Program Complot
(Version 2021-1)
by
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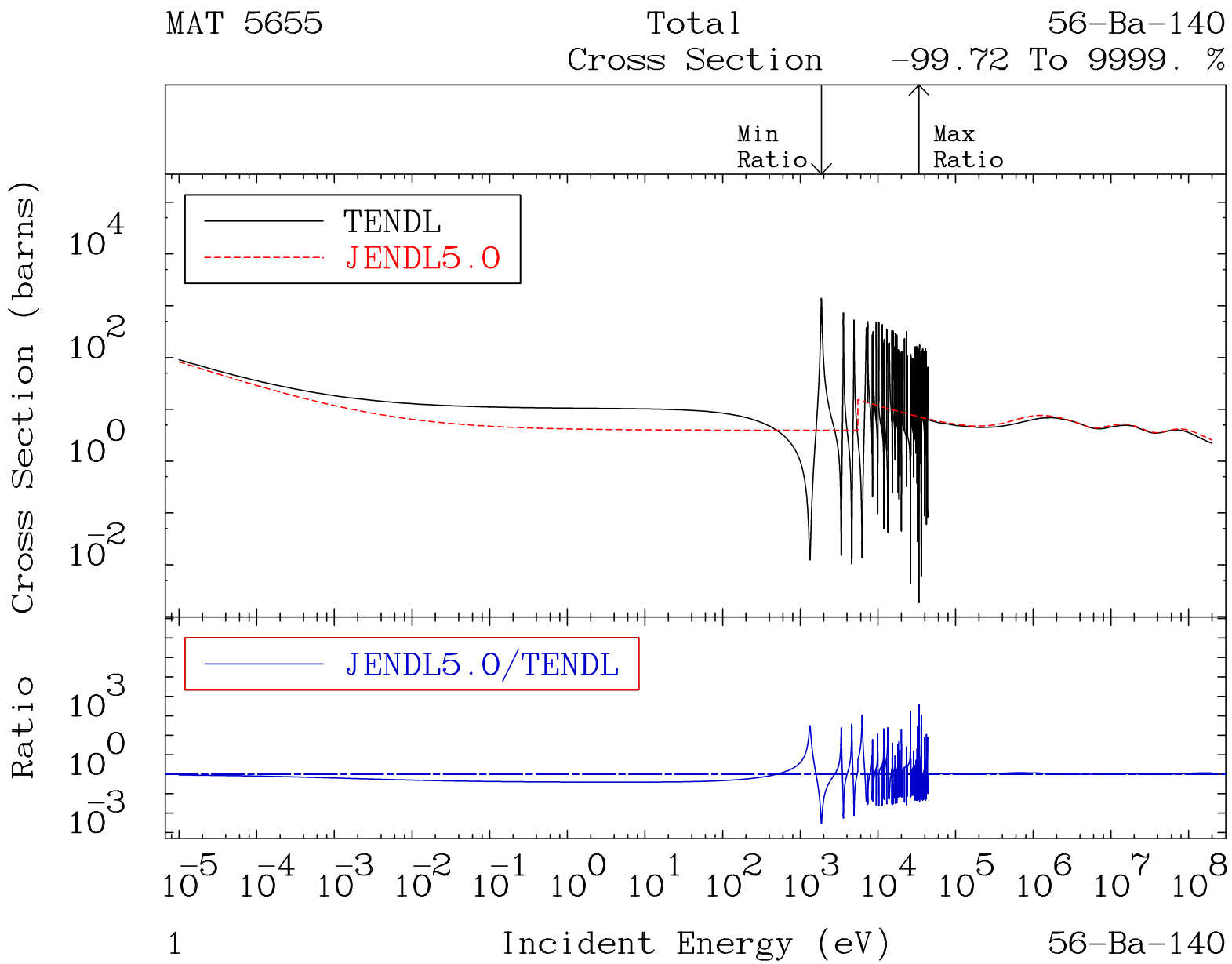
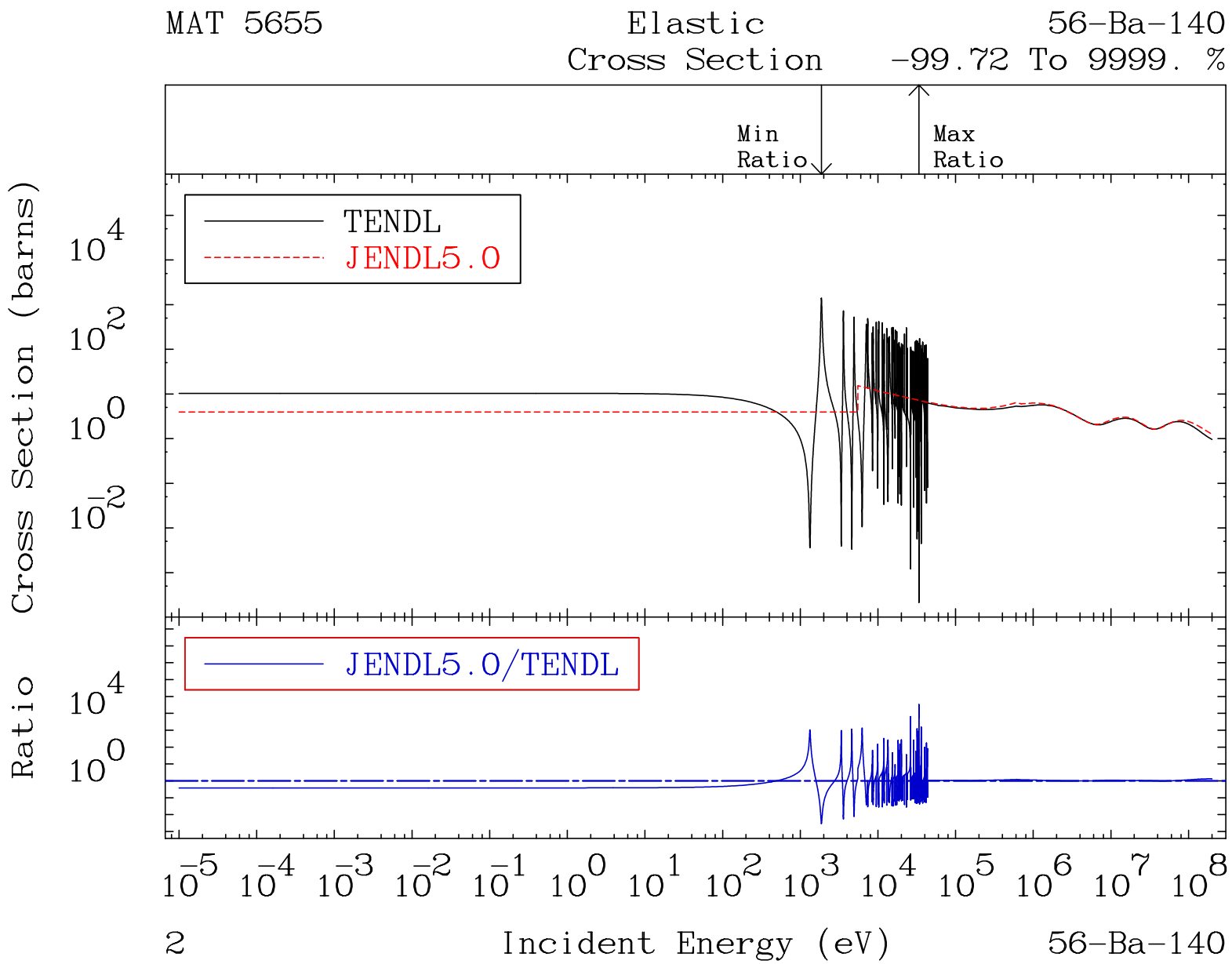
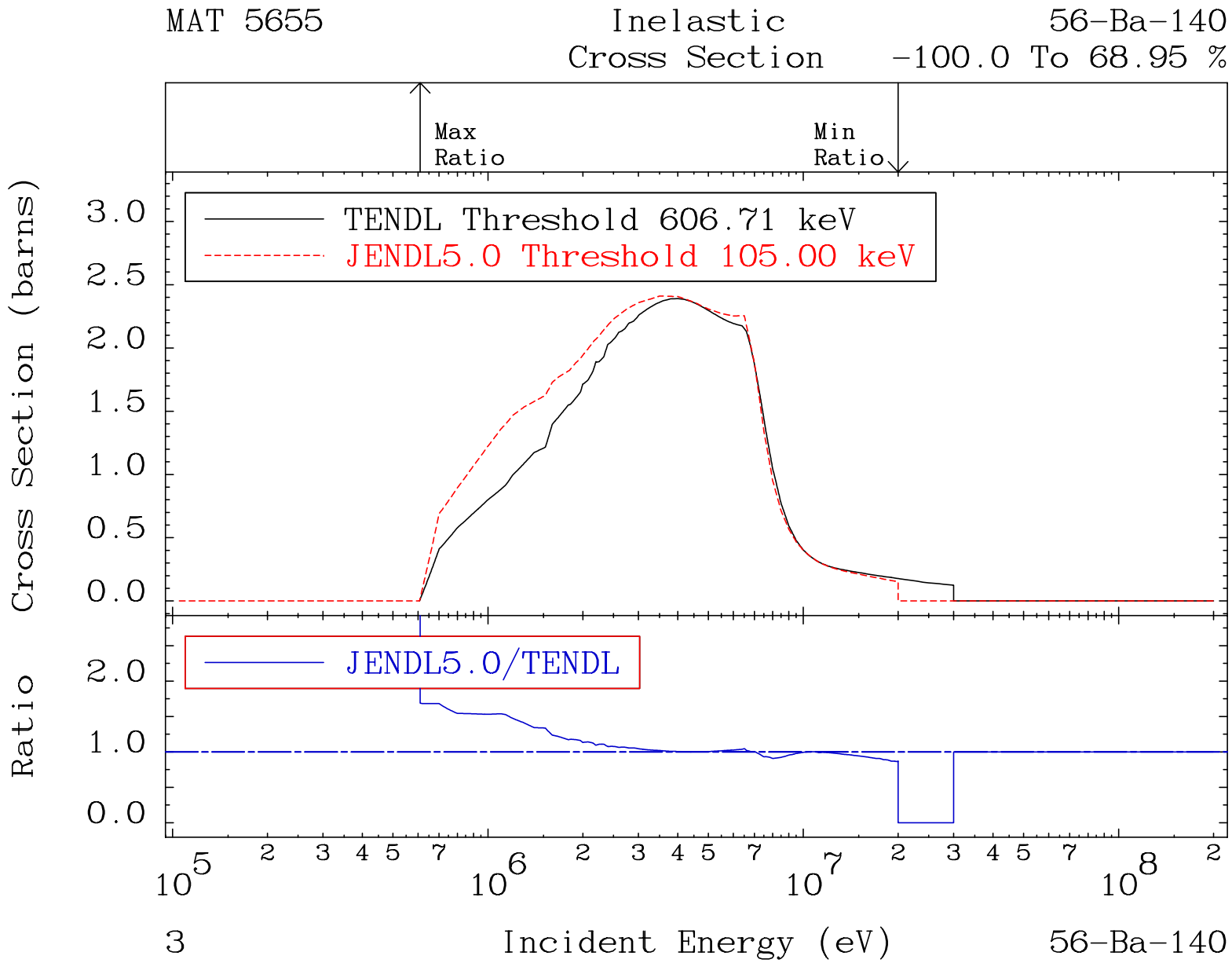
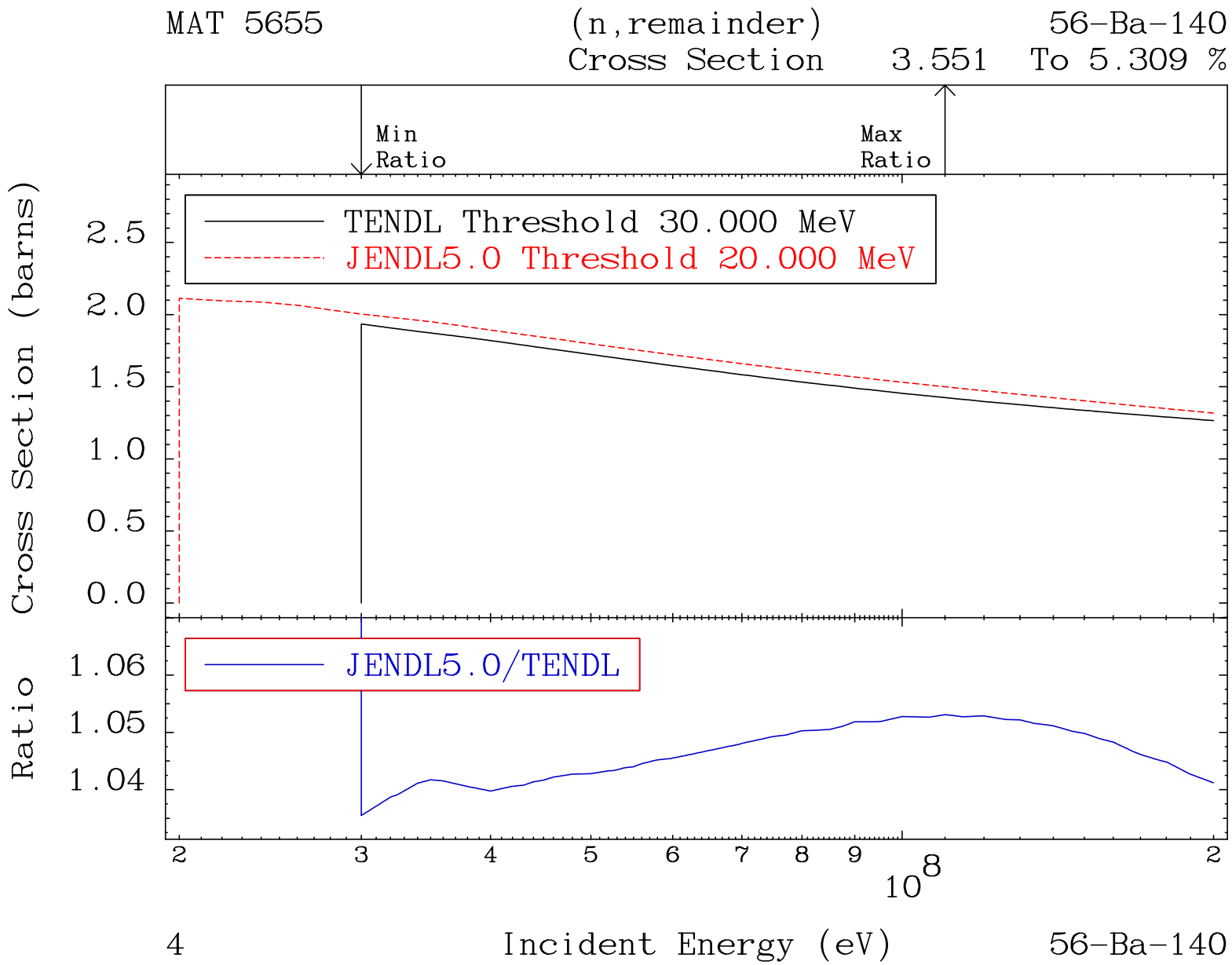
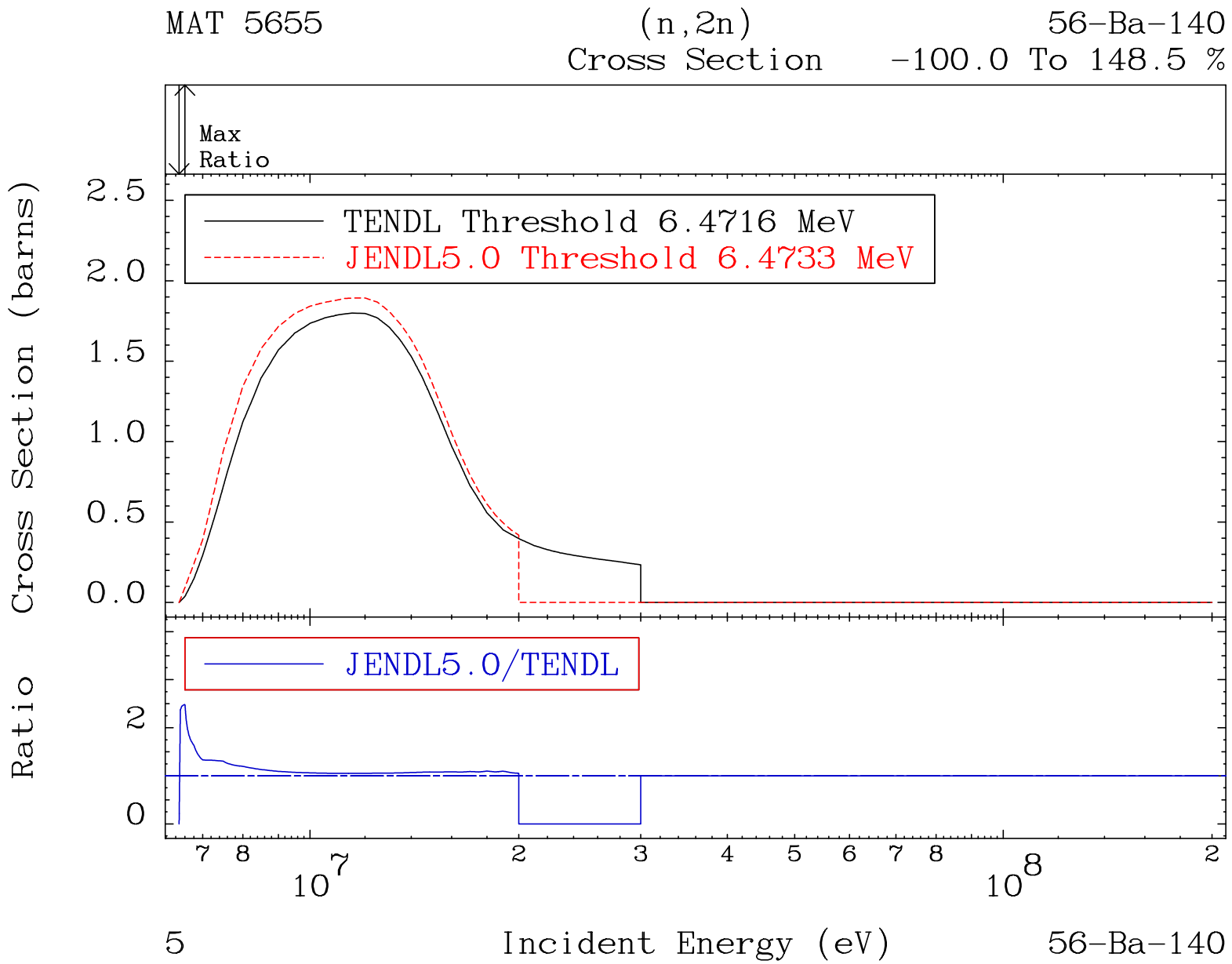
Press Mouse Button to Start

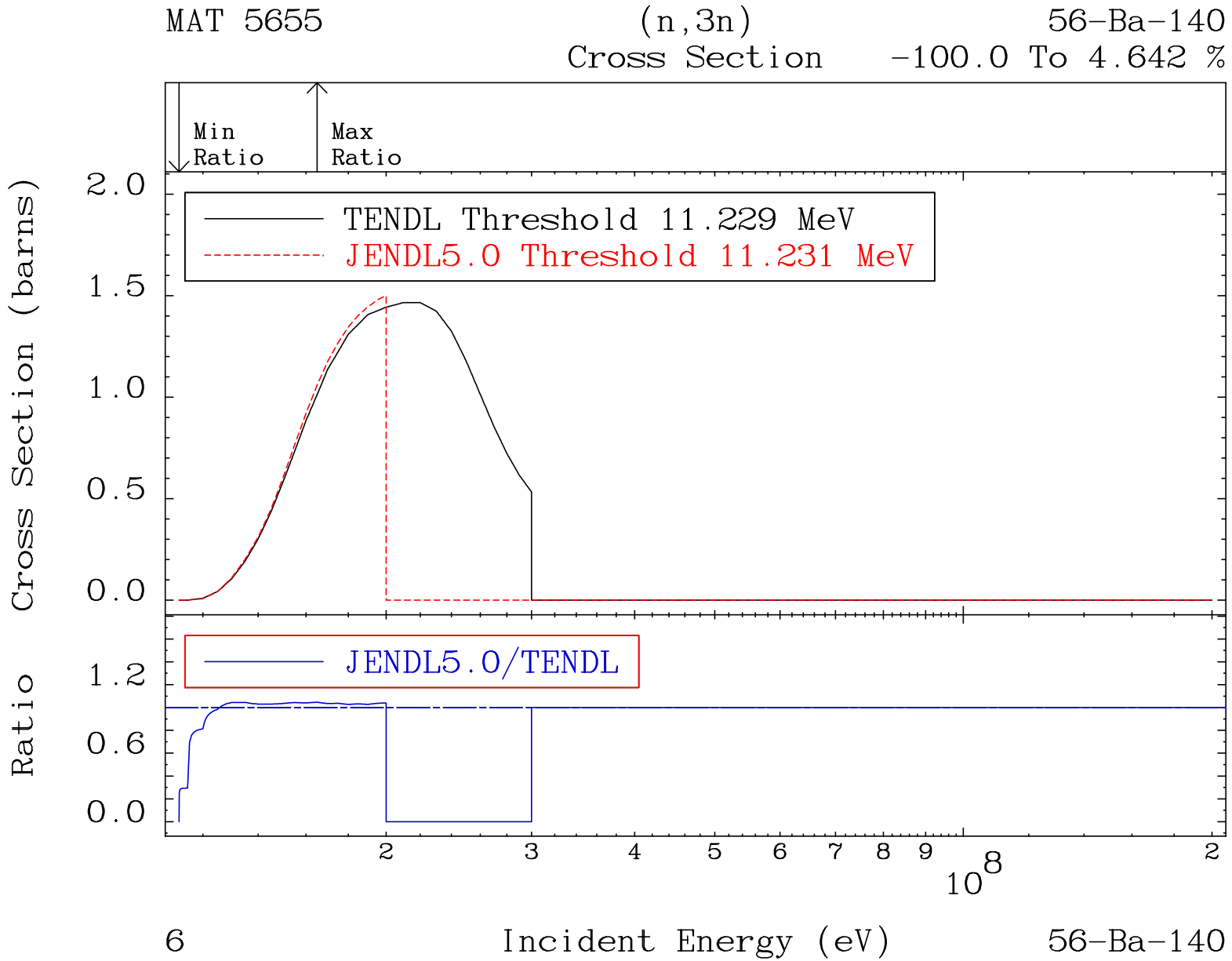

MAT 5655
Total
Cross Section
56-Ba-140
-99.72 To 9999. %
Min
Ratio
Max
Ratio
TENDL
JENDL5.0
JENDL5.0/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
1
56-Ba-140

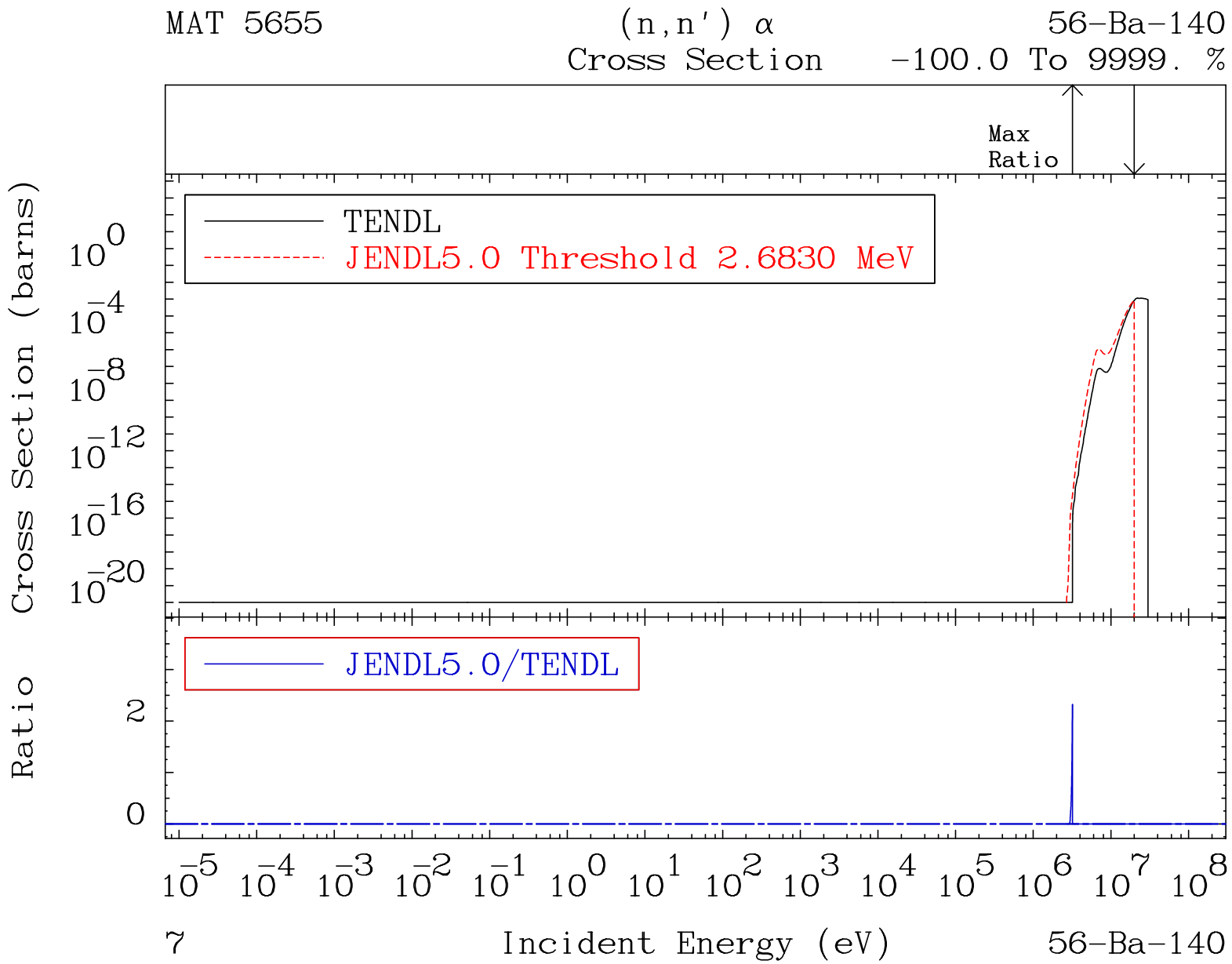

MAT 5655
Elastic
Cross Section
56-Ba-140
-99.72 To 9999. %
Min Ratio
Max Ratio
TENDL
JENDL5.0
JENDL5.0/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
2
56-Ba-140

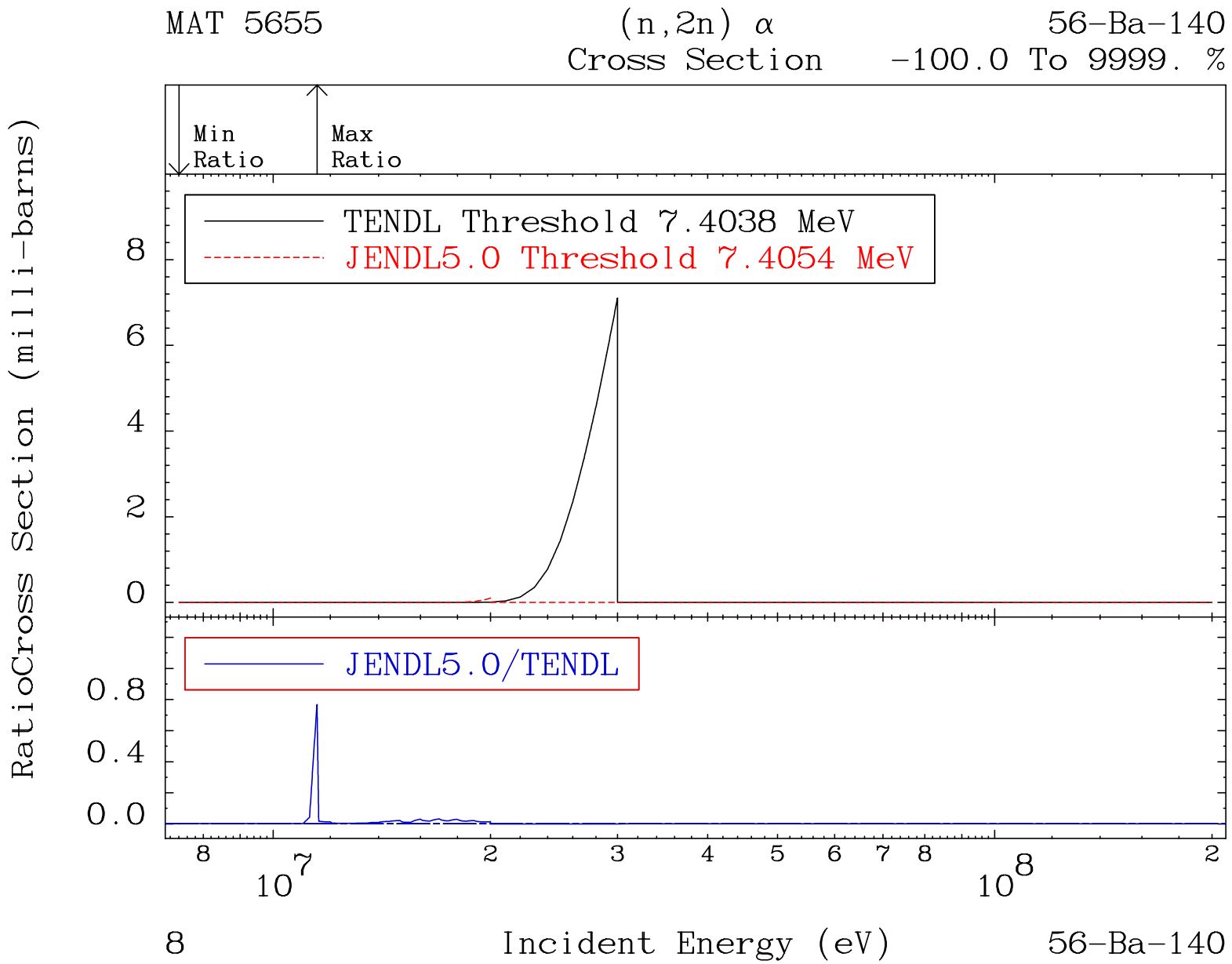

MAT 5655
Inelastic
Cross Section
56-Ba-140
-100.0 To 68.95 %
Max
Ratio
Min
Ratio
TENDL Threshold 606.71 keV
JENDL5.0 Threshold 105.00 keV
JENDL5.0/TENDL
Cross Section (barns)
Ratio
3.0
2.5
2.0
1.5
1.0
0.5
0.0
2.0
1.0
0.0
10^5
10^6
10^7
10^8
Incident Energy (eV)
3
56-Ba-140

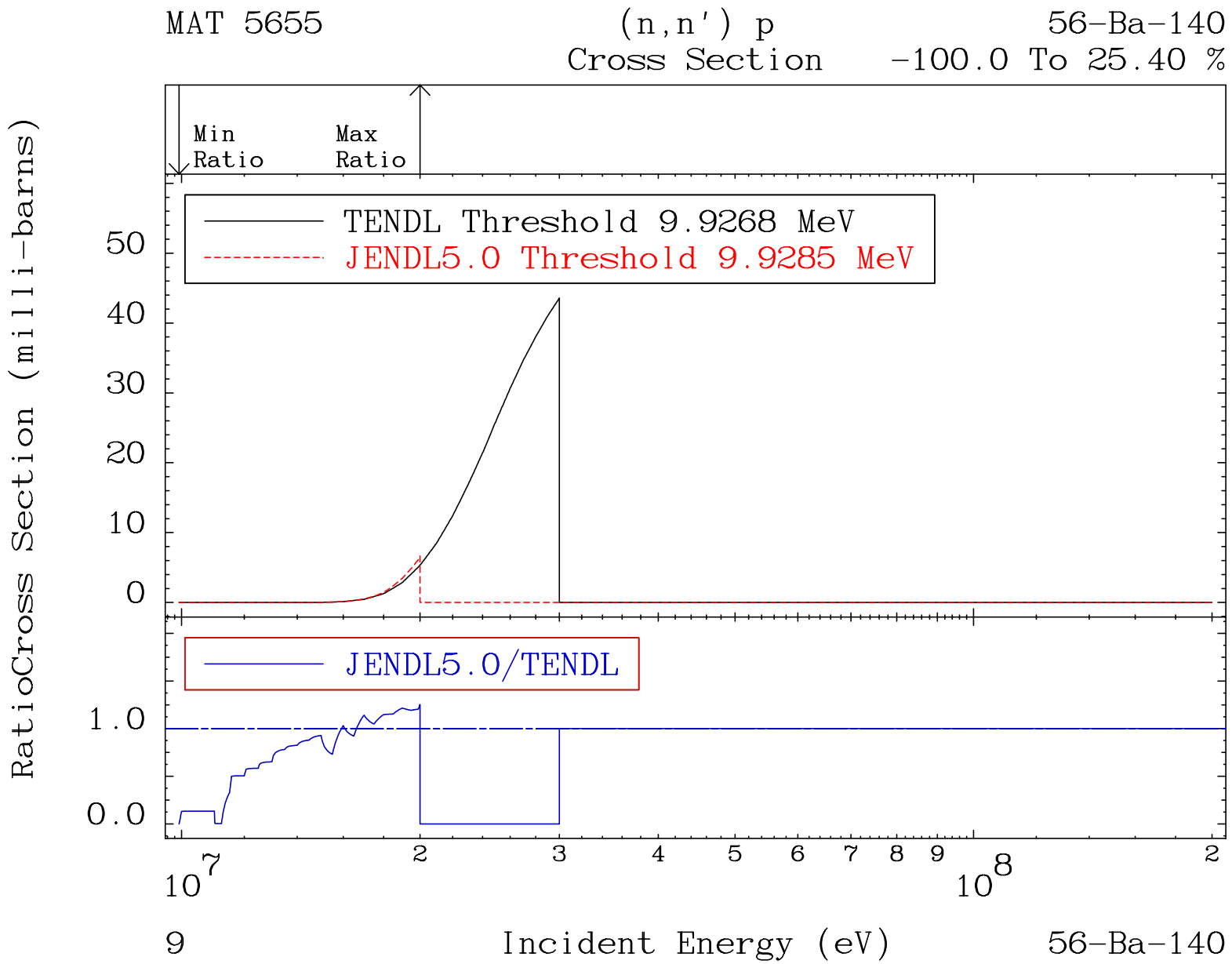

MAT 5655
(n,remainder)
56-Ba-140
Cross Section 3.551 To 5.309 %
Min Ratio
Max Ratio
TENDL Threshold 30.000 MeV
JENDL5.0 Threshold 20.000 MeV
Cross Section (barns)
2.5
2.0
1.5
1.0
0.5
0.0
JENDL5.0/TENDL
Ratio
1.06
1.05
1.04
2
3
4
5
6
7
8
9
2
10^8
4
Incident Energy (eV)
56-Ba-140

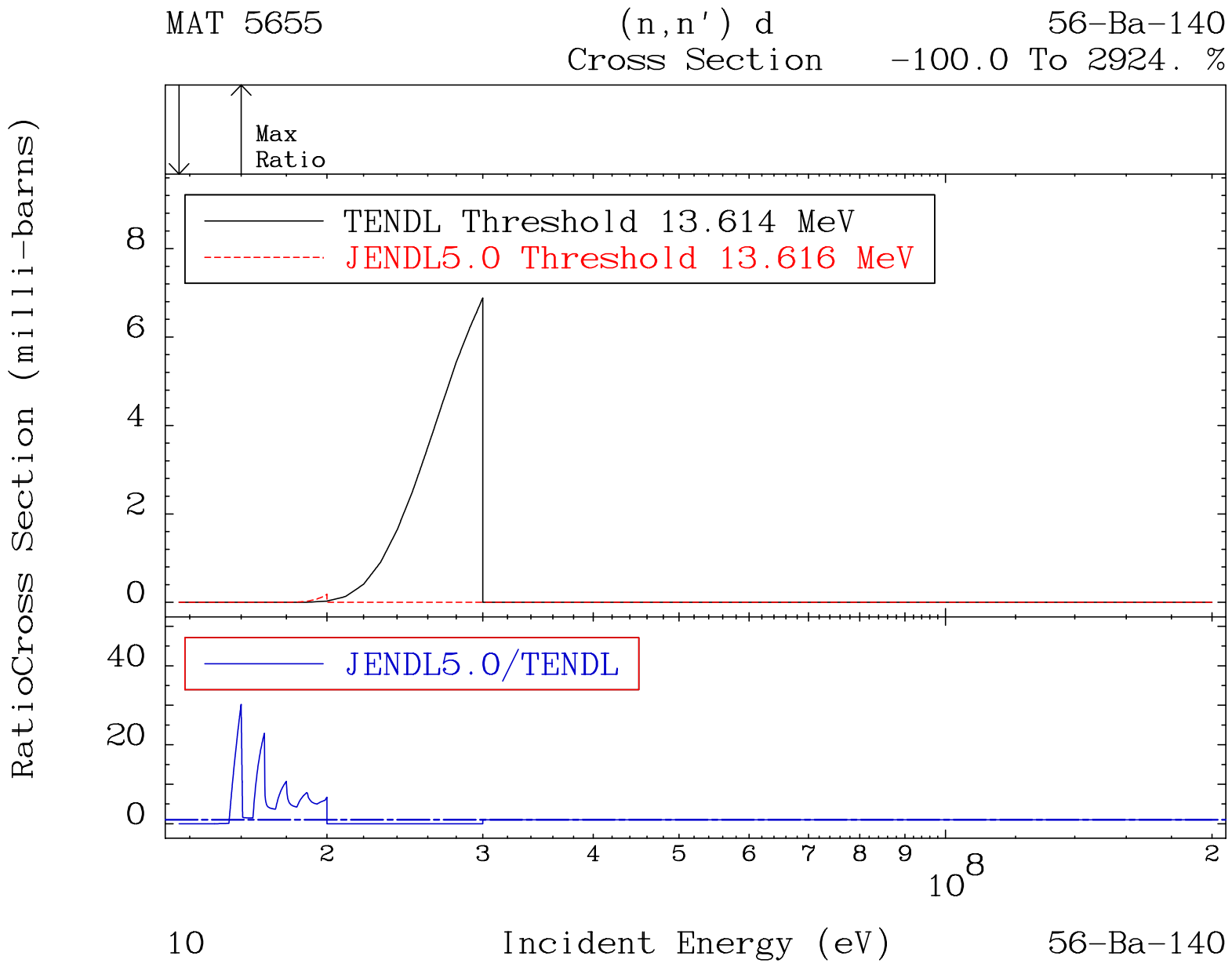

MAT 5655
(n,2n)
Cross Section
56-Ba-140
-100.0 To 148.5 %
Max
Ratio
TENDL Threshold 6.4716 MeV
JENDL5.0 Threshold 6.4733 MeV
JENDL5.0/TENDL
Cross Section (barns)
Ratio
2.5
2.0
1.5
1.0
0.5
0.0
2
0
7 8 10^7 2 3 4 5 6 7 8 10^8 2
Incident Energy (eV)
5
56-Ba-140

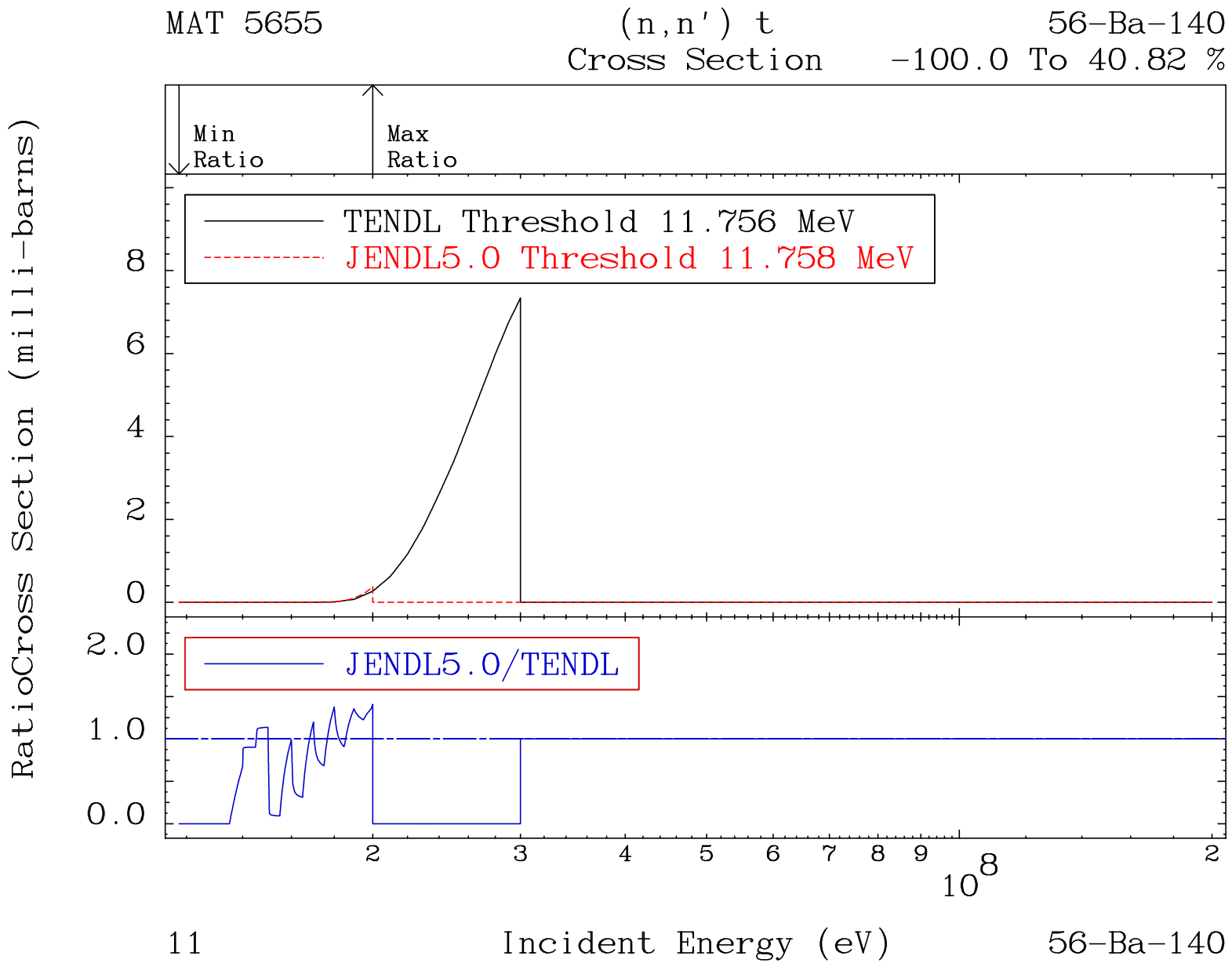

MAT 5655
(n,3n)
56-Ba-140
Cross Section
-100.0 To 4.642 %
Min Ratio
Max Ratio
TENDL Threshold 11.229 MeV
JENDL5.0 Threshold 11.231 MeV
JENDL5.0/TENDL
Cross Section (barns)
Ratio
2.0
1.5
1.0
0.5
0.0
1.2
0.6
0.0
2
3
4
5
6
7
8
9
10^8
2
6
Incident Energy (eV)
56-Ba-140

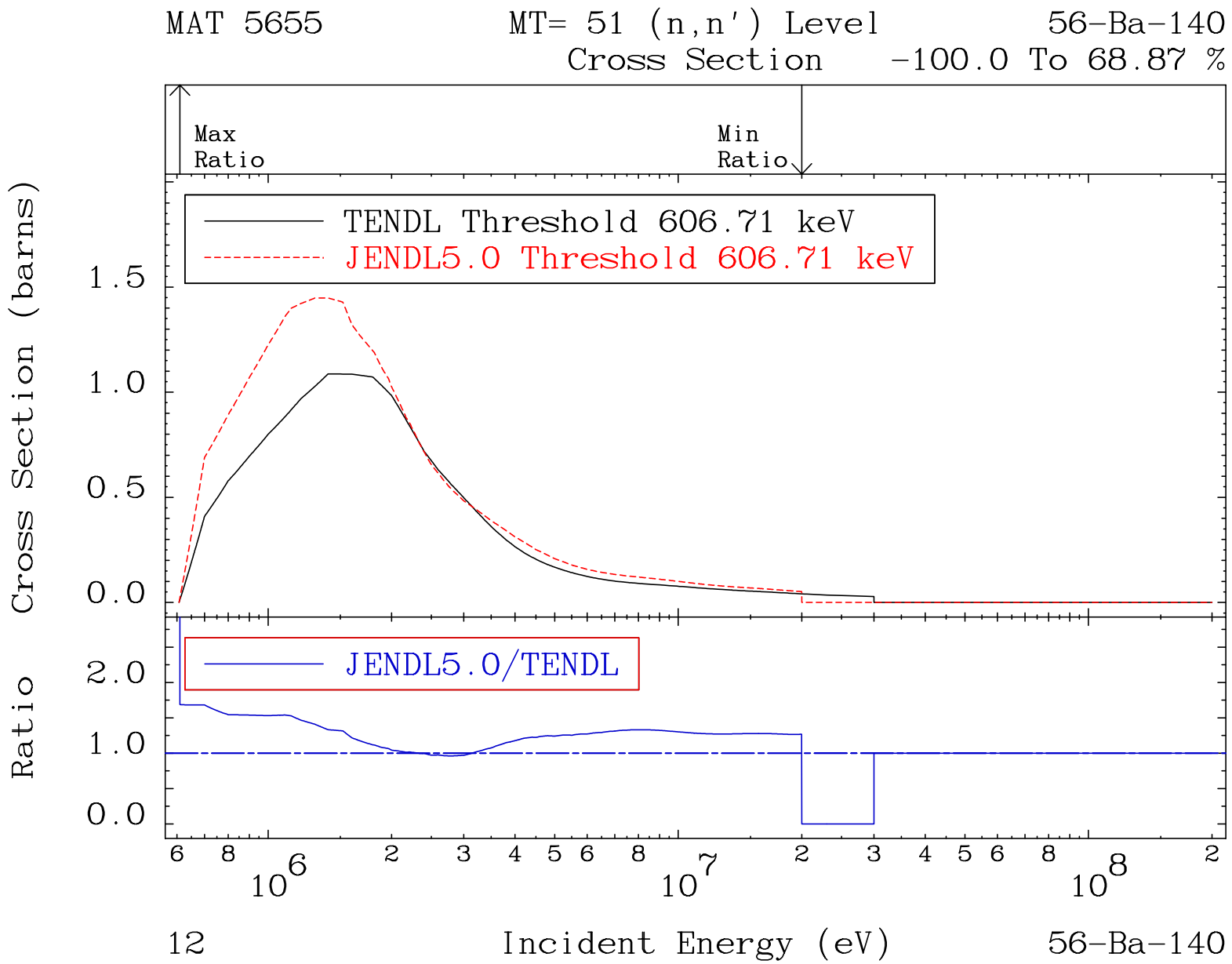

MAT 5655
(n,n') α
Cross Section
56-Ba-140
-100.0 To 9999. %
Max
Ratio
TENDL
JENDL5.0 Threshold 2.6830 MeV
JENDL5.0/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
7
56-Ba-140

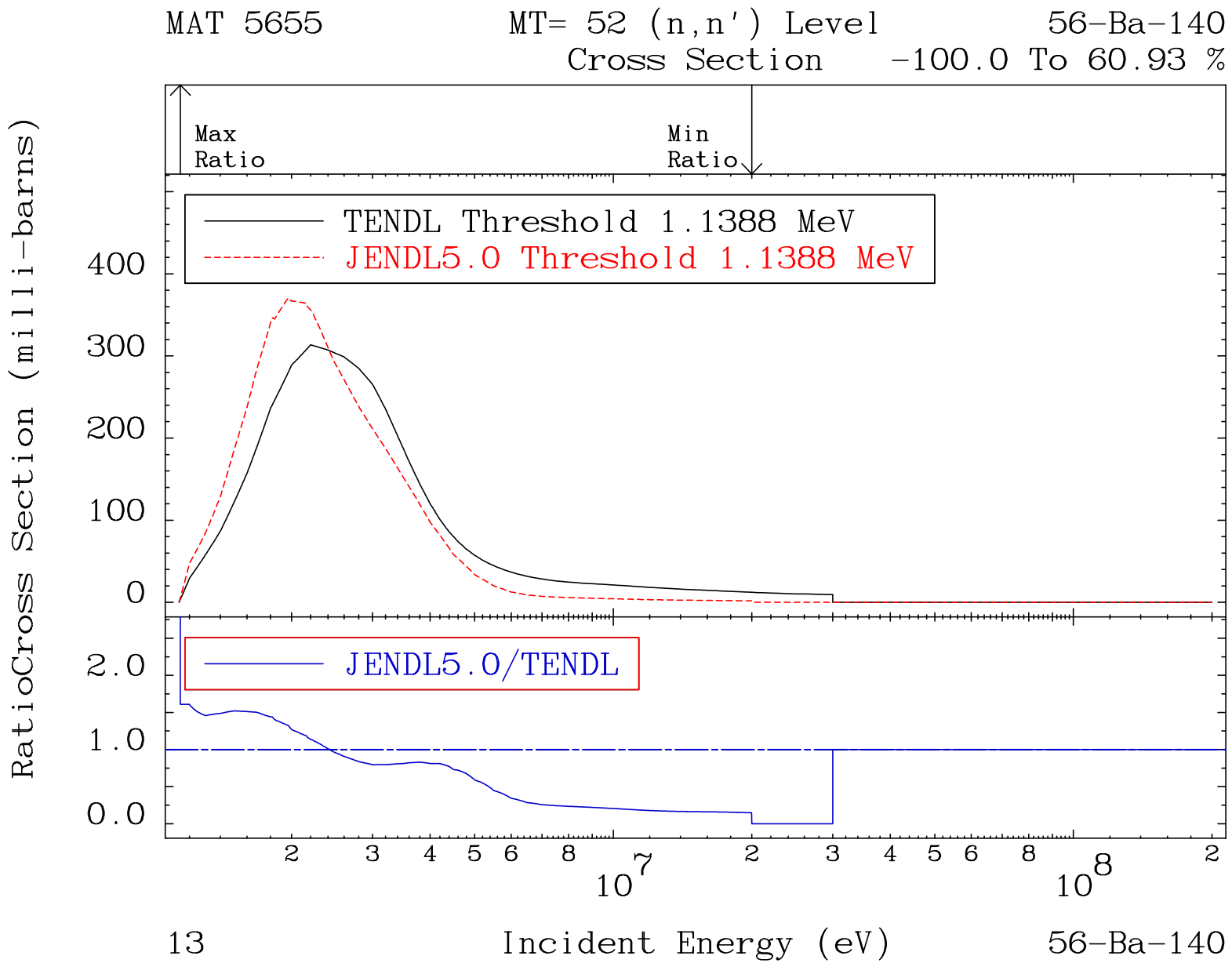

MAT 5655
(n,2n) α
56-Ba-140
Cross Section
-100.0 To 9999. %
Min Ratio
Max Ratio
TENDL Threshold 7.4038 MeV
JENDL5.0 Threshold 7.4054 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
56-Ba-140

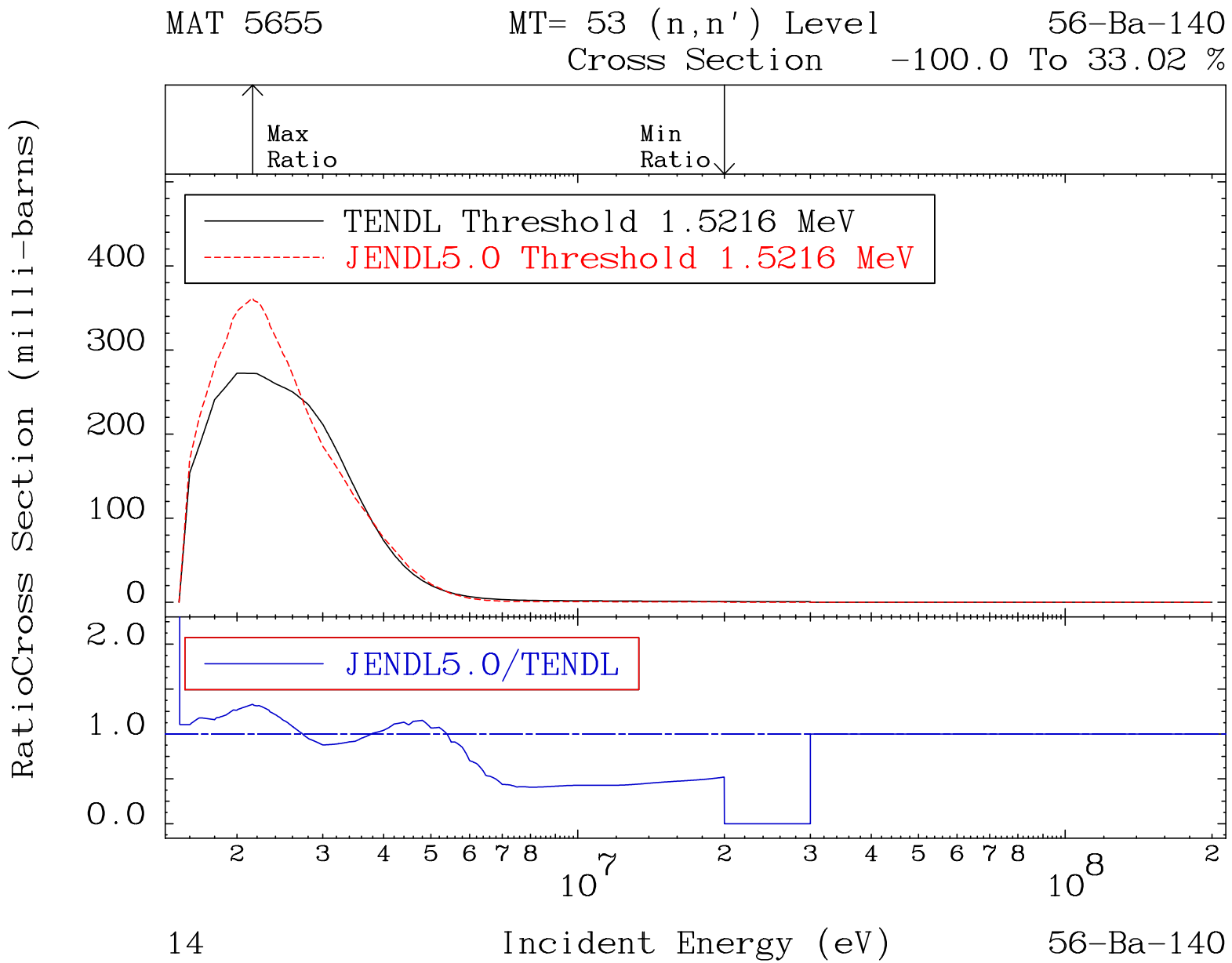

MAT 5655
(n,n') p
Cross Section
56-Ba-140
-100.0 To 25.40 %
Min Ratio
Max Ratio
TENDL Threshold 9.9268 MeV
JENDL5.0 Threshold 9.9285 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
50
40
30
20
10
0
1.0
0.0
10^7
2
3
4
5
6
7
8
9
10^8
2
9
Incident Energy (eV)
56-Ba-140

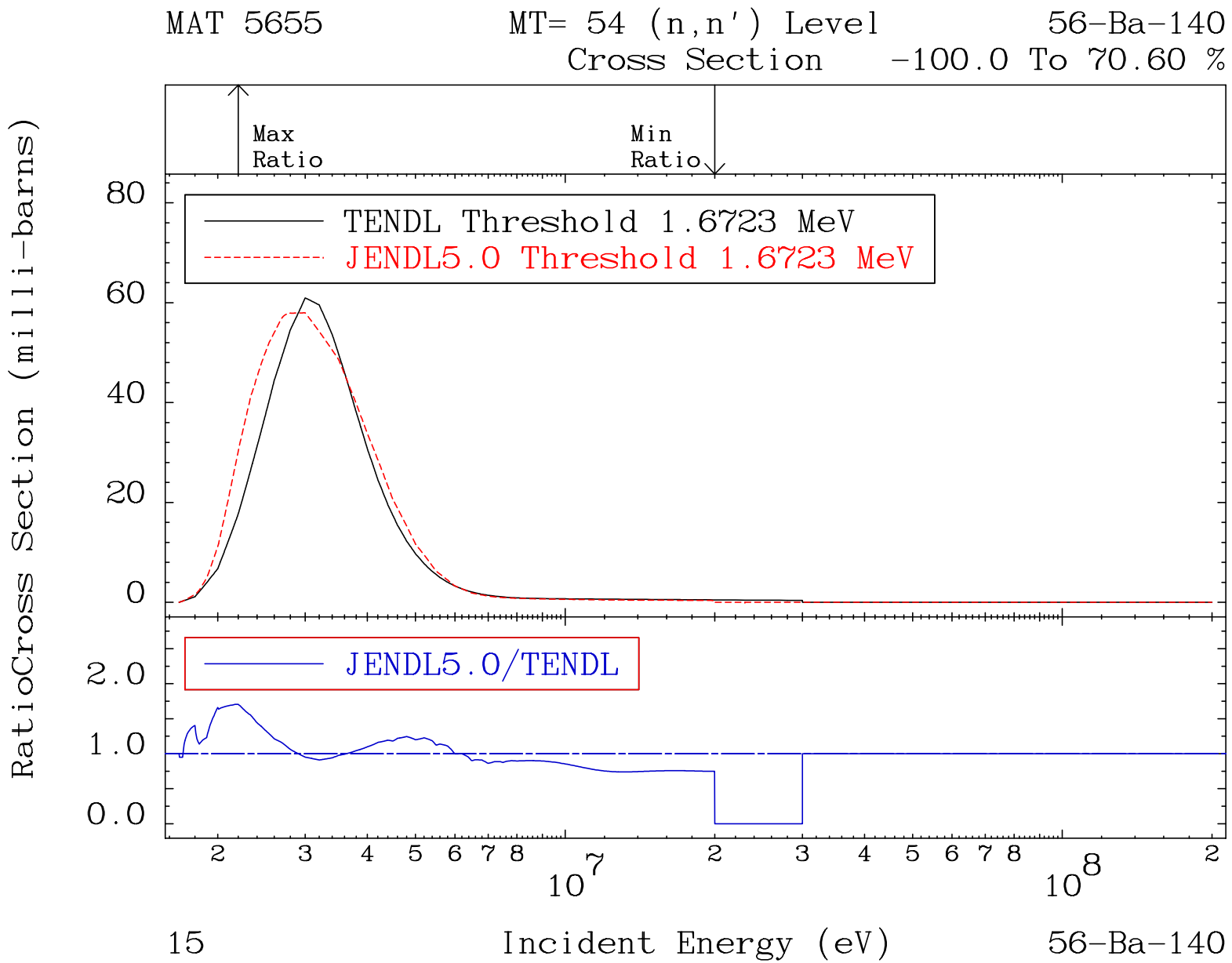

MAT 5655
(n,n') d
Cross Section
56-Ba-140
-100.0 To 2924. %
Max
Ratio
TENDL Threshold 13.614 MeV
JENDL5.0 Threshold 13.616 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
10
56-Ba-140
0
2
4
6
8
20
40
2
3
4
5
6
7
8
9
10^8
2

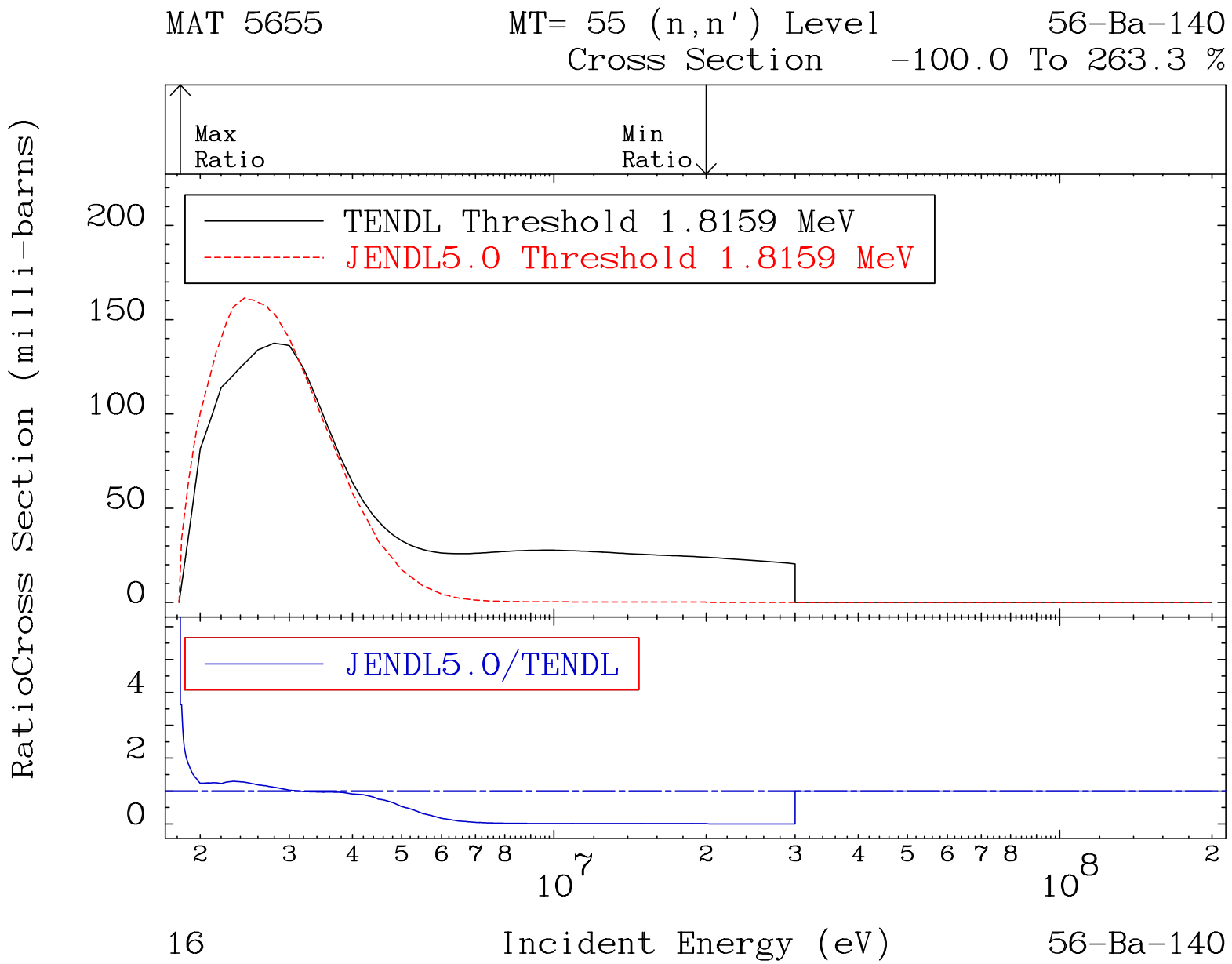

MAT 5655
(n,n') t
Cross Section
56-Ba-140
-100.0 To 40.82 %
Min Ratio
Max Ratio
TENDL Threshold 11.756 MeV
JENDL5.0 Threshold 11.758 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
8
6
4
2
0
2.0
1.0
0.0
2
3
4
5
6
7
8
9
10^8
2
11
Incident Energy (eV)
56-Ba-140

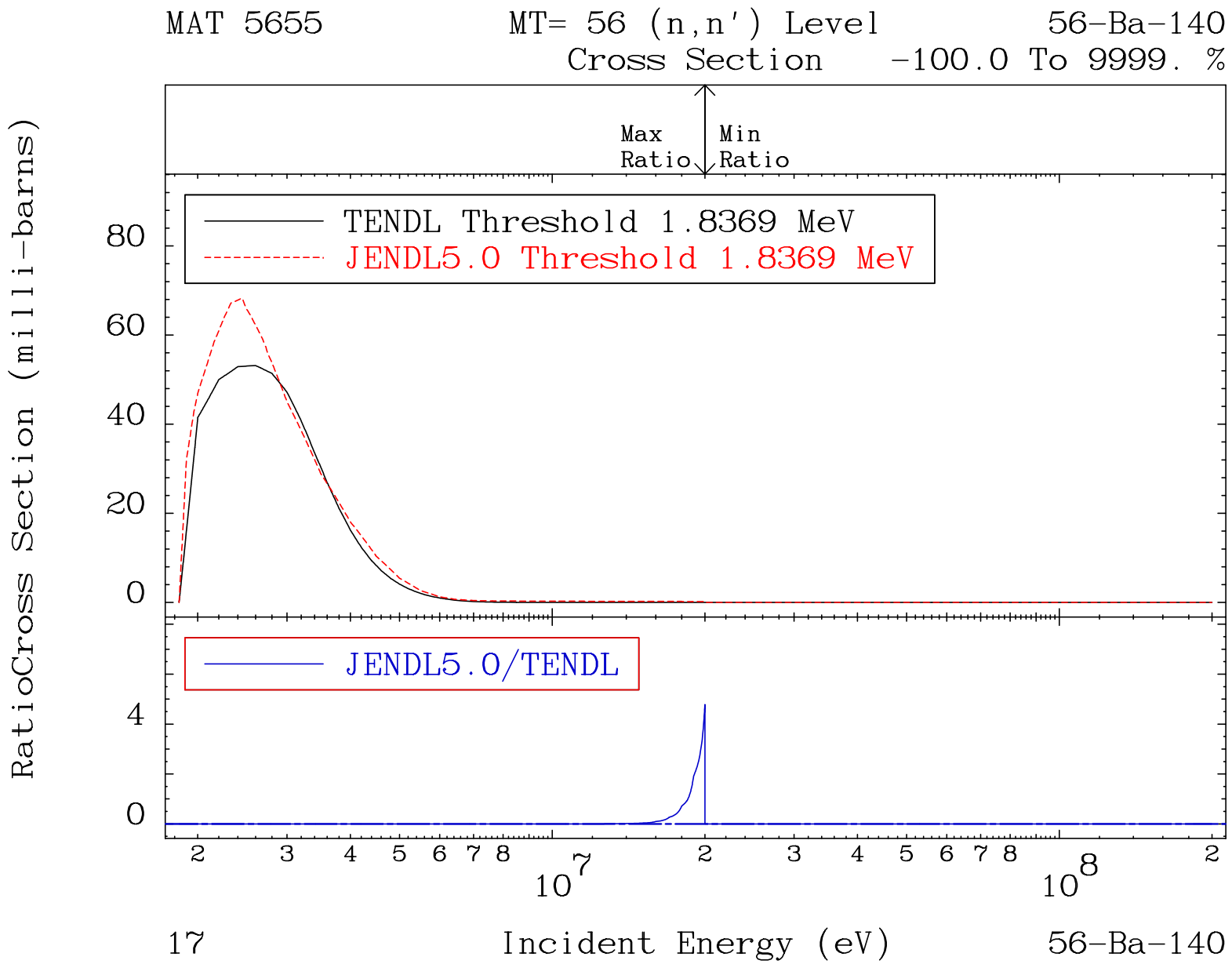

MAT 5655
MT= 51 (n,n') Level
Cross Section
56-Ba-140
-100.0 To 68.87 %
Max Ratio
Min Ratio
TENDL Threshold 606.71 keV
JENDL5.0 Threshold 606.71 keV
JENDL5.0/TENDL
Cross Section (barns)
Ratio
1.5
1.0
0.5
0.0
2.0
1.0
0.0
6 8 10^6 2 3 4 5 6 8 10^7 2 3 4 5 6 8 10^8 2
Incident Energy (eV)
12
56-Ba-140

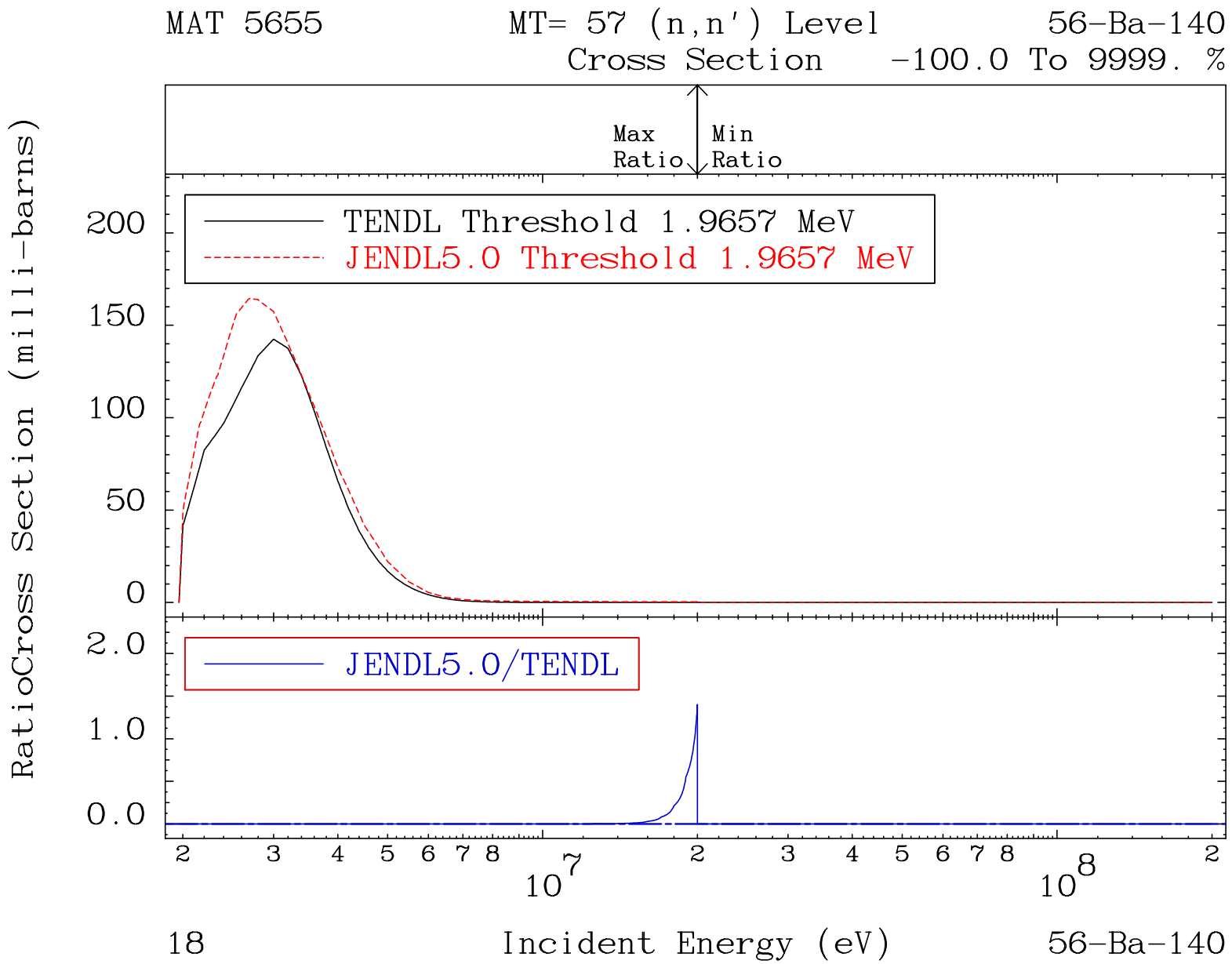

MAT 5655
MT= 52 (n,n') Level
56-Ba-140
Cross Section
-100.0 To 60.93 %
Max Ratio
Min Ratio
TENDL Threshold 1.1388 MeV
JENDL5.0 Threshold 1.1388 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
400
300
200
100
0
2.0
1.0
0.0
2
3
4
5
6
8
10^7
2
3
4
5
6
8
10^8
2
13
Incident Energy (eV)
56-Ba-140

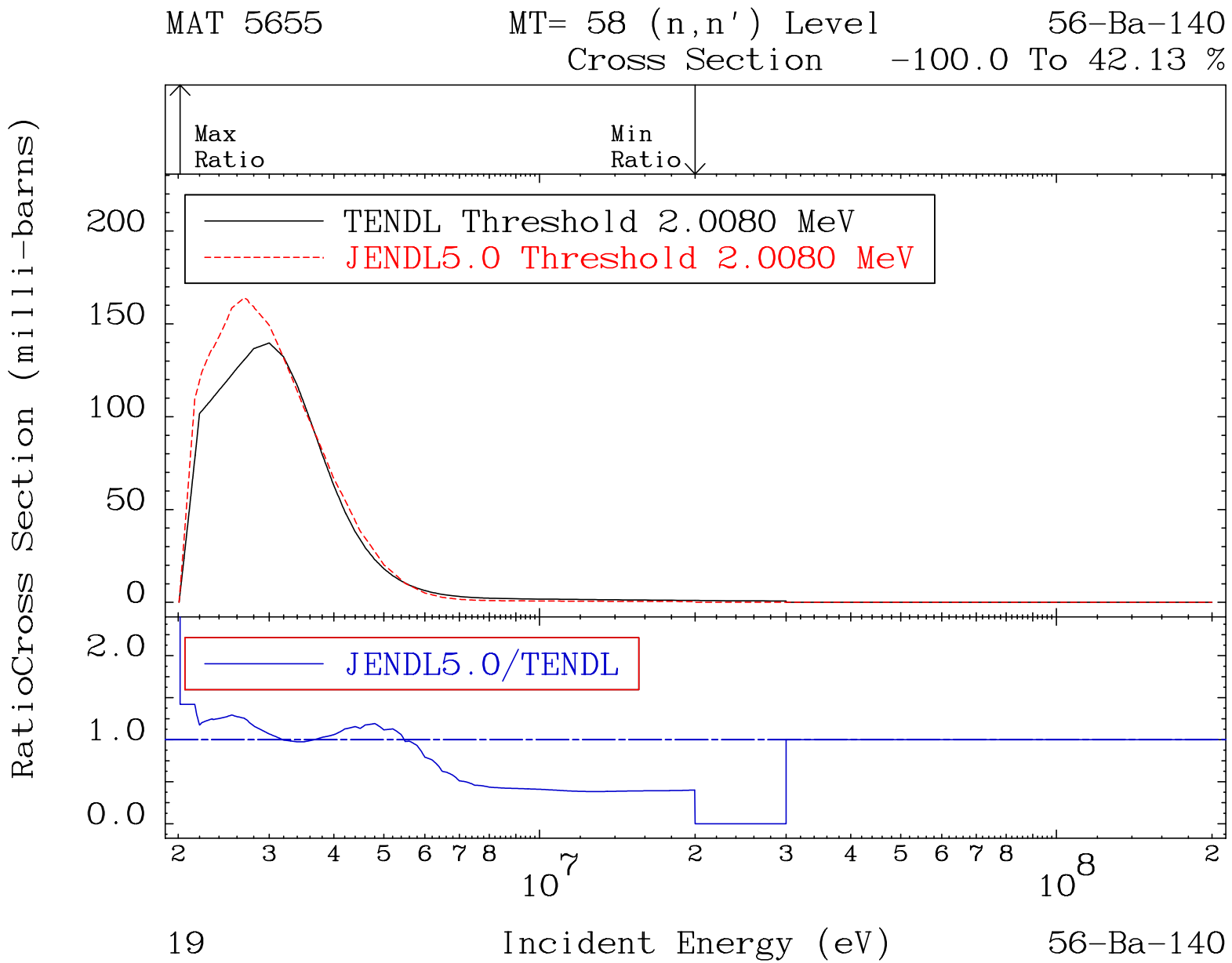

MAT 5655
MT= 53 (n,n') Level
56-Ba-140
Cross Section -100.0 To 33.02 %
Max Ratio
Min Ratio
TENDL Threshold 1.5216 MeV
JENDL5.0 Threshold 1.5216 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
400
300
200
100
0
2.0
1.0
0.0
2 3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
14
Incident Energy (eV)
56-Ba-140

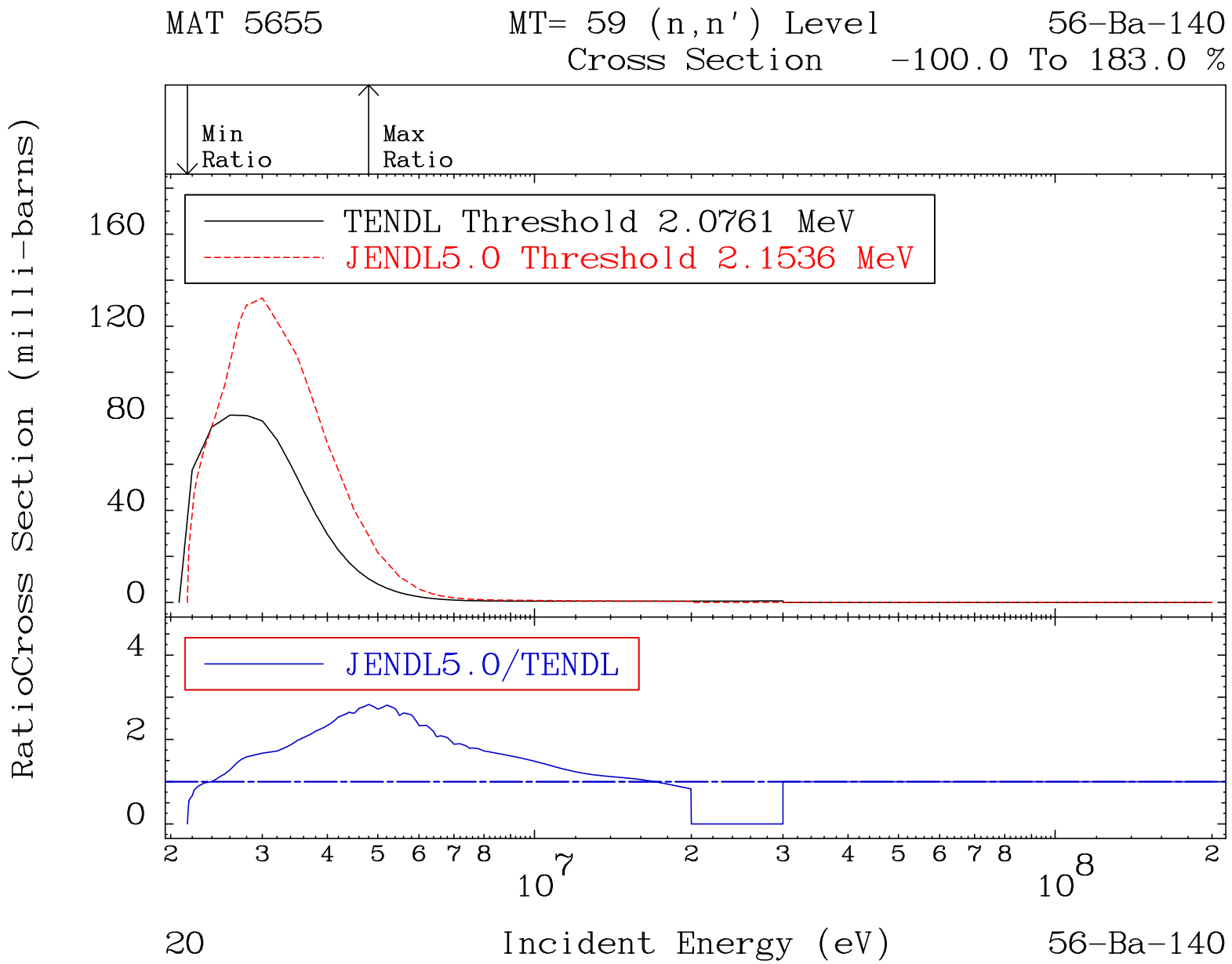

MAT 5655
MT= 54 (n,n') Level
56-Ba-140
Cross Section
-100.0 To 70.60 %
Max Ratio
Min Ratio
TENDL Threshold 1.6723 MeV
JENDL5.0 Threshold 1.6723 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
80
60
40
20
0
2.0
1.0
0.0
2 3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
15
Incident Energy (eV)
56-Ba-140

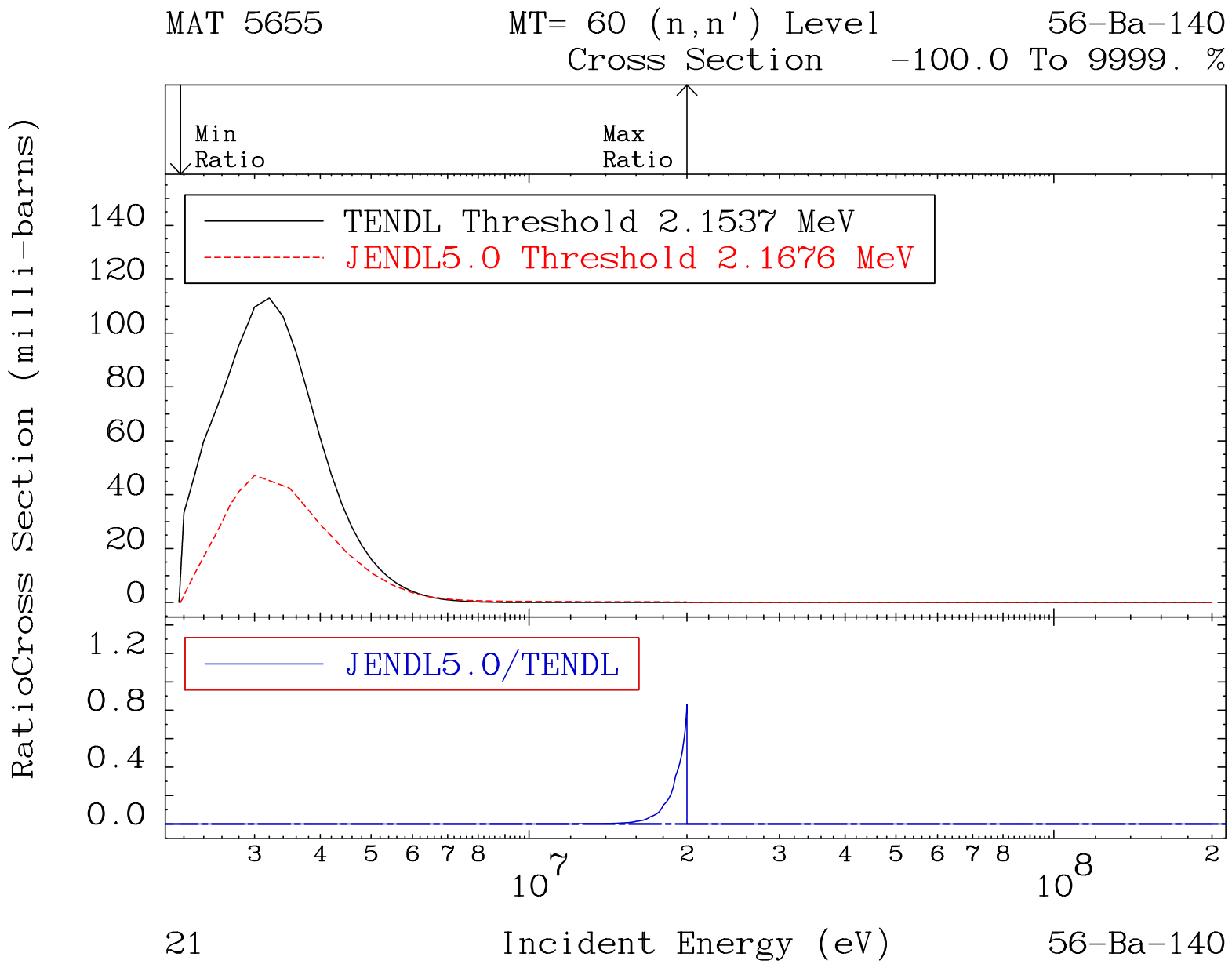

MAT 5655
MT= 55 (n,n') Level
56-Ba-140
Cross Section
-100.0 To 263.3 %
Max Ratio
Min Ratio
TENDL Threshold 1.8159 MeV
JENDL5.0 Threshold 1.8159 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
200
150
100
50
0
4
2
0
2 3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
16
Incident Energy (eV)
56-Ba-140

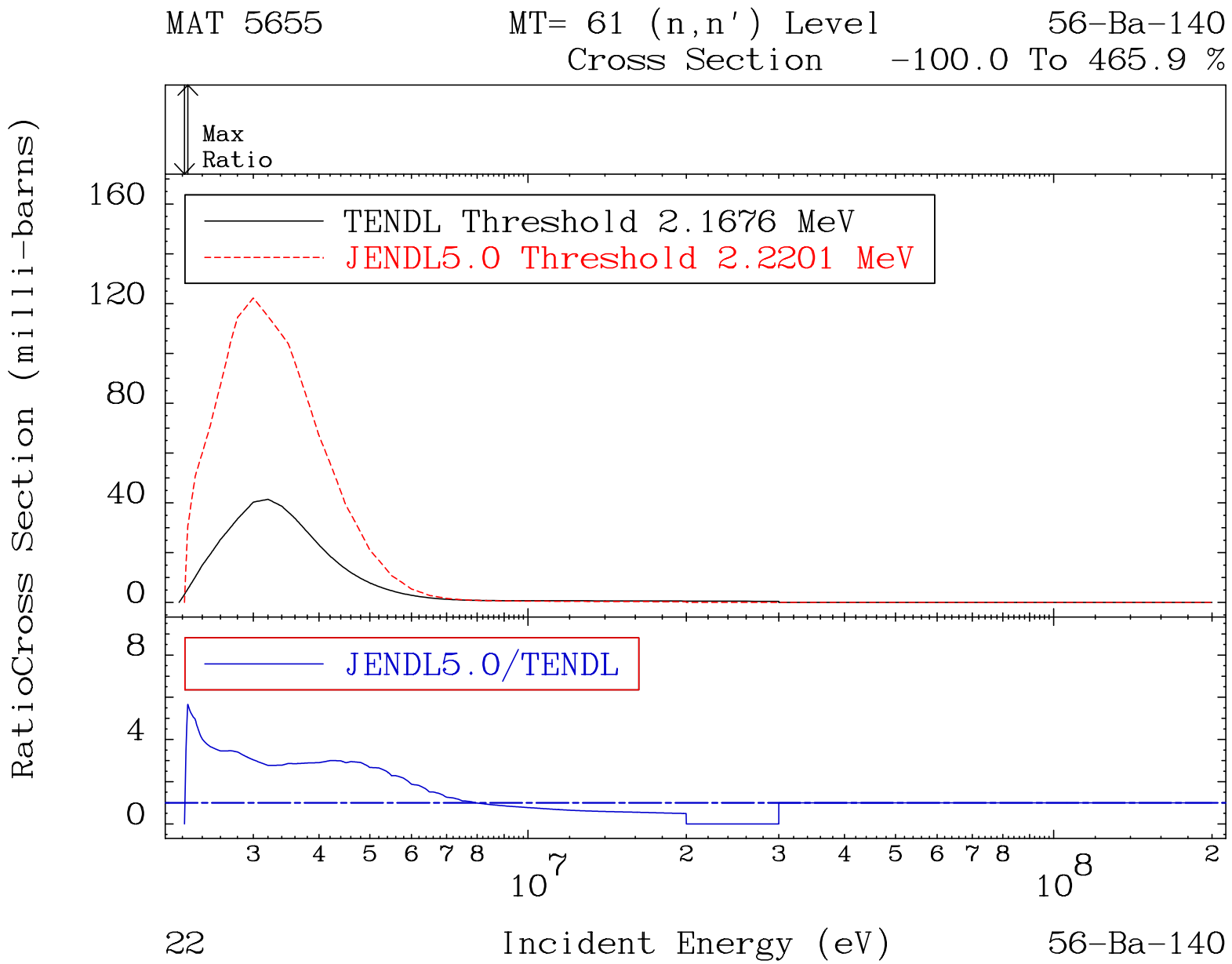

MAT 5655
MT= 56 (n,n') Level
56-Ba-140
Cross Section -100.0 To 9999. %
Max Ratio
Min Ratio
TENDL Threshold 1.8369 MeV
JENDL5.0 Threshold 1.8369 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
80
60
40
20
0
4
0
2 3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
17
Incident Energy (eV)
56-Ba-140

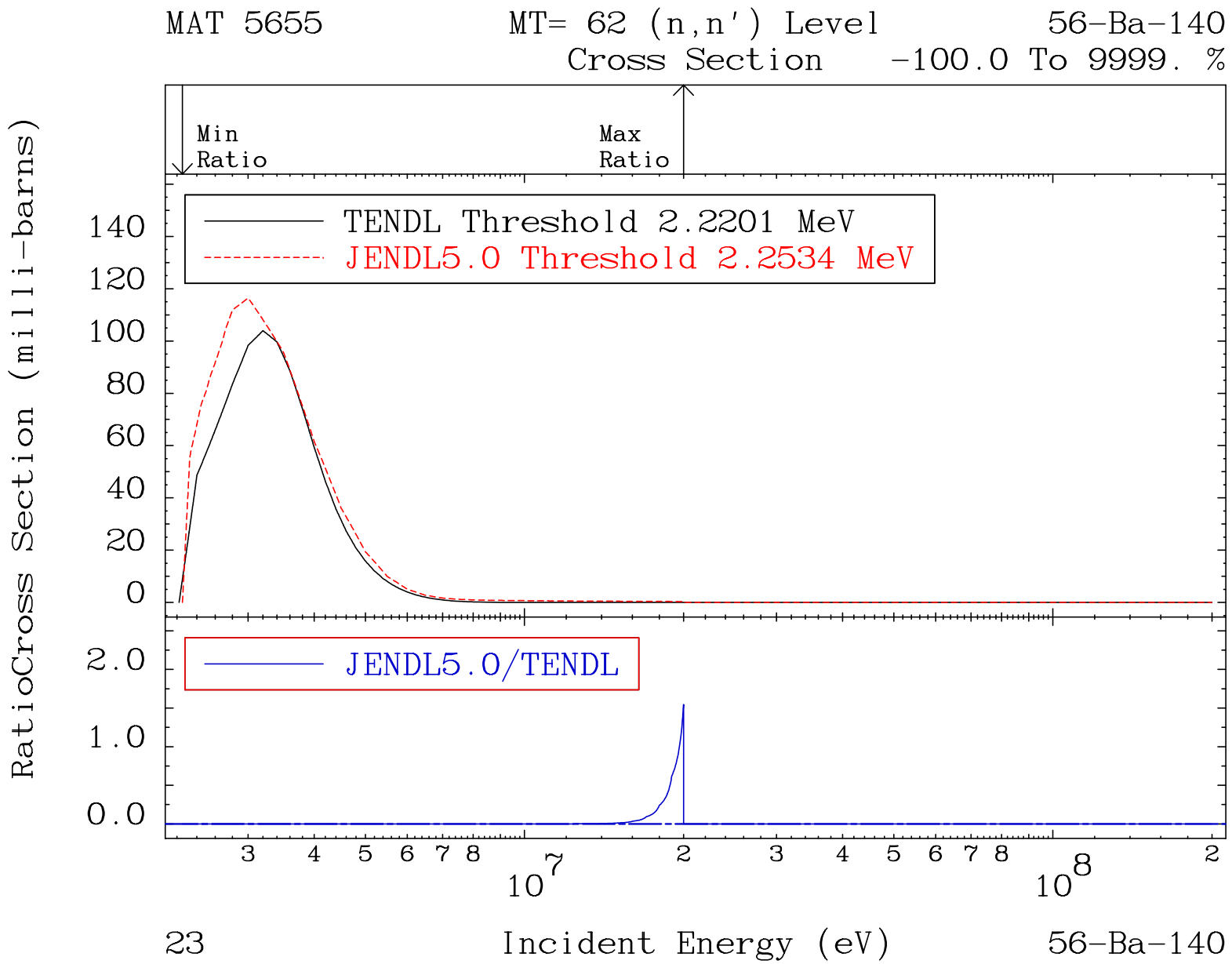

MAT 5655
MT= 57 (n,n') Level
56-Ba-140
Cross Section -100.0 To 9999. %
Max Ratio
Min Ratio
TENDL Threshold 1.9657 MeV
JENDL5.0 Threshold 1.9657 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
200
150
100
50
0
2.0
1.0
0.0
2 3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
18
Incident Energy (eV)
56-Ba-140

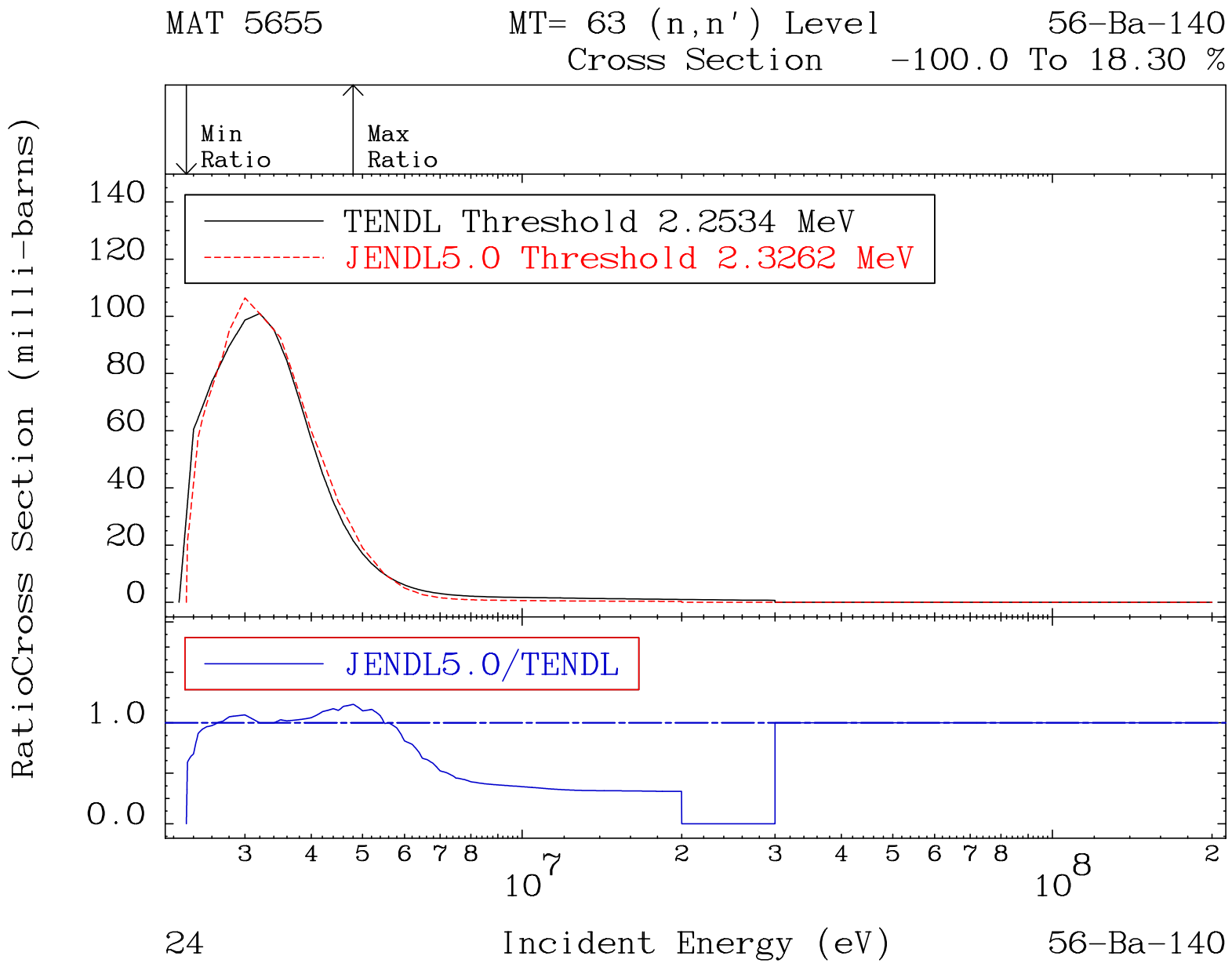

MAT 5655
MT= 58 (n,n') Level
56-Ba-140
Cross Section
-100.0 To 42.13 %
Max Ratio
Min Ratio
TENDL Threshold 2.0080 MeV
JENDL5.0 Threshold 2.0080 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
200
150
100
50
0
2.0
1.0
0.0
2 3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
19
Incident Energy (eV)
56-Ba-140

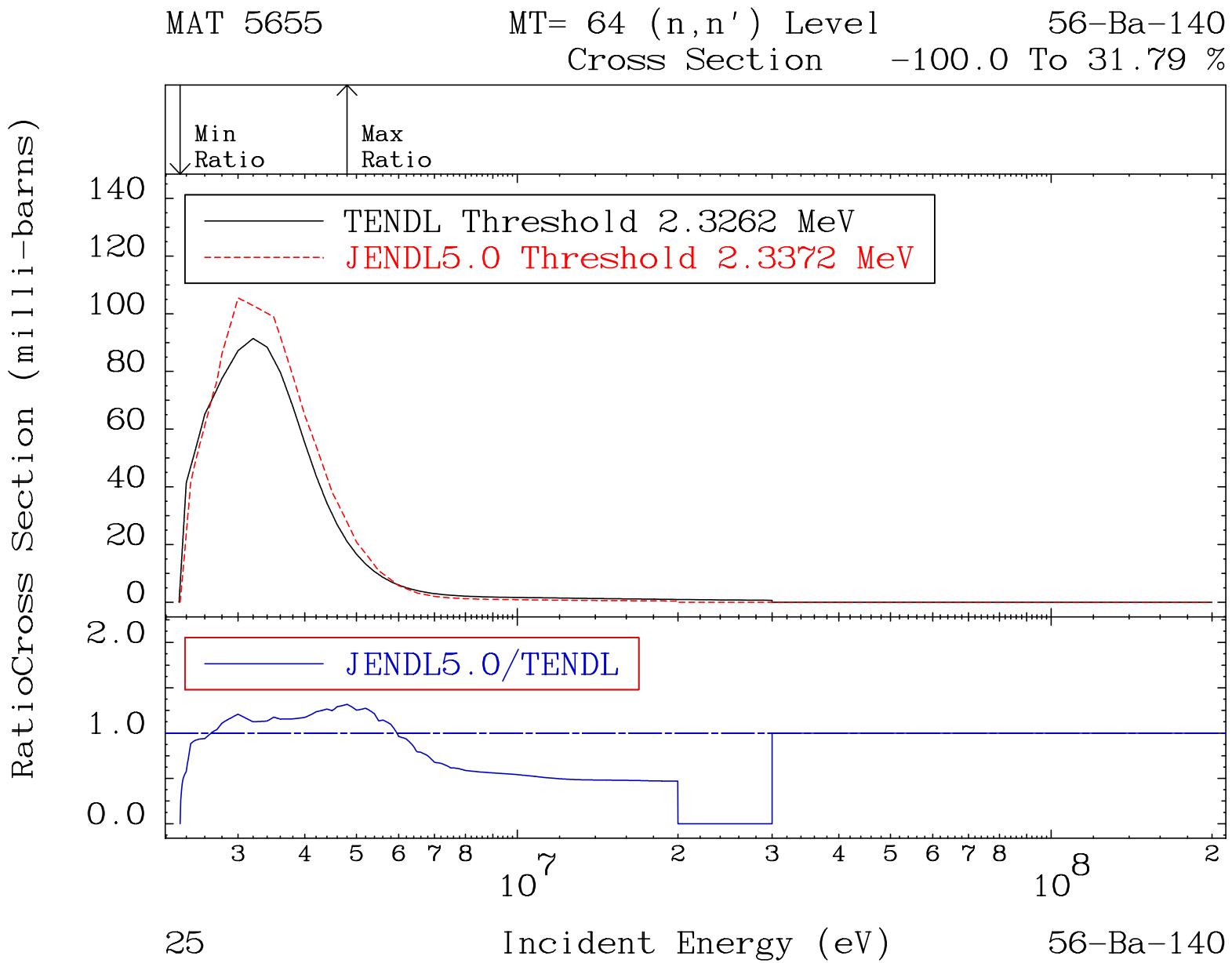

MAT 5655
MT= 59 (n,n') Level
56-Ba-140
Cross Section
-100.0 To 183.0 %
Min Ratio
Max Ratio
TENDL Threshold 2.0761 MeV
JENDL5.0 Threshold 2.1536 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
160
120
80
40
0
4
2
0
2 3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
20
Incident Energy (eV)
56-Ba-140

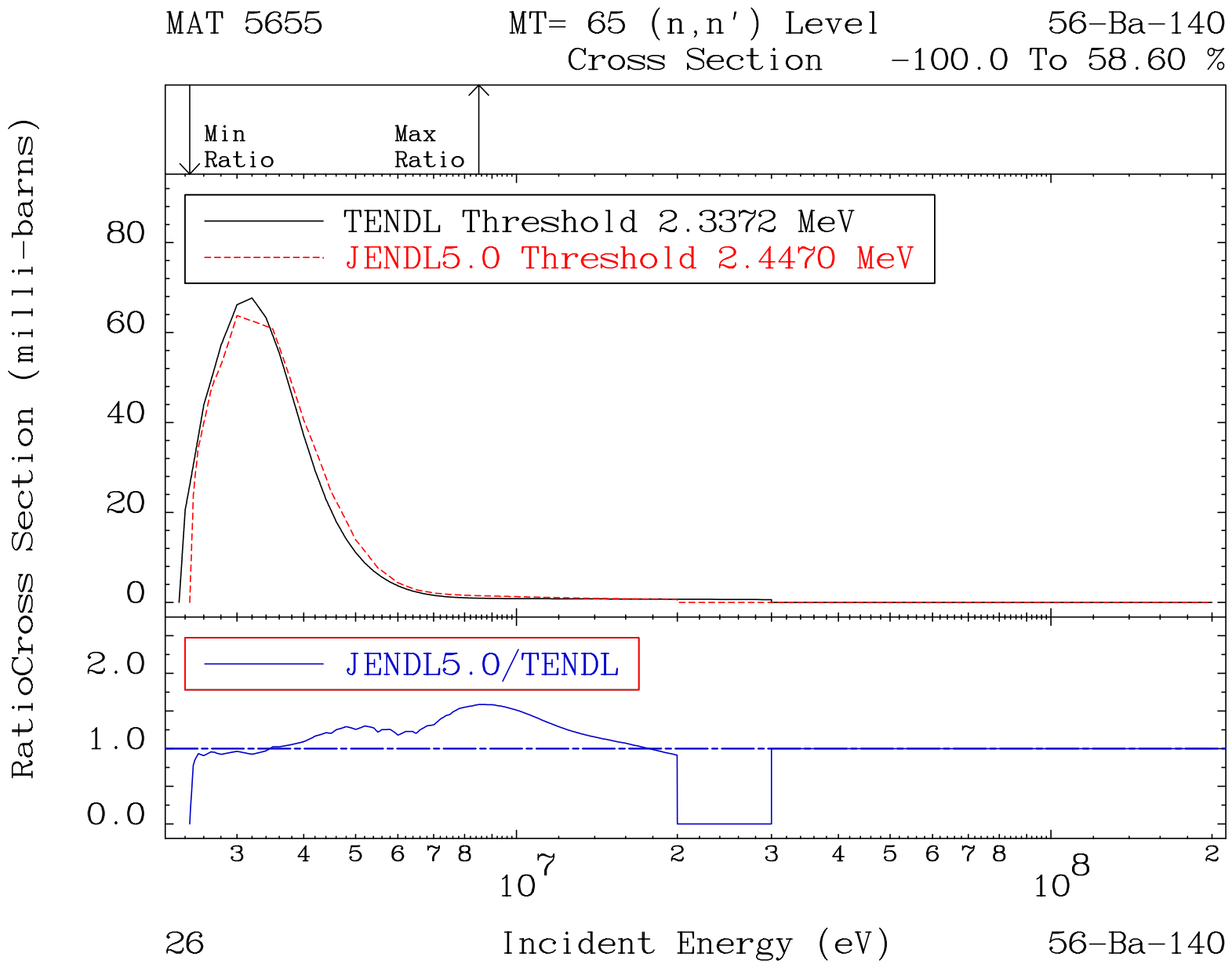

MAT 5655
MT= 60 (n,n') Level
56-Ba-140
Cross Section -100.0 To 9999. %
Min Ratio
Max Ratio
TENDL Threshold 2.1537 MeV
JENDL5.0 Threshold 2.1676 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
140
120
100
80
60
40
20
0
1.2
0.8
0.4
0.0
3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
21
Incident Energy (eV)
56-Ba-140

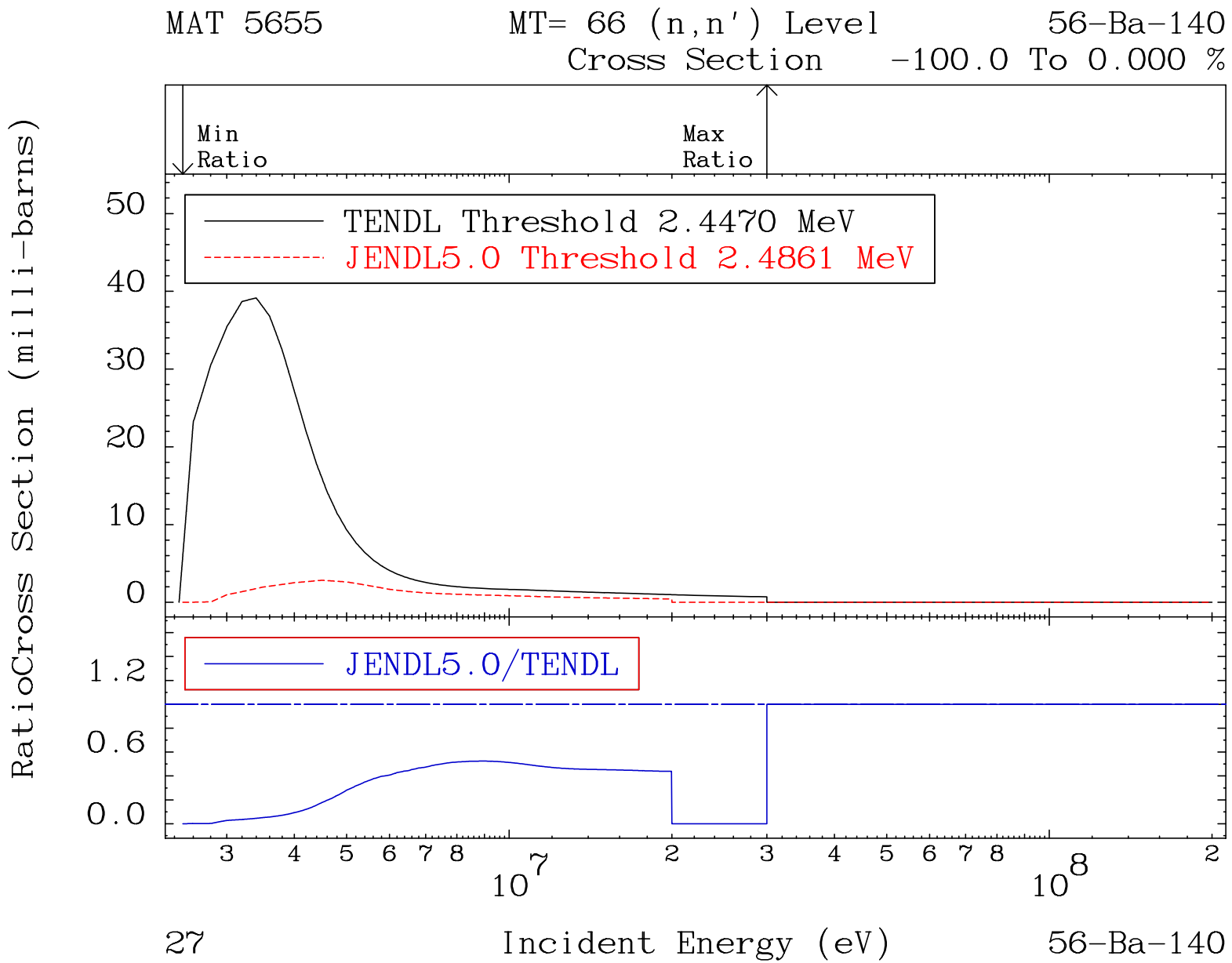

MAT 5655
MT= 61 (n,n') Level
56-Ba-140
Cross Section -100.0 To 465.9 %
Max
Ratio
160
120
80
40
0
TENDL Threshold 2.1676 MeV
JENDL5.0 Threshold 2.2201 MeV
8
4
0
JENDL5.0/TENDL
3 4 5 6 7 8 10^7 2 3 4 5 6 7 8 10^8 2
RatioCross Section (milli-barns)
22
Incident Energy (eV)
56-Ba-140

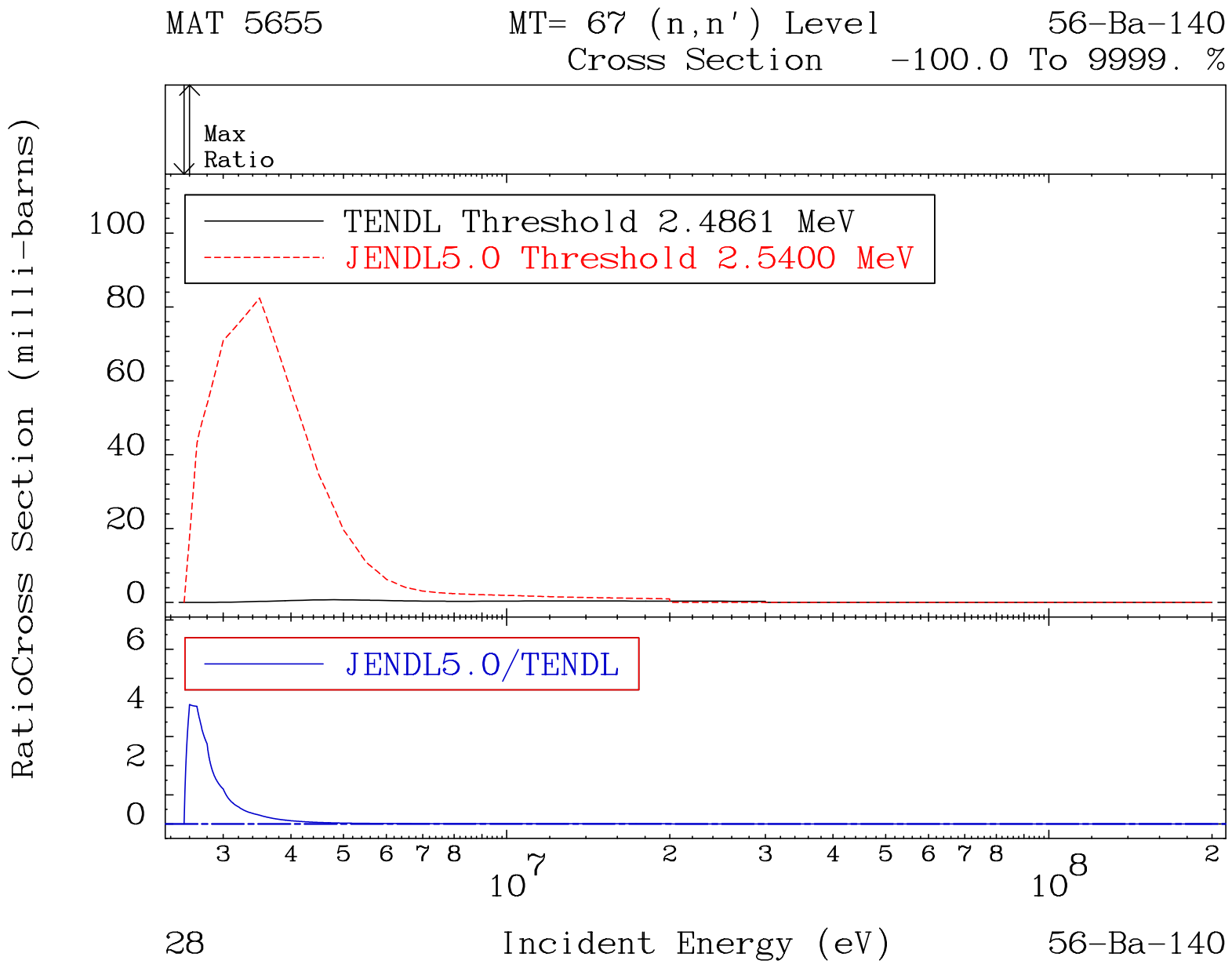

MAT 5655
MT= 62 (n,n') Level
56-Ba-140
Cross Section -100.0 To 9999. %
Min Ratio
Max Ratio
TENDL Threshold 2.2201 MeV
JENDL5.0 Threshold 2.2534 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
140
120
100
80
60
40
20
0
2.0
1.0
0.0
3 4 5 6 7 8 10^7 2 3 4 5 6 7 8 10^8 2
23
Incident Energy (eV)
56-Ba-140

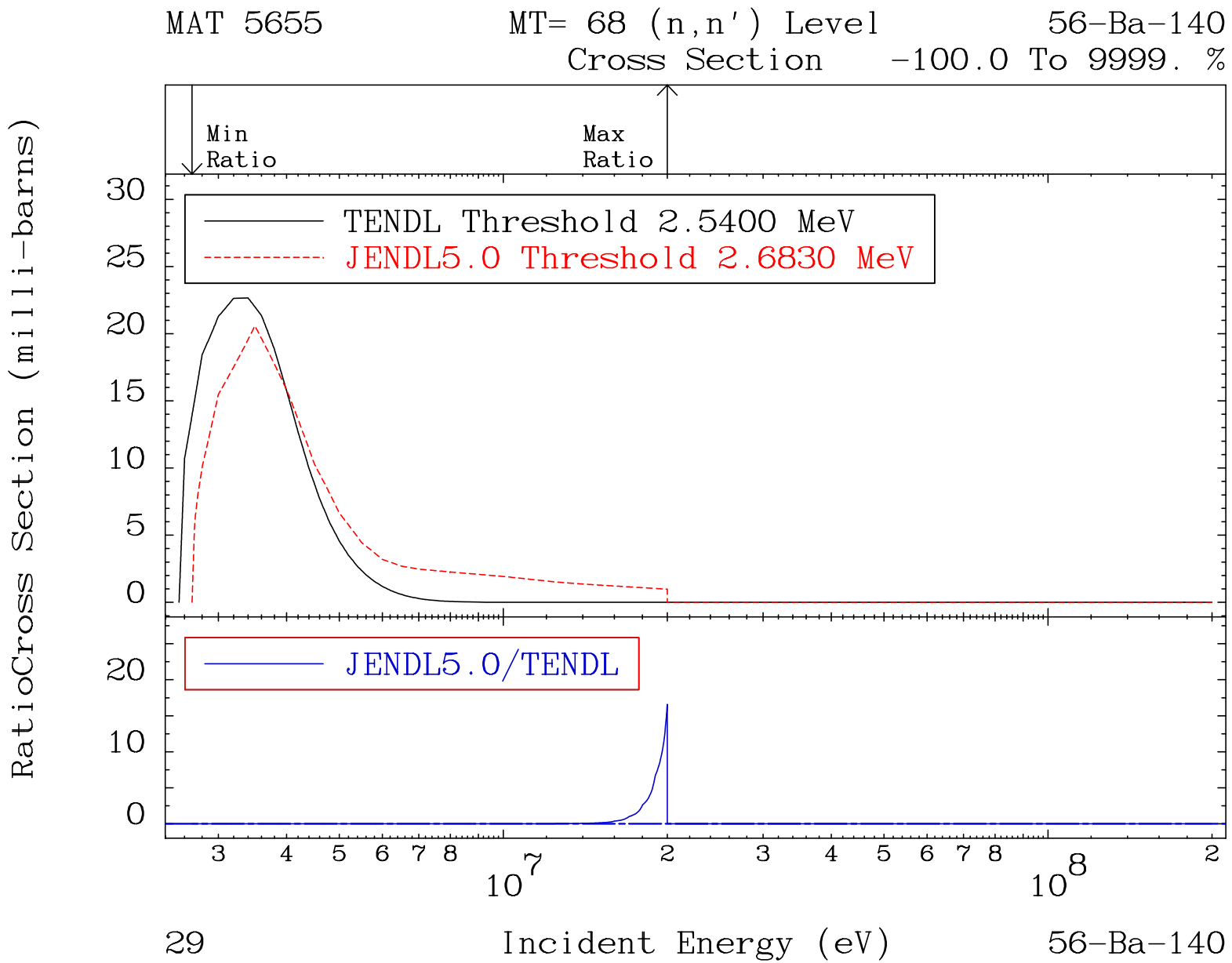

MAT 5655
MT= 63 (n,n') Level
56-Ba-140
Cross Section
-100.0 To 18.30 %
Min Ratio
Max Ratio
TENDL Threshold 2.2534 MeV
JENDL5.0 Threshold 2.3262 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
140
120
100
80
60
40
20
0
1.0
0.0
3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
24
Incident Energy (eV)
56-Ba-140

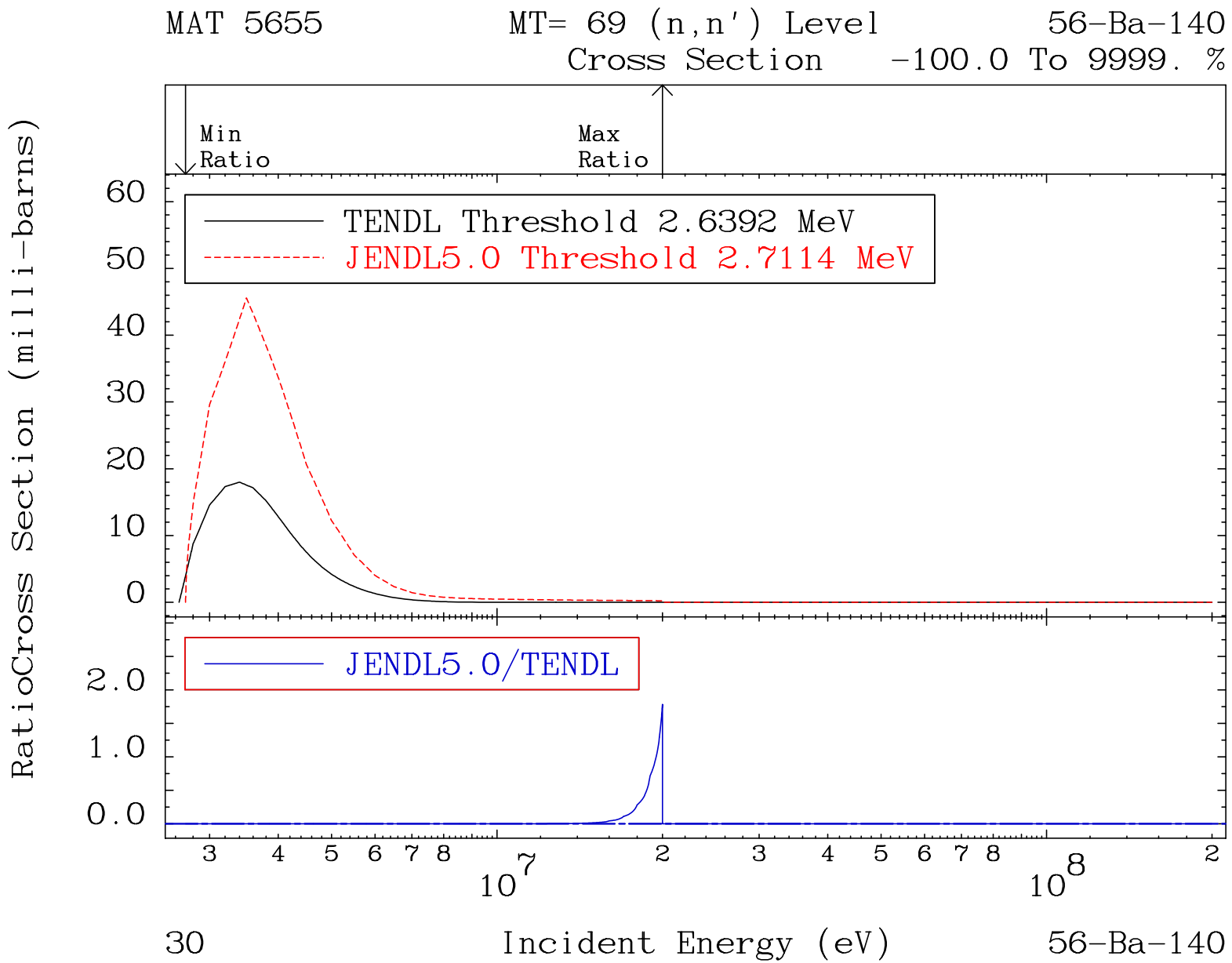

MAT 5655
MT= 64 (n,n') Level
56-Ba-140
Cross Section
-100.0 To 31.79 %
Min Ratio
Max Ratio
TENDL Threshold 2.3262 MeV
JENDL5.0 Threshold 2.3372 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
140
120
100
80
60
40
20
0
2.0
1.0
0.0
3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
25
Incident Energy (eV)
56-Ba-140

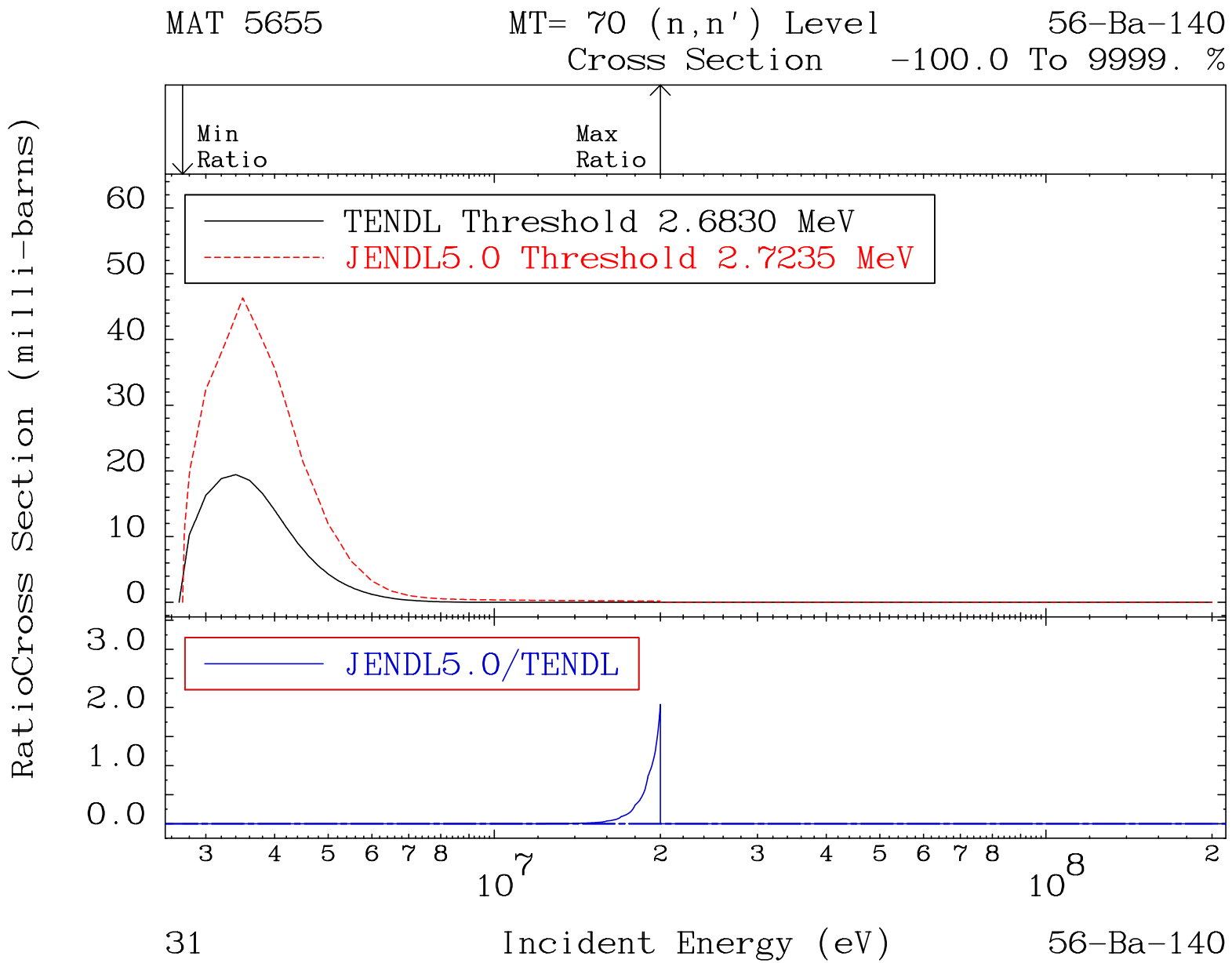

MAT 5655
MT= 65 (n,n') Level
56-Ba-140
Cross Section
-100.0 To 58.60 %
Min Ratio
Max Ratio
TENDL Threshold 2.3372 MeV
JENDL5.0 Threshold 2.4470 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
80
60
40
20
0
2.0
1.0
0.0
3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
26
Incident Energy (eV)
56-Ba-140

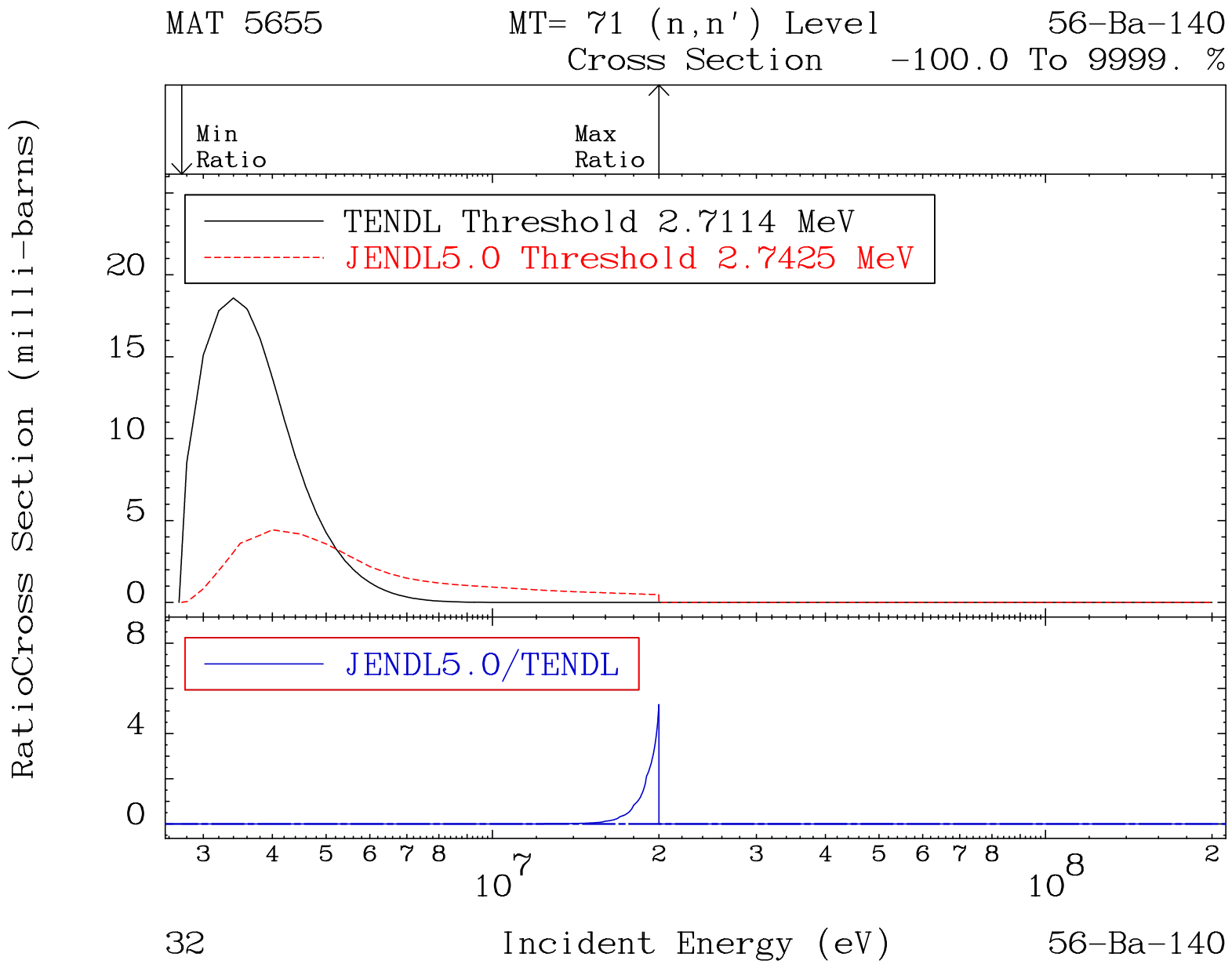

MAT 5655
MT= 66 (n,n') Level
56-Ba-140
Cross Section
-100.0 To 0.000 %
Min Ratio
Max Ratio
TENDL Threshold 2.4470 MeV
JENDL5.0 Threshold 2.4861 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
50
40
30
20
10
0
1.2
0.6
0.0
3 4 5 6 7 8 10^7 2 3 4 5 6 7 8 10^8 2
27
Incident Energy (eV)
56-Ba-140

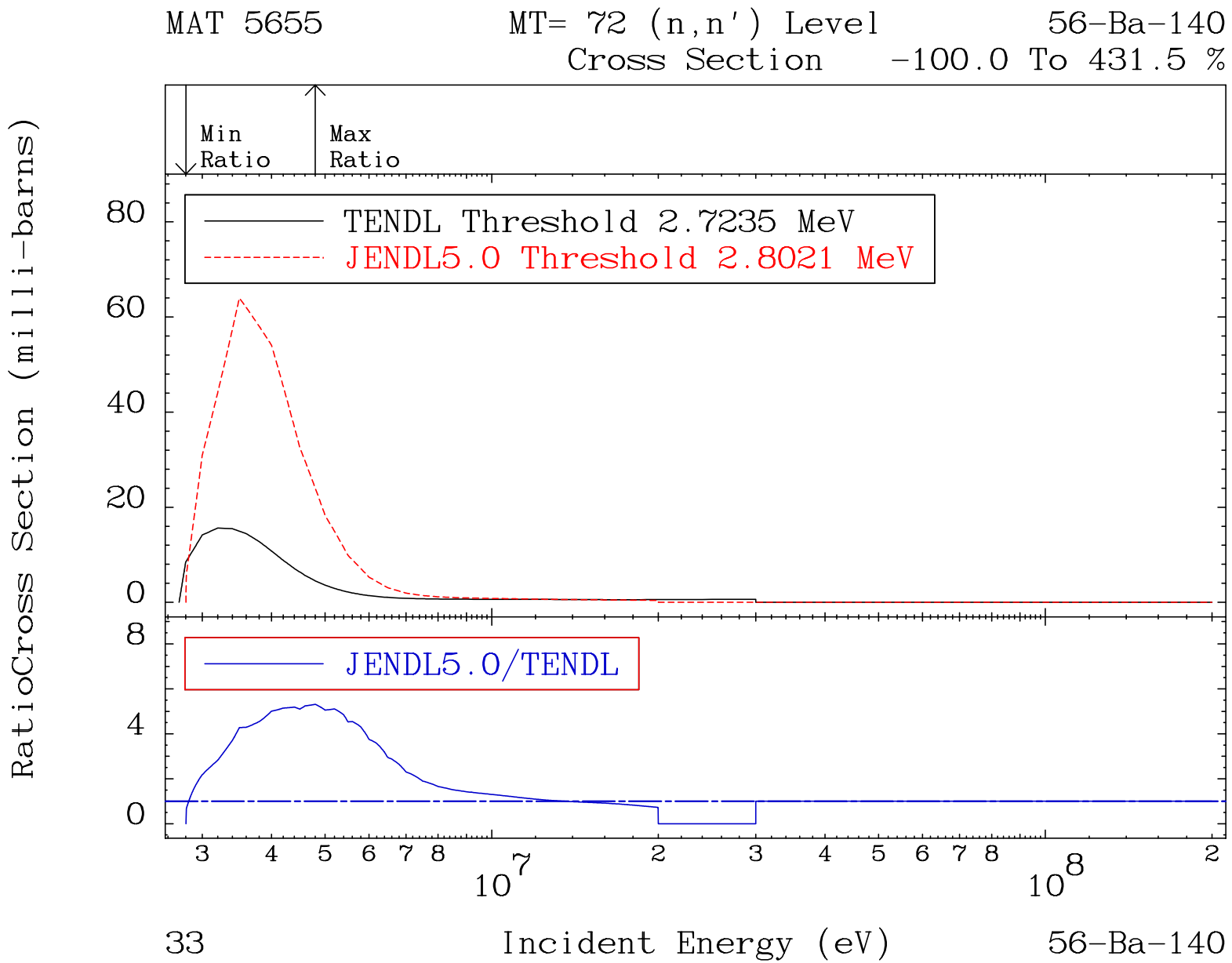

MAT 5655
MT= 67 (n,n') Level
56-Ba-140
Cross Section -100.0 To 9999. %
Max
Ratio
TENDL Threshold 2.4861 MeV
JENDL5.0 Threshold 2.5400 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
100
80
60
40
20
0
6
4
2
0
3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
28
Incident Energy (eV)
56-Ba-140

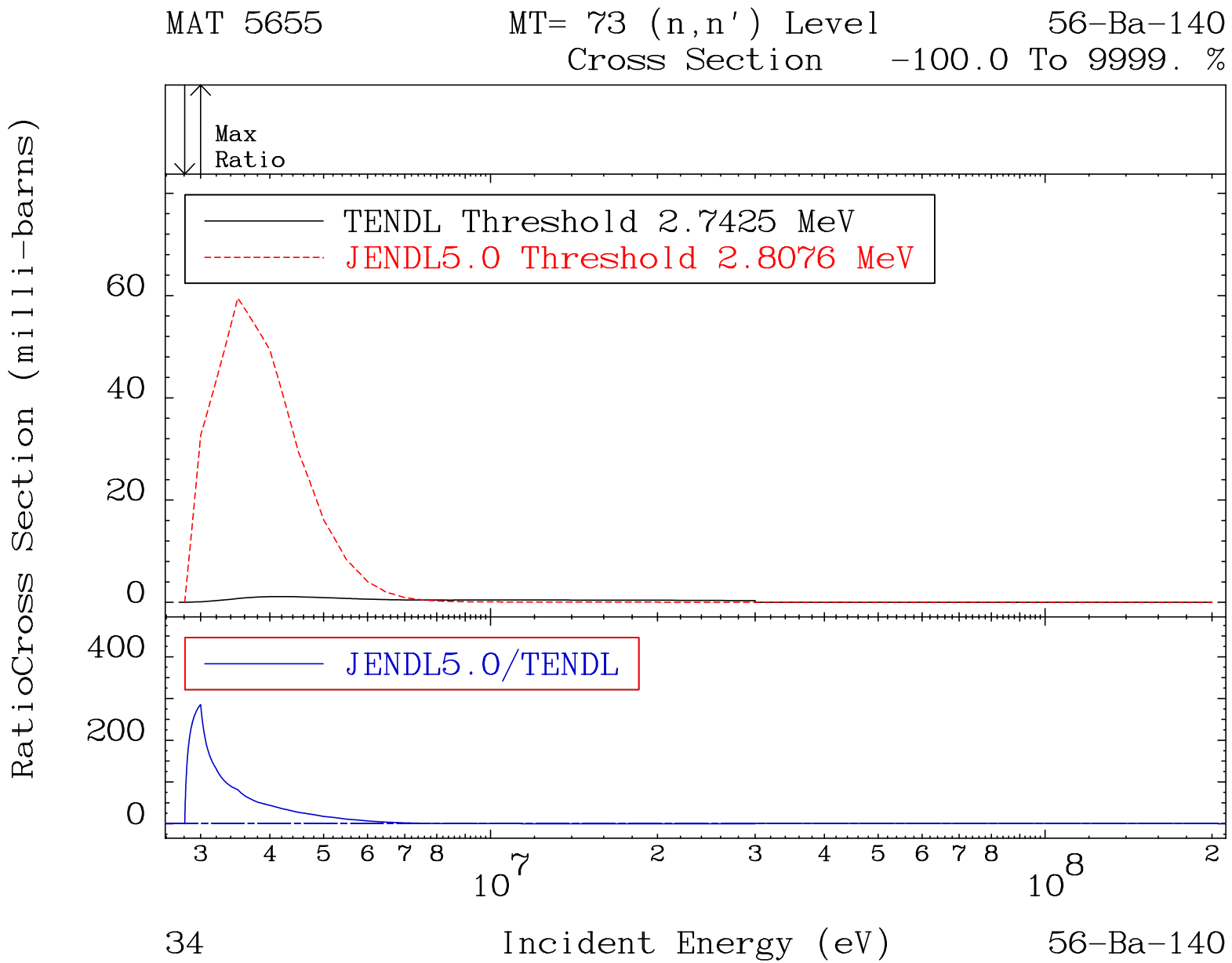

MAT 5655
MT= 68 (n,n') Level
56-Ba-140
Cross Section -100.0 To 9999. %
Min Ratio
Max Ratio
TENDL Threshold 2.5400 MeV
JENDL5.0 Threshold 2.6830 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
29
56-Ba-140

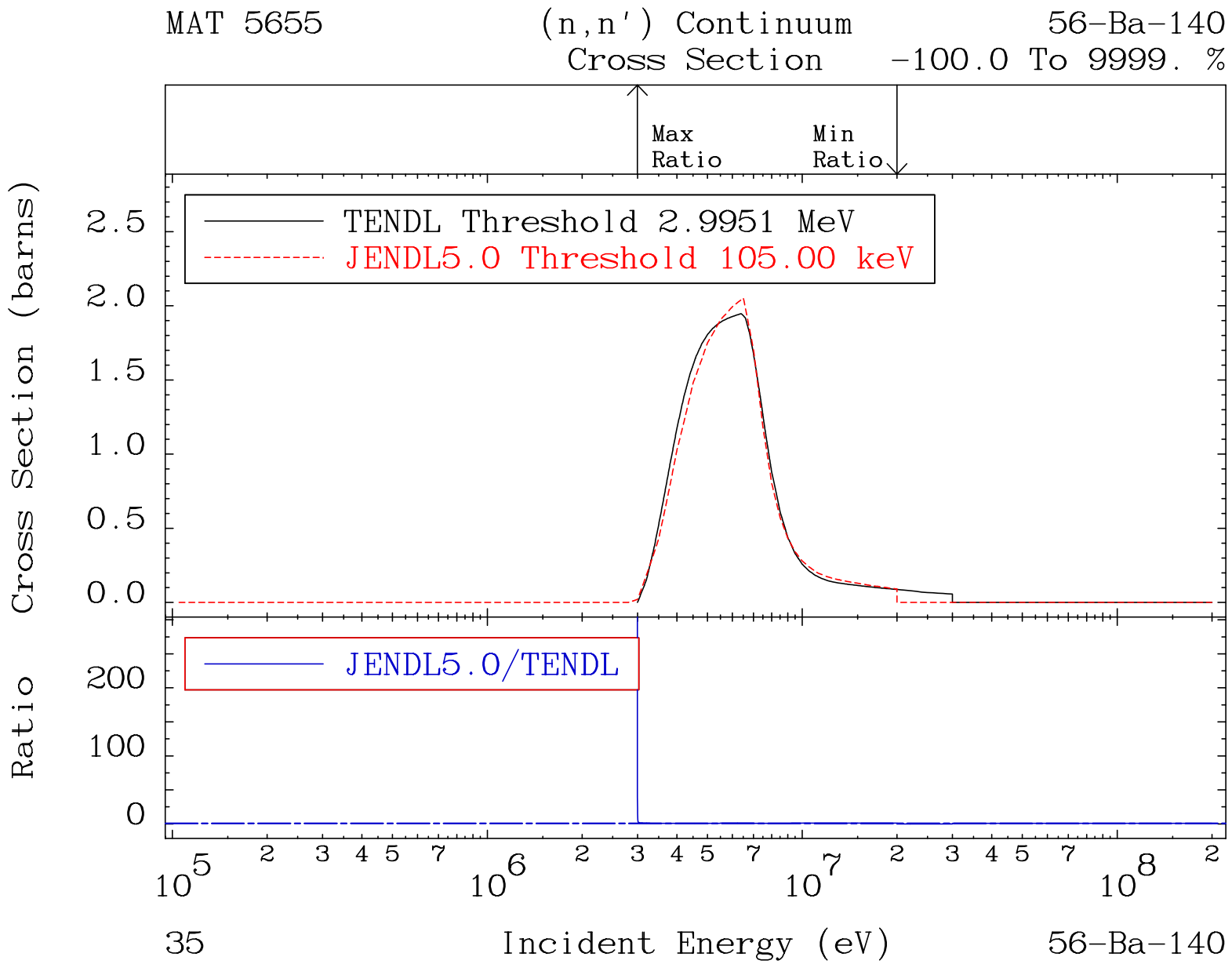

MAT 5655
MT= 69 (n,n') Level
56-Ba-140
Cross Section -100.0 To 9999. %
Min Ratio
Max Ratio
TENDL Threshold 2.6392 MeV
JENDL5.0 Threshold 2.7114 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
60
50
40
30
20
10
0
2.0
1.0
0.0
3 4 5 6 7 8 10^7 2 3 4 5 6 7 8 10^8 2
30
Incident Energy (eV)
56-Ba-140

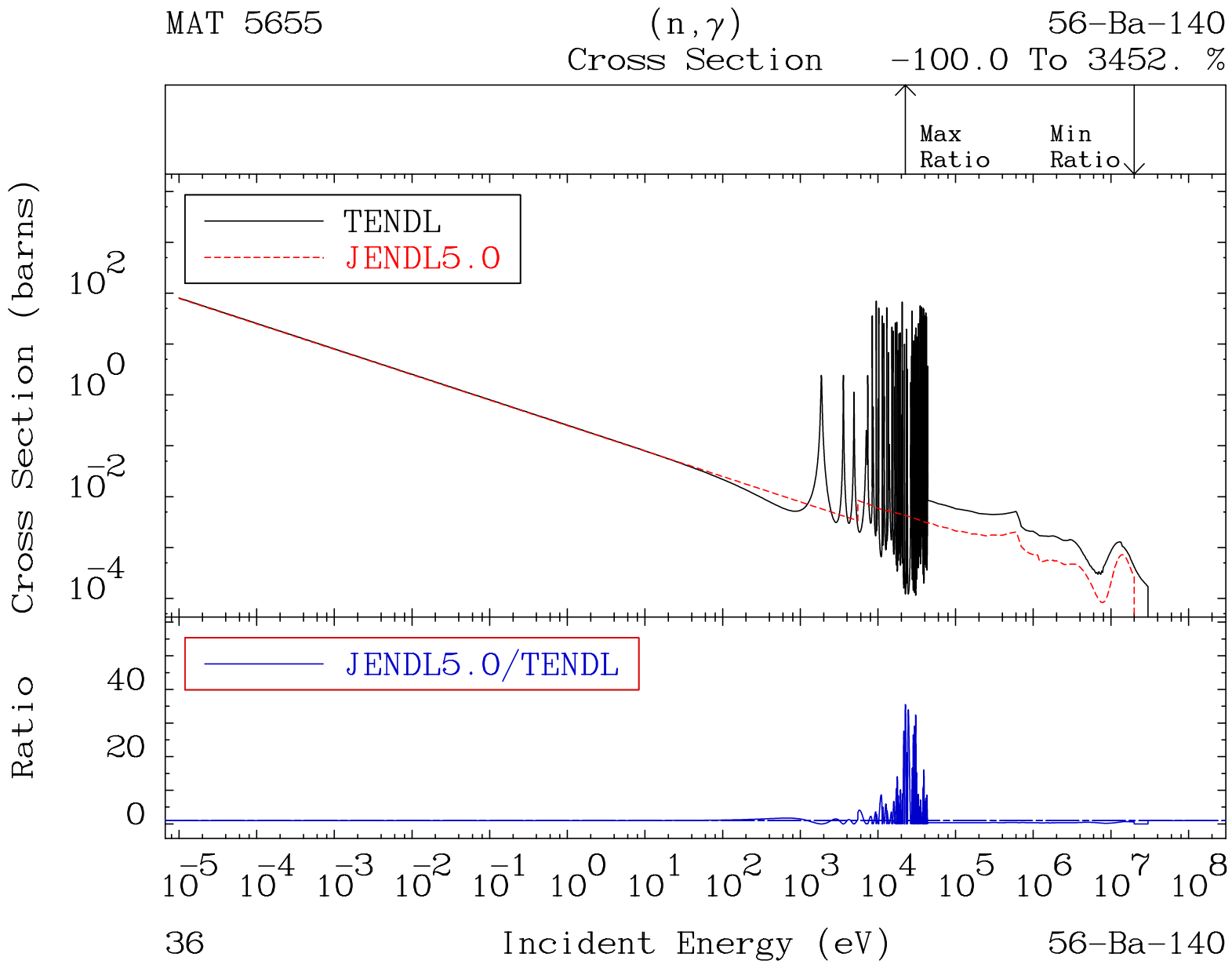

MAT 5655
MT= 70 (n,n') Level
56-Ba-140
Cross Section -100.0 To 9999. %
Min Ratio
Max Ratio
TENDL Threshold 2.6830 MeV
JENDL5.0 Threshold 2.7235 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
31
56-Ba-140

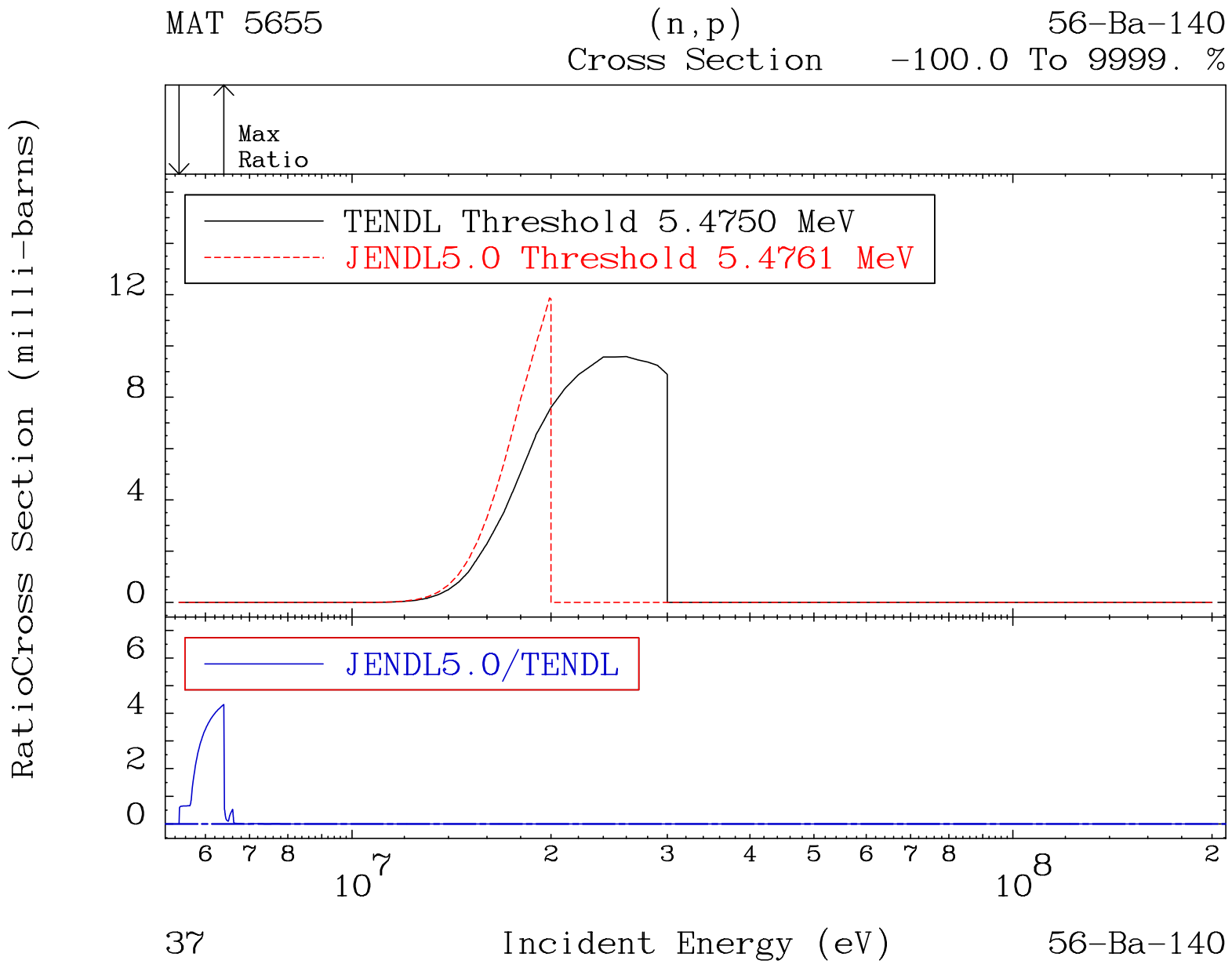

MAT 5655
MT= 71 (n,n') Level
56-Ba-140
Cross Section -100.0 To 9999. %
Min Ratio
Max Ratio
TENDL Threshold 2.7114 MeV
JENDL5.0 Threshold 2.7425 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
32
56-Ba-140

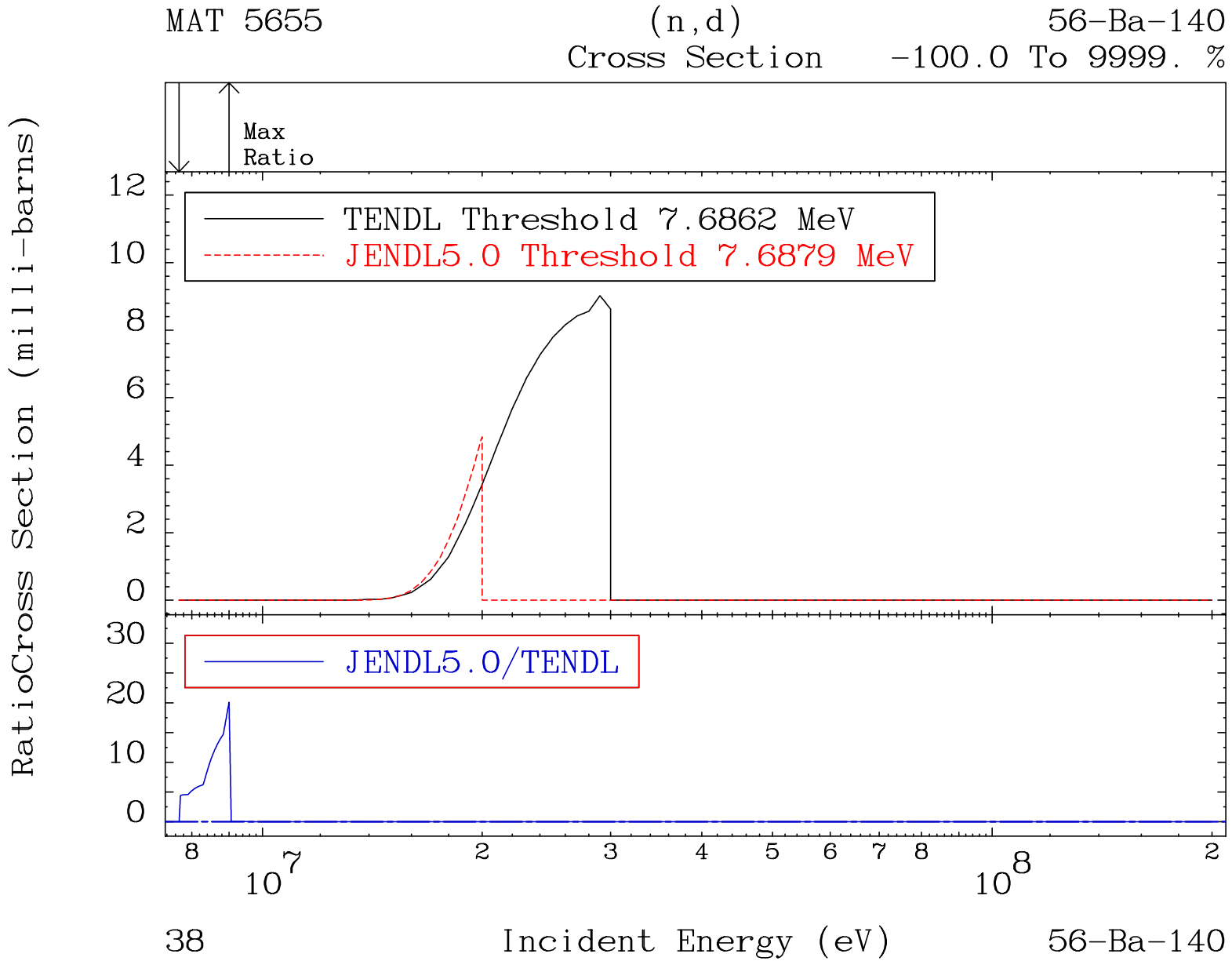

MAT 5655
MT= 72 (n,n') Level
56-Ba-140
Cross Section
-100.0 To 431.5 %
Min Ratio
Max Ratio
TENDL Threshold 2.7235 MeV
JENDL5.0 Threshold 2.8021 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
80
60
40
20
0
8
4
0
3 4 5 6 7 8 10^7 2 3 4 5 6 7 8 10^8 2
33
Incident Energy (eV)
56-Ba-140

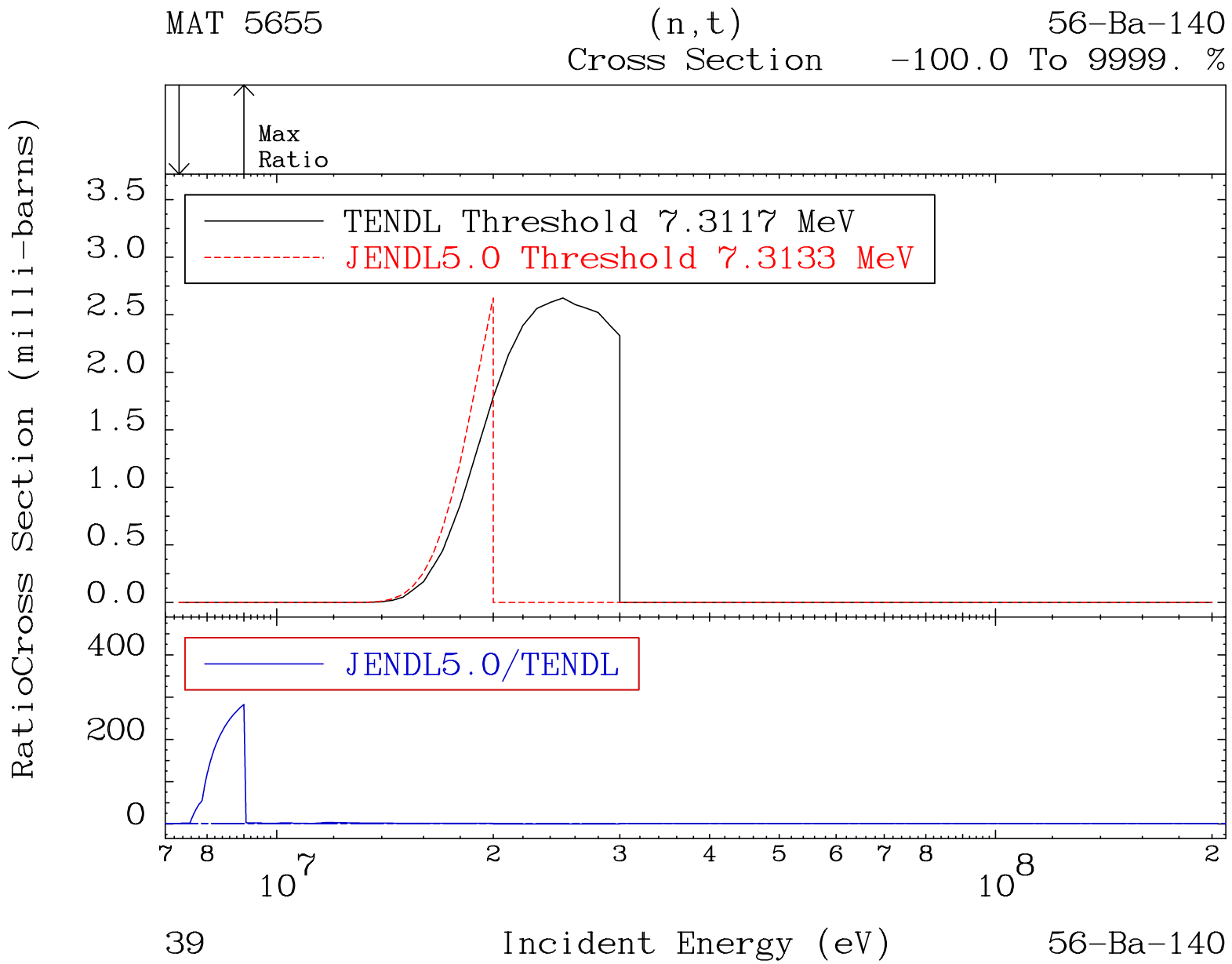

MAT 5655
MT= 73 (n,n') Level
56-Ba-140
Cross Section -100.0 To 9999. %
Max
Ratio
TENDL Threshold 2.7425 MeV
JENDL5.0 Threshold 2.8076 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
60
40
20
0
400
200
0
3 4 5 6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
34
Incident Energy (eV)
56-Ba-140

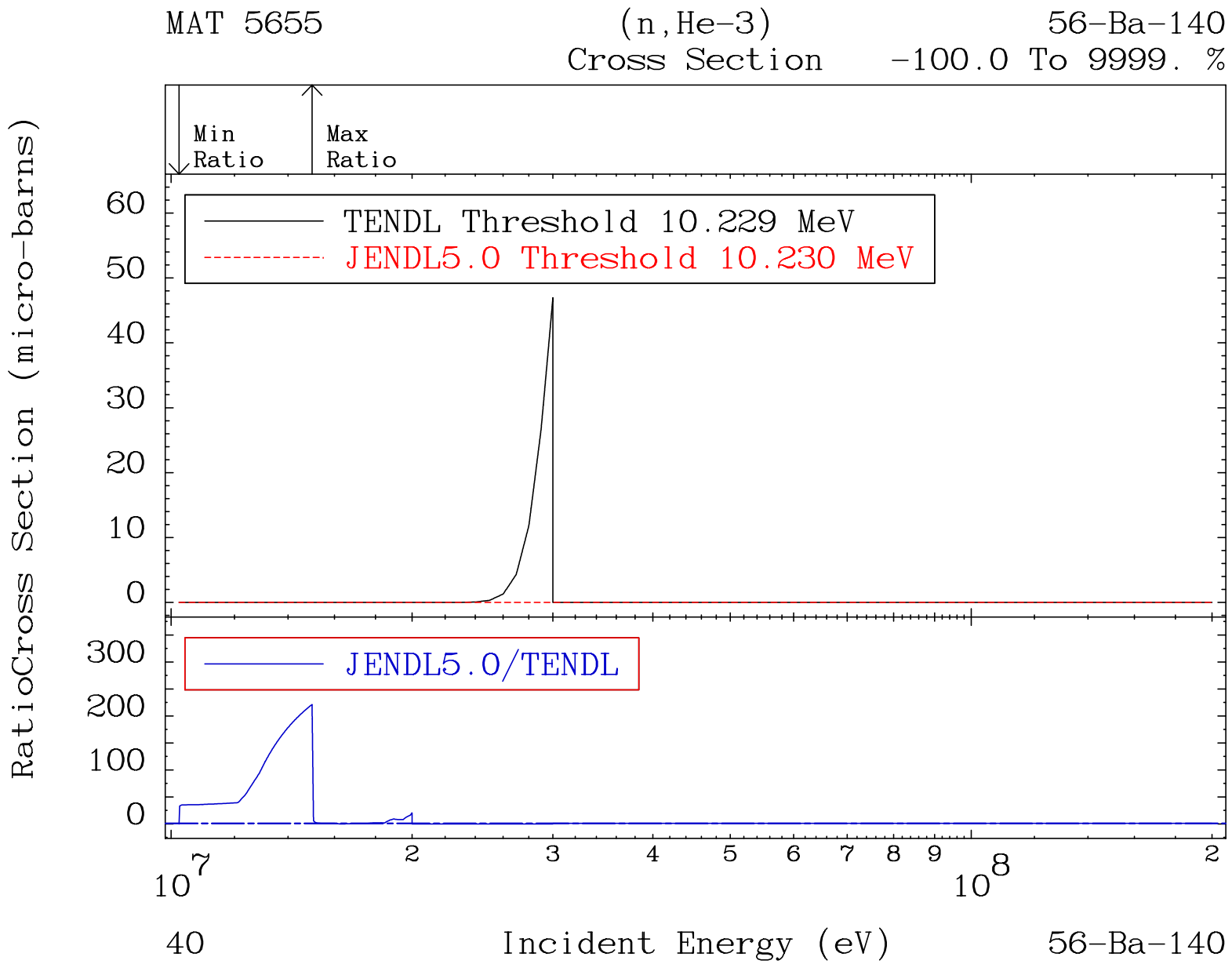

MAT 5655
(n,n') Continuum
Cross Section
56-Ba-140
-100.0 To 9999. %
Max Ratio
Min Ratio
TENDL Threshold 2.9951 MeV
JENDL5.0 Threshold 105.00 keV
JENDL5.0/TENDL
Cross Section (barns)
Ratio
2.5
2.0
1.5
1.0
0.5
0.0
200
100
0
10^5
10^6
10^7
10^8
Incident Energy (eV)
35
56-Ba-140

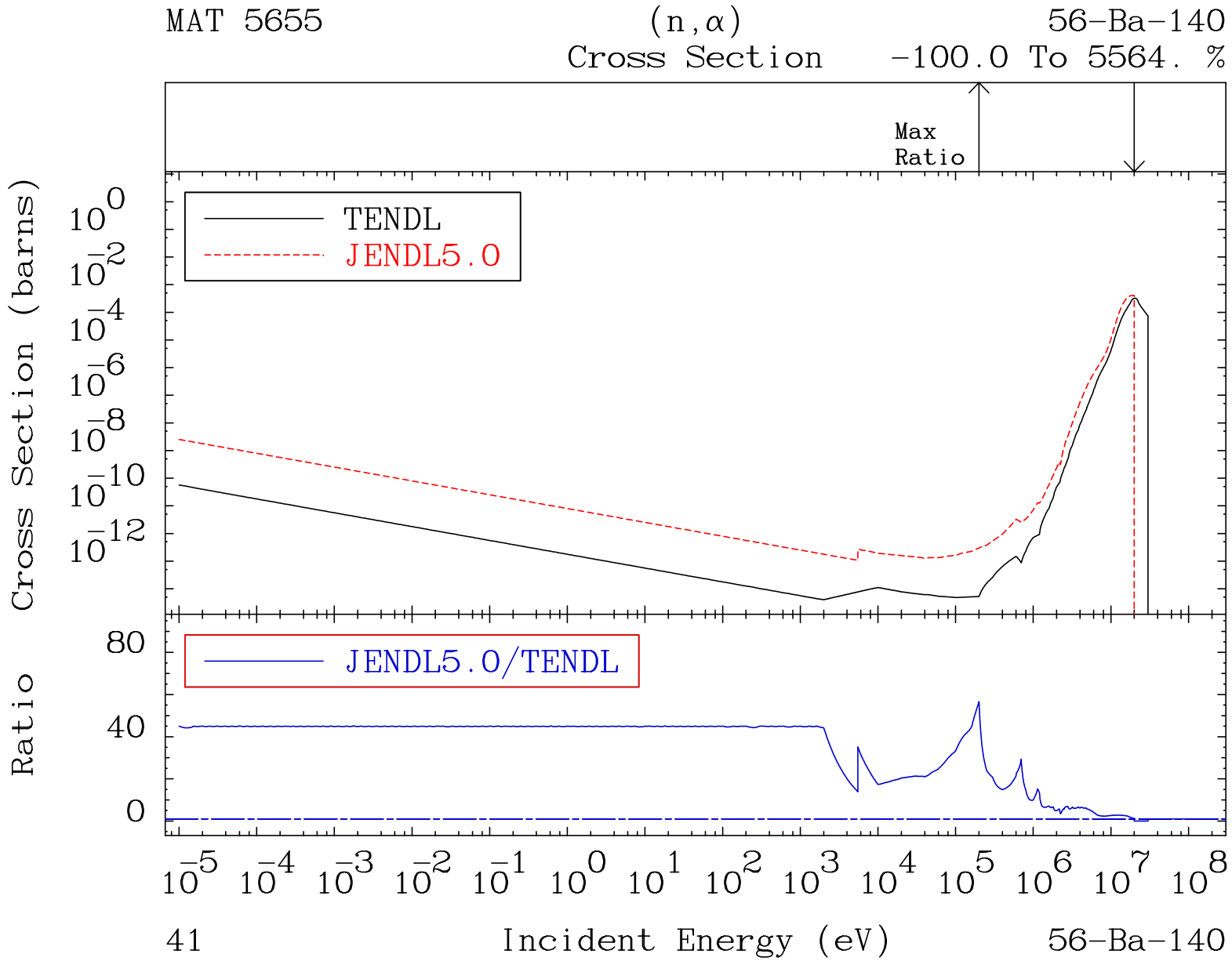

MAT 5655
(n,γ)
Cross Section
56-Ba-140
-100.0 To 3452. %
Max Ratio
Min Ratio
TENDL
JENDL5.0
Cross Section (barns)
10^2
10^0
10^-2
10^-4
JENDL5.0/TENDL
Ratio
40
20
0
10^-5 10^-4 10^-3 10^-2 10^-1 10^0 10^1 10^2 10^3 10^4 10^5 10^6 10^7 10^8
36
Incident Energy (eV)
56-Ba-140

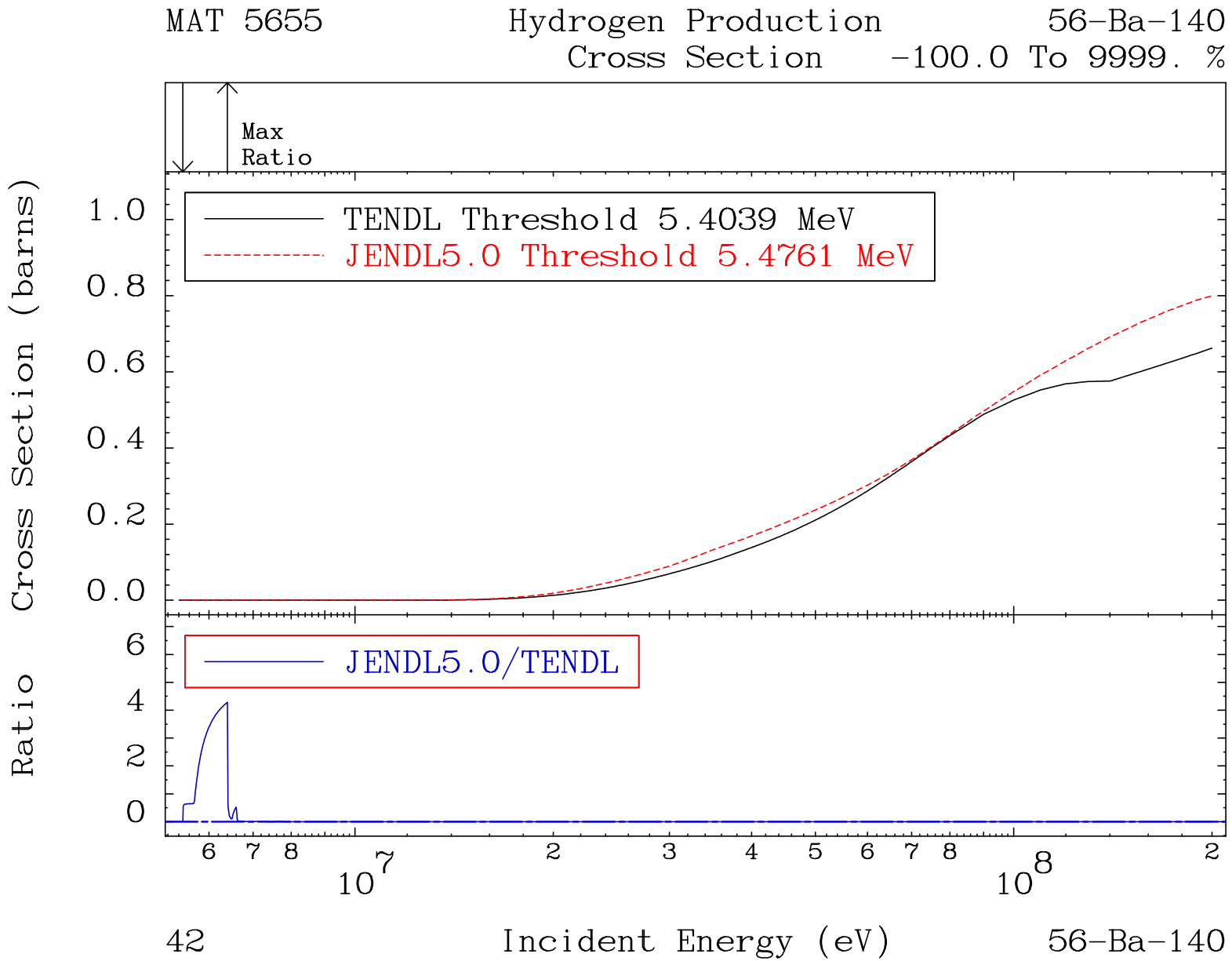

MAT 5655
(n,p)
56-Ba-140
Cross Section
-100.0 To 9999. %
Max
Ratio
TENDL Threshold 5.4750 MeV
JENDL5.0 Threshold 5.4761 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
12
8
4
0
6
4
2
0
6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
37
Incident Energy (eV)
56-Ba-140

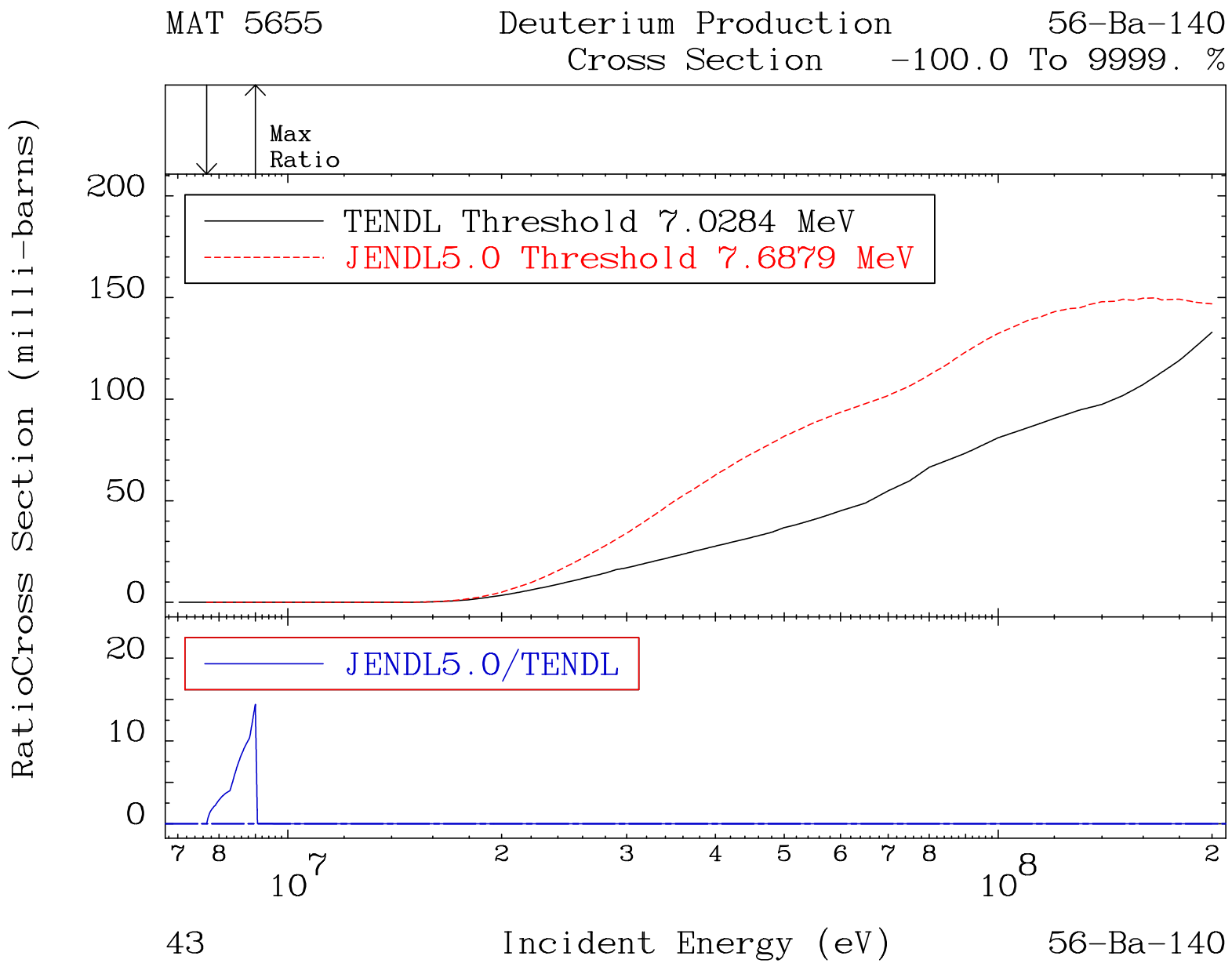

MAT 5655
(n,d)
56-Ba-140
Cross Section
-100.0 To 9999. %
Max
Ratio
TENDL Threshold 7.6862 MeV
JENDL5.0 Threshold 7.6879 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
12
10
8
6
4
2
0
30
20
10
0
8
10^7
2
3
4
5
6
7
8
10^8
2
38
Incident Energy (eV)
56-Ba-140

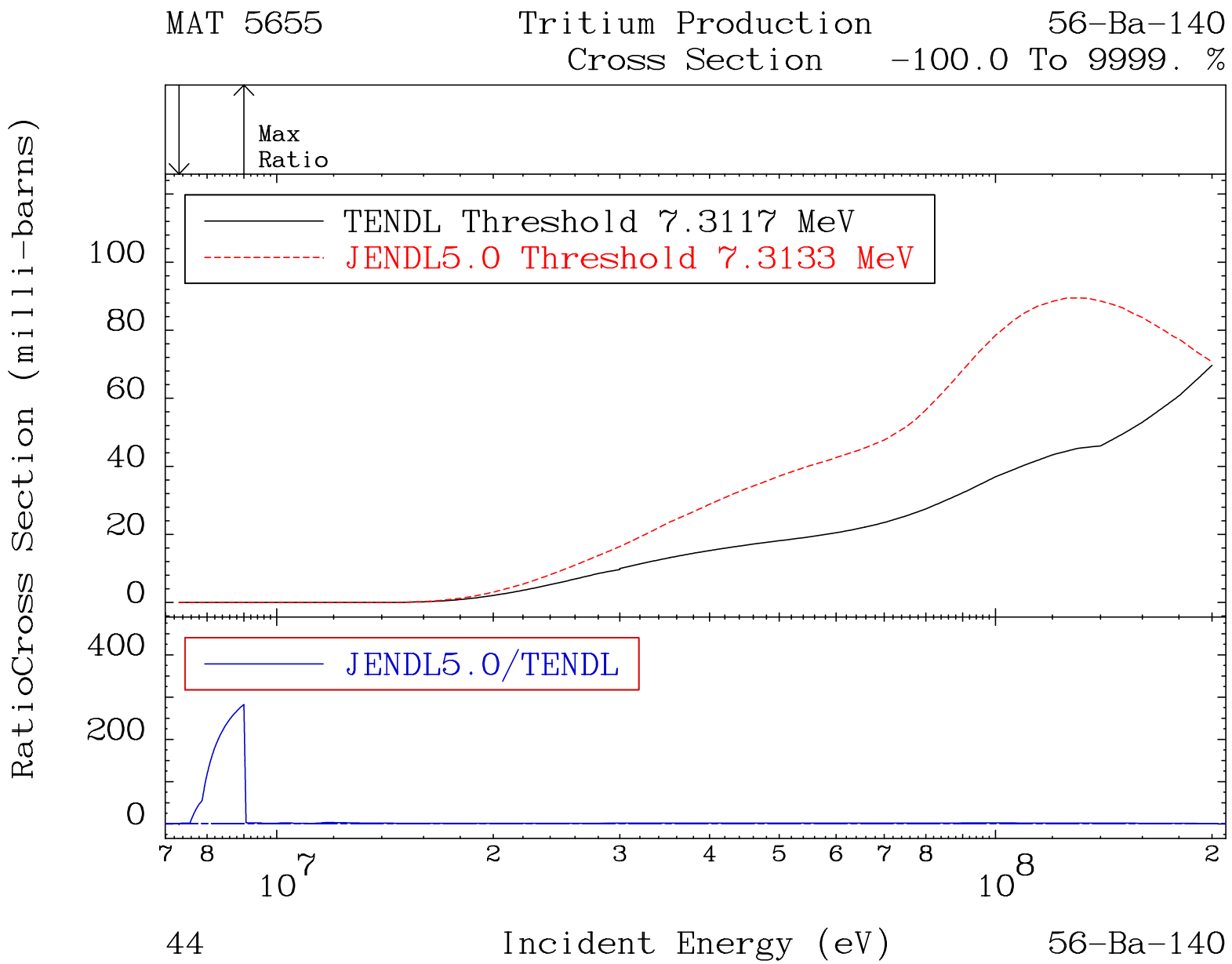

MAT 5655
(n,t)
Cross Section
56-Ba-140
-100.0 To 9999. %
Max
Ratio
TENDL Threshold 7.3117 MeV
JENDL5.0 Threshold 7.3133 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
3.5
3.0
2.5
2.0
1.5
1.0
0.5
0.0
400
200
0
7 8 10^7 2 3 4 5 6 7 8 10^8 2
39
Incident Energy (eV)
56-Ba-140

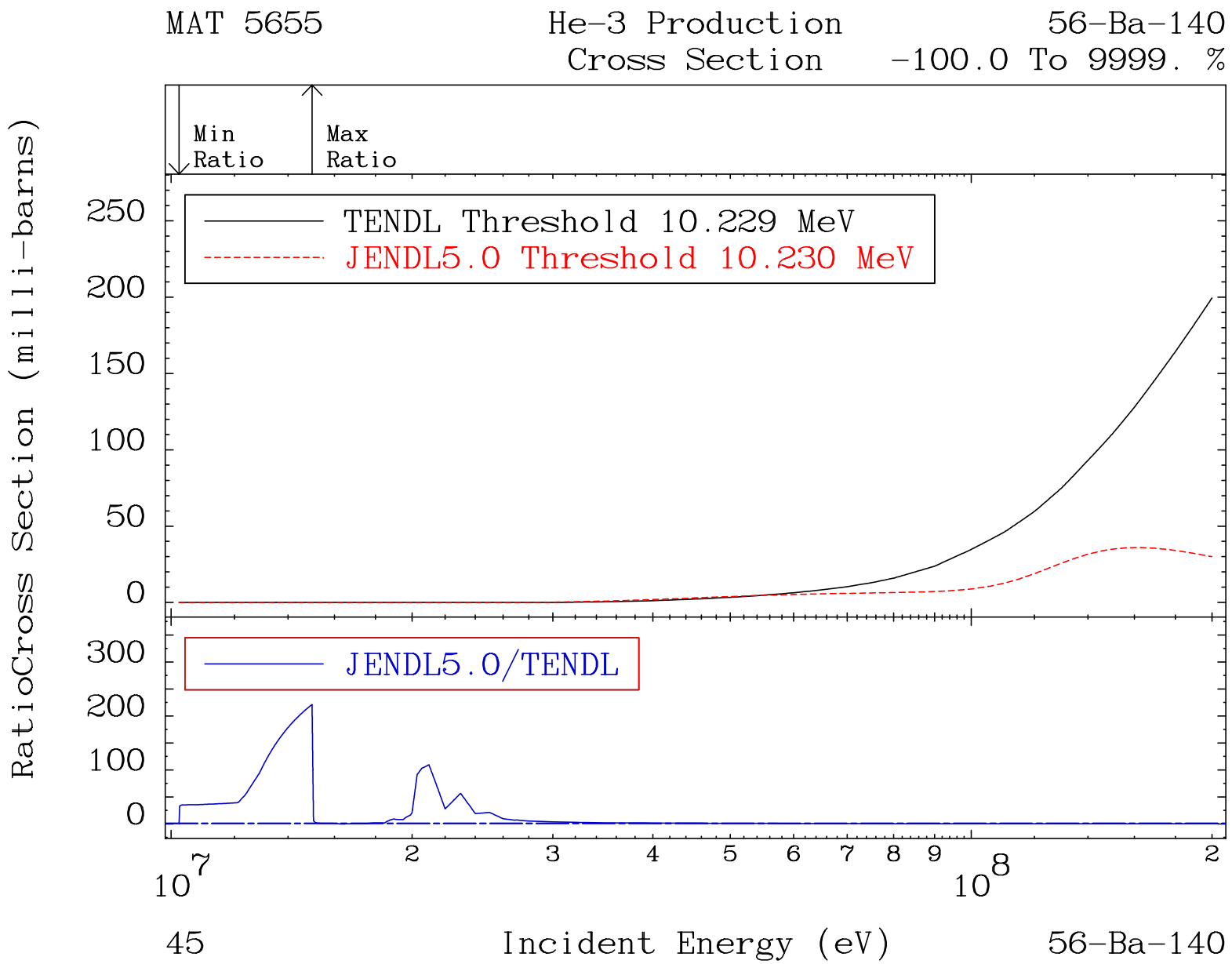

MAT 5655
(n,He-3)
56-Ba-140
Cross Section
-100.0 To 9999. %
Min Ratio
Max Ratio
TENDL Threshold 10.229 MeV
JENDL5.0 Threshold 10.230 MeV
JENDL5.0/TENDL
RatioCross Section (micro-barns)
60
50
40
30
20
10
0
300
200
100
0
10^7
2
3
4
5
6
7
8
9
10^8
2
40
Incident Energy (eV)
56-Ba-140

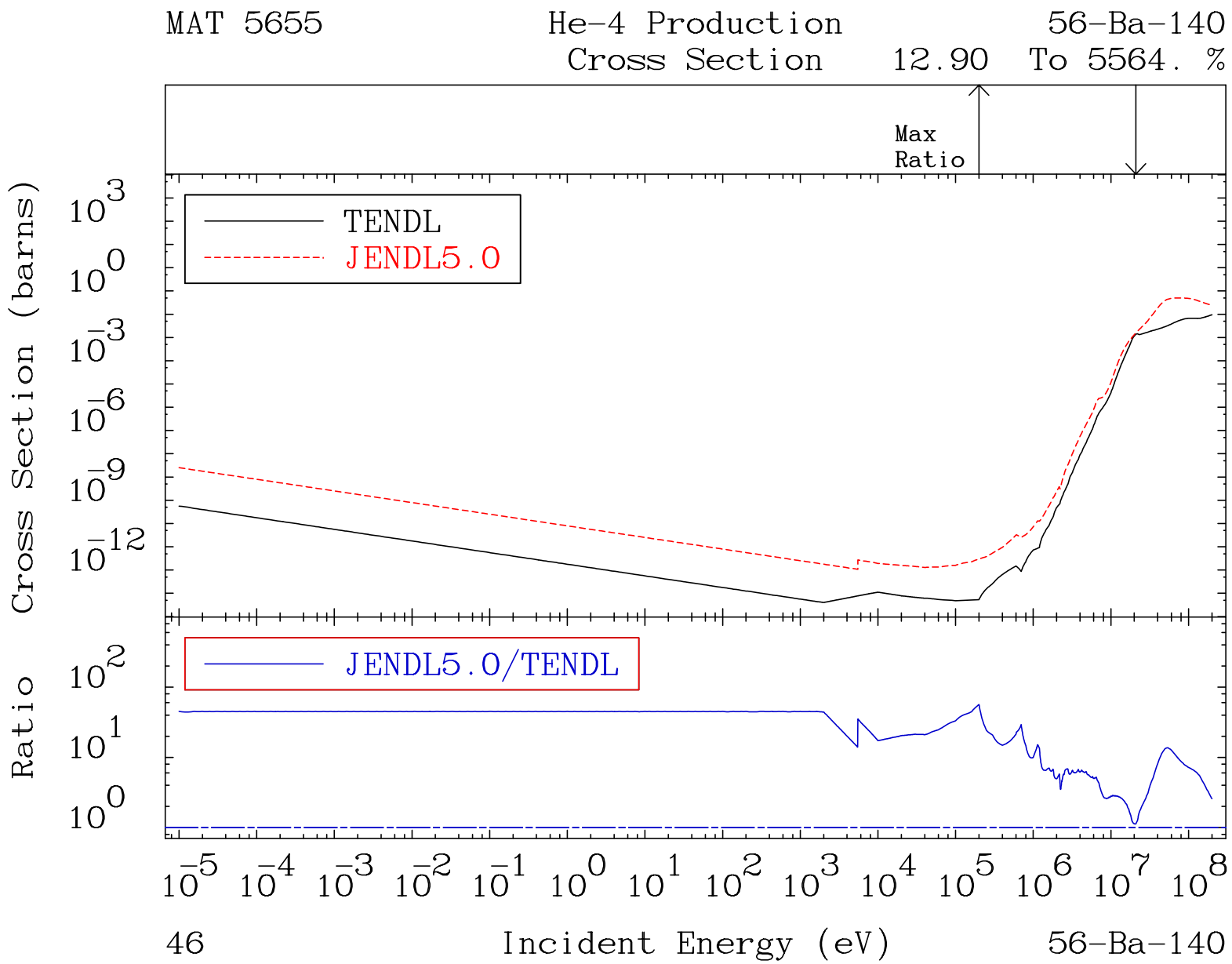

MAT 5655
(n,α)
Cross Section
56-Ba-140
-100.0 To 5564. %
Max
Ratio
TENDL
JENDL5.0
JENDL5.0/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
41
56-Ba-140

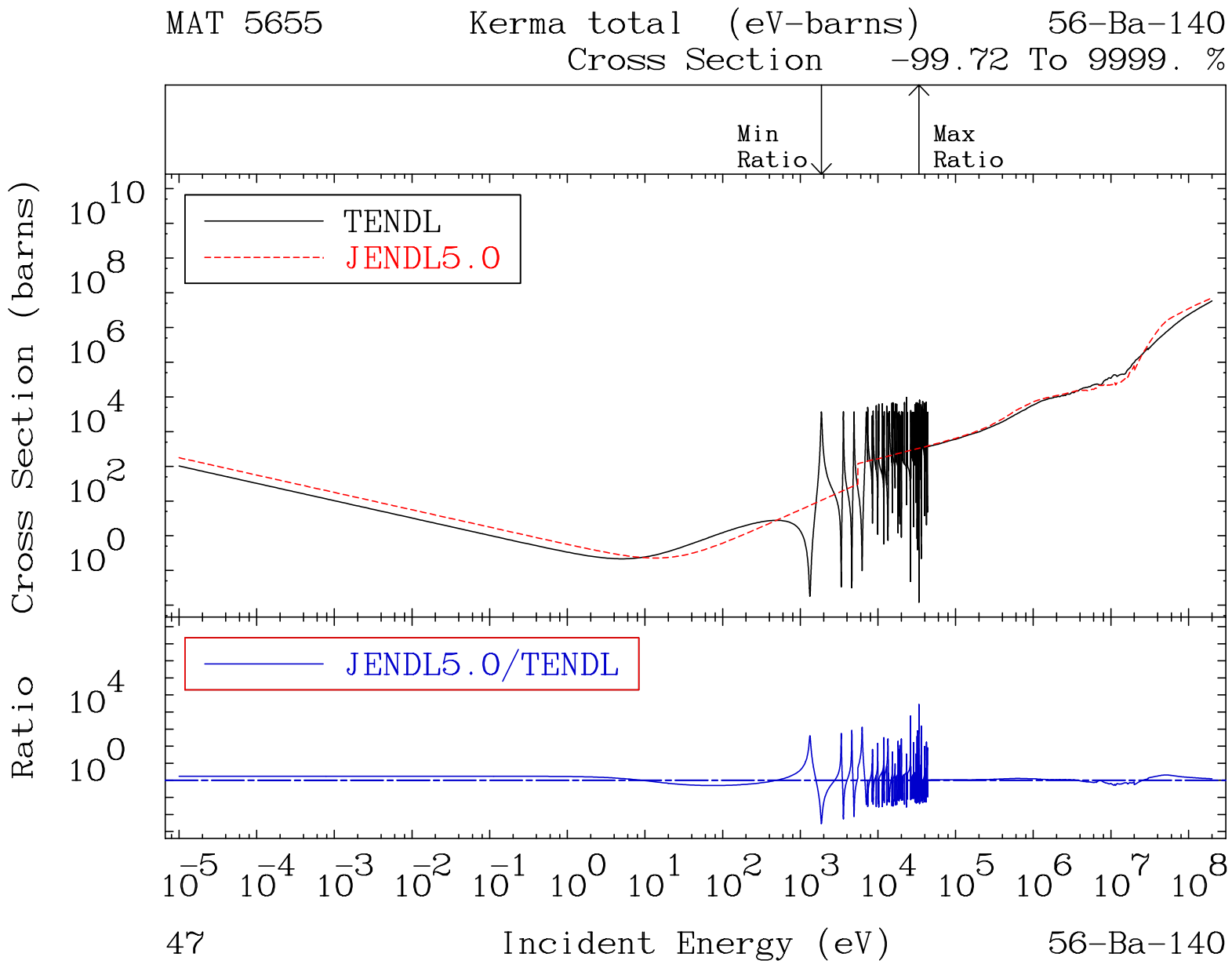

MAT 5655
Hydrogen Production
56-Ba-140
Cross Section
-100.0 To 9999. %
Max
Ratio
TENDL Threshold 5.4039 MeV
JENDL5.0 Threshold 5.4761 MeV
JENDL5.0/TENDL
Cross Section (barns)
Ratio
1.0
0.8
0.6
0.4
0.2
0.0
6
4
2
0
6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
42
Incident Energy (eV)
56-Ba-140

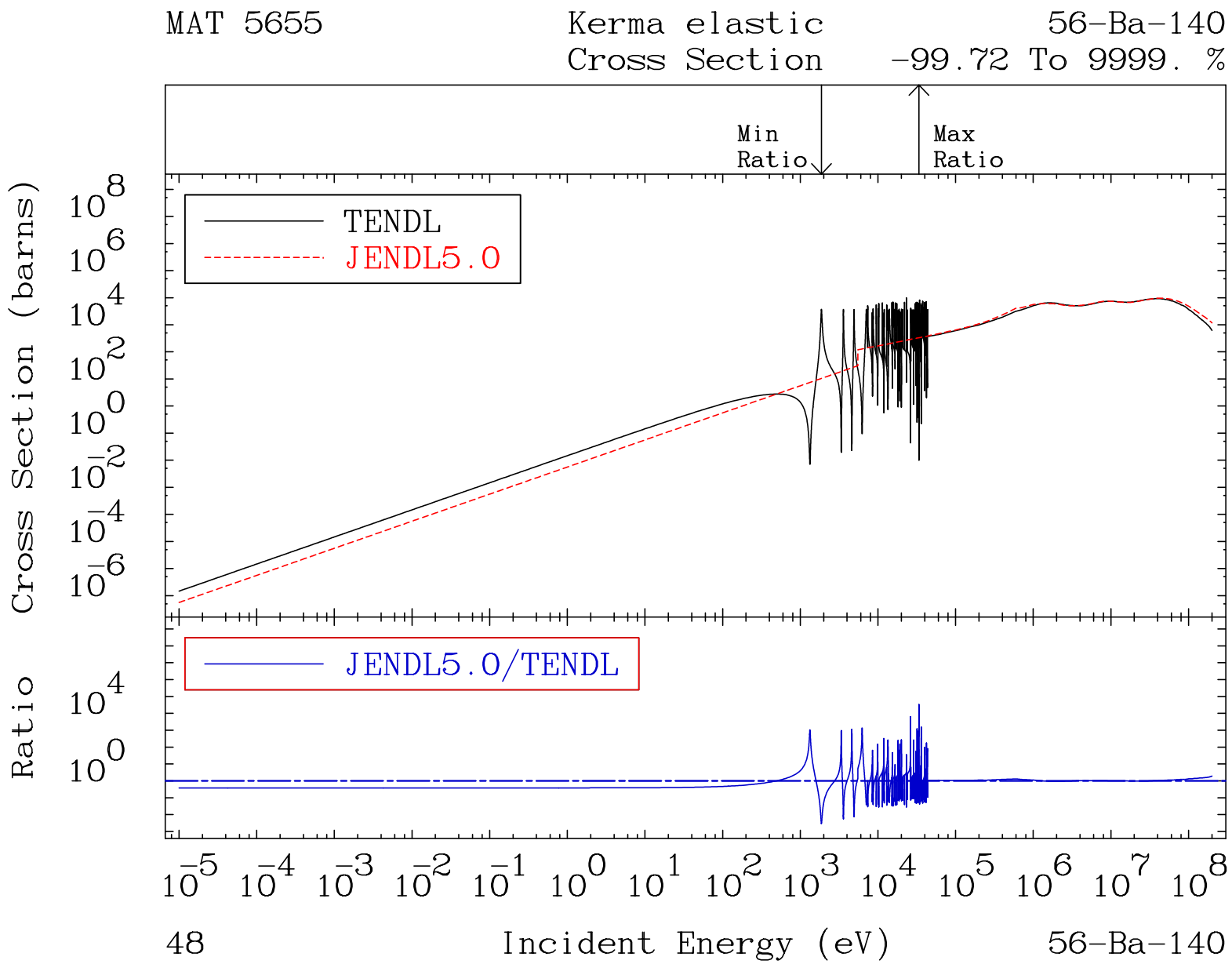

MAT 5655
Deuterium Production
56-Ba-140
Cross Section -100.0 To 9999. %
Max
Ratio
TENDL Threshold 7.0284 MeV
JENDL5.0 Threshold 7.6879 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
200
150
100
50
0
20
10
0
7 8 10^7 2 3 4 5 6 7 8 10^8 2
43
Incident Energy (eV)
56-Ba-140

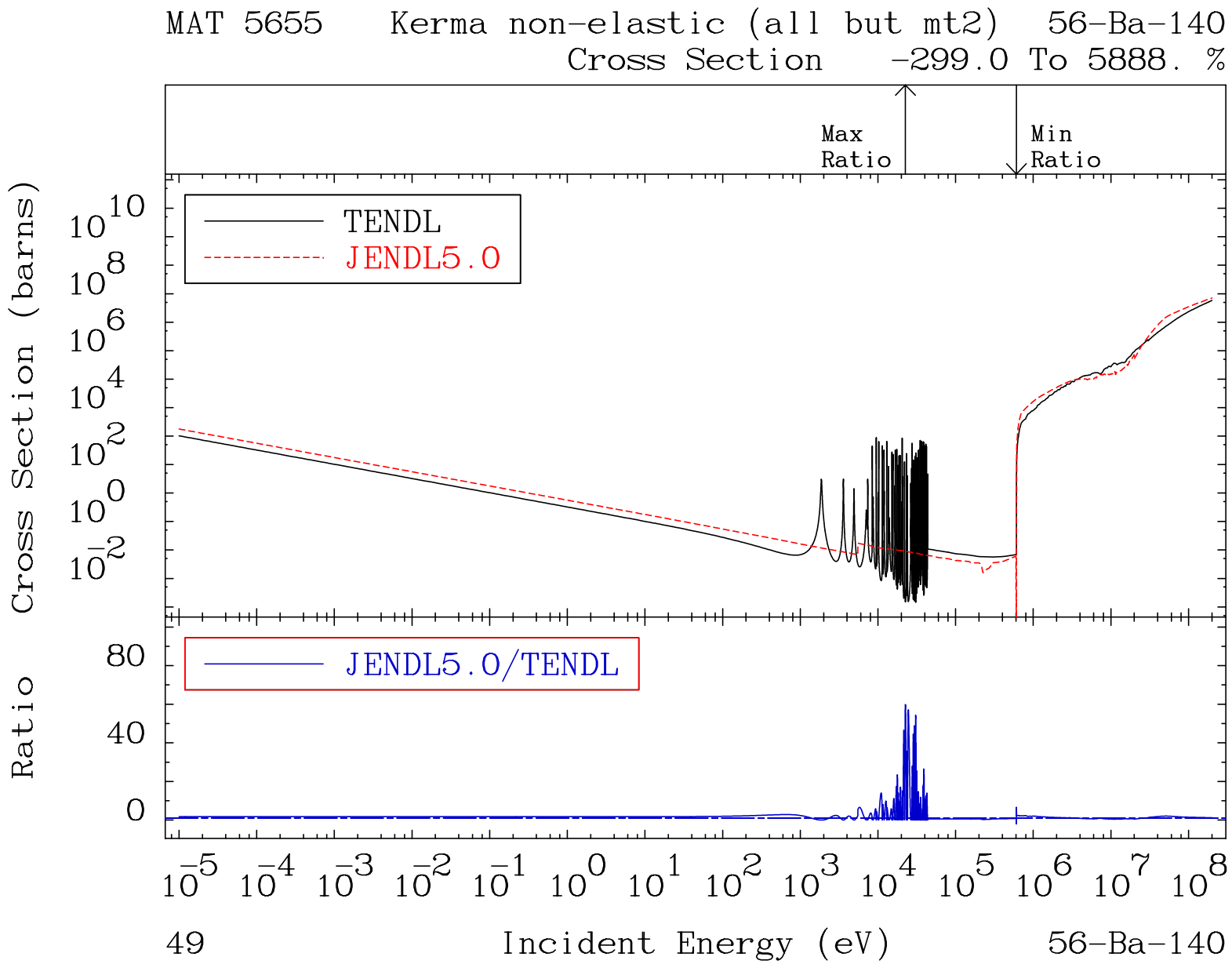

MAT 5655
Tritium Production
56-Ba-140
Cross Section
-100.0 To 9999. %
Max
Ratio
TENDL Threshold 7.3117 MeV
JENDL5.0 Threshold 7.3133 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
100
80
60
40
20
0
400
200
0
7 8 10^7 2 3 4 5 6 7 8 10^8 2
44
Incident Energy (eV)
56-Ba-140

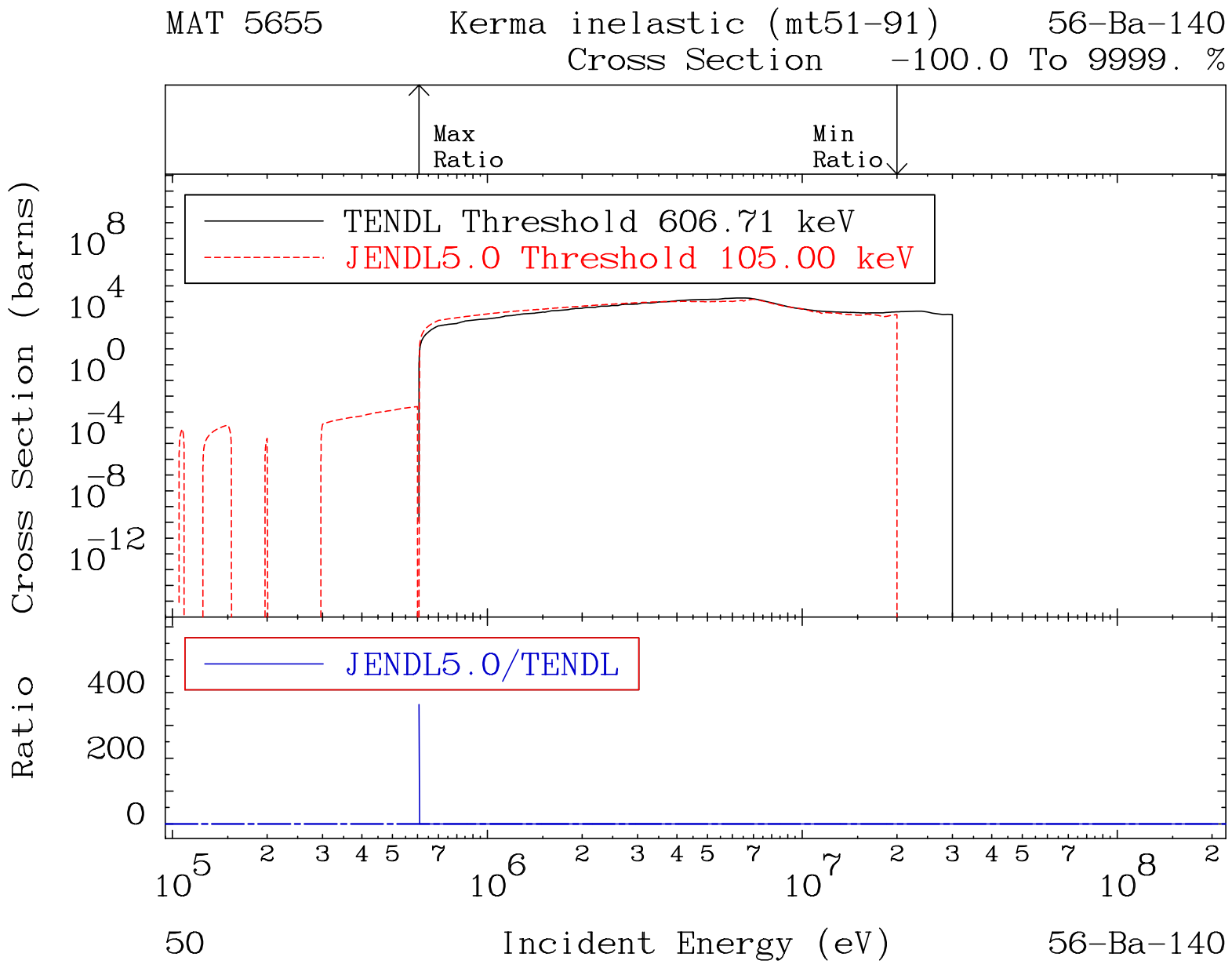

MAT 5655
He-3 Production
Cross Section
56-Ba-140
-100.0 To 9999. %
Min Ratio
Max Ratio
TENDL Threshold 10.229 MeV
JENDL5.0 Threshold 10.230 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
250
200
150
100
50
0
300
200
100
0
10^7
2
3
4
5
6
7
8
9
10^8
2
45
Incident Energy (eV)
56-Ba-140

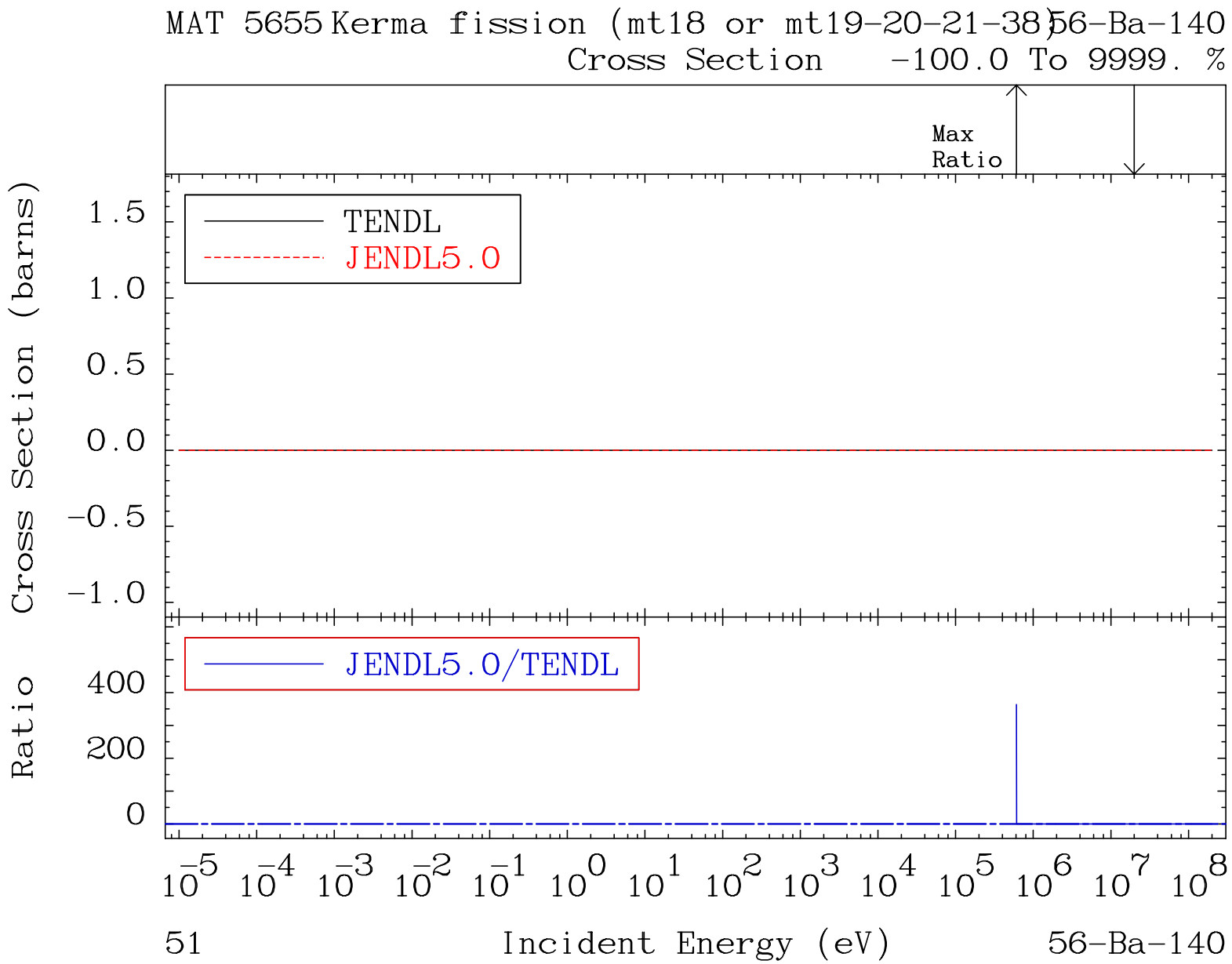

MAT 5655
He-4 Production
Cross Section
56-Ba-140
12.90 To 5564. %
Max
Ratio
TENDL
JENDL5.0
JENDL5.0/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
46
56-Ba-140

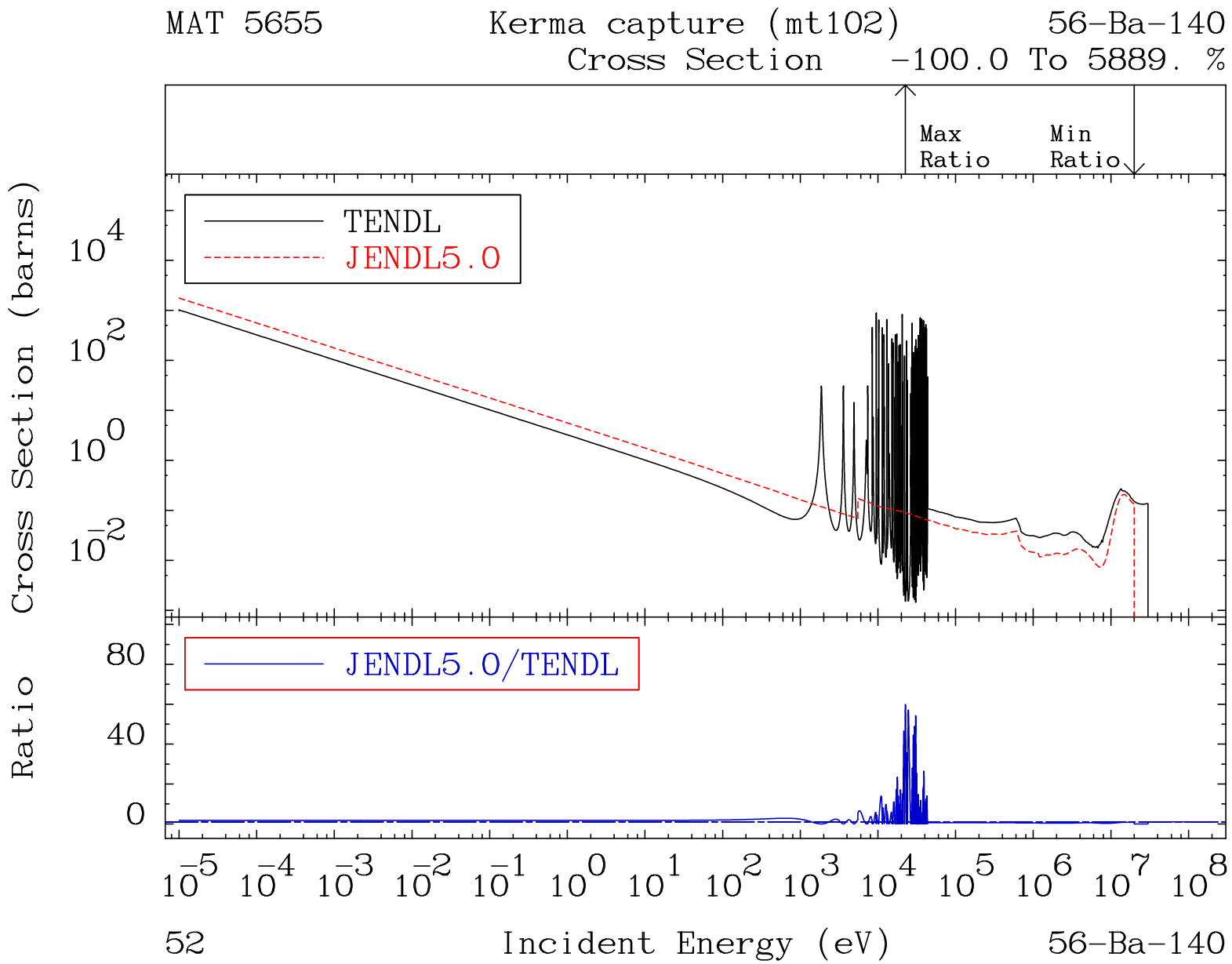

MAT 5655
Kerma total (eV-barns)
56-Ba-140
Cross Section -99.72 To 9999. %
Min Ratio
Max Ratio
TENDL
JENDL5.0
JENDL5.0/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
47
56-Ba-140

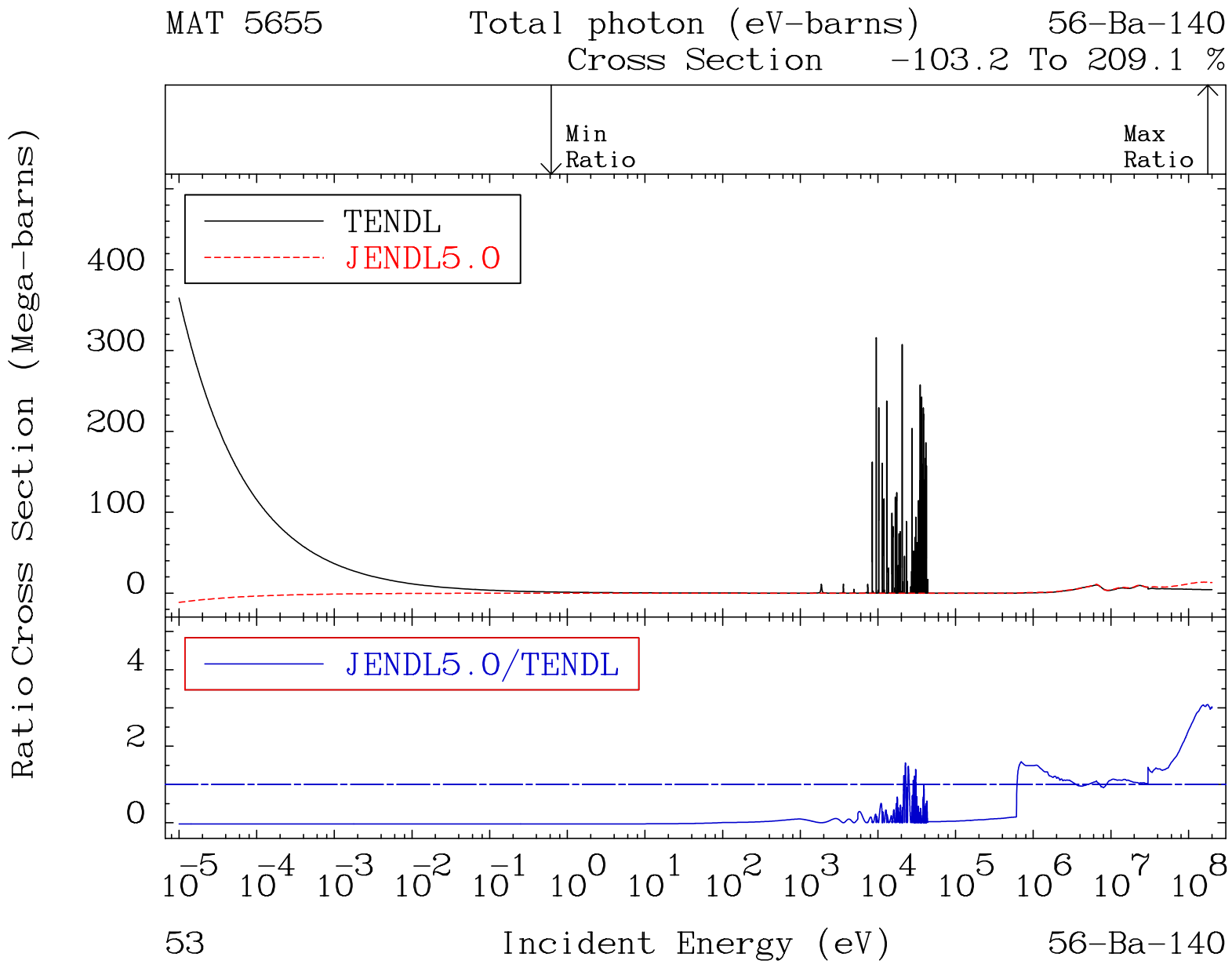

MAT 5655
Kerma elastic
Cross Section
56-Ba-140
-99.72 To 9999. %
Min Ratio
Max Ratio
TENDL
JENDL5.0
JENDL5.0/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
48
56-Ba-140

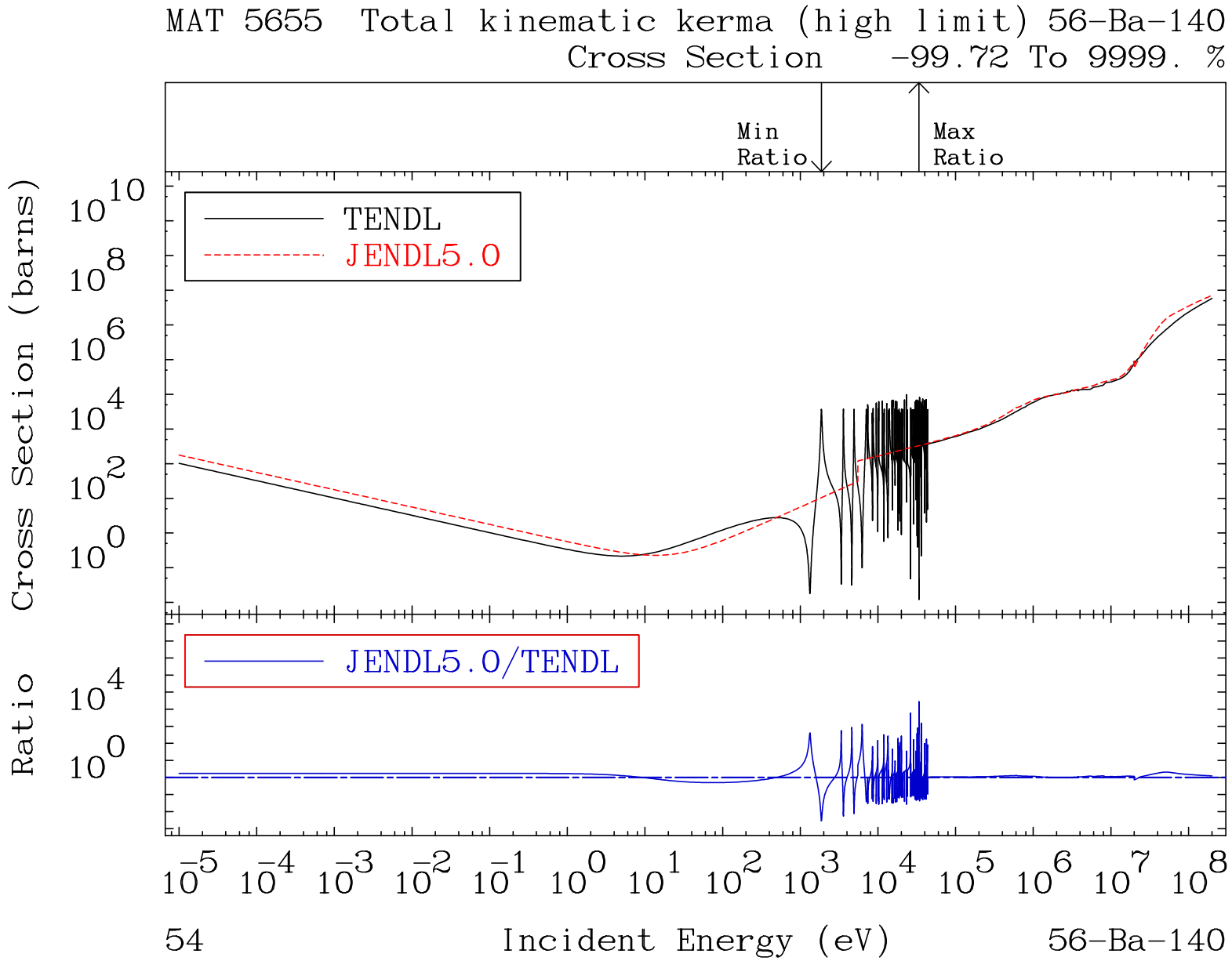

MAT 5655 Kerma non-elastic (all but mt2) 56-Ba-140
Cross Section -299.0 To 5888. %
Max Ratio
Min Ratio
TENDL
JENDL5.0
Cross Section (barns)
JENDL5.0/TENDL
Ratio
Incident Energy (eV)
49
56-Ba-140

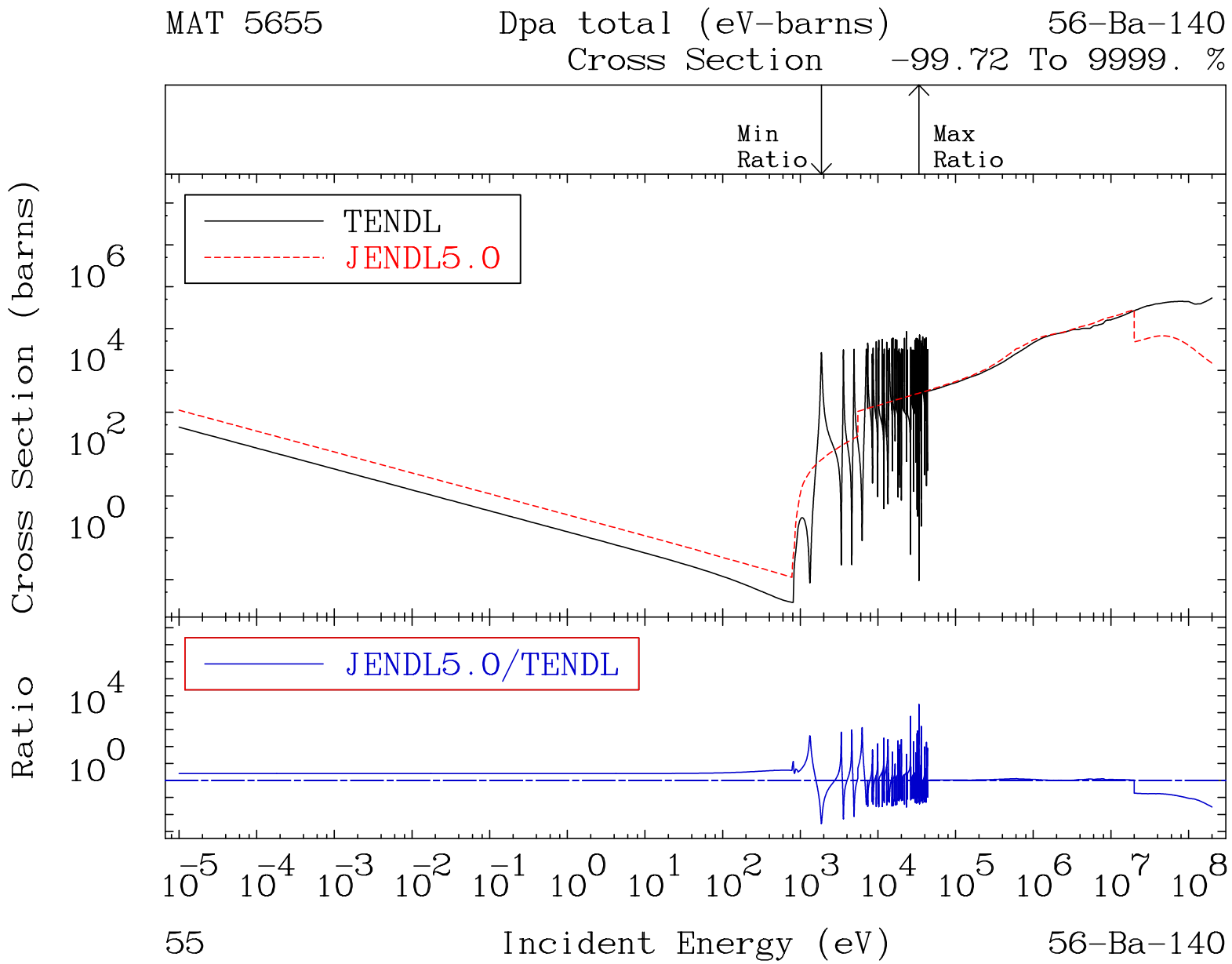

MAT 5655
Kerma inelastic (mt51-91)
56-Ba-140
Cross Section -100.0 To 9999. %
Max Ratio
Min Ratio
TENDL Threshold 606.71 keV
JENDL5.0 Threshold 105.00 keV
Cross Section (barns)
JENDL5.0/TENDL
Ratio
Incident Energy (eV)
50
56-Ba-140

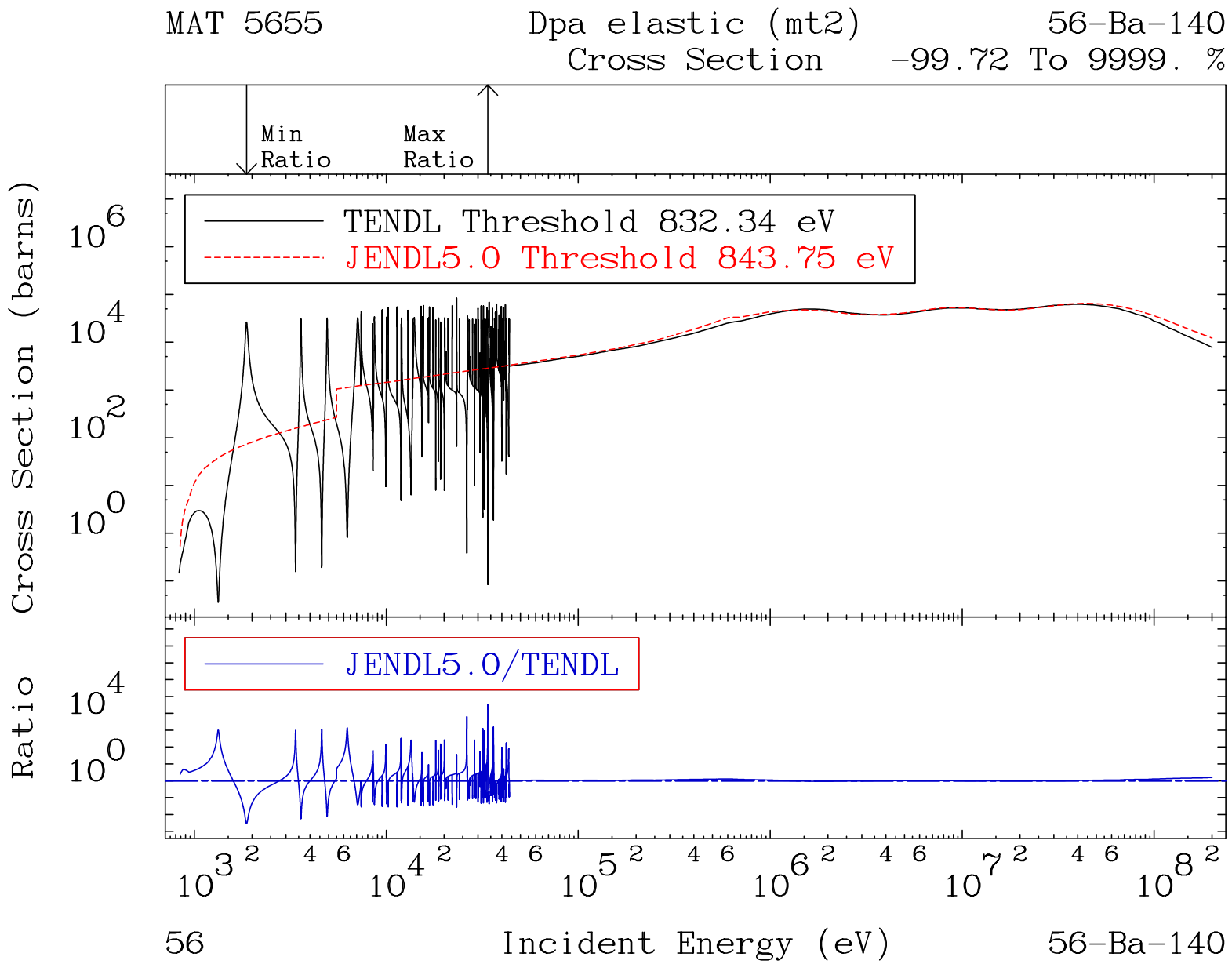

MAT 5655 Kerma fission (mt18 or mt19-20-21-38) 56-Ba-140
Cross Section -100.0 To 9999. %
Max
Ratio
TENDL
JENDL5.0
JENDL5.0/TENDL
Cross Section (barns)
Ratio
1.5
1.0
0.5
0.0
-0.5
-1.0
400
200
0
10^{-5} 10^{-4} 10^{-3} 10^{-2} 10^{-1} 10^{0} 10^{1} 10^{2} 10^{3} 10^{4} 10^{5} 10^{6} 10^{7} 10^{8}
51
Incident Energy (eV)
56-Ba-140

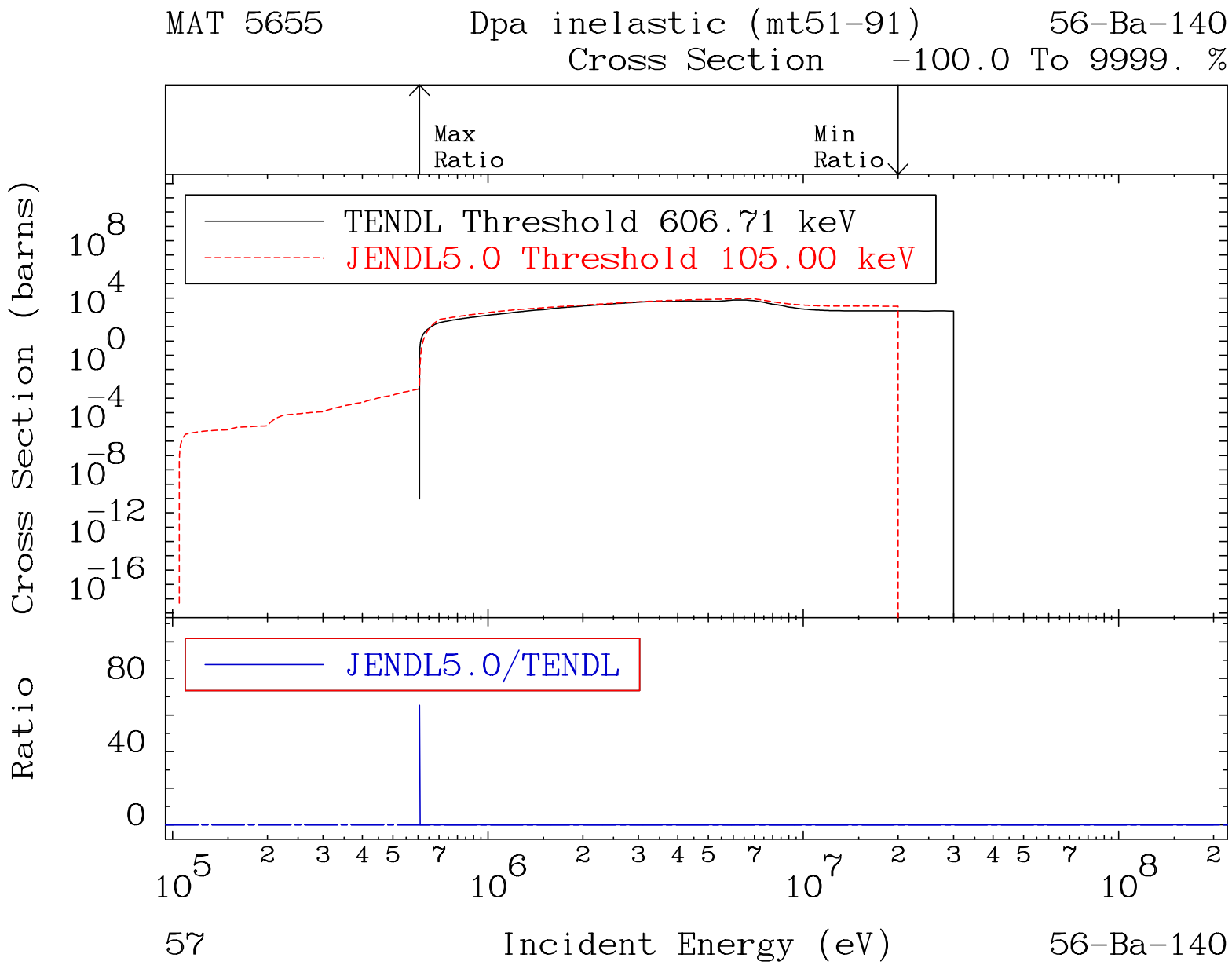

MAT 5655
Kerma capture (mt102)
56-Ba-140
Cross Section -100.0 To 5889. %
Max Ratio
Min Ratio
TENDL
JENDL5.0
Cross Section (barns)
10^4
10^2
10^0
10^-2
JENDL5.0/TENDL
Ratio
80
40
0
10^-5 10^-4 10^-3 10^-2 10^-1 10^0 10^1 10^2 10^3 10^4 10^5 10^6 10^7 10^8
52
Incident Energy (eV)
56-Ba-140

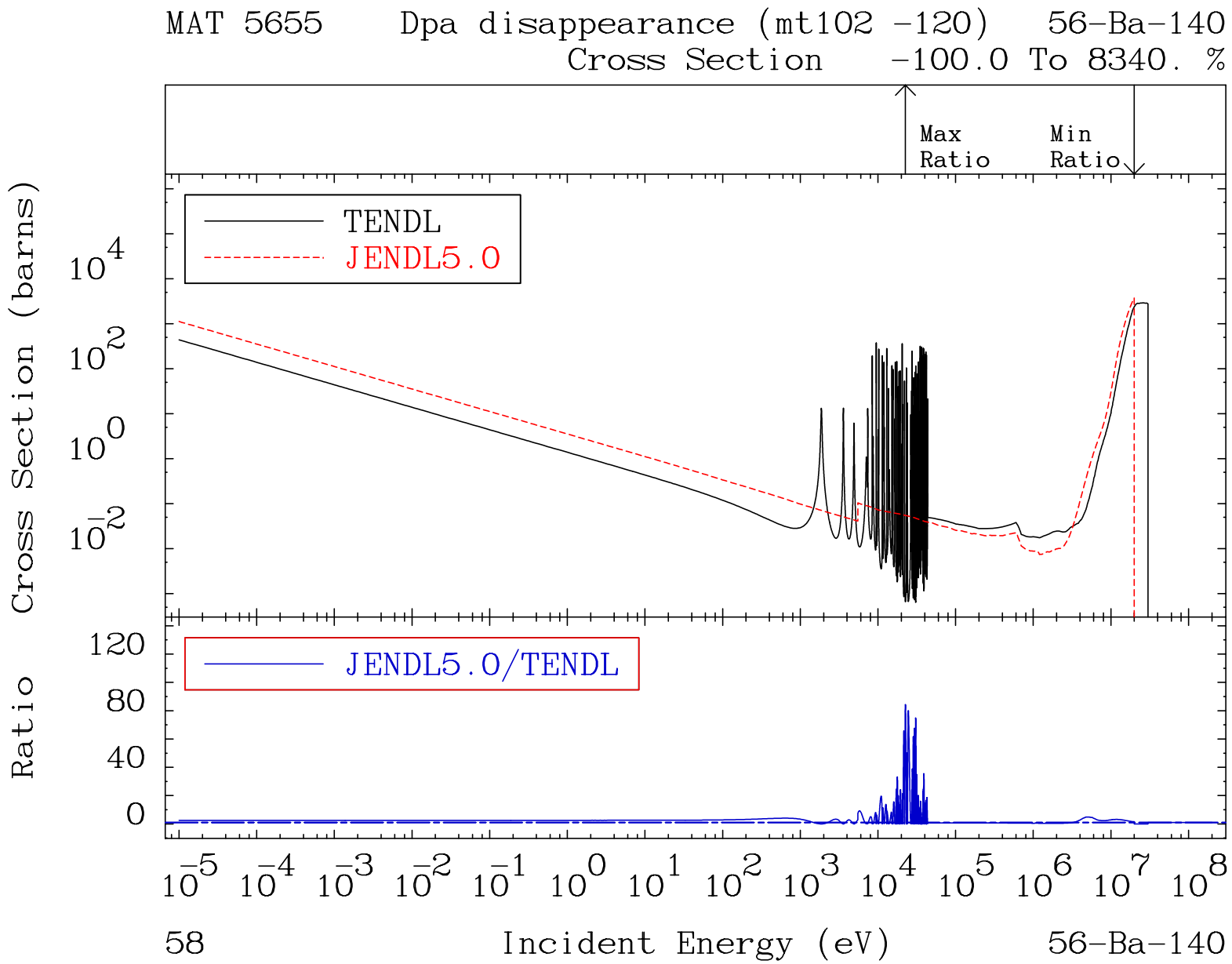

MAT 5655
Total photon (eV-barns)
56-Ba-140
Cross Section -103.2 To 209.1 %
Min Ratio
Max Ratio
TENDL
JENDL5.0
JENDL5.0/TENDL
Ratio Cross Section (Mega-barns)
400
300
200
100
0
4
2
0
10^{-5} 10^{-4} 10^{-3} 10^{-2} 10^{-1} 10^{0} 10^{1} 10^{2} 10^{3} 10^{4} 10^{5} 10^{6} 10^{7} 10^{8}
53
Incident Energy (eV)
56-Ba-140

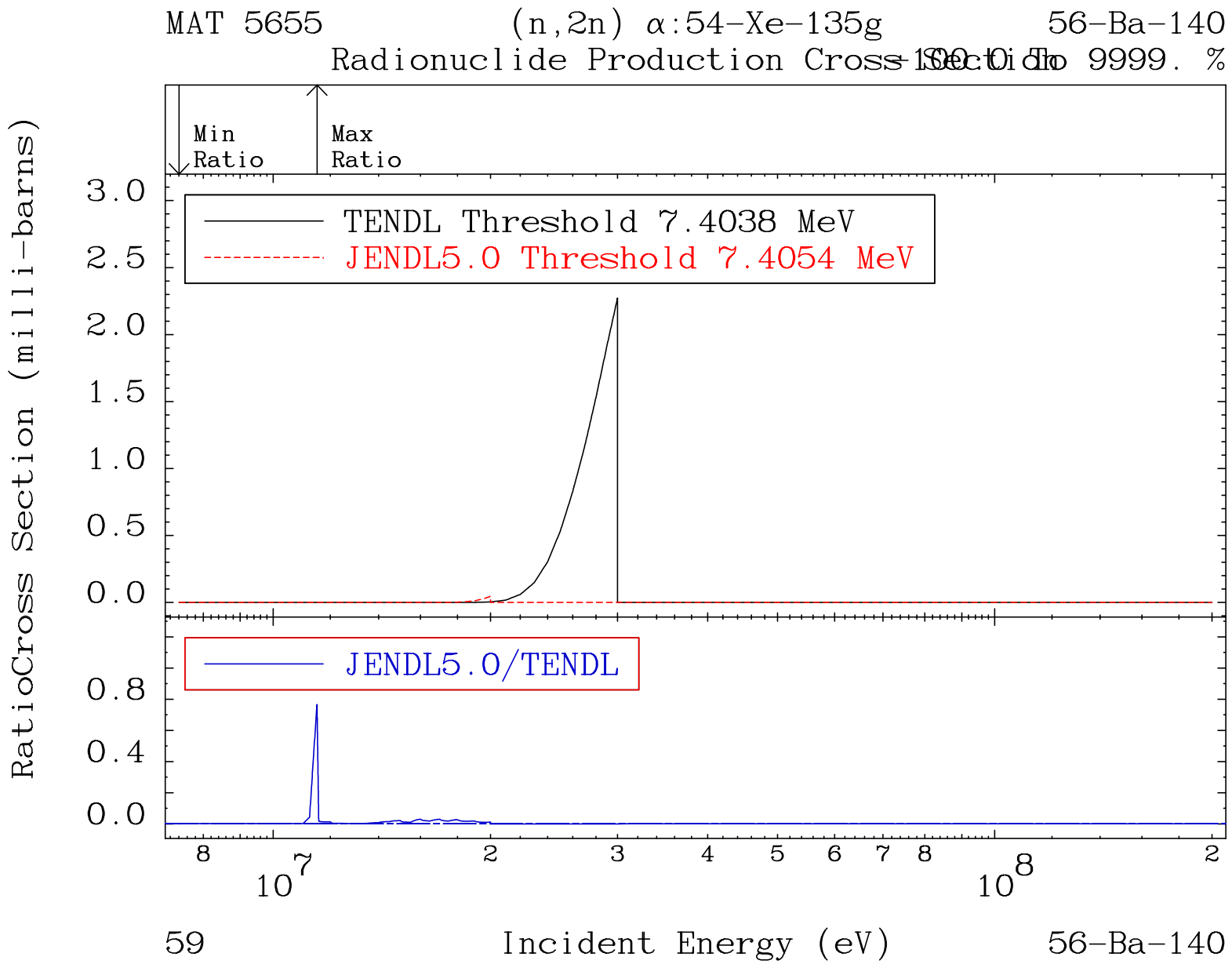

MAT 5655 Total kinematic kerma (high limit) 56-Ba-140
Cross Section -99.72 To 9999. %
Min Ratio
Max Ratio
TENDL
JENDL5.0
JENDL5.0/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
54
56-Ba-140

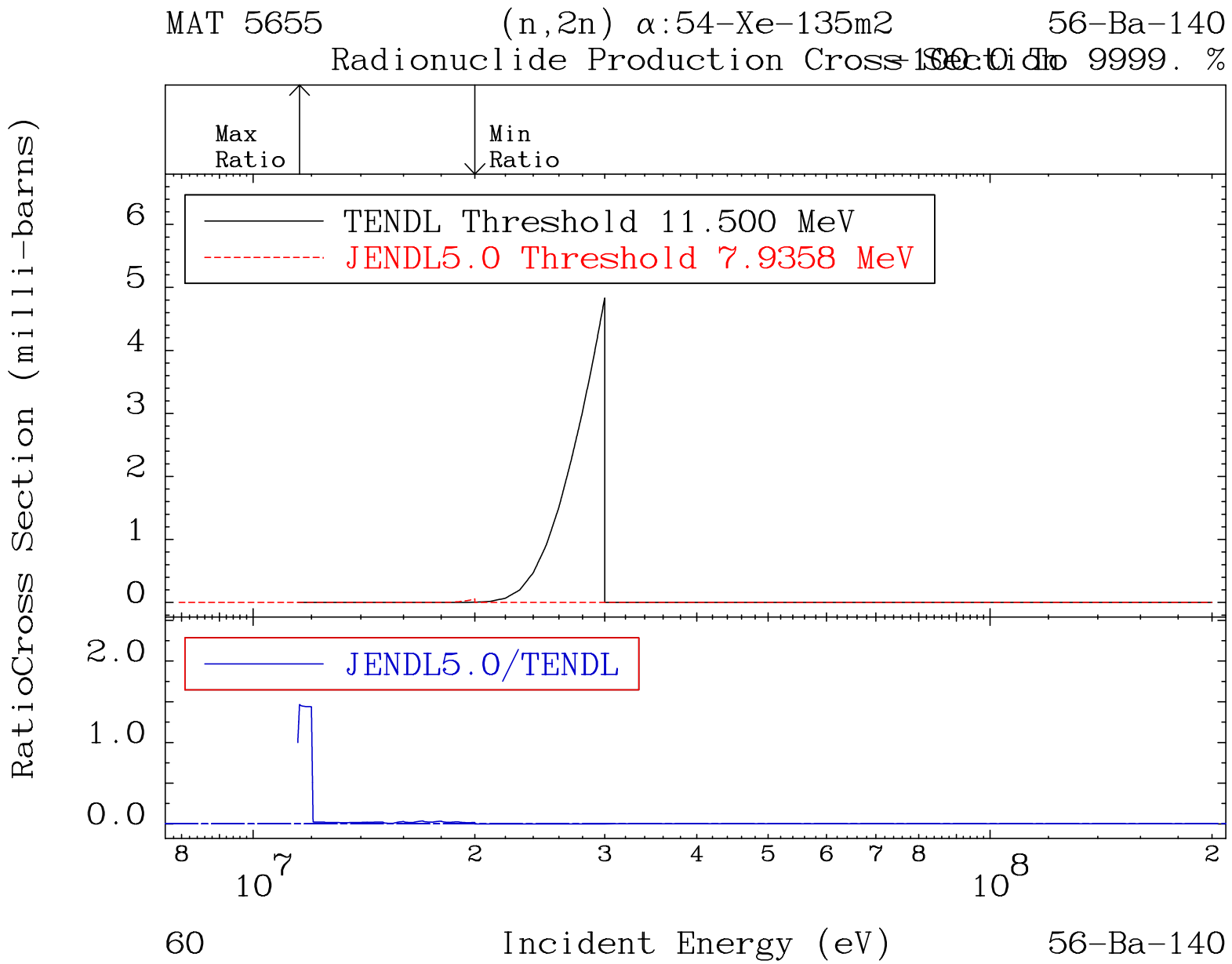

MAT 5655
Dpa total (eV-barns)
56-Ba-140
Cross Section -99.72 To 9999. %
Min Ratio
Max Ratio
TENDL
JENDL5.0
Cross Section (barns)
JENDL5.0/TENDL
Ratio
Incident Energy (eV)
55
56-Ba-140

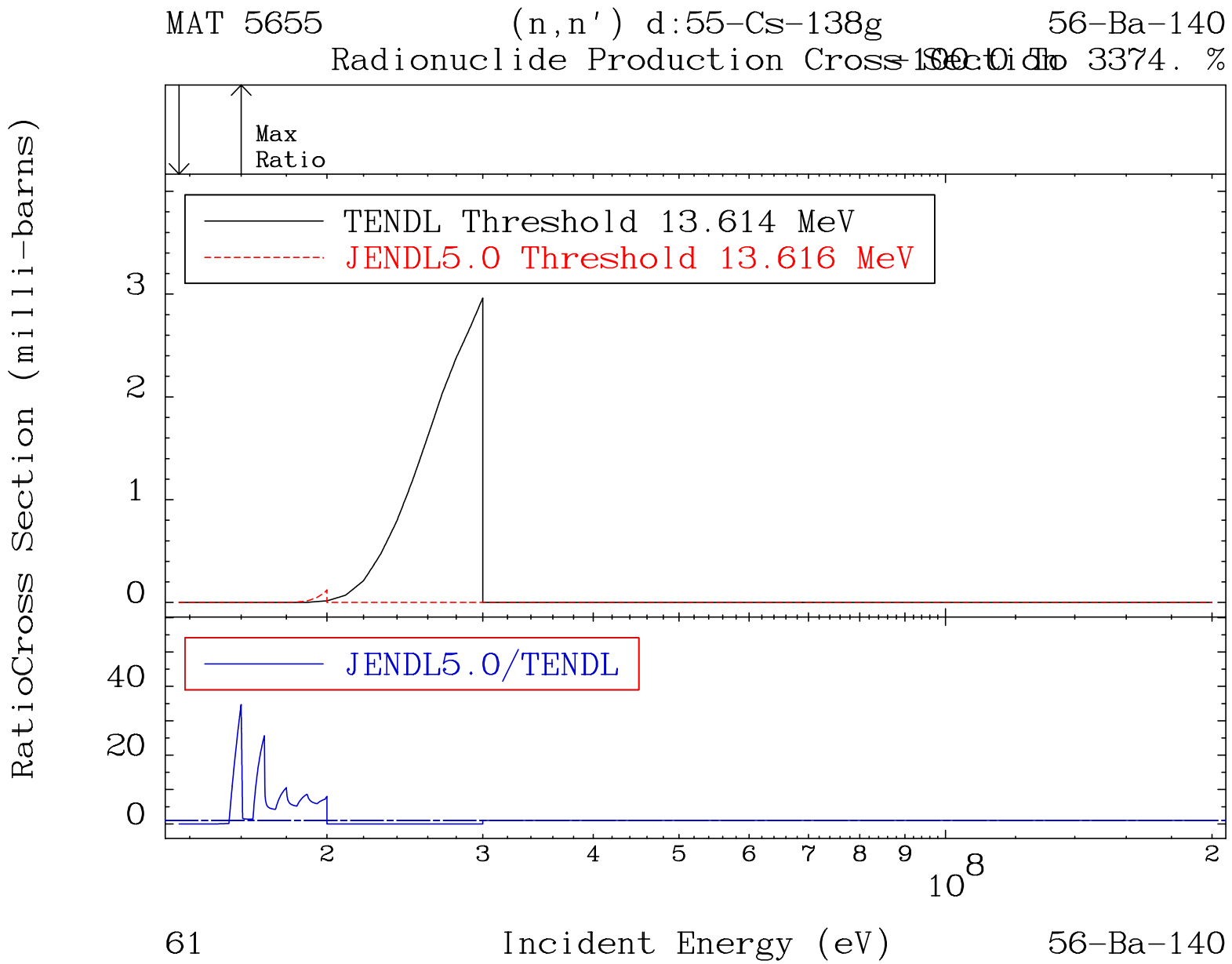

MAT 5655
Dpa elastic (mt2)
Cross Section
56-Ba-140
-99.72 To 9999. %
Min Ratio
Max Ratio
TENDL Threshold 832.34 eV
JENDL5.0 Threshold 843.75 eV
JENDL5.0/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
56
56-Ba-140

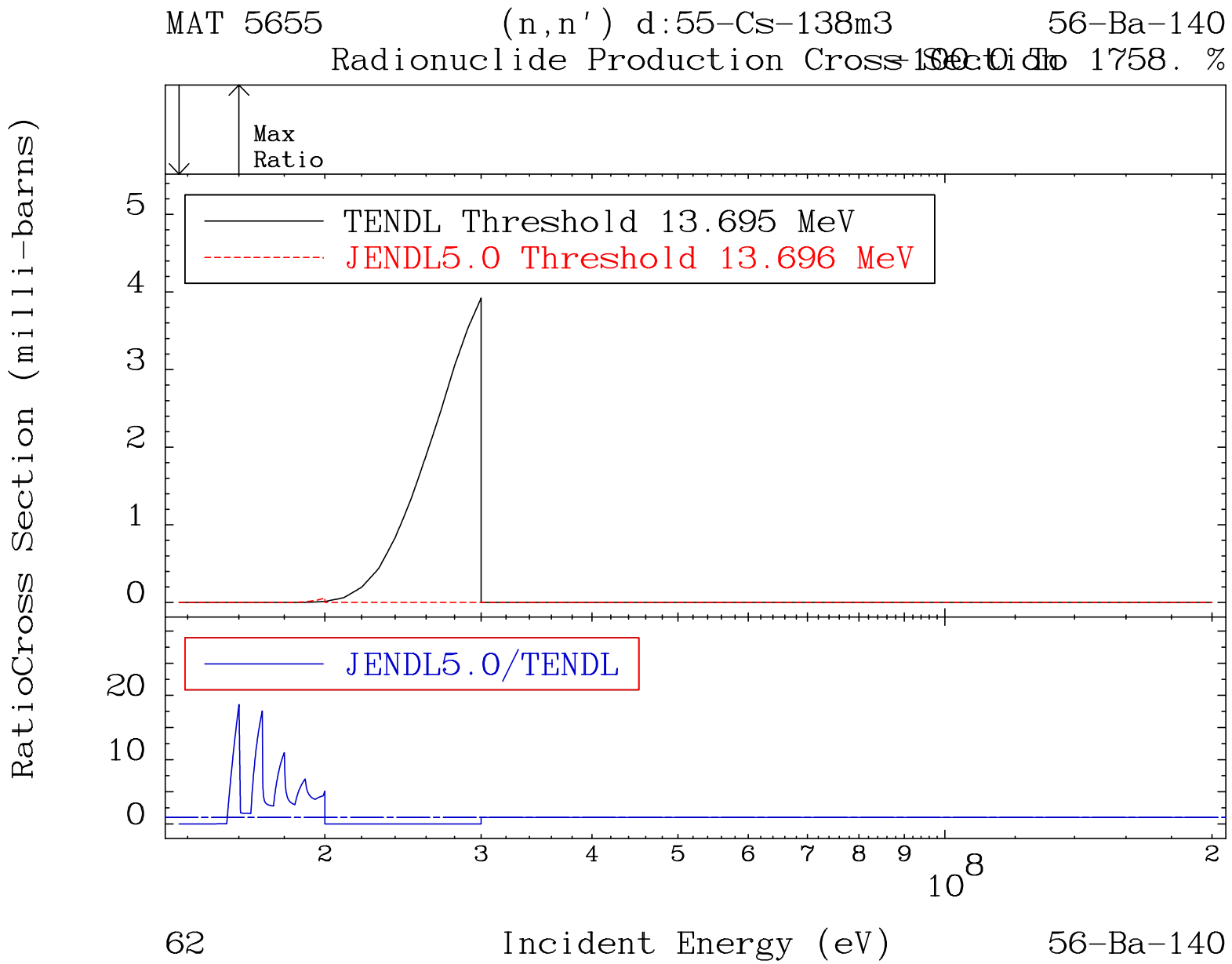

MAT 5655
Dpa inelastic (mt51-91)
56-Ba-140
Cross Section -100.0 To 9999. %
Max Ratio
Min Ratio
TENDL Threshold 606.71 keV
JENDL5.0 Threshold 105.00 keV
Cross Section (barns)
JENDL5.0/TENDL
Ratio
Incident Energy (eV)
57
56-Ba-140

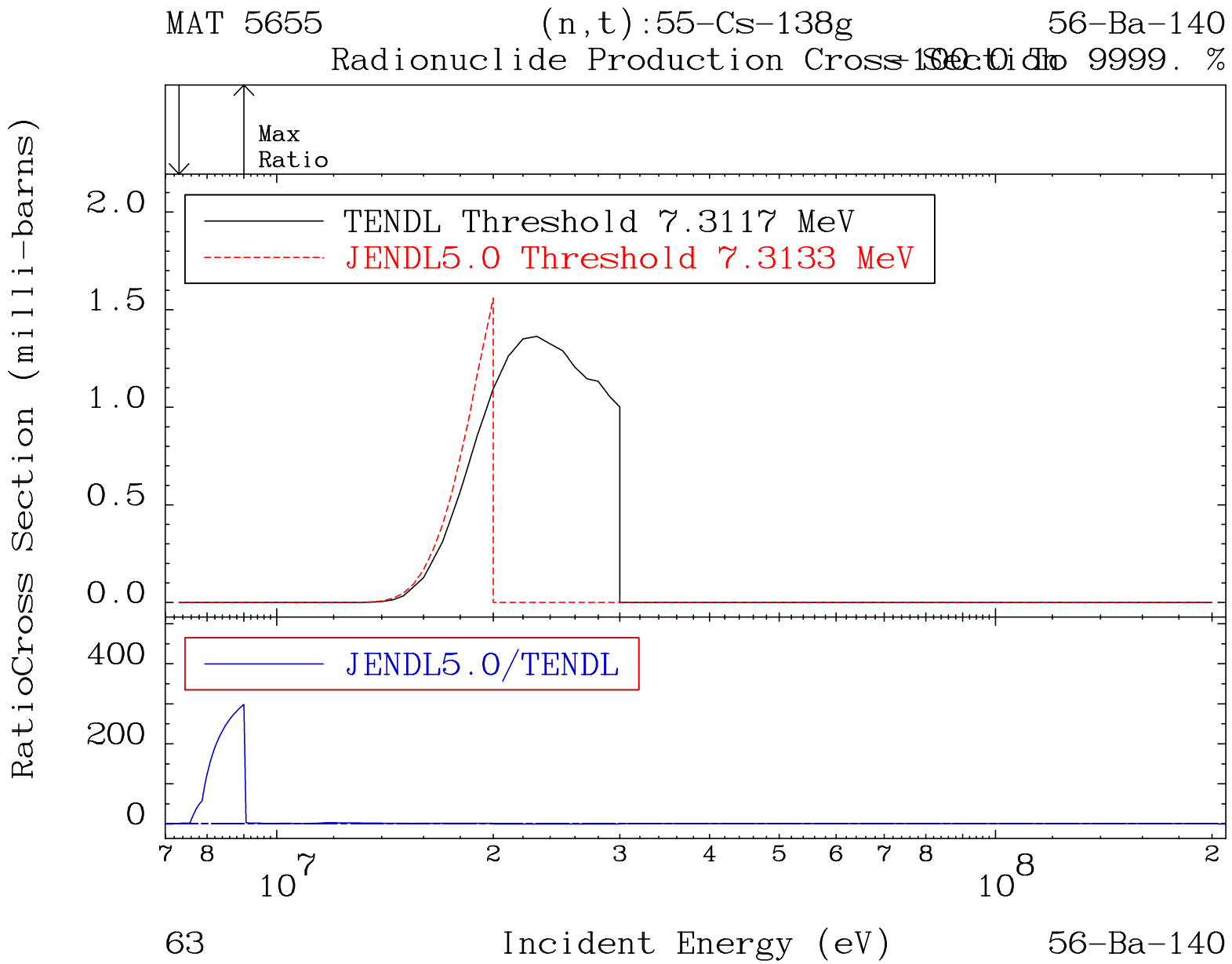

MAT 5655 Dpa disappearance (mt102 -120) 56-Ba-140
Cross Section -100.0 To 8340. %
Max Ratio
Min Ratio
TENDL
JENDL5.0
JENDL5.0/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
58
56-Ba-140

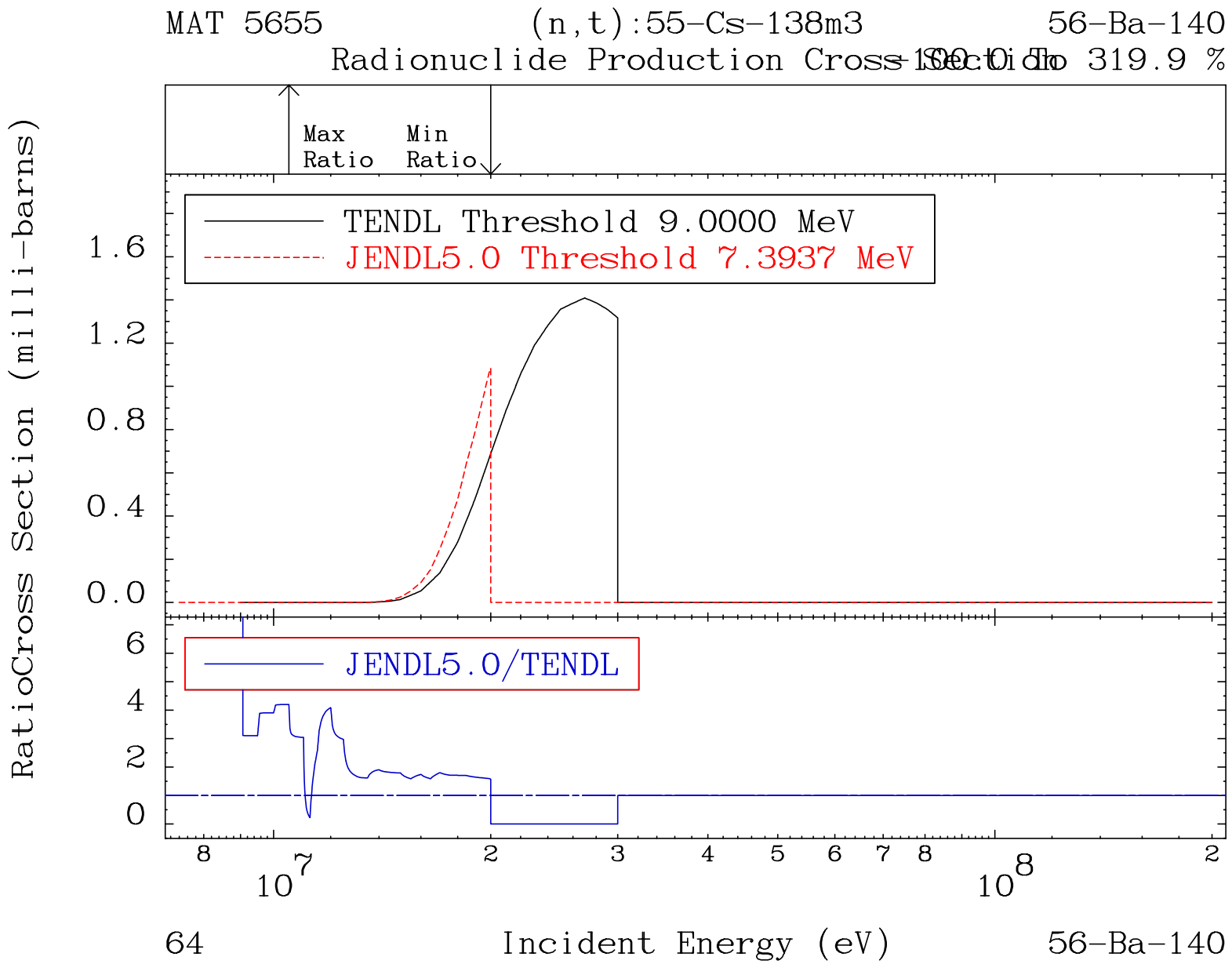

MAT 5655
(n,2n) α:54-Xe-135g
56-Ba-140
Radionuclide Production Cross Section
Min Ratio
Max Ratio
TENDL Threshold 7.4038 MeV
JENDL5.0 Threshold 7.4054 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
59
56-Ba-140

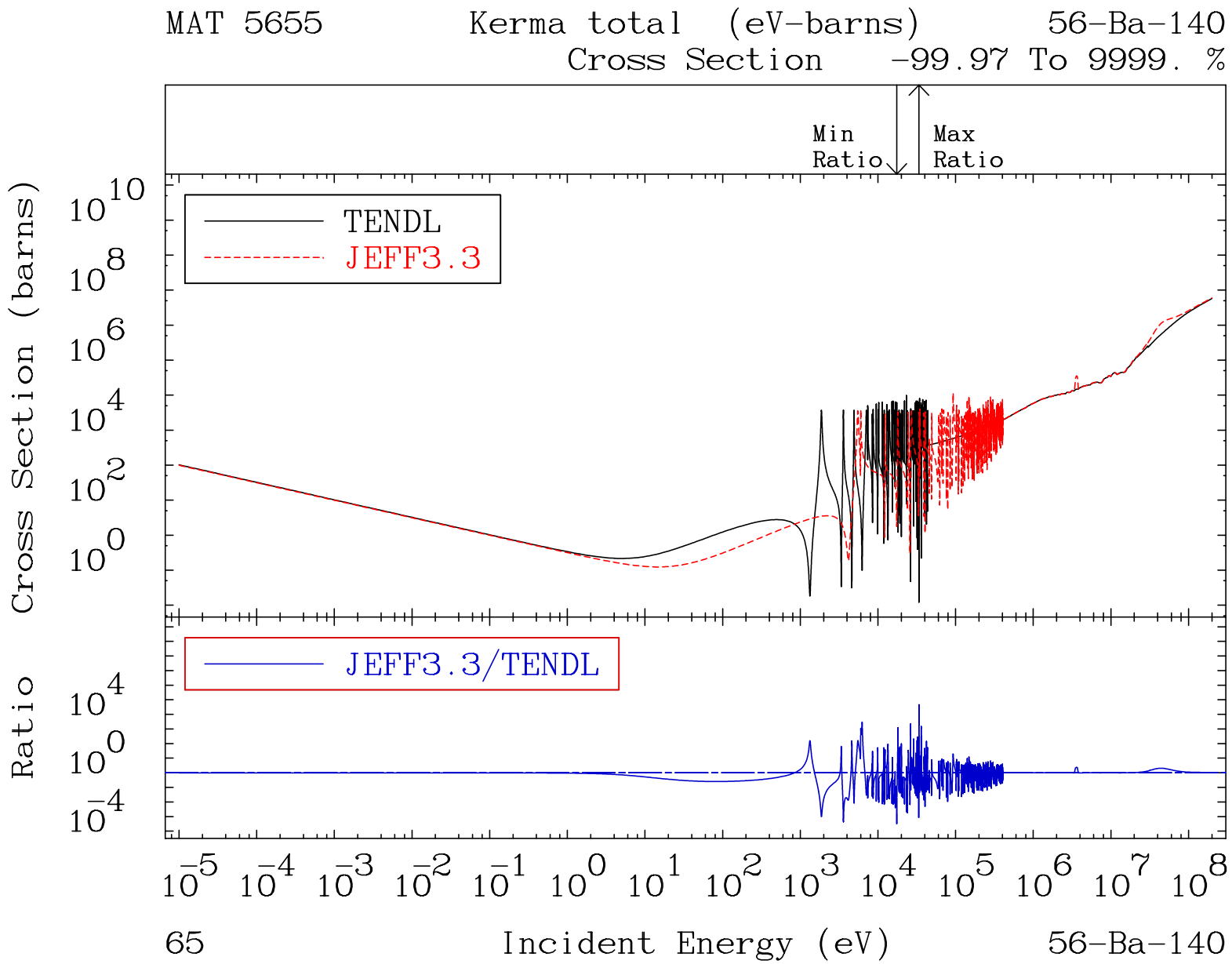

MAT 5655
(n,2n) α:54-Xe-135m2
56-Ba-140
Radionuclide Production Cross Section To 9999. %
Max Ratio
Min Ratio
TENDL Threshold 11.500 MeV
JENDL5.0 Threshold 7.9358 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
60
56-Ba-140

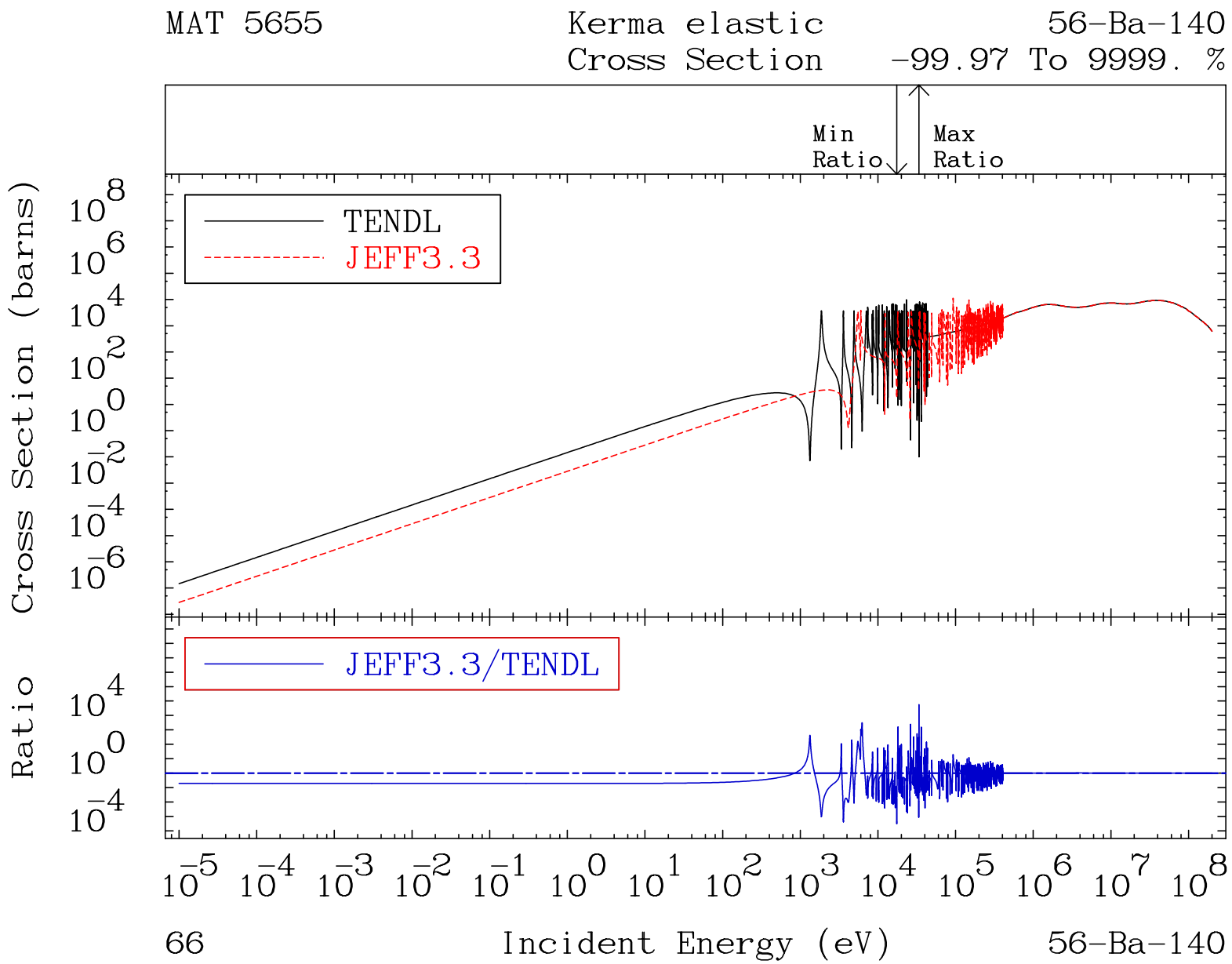

MAT 5655
(n,n') d:55-Cs-138g
56-Ba-140
Radionuclide Production Cross Section To 3374. %
Max
Ratio
TENDL Threshold 13.614 MeV
JENDL5.0 Threshold 13.616 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
61
56-Ba-140

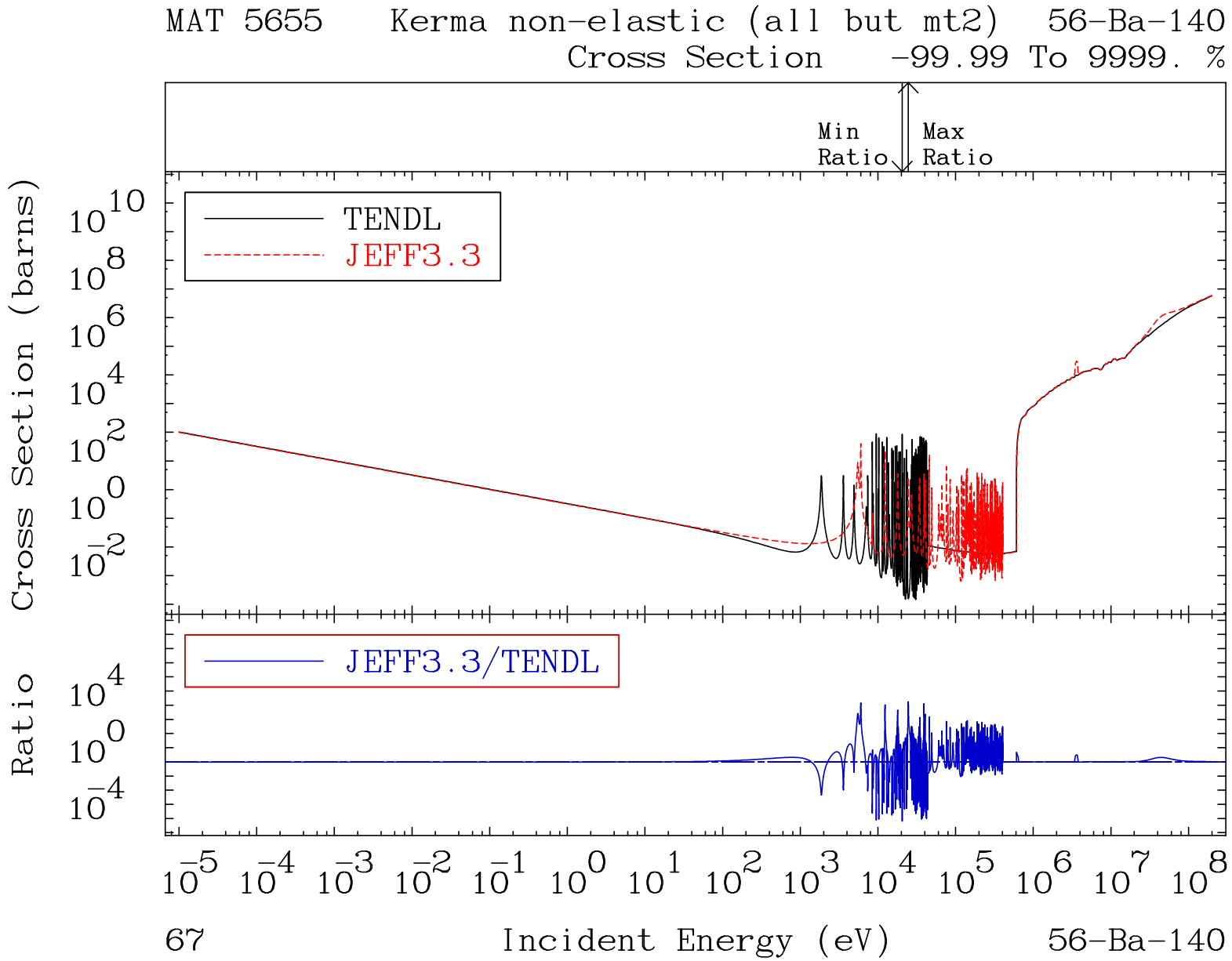

MAT 5655
(n,n') d:55-Cs-138m3
56-Ba-140
Radionuclide Production Cross Section To 1758. %
Max
Ratio
TENDL Threshold 13.695 MeV
JENDL5.0 Threshold 13.696 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
62
56-Ba-140

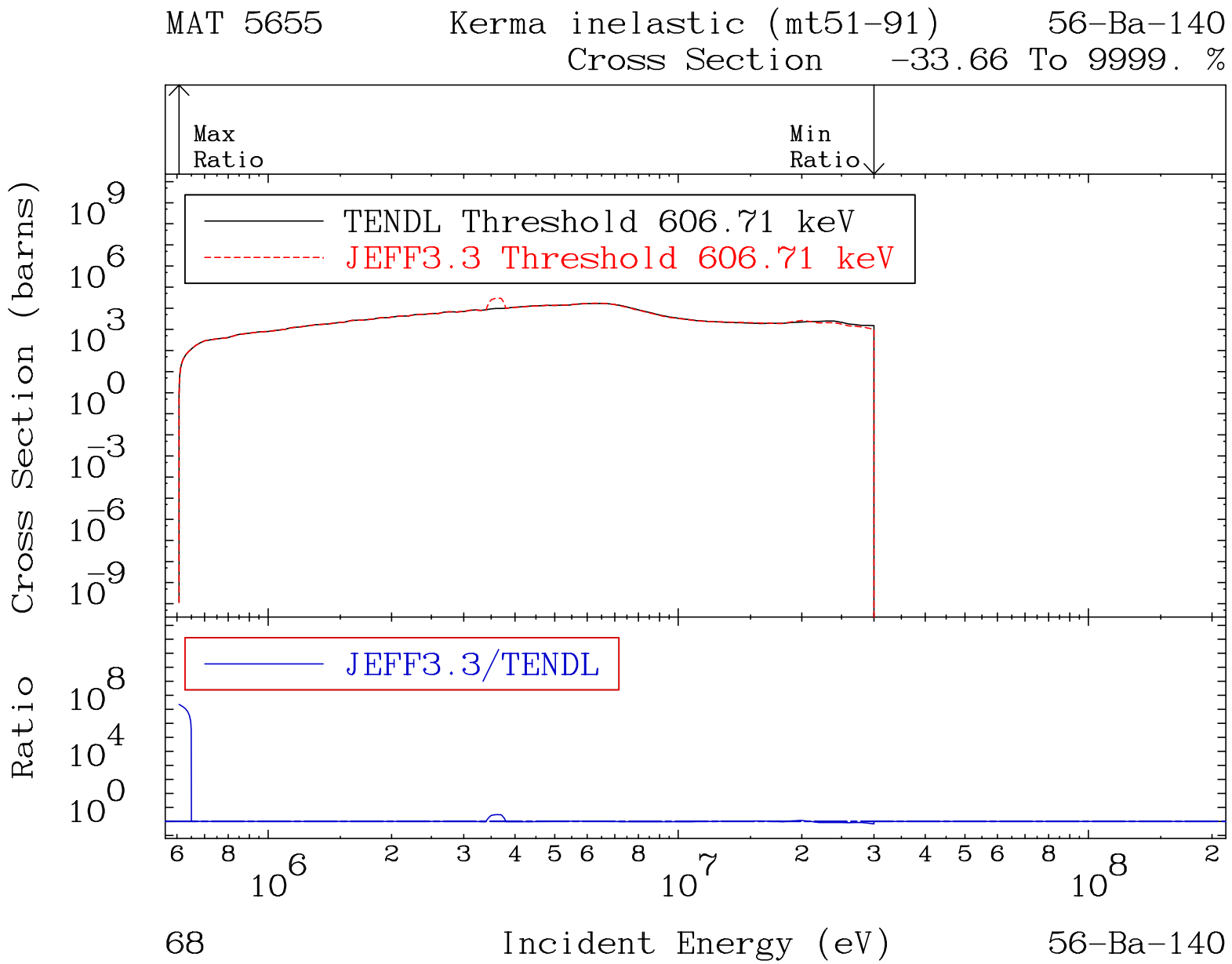

MAT 5655
(n,t):55-Cs-138g
56-Ba-140
Radionuclide Production Cross Section
Max
Ratio
TENDL Threshold 7.3117 MeV
JENDL5.0 Threshold 7.3133 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
63
56-Ba-140

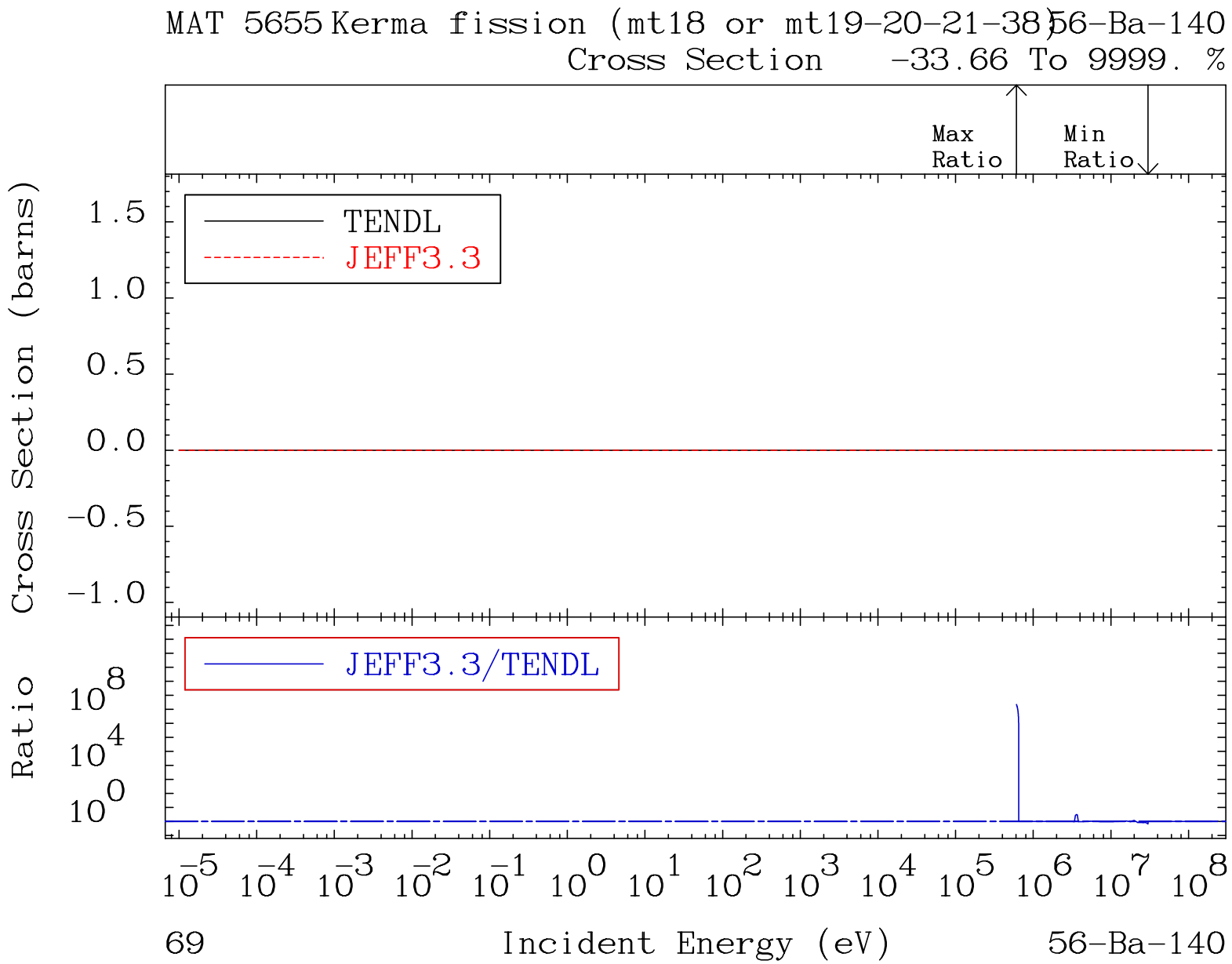

MAT 5655
(n,t):55-Cs-138m3
56-Ba-140
Radionuclide Production Cross Section
Max Ratio
Min Ratio
TENDL Threshold 9.0000 MeV
JENDL5.0 Threshold 7.3937 MeV
JENDL5.0/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
64
56-Ba-140

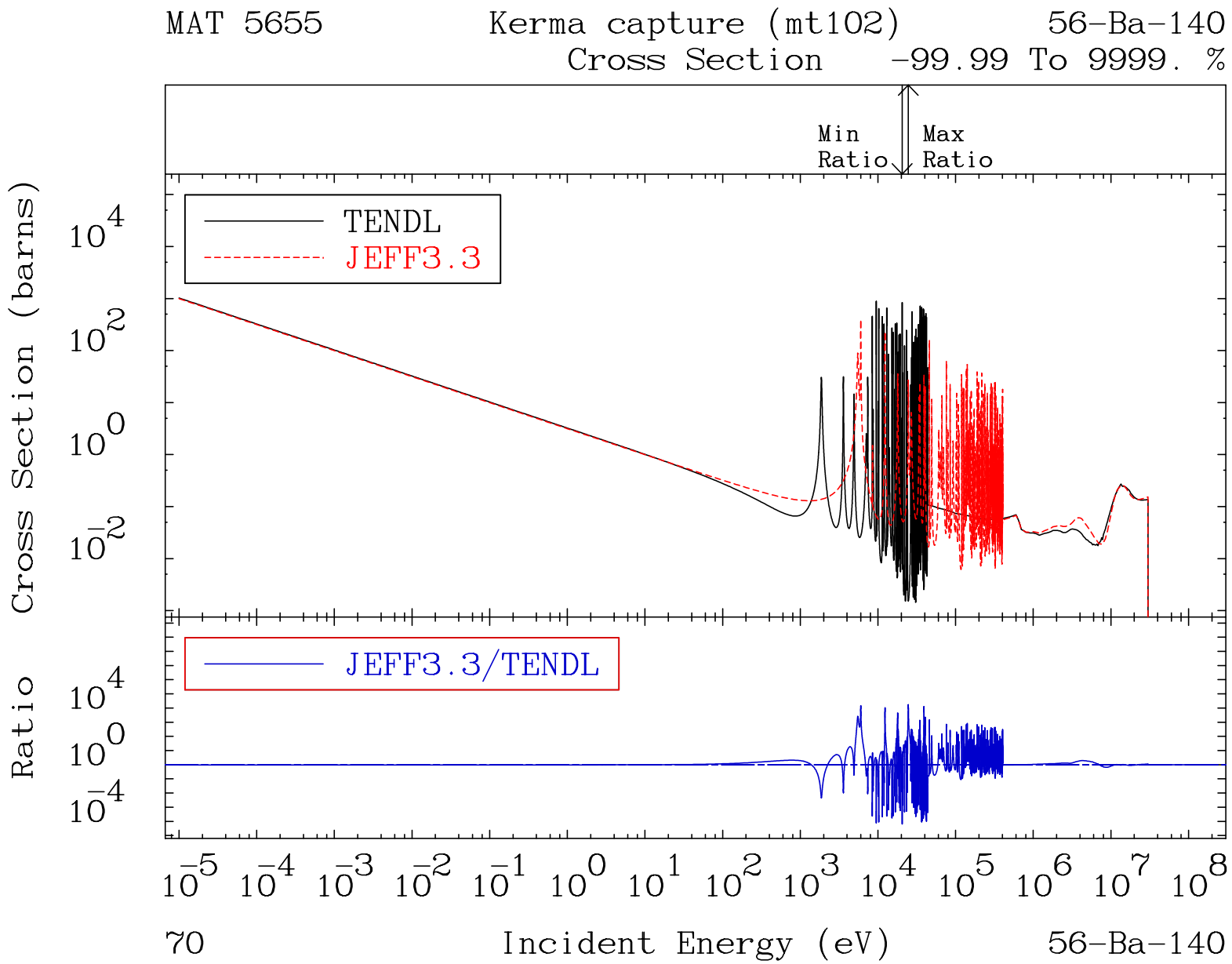

MAT 5655
Kerma total (eV-barns)
56-Ba-140
Cross Section -99.97 To 9999. %
Min Ratio
Max Ratio
TENDL
JEFF3.3
JEFF3.3/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
65
56-Ba-140

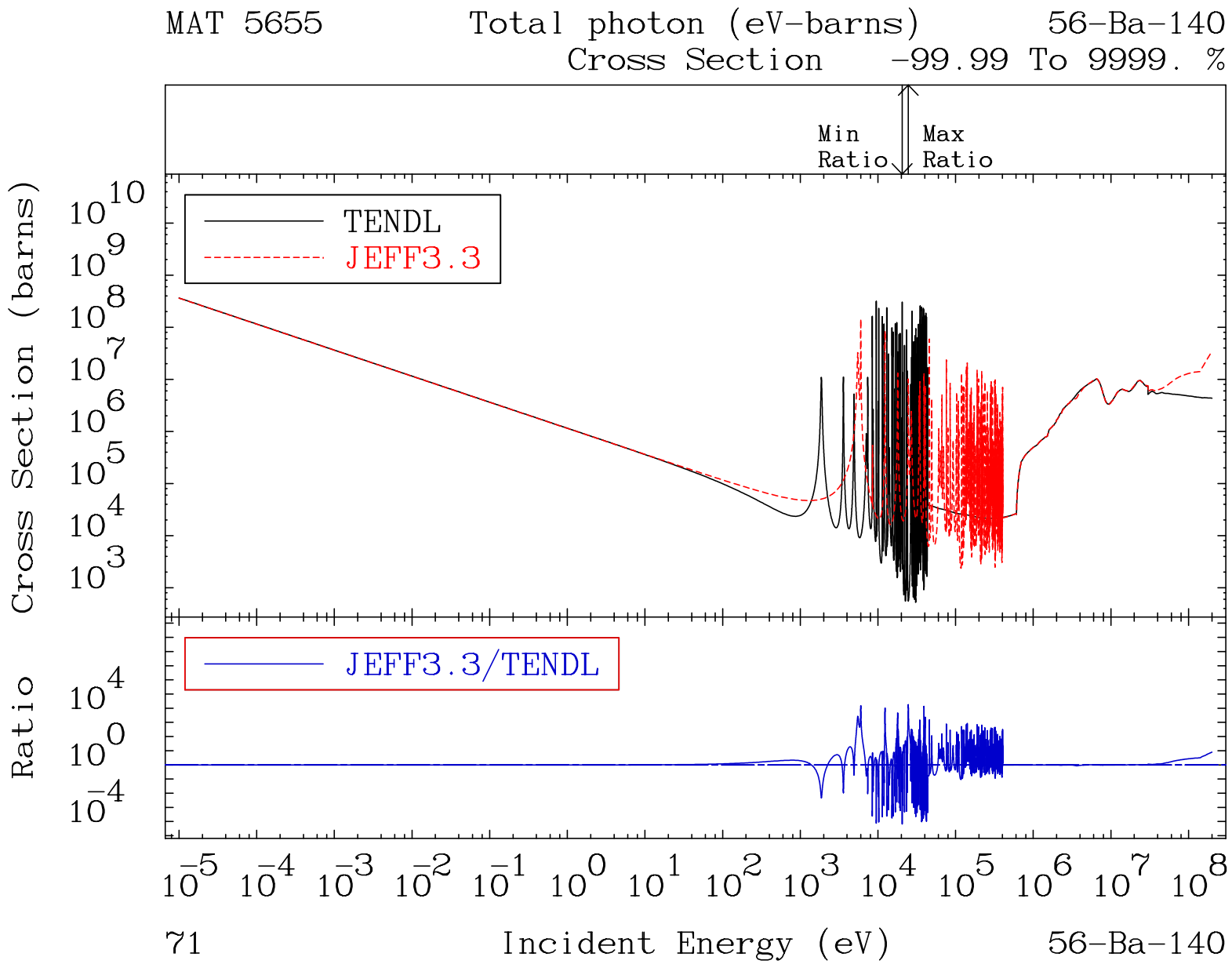

MAT 5655
Kerma elastic
Cross Section
56-Ba-140
-99.97 To 9999. %
Min Ratio
Max Ratio
TENDL
JEFF3.3
JEFF3.3/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
66
56-Ba-140

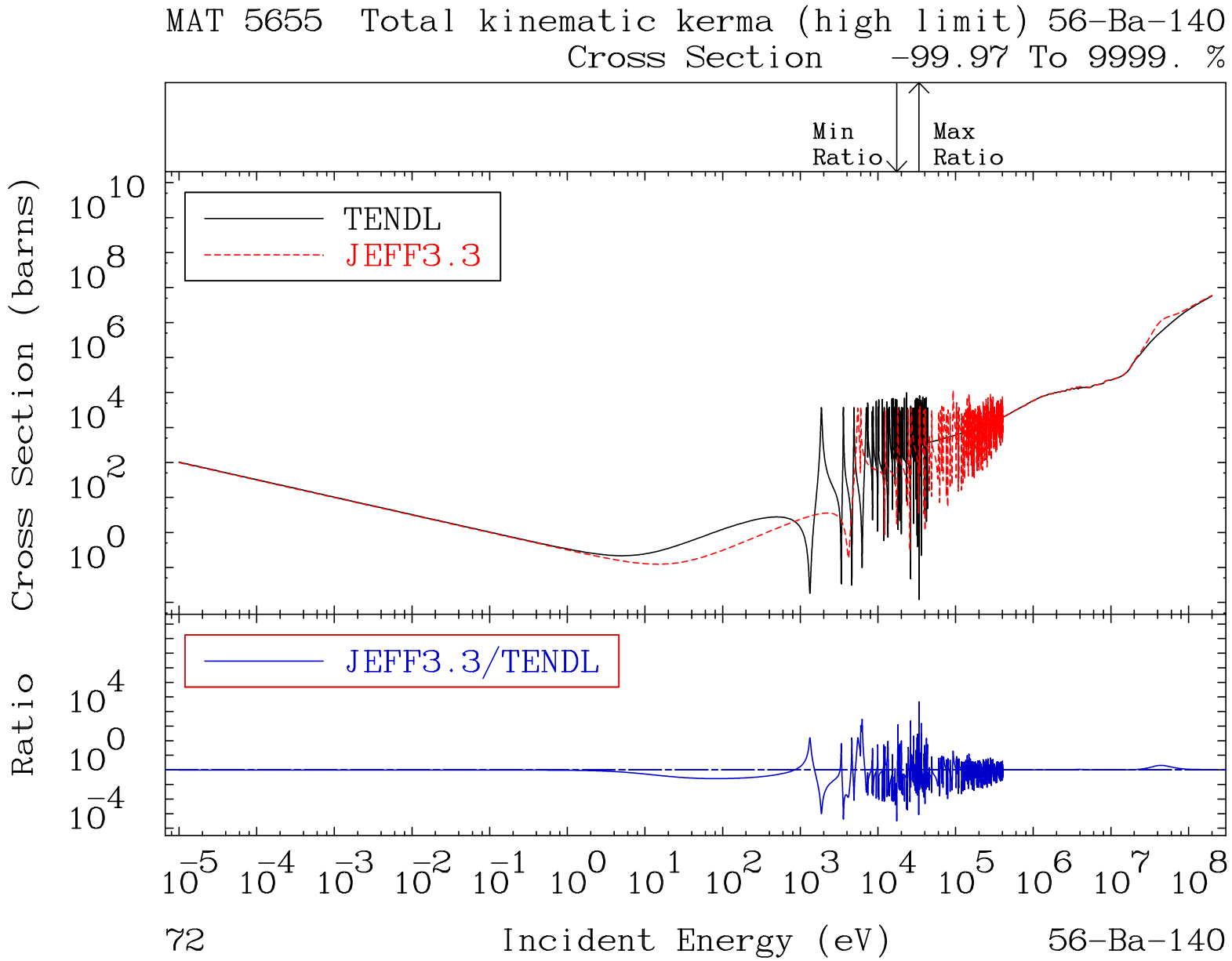

MAT 5655 Kerma non-elastic (all but mt2) 56-Ba-140
Cross Section -99.99 To 9999. %
Min Ratio
Max Ratio
TENDL
JEFF3.3
JEFF3.3/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
67
56-Ba-140

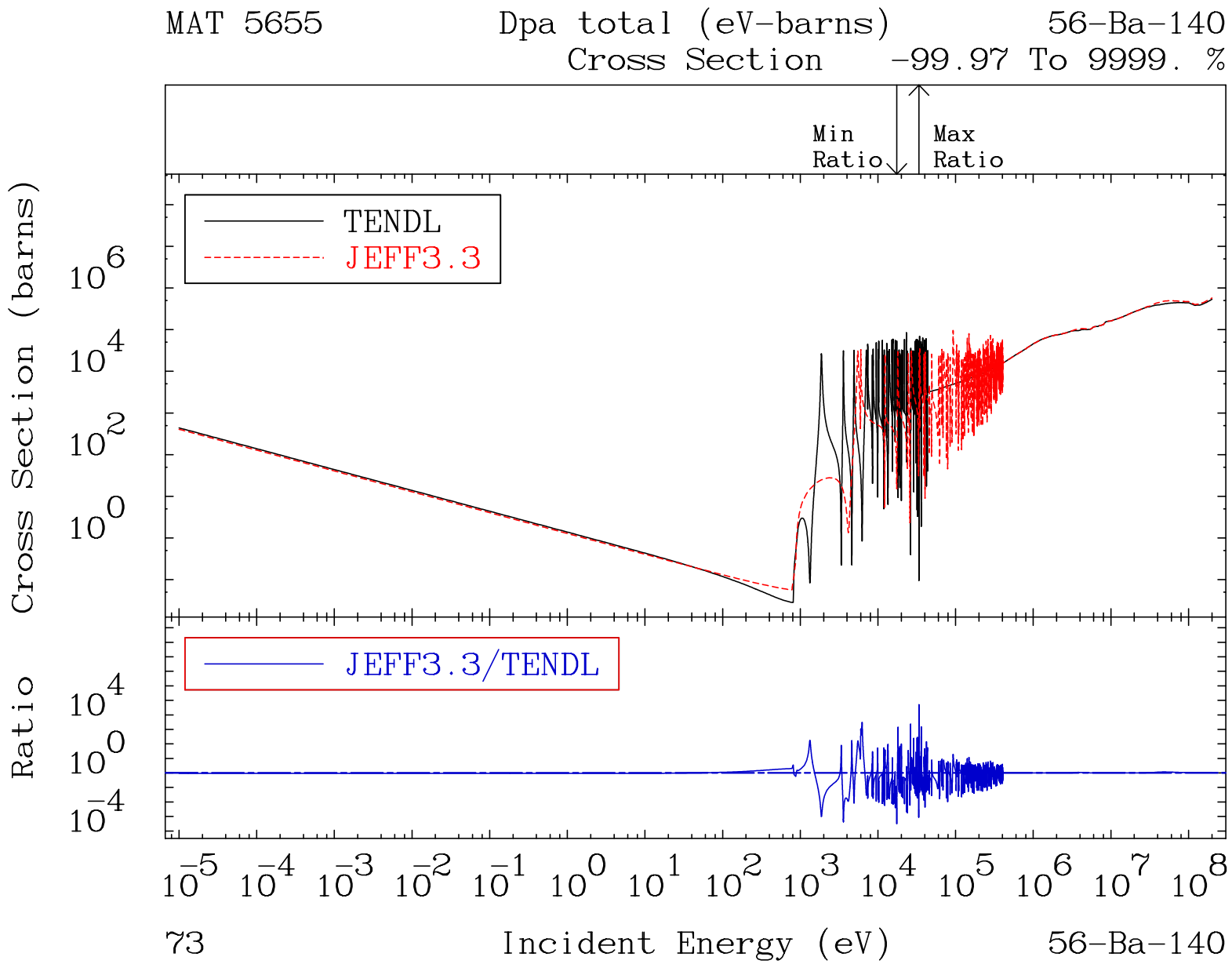

MAT 5655
Kerma inelastic (mt51-91)
56-Ba-140
Cross Section -33.66 To 9999. %
Max Ratio
Min Ratio
TENDL Threshold 606.71 keV
JEFF3.3 Threshold 606.71 keV
JEFF3.3/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
68
56-Ba-140

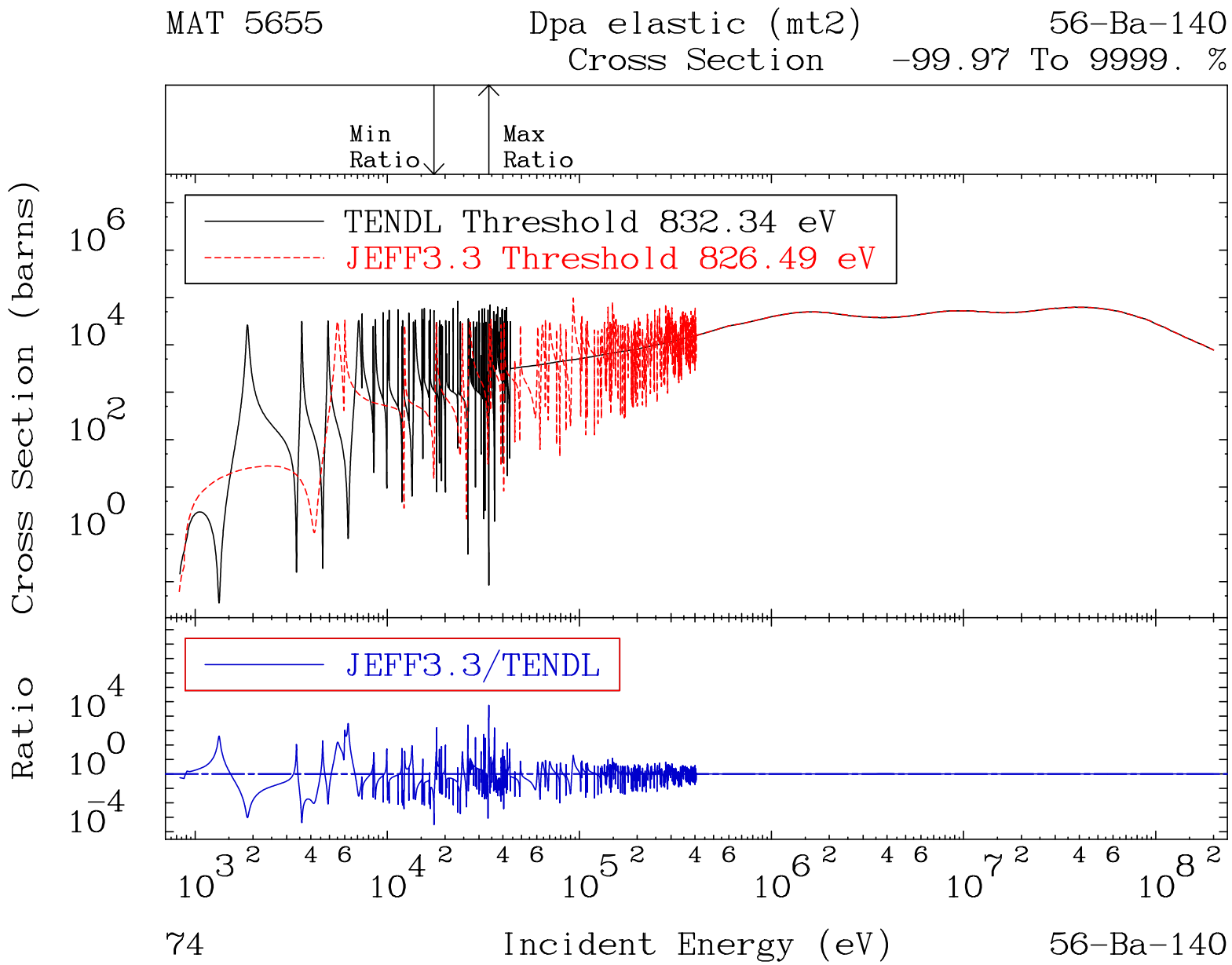

MAT 5655 Kerma fission (mt18 or mt19-20-21-38) 56-Ba-140
Cross Section -33.66 To 9999. %
Max Ratio
Min Ratio
TENDL
JEFF3.3
JEFF3.3/TENDL
Cross Section (barns)
Ratio
1.5
1.0
0.5
0.0
-0.5
-1.0
10^{8}
10^{4}
10^{0}
10^{-5} 10^{-4} 10^{-3} 10^{-2} 10^{-1} 10^{0} 10^{1} 10^{2} 10^{3} 10^{4} 10^{5} 10^{6} 10^{7} 10^{8}
69
Incident Energy (eV)
56-Ba-140

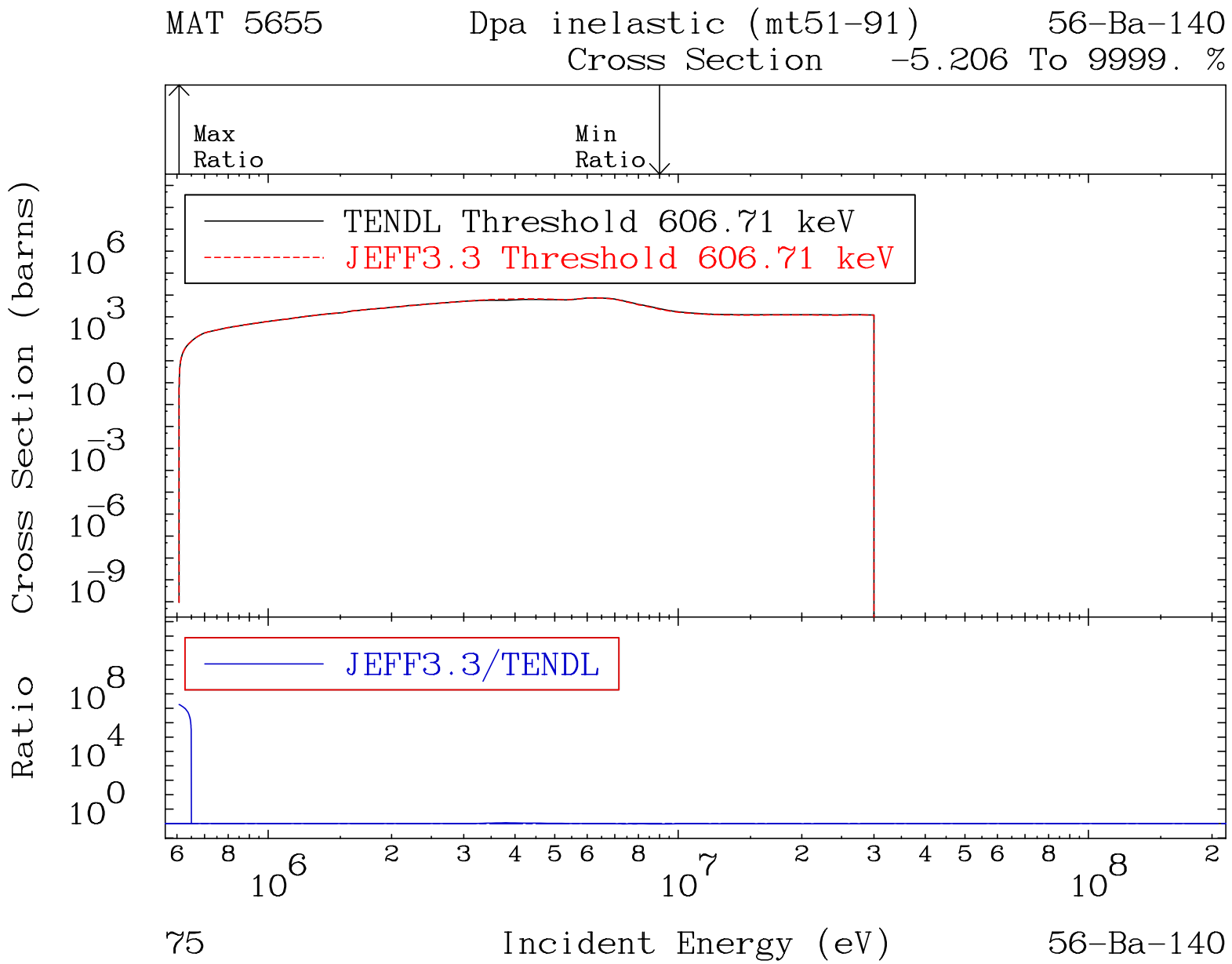

MAT 5655
Kerma capture (mt102)
56-Ba-140
Cross Section -99.99 To 9999. %
Min Ratio
Max Ratio
TENDL
JEFF3.3
JEFF3.3/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
70
56-Ba-140

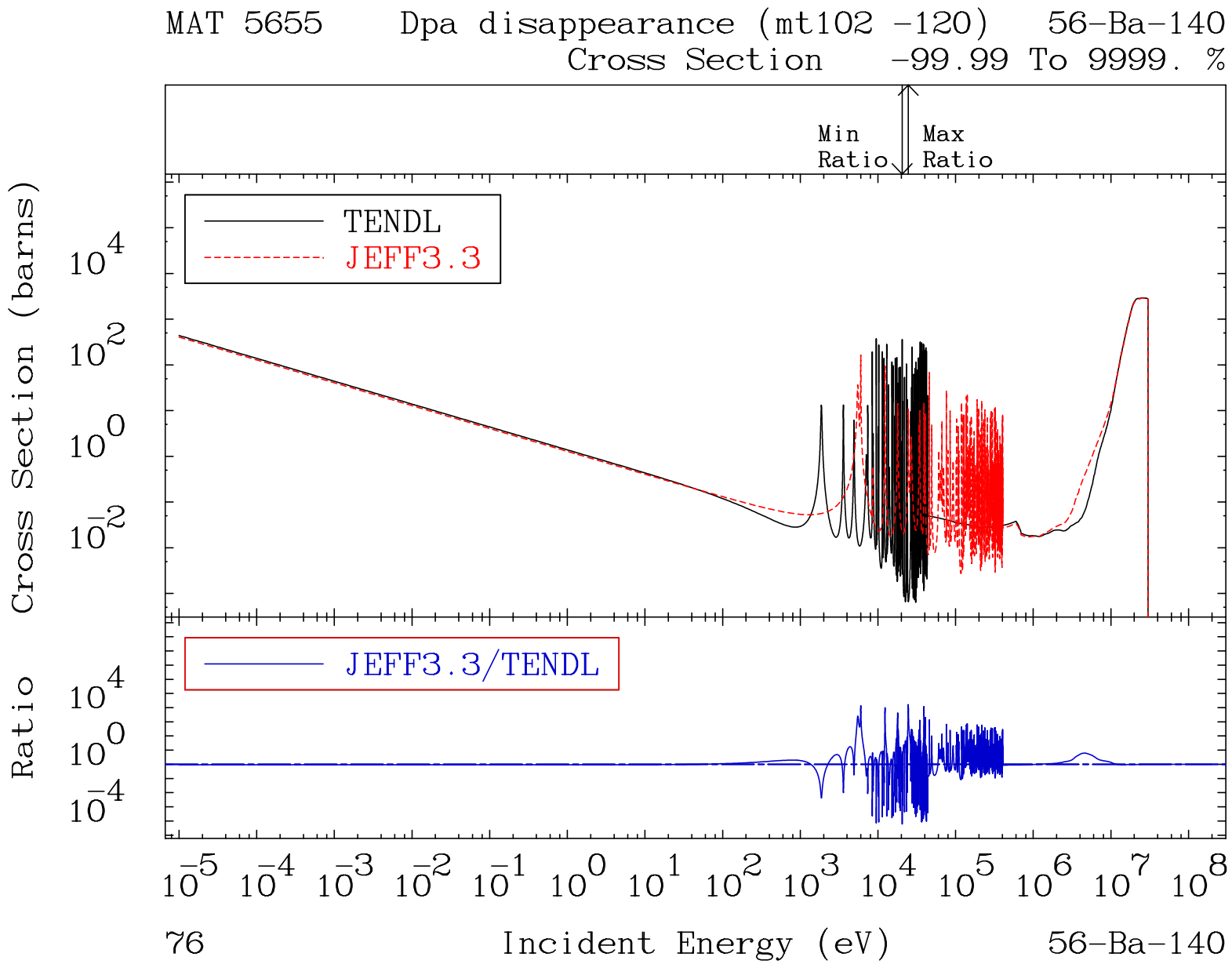

MAT 5655
Total photon (eV-barns)
56-Ba-140
Cross Section -99.99 To 9999. %
Min Ratio
Max Ratio
TENDL
JEFF3.3
Cross Section (barns)
JEFF3.3/TENDL
Ratio
Incident Energy (eV)
71
56-Ba-140

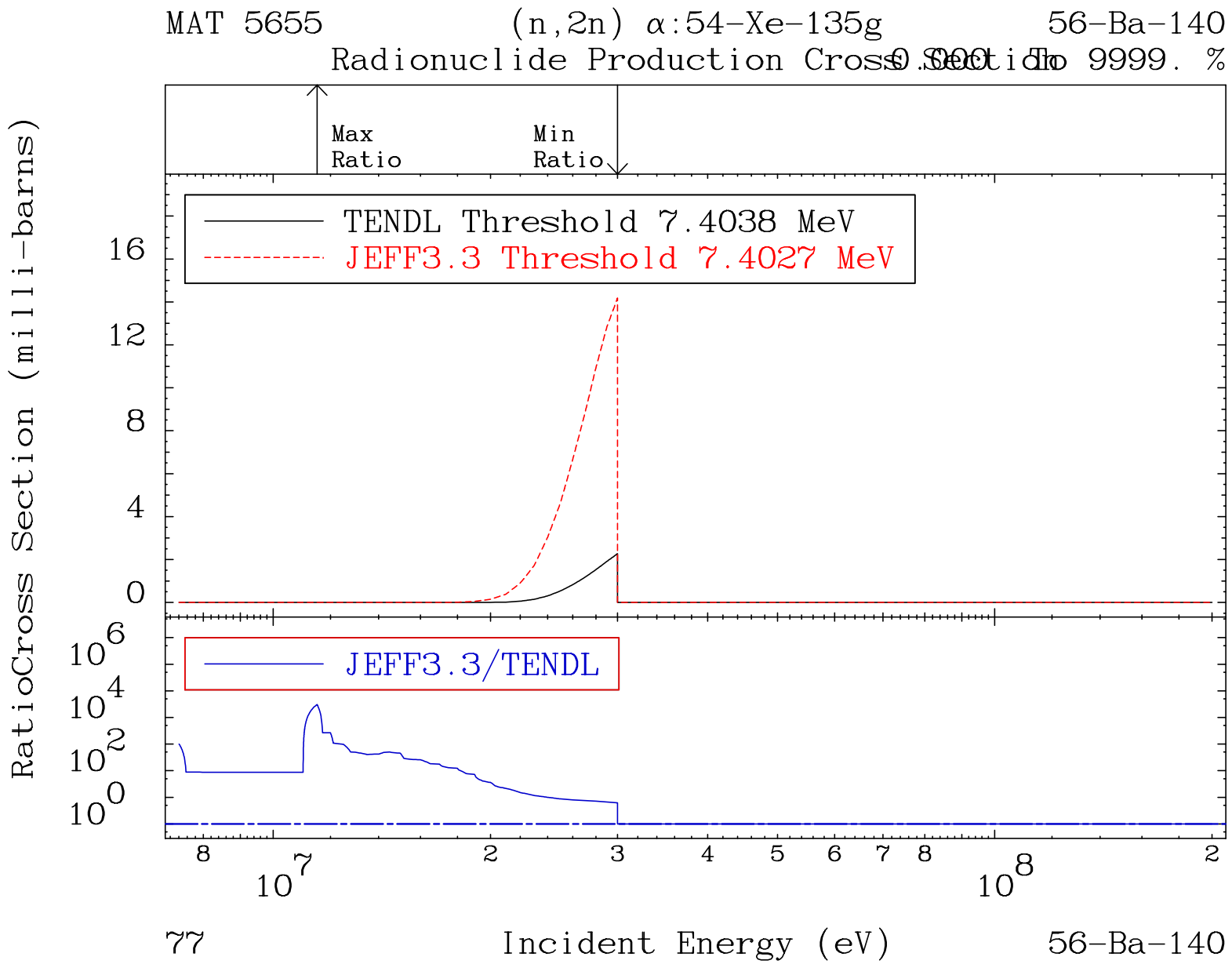

MAT 5655 Total kinematic kerma (high limit) 56-Ba-140
Cross Section -99.97 To 9999. %
Min Ratio
Max Ratio
TENDL
JEFF3.3
JEFF3.3/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
72
56-Ba-140

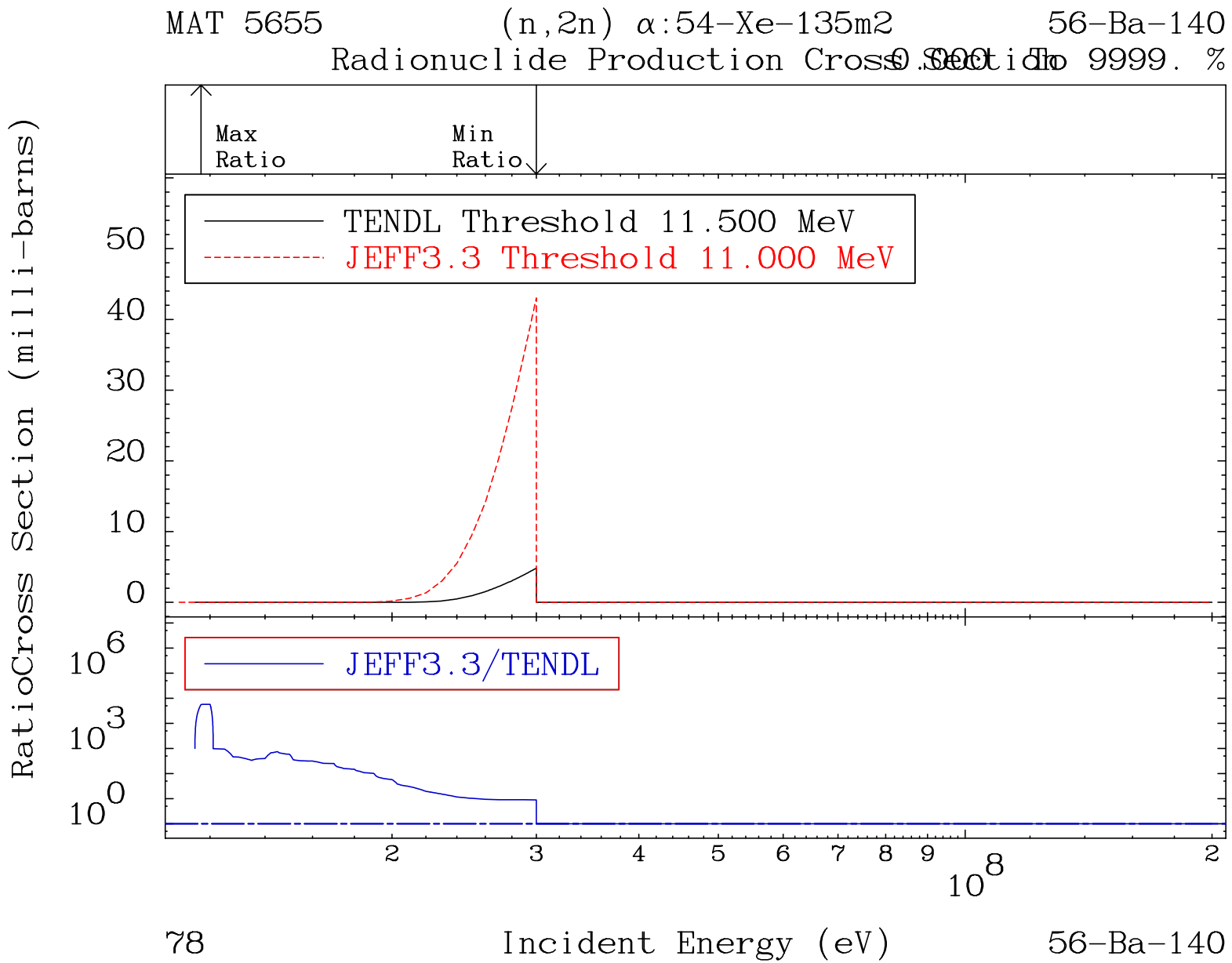

MAT 5655
Dpa total (eV-barns)
56-Ba-140
Cross Section -99.97 To 9999. %
Min Ratio
Max Ratio
TENDL
JEFF3.3
JEFF3.3/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
73
56-Ba-140

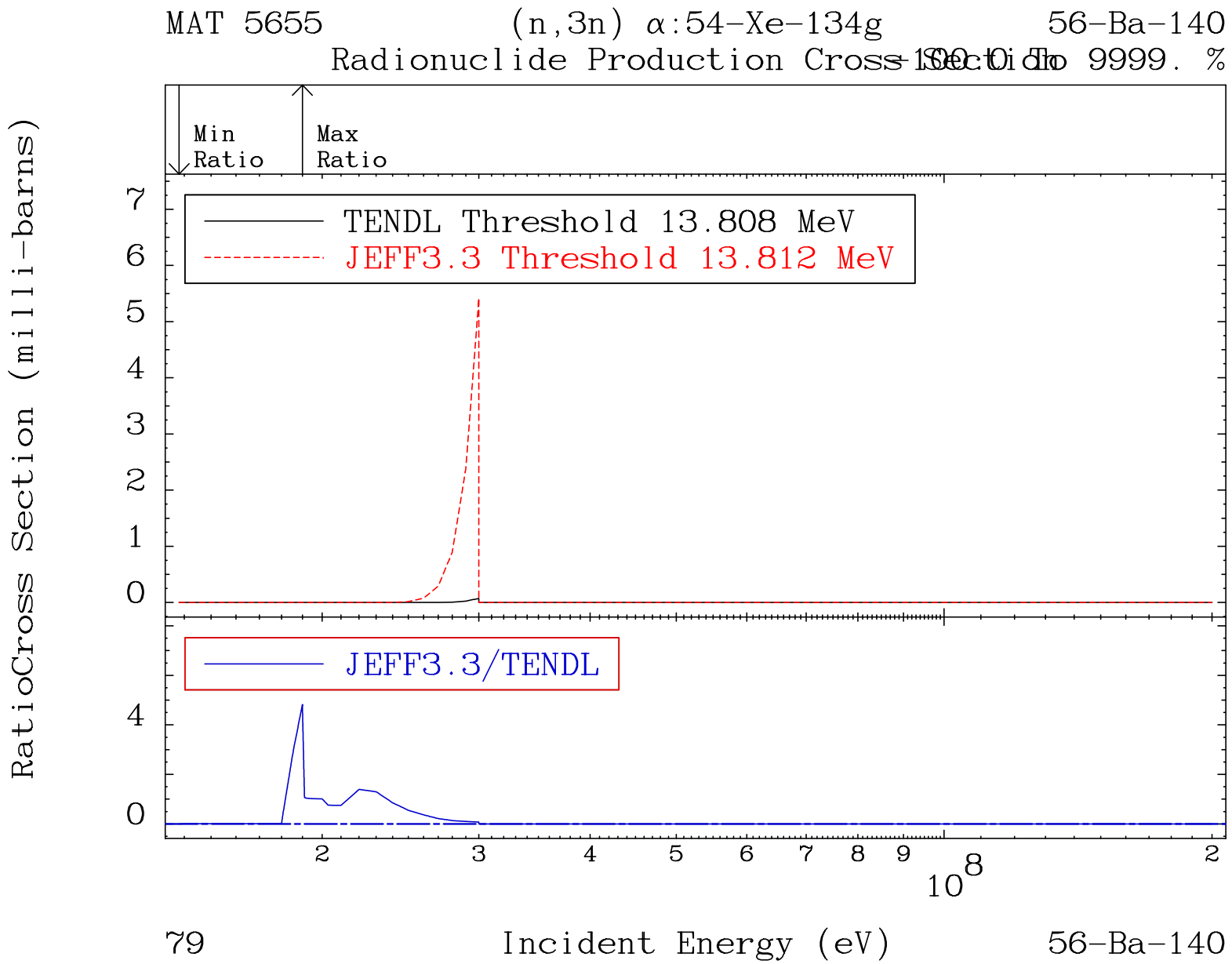

MAT 5655
Dpa elastic (mt2)
Cross Section
56-Ba-140
-99.97 To 9999. %
Min Ratio
Max Ratio
TENDL Threshold 832.34 eV
JEFF3.3 Threshold 826.49 eV
JEFF3.3/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
74
56-Ba-140

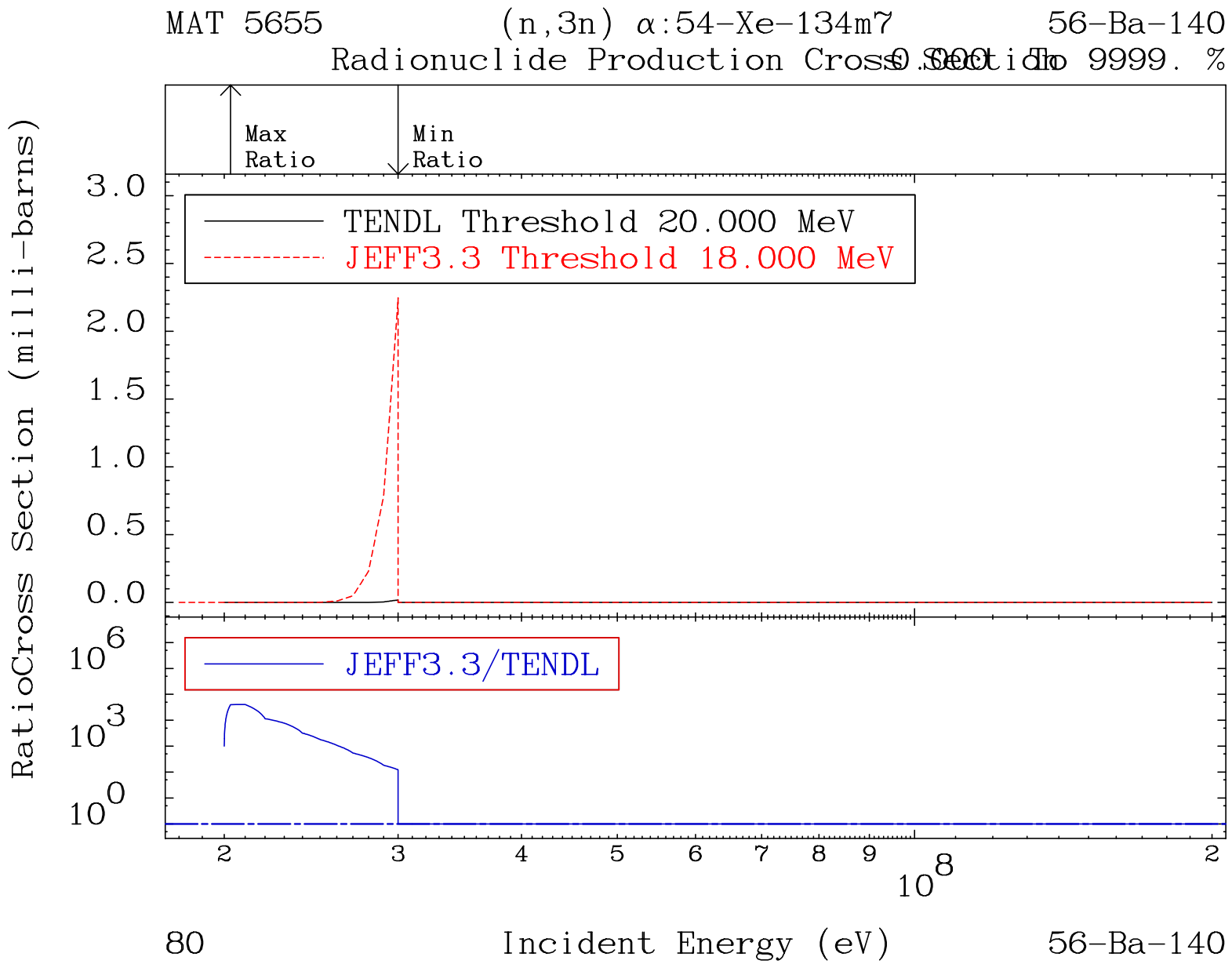

MAT 5655
Dpa inelastic (mt51-91)
56-Ba-140
Cross Section
-5.206 To 9999. %
Max Ratio
Min Ratio
TENDL Threshold 606.71 keV
JEFF3.3 Threshold 606.71 keV
JEFF3.3/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
75
56-Ba-140

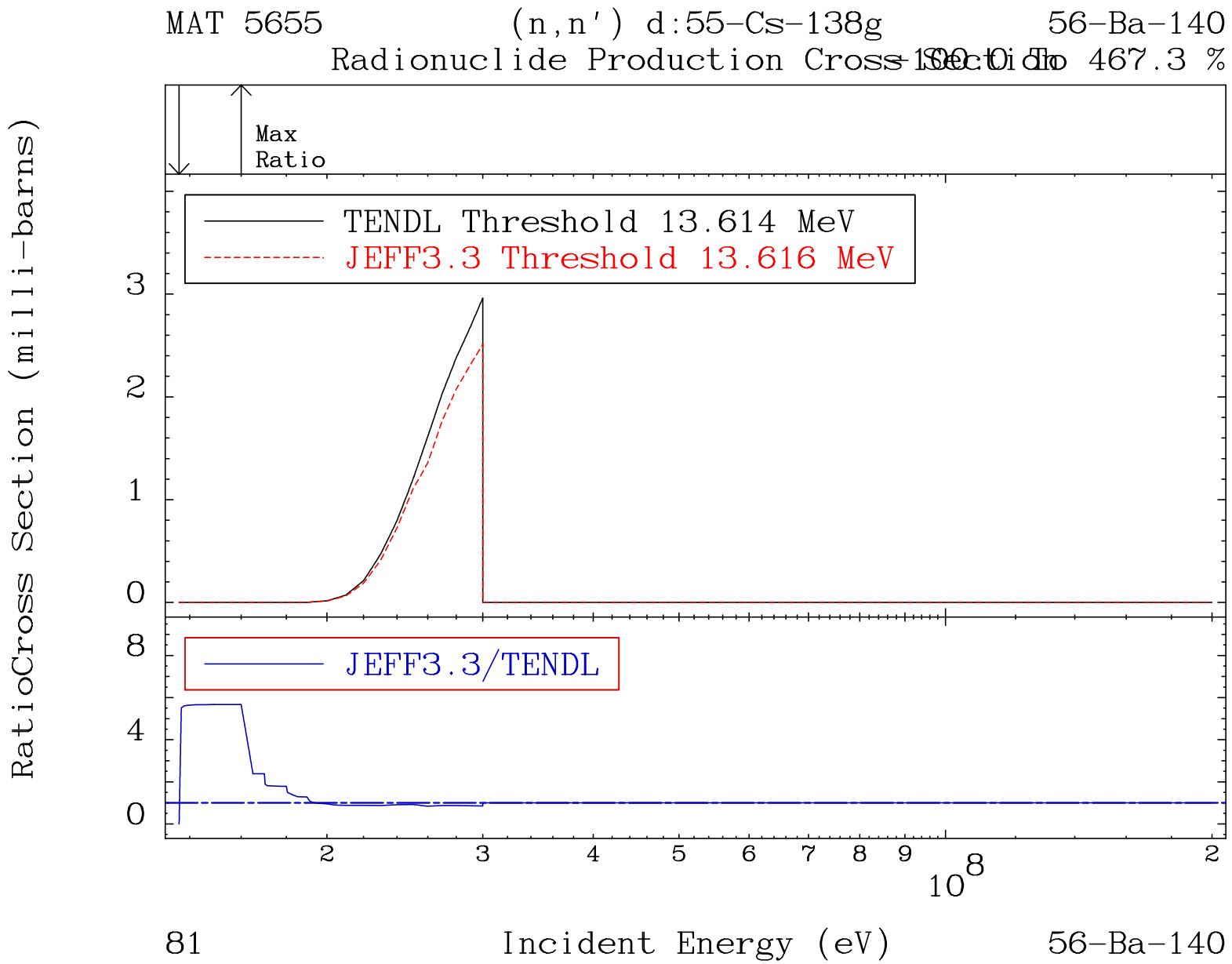

MAT 5655 Dpa disappearance (mt102 -120) 56-Ba-140
Cross Section -99.99 To 9999. %
Min Ratio
Max Ratio
TENDL
JEFF3.3
JEFF3.3/TENDL
Cross Section (barns)
Ratio
Incident Energy (eV)
76
56-Ba-140

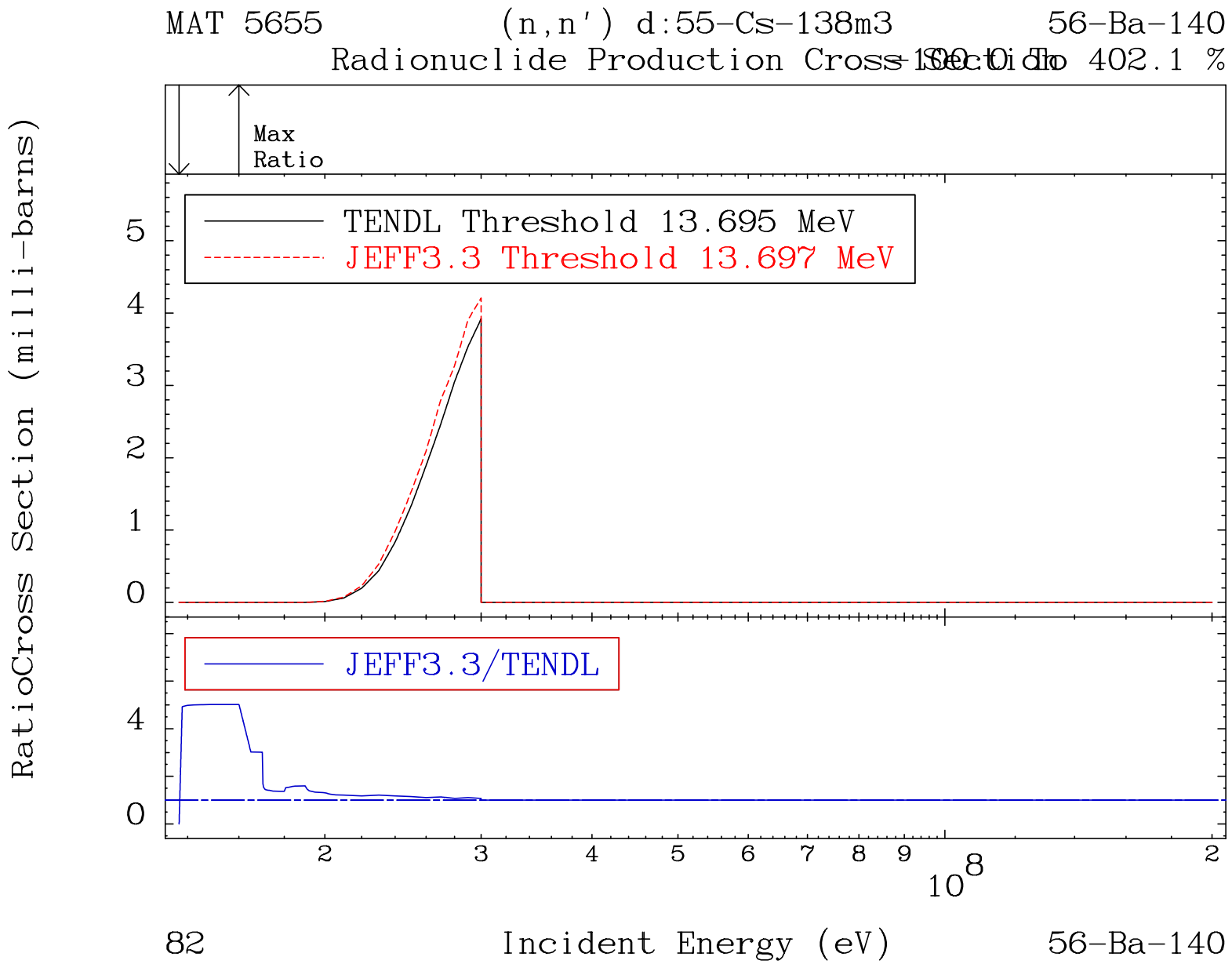

MAT 5655
(n,2n) α:54-Xe-135g
56-Ba-140
Radionuclide Production Cross Section
0.000 To 9999. %
Max Ratio
Min Ratio
TENDL Threshold 7.4038 MeV
JEFF3.3 Threshold 7.4027 MeV
JEFF3.3/TENDL
RatioCross Section (milli-barns)
16
12
8
4
0
10^6
10^4
10^2
10^0
8
2
3
4
5
6
7
8
2
10^7
10^8
77
Incident Energy (eV)
56-Ba-140

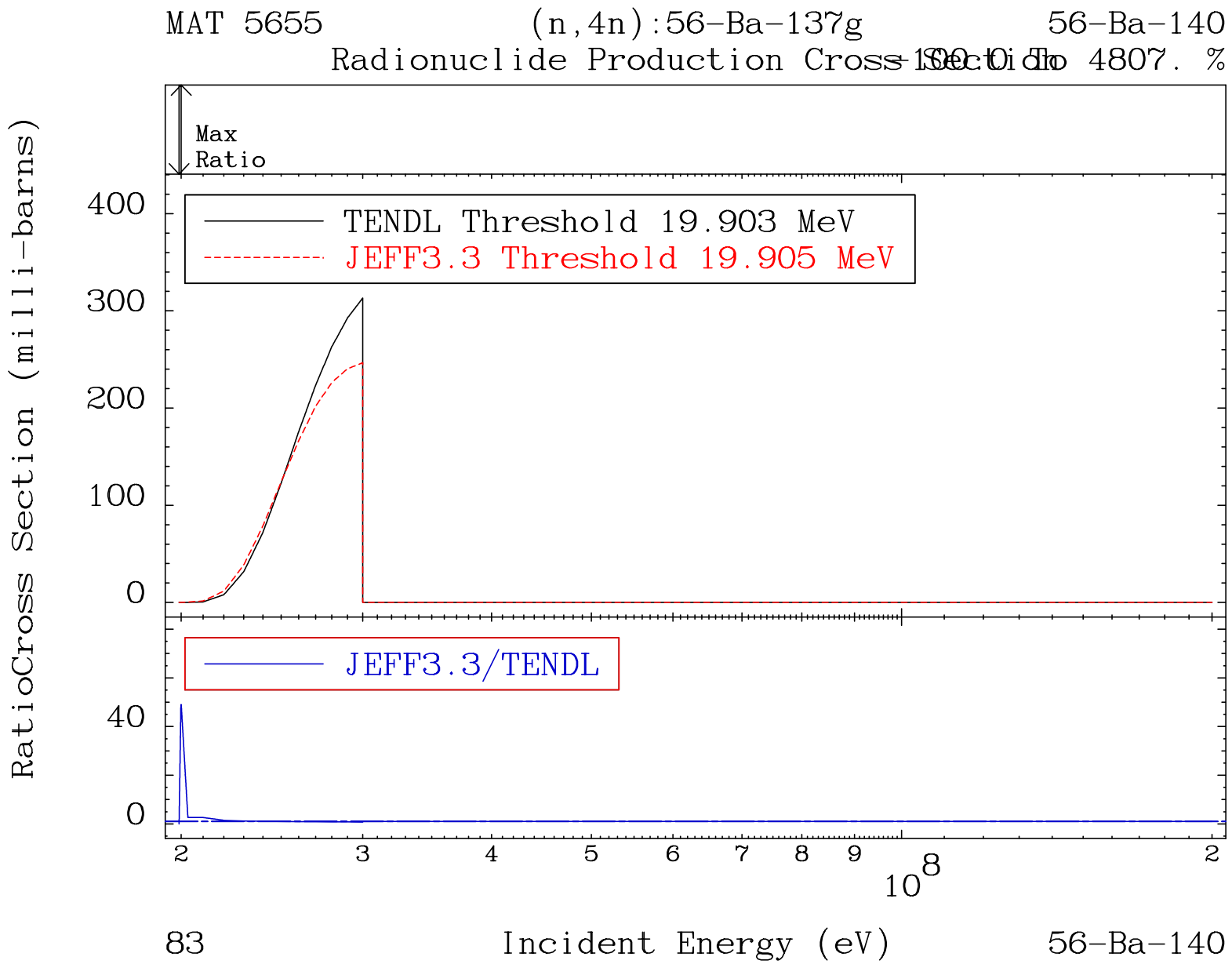

MAT 5655
(n,2n) α:54-Xe-135m2
56-Ba-140
Radionuclide Production Cross Section
0.000 To 9999. %
Max Ratio
Min Ratio
TENDL Threshold 11.500 MeV
JEFF3.3 Threshold 11.000 MeV
JEFF3.3/TENDL
RatioCross Section (milli-barns)
50
40
30
20
10
0
10^6
10^3
10^0
2
3
4
5
6
7
8
9
10^8
2
78
Incident Energy (eV)
56-Ba-140

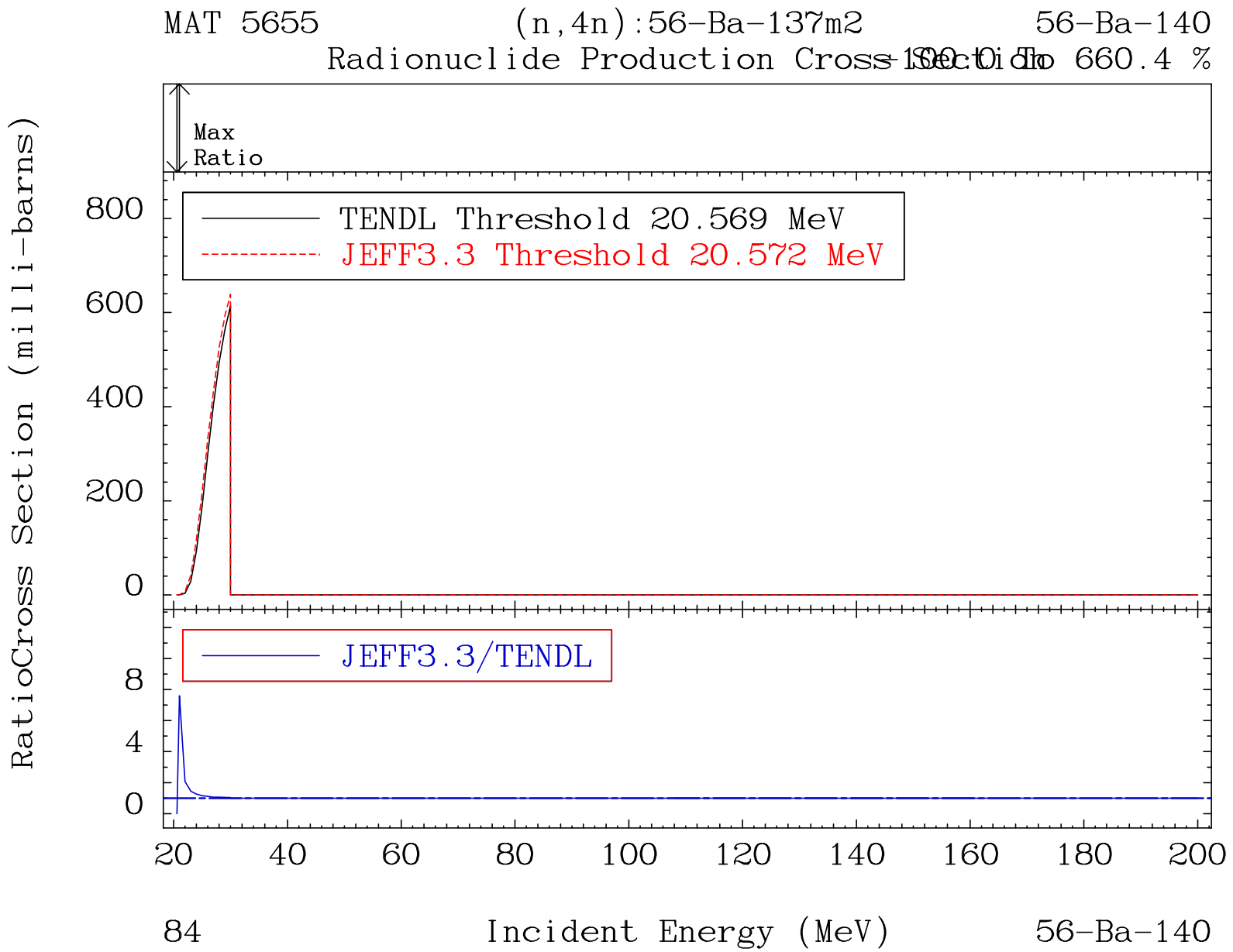

MAT 5655
(n,3n) α:54-Xe-134g
56-Ba-140
Radionuclide Production Cross Section
Min Ratio
Max Ratio
TENDL Threshold 13.808 MeV
JEFF3.3 Threshold 13.812 MeV
JEFF3.3/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
79
56-Ba-140

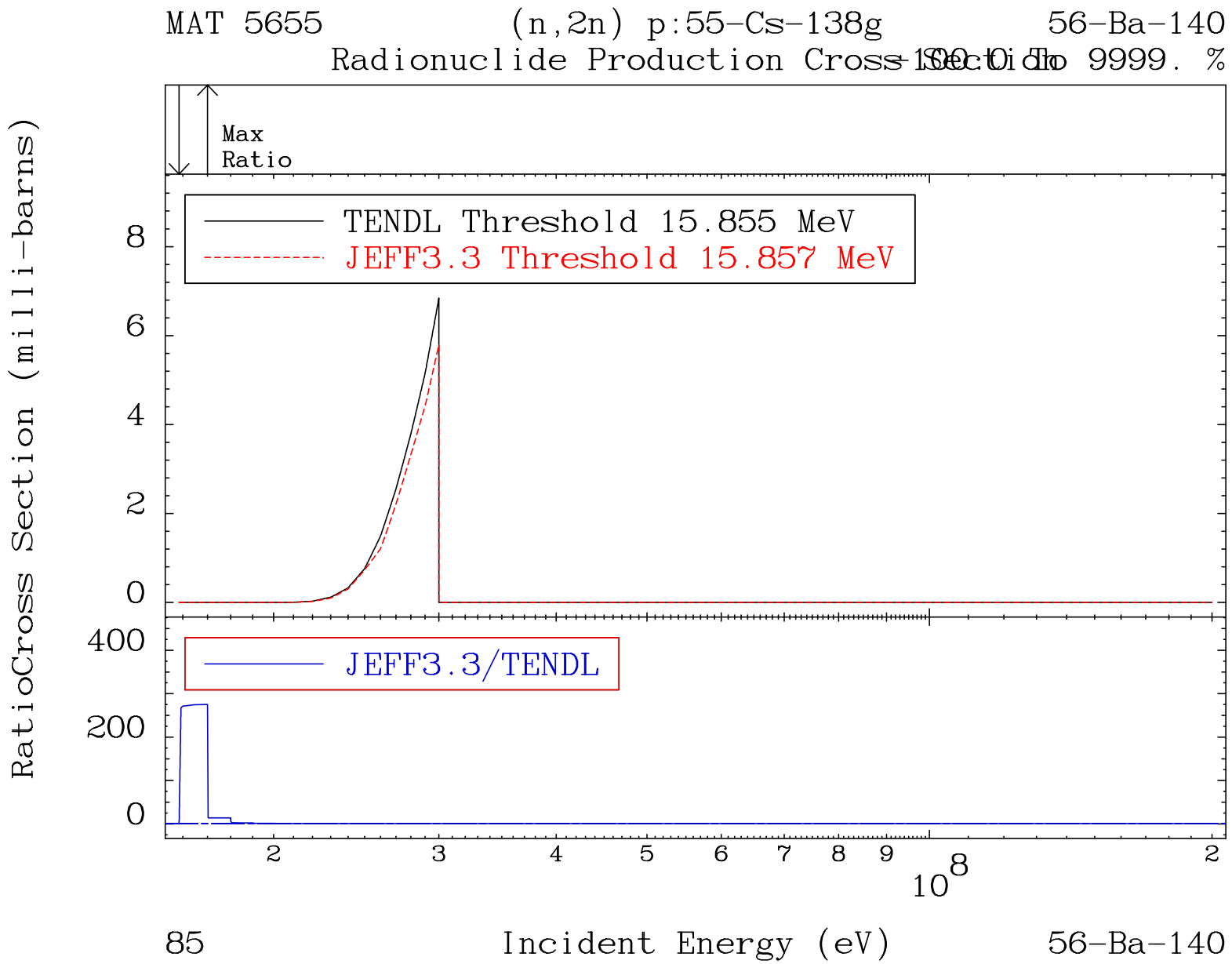

MAT 5655
(n,3n) α:54-Xe-134m7
56-Ba-140
Radionuclide Production Cross Section
0.000 To 9999. %
Max Ratio
Min Ratio
TENDL Threshold 20.000 MeV
JEFF3.3 Threshold 18.000 MeV
JEFF3.3/TENDL
RatioCross Section (milli-barns)
3.0
2.5
2.0
1.5
1.0
0.5
0.0
10^6
10^3
10^0
2
3
4
5
6
7
8
9
10^8
2
80
Incident Energy (eV)
56-Ba-140

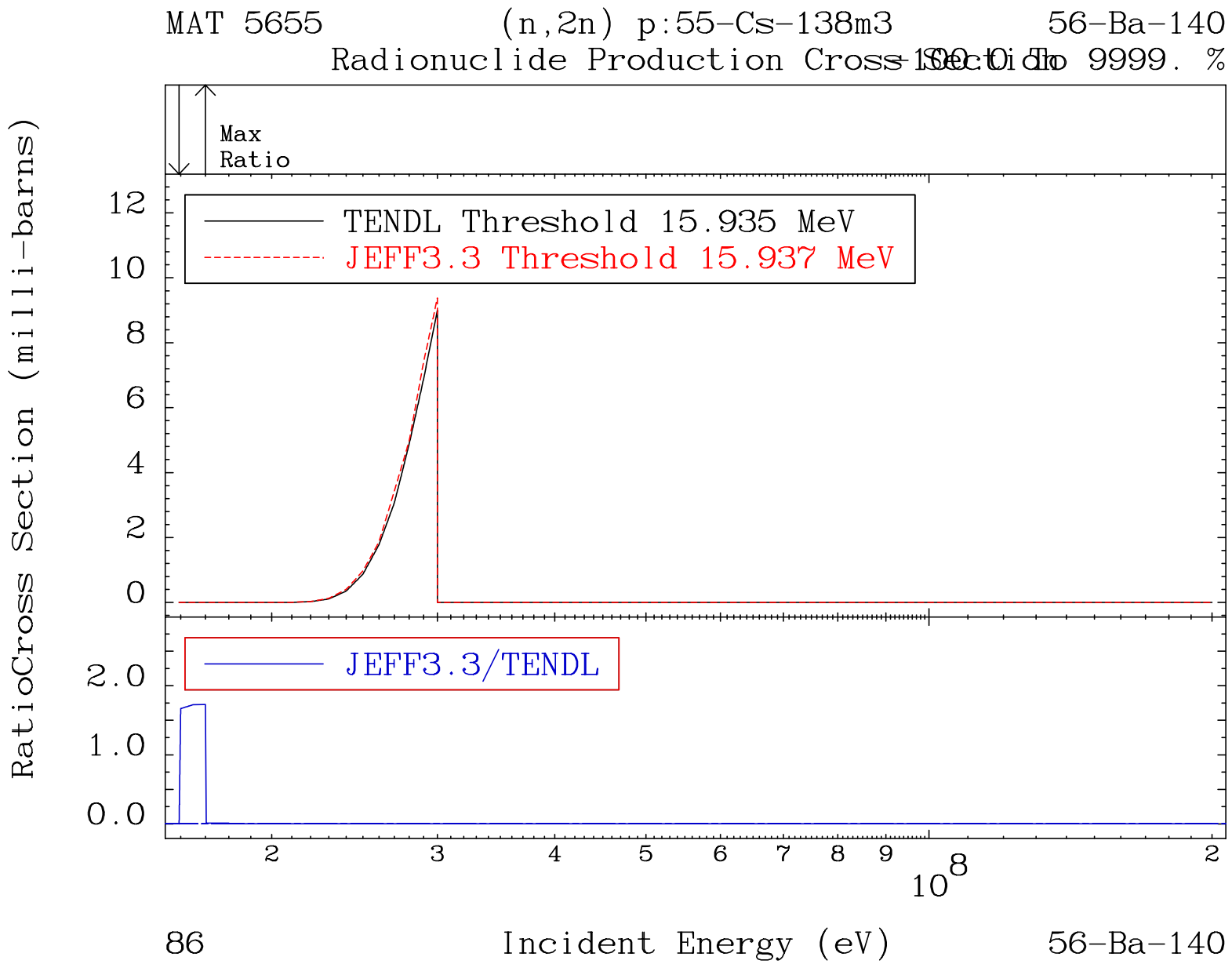

MAT 5655
(n,n') d:55-Cs-138g
56-Ba-140
Radionuclide Production Cross Section To 467.3 %
Max
Ratio
TENDL Threshold 13.614 MeV
JEFF3.3 Threshold 13.616 MeV
JEFF3.3/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
81
56-Ba-140

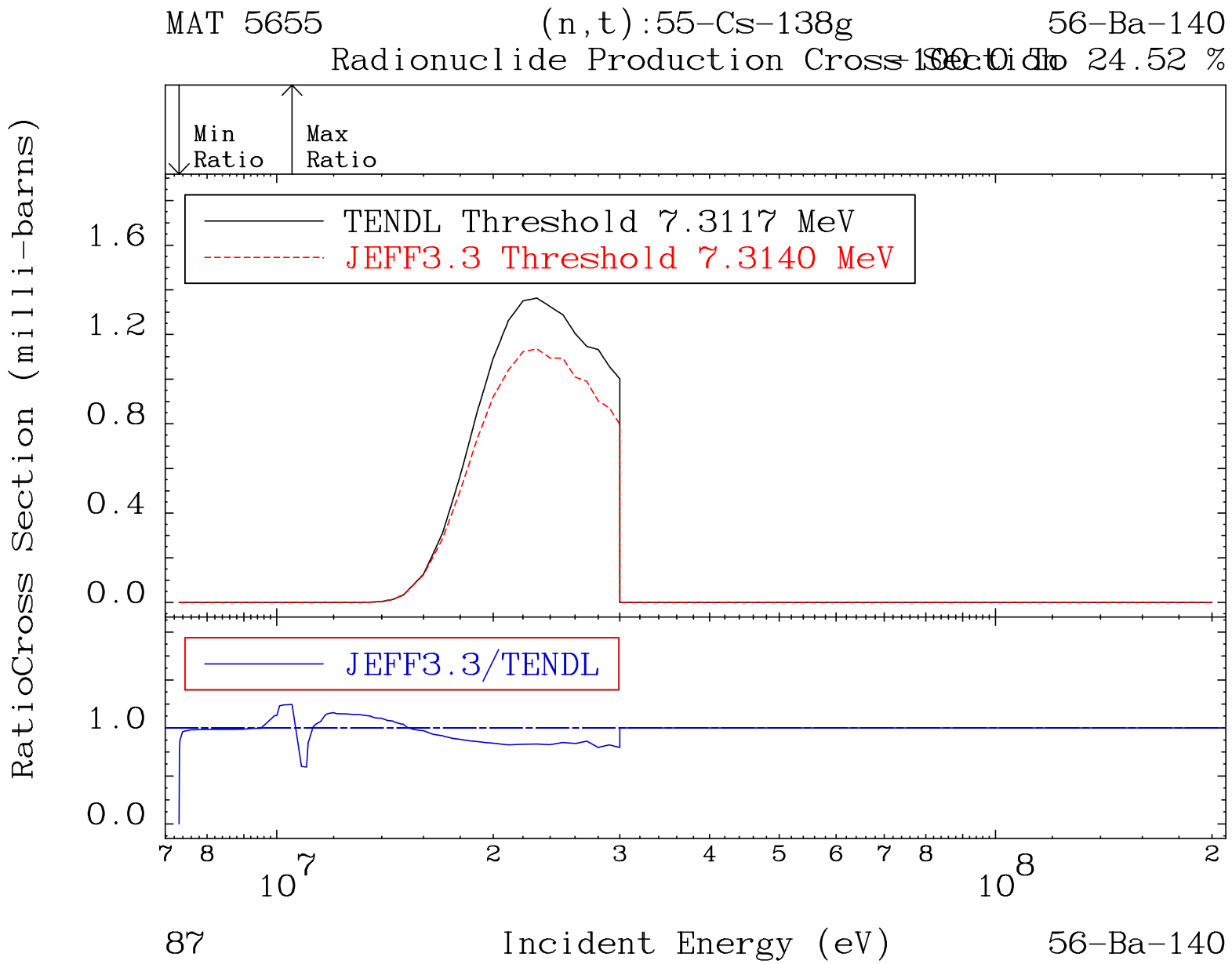

MAT 5655
(n,n') d:55-Cs-138m3
56-Ba-140
Radionuclide Production Cross Section To 402.1 %
Max
Ratio
TENDL Threshold 13.695 MeV
JEFF3.3 Threshold 13.697 MeV
JEFF3.3/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
82
56-Ba-140

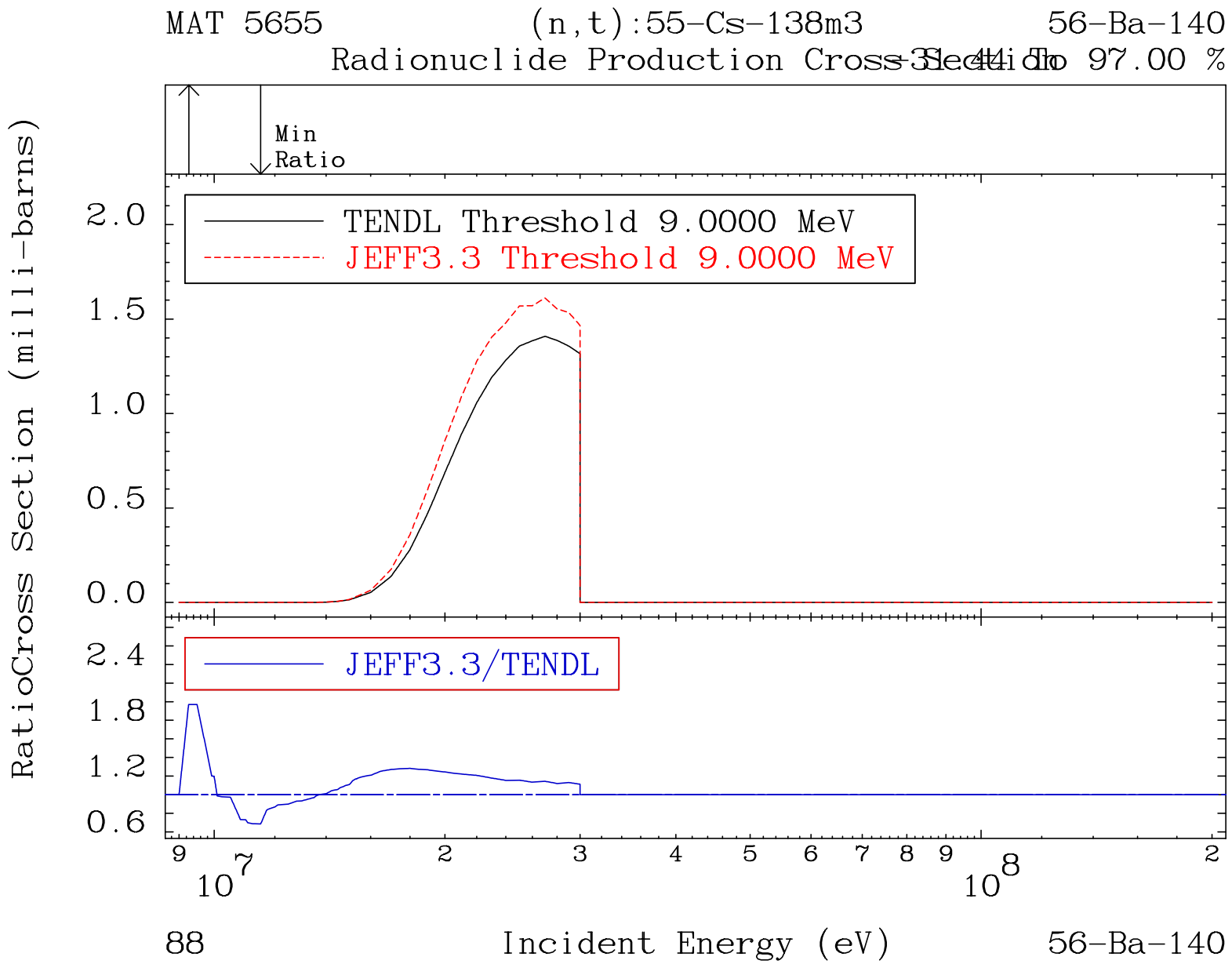

MAT 5655
(n,4n):56-Ba-137g
56-Ba-140
Radionuclide Production Cross Section To 4807. %
Max
Ratio
400
300
200
100
0
TENDL Threshold 19.903 MeV
JEFF3.3 Threshold 19.905 MeV
JEFF3.3/TENDL
40
0
2
3
4
5
6
7
8
9
2
10^8
RatioCross Section (milli-barns)
83
Incident Energy (eV)
56-Ba-140

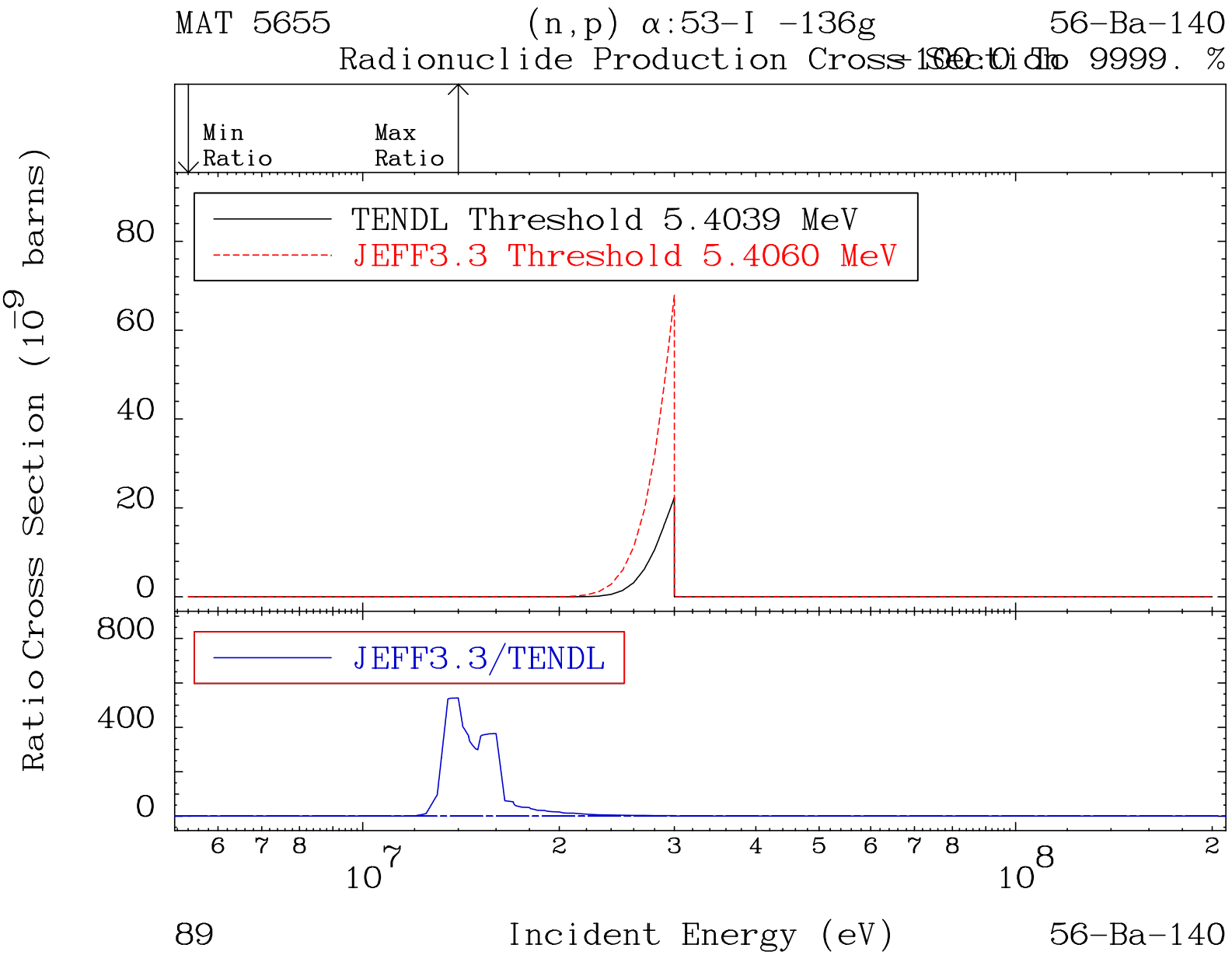

MAT 5655
(n,4n):56-Ba-137m2
56-Ba-140
Radionuclide Production Cross Section To 660.4 %
Max
Ratio
800
600
400
200
0
TENDL Threshold 20.569 MeV
JEFF3.3 Threshold 20.572 MeV
JEFF3.3/TENDL
8
4
0
20
40
60
80
100
120
140
160
180
200
RatioCross Section (milli-barns)
84
Incident Energy (MeV)
56-Ba-140


MAT 5655
(n,2n) p:55-Cs-138g
56-Ba-140
Radionuclide Production Cross Section
Max
Ratio
TENDL Threshold 15.855 MeV
JEFF3.3 Threshold 15.857 MeV
JEFF3.3/TENDL
RatioCross Section (milli-barns)
Incident Energy (eV)
85
56-Ba-140


MAT 5655
(n,2n) p:55-Cs-138m3
56-Ba-140
Radionuclide Production Cross Section To 9999. %
Max
Ratio
TENDL Threshold 15.935 MeV
JEFF3.3 Threshold 15.937 MeV
JEFF3.3/TENDL
RatioCross Section (milli-barns)
12
10
8
6
4
2
0
2.0
1.0
0.0
2
3
4
5
6
7
8
9
10^8
2
86
Incident Energy (eV)
56-Ba-140


MAT 5655
(n,t):55-Cs-138g
56-Ba-140
Radionuclide Production Cross Section To 24.52 %
Min Ratio
Max Ratio
TENDL Threshold 7.3117 MeV
JEFF3.3 Threshold 7.3140 MeV
JEFF3.3/TENDL
RatioCross Section (milli-barns)
1.6
1.2
0.8
0.4
0.0
1.0
0.0
7 8 10^7 2 3 4 5 6 7 8 10^8 2
87
Incident Energy (eV)
56-Ba-140


MAT 5655
(n,t):55-Cs-138m3
56-Ba-140
Radionuclide Production Cross-Section To 97.00 %
Min
Ratio
TENDL Threshold 9.0000 MeV
JEFF3.3 Threshold 9.0000 MeV
JEFF3.3/TENDL
RatioCross Section (milli-barns)
2.0
1.5
1.0
0.5
0.0
2.4
1.8
1.2
0.6
9
10^7
2
3
4
5
6
7
8
9
10^8
2
88
Incident Energy (eV)
56-Ba-140


MAT 5655
(n,p) α:53-I -136g
56-Ba-140
Radionuclide Production Cross Section To 9999. %
Min Ratio
Max Ratio
TENDL Threshold 5.4039 MeV
JEFF3.3 Threshold 5.4060 MeV
JEFF3.3/TENDL
Ratio Cross Section (10^-9 barns)
80
60
40
20
0
800
400
0
6 7 8
10^7
2 3 4 5 6 7 8
10^8
2
89
Incident Energy (eV)
56-Ba-140