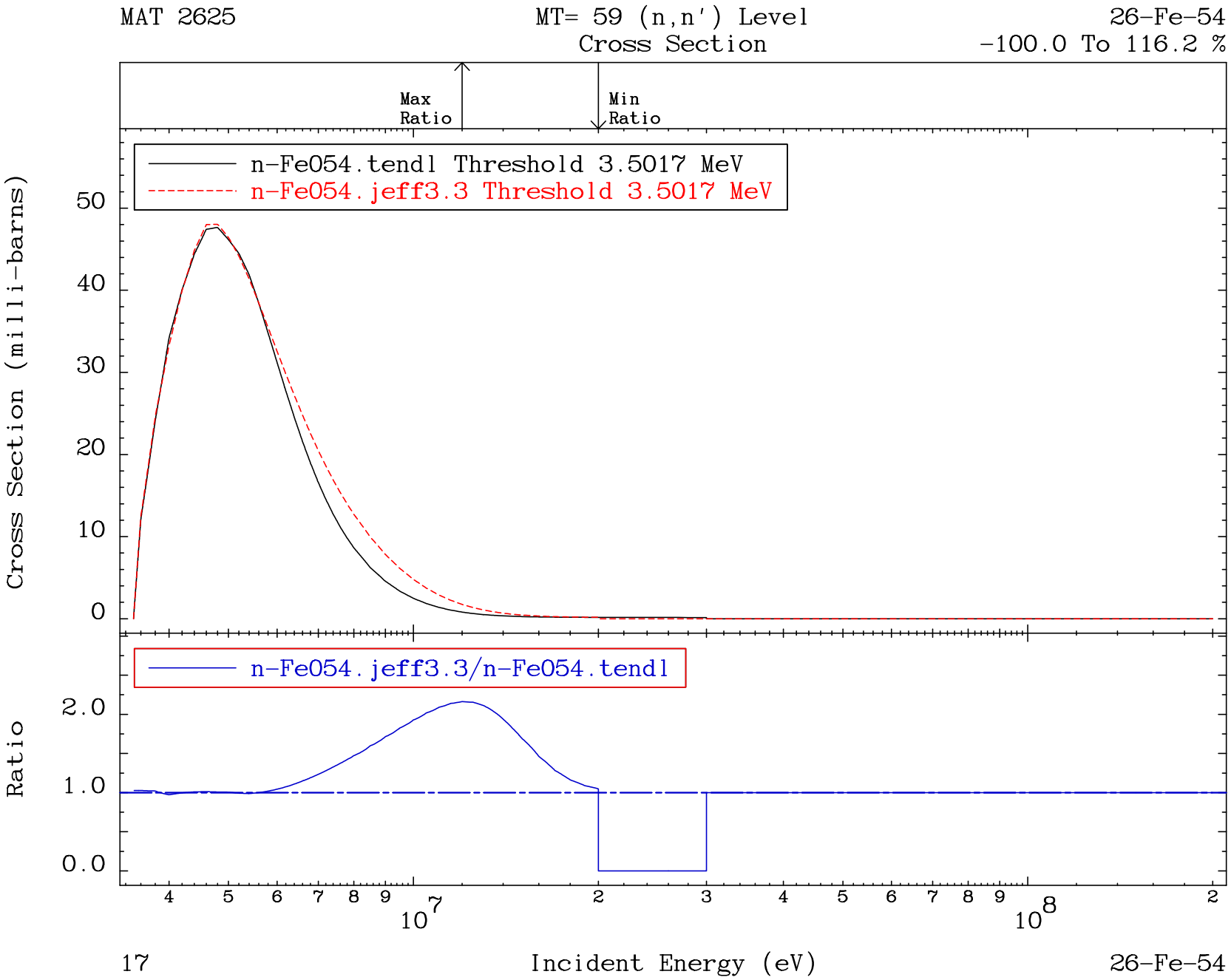

MAT 2625
MT= 54 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 133.6 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 3.0044 MeV
n-Fe054.jeff3.3 Threshold 3.0044 MeV
Cross Section (milli-barns)
10
8
6
4
2
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
3.0
2.0
1.0
0.0
3 4 5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
12
Incident Energy (eV)
26-Fe-54

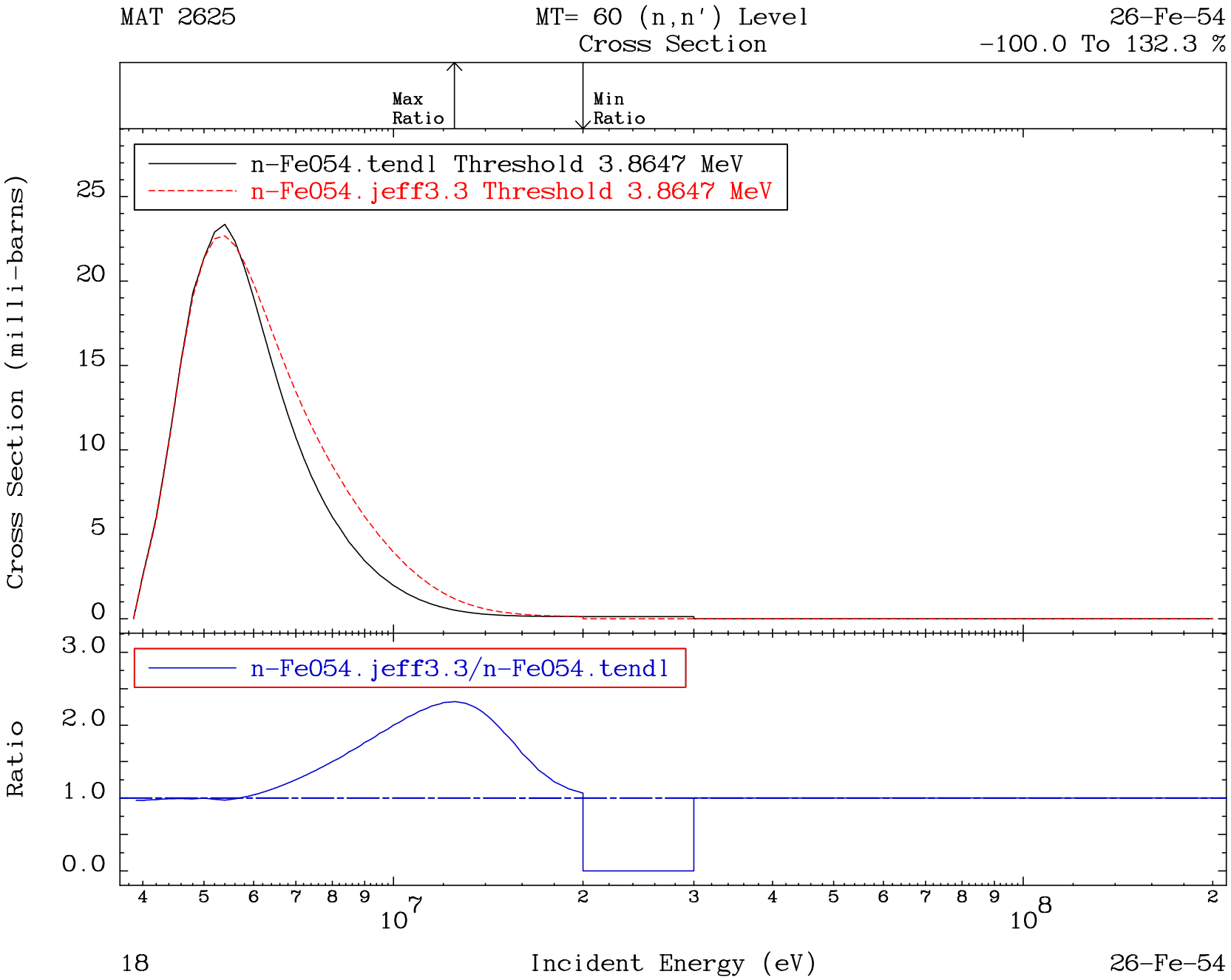

MAT 2625
MT= 55 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 23.34 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 3.0143 MeV
n-Fe054.jeff3.3 Threshold 3.0143 MeV
Cross Section (milli-barns)
200
150
100
50
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
1.6
1.2
0.8
0.4
0.0
3 4 5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
13
Incident Energy (eV)
26-Fe-54

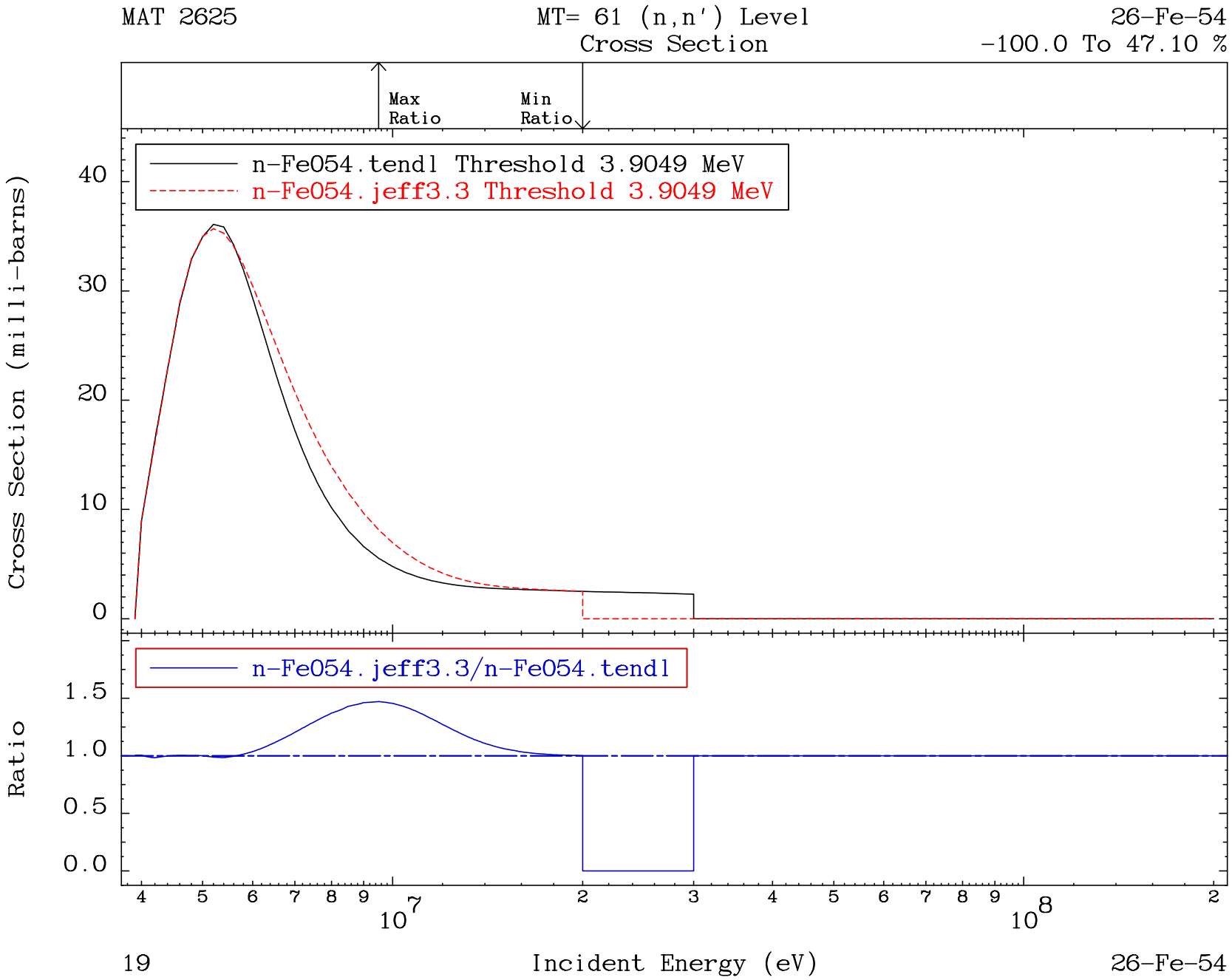

MAT 2625
MT= 56 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 47.16 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 3.2252 MeV
n-Fe054.jeff3.3 Threshold 3.2252 MeV
Cross Section (milli-barns)
160
140
120
100
80
60
40
20
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
1.5
1.0
0.5
0.0
4 5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
14
Incident Energy (eV)
26-Fe-54

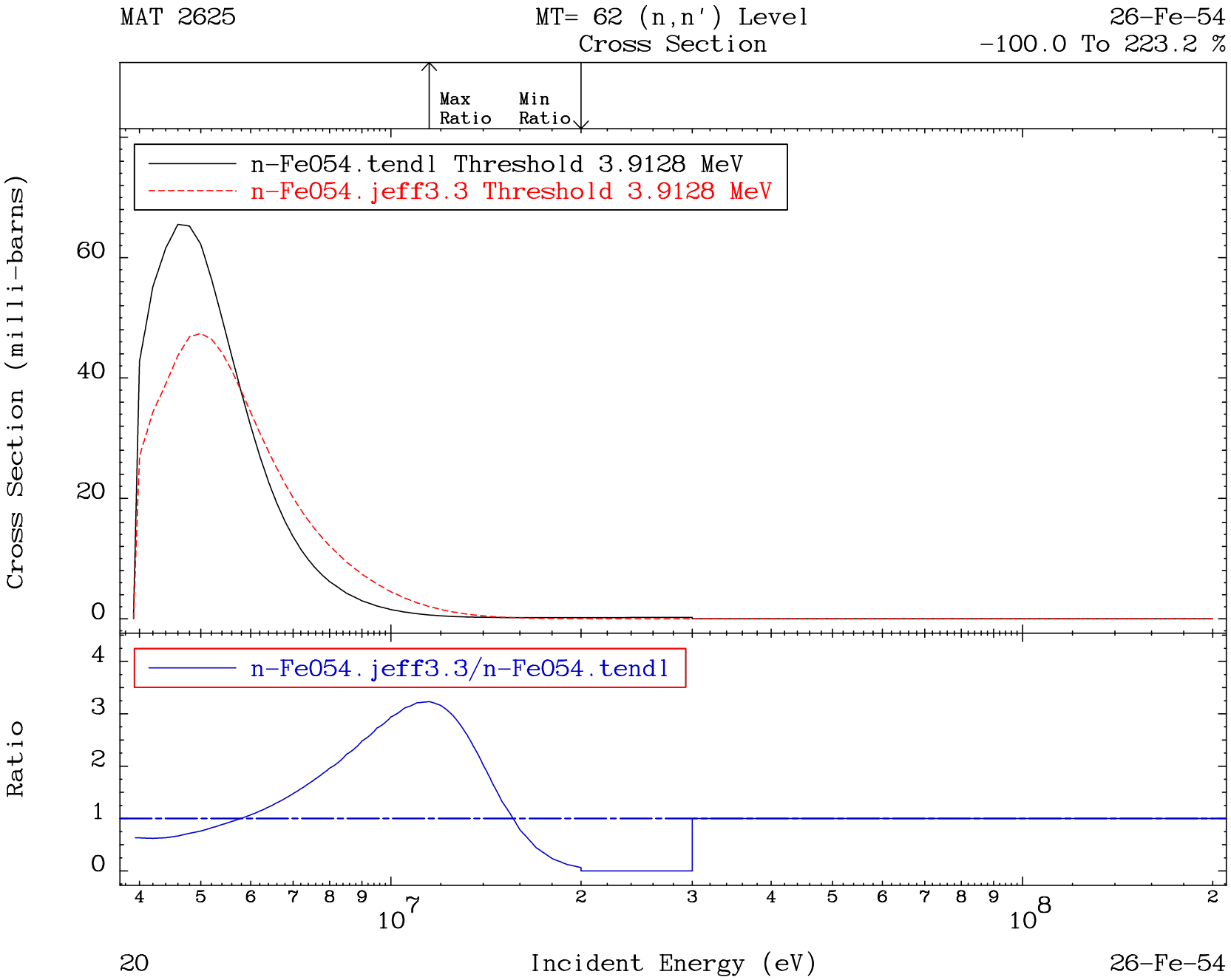

MAT 2625
MT= 57 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 70.57 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 3.3564 MeV
n-Fe054.jeff3.3 Threshold 3.3564 MeV
Cross Section (milli-barns)
60
50
40
30
20
10
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
2.0
1.0
0.0
4 5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
15
Incident Energy (eV)
26-Fe-54

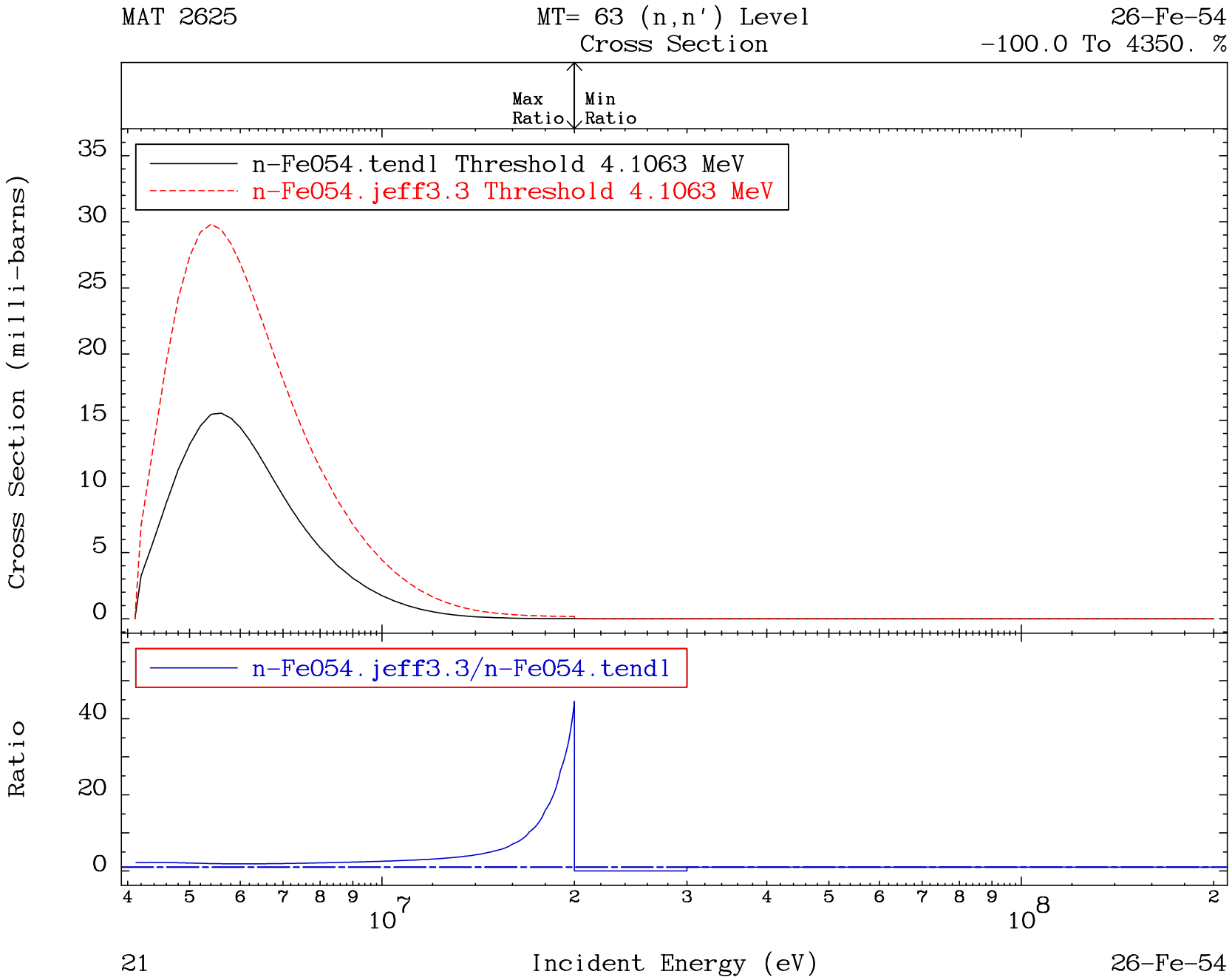

MAT 2625
MT= 58 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 217.7 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 3.4074 MeV
n-Fe054.jeff3.3 Threshold 3.4074 MeV
Cross Section (milli-barns)
100
80
60
40
20
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
4
3
2
1
0
4 5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
16
Incident Energy (eV)
26-Fe-54

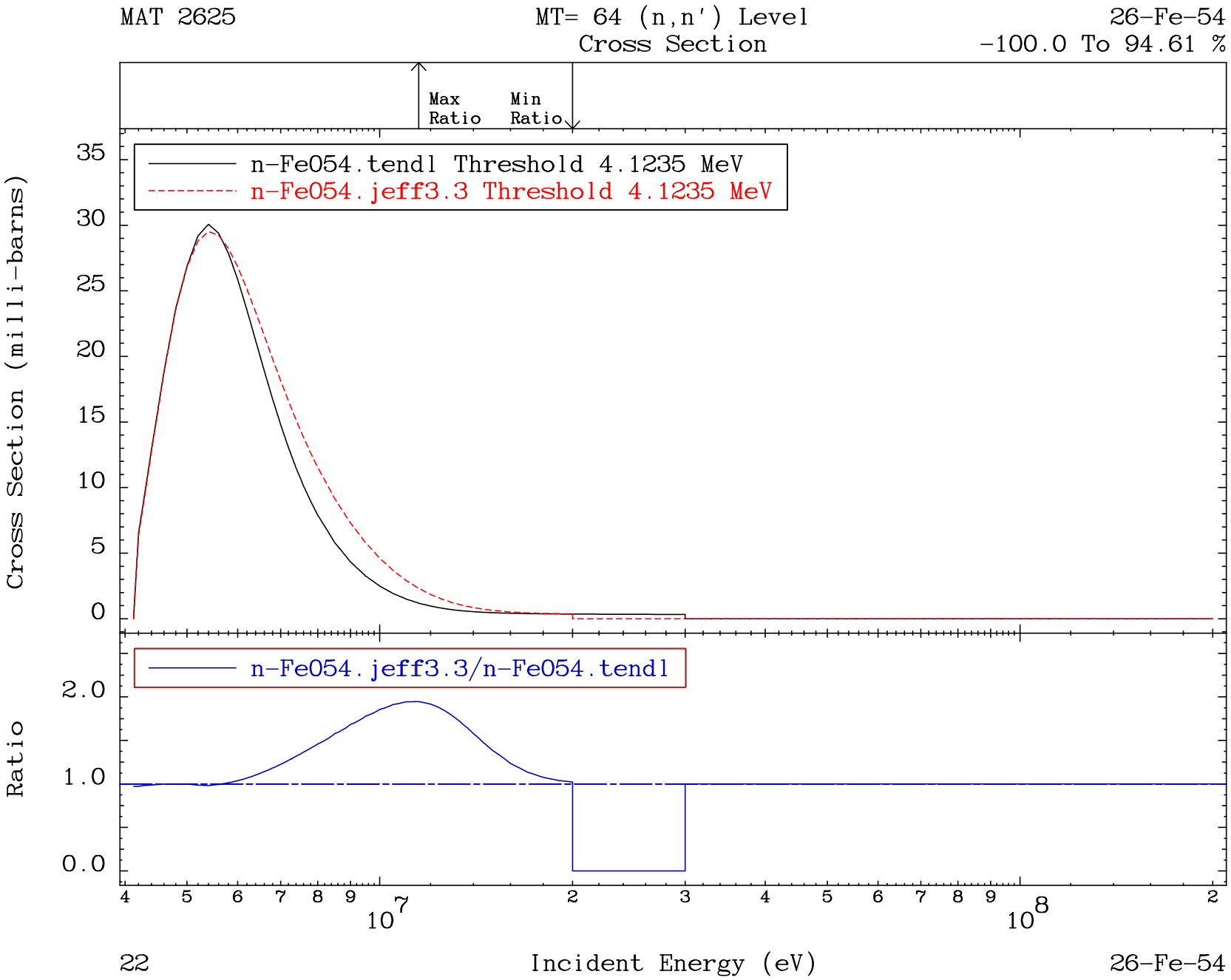

MAT 2625
MT= 59 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 116.2 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 3.5017 MeV
n-Fe054.jeff3.3 Threshold 3.5017 MeV
Cross Section (milli-barns)
50
40
30
20
10
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
2.0
1.0
0.0
4 5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
17
Incident Energy (eV)
26-Fe-54

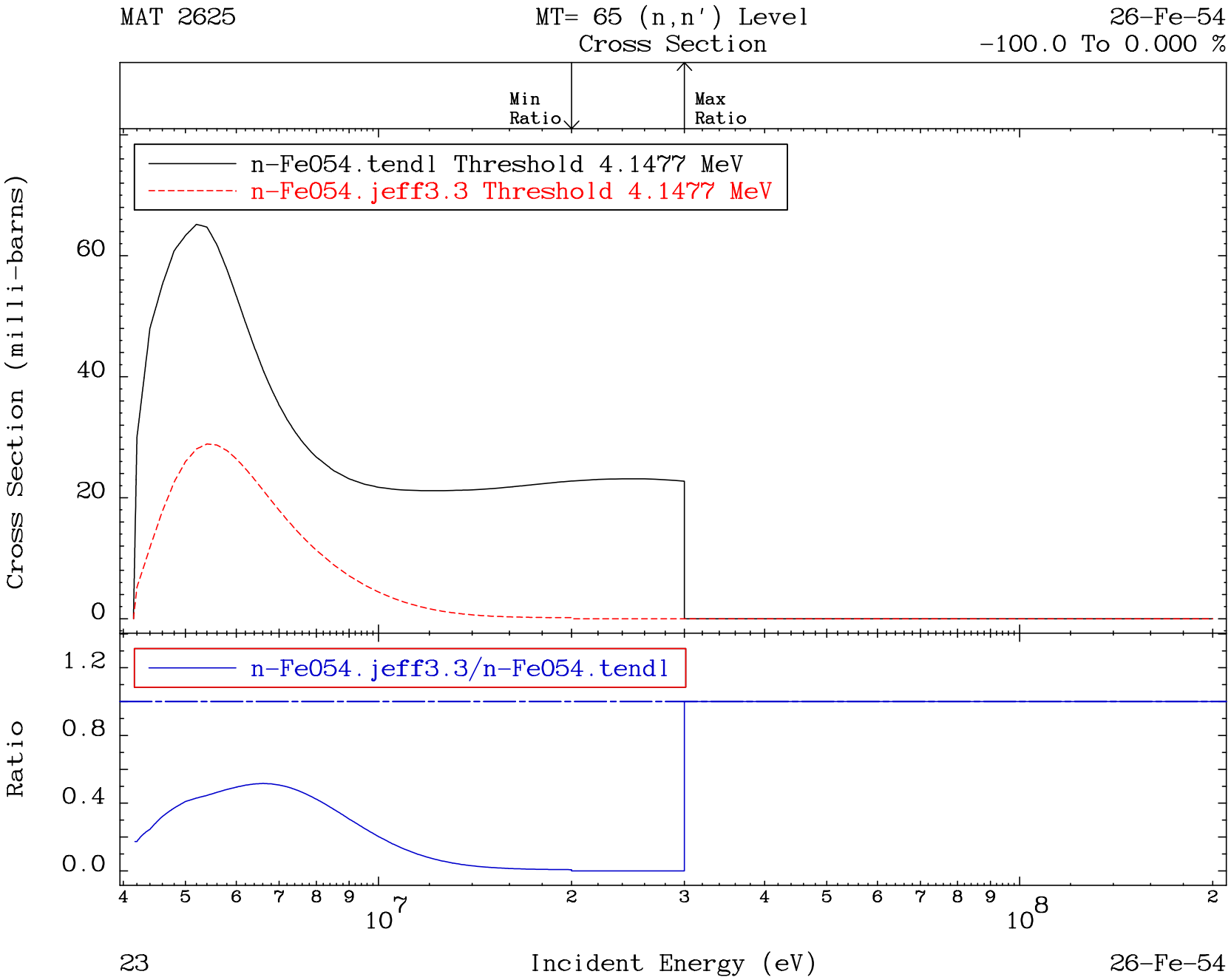

MAT 2625
MT= 60 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 132.3 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 3.8647 MeV
n-Fe054.jeff3.3 Threshold 3.8647 MeV
Cross Section (milli-barns)
25
20
15
10
5
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
3.0
2.0
1.0
0.0
4 5 6 7 8 9
10^7
2 3 4 5 6 7 8 9
10^8
2
18
Incident Energy (eV)
26-Fe-54

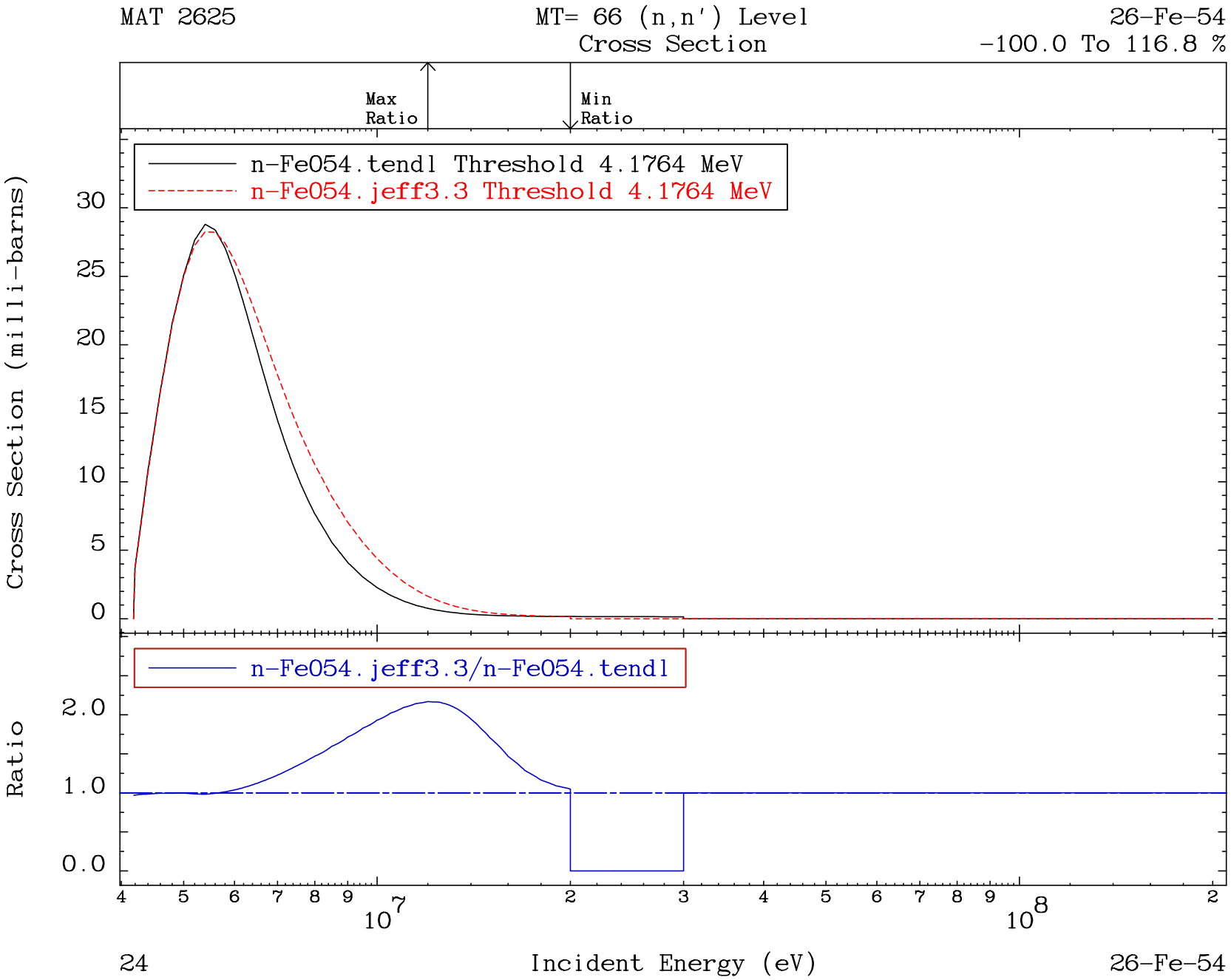

MAT 2625
MT= 61 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 47.10 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 3.9049 MeV
n-Fe054.jeff3.3 Threshold 3.9049 MeV
Cross Section (milli-barns)
40
30
20
10
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
1.5
1.0
0.5
0.0
4 5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
19
Incident Energy (eV)
26-Fe-54

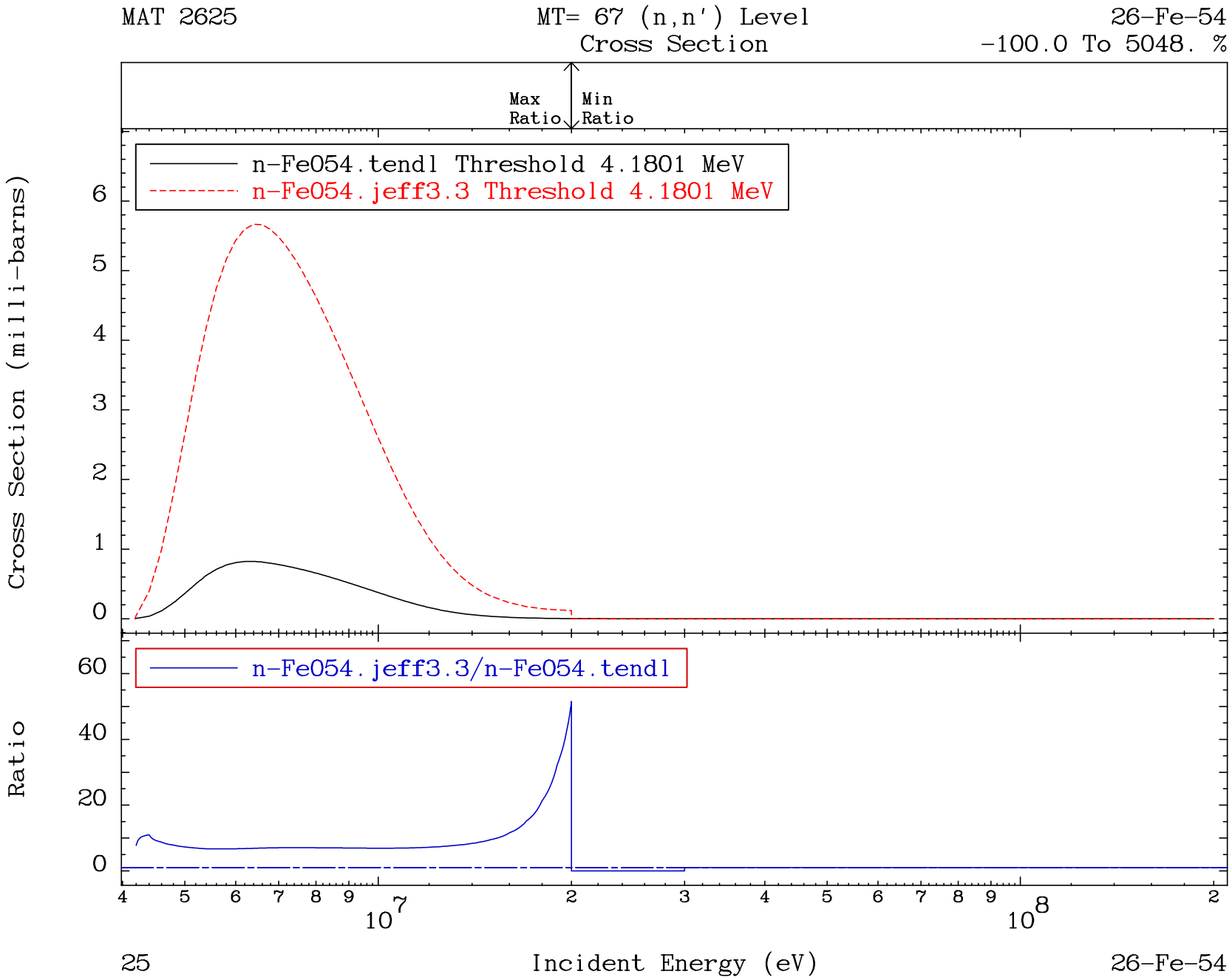

MAT 2625
MT= 62 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 223.2 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 3.9128 MeV
n-Fe054.jeff3.3 Threshold 3.9128 MeV
Cross Section (milli-barns)
60
40
20
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
4
3
2
1
0
4 5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
20
Incident Energy (eV)
26-Fe-54

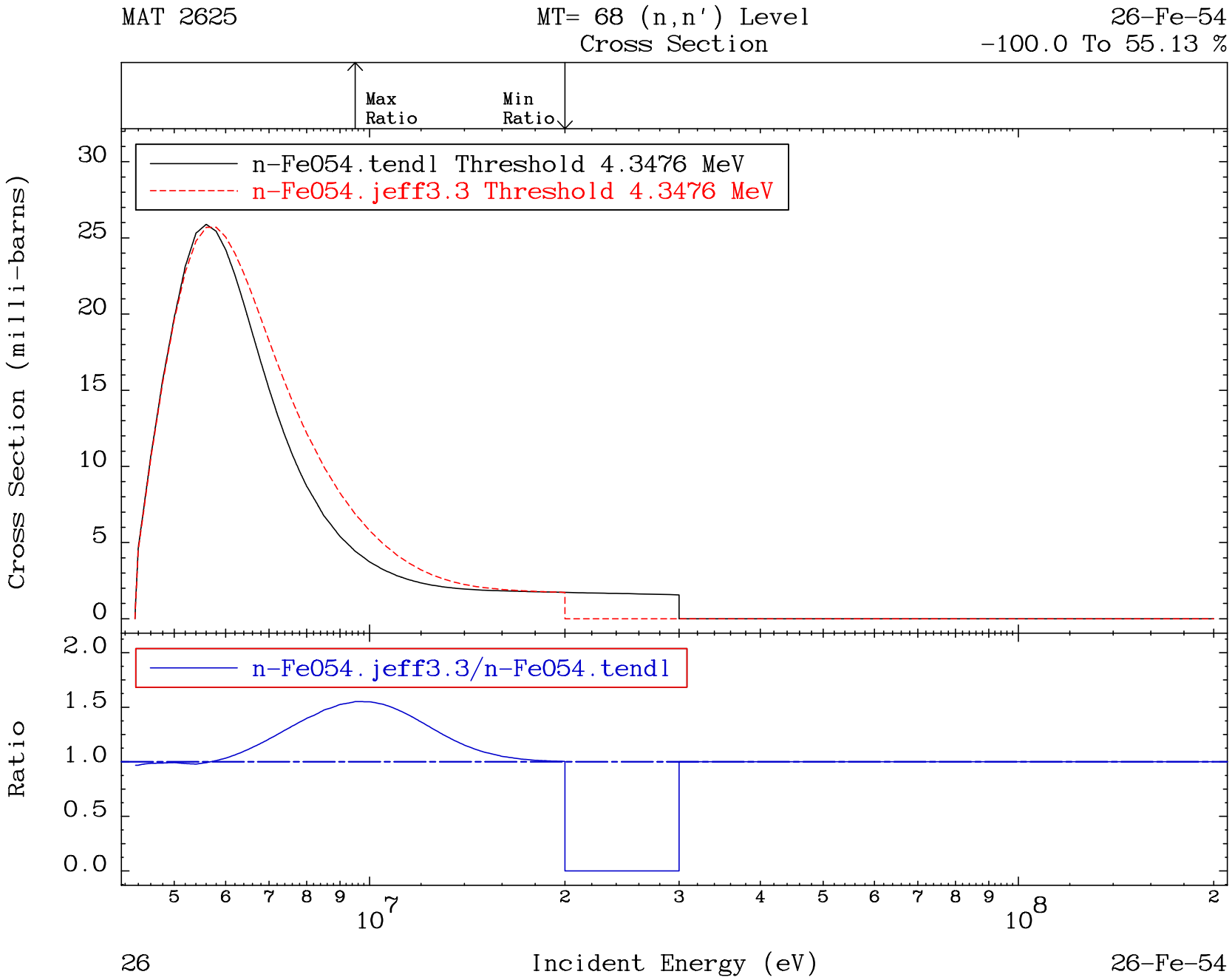

MAT 2625
MT= 63 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 4350. %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 4.1063 MeV
n-Fe054.jeff3.3 Threshold 4.1063 MeV
Cross Section (milli-barns)
35
30
25
20
15
10
5
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
40
20
0
4 5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
21
Incident Energy (eV)
26-Fe-54

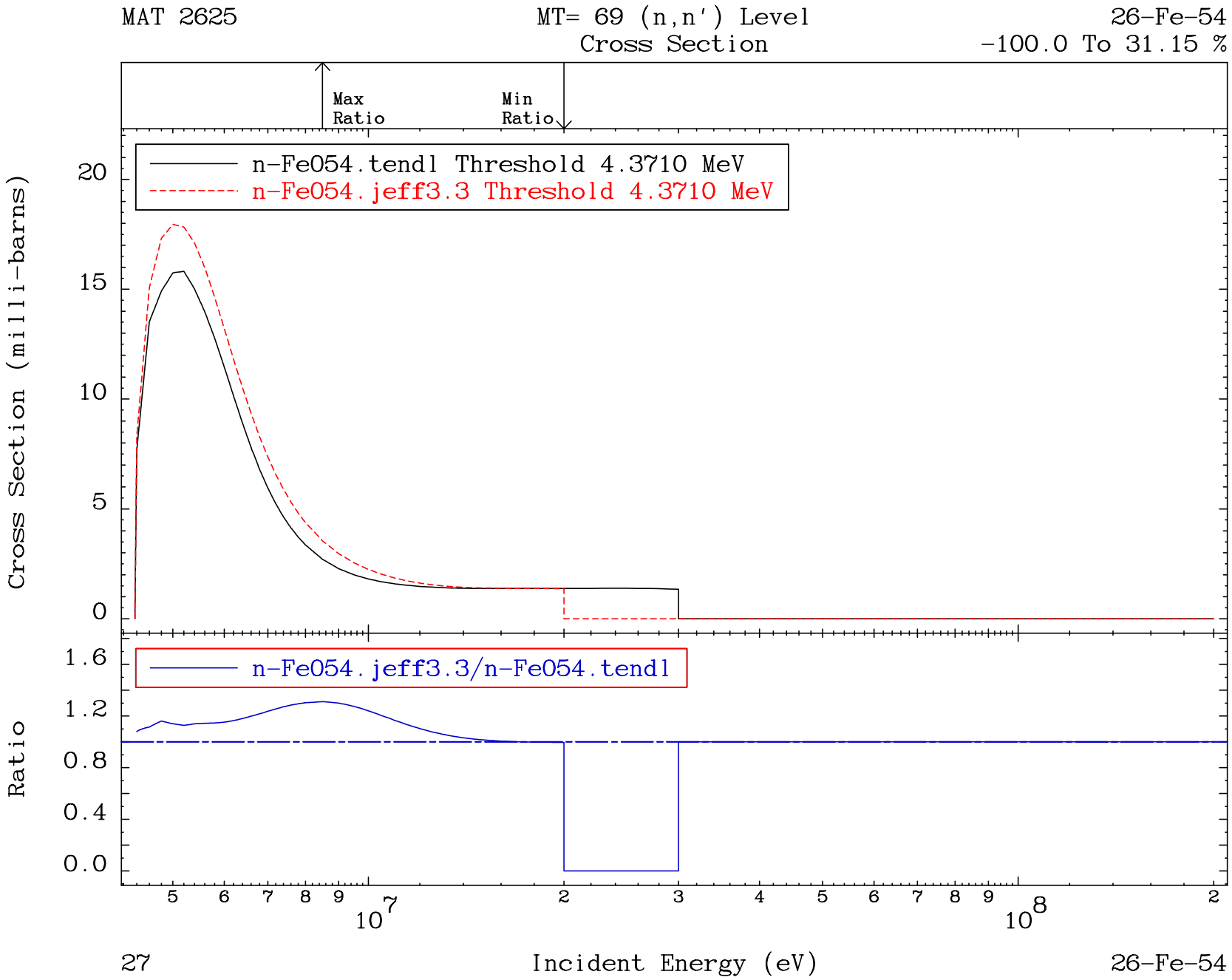

MAT 2625
MT= 64 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 94.61 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 4.1235 MeV
n-Fe054.jeff3.3 Threshold 4.1235 MeV
Cross Section (milli-barns)
35
30
25
20
15
10
5
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
2.0
1.0
0.0
4 5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
22
Incident Energy (eV)
26-Fe-54

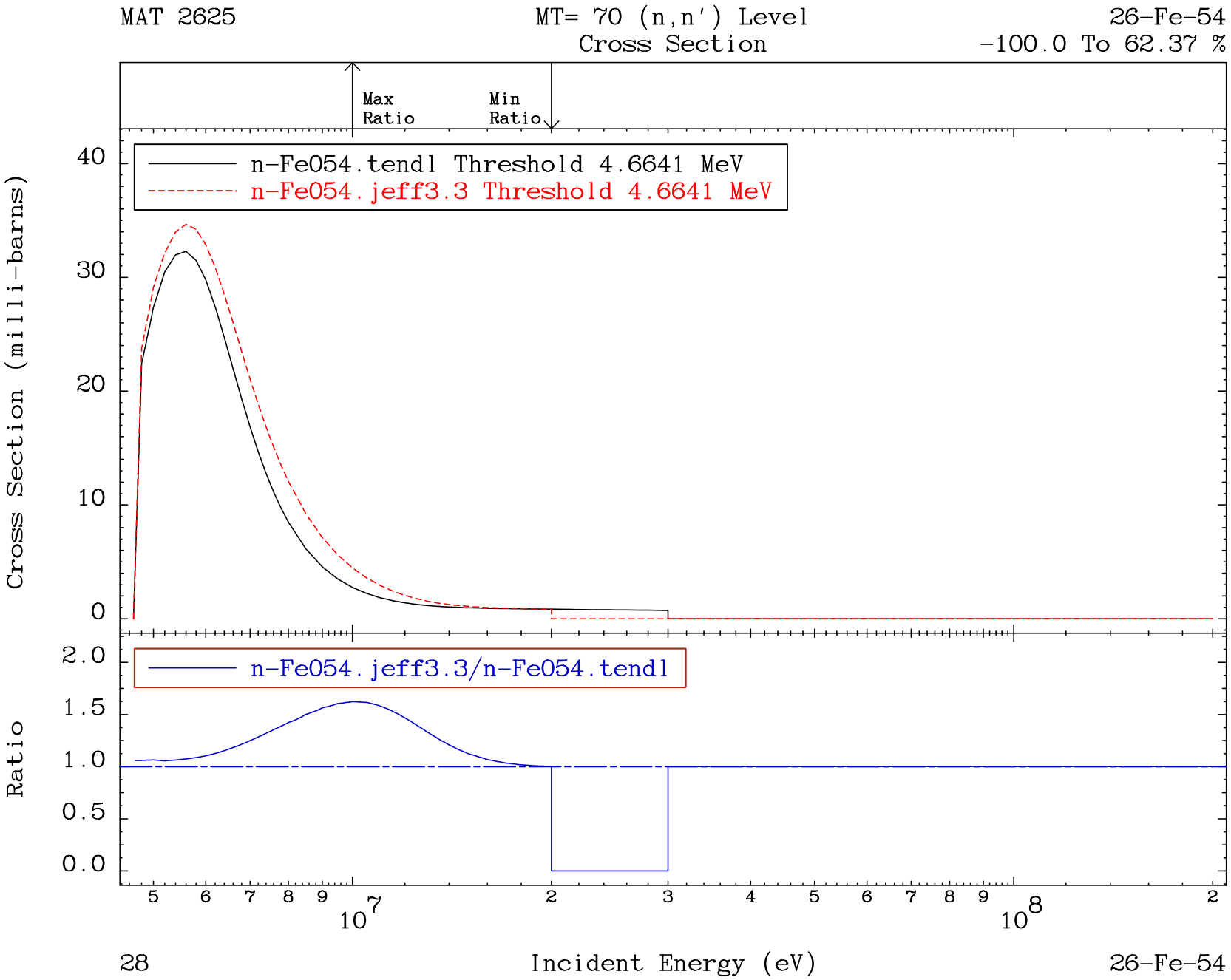

MAT 2625
MT= 65 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 0.000 %
Min Ratio
Max Ratio
n-Fe054.tendl Threshold 4.1477 MeV
n-Fe054.jeff3.3 Threshold 4.1477 MeV
Cross Section (milli-barns)
60
40
20
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
1.2
0.8
0.4
0.0
4 5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
23
Incident Energy (eV)
26-Fe-54

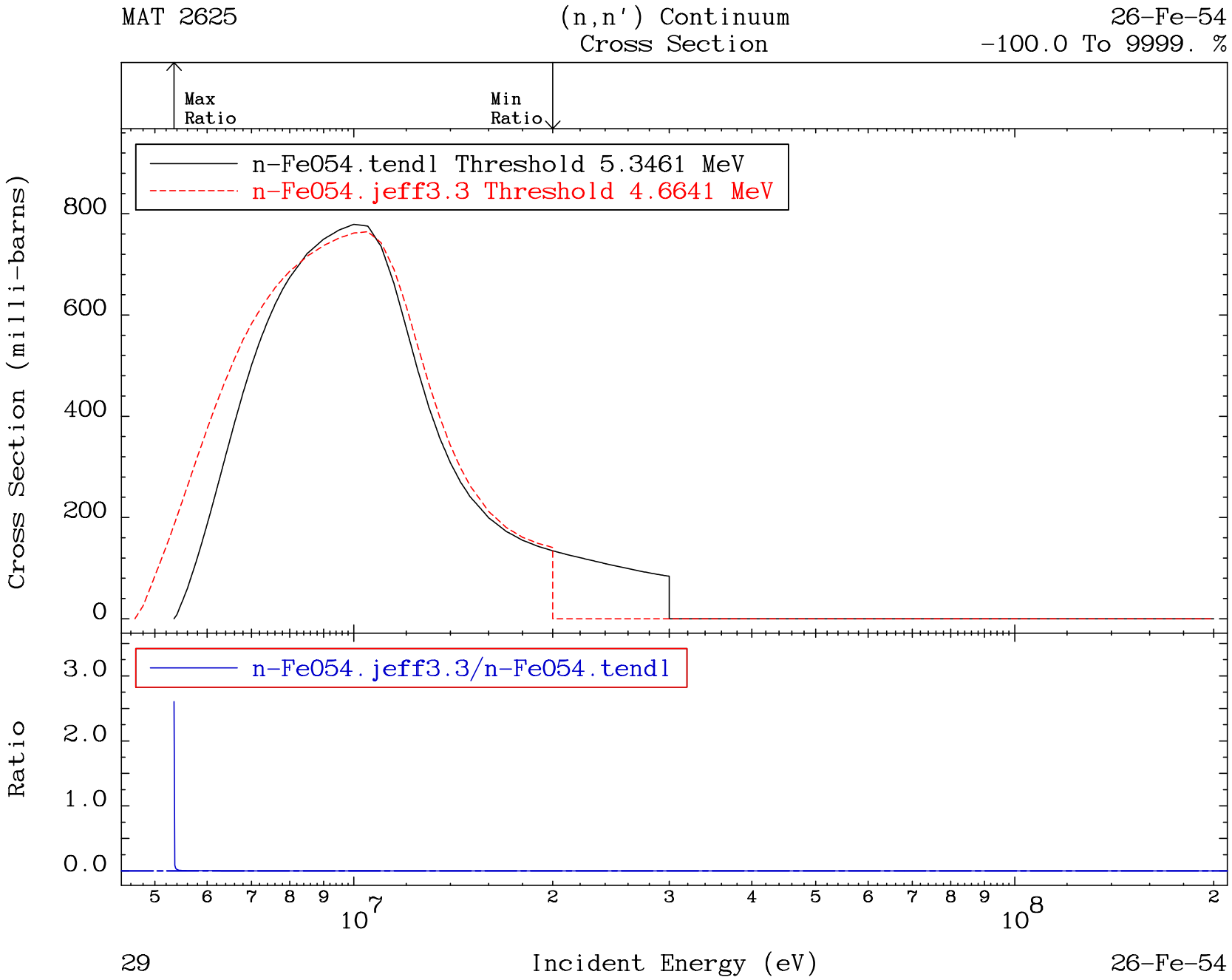

MAT 2625
MT= 66 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 116.8 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 4.1764 MeV
n-Fe054.jeff3.3 Threshold 4.1764 MeV
Cross Section (milli-barns)
30
25
20
15
10
5
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
2.0
1.0
0.0
4 5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
24
Incident Energy (eV)
26-Fe-54

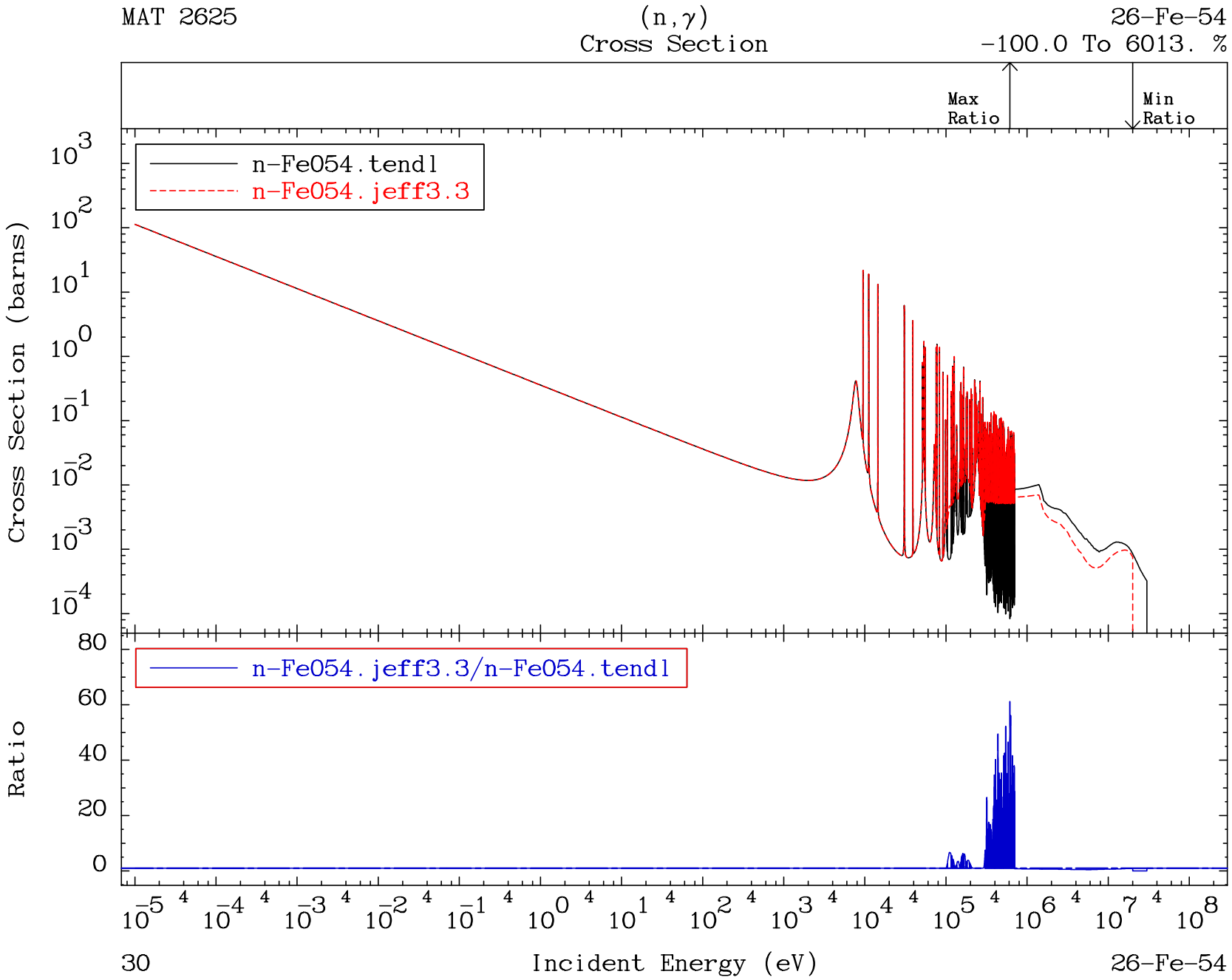

MAT 2625
MT= 67 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 5048. %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 4.1801 MeV
n-Fe054.jeff3.3 Threshold 4.1801 MeV
Cross Section (milli-barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
25
26-Fe-54

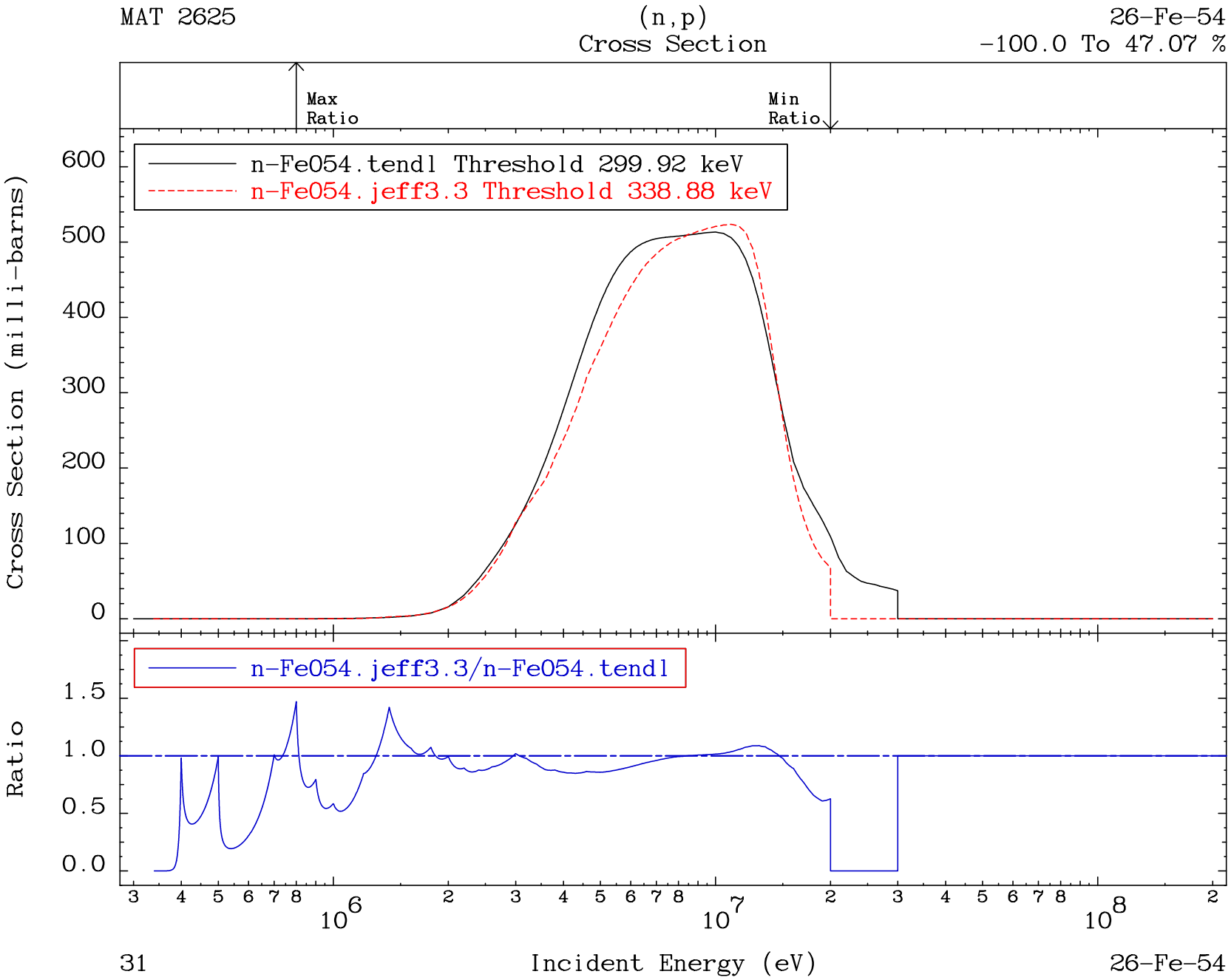

MAT 2625
MT= 68 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 55.13 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 4.3476 MeV
n-Fe054.jeff3.3 Threshold 4.3476 MeV
Cross Section (milli-barns)
30
25
20
15
10
5
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
2.0
1.5
1.0
0.5
0.0
5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
26
Incident Energy (eV)
26-Fe-54

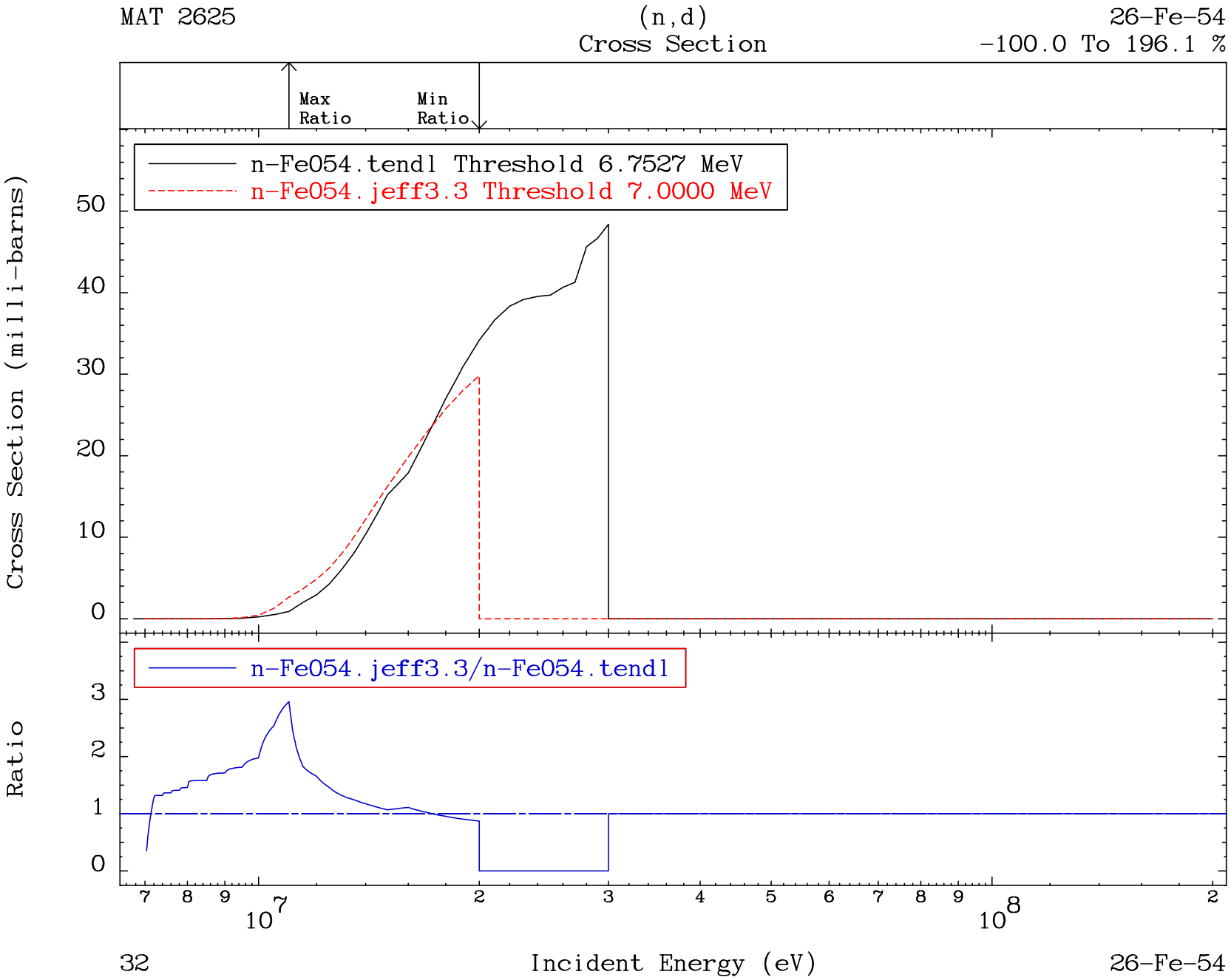

MAT 2625
MT= 69 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 31.15 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 4.3710 MeV
n-Fe054.jeff3.3 Threshold 4.3710 MeV
Cross Section (milli-barns)
20
15
10
5
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
1.6
1.2
0.8
0.4
0.0
5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
27
Incident Energy (eV)
26-Fe-54

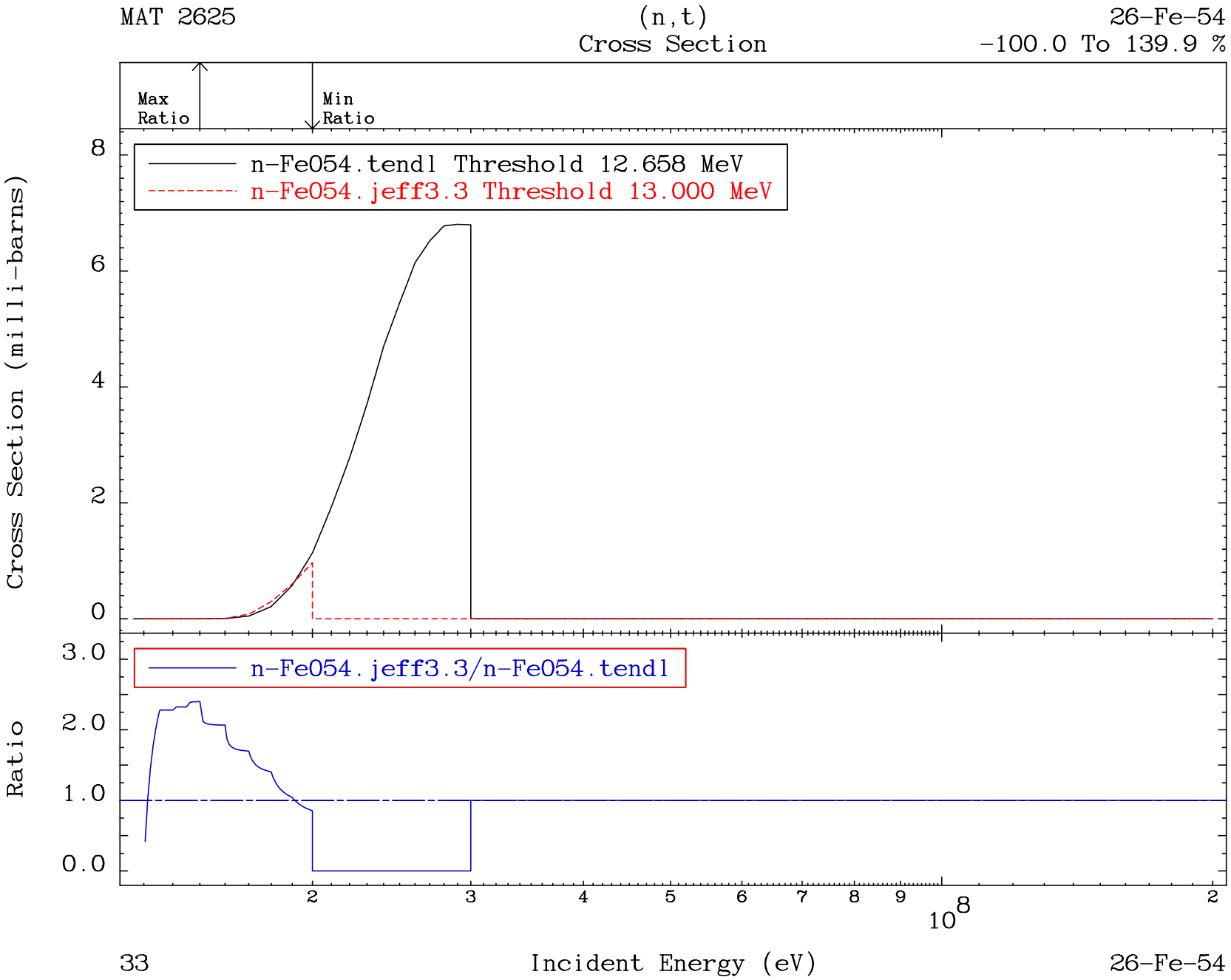

MAT 2625
MT= 70 (n,n') Level
Cross Section
26-Fe-54
-100.0 To 62.37 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 4.6641 MeV
n-Fe054.jeff3.3 Threshold 4.6641 MeV
Cross Section (milli-barns)
40
30
20
10
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
2.0
1.5
1.0
0.5
0.0
5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
28
Incident Energy (eV)
26-Fe-54

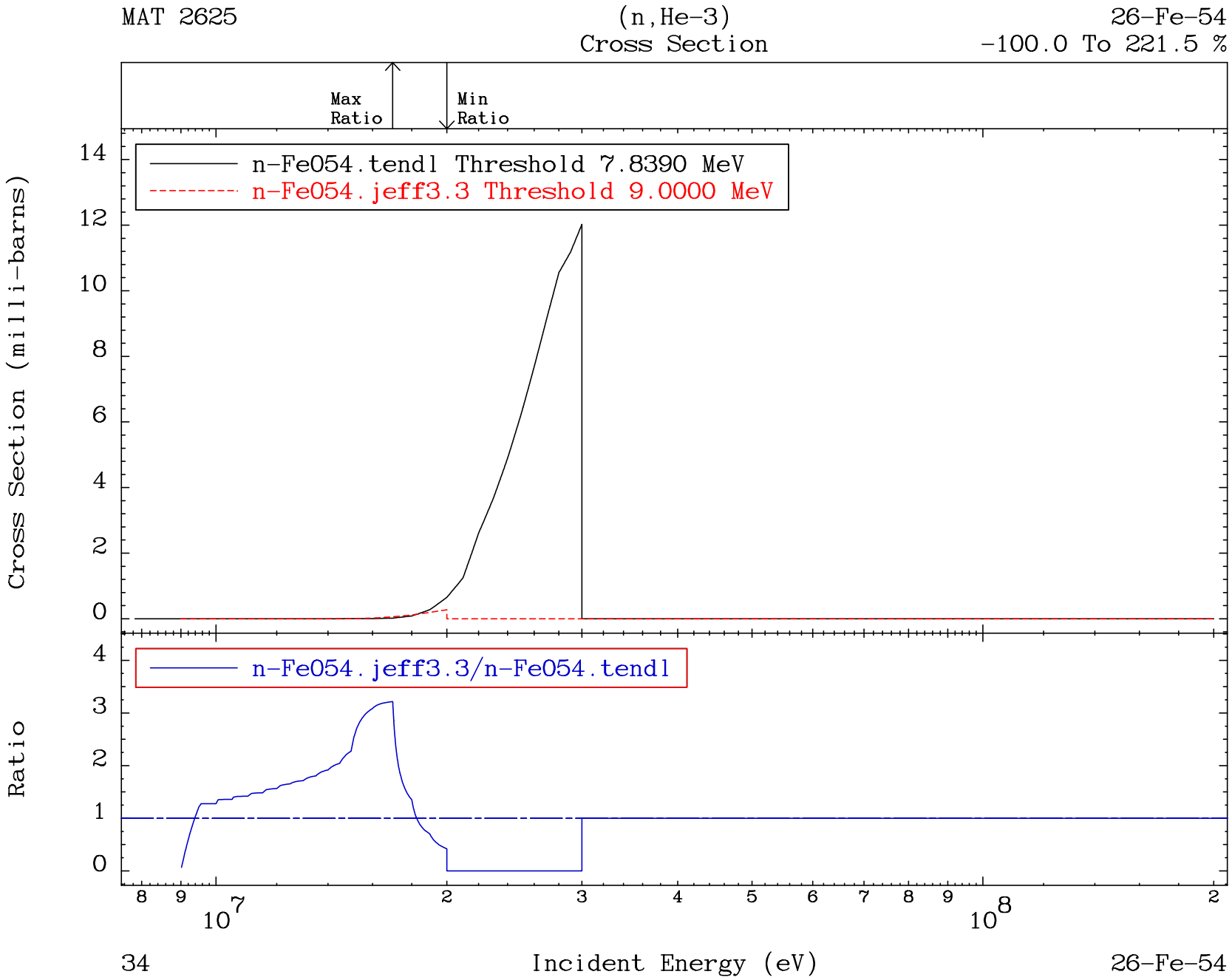

MAT 2625
(n,n') Continuum
Cross Section
26-Fe-54
-100.0 To 9999. %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 5.3461 MeV
n-Fe054.jeff3.3 Threshold 4.6641 MeV
Cross Section (milli-barns)
800
600
400
200
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
3.0
2.0
1.0
0.0
5 6 7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
29
Incident Energy (eV)
26-Fe-54

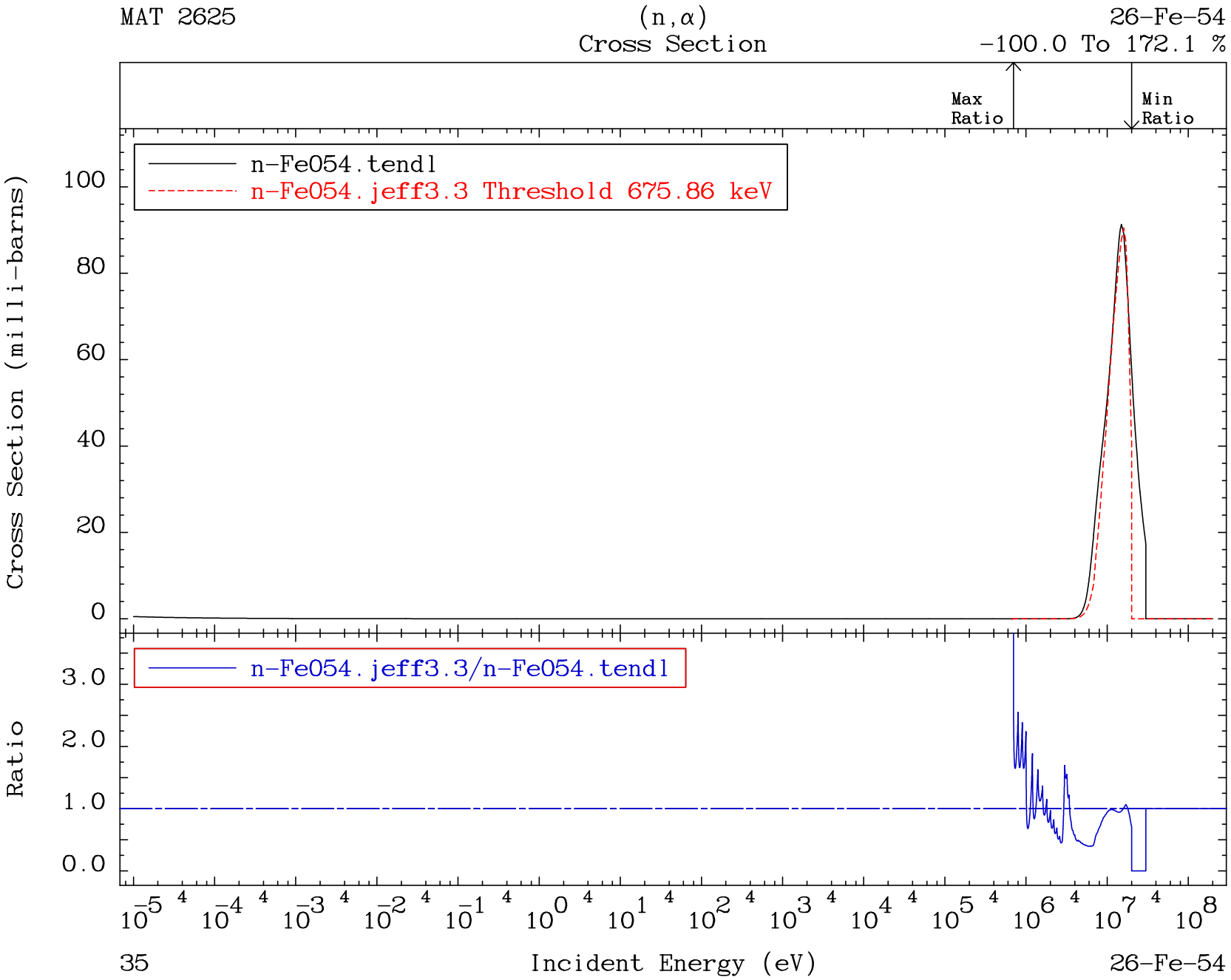

MAT 2625
(n,γ)
Cross Section
26-Fe-54
-100.0 To 6013. %
Max Ratio
Min Ratio
n-Fe054.tendl
n-Fe054.jeff3.3
Cross Section (barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
30
26-Fe-54

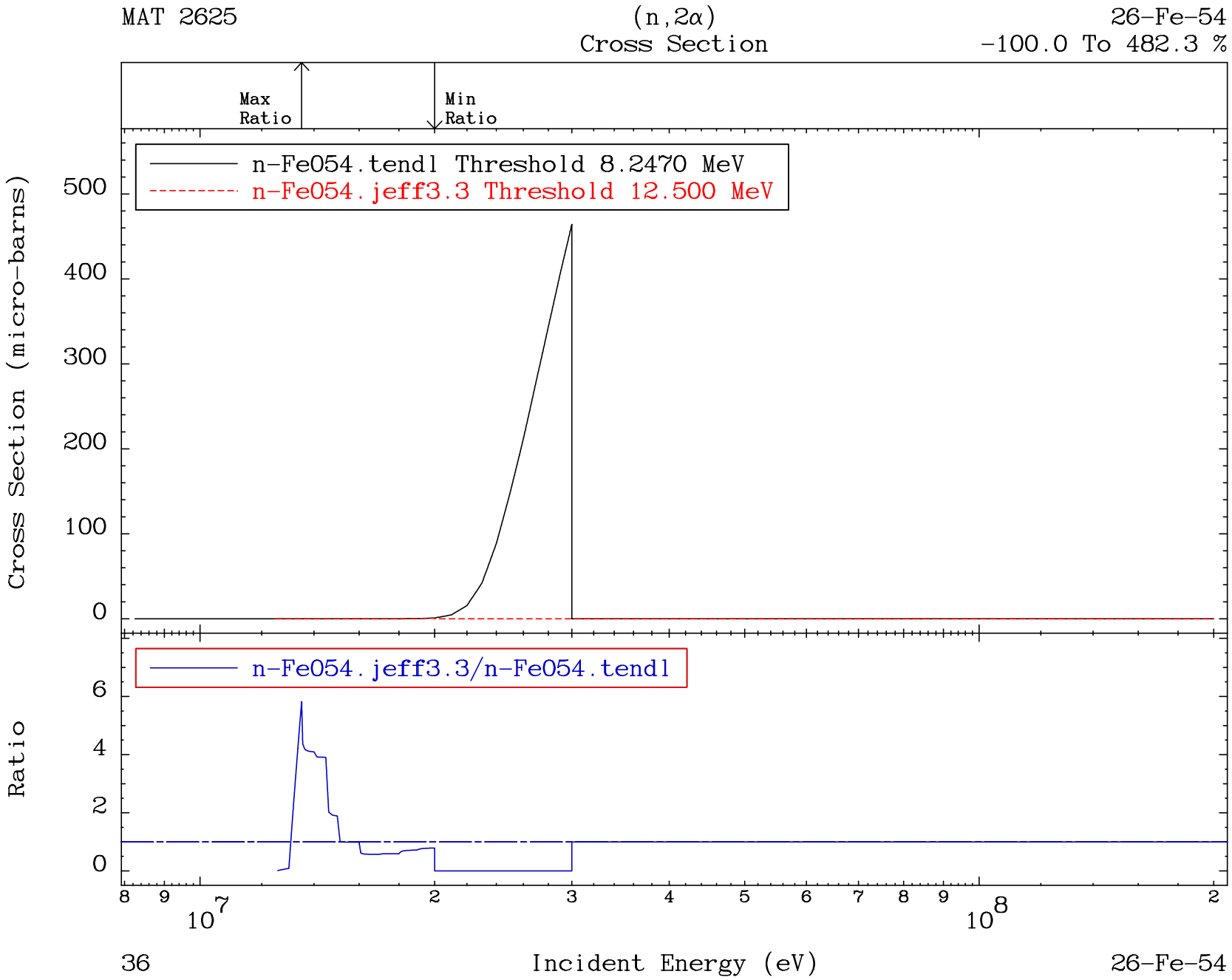

MAT 2625
(n,p)
Cross Section
26-Fe-54
-100.0 To 47.07 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 299.92 keV
n-Fe054.jeff3.3 Threshold 338.88 keV
Cross Section (milli-barns)
600
500
400
300
200
100
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
1.5
1.0
0.5
0.0
3 4 5 6 7 8 10^6 2 3 4 5 6 7 8 10^7 2 3 4 5 6 7 8 10^8 2
31
Incident Energy (eV)
26-Fe-54

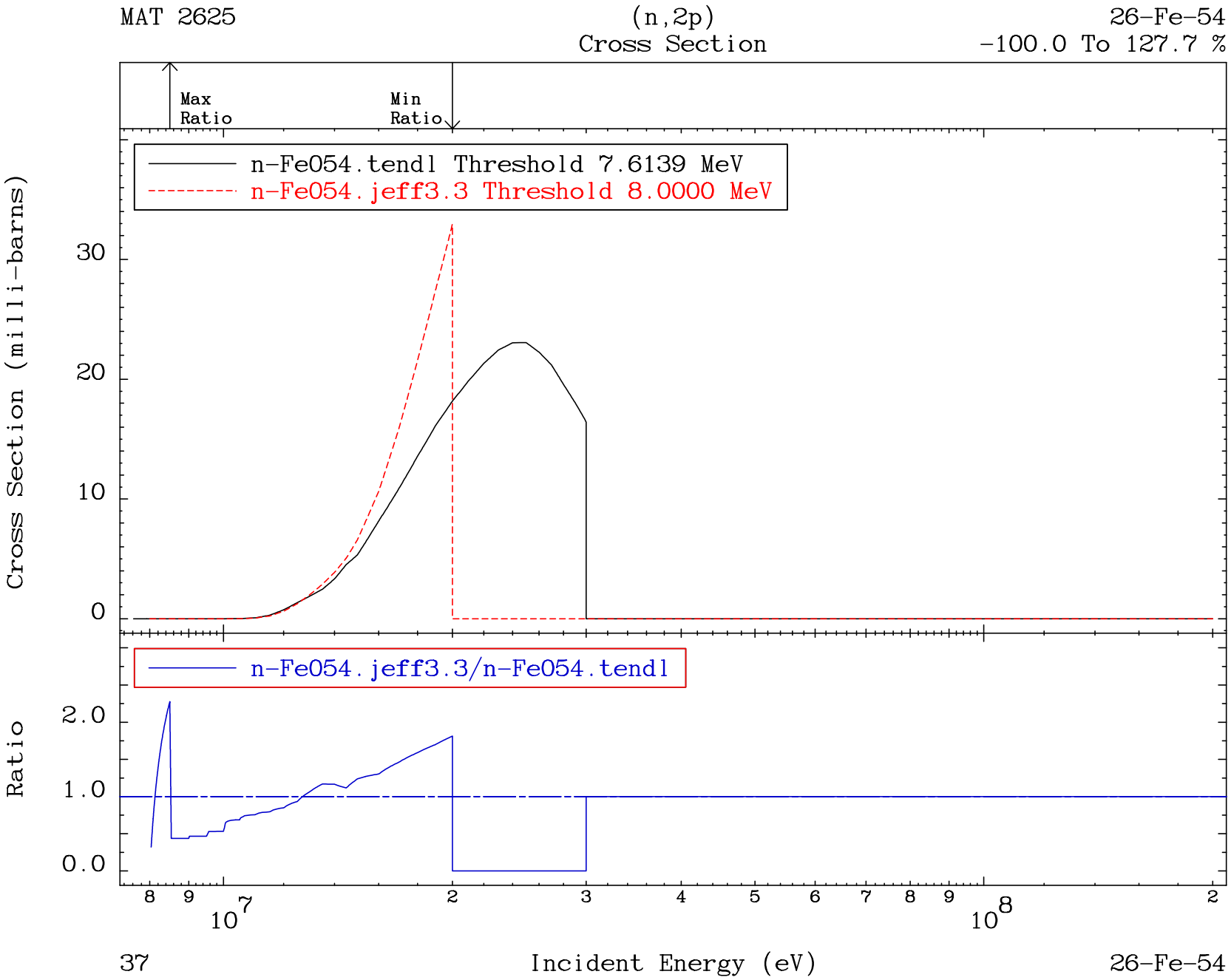

MAT 2625
(n,d)
Cross Section
26-Fe-54
-100.0 To 196.1 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 6.7527 MeV
n-Fe054.jeff3.3 Threshold 7.0000 MeV
Cross Section (milli-barns)
50
40
30
20
10
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
3
2
1
0
7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
32
Incident Energy (eV)
26-Fe-54

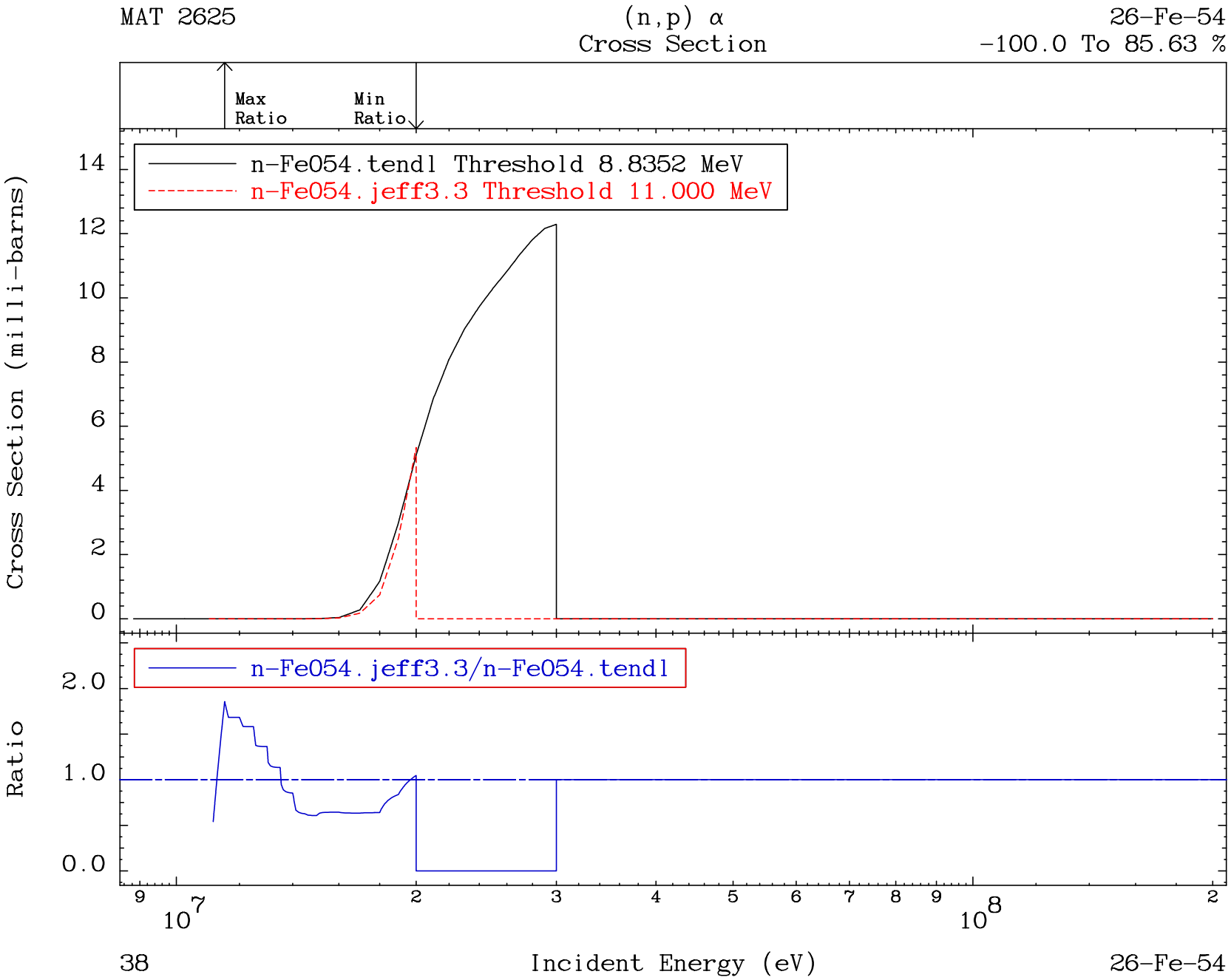

MAT 2625
(n,t)
Cross Section
26-Fe-54
-100.0 To 139.9 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 12.658 MeV
n-Fe054.jeff3.3 Threshold 13.000 MeV
Cross Section (milli-barns)
0
2
4
6
8
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
0.0
1.0
2.0
3.0
2
3
4
5
6
7
8
9
10^8
2
33
Incident Energy (eV)
26-Fe-54

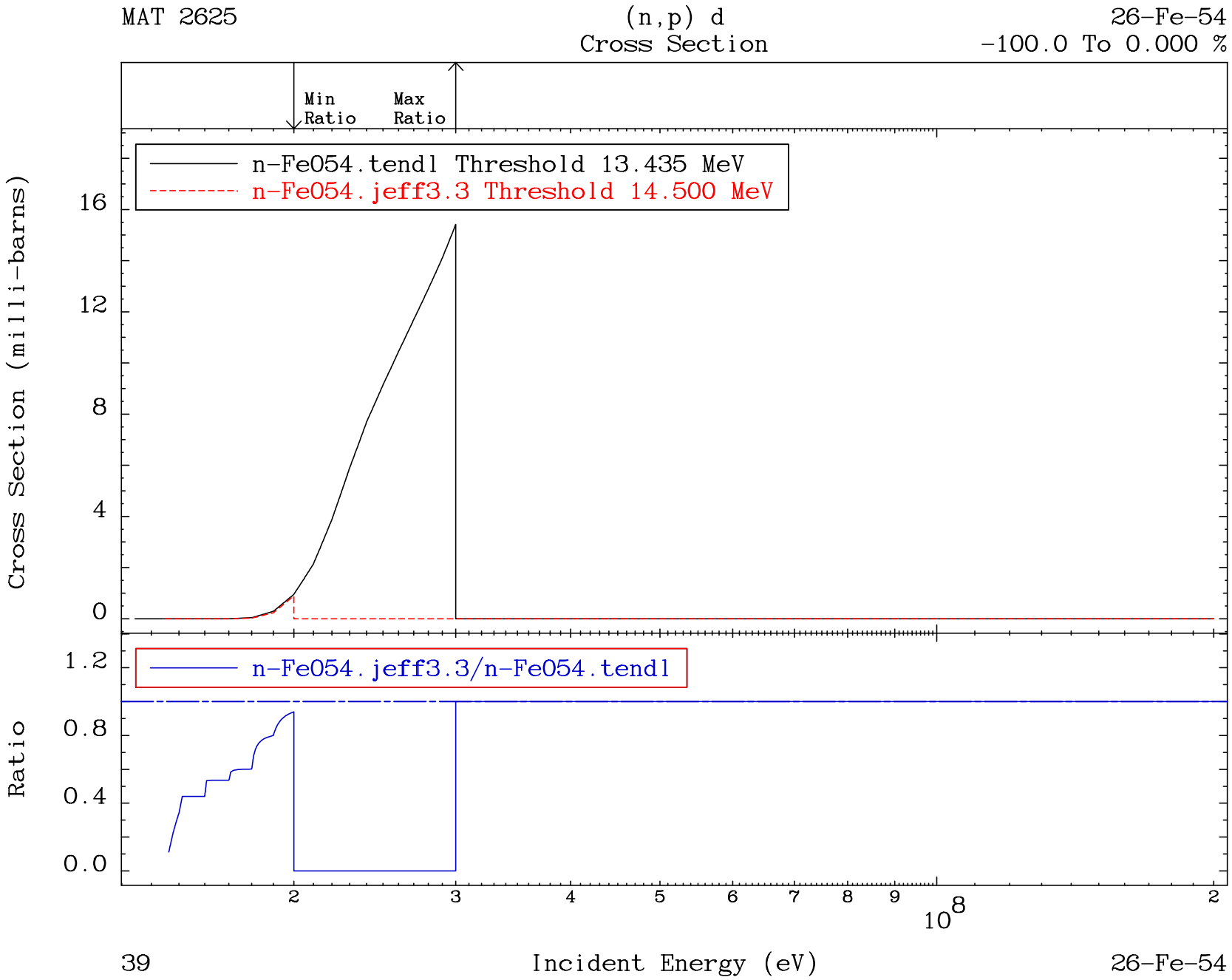

MAT 2625
(n,He-3)
Cross Section
26-Fe-54
-100.0 To 221.5 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 7.8390 MeV
n-Fe054.jeff3.3 Threshold 9.0000 MeV
Cross Section (milli-barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
34
26-Fe-54

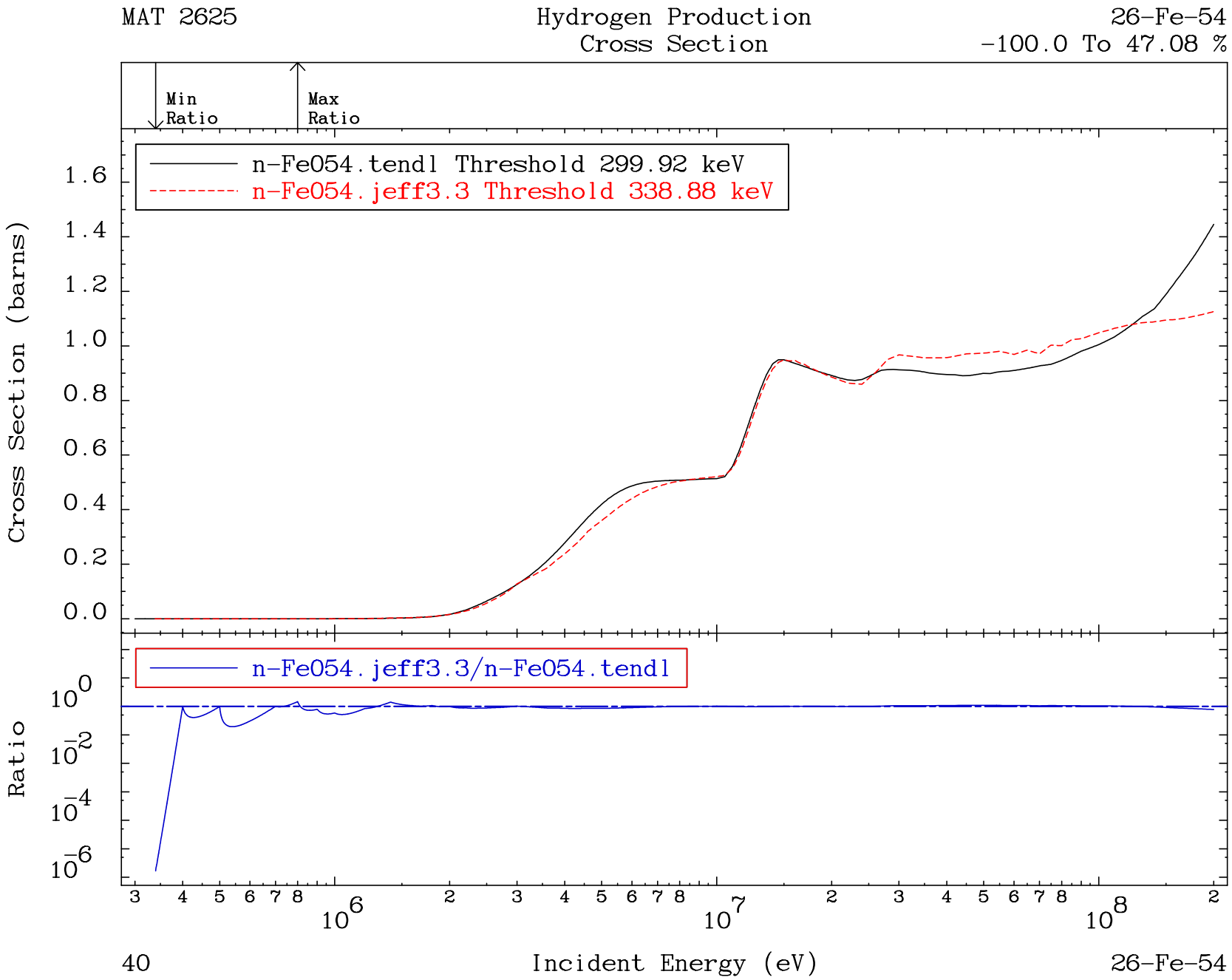

MAT 2625
(n,α)
Cross Section
26-Fe-54
-100.0 To 172.1 %
Max Ratio
Min Ratio
n-Fe054.tendl
n-Fe054.jeff3.3 Threshold 675.86 keV
Cross Section (milli-barns)
100
80
60
40
20
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
3.0
2.0
1.0
0.0
10^-5 10^-4 10^-3 10^-2 10^-1 10^0 10^1 10^2 10^3 10^4 10^5 10^6 10^7 10^8
35
Incident Energy (eV)
26-Fe-54

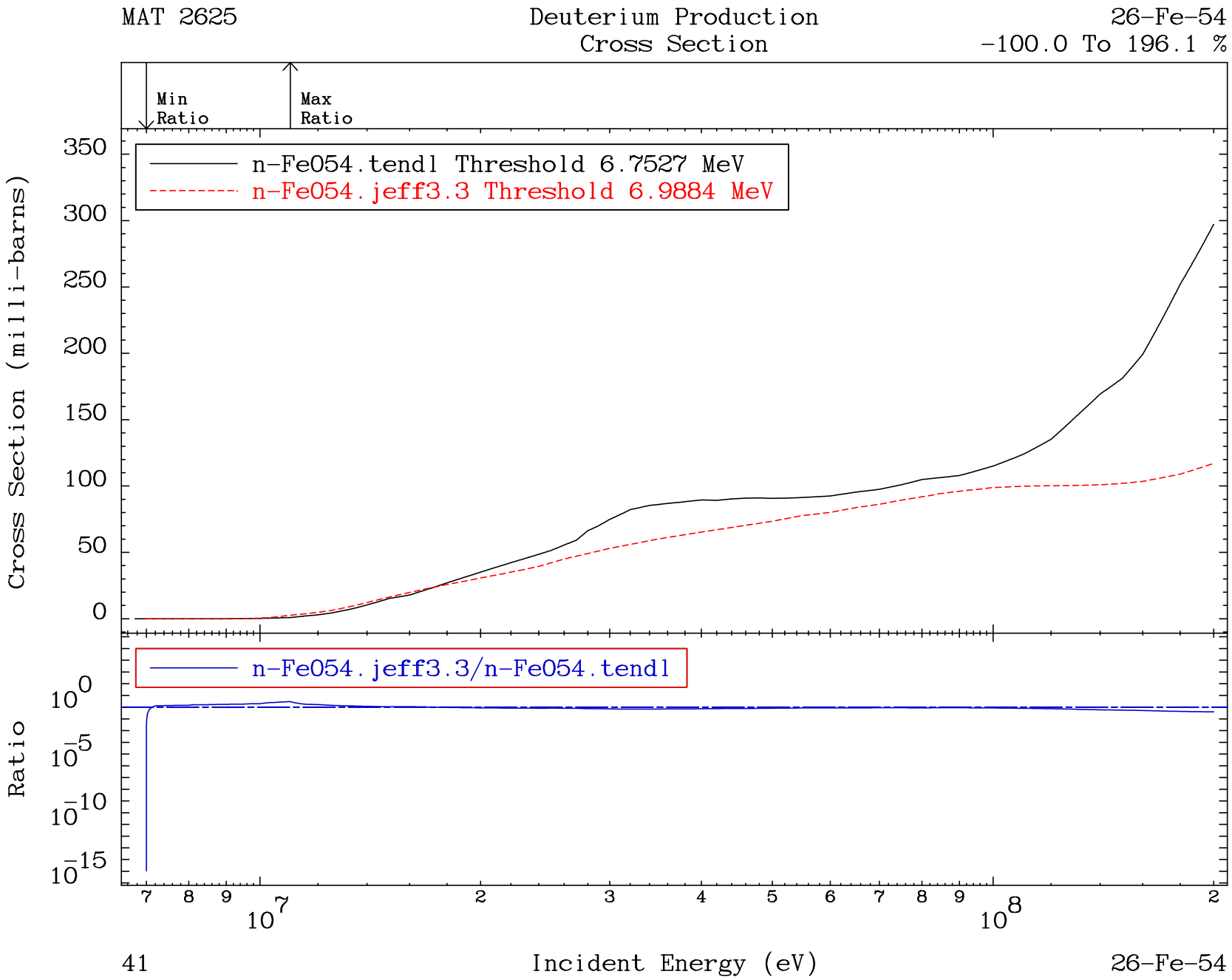

MAT 2625
(n,2α)
Cross Section
26-Fe-54
-100.0 To 482.3 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 8.2470 MeV
n-Fe054.jeff3.3 Threshold 12.500 MeV
Cross Section (micro-barns)
500
400
300
200
100
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
6
4
2
0
8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
36
Incident Energy (eV)
26-Fe-54

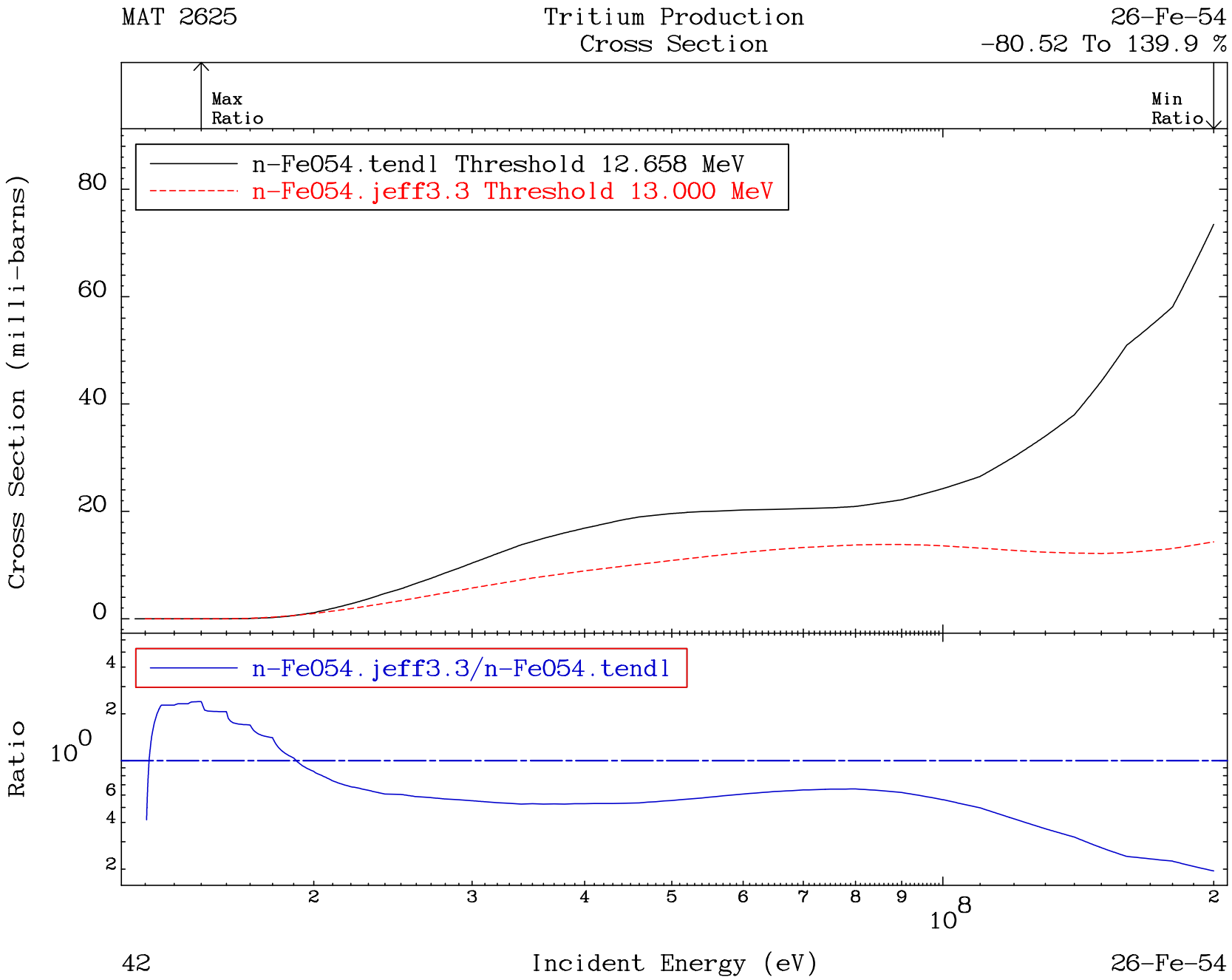

MAT 2625
(n,2p)
Cross Section
26-Fe-54
-100.0 To 127.7 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 7.6139 MeV
n-Fe054.jeff3.3 Threshold 8.0000 MeV
Cross Section (milli-barns)
30
20
10
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
2.0
1.0
0.0
8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
37
Incident Energy (eV)
26-Fe-54

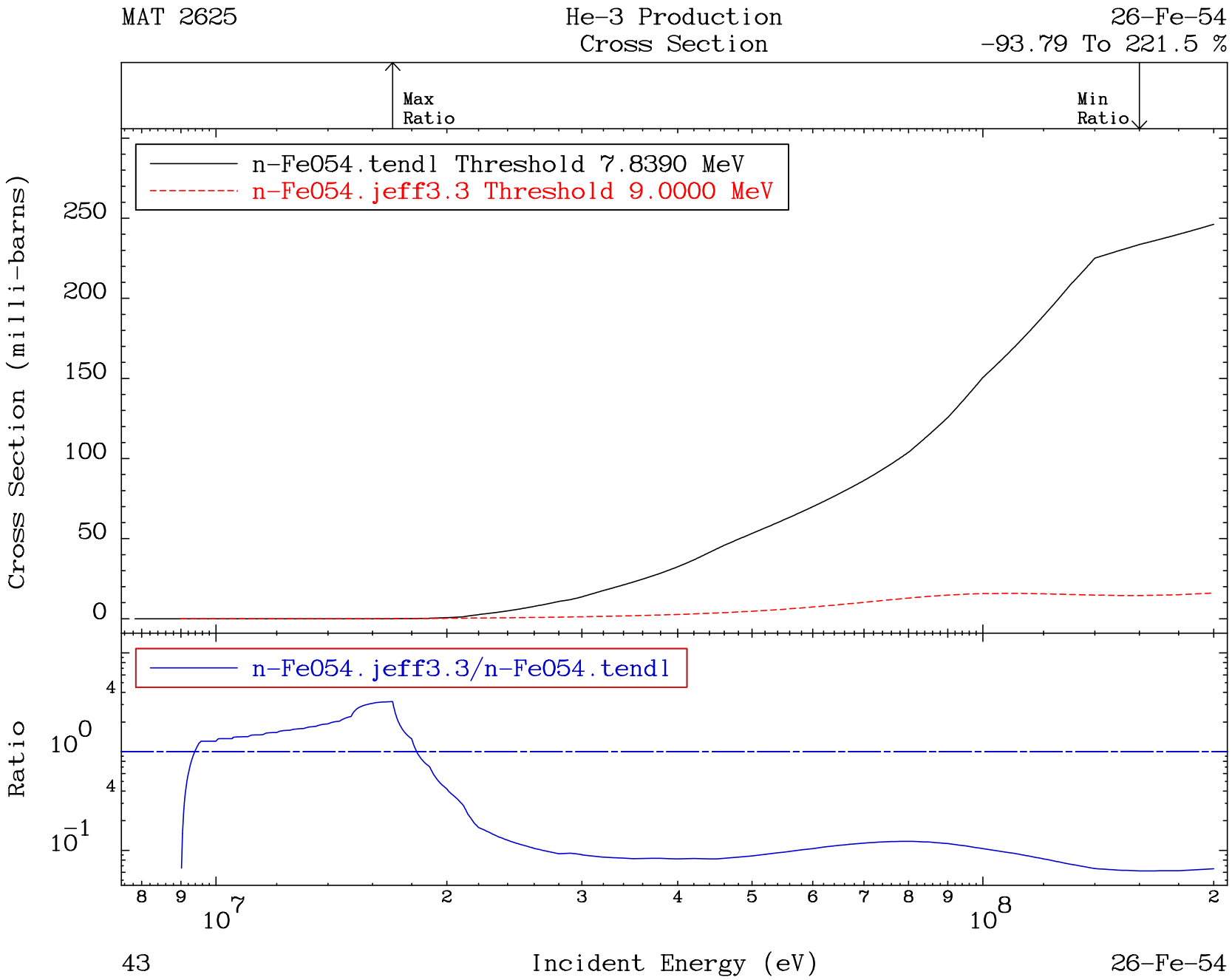

MAT 2625
(n,p) α
Cross Section
26-Fe-54
-100.0 To 85.63 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 8.8352 MeV
n-Fe054.jeff3.3 Threshold 11.000 MeV
Cross Section (milli-barns)
0
2
4
6
8
10
12
14
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
0.0
1.0
2.0
9
10^7
2
3
4
5
6
7
8
9
10^8
2
38
Incident Energy (eV)
26-Fe-54

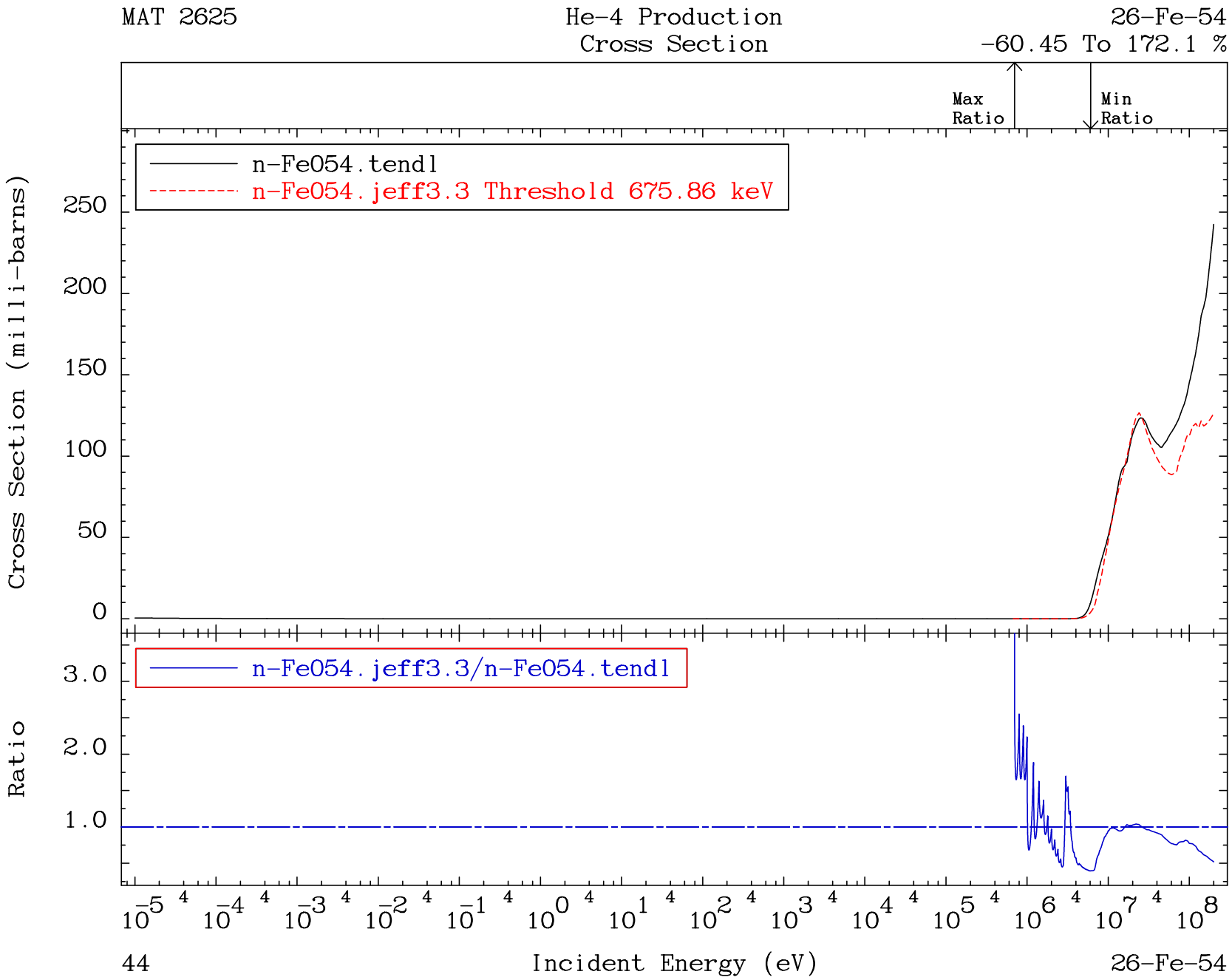

MAT 2625
(n,p) d
Cross Section
26-Fe-54
-100.0 To 0.000 %
Min Ratio
Max Ratio
n-Fe054.tendl Threshold 13.435 MeV
n-Fe054.jeff3.3 Threshold 14.500 MeV
Cross Section (milli-barns)
16
12
8
4
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
1.2
0.8
0.4
0.0
2
3
4
5
6
7
8
9
10^8
2
39
Incident Energy (eV)
26-Fe-54

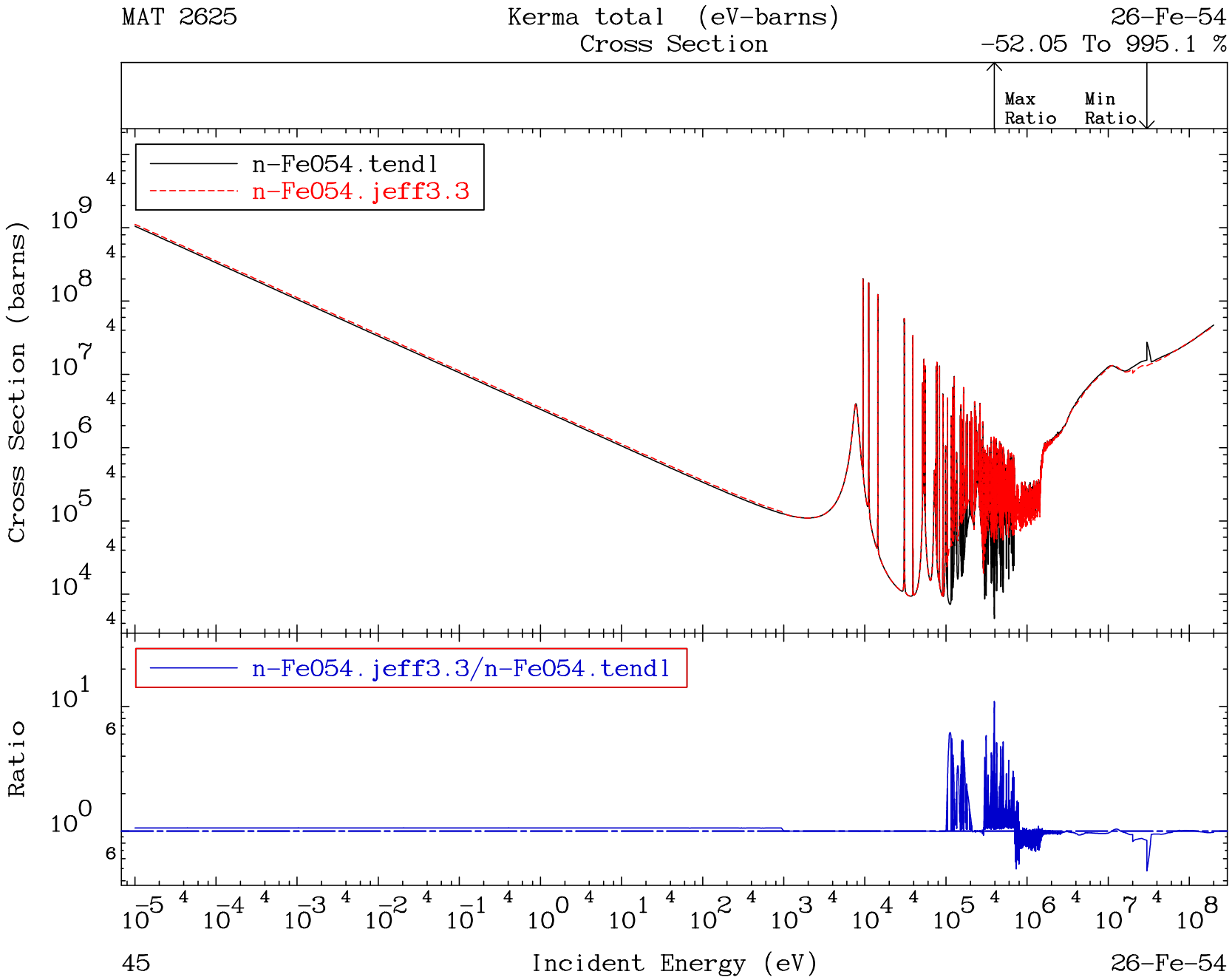

MAT 2625
Hydrogen Production
Cross Section
26-Fe-54
-100.0 To 47.08 %
Min Ratio
Max Ratio
n-Fe054.tendl Threshold 299.92 keV
n-Fe054.jeff3.3 Threshold 338.88 keV
Cross Section (barns)
1.6
1.4
1.2
1.0
0.8
0.6
0.4
0.2
0.0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
10^0
10^-2
10^-4
10^-6
3 4 5 6 7 8 10^6 2 3 4 5 6 7 8 10^7 2 3 4 5 6 7 8 10^8 2
40
Incident Energy (eV)
26-Fe-54

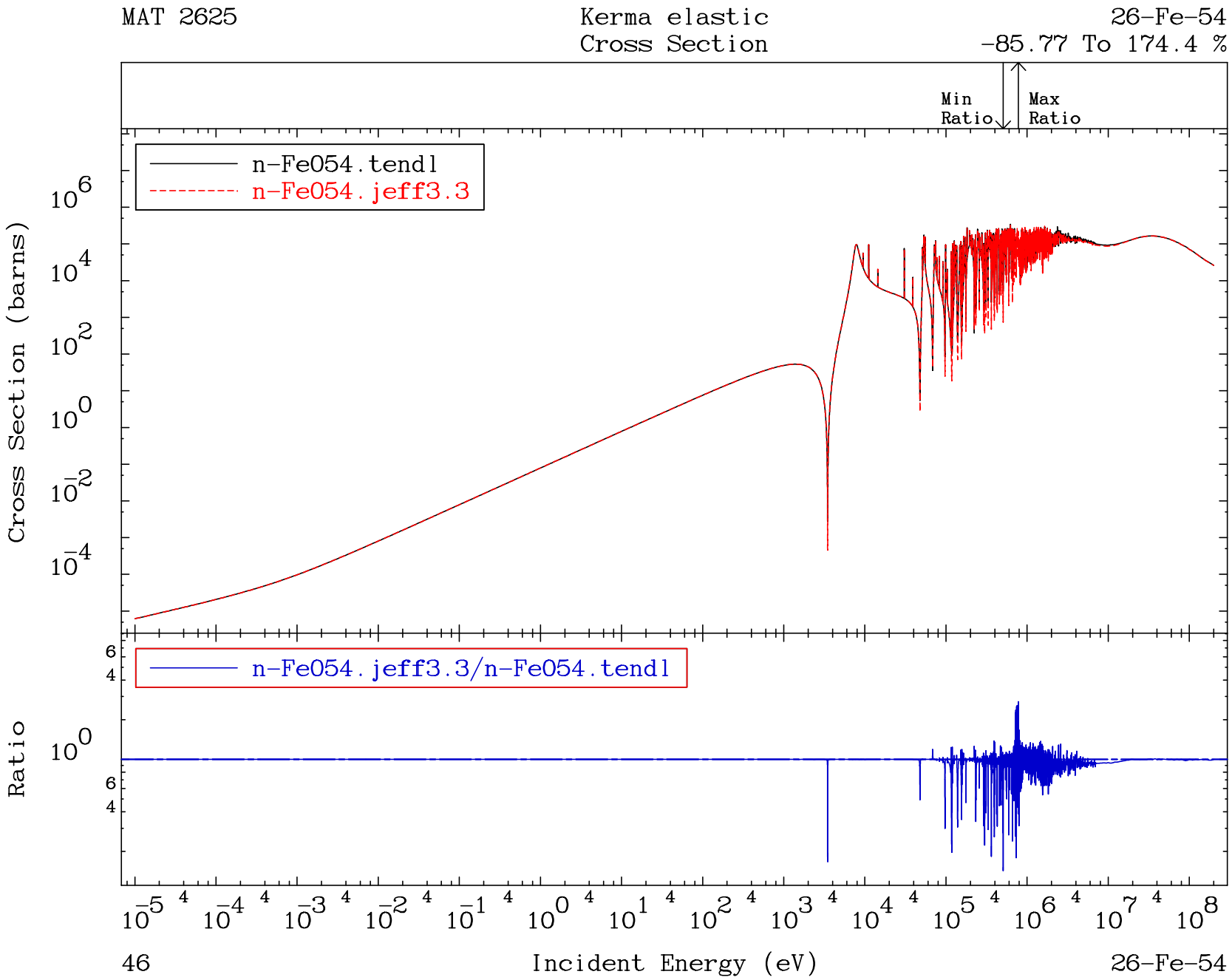

MAT 2625
Deuterium Production
Cross Section
26-Fe-54
-100.0 To 196.1 %
Min Ratio
Max Ratio
n-Fe054.tendl Threshold 6.7527 MeV
n-Fe054.jeff3.3 Threshold 6.9884 MeV
Cross Section (milli-barns)
350
300
250
200
150
100
50
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
10^0
10^-5
10^-10
10^-15
7 8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
41
Incident Energy (eV)
26-Fe-54

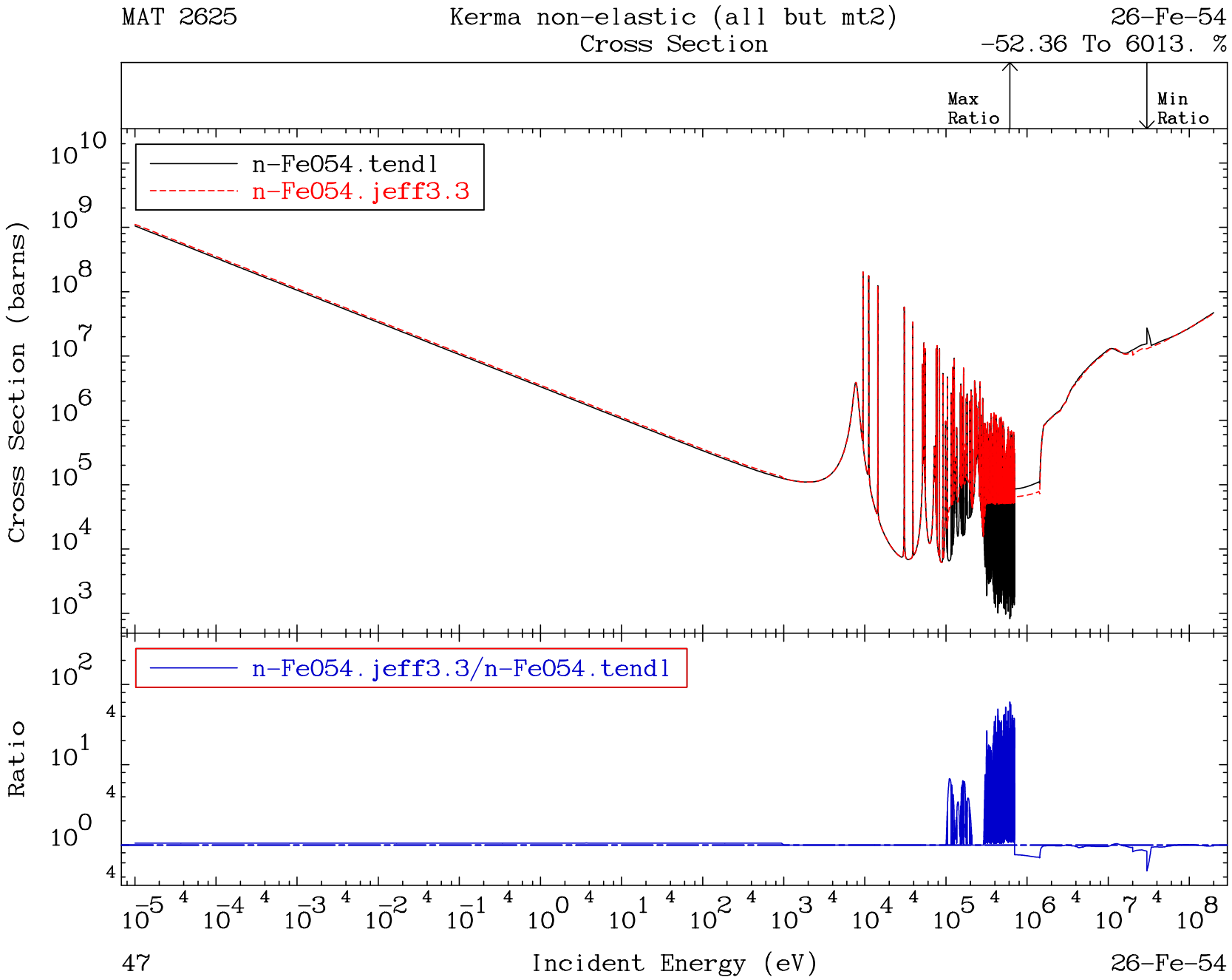

MAT 2625
Tritium Production
Cross Section
26-Fe-54
-80.52 To 139.9 %
Max
Ratio
Min
Ratio
n-Fe054.tendl Threshold 12.658 MeV
n-Fe054.jeff3.3 Threshold 13.000 MeV
Cross Section (milli-barns)
80
60
40
20
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
4
2
10^0
6
4
2
2
3
4
5
6
7
8
9
10^8
2
42
Incident Energy (eV)
26-Fe-54

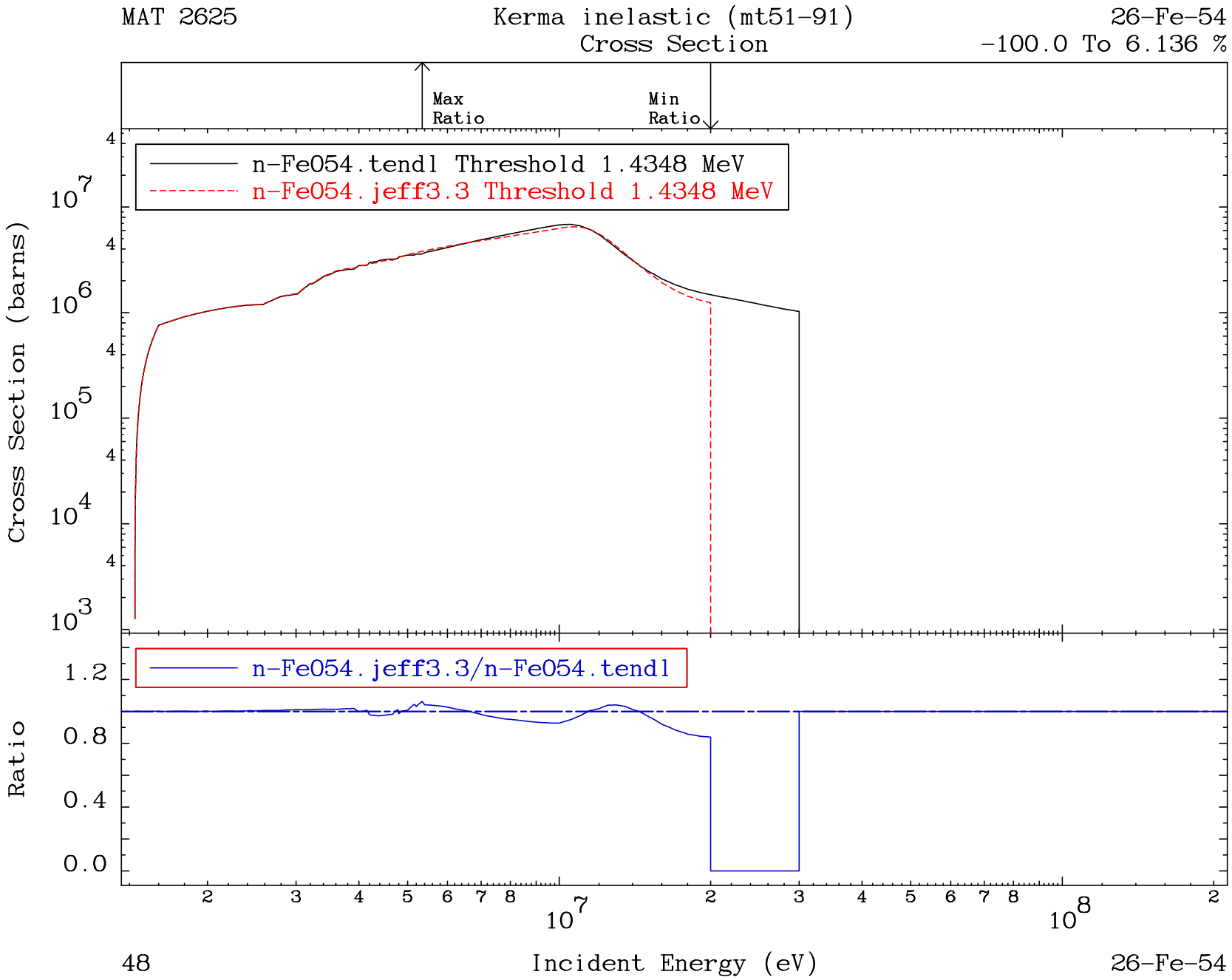

MAT 2625
He-3 Production
Cross Section
26-Fe-54
-93.79 To 221.5 %
Max
Ratio
Min
Ratio
n-Fe054.tendl Threshold 7.8390 MeV
n-Fe054.jeff3.3 Threshold 9.0000 MeV
Cross Section (milli-barns)
250
200
150
100
50
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
4
10^0
4
10^{-1}
8 9 10^7 2 3 4 5 6 7 8 9 10^8 2
43
Incident Energy (eV)
26-Fe-54

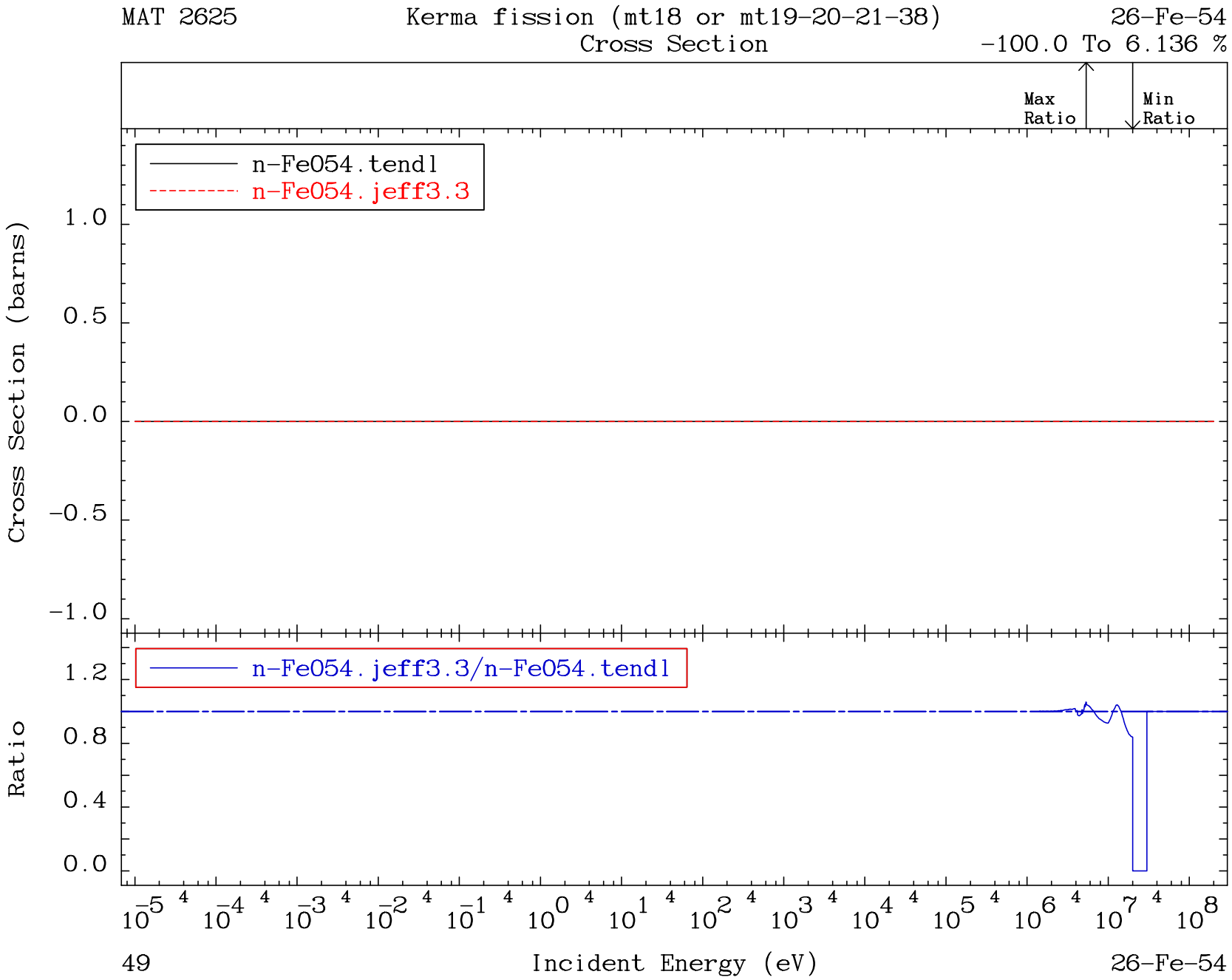

MAT 2625
He-4 Production
Cross Section
26-Fe-54
-60.45 To 172.1 %
Max Ratio
Min Ratio
n-Fe054.tendl
n-Fe054.jeff3.3 Threshold 675.86 keV
Cross Section (milli-barns)
250
200
150
100
50
0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
3.0
2.0
1.0
10^-5 10^-4 10^-3 10^-2 10^-1 10^0 10^1 10^2 10^3 10^4 10^5 10^6 10^7 10^8
44
Incident Energy (eV)
26-Fe-54

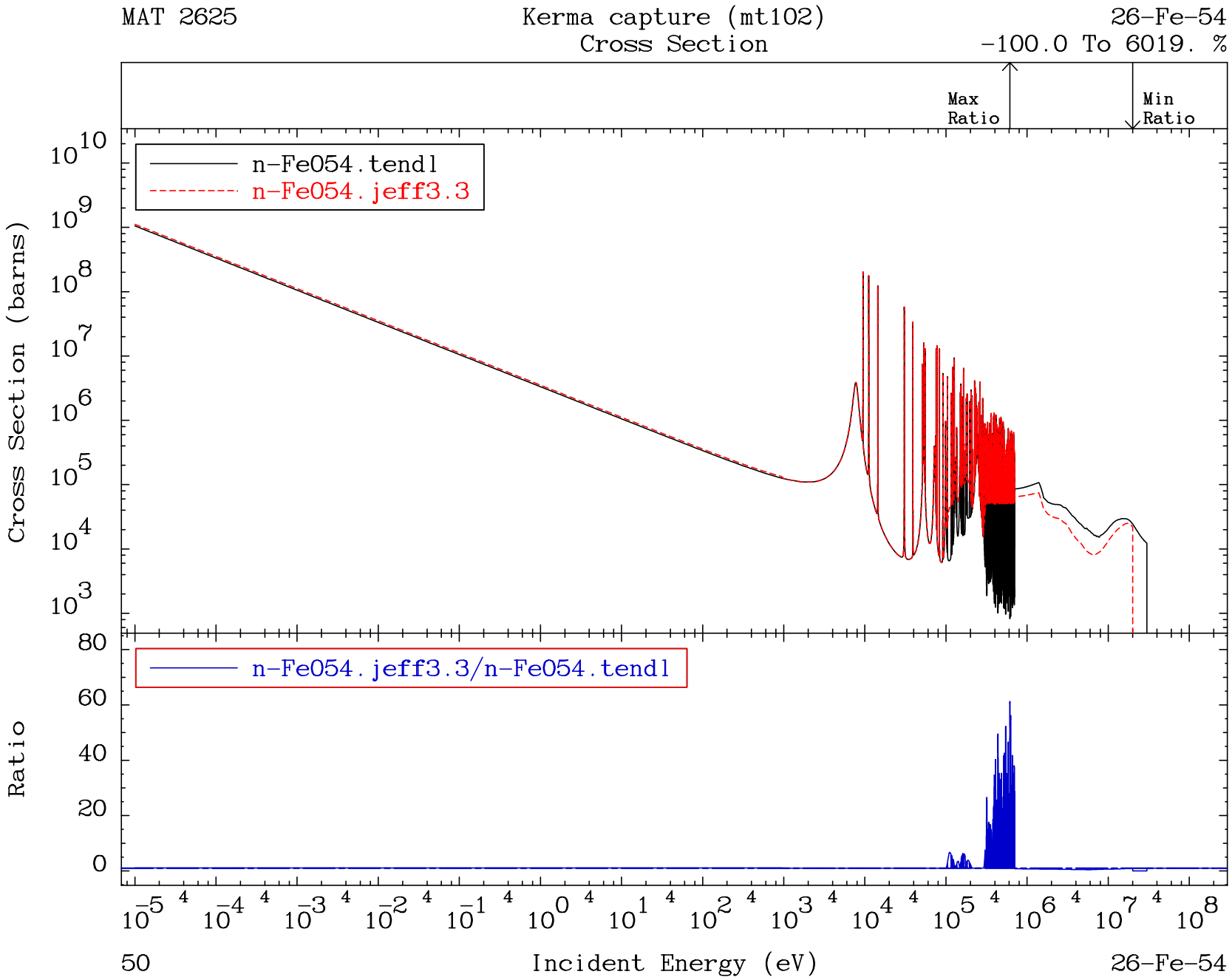

MAT 2625
Kerma total (eV-barns)
Cross Section
26-Fe-54
-52.05 To 995.1 %
Max Ratio
Min Ratio
n-Fe054.tendl
n-Fe054.jeff3.3
Cross Section (barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
45
26-Fe-54

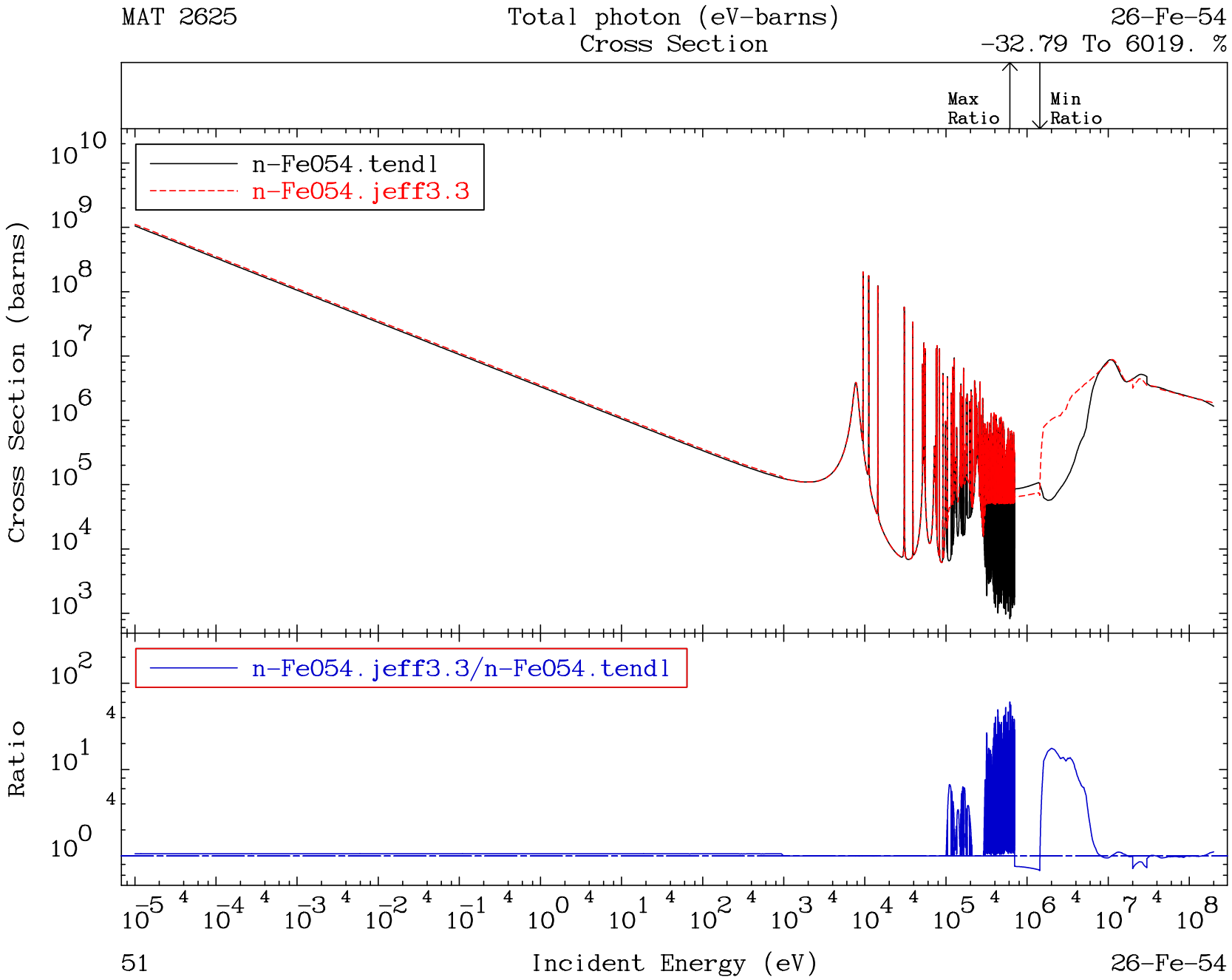

MAT 2625
Kerma elastic
Cross Section
26-Fe-54
-85.77 To 174.4 %
Min Ratio
Max Ratio
n-Fe054.tendl
n-Fe054.jeff3.3
Cross Section (barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
46
26-Fe-54

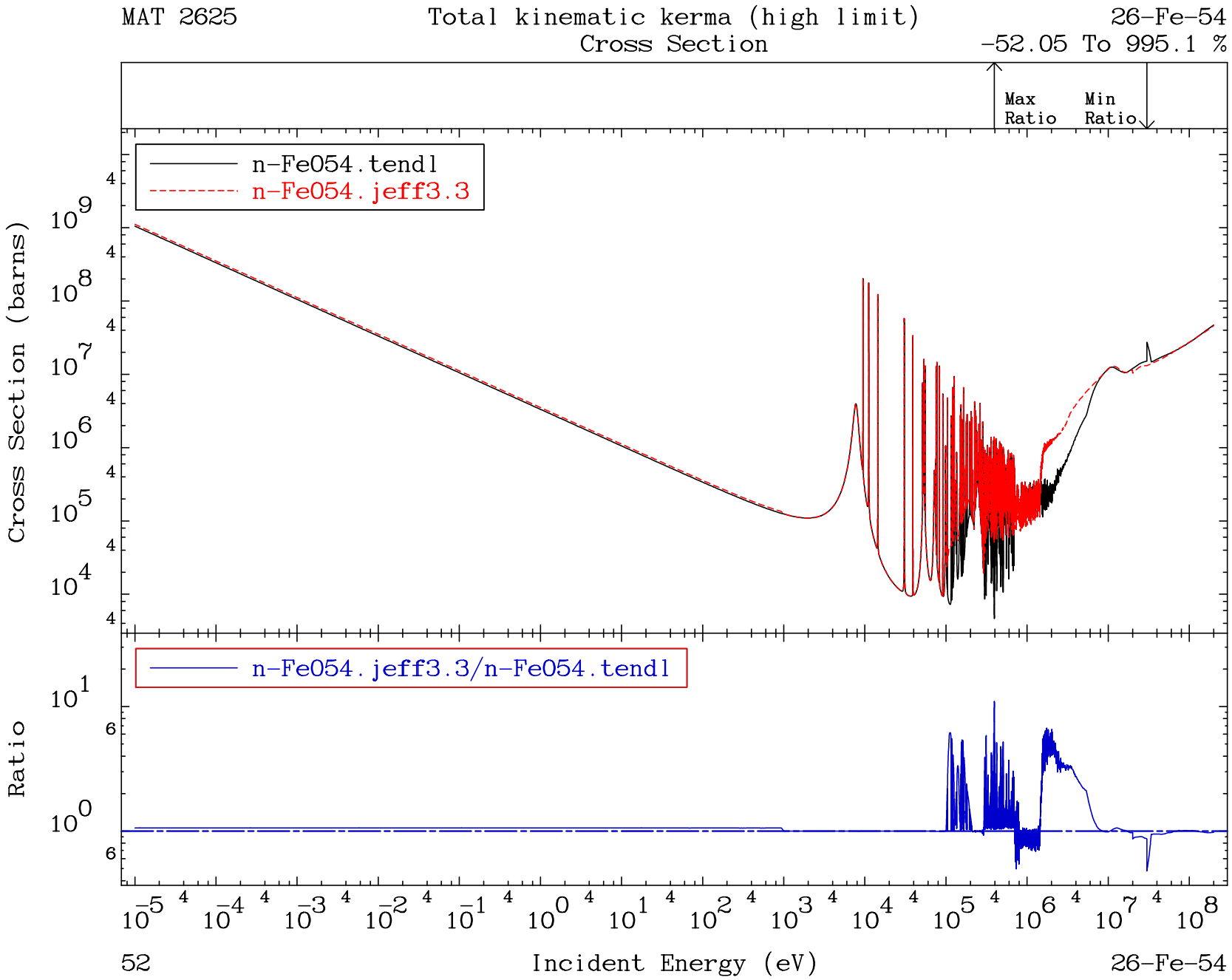

MAT 2625
Kerma non-elastic (all but mt2)
Cross Section
26-Fe-54
-52.36 To 6013. %
Max Ratio
Min Ratio
n-Fe054.tendl
n-Fe054.jeff3.3
Cross Section (barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
47
26-Fe-54

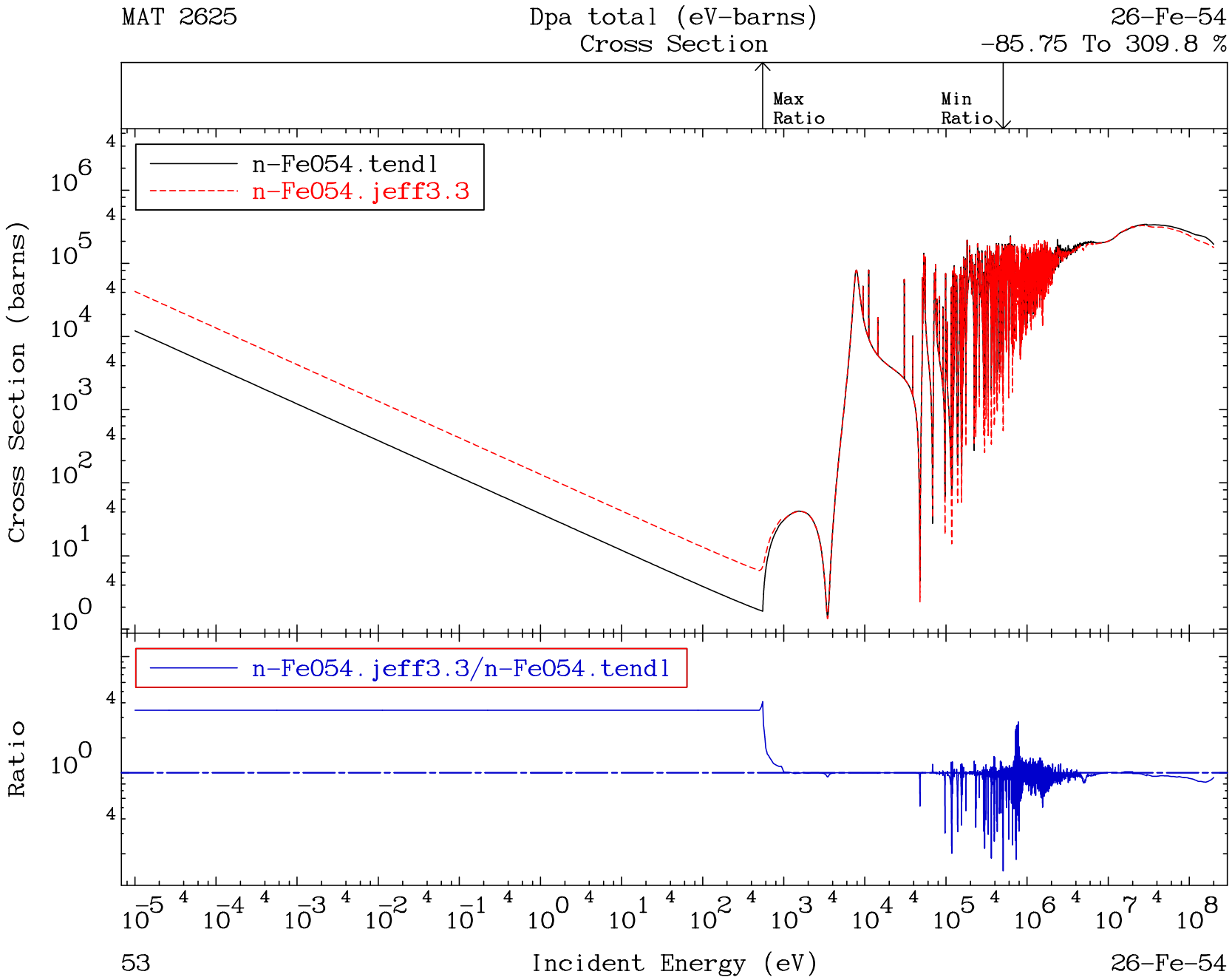

MAT 2625
Kerma inelastic (mt51-91)
Cross Section
26-Fe-54
-100.0 To 6.136 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 1.4348 MeV
n-Fe054.jeff3.3 Threshold 1.4348 MeV
Cross Section (barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
48
26-Fe-54

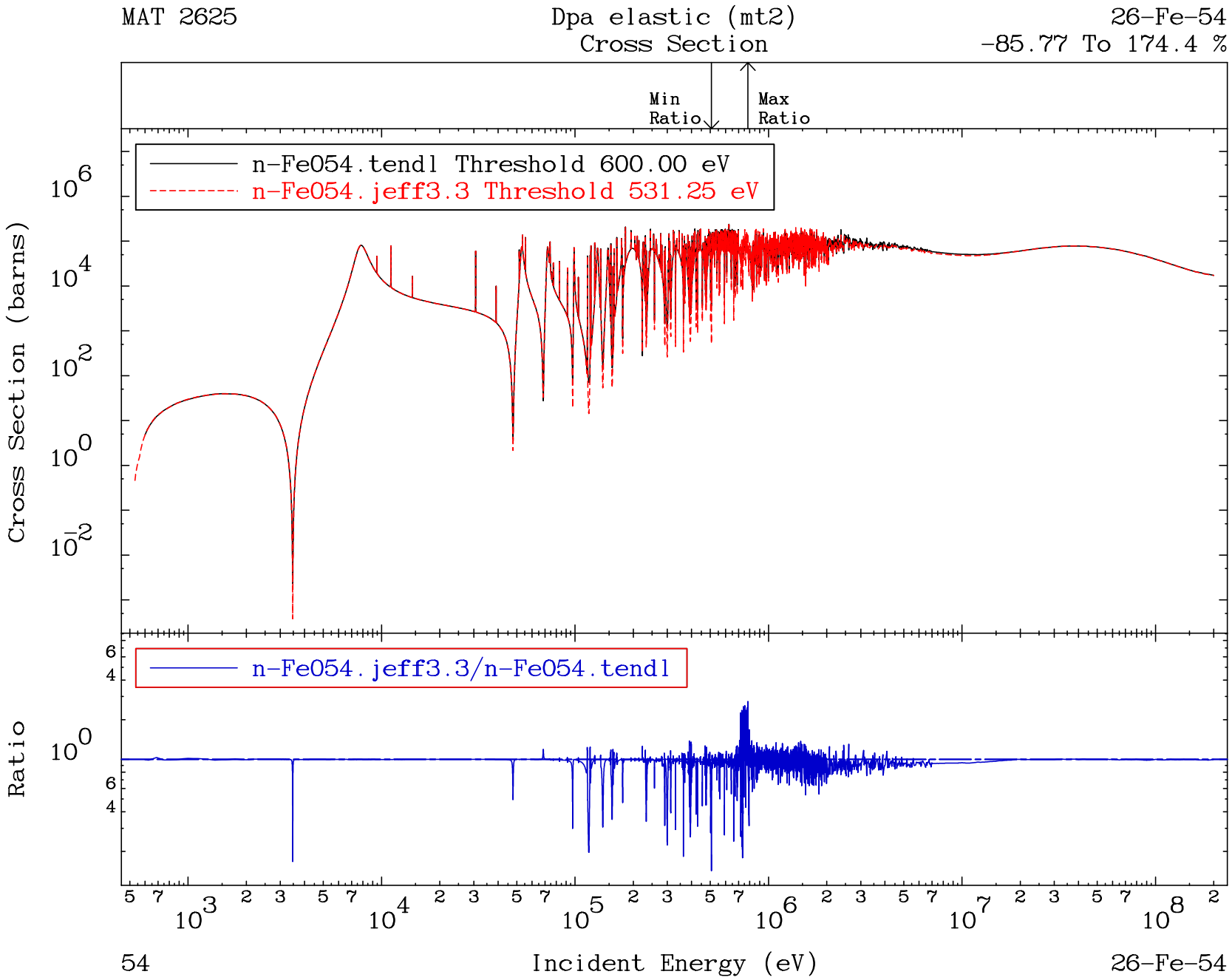

MAT 2625
Kerma fission (mt18 or mt19-20-21-38)
Cross Section
26-Fe-54
-100.0 To 6.136 %
Max Ratio
Min Ratio
n-Fe054.tendl
n-Fe054.jeff3.3
Cross Section (barns)
1.0
0.5
0.0
-0.5
-1.0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
1.2
0.8
0.4
0.0
10^-5 10^-4 10^-3 10^-2 10^-1 10^0 10^1 10^2 10^3 10^4 10^5 10^6 10^7 10^8
49
Incident Energy (eV)
26-Fe-54

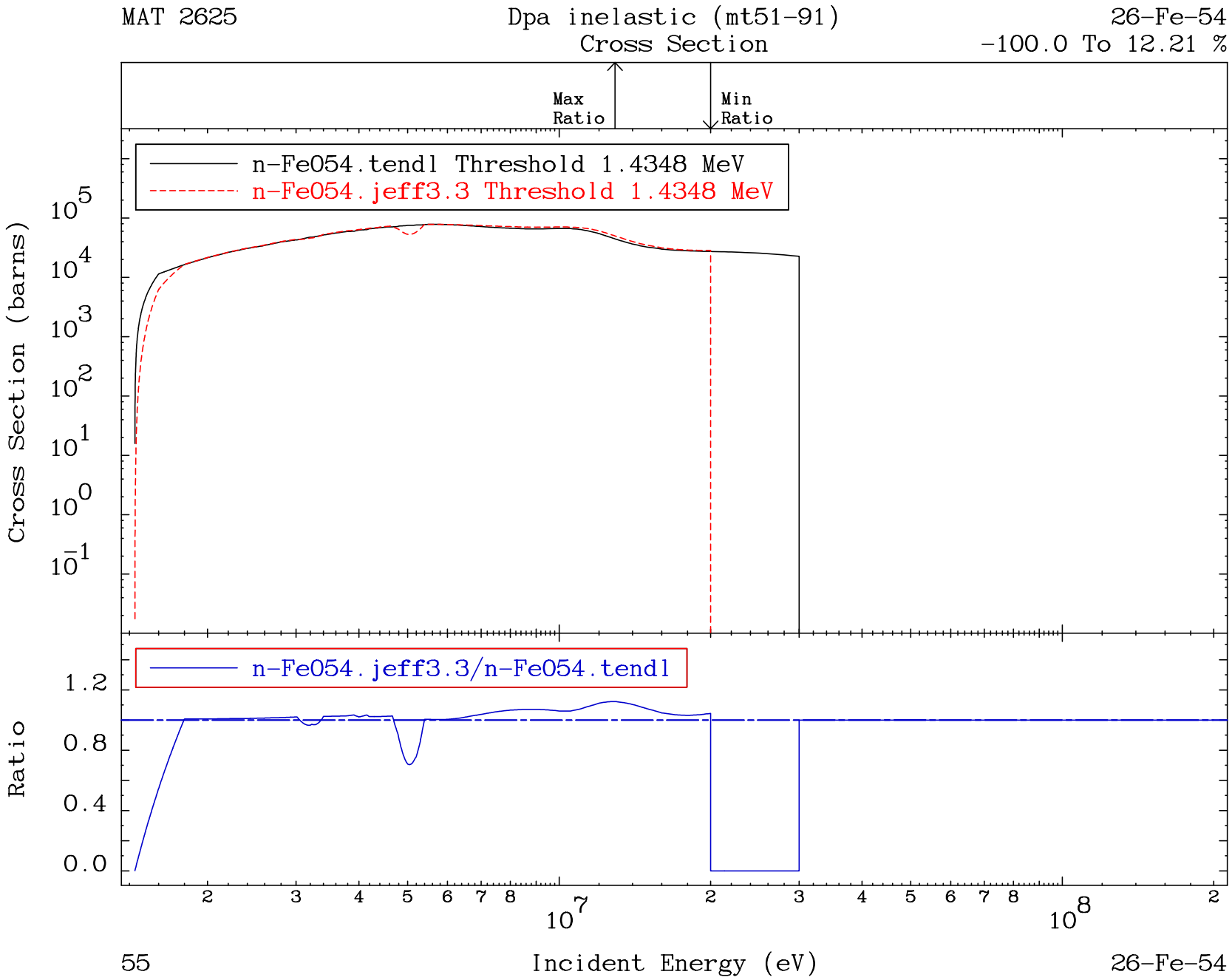

MAT 2625
Kerma capture (mt102)
Cross Section
26-Fe-54
-100.0 To 6019. %
Max Ratio
Min Ratio
n-Fe054.tendl
n-Fe054.jeff3.3
Cross Section (barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
50
26-Fe-54

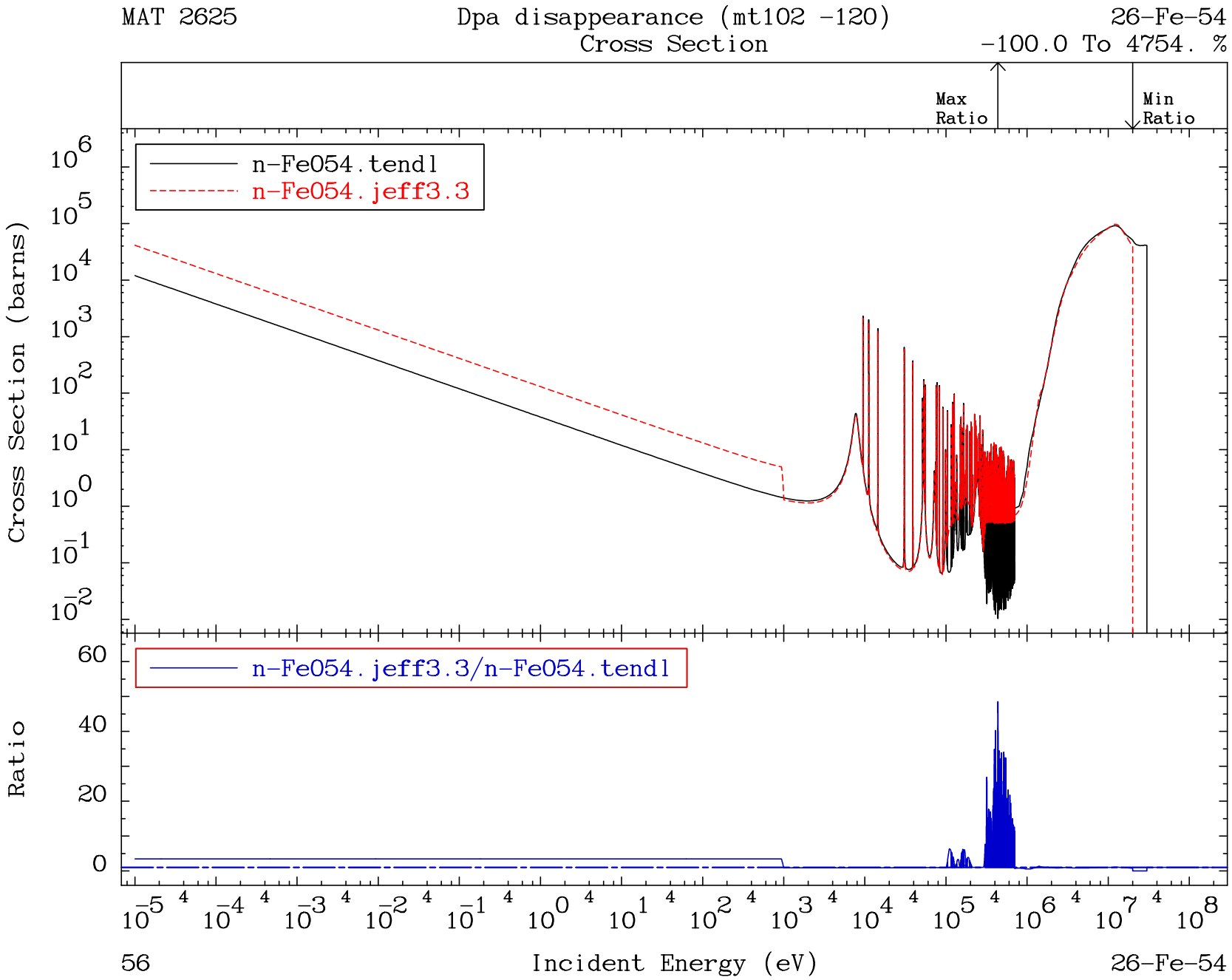

MAT 2625
Total photon (eV-barns)
Cross Section
26-Fe-54
-32.79 To 6019. %
Max Ratio
Min Ratio
n-Fe054.tendl
n-Fe054.jeff3.3
Cross Section (barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
51
26-Fe-54

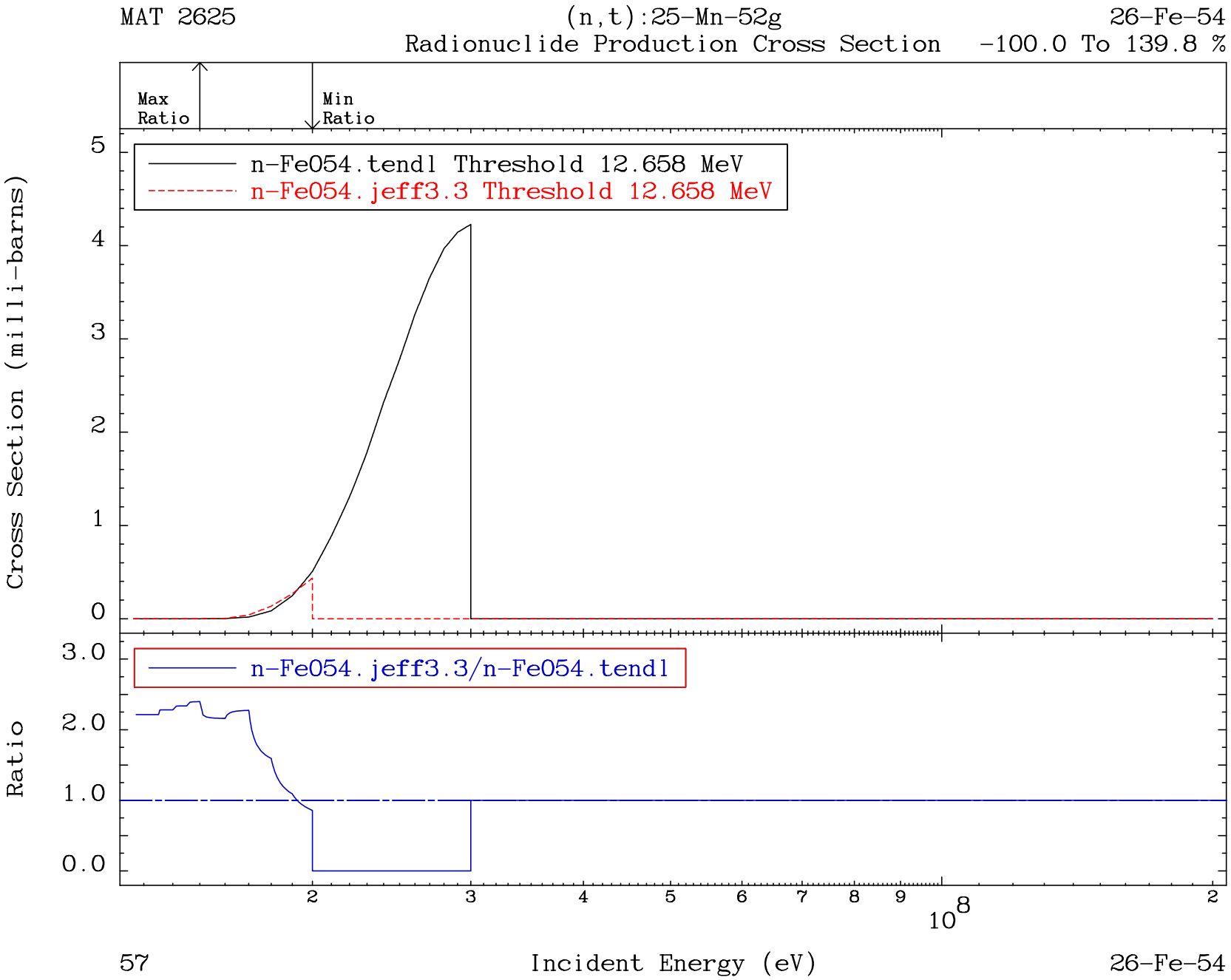

MAT 2625
Total kinematic kerma (high limit)
Cross Section
26-Fe-54
-52.05 To 995.1 %
Max Ratio
Min Ratio
n-Fe054.tendl
n-Fe054.jeff3.3
Cross Section (barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
52
26-Fe-54

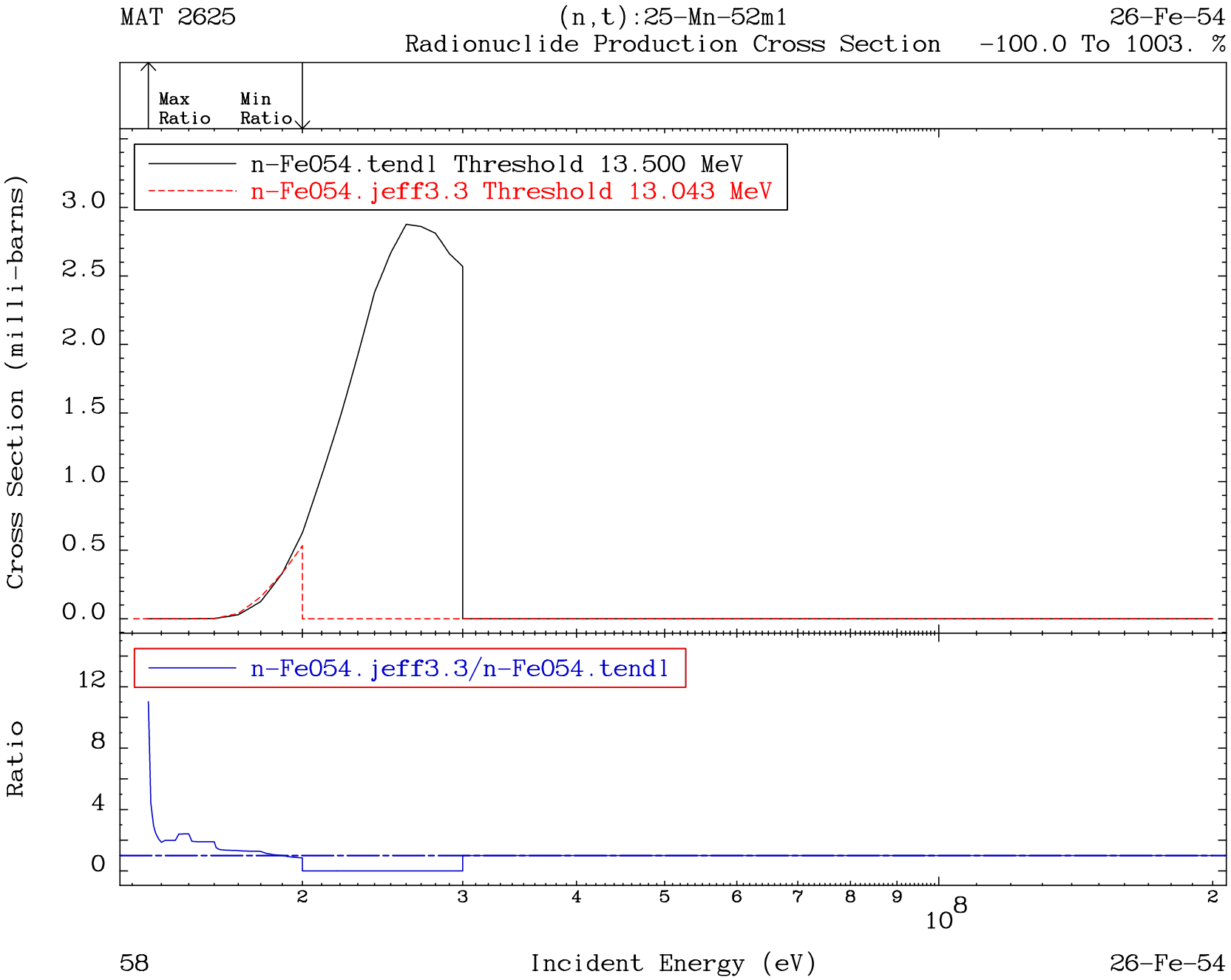

MAT 2625
Dpa total (eV-barns)
Cross Section
26-Fe-54
-85.75 To 309.8 %
Max Ratio
Min Ratio
n-Fe054.tendl
n-Fe054.jeff3.3
Cross Section (barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
53
Incident Energy (eV)
26-Fe-54


MAT 2625
Dpa elastic (mt2)
Cross Section
26-Fe-54
-85.77 To 174.4 %
Min Ratio
Max Ratio
n-Fe054.tendl Threshold 600.00 eV
n-Fe054.jeff3.3 Threshold 531.25 eV
Cross Section (barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
54
26-Fe-54


MAT 2625
Dpa inelastic (mt51-91)
Cross Section
26-Fe-54
-100.0 To 12.21 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 1.4348 MeV
n-Fe054.jeff3.3 Threshold 1.4348 MeV
Cross Section (barns)
10^5
10^4
10^3
10^2
10^1
10^0
10^-1
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
1.2
0.8
0.4
0.0
2 3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
55
Incident Energy (eV)
26-Fe-54


MAT 2625
Dpa disappearance (mt102 -120)
Cross Section
26-Fe-54
-100.0 To 4754. %
Max Ratio
Min Ratio
n-Fe054.tendl
n-Fe054.jeff3.3
Cross Section (barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
56
26-Fe-54


MAT 2625
(n,t):25-Mn-52g
26-Fe-54
Radionuclide Production Cross Section -100.0 To 139.8 %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 12.658 MeV
n-Fe054.jeff3.3 Threshold 12.658 MeV
Cross Section (milli-barns)
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
Incident Energy (eV)
57
26-Fe-54


MAT 2625
(n,t):25-Mn-52m1
26-Fe-54
Radionuclide Production Cross Section -100.0 To 1003. %
Max Ratio
Min Ratio
n-Fe054.tendl Threshold 13.500 MeV
n-Fe054.jeff3.3 Threshold 13.043 MeV
Cross Section (milli-barns)
3.0
2.5
2.0
1.5
1.0
0.5
0.0
n-Fe054.jeff3.3/n-Fe054.tendl
Ratio
12
8
4
0
2
3
4
5
6
7
8
9
10^8
2
58
Incident Energy (eV)
26-Fe-54