

Program Complot
(Version 2018-1)

by

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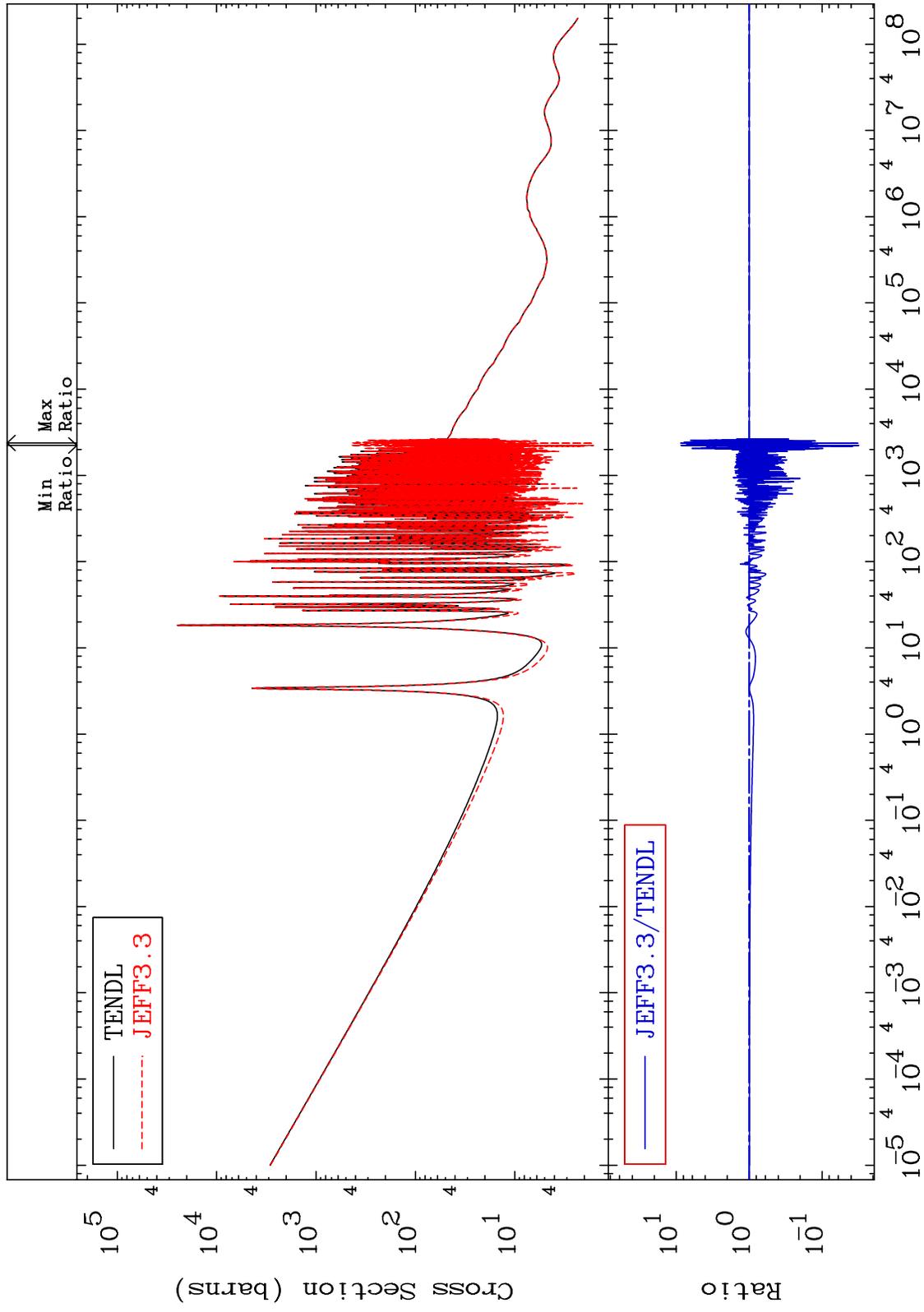
E.Mail: redcullen1@comcast.net
Web: redcullen1.net/HOMEPAGE.NEW

Press Mouse Button to Start

MAT 6234

Total
Cross Section

62-Sm-147
-96.89 To 771.4 %



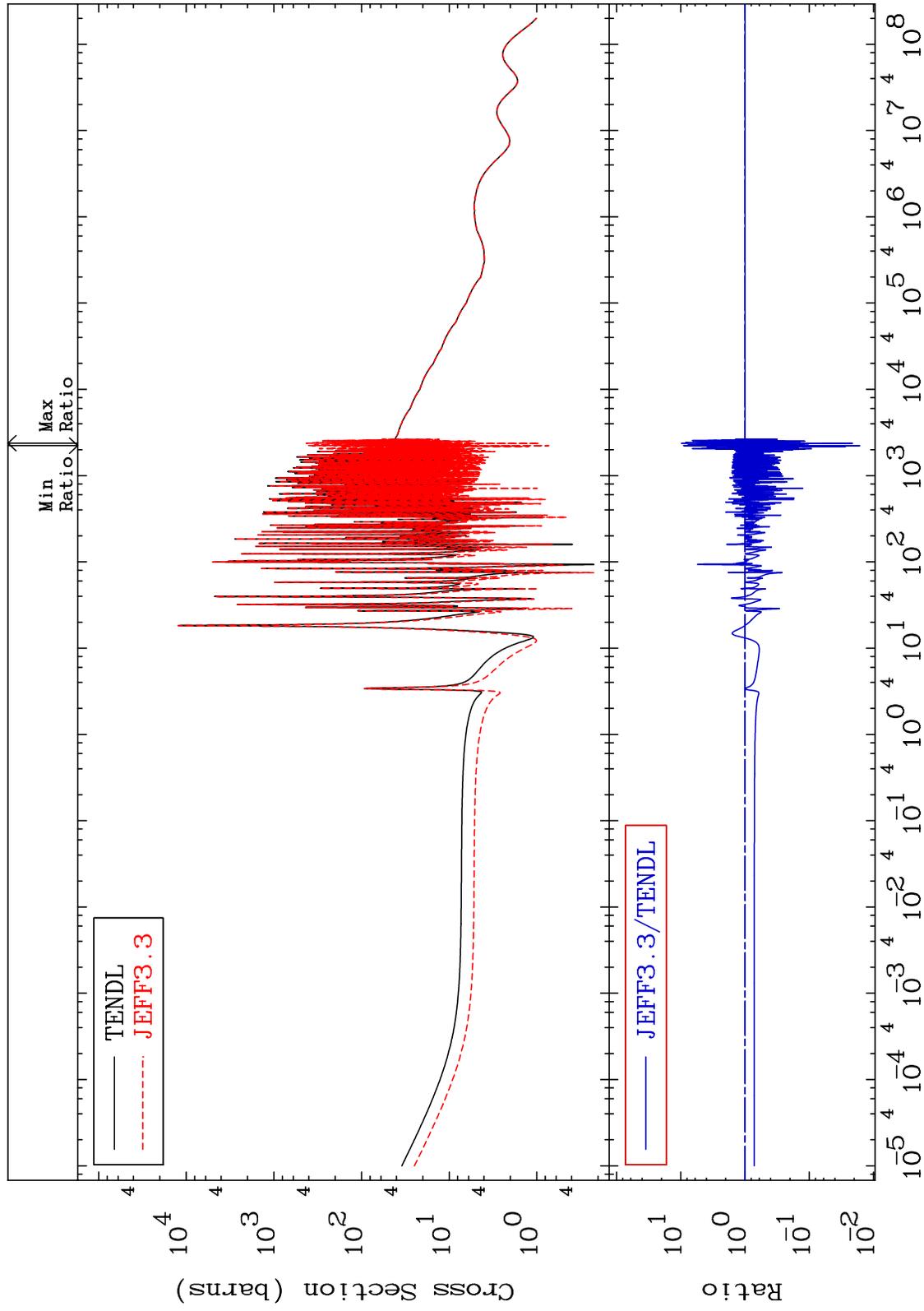
Incident Energy (eV)

62-Sm-147

MAT 6234

Elastic
Cross Section

62-Sm-147
-98.37 To 876.8 %



2

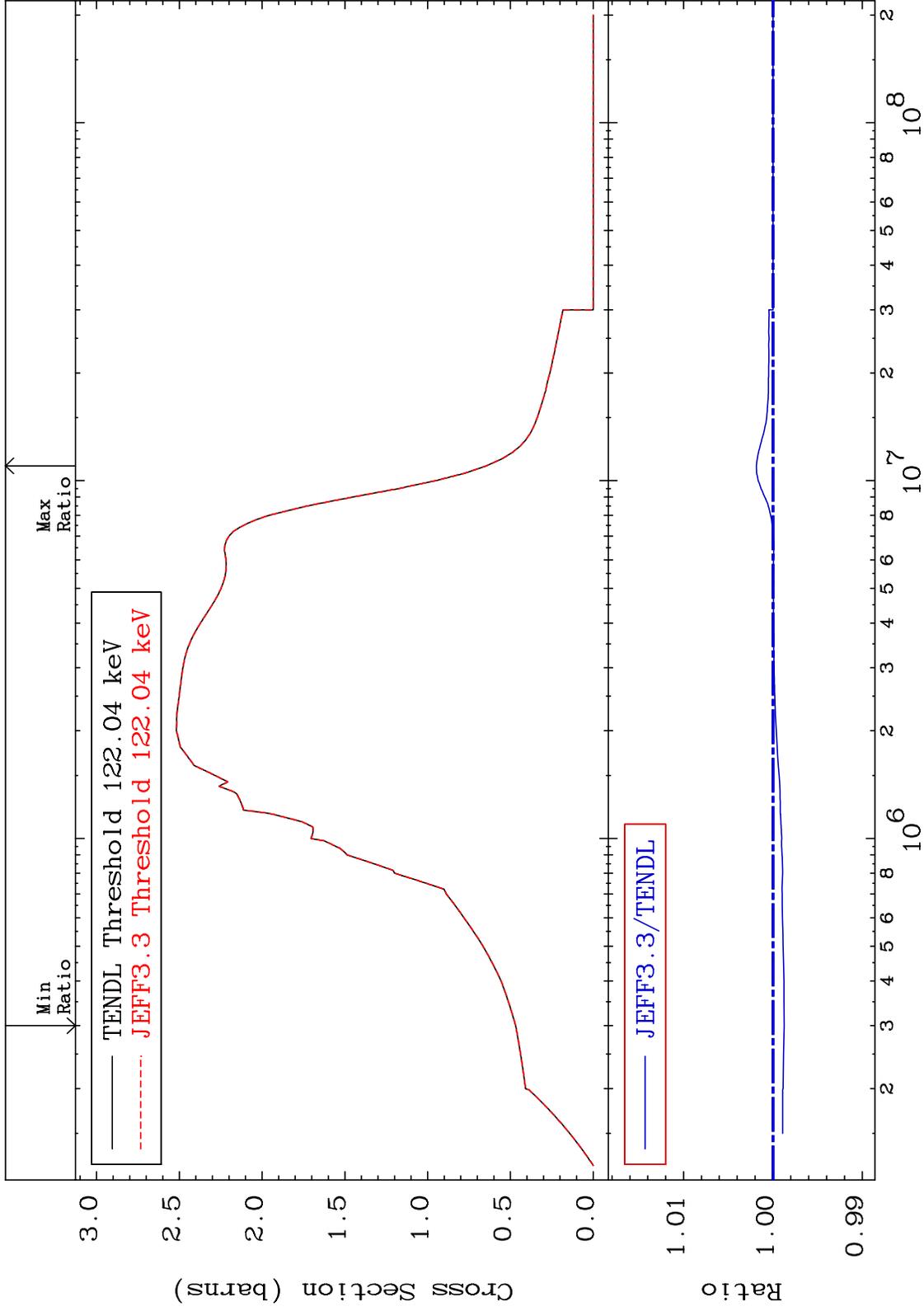
Incident Energy (eV)

62-Sm-147

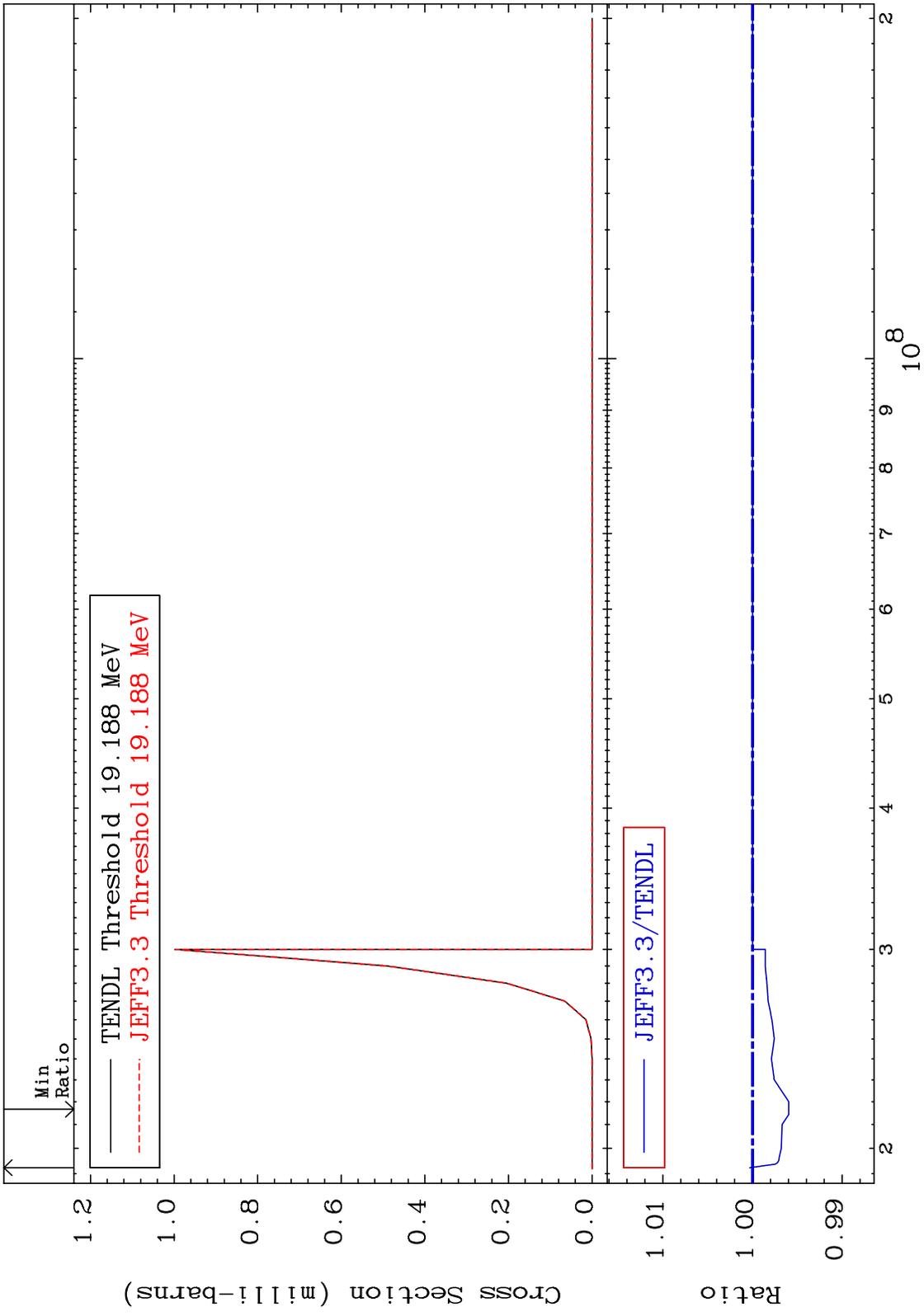
MAT 6234

Inelastic
Cross Section

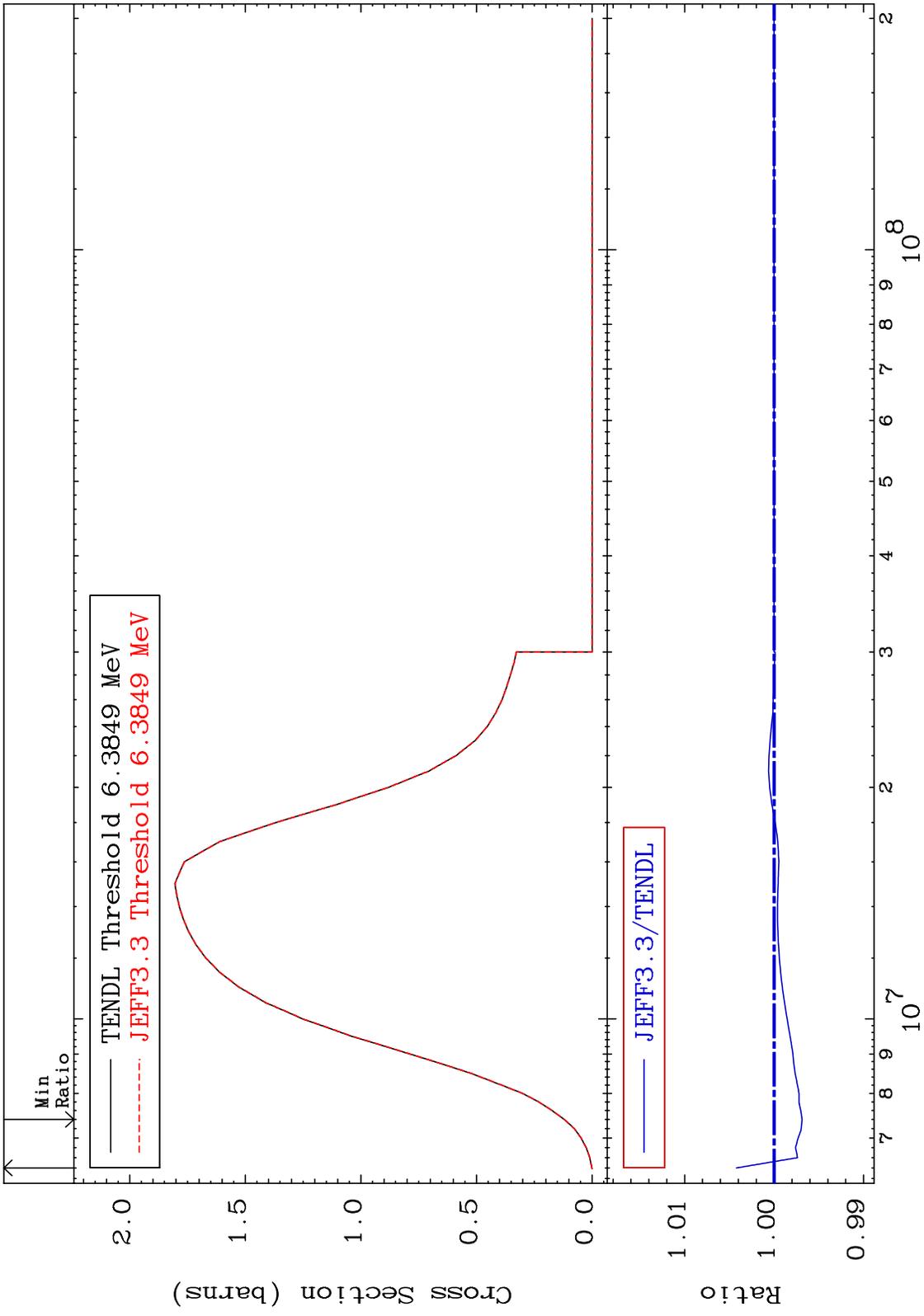
62-Sm-147
-0.125 To 0.185 %



MAT 6234 (n,2n) d 62-Sm-147
 Cross Section -0.404 To 0.030 %



MAT 6234 (n,2n) Cross Section 62-Sm-147 -0.312 To 0.421 %



5 Incident Energy (eV) 62-Sm-147

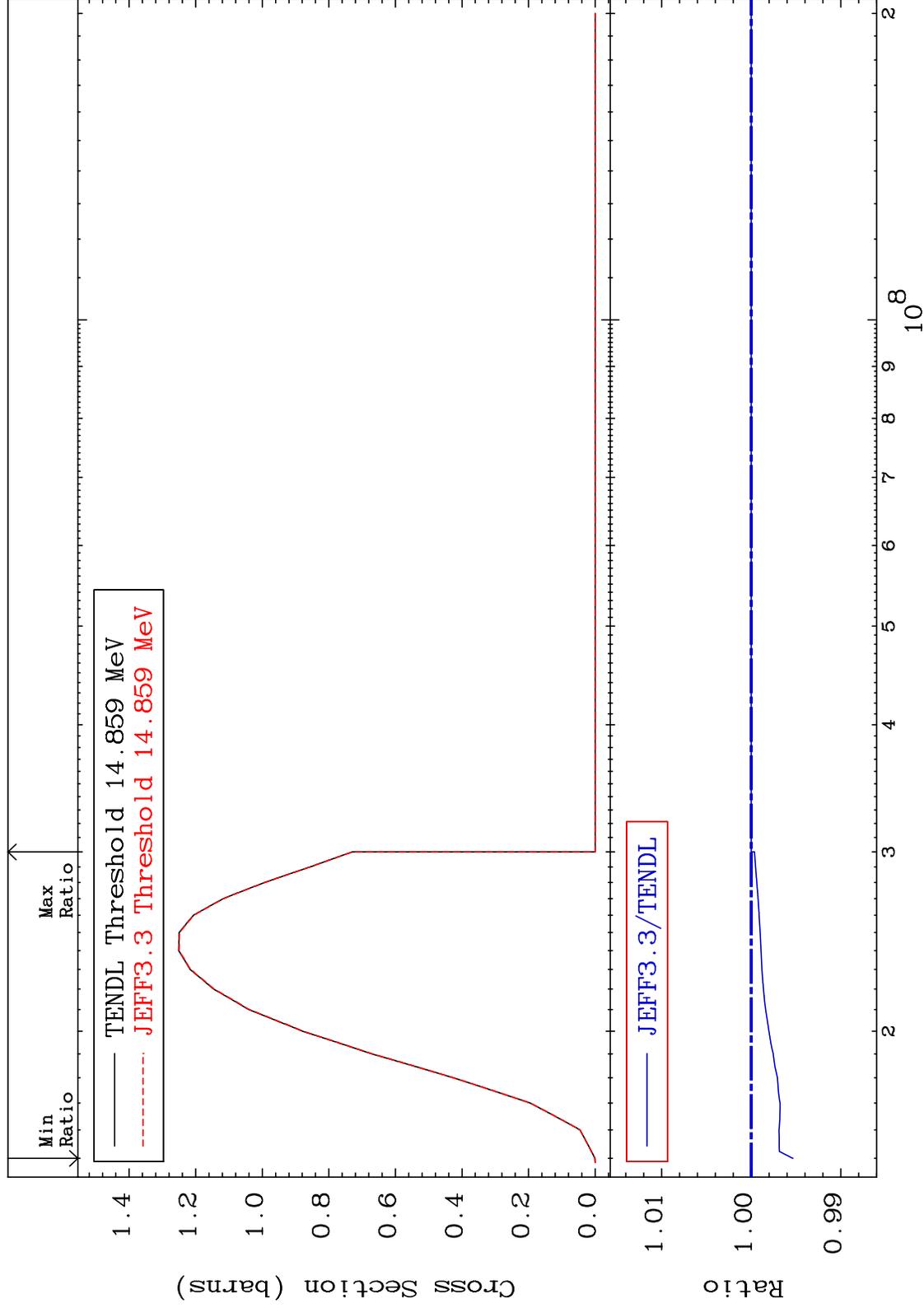
MAT 6234

(n,3n)

62-Sm-147

Cross Section

-0.466 To 0.000 %



MAT 6234

$(n, n') \alpha$

62-Sm-147

Cross Section To 9999. %

Cross Section

Min Ratio

Max Ratio

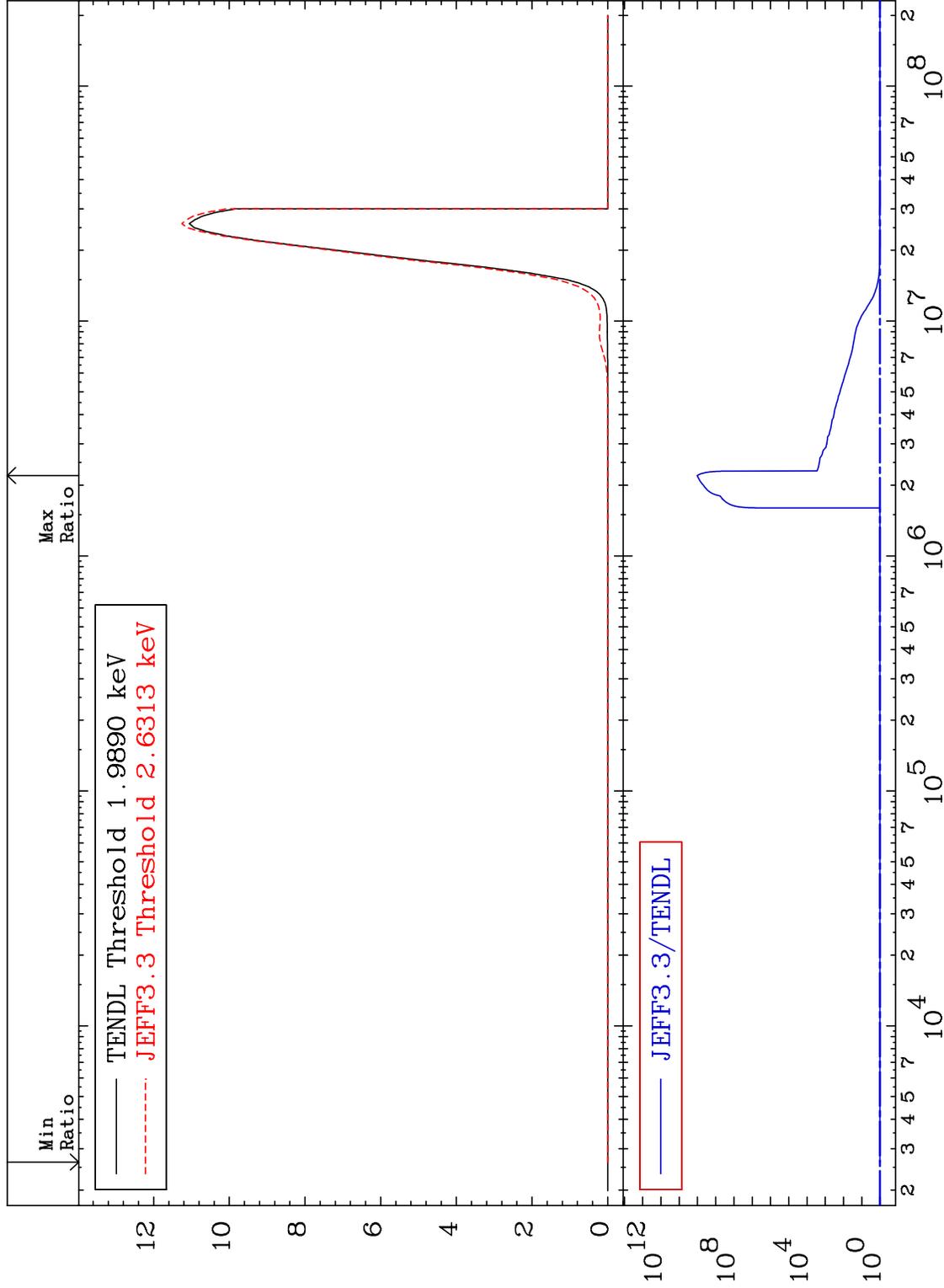
TENDL Threshold 1.9890 keV
JEFF3.3 Threshold 2.6313 keV

Cross Section (milli-barns)

JEFF3.3/TENDL

Ratio

7



Incident Energy (eV)

62-Sm-147

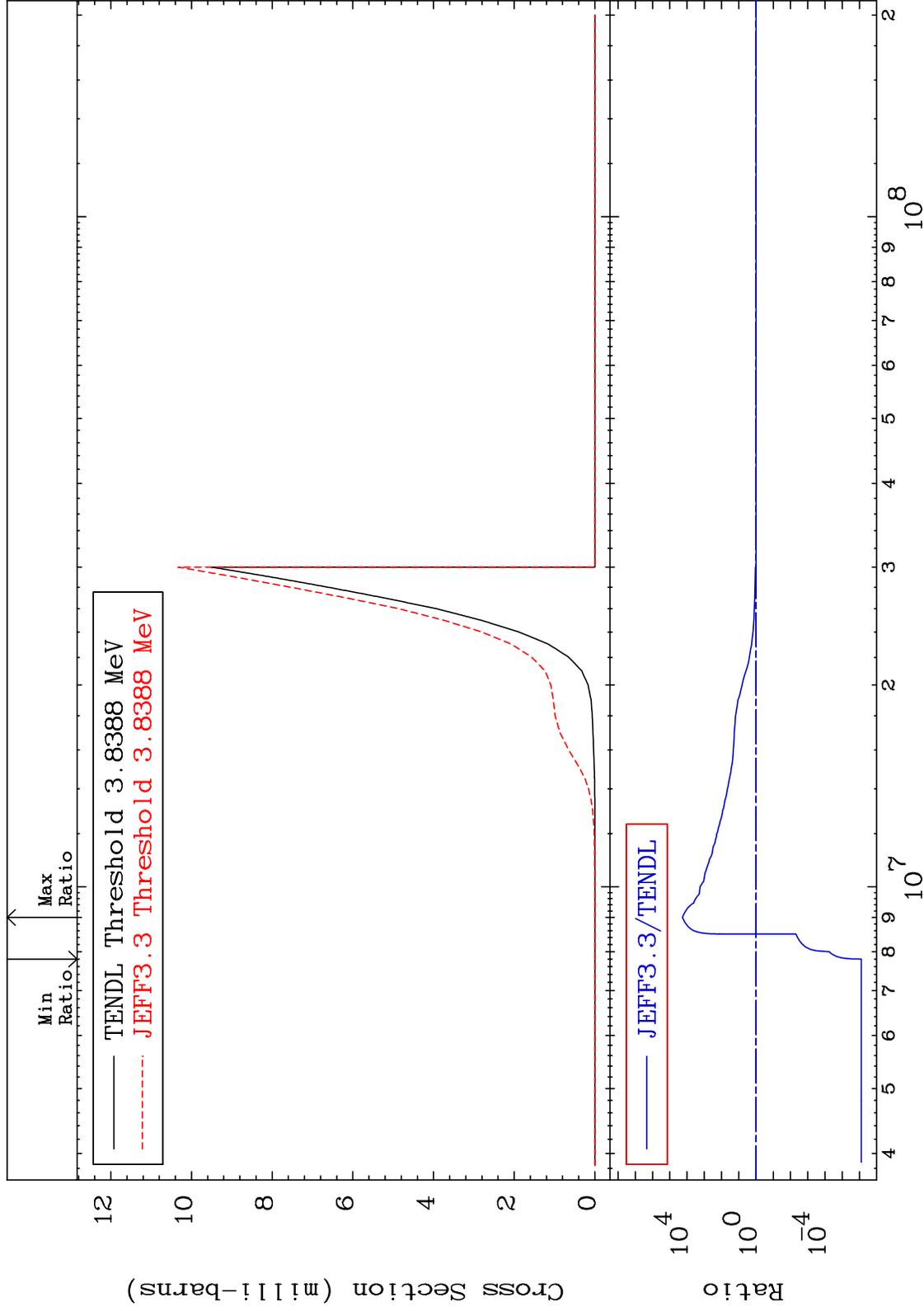
MAT 6234

(n,2n) α

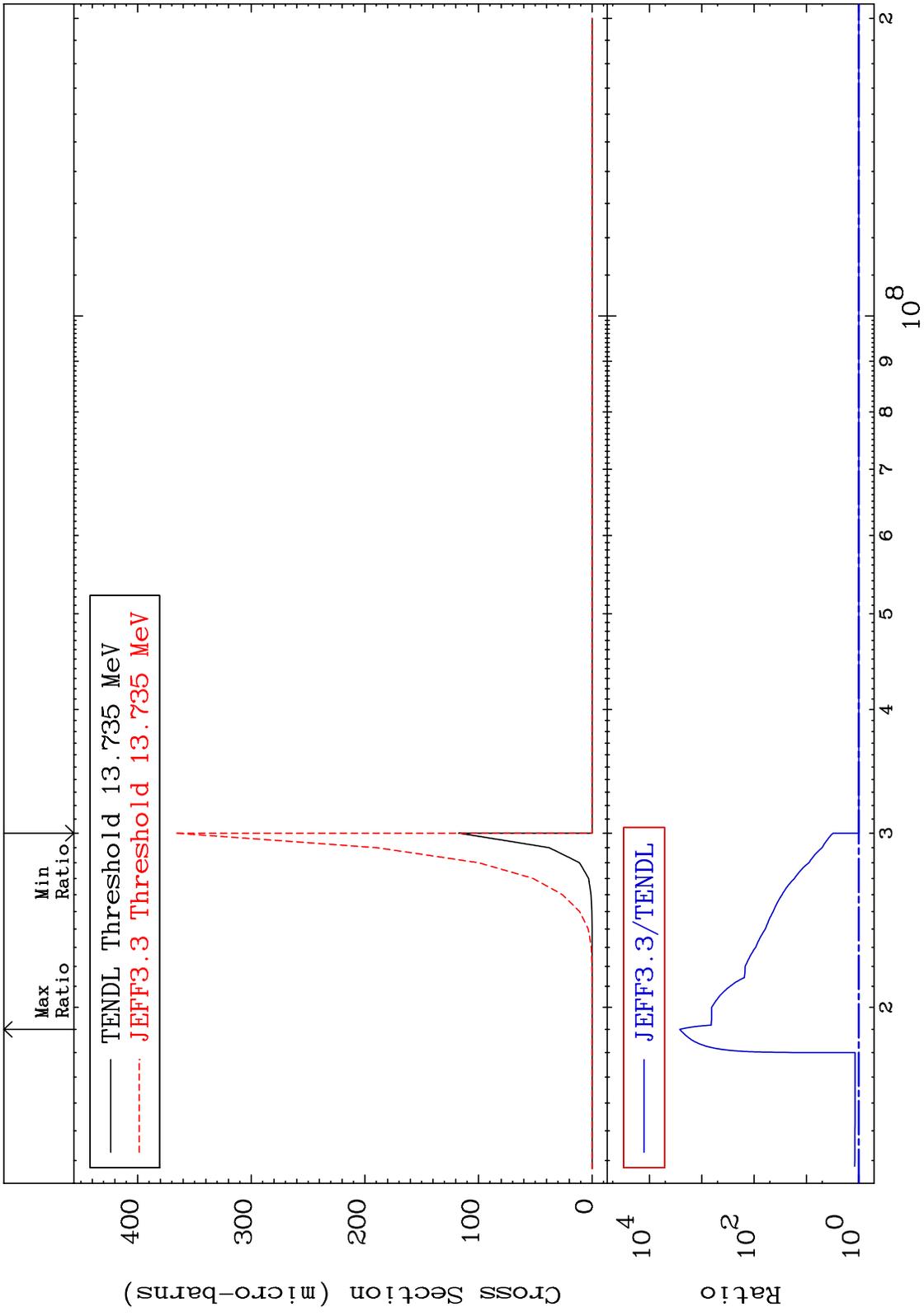
62-Sm-147

-100.0 To 9999. %

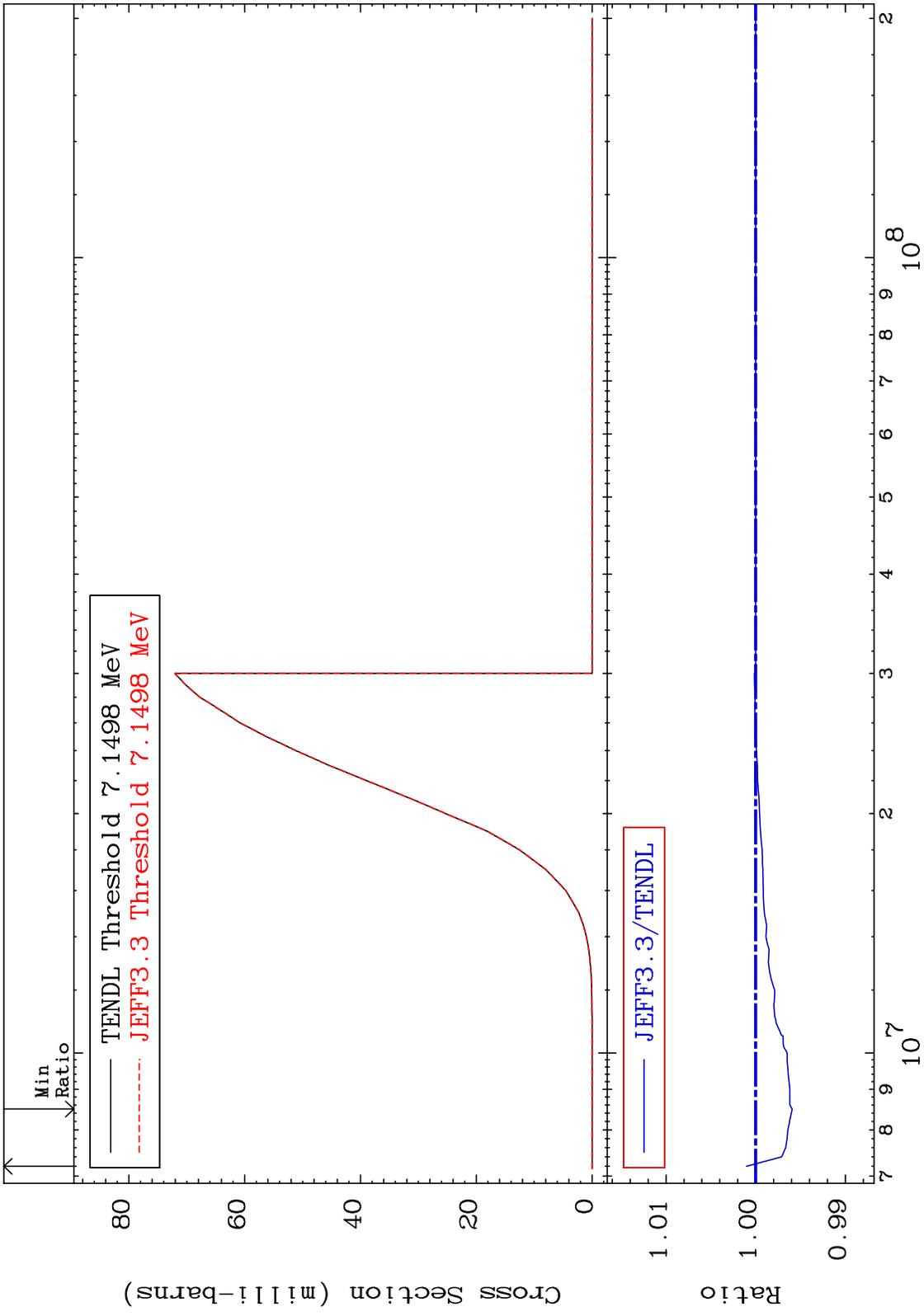
Cross Section



MAT 6234 $(n, 3n) \alpha$ 62-Sm-147
 Cross Section 0.000 To 9999. %

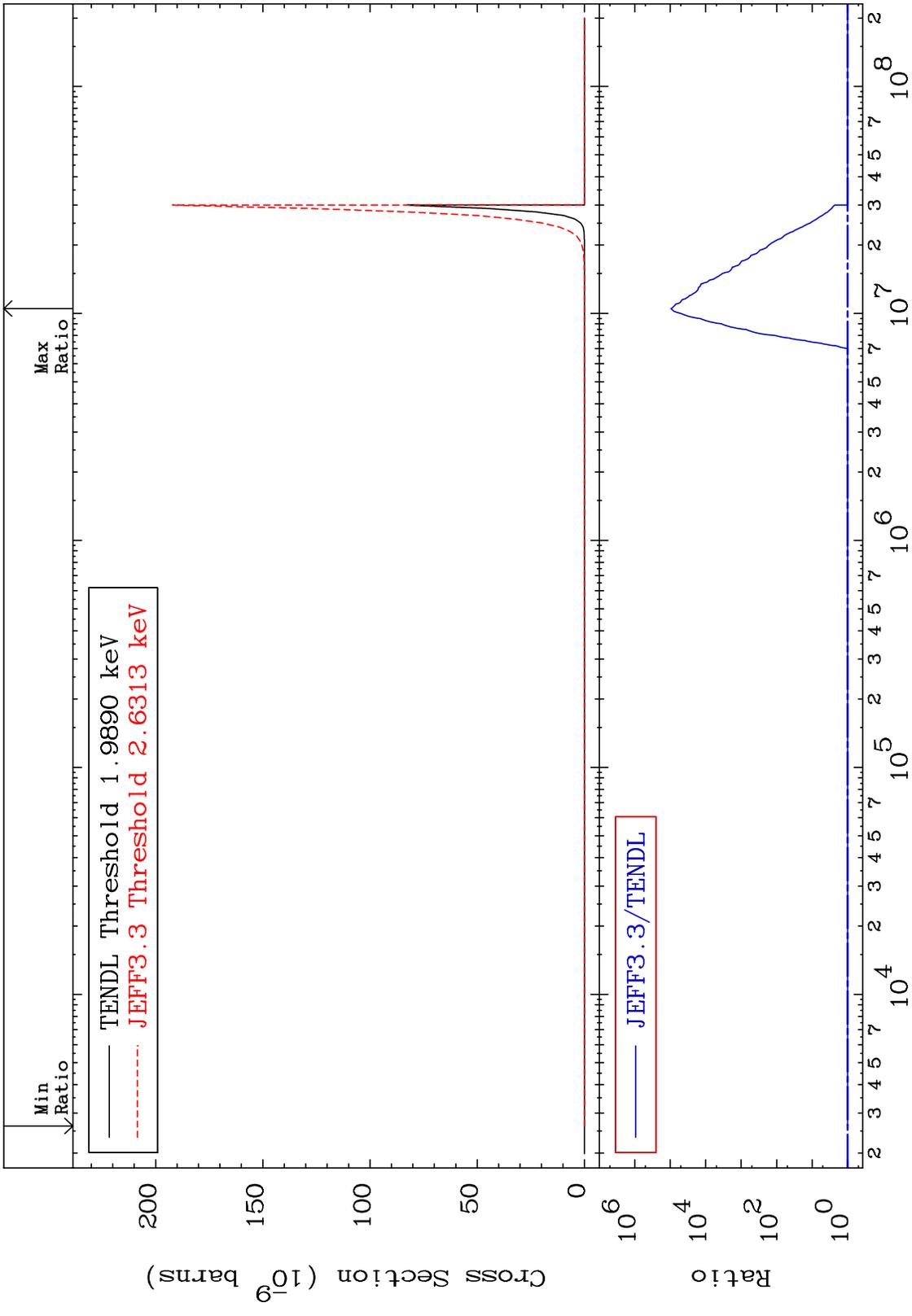


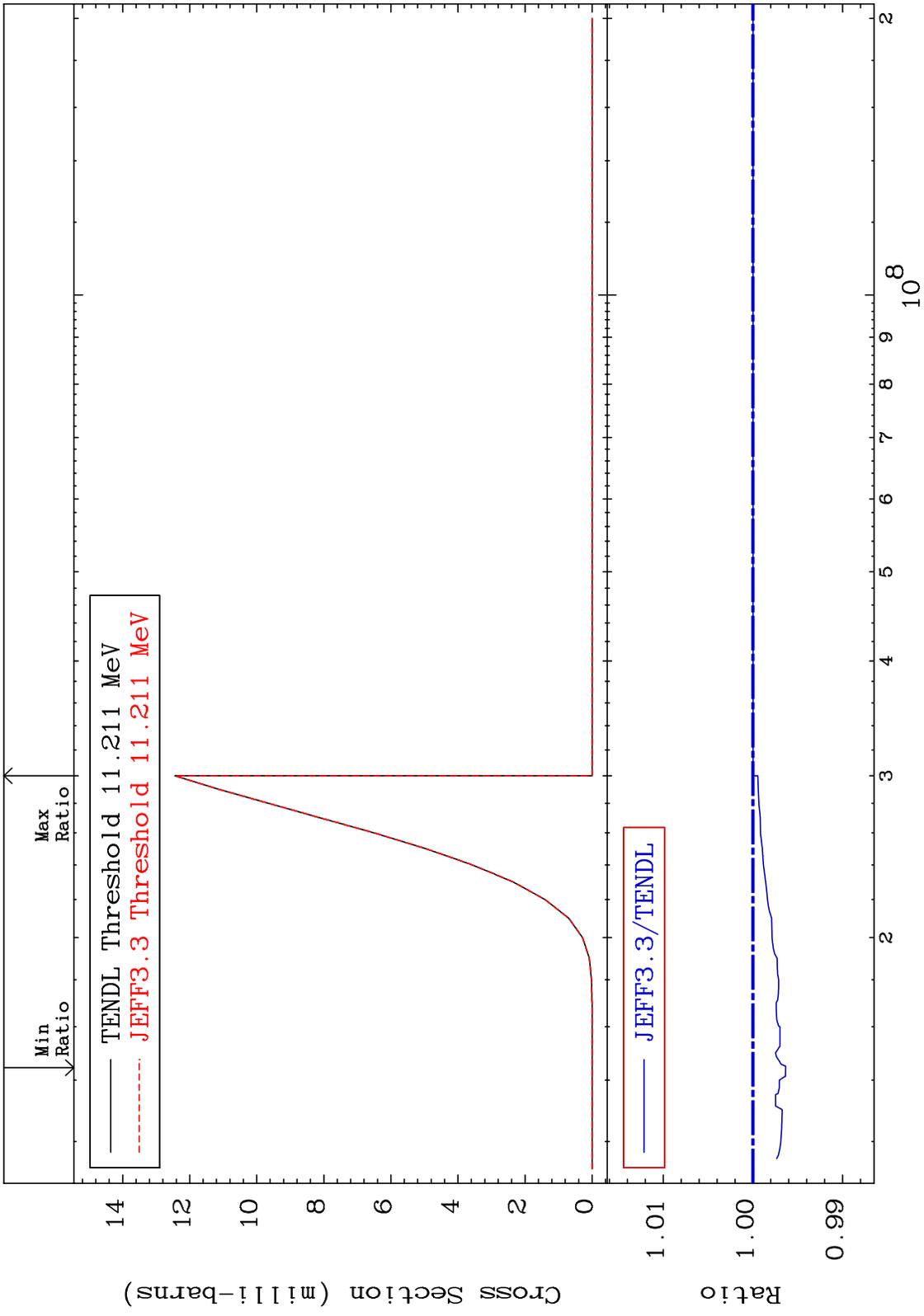
MAT 6234 (n, n') p 62-Sm-147
 Cross Section -0.406 To 0.103 %



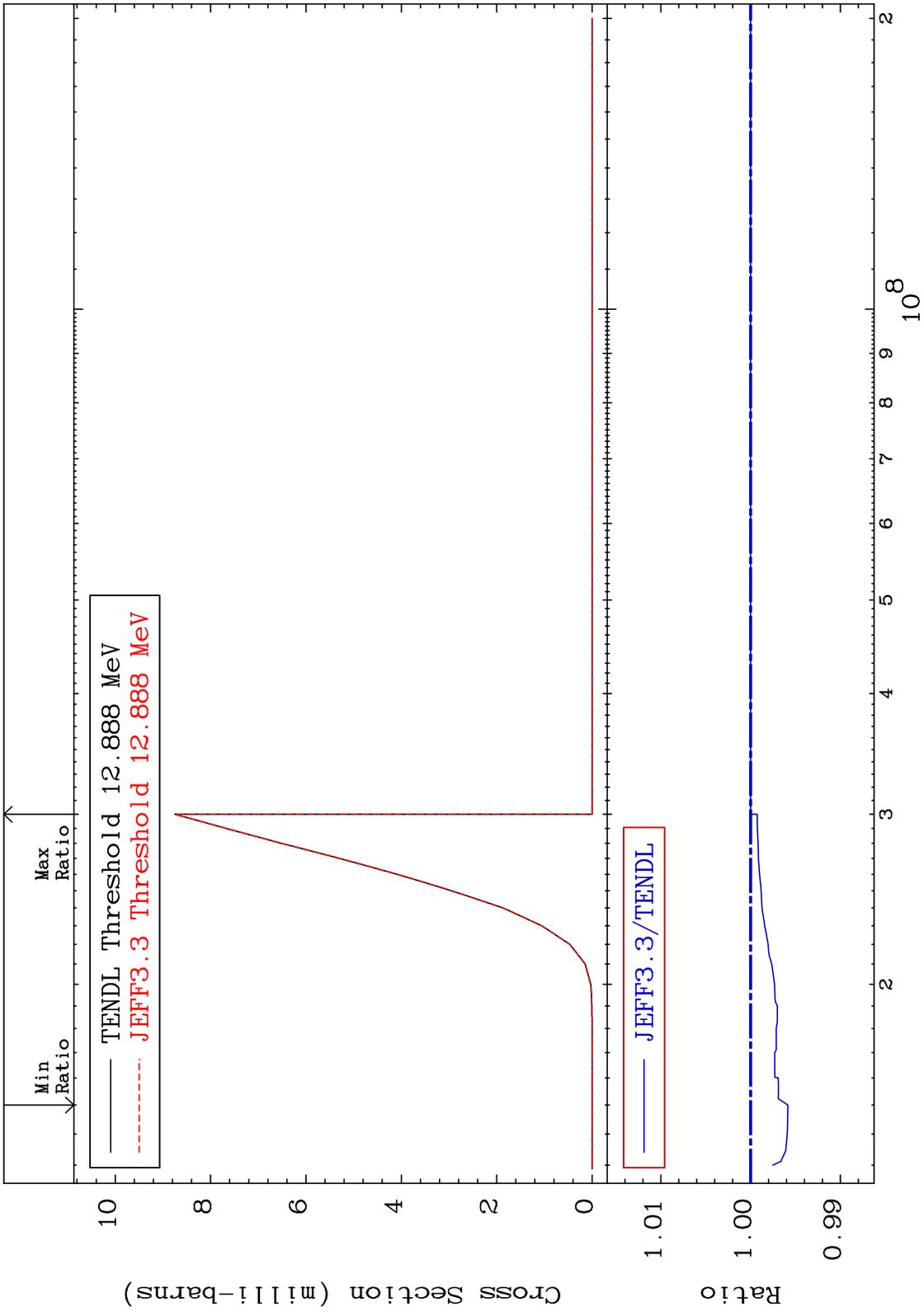
10 Incident Energy (eV) 62-Sm-147

MAT 6234 (n,n') 2α Cross Section 62-Sm-147 To 9999. %

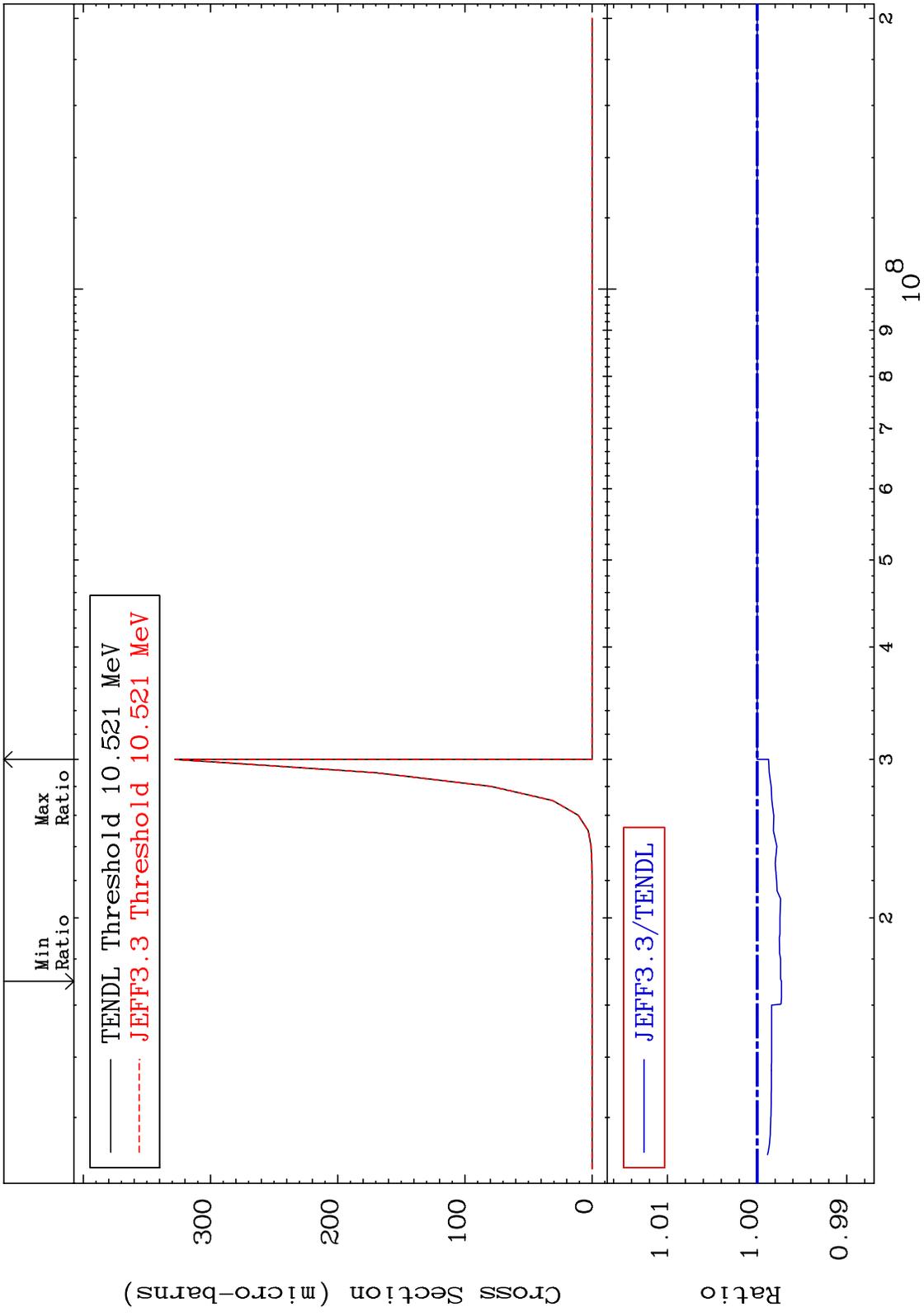




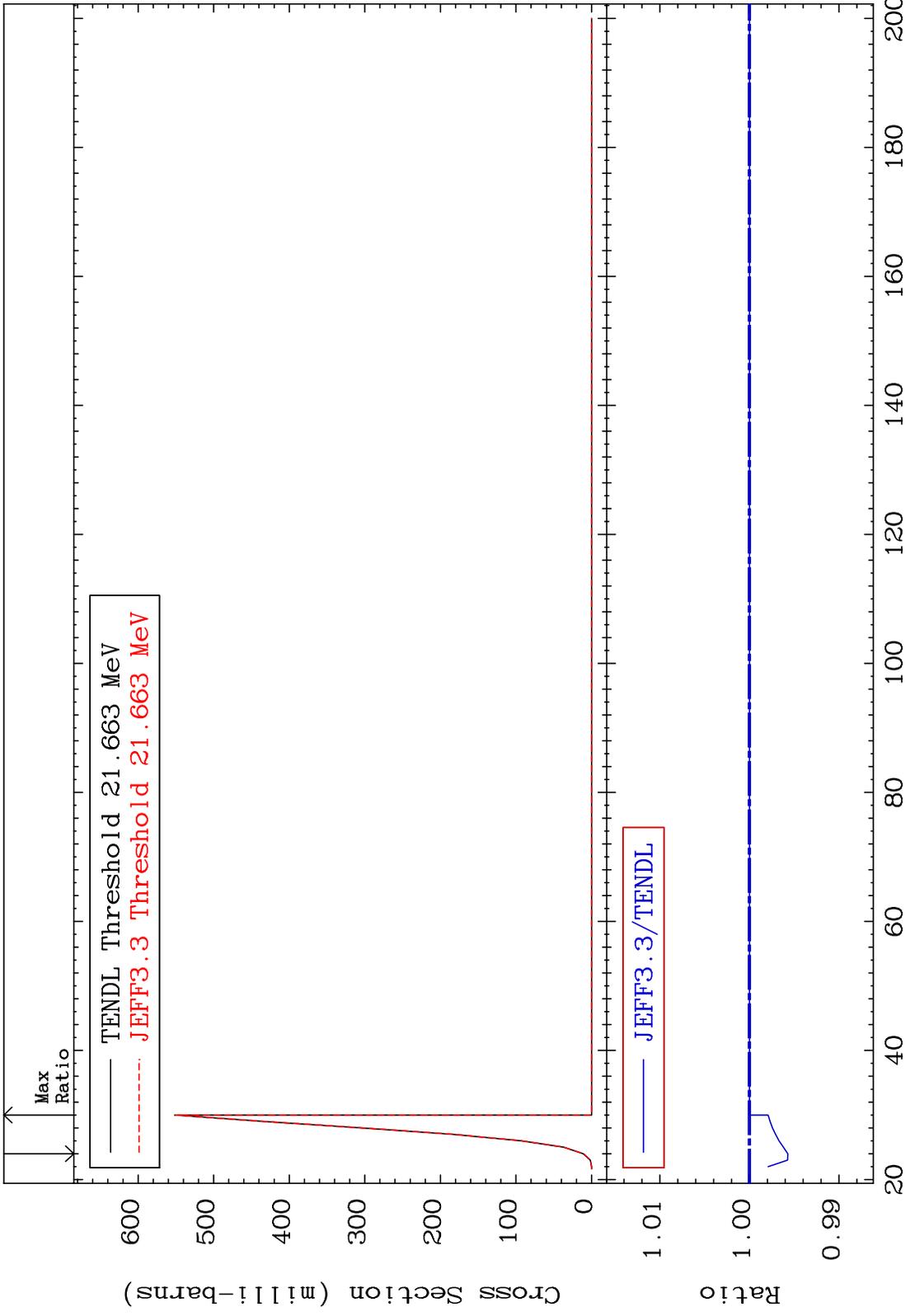
MAT 6234 (n, n') t 62-Sm-147
 Cross Section -0.415 To 0.000 %



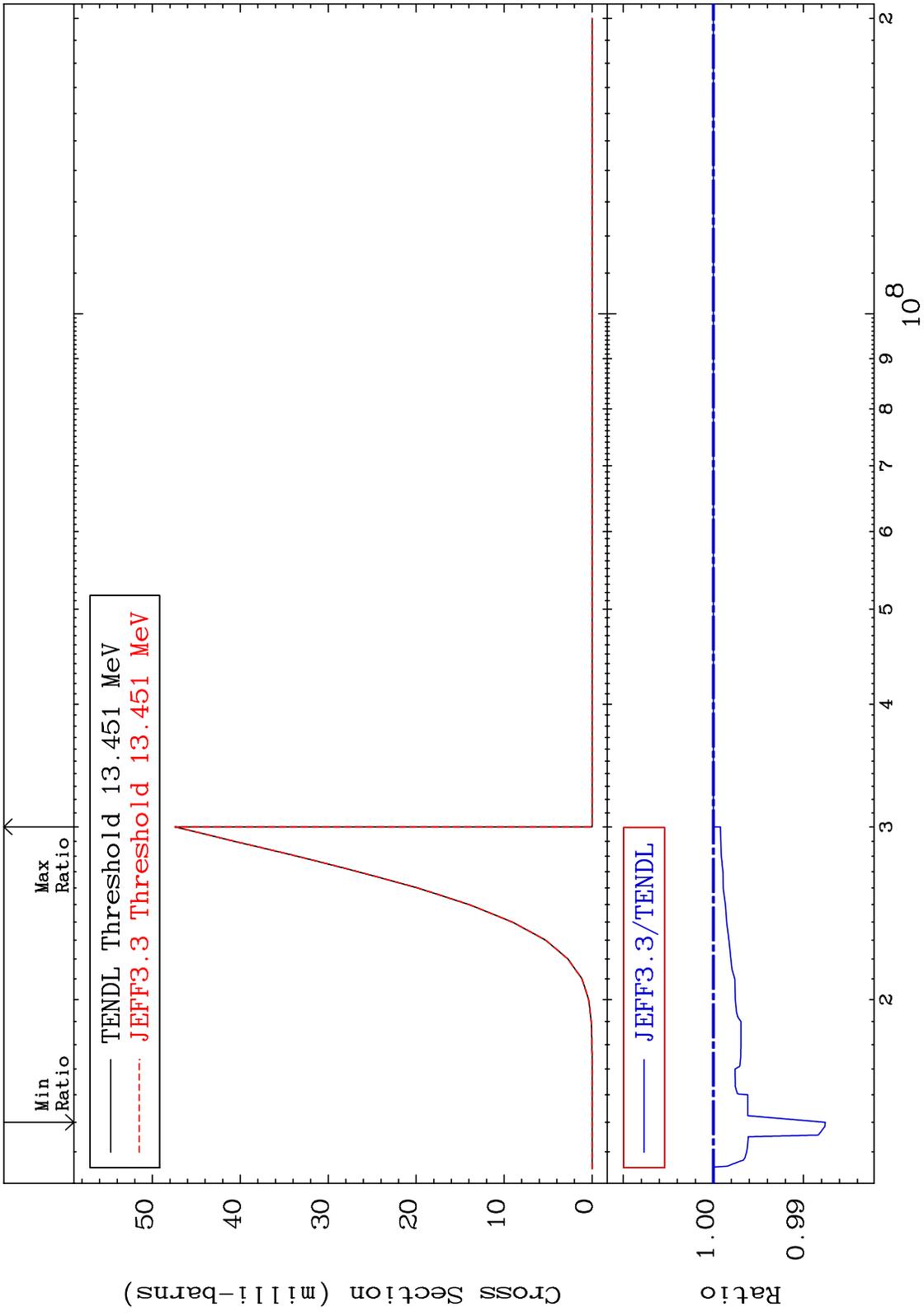
MAT 6234 (n, n') He-3 Cross Section 62-Sm-147 -0.271 To 0.000 %



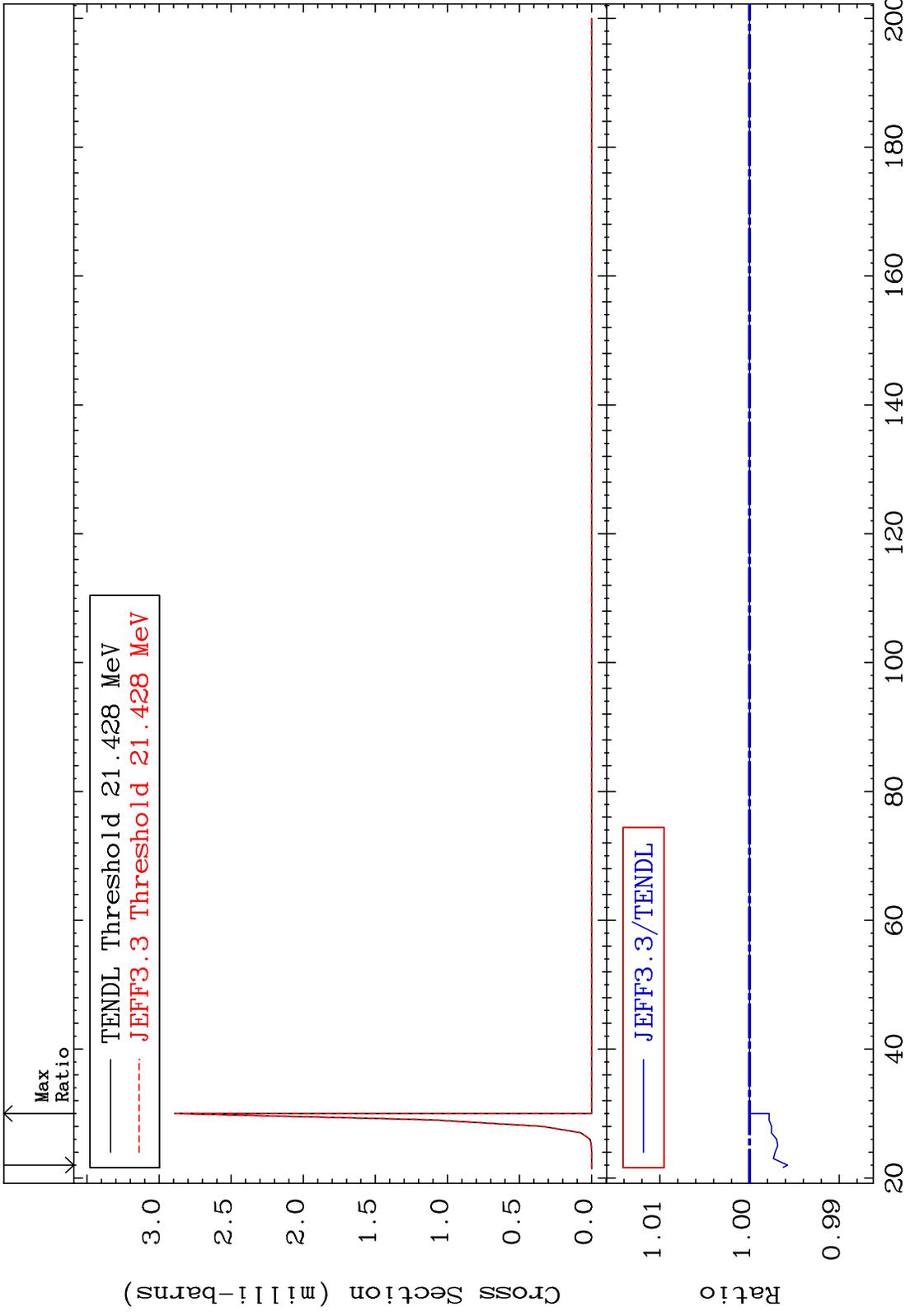
MAT 6234 (n,4n) Cross Section 62-Sm-147 -0.428 To 0.000 %



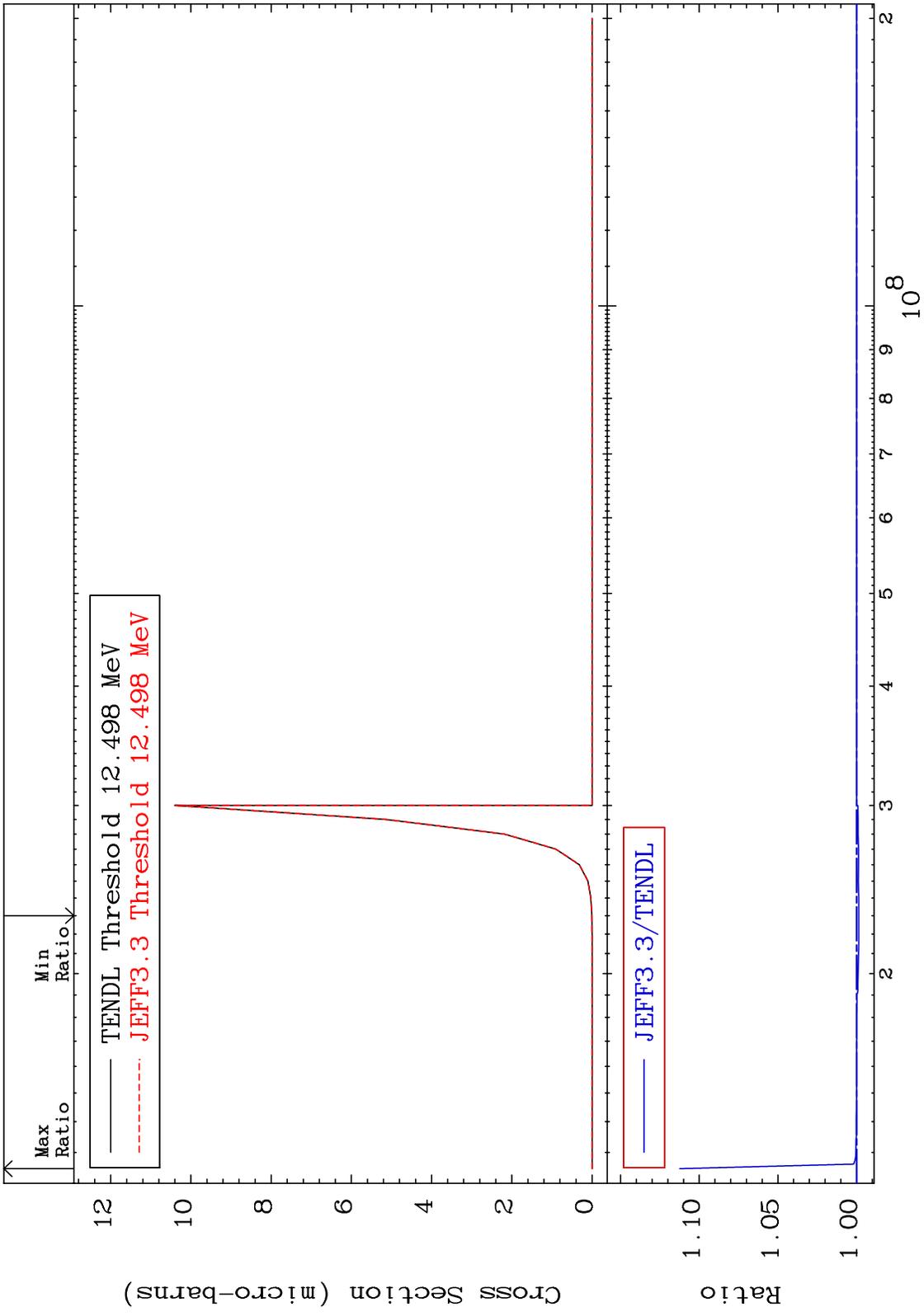
MAT 6234 $(n, 2n) p$ 62-Sm-147
 Cross Section -1.241 To 0.000 %



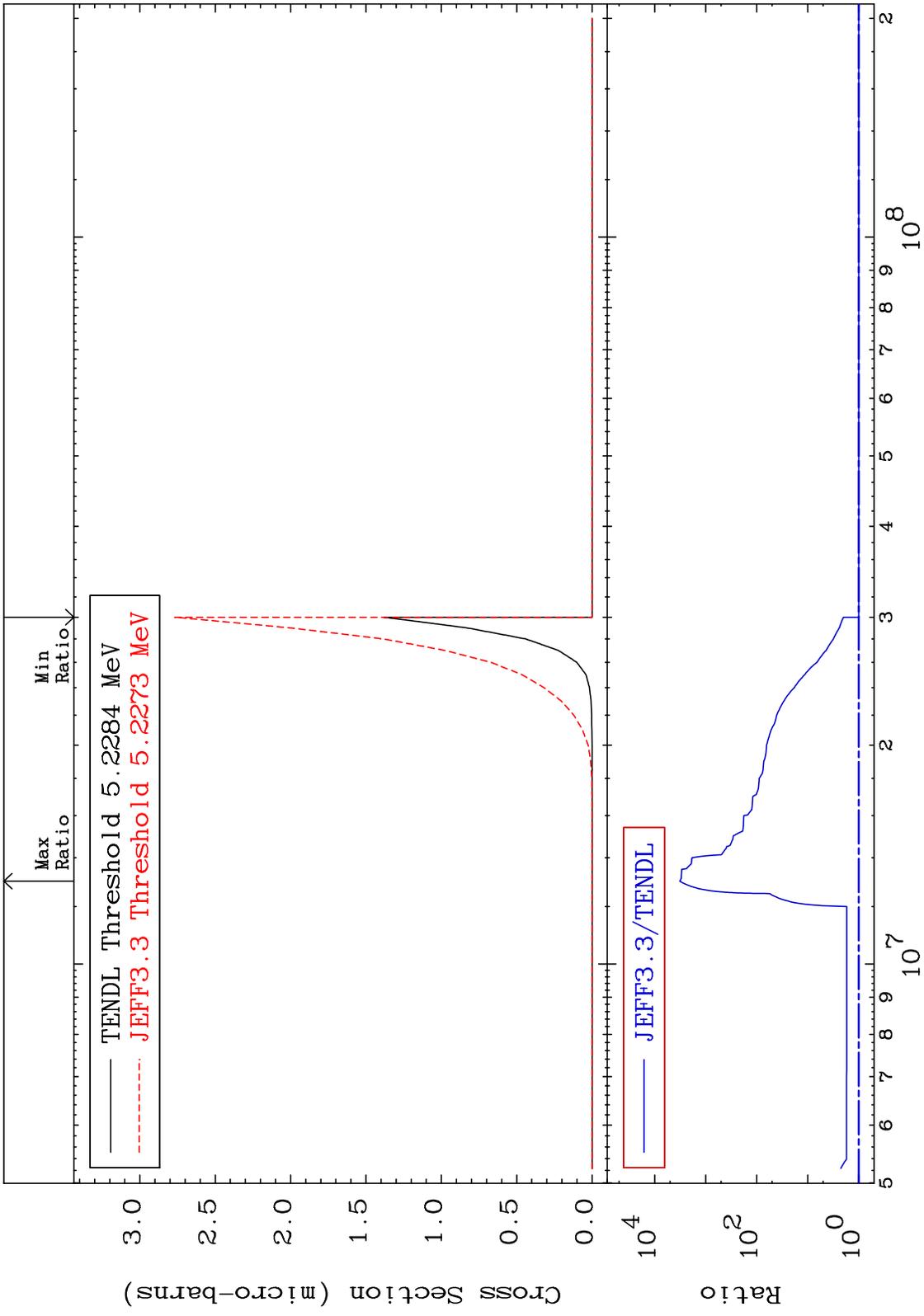
MAT 6234 (n,3n) p 62-Sm-147
Cross Section -0.425 To 0.000 %



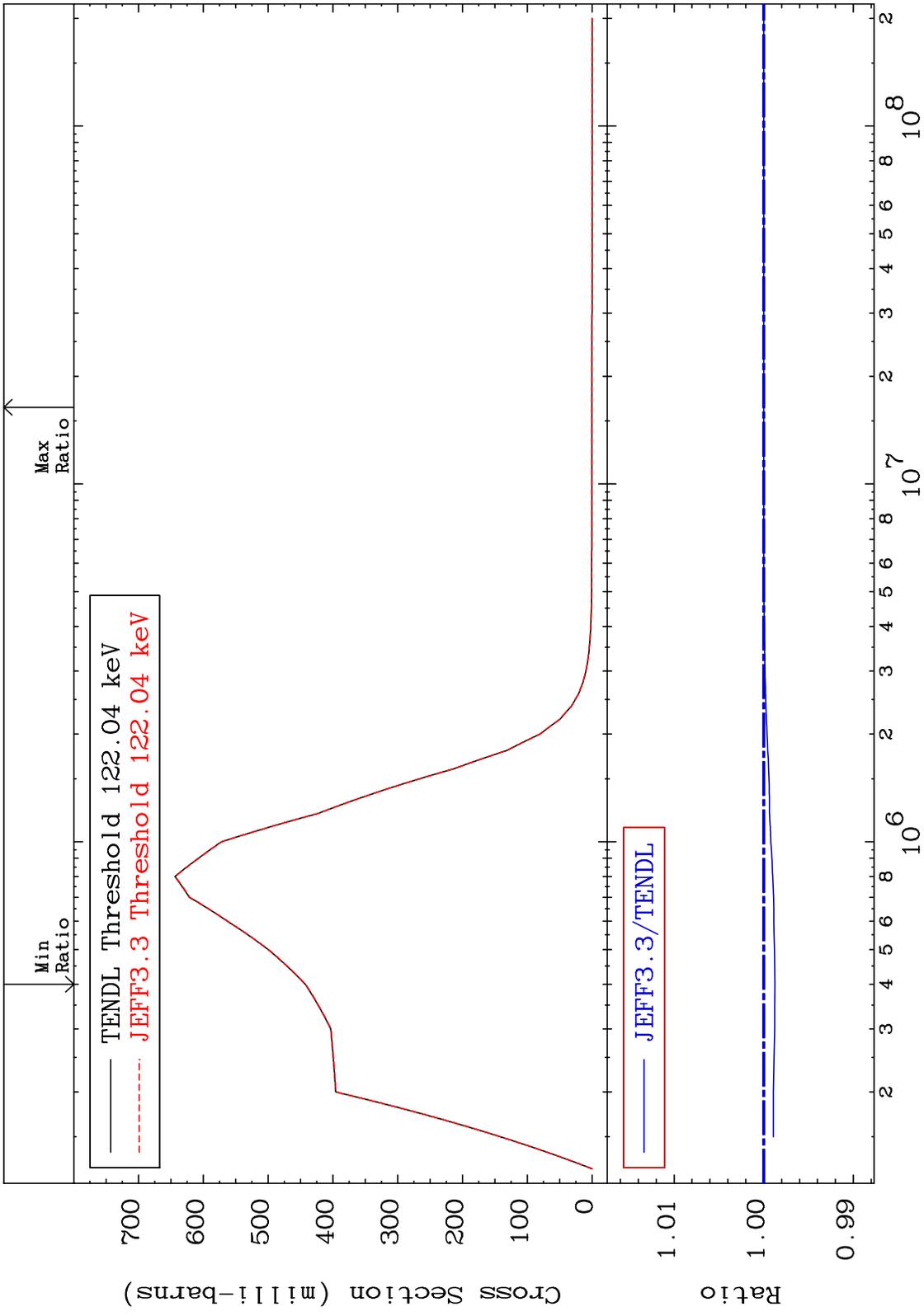
MAT 6234 (n,2n) p 62-Sm-147
 Cross Section -0.144 To 11.24 %



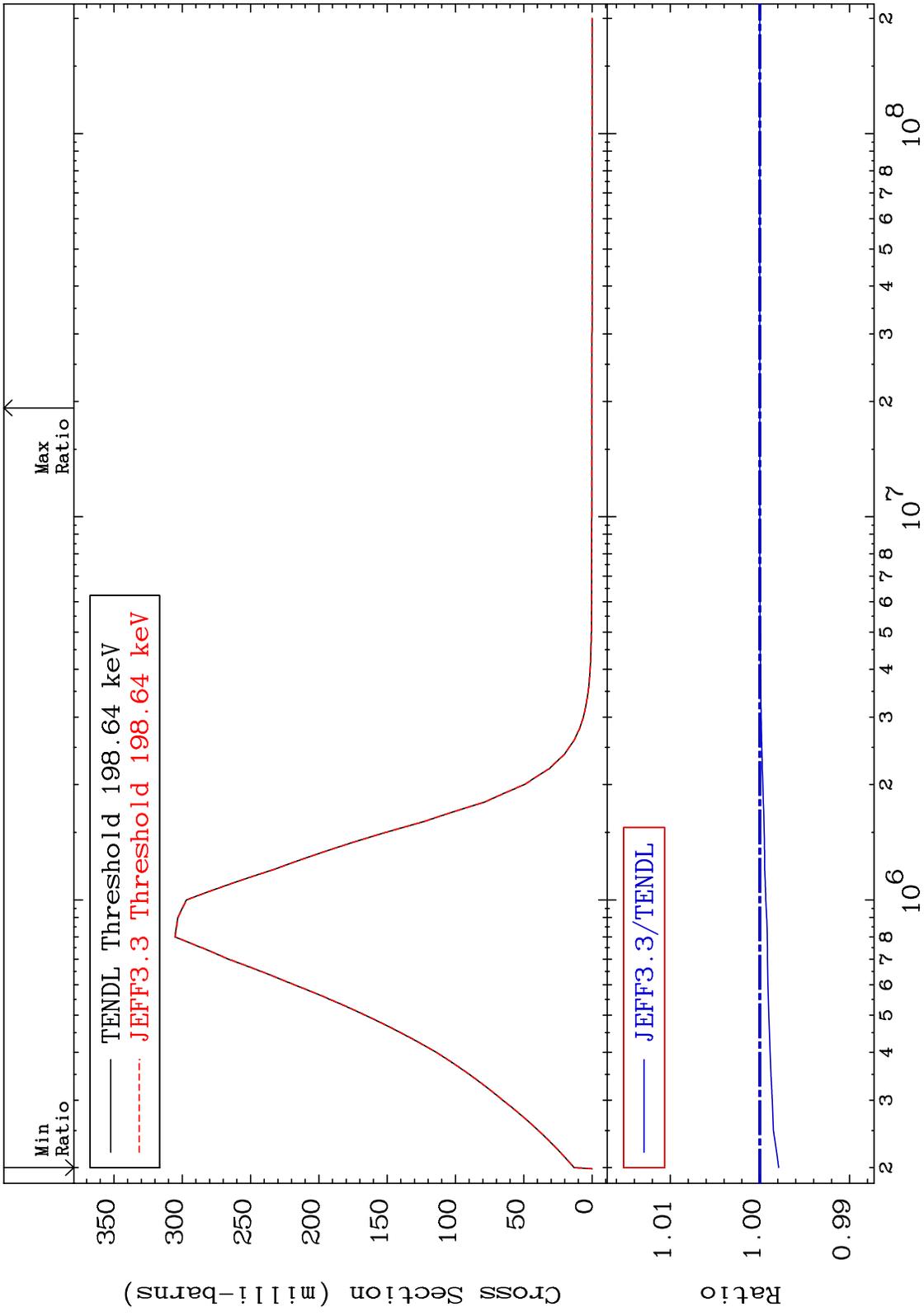
MAT 6234 (n, n') p α 62-Sm-147 To 9999. %



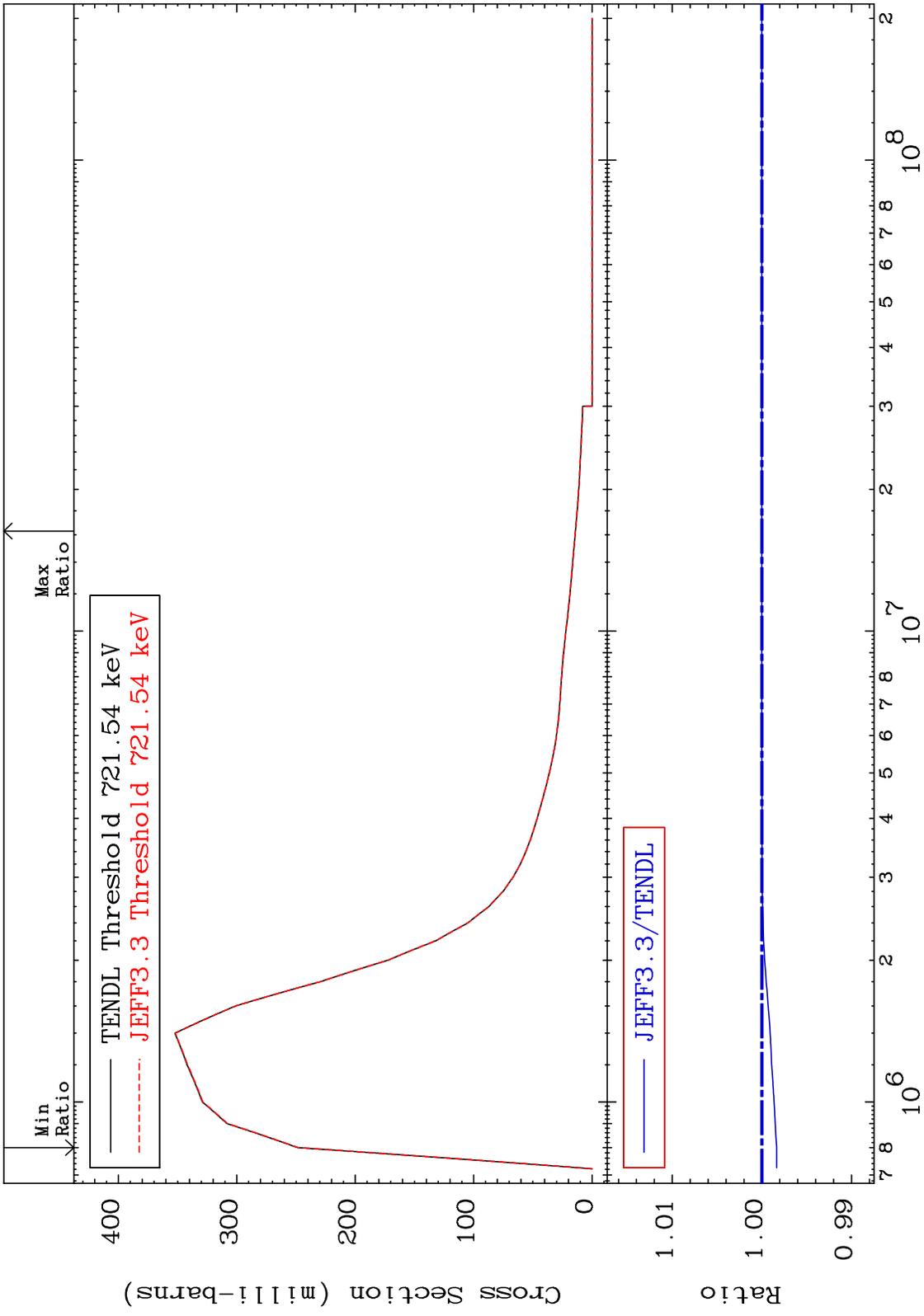
MAT 6234 MT= 51 (n,n') Level Cross Section 62-Sm-147 -0.124 To 0.000 %



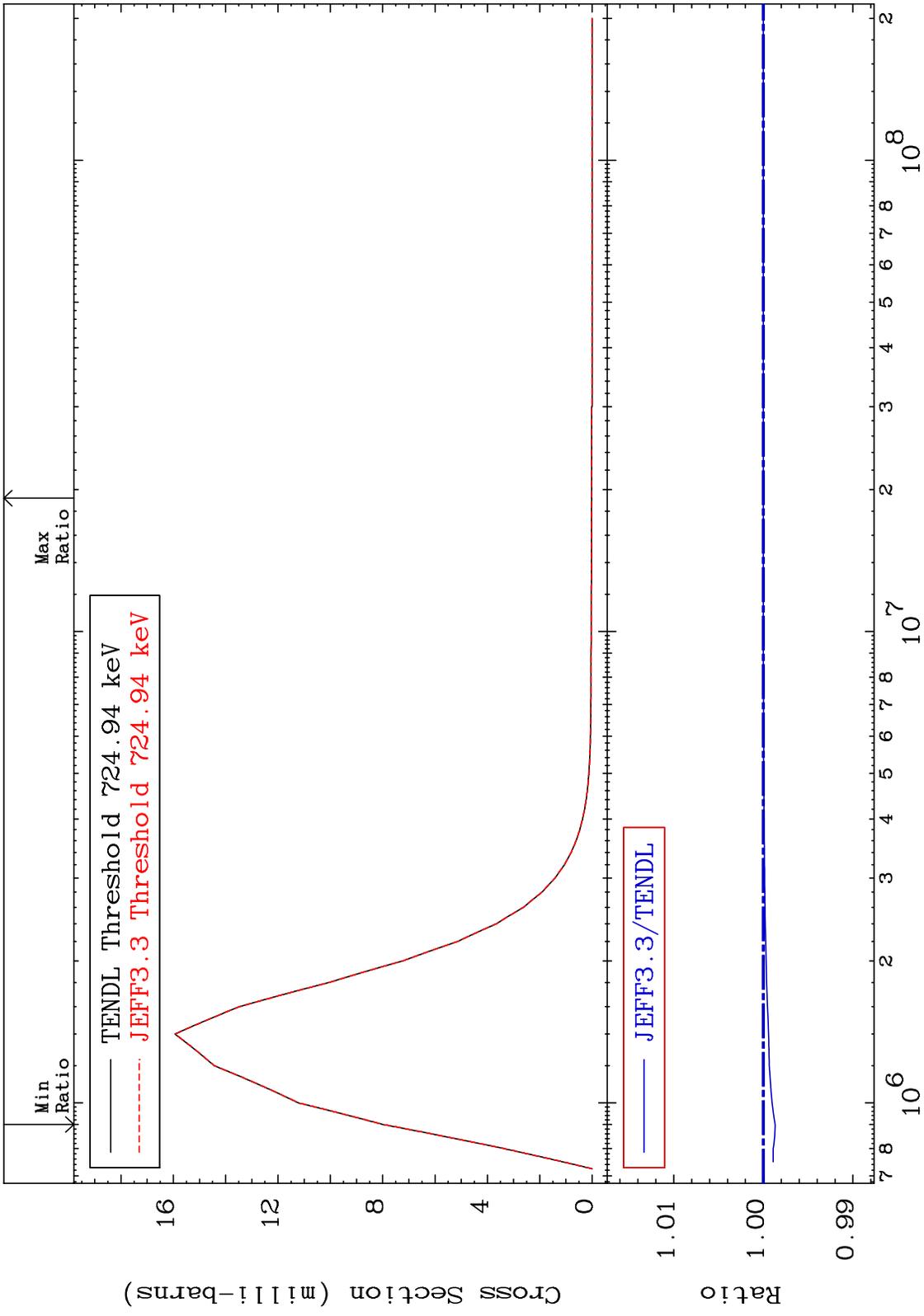
MAT 6234 MT= 52 (n,n') Level Cross Section 62-Sm-147
 -0.210 To 0.000 %



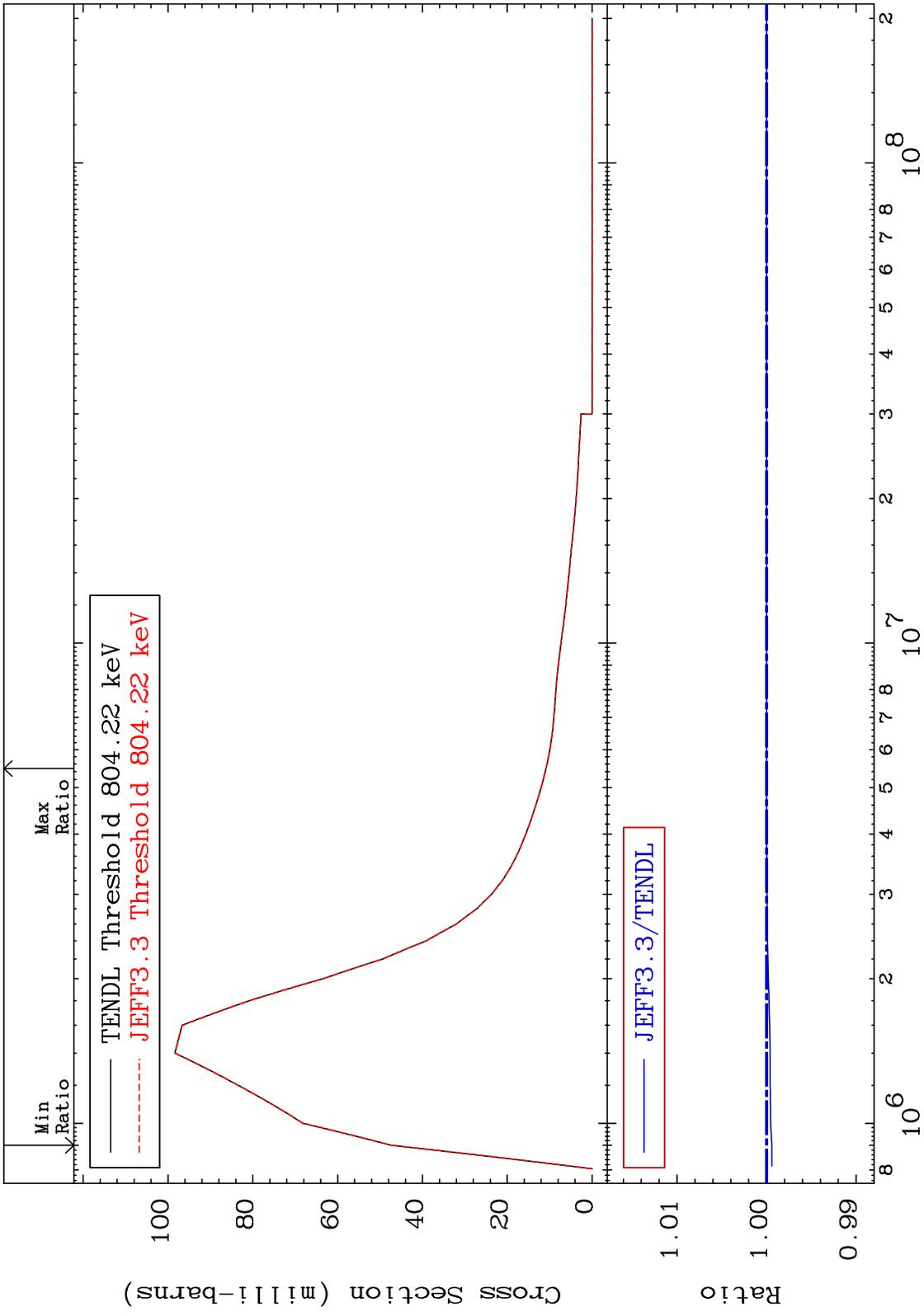
MAT 6234 MT= 53 (n, n') Level Cross Section 62-Sm-147 -0.165 To 0.000 %



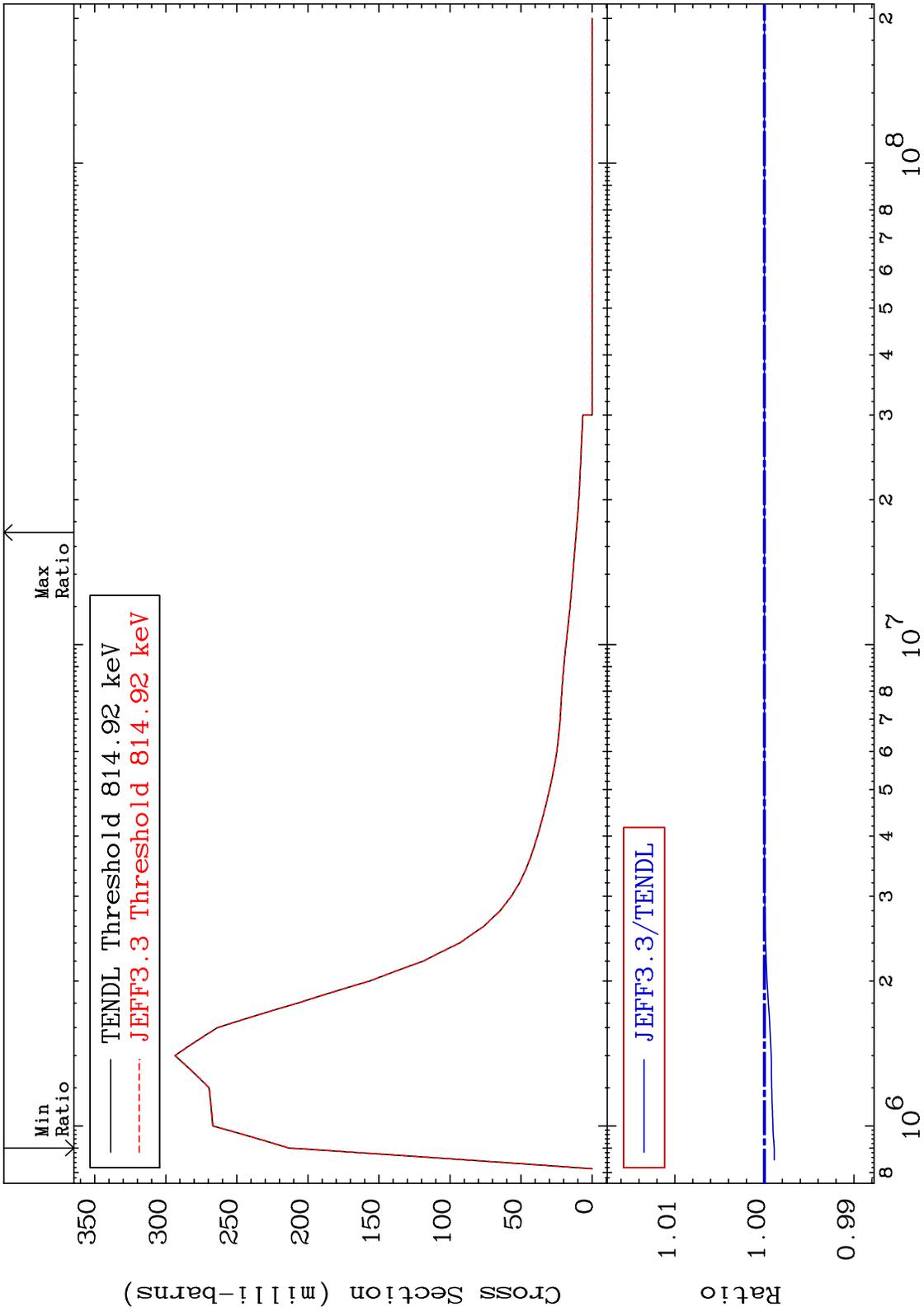
MAT 6234 MT= 54 (n,n') Level Cross Section 62-Sm-147 -0.132 To 0.000 %



MAT 6234 MT= 55 (n,n') Level Cross Section 62-Sm-147 -0.059 To 0.000 %



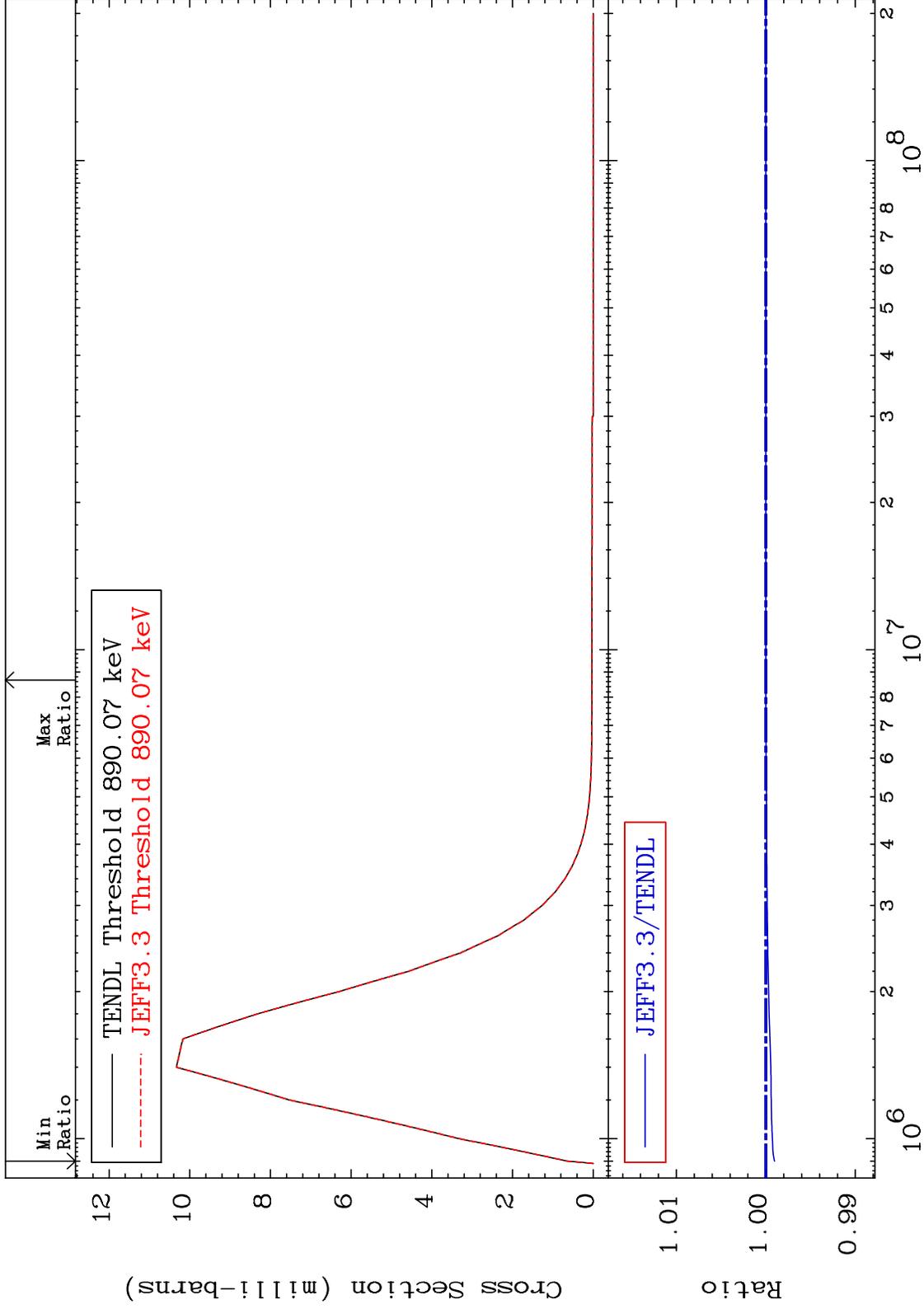
MAT 6234 MT= 56 (n,n') Level Cross Section 62-Sm-147 -0.109 To 0.000 %



MAT 6234

MT= 57 (n,n') Level
Cross Section

62-Sm-147
-0.098 To 0.000 %

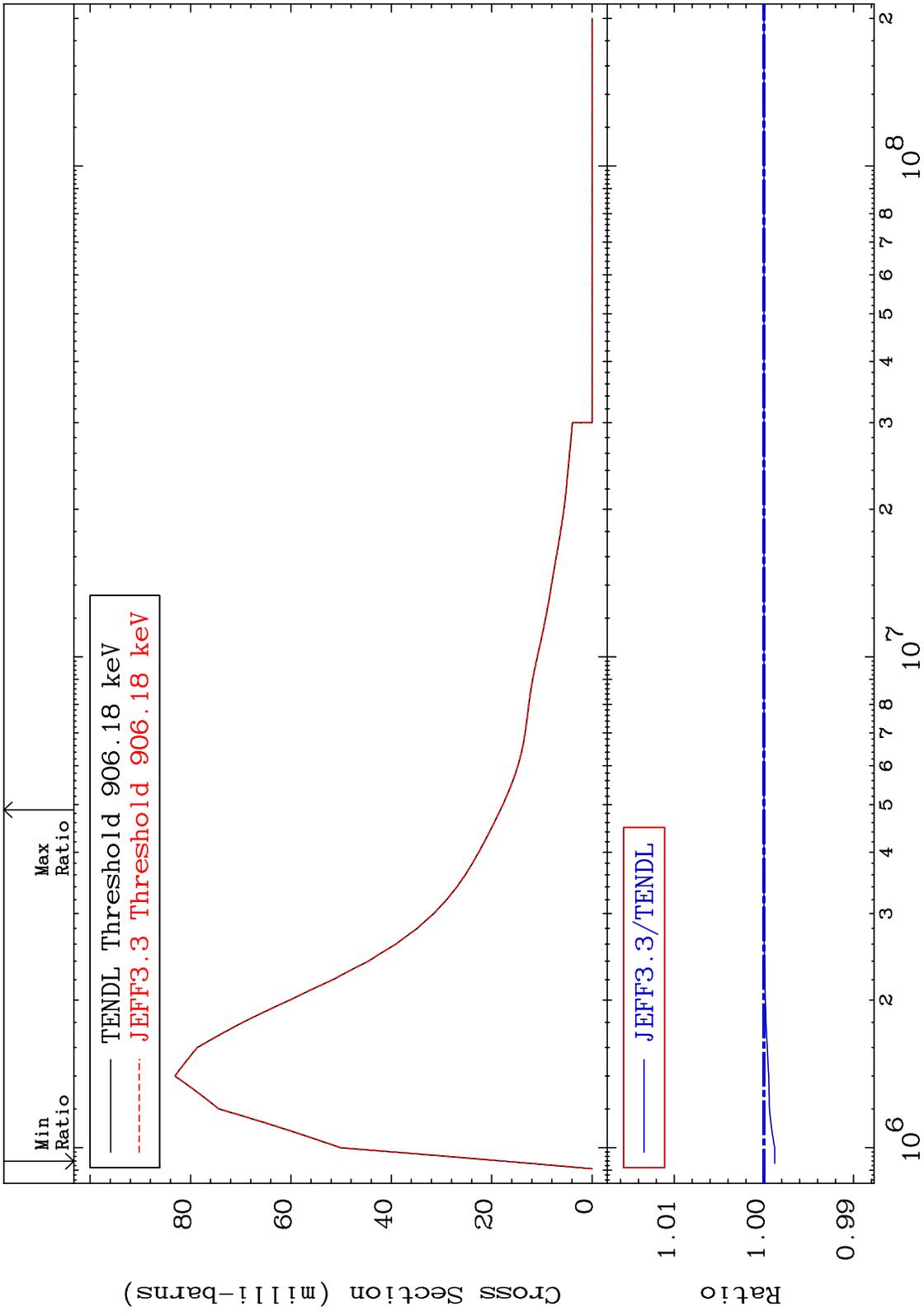


26

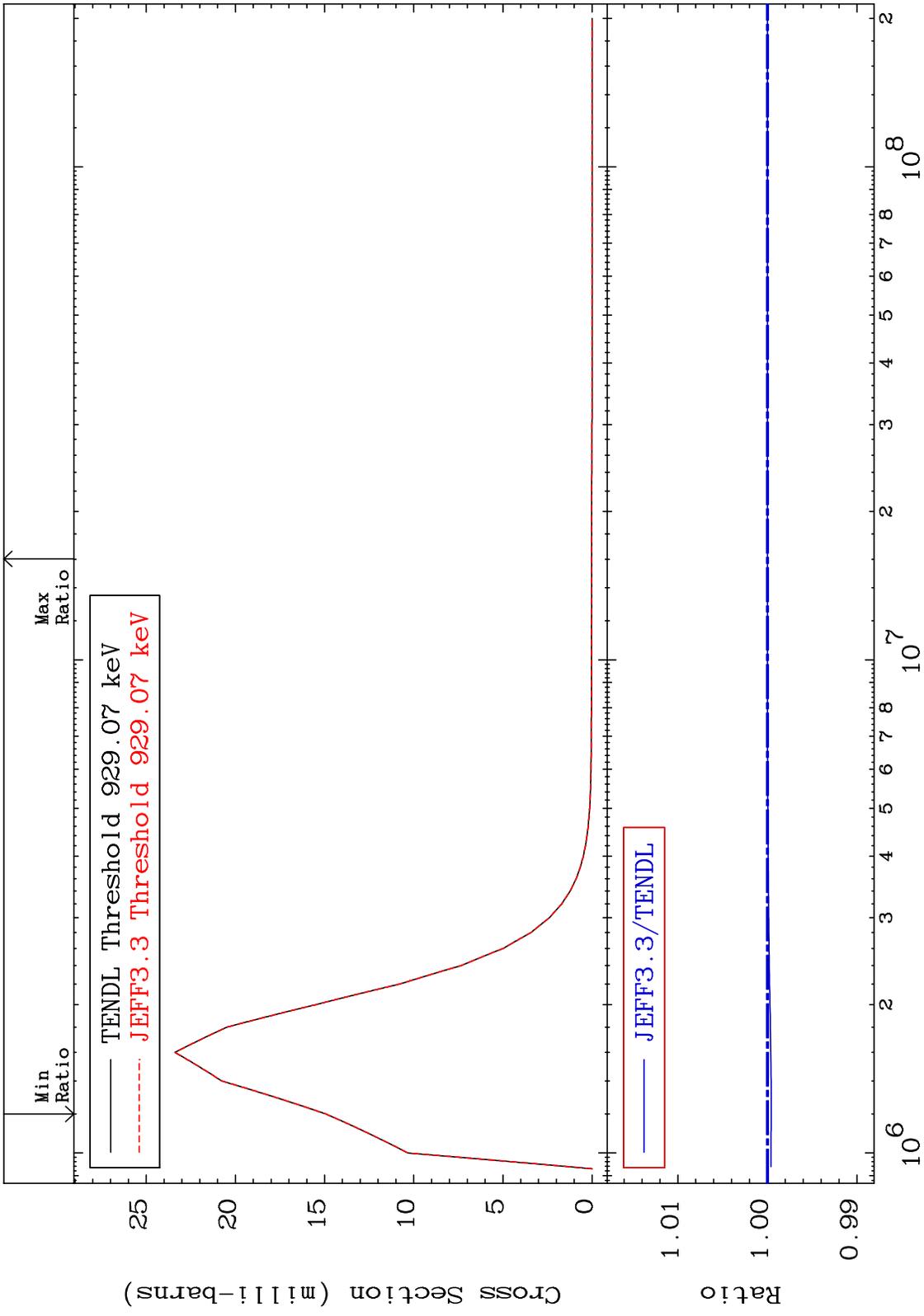
Incident Energy (eV)

62-Sm-147

MAT 6234 MT= 58 (n,n') Level Cross Section 62-Sm-147 -0.121 To 0.000 %

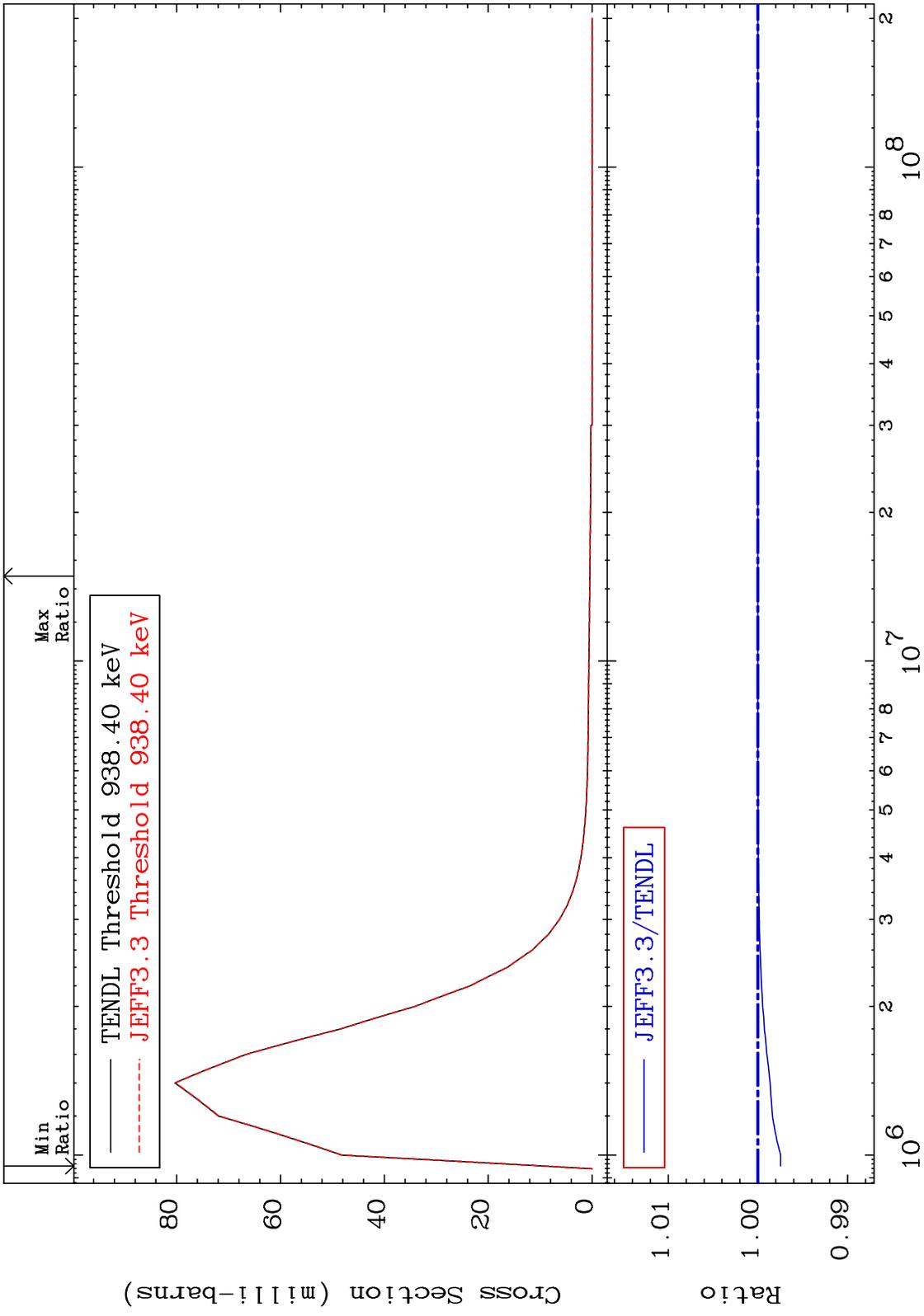


MAT 6234 MT= 59 (n,n') Level Cross Section 62-Sm-147 -0.042 To 0.000 %



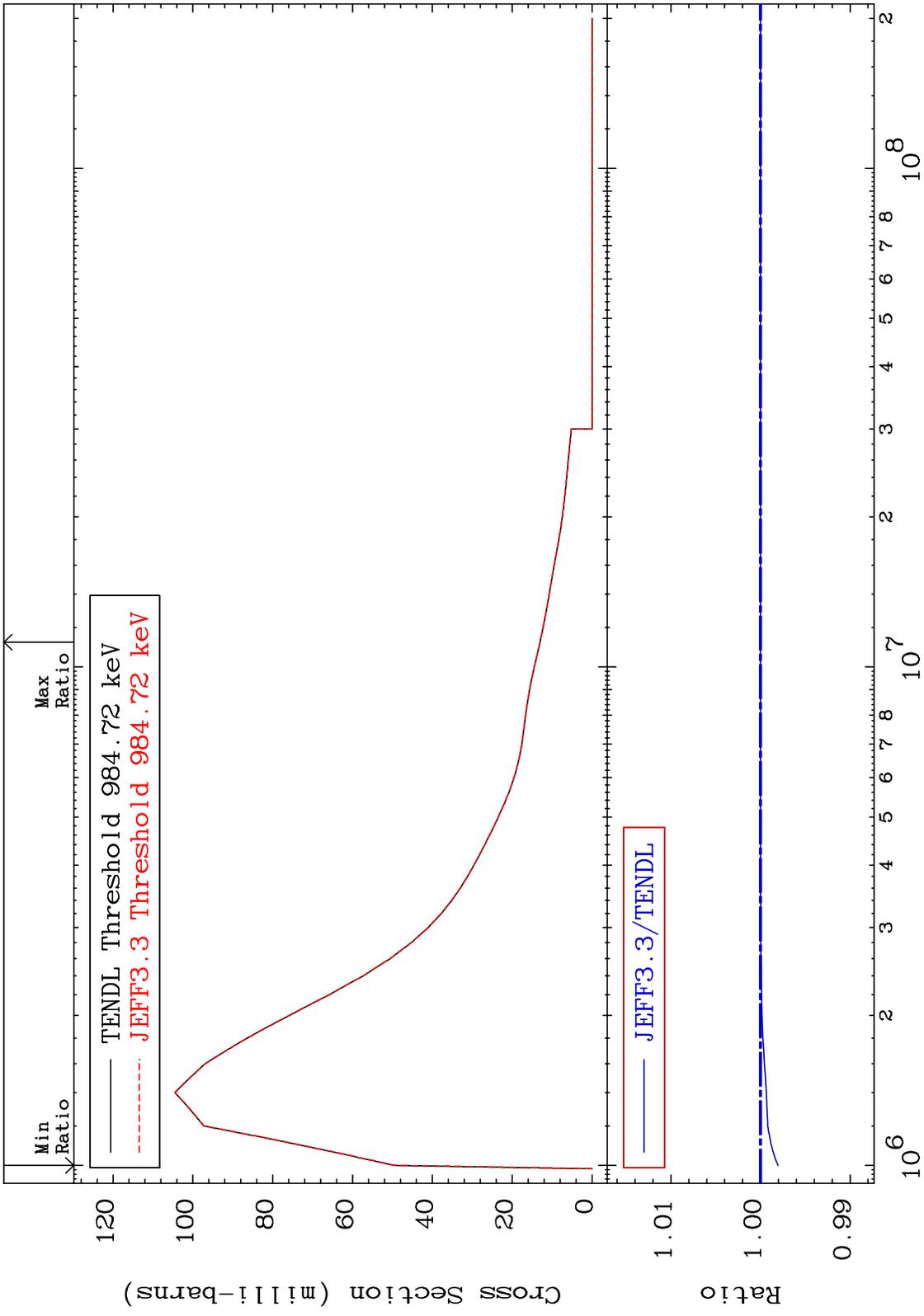
28 62-Sm-147

MAT 6234 MT= 60 (n,n') Level Cross Section 62-Sm-147
 -0.254 To 0.000 %



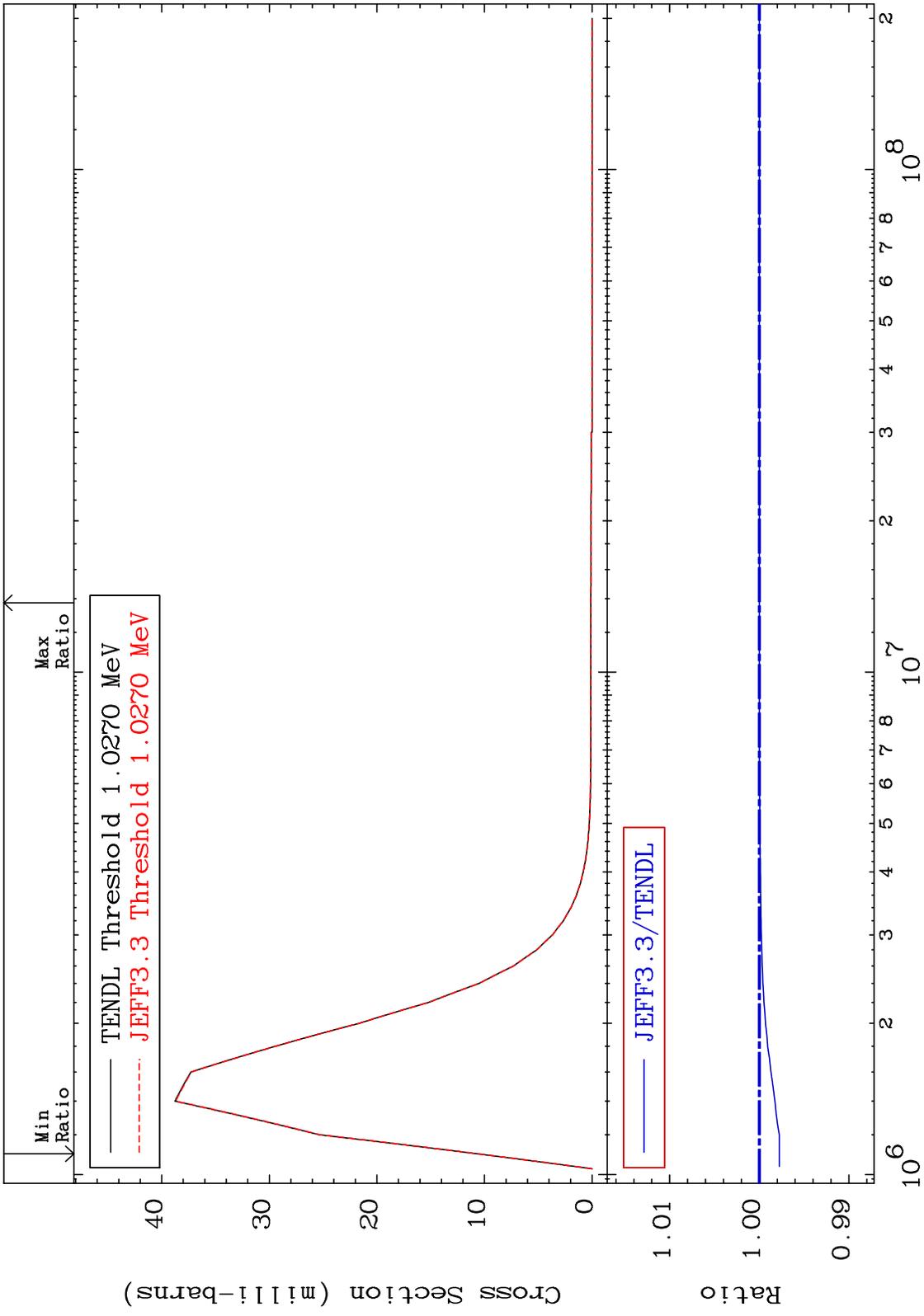
29 Incident Energy (eV) 62-Sm-147

MAT 6234 MT= 61 (n,n') Level Cross Section 62-Sm-147 -0.196 To 0.000 %

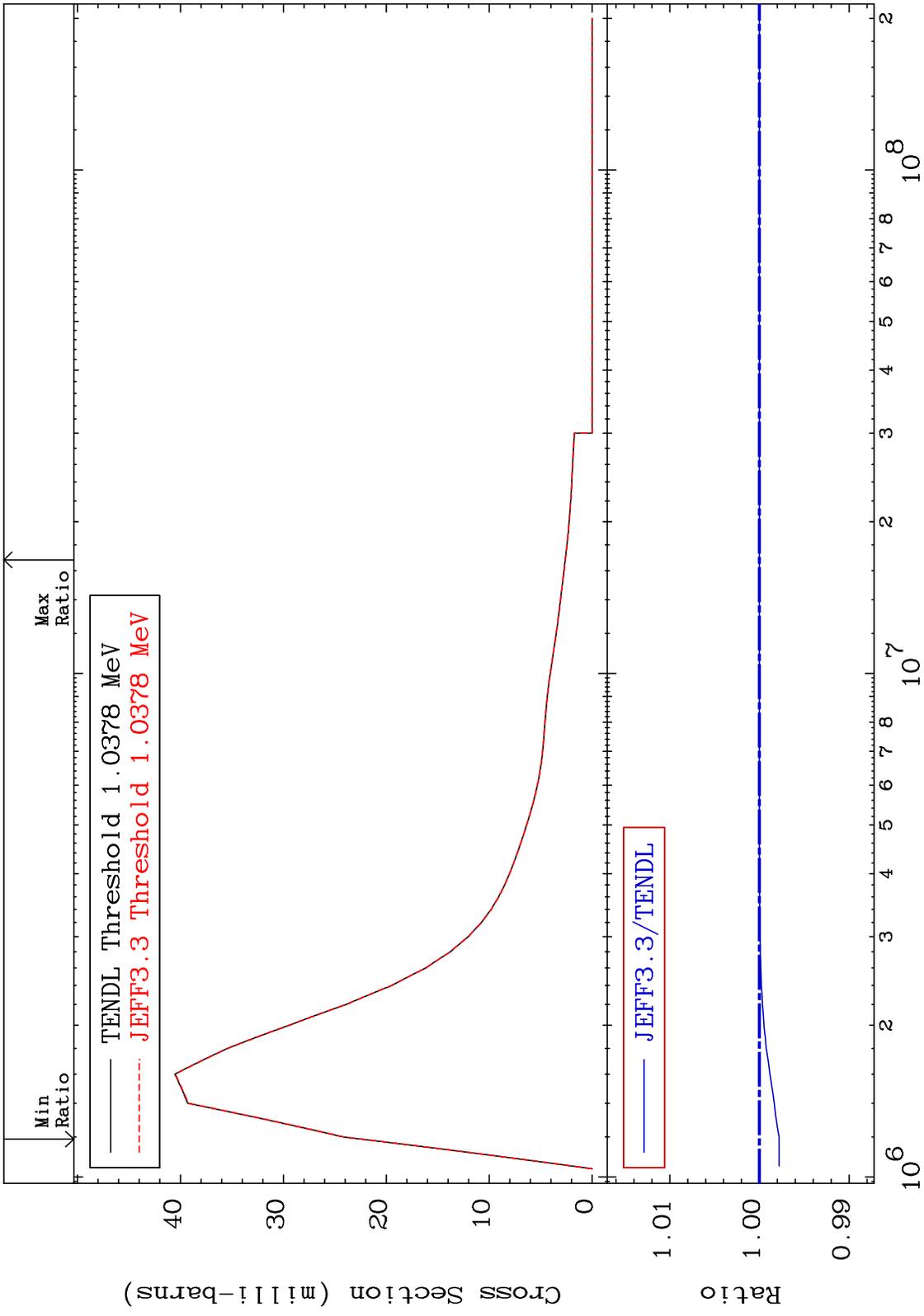


30 10⁶ 10⁷ 10⁸ 2 3 4 5 6 7 8 2 62-Sm-147

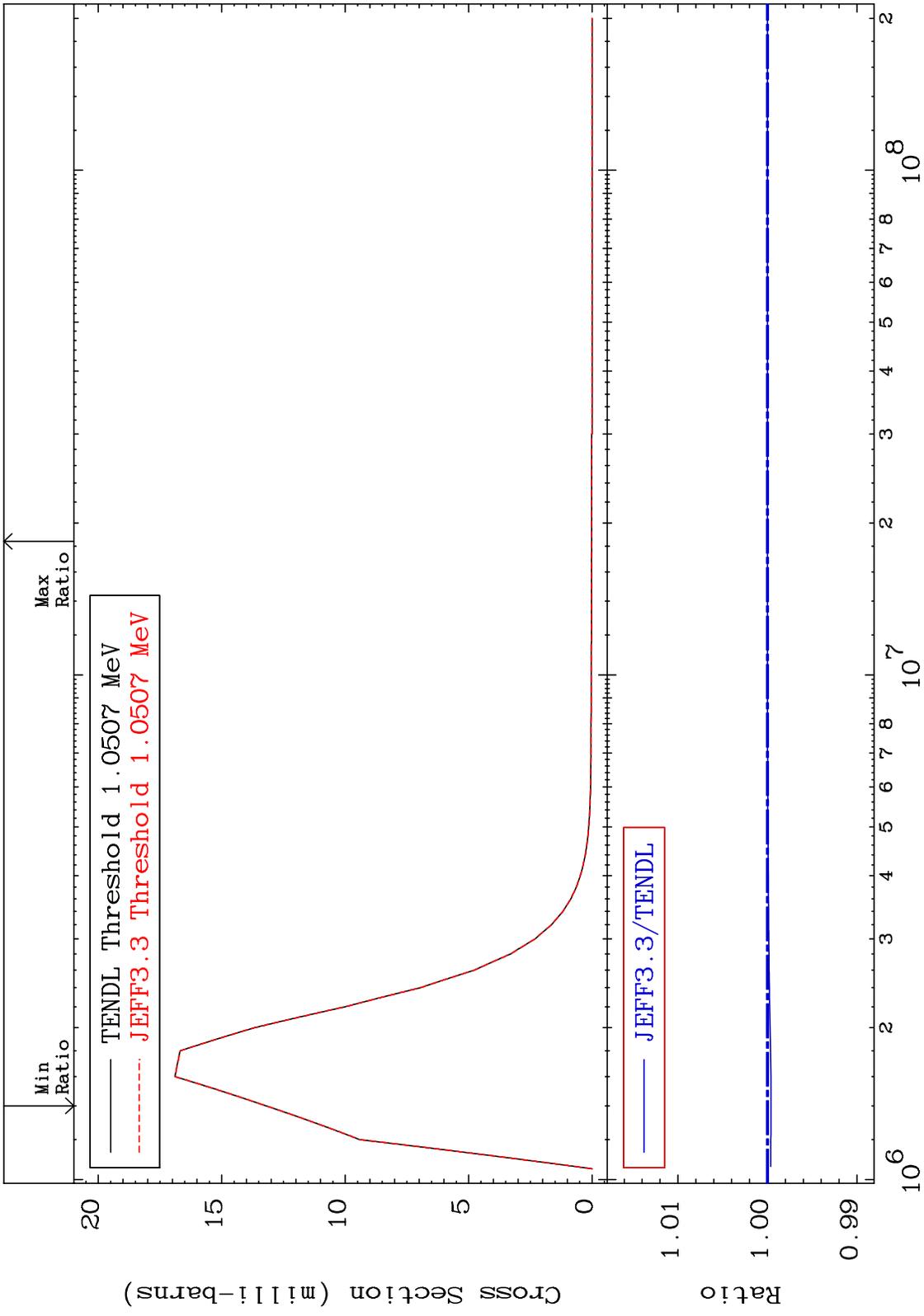
MAT 6234 MT= 62 (n,n') Level Cross Section 62-Sm-147 -0.223 To 0.000 %



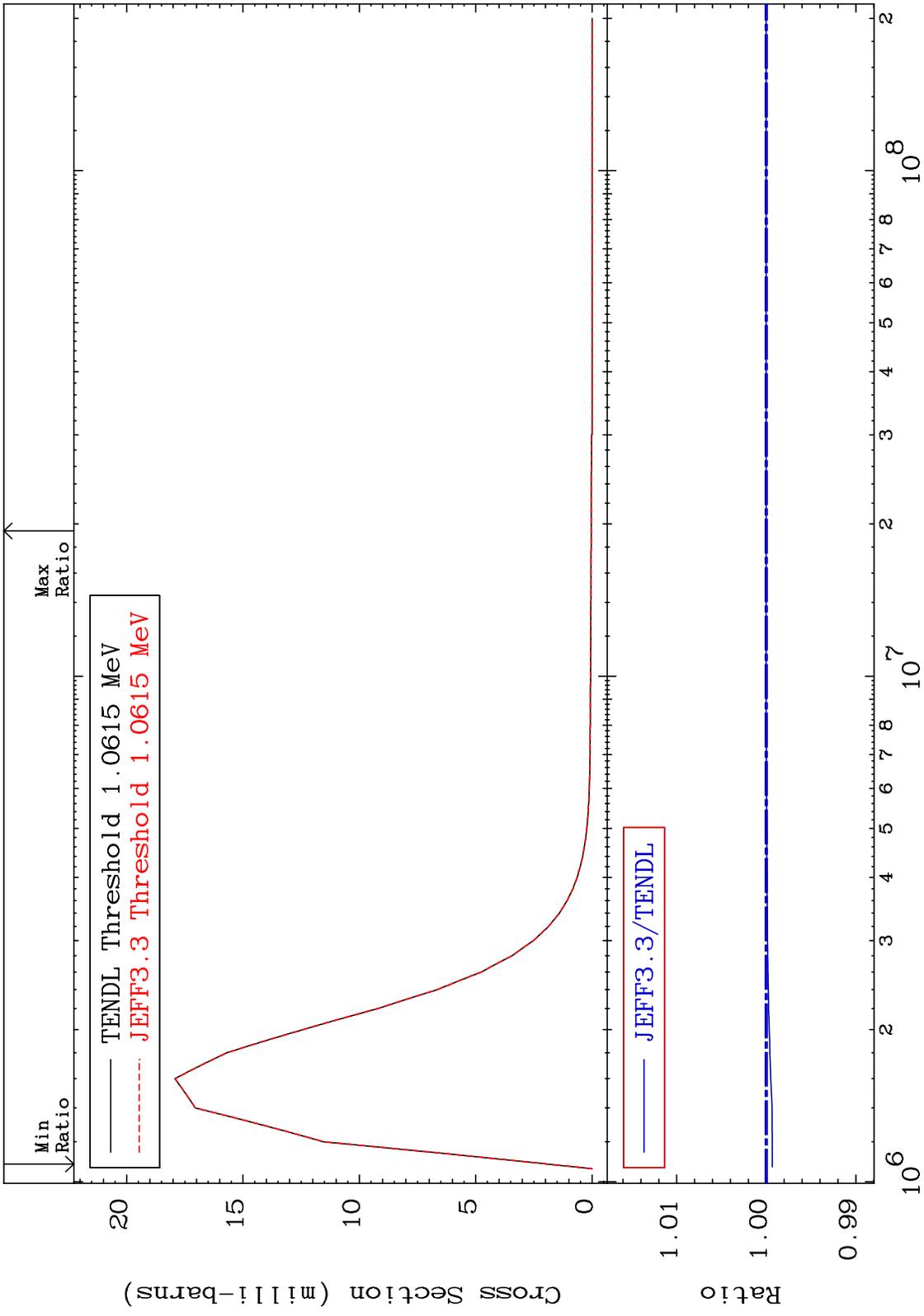
MAT 6234 MT= 63 (n,n') Level Cross Section 62-Sm-147 -0.220 To 0.000 %



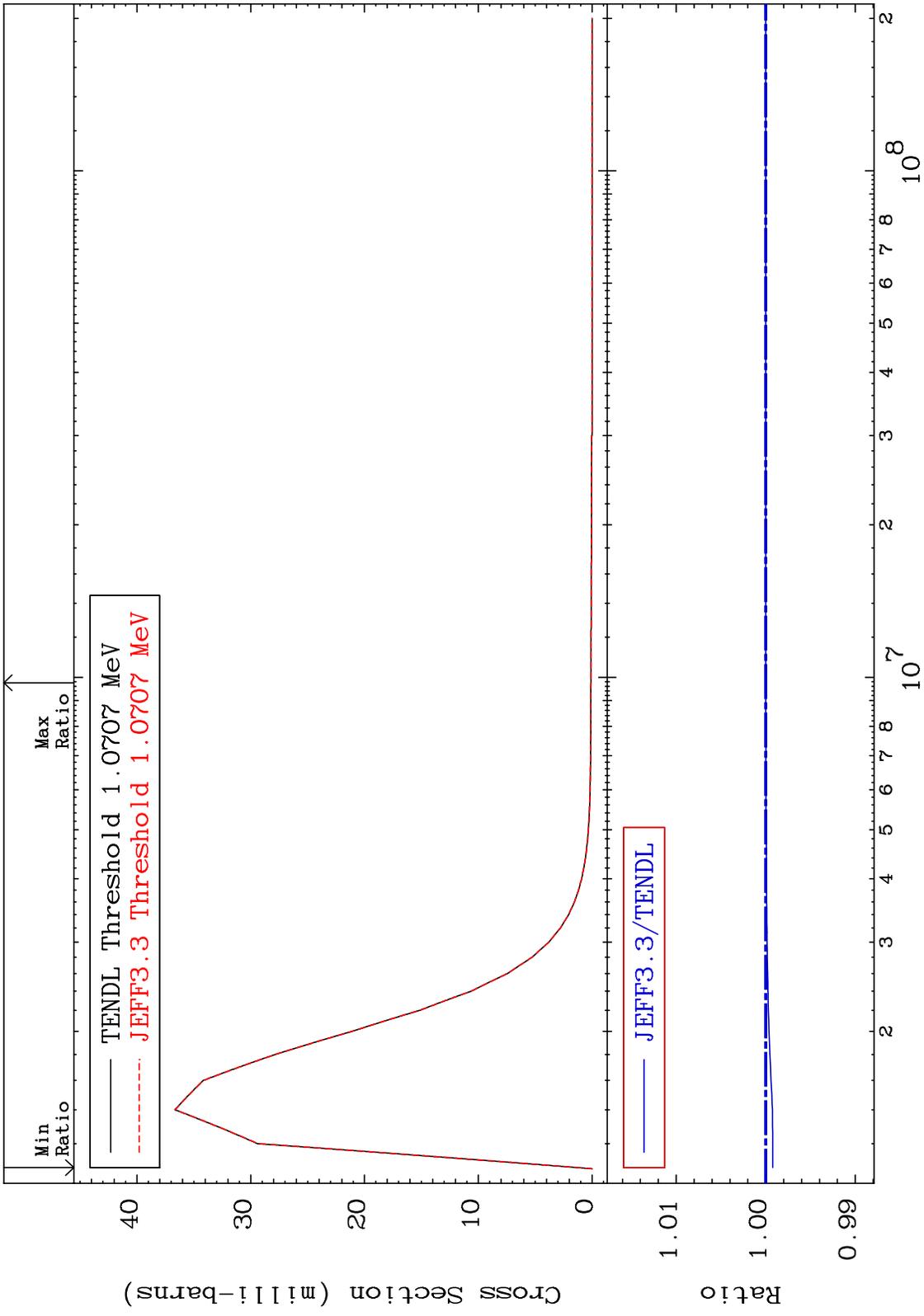
MAT 6234 MT= 64 (n,n') Level Cross Section 62-Sm-147 -0.040 To 0.000 %



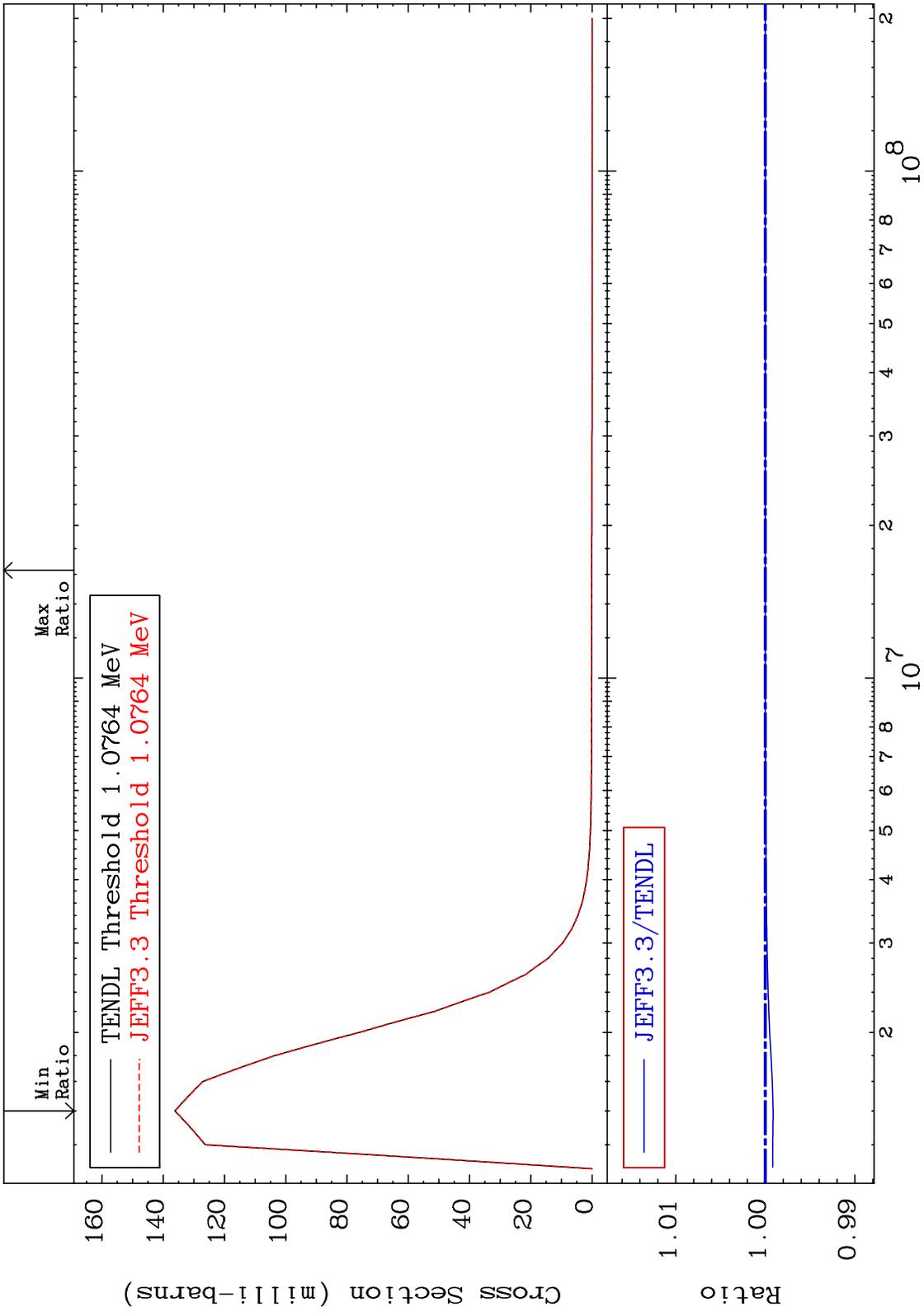
MAT 6234 MT= 65 (n, n') Level Cross Section 62-Sm-147 -0.068 To 0.000 %



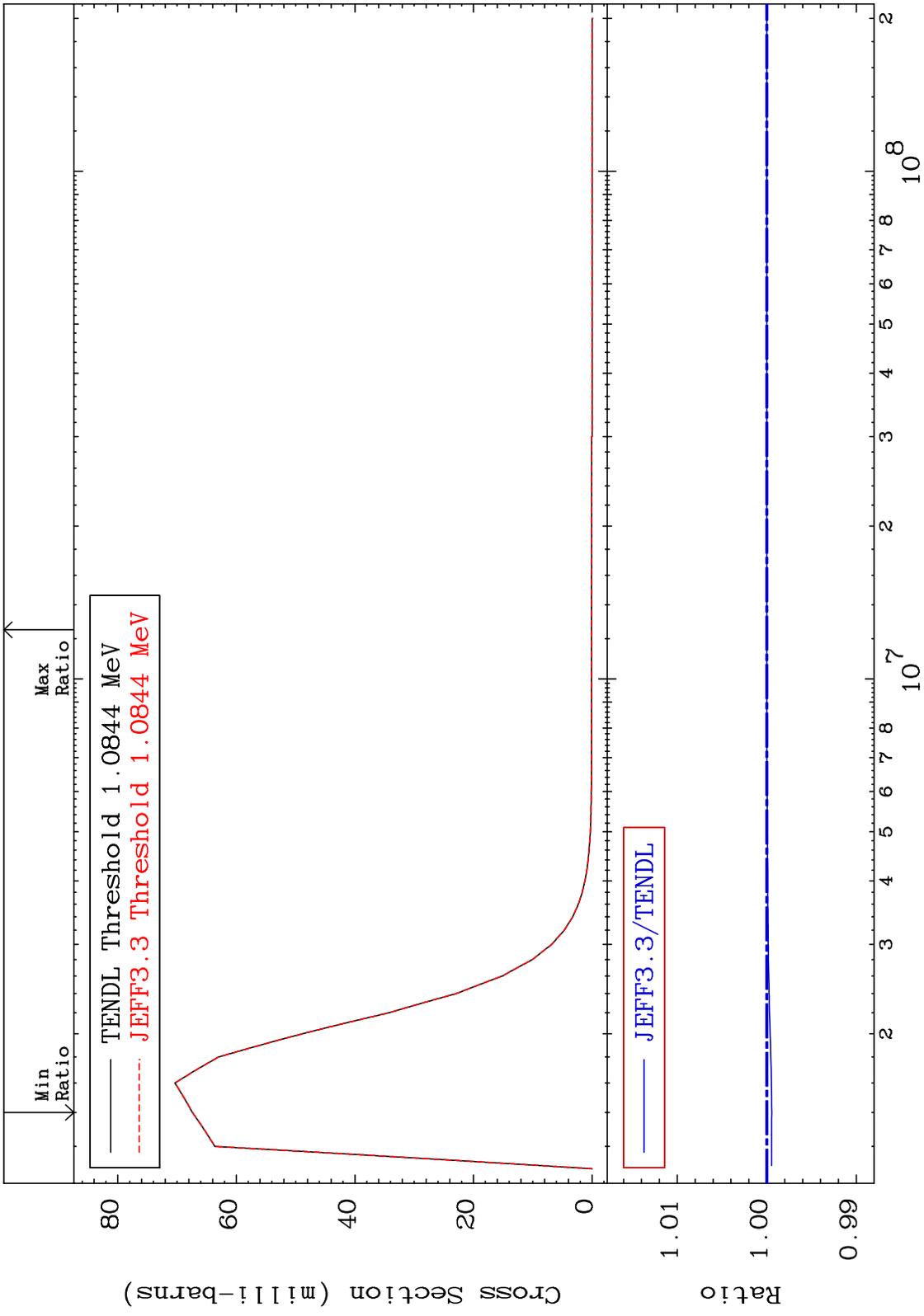
MAT 6234 MT= 66 (n,n') Level Cross Section 62-Sm-147 -0.079 To 0.000 %



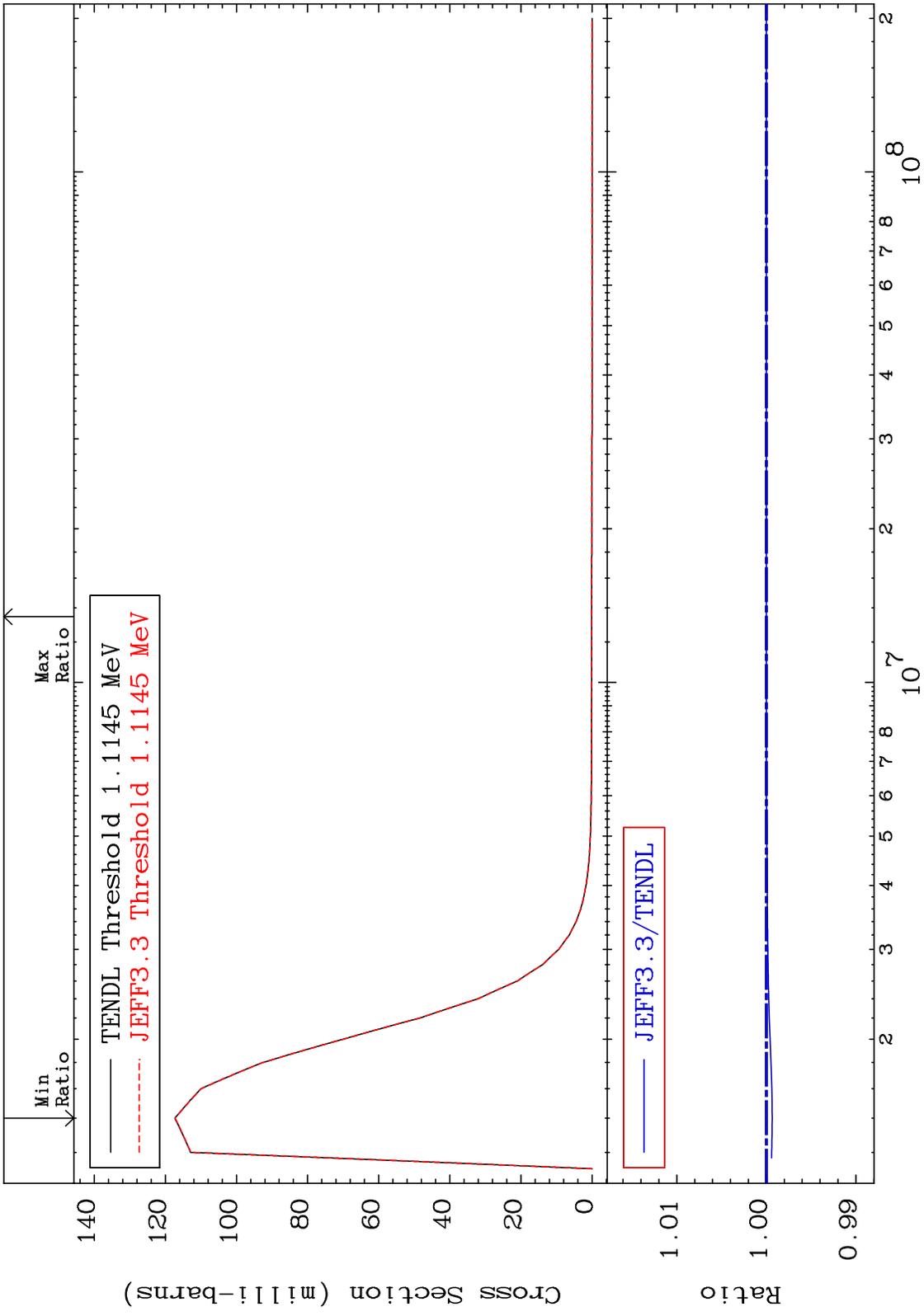
MAT 6234 MT= 67 (n,n') Level Cross Section 62-Sm-147 -0.088 To 0.000 %



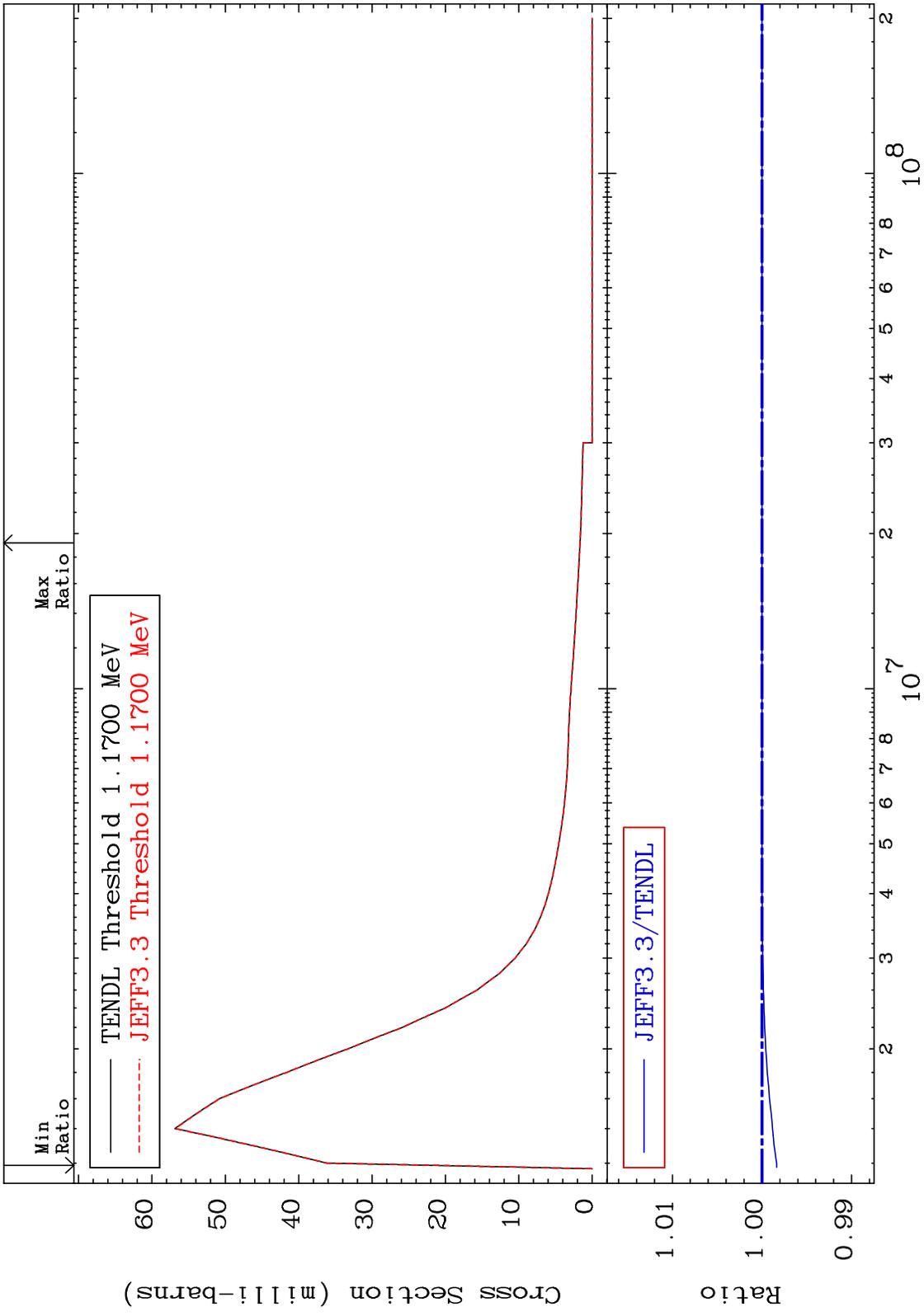
MAT 6234 MT= 68 (n,n') Level Cross Section 62-Sm-147 -0.055 To 0.000 %



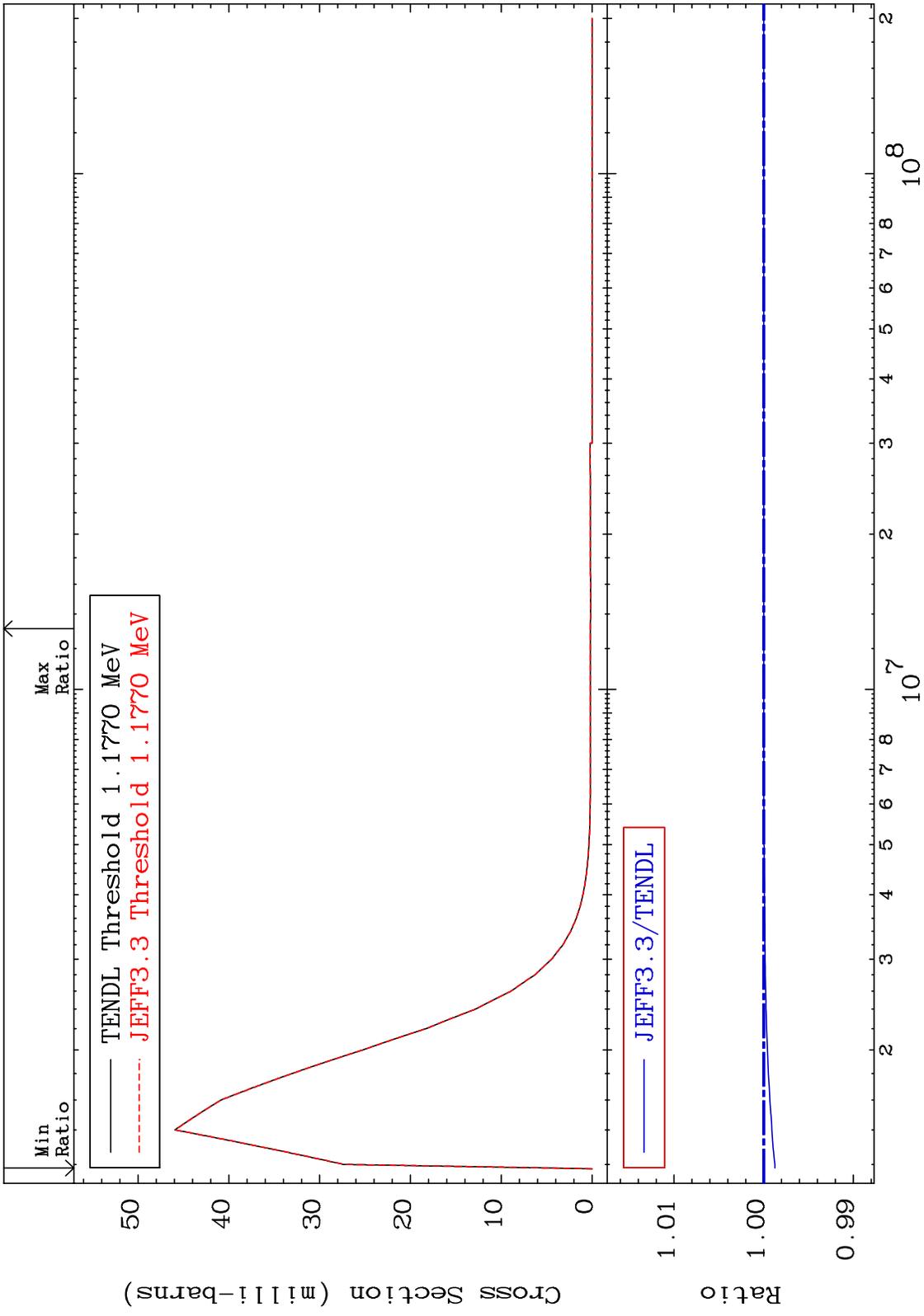
MAT 6234 MT= 69 (n,n') Level Cross Section 62-Sm-147
 -0.066 To 0.000 %



MAT 6234 MT= 70 (n,n') Level Cross Section 62-Sm-147
 -0.164 To 0.000 %

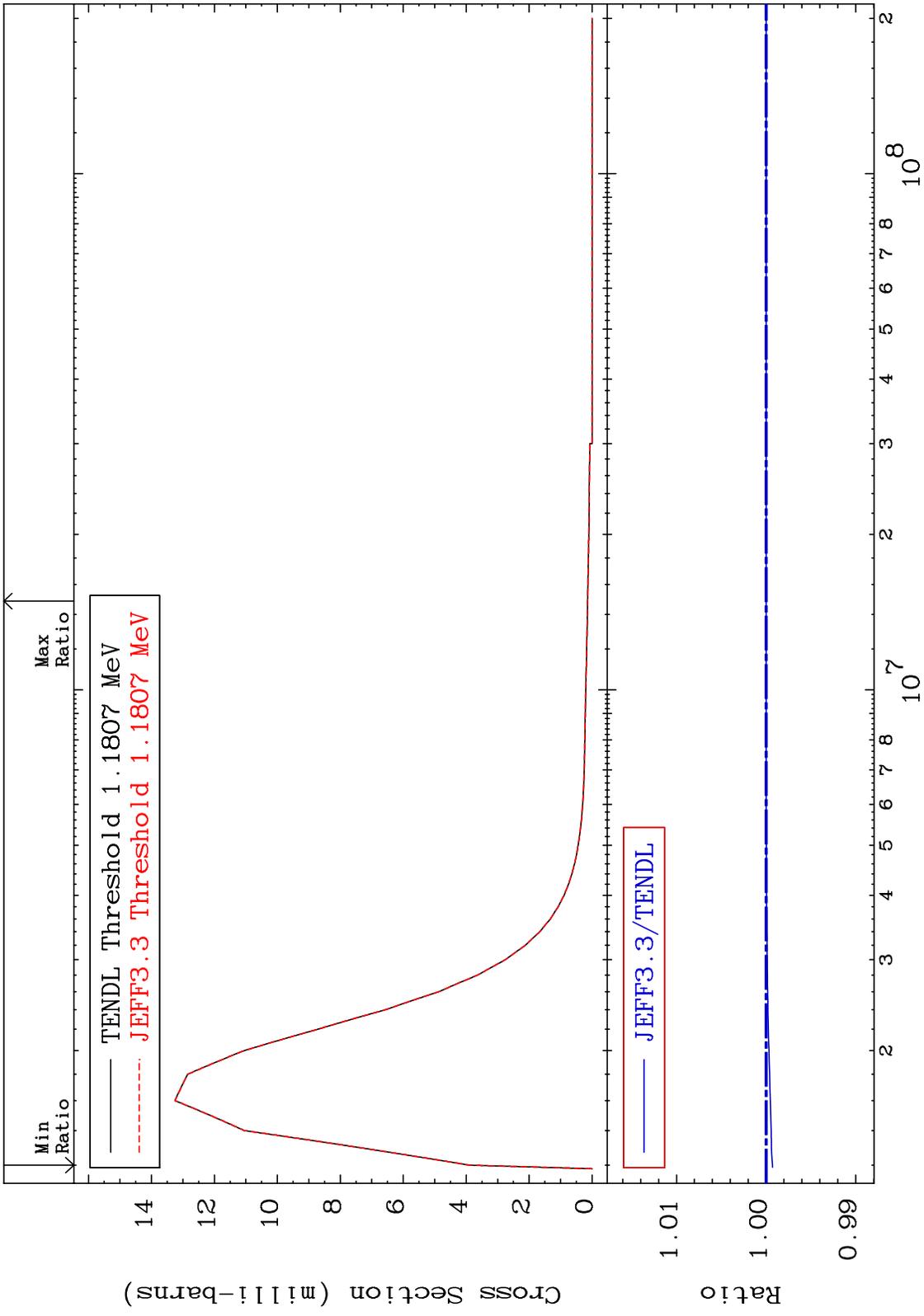


MAT 6234 MT= 71 (n,n') Level Cross Section 62-Sm-147 -0.125 To 0.000 %

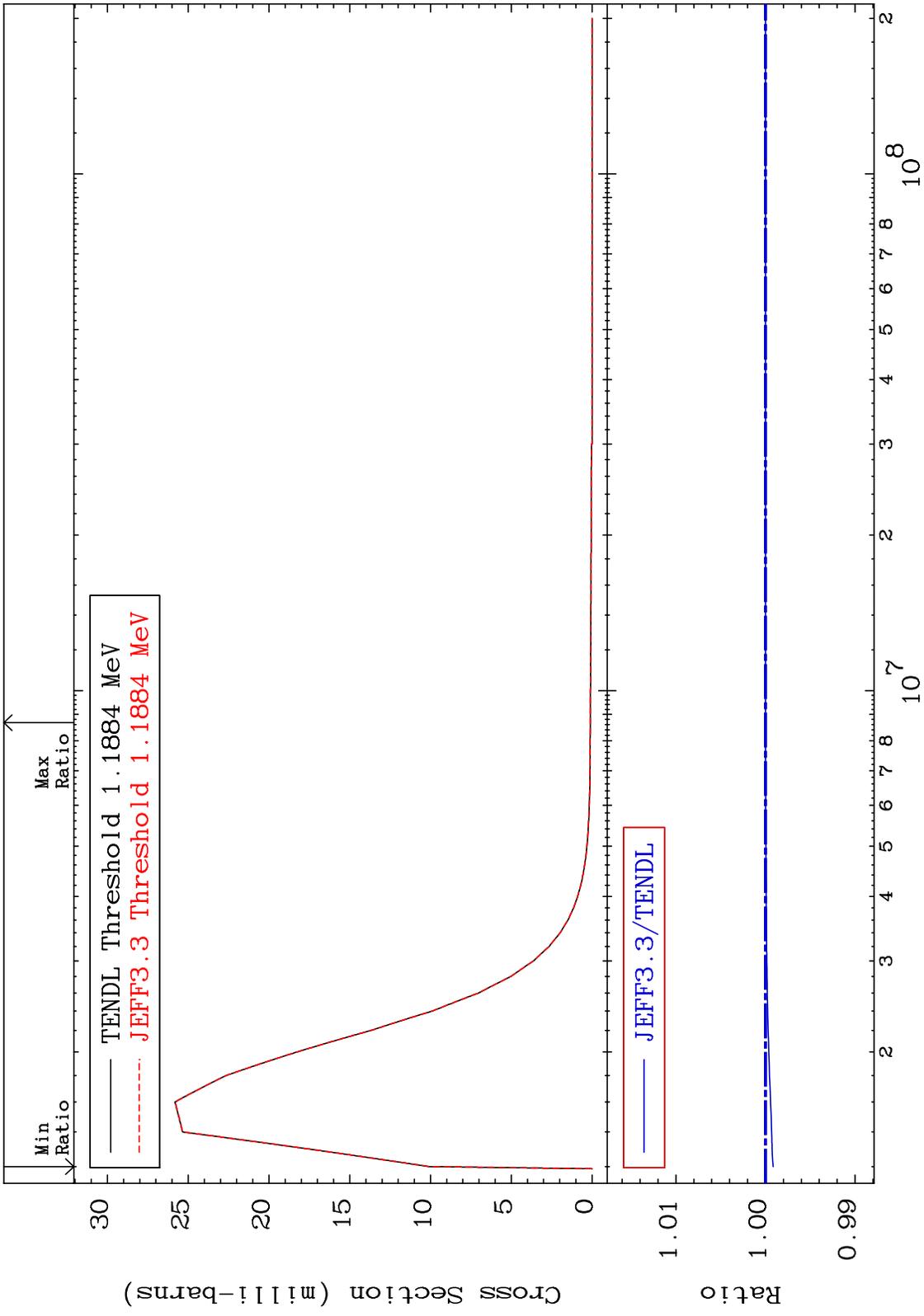


40 Incident Energy (eV) 62-Sm-147

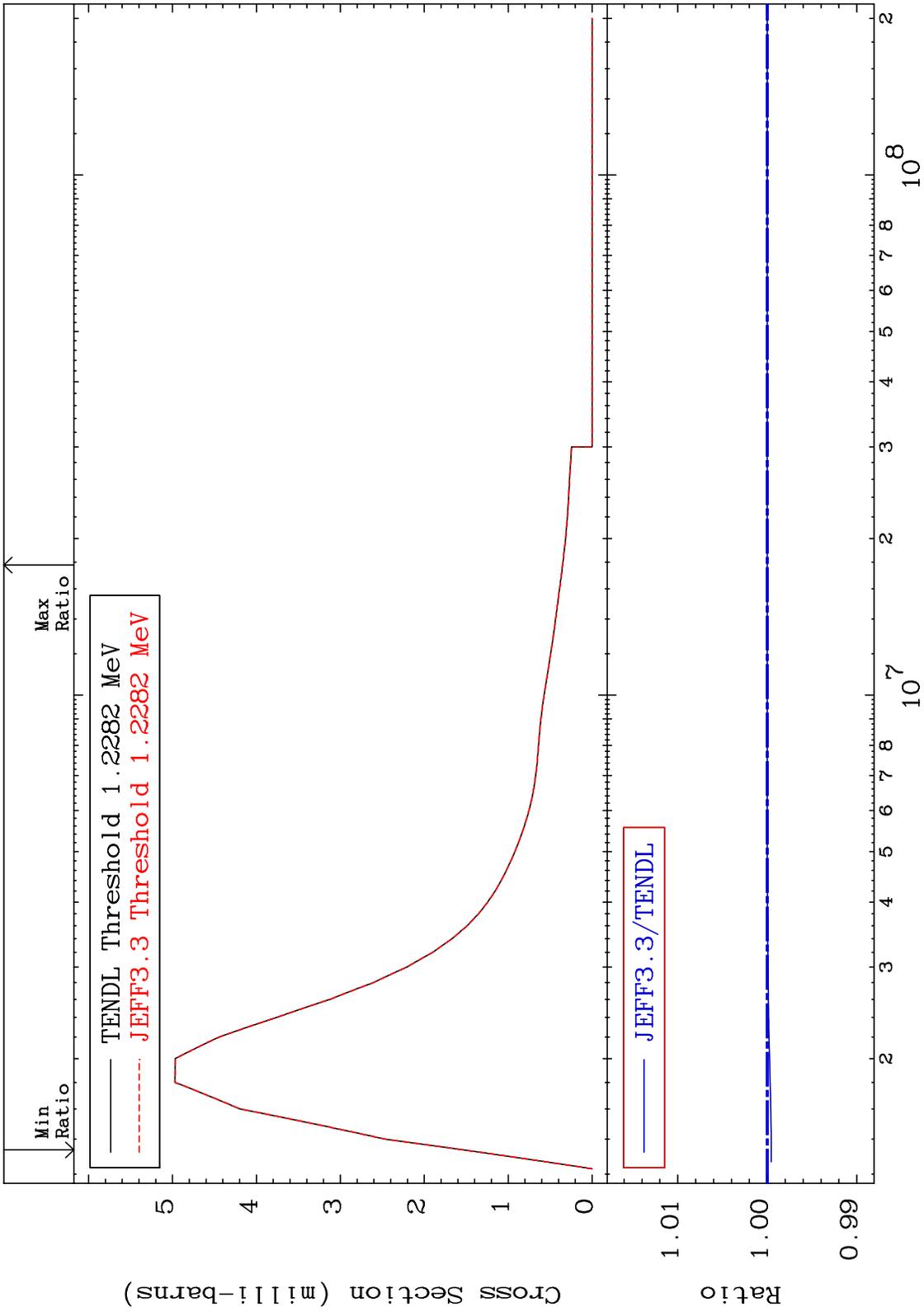
MAT 6234 MT= 72 (n,n') Level Cross Section 62-Sm-147 -0.072 To 0.000 %



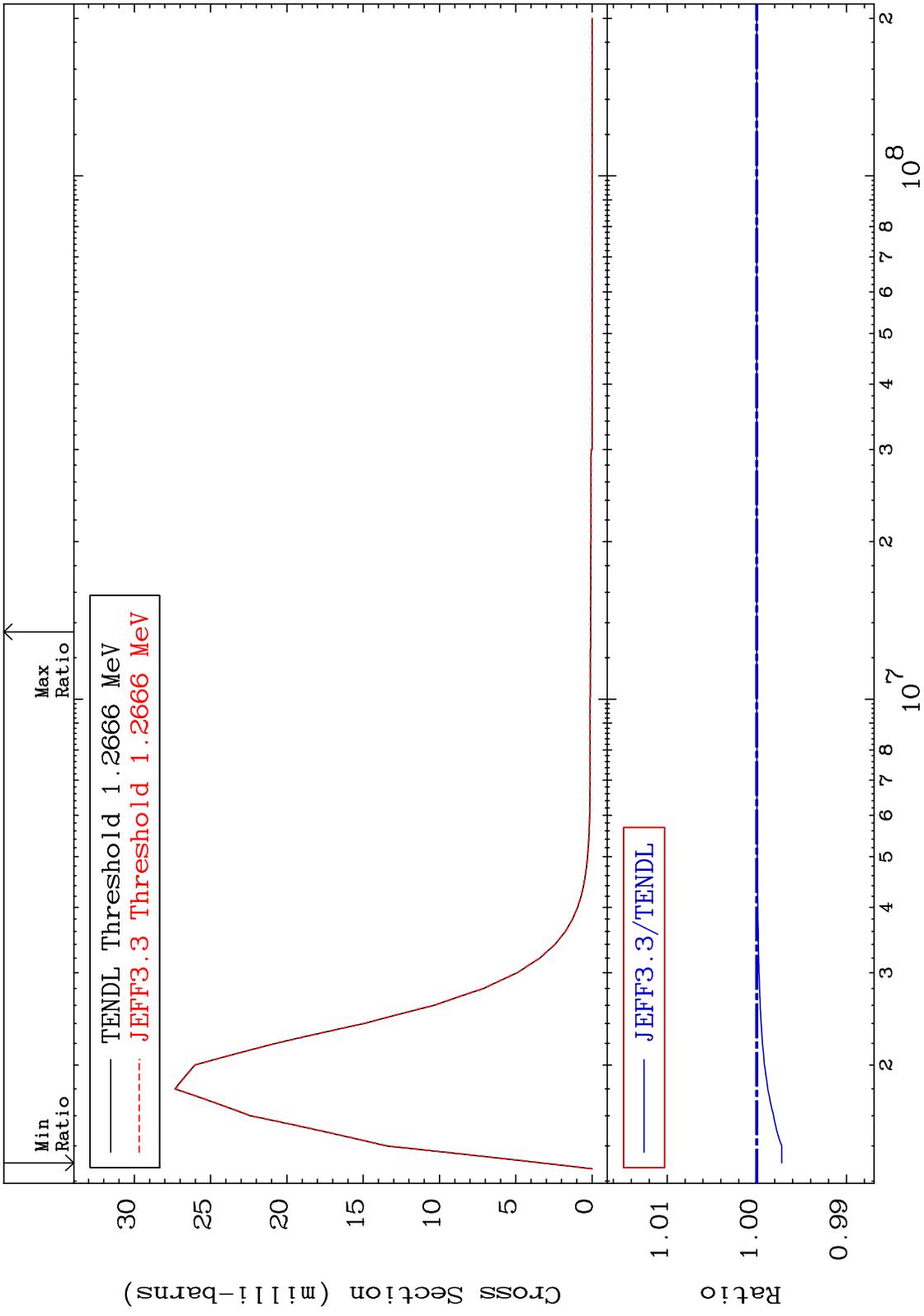
MAT 6234 MT= 73 (n,n') Level Cross Section 62-Sm-147
 -0.085 To 0.000 %



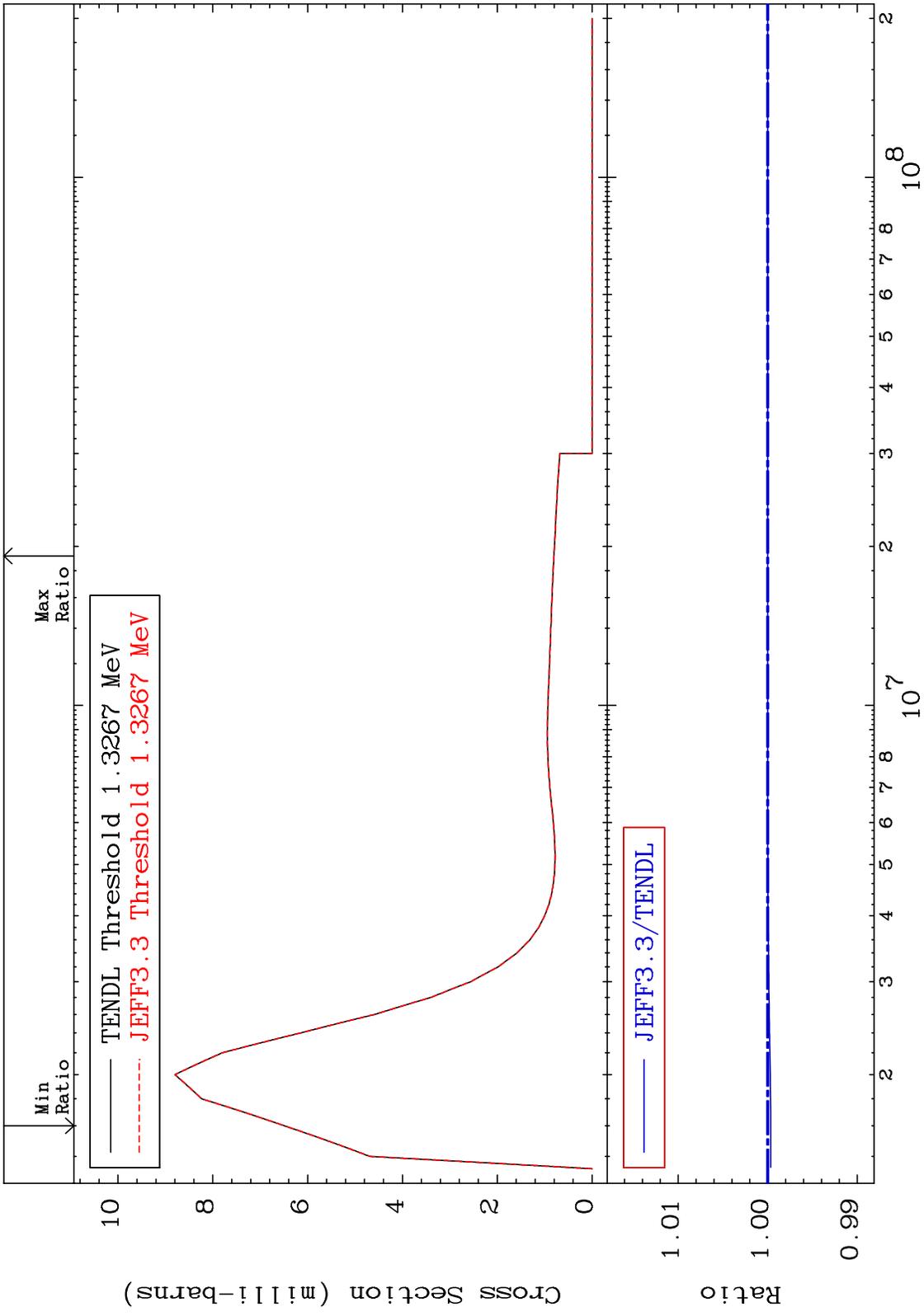
MAT 6234 MT= 74 (n,n') Level Cross Section 62-Sm-147 -0.044 To 0.000 %



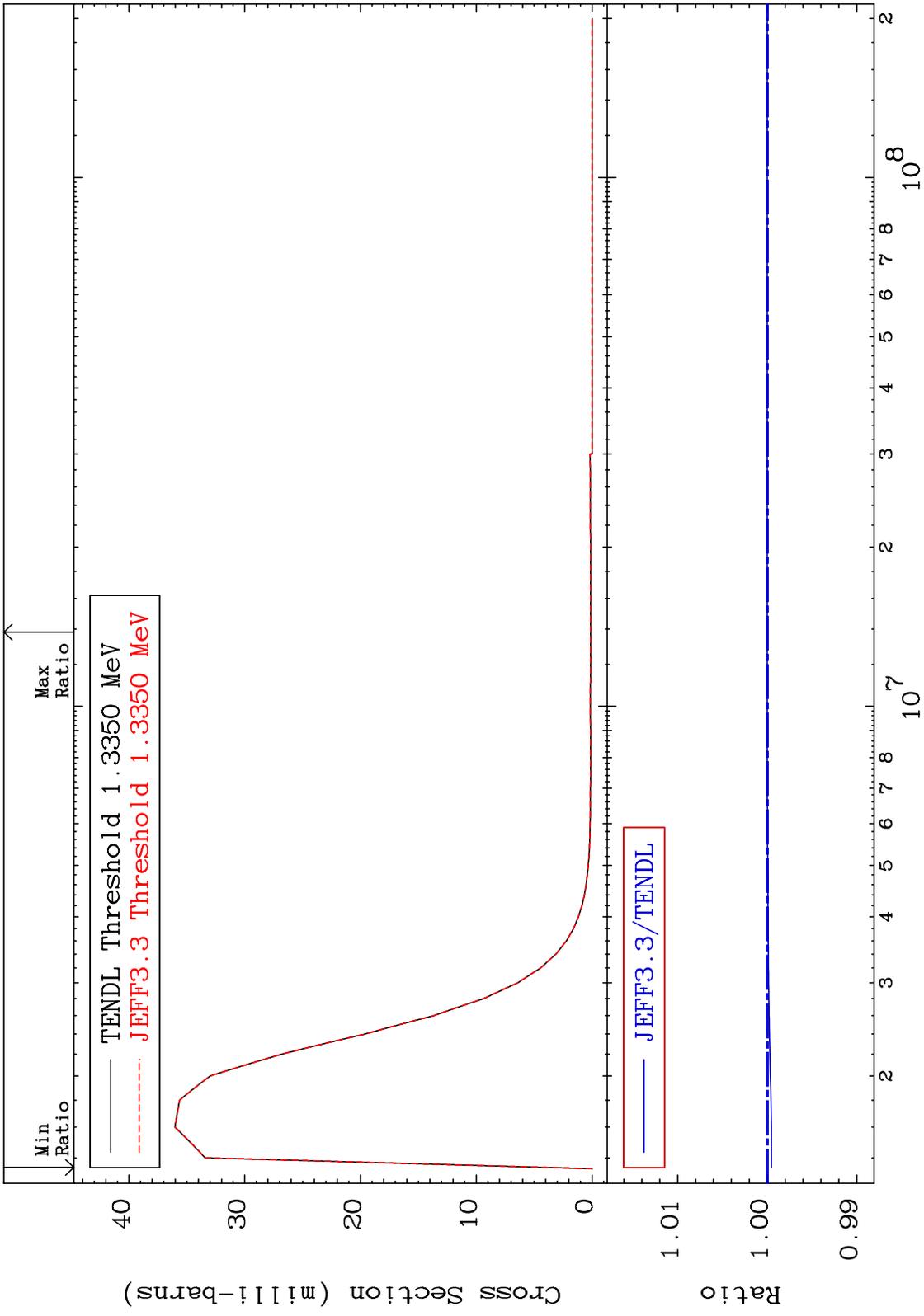
MAT 6234 MT= 75 (n,n') Level Cross Section 62-Sm-147 -0.279 To 0.000 %



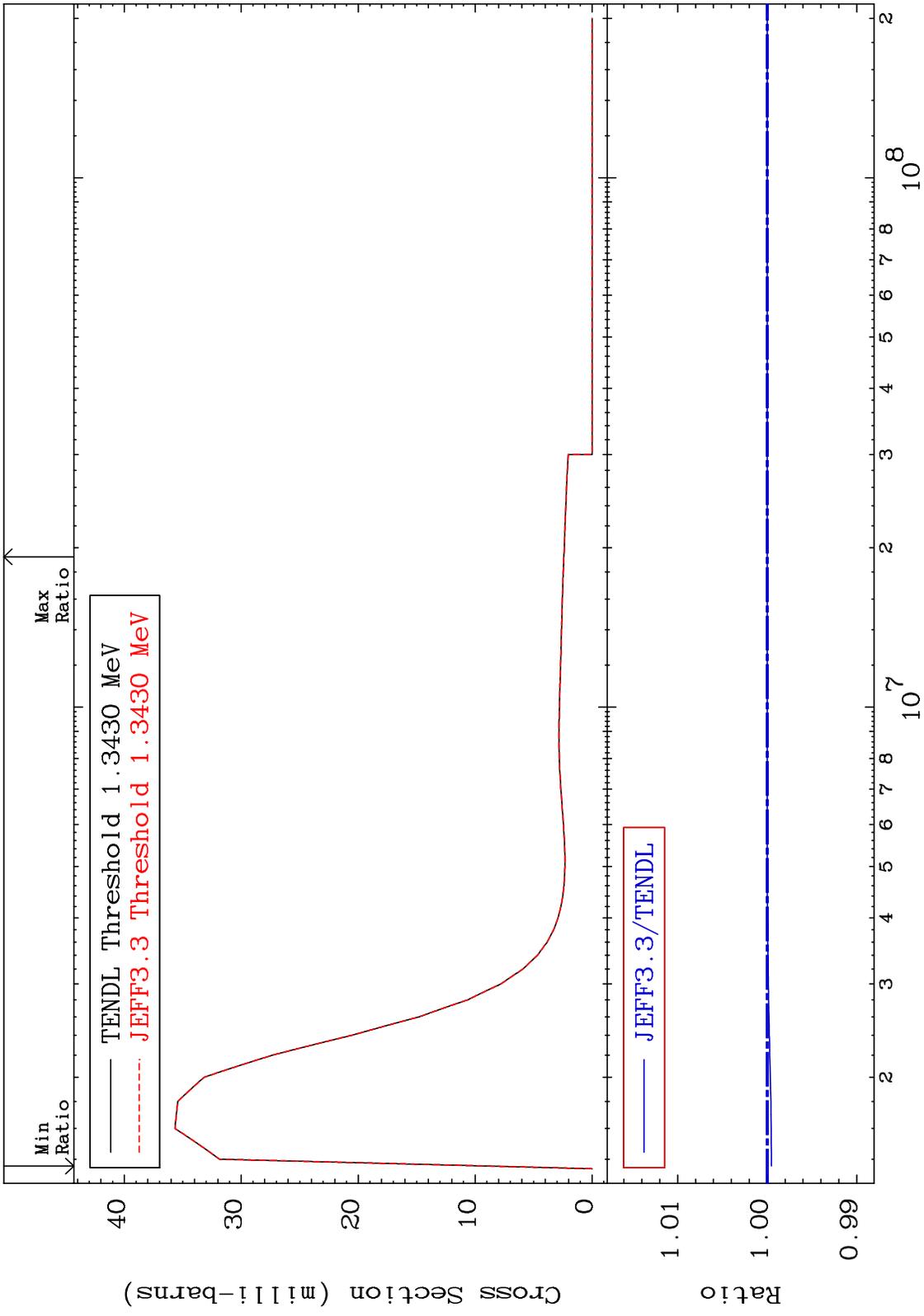
MAT 6234 MT= 76 (n,n') Level Cross Section 62-Sm-147 -0.034 To 0.000 %



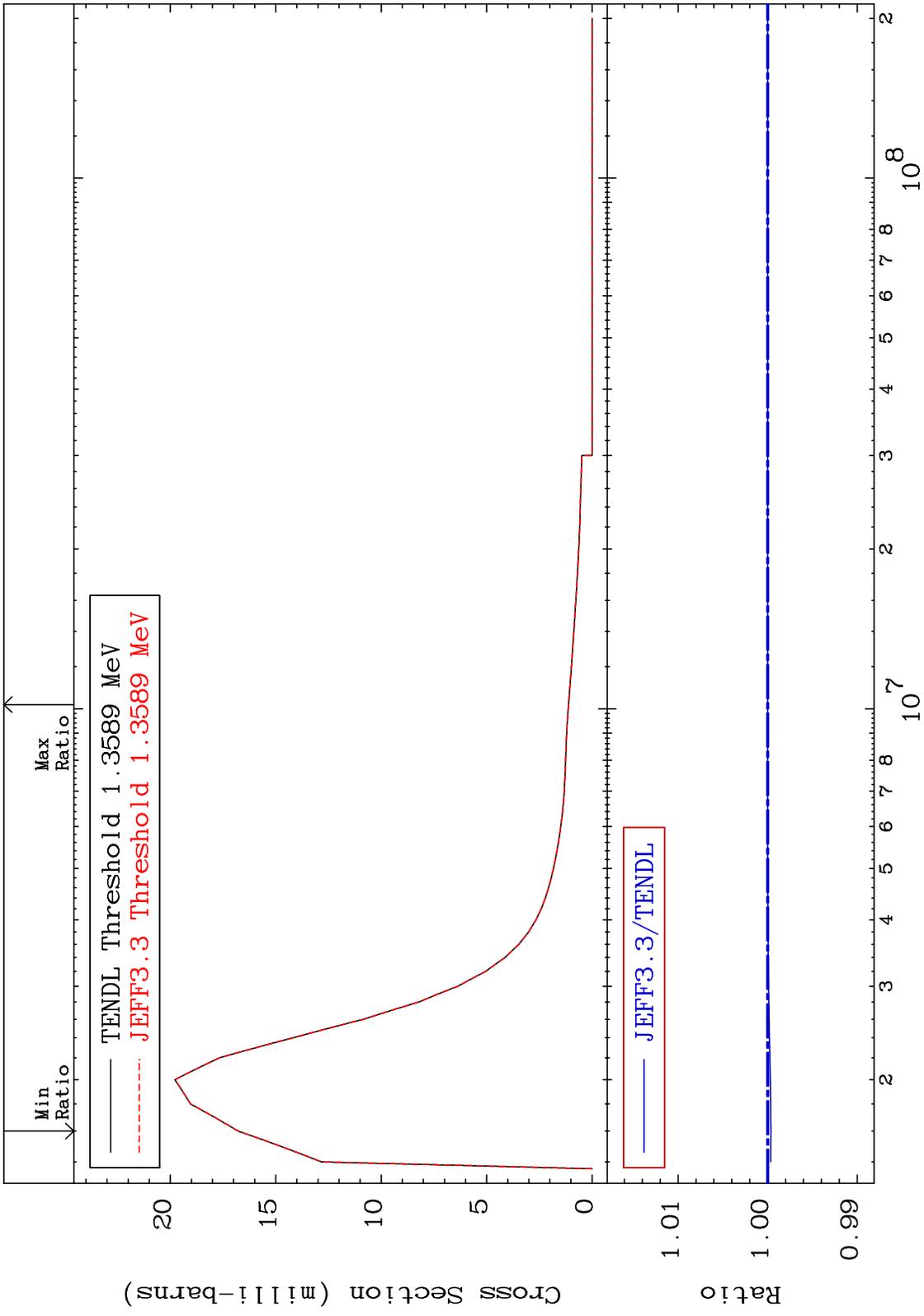
MAT 6234 MT= 77 (n,n') Level Cross Section 62-Sm-147 -0.046 To 0.000 %



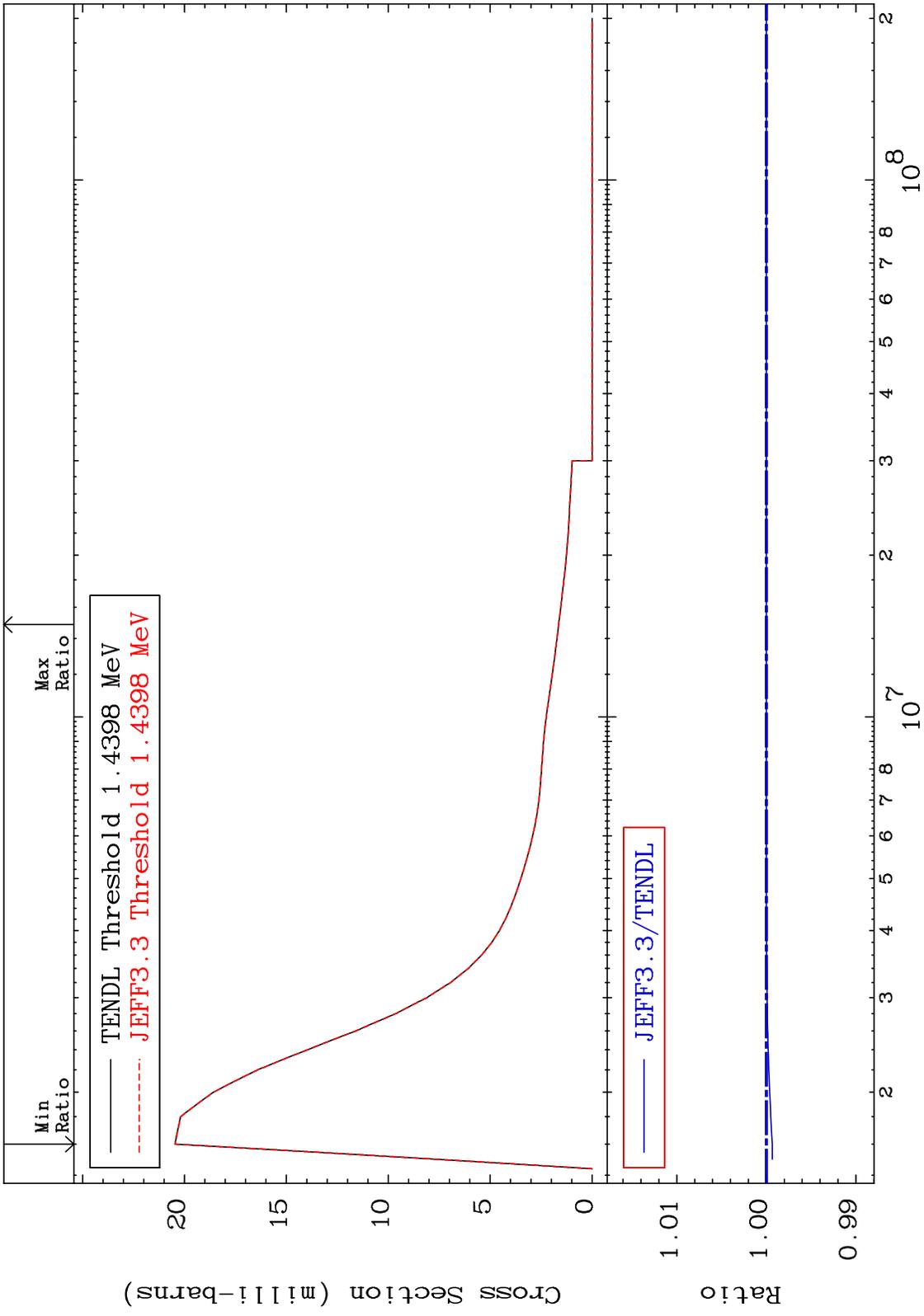
MAT 6234 MT= 78 (n,n') Level Cross Section 62-Sm-147
 -0.046 To 0.000 %



MAT 6234 MT= 79 (n,n') Level Cross Section 62-Sm-147 -0.036 To 0.000 %



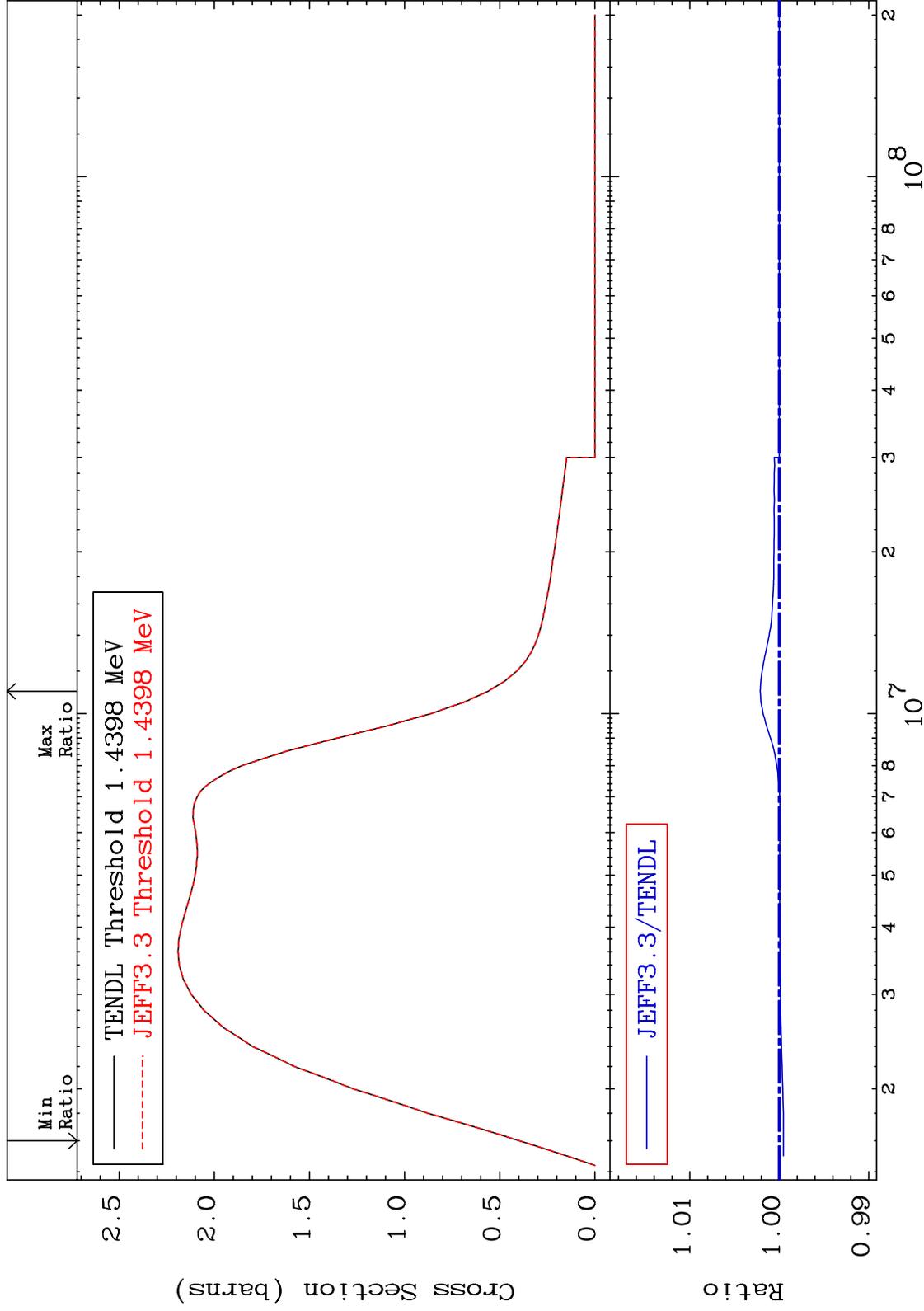
MAT 6234 MT= 80 (n,n') Level Cross Section 62-Sm-147 -0.066 To 0.000 %



MAT 6234

(n,n') Continuum
Cross Section

62-Sm-147
-0.048 To 0.213 %



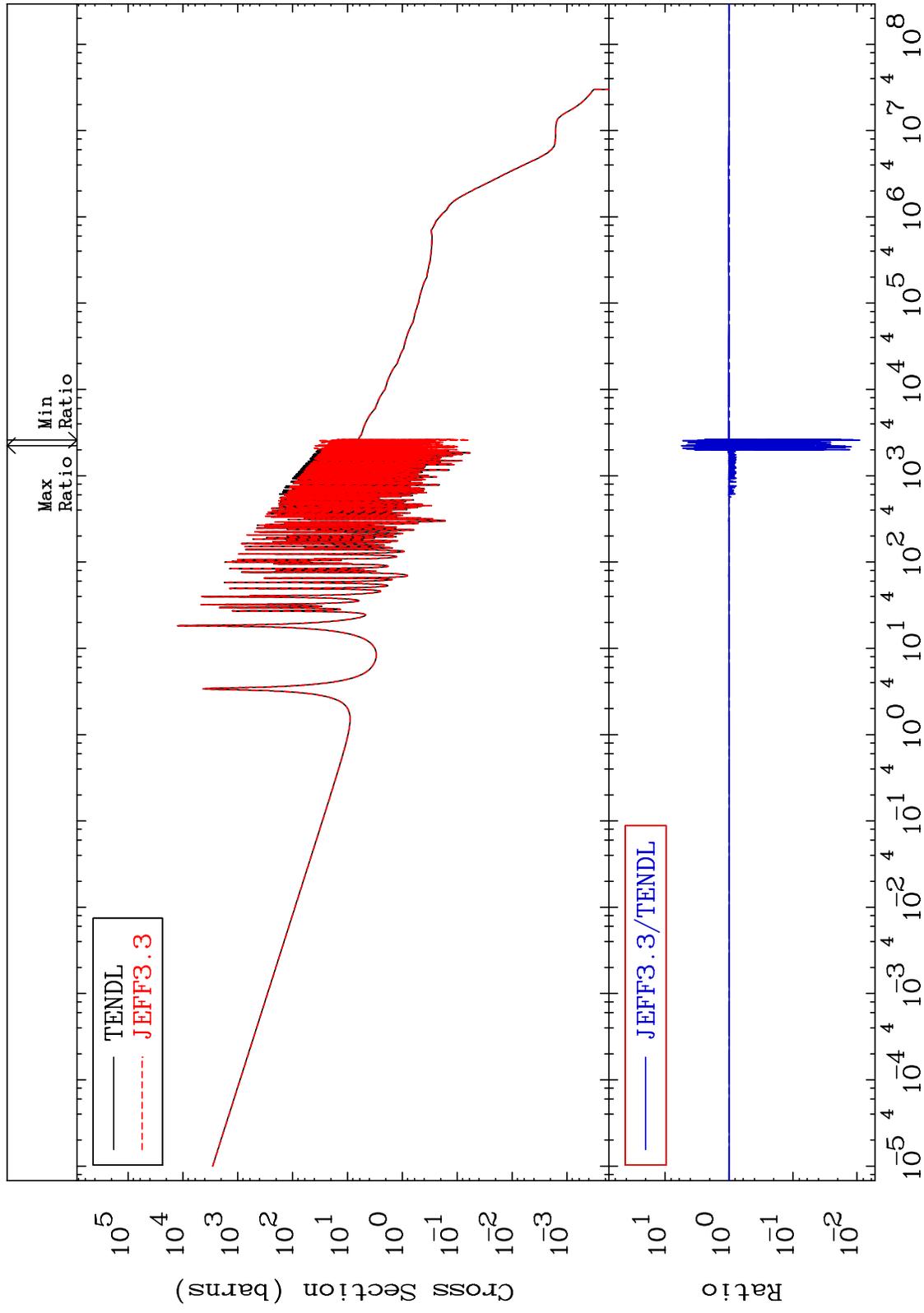
MAT 6234

(n, γ)

62-Sm-147

-99.10 To 456.9 %

Cross Section



MAT 6234

(n,p)

62-Sm-147

Cross Section

Cross Section

Min Ratio

Max Ratio

TENDL Threshold 1.9890 keV
JEFF3.3 Threshold 2.6313 keV

JEFF3.3/TENDL

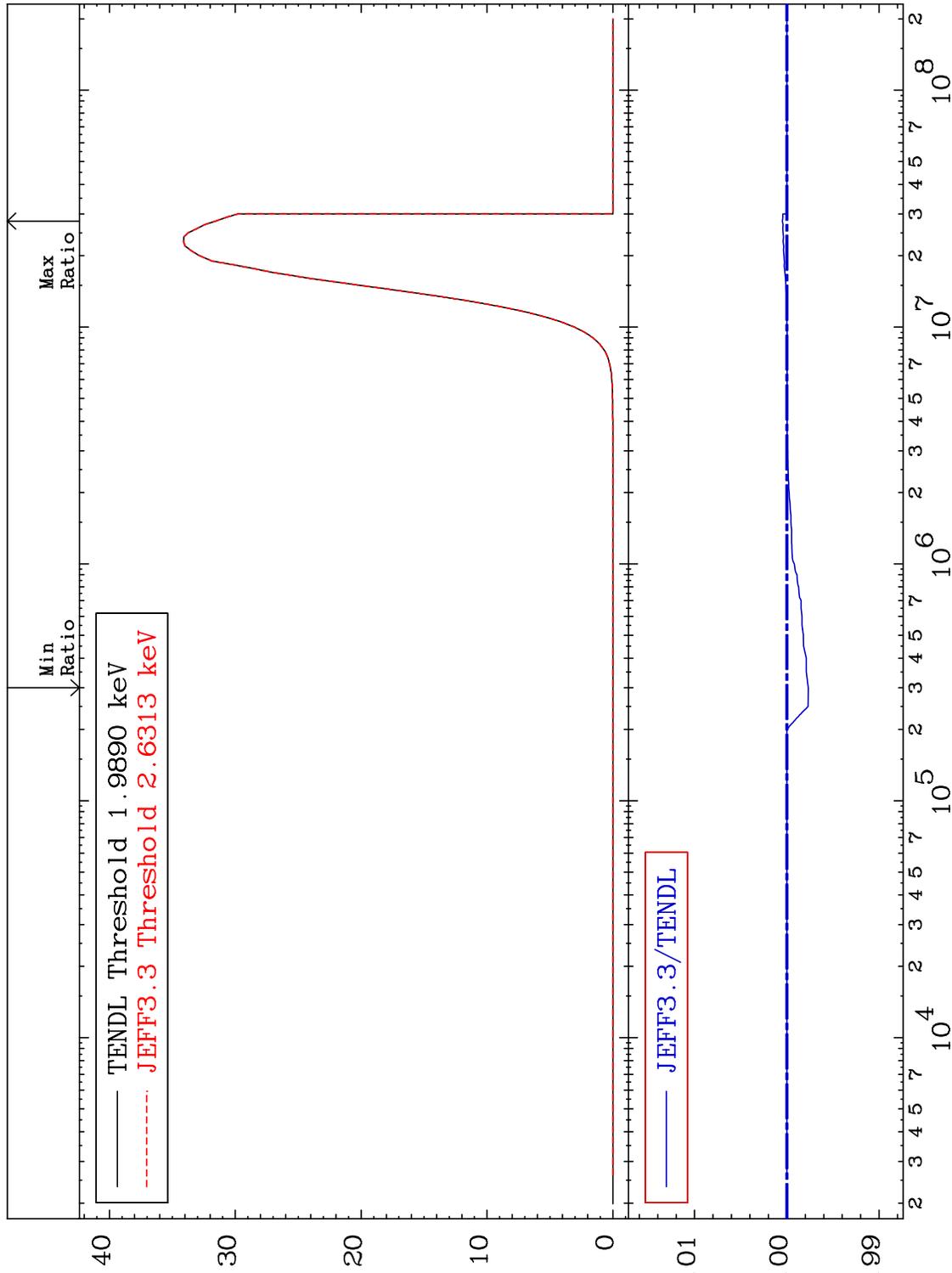
Cross Section (milli-barns)

Ratio

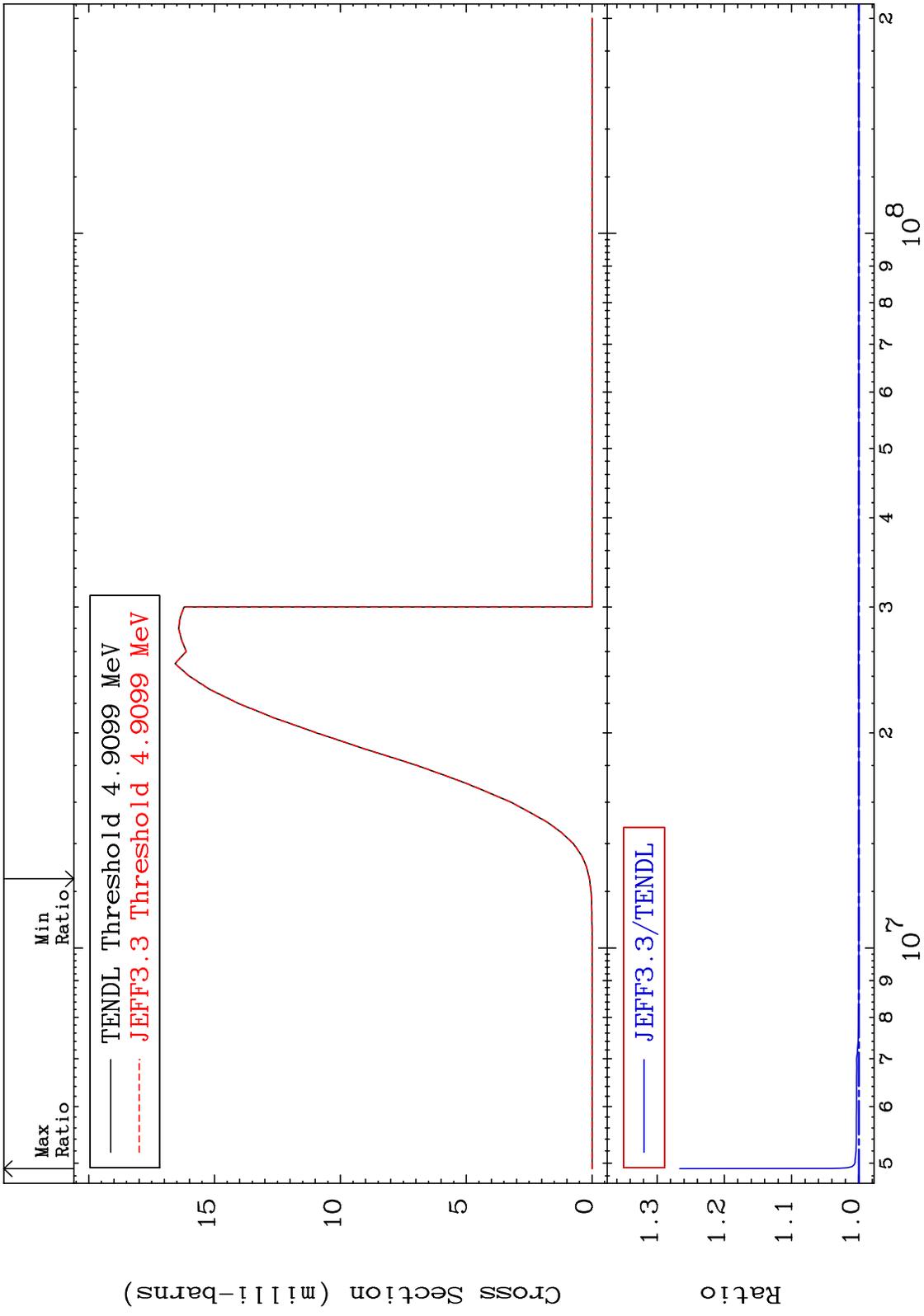
Incident Energy (eV)

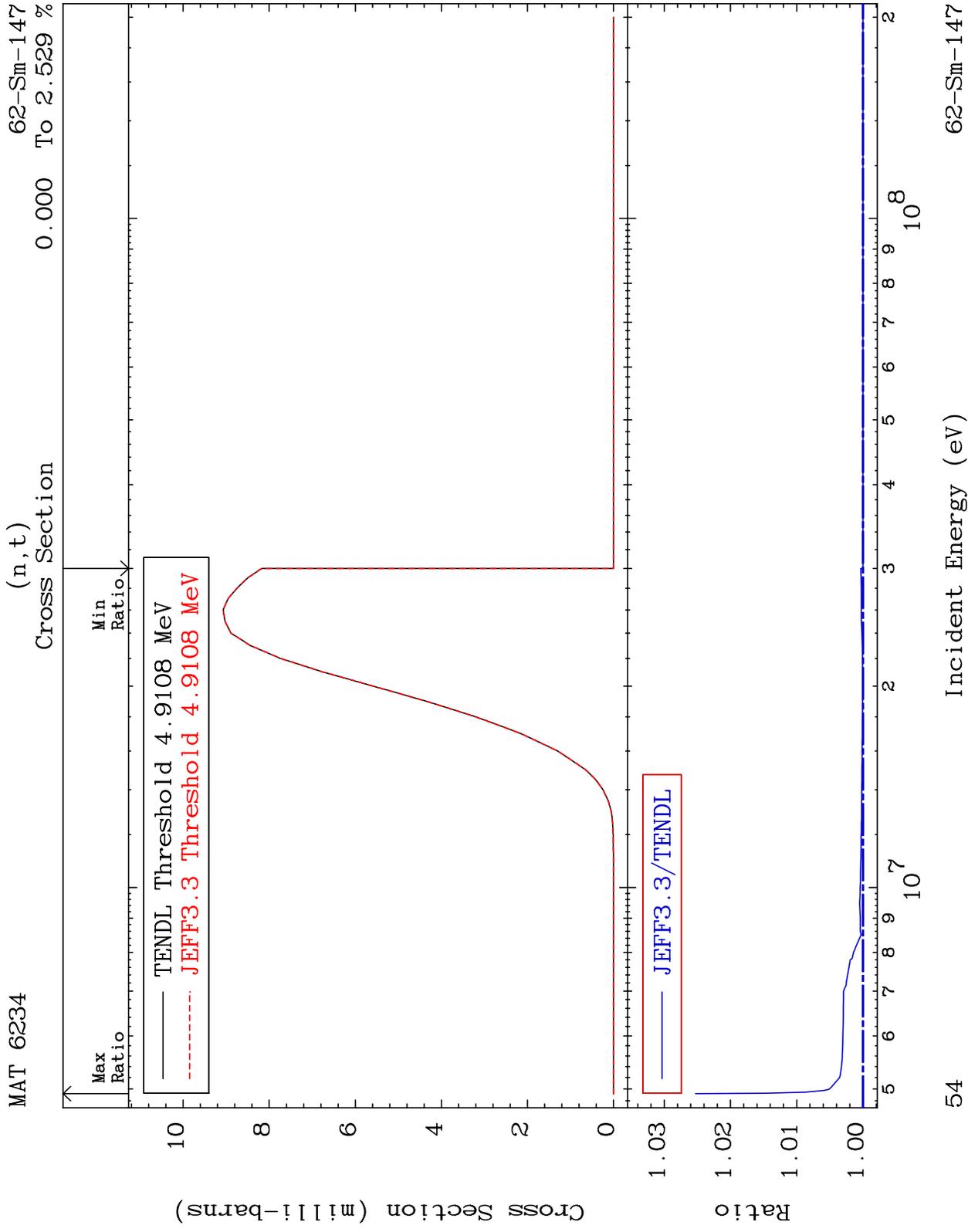
62-Sm-147

52

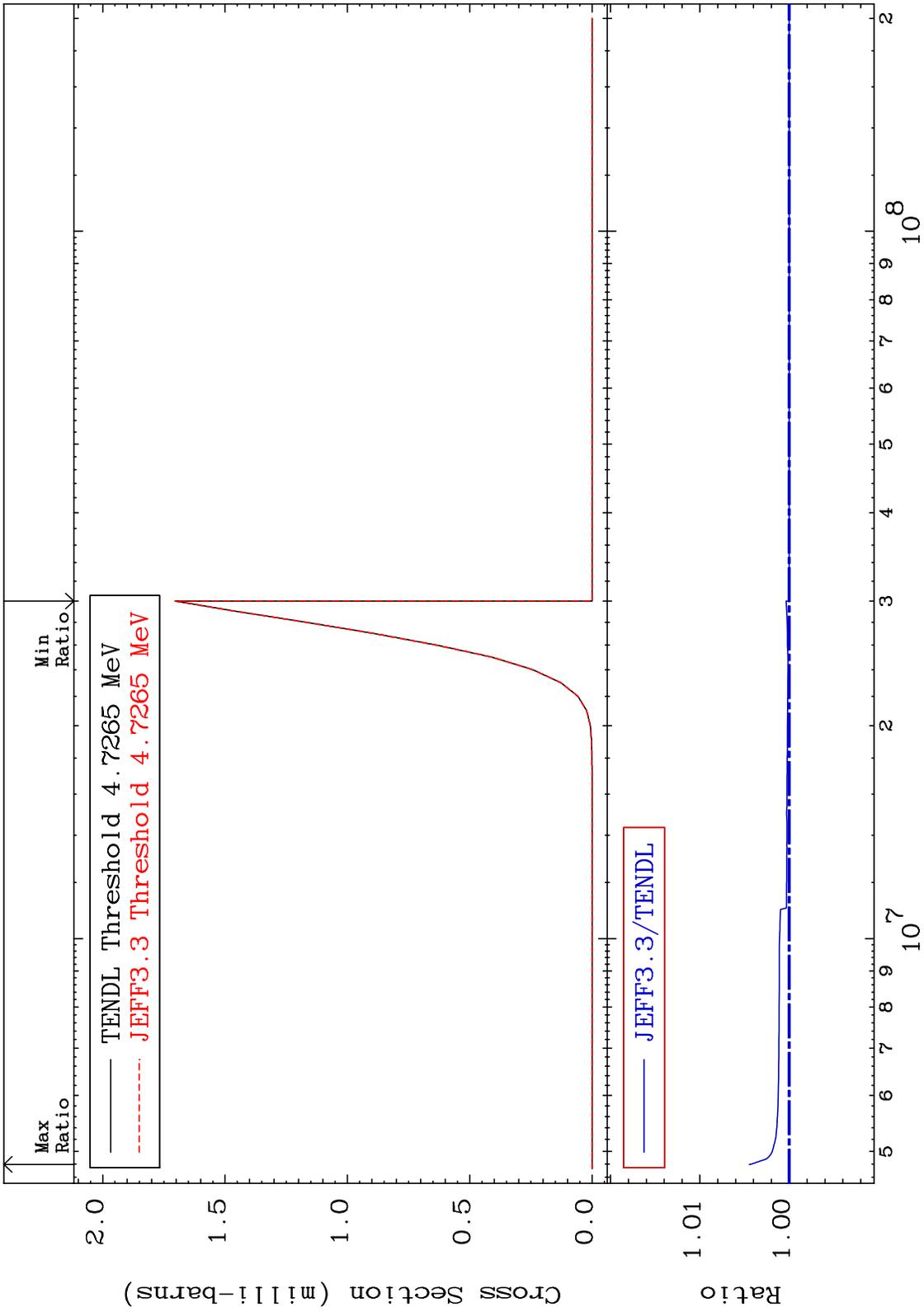


MAT 6234 (n,d) Cross Section 62-Sm-147 To 26.63 %



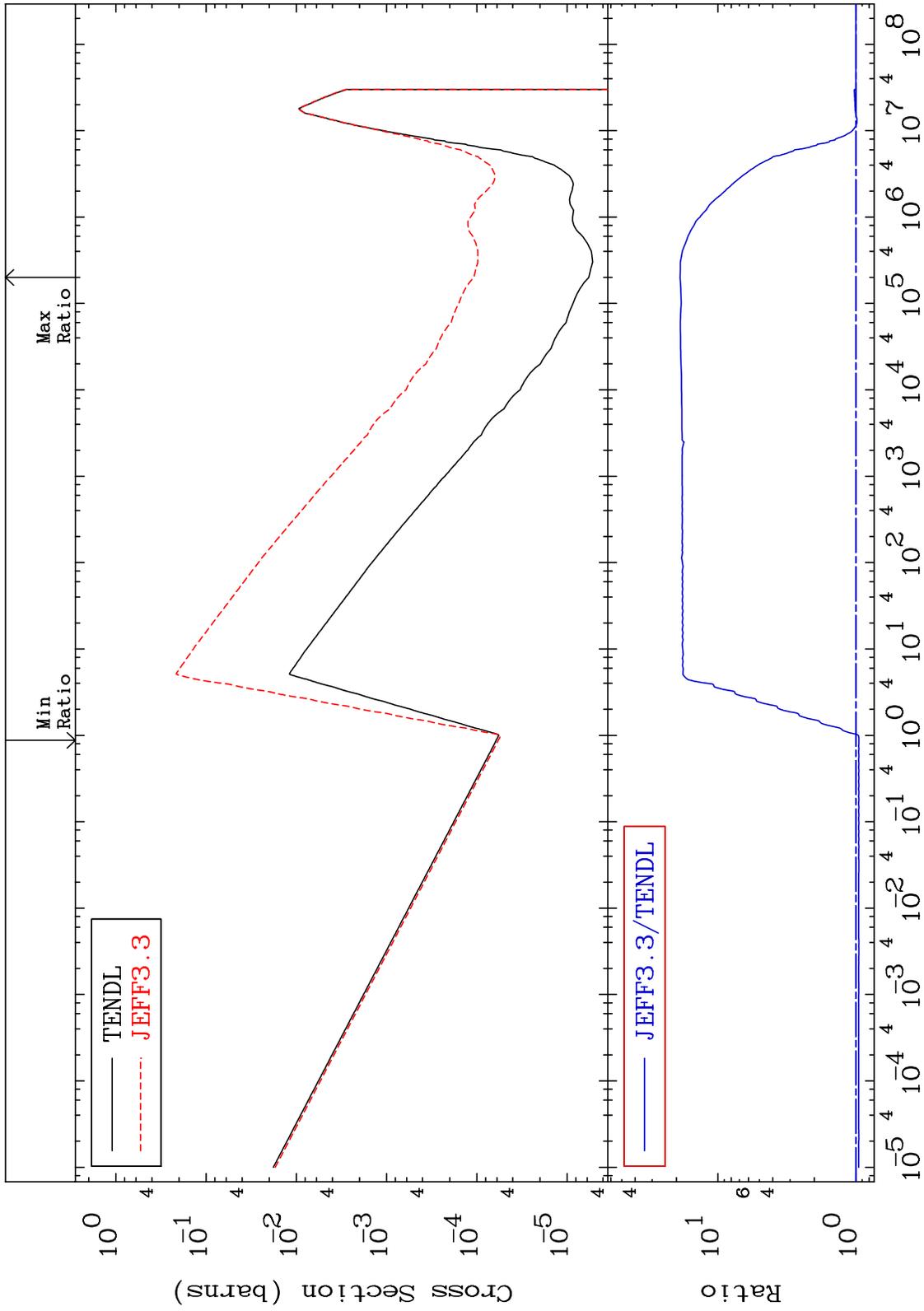


MAT 6234 (n, He-3) Cross Section 62-Sm-147 To 0.447 %



MAT 6234

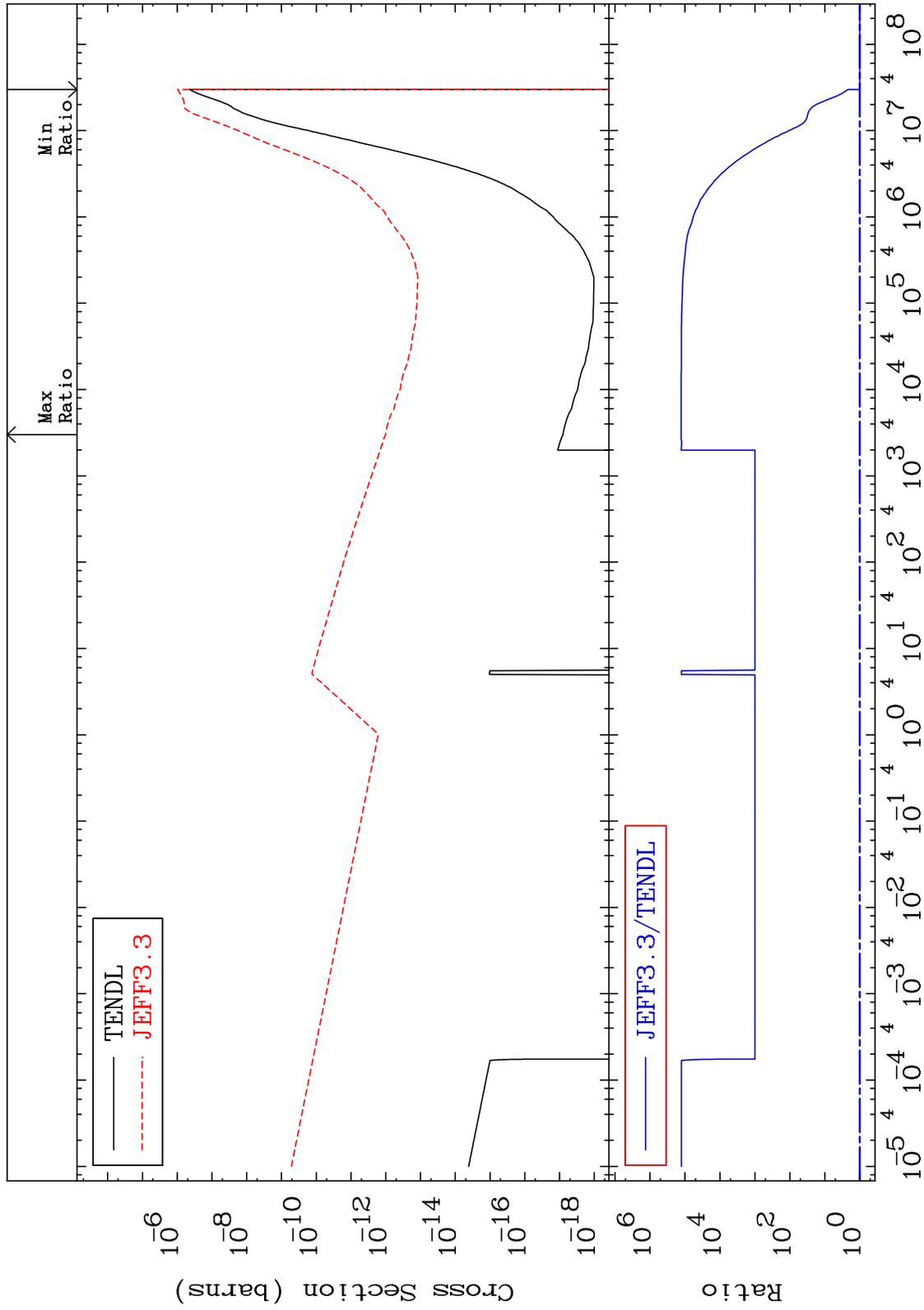
(n, α) Cross Section
62-Sm-147
-5.065 To 1781. %



MAT 6234

(n,2α)

62-Sm-147
To 9999. %



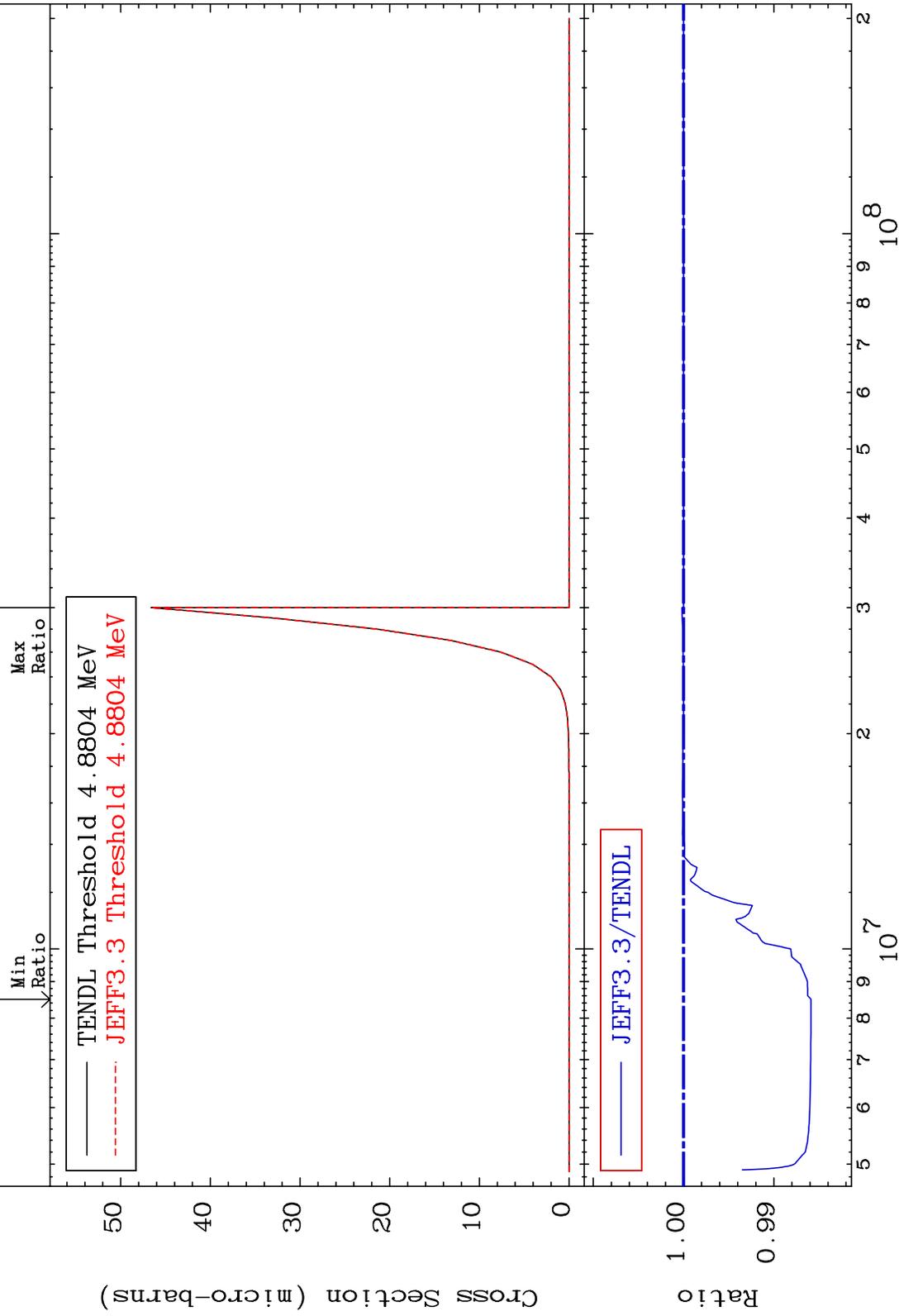
MAT 6234

(n,2p)

62-Sm-147

-1.412 To 0.017 %

Cross Section

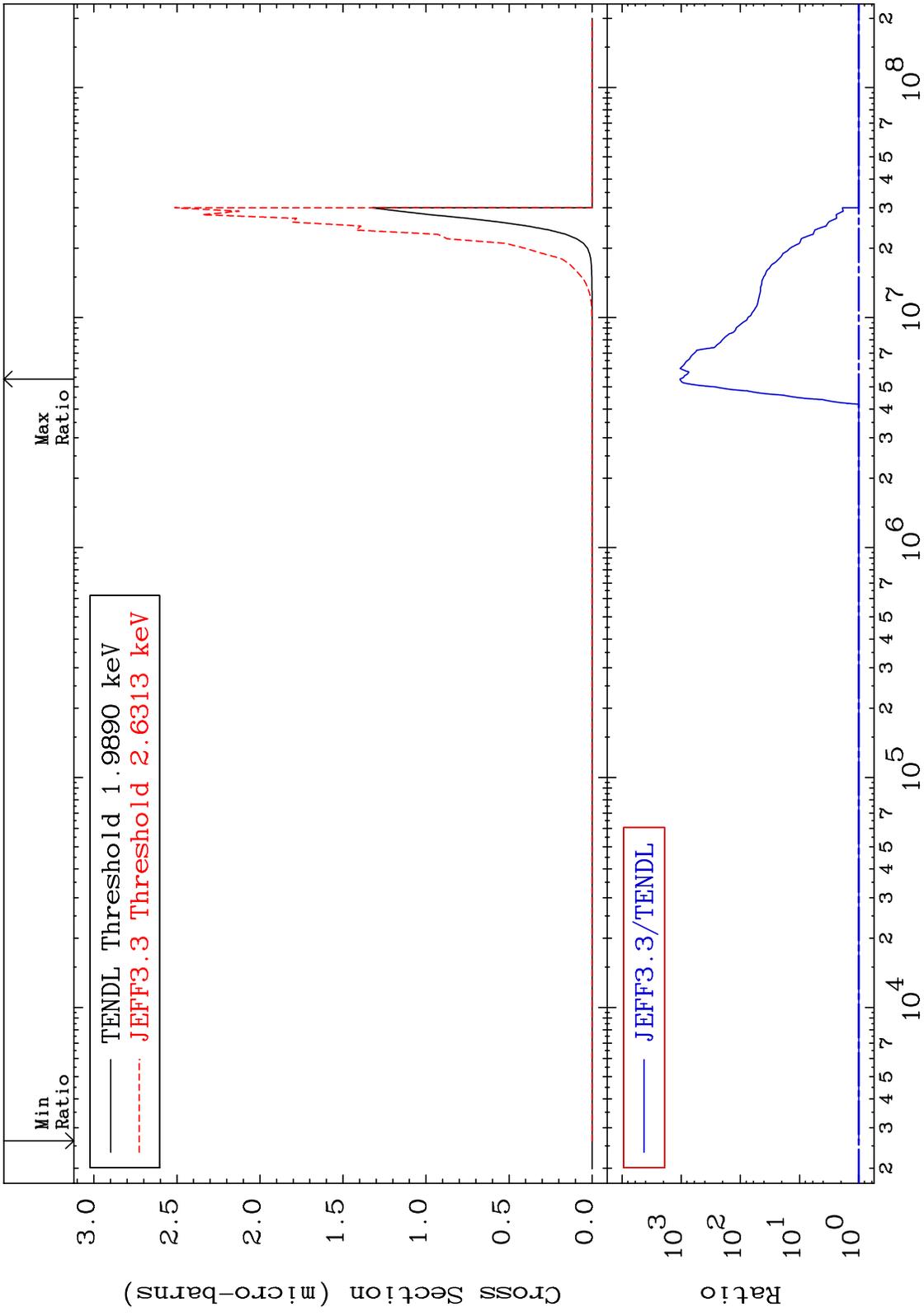


58

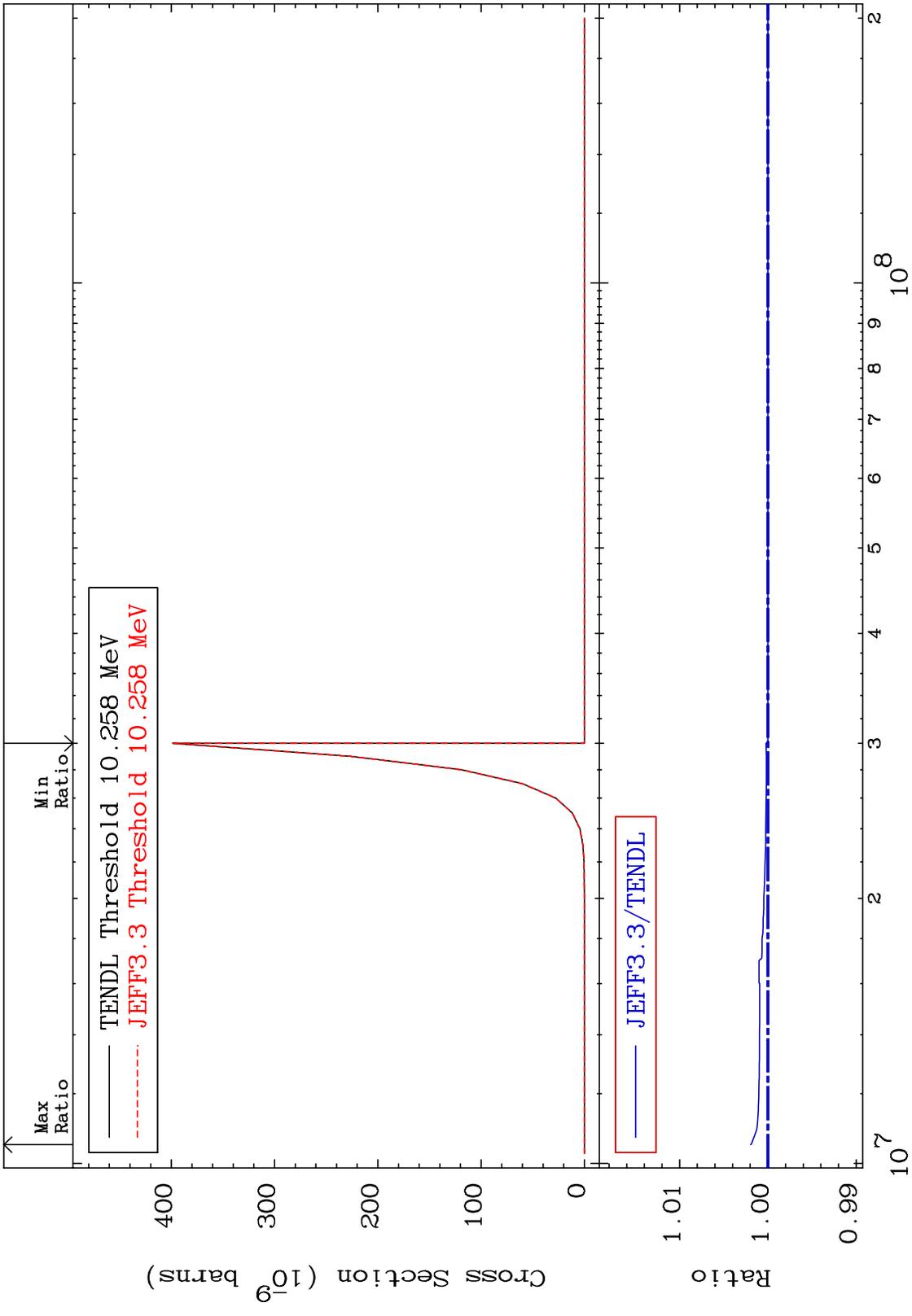
Incident Energy (eV)

62-Sm-147

MAT 6234 (n,p) α 62-Sm-147 To 9999. %
Cross Section



MAT 6234 (n,p) d Cross Section 62-Sm-147 To 0.196 %



60 Incident Energy (eV) 62-Sm-147

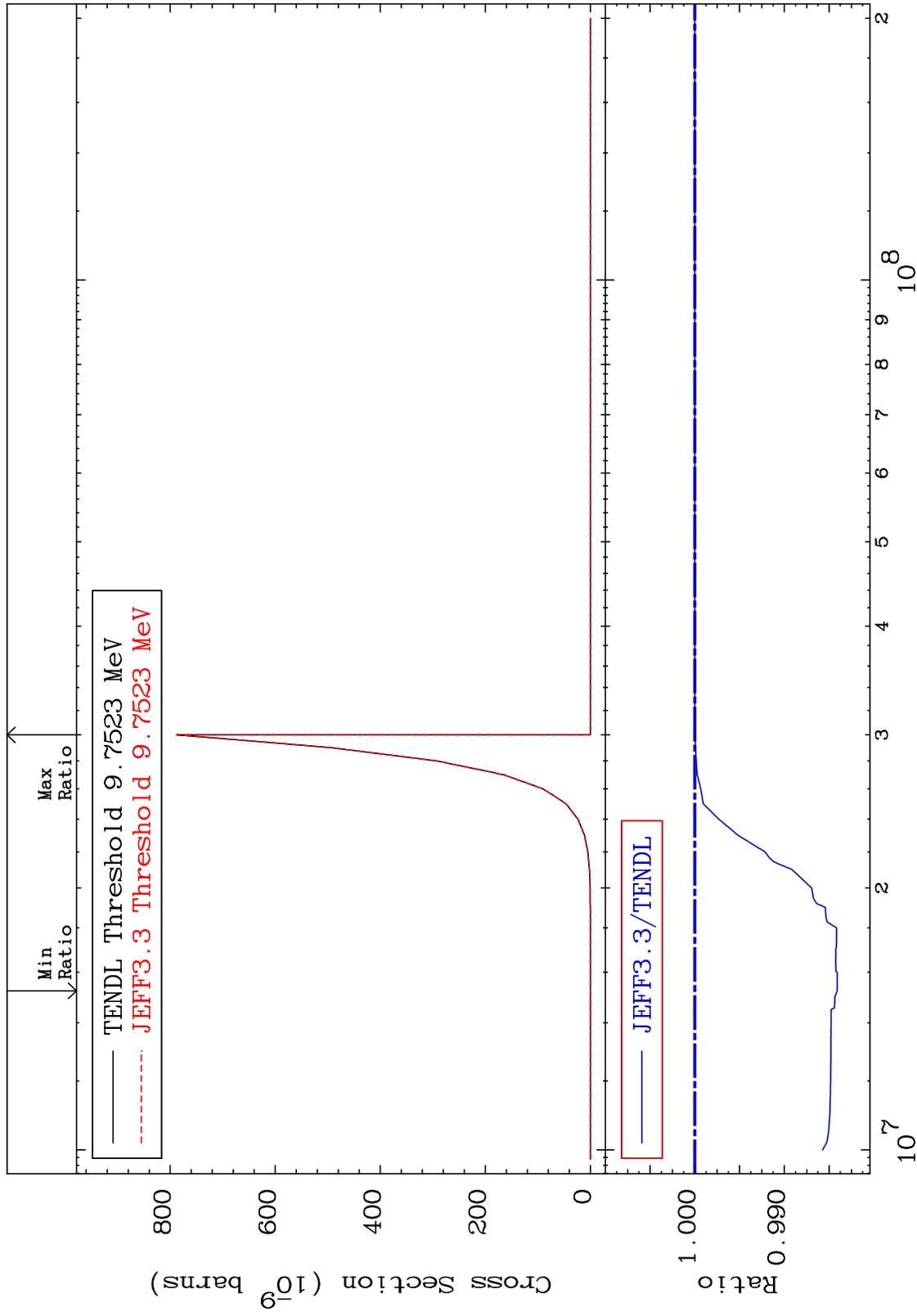
MAT 6234

(n,p) t

62-Sm-147

Cross Section

-1.591 To 0.000 %



61

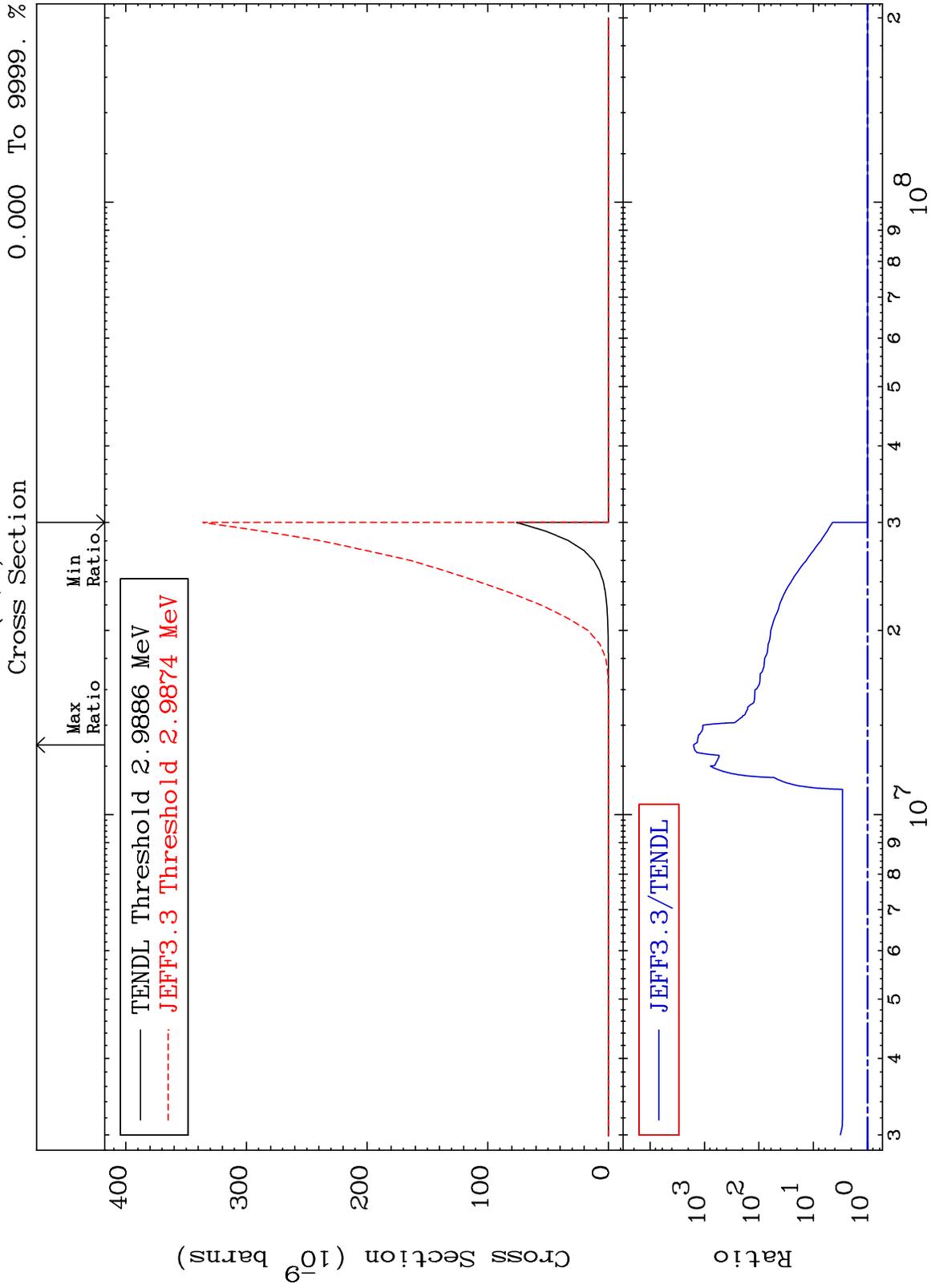
Incident Energy (eV)

62-Sm-147

MAT 6234

(n,d) α

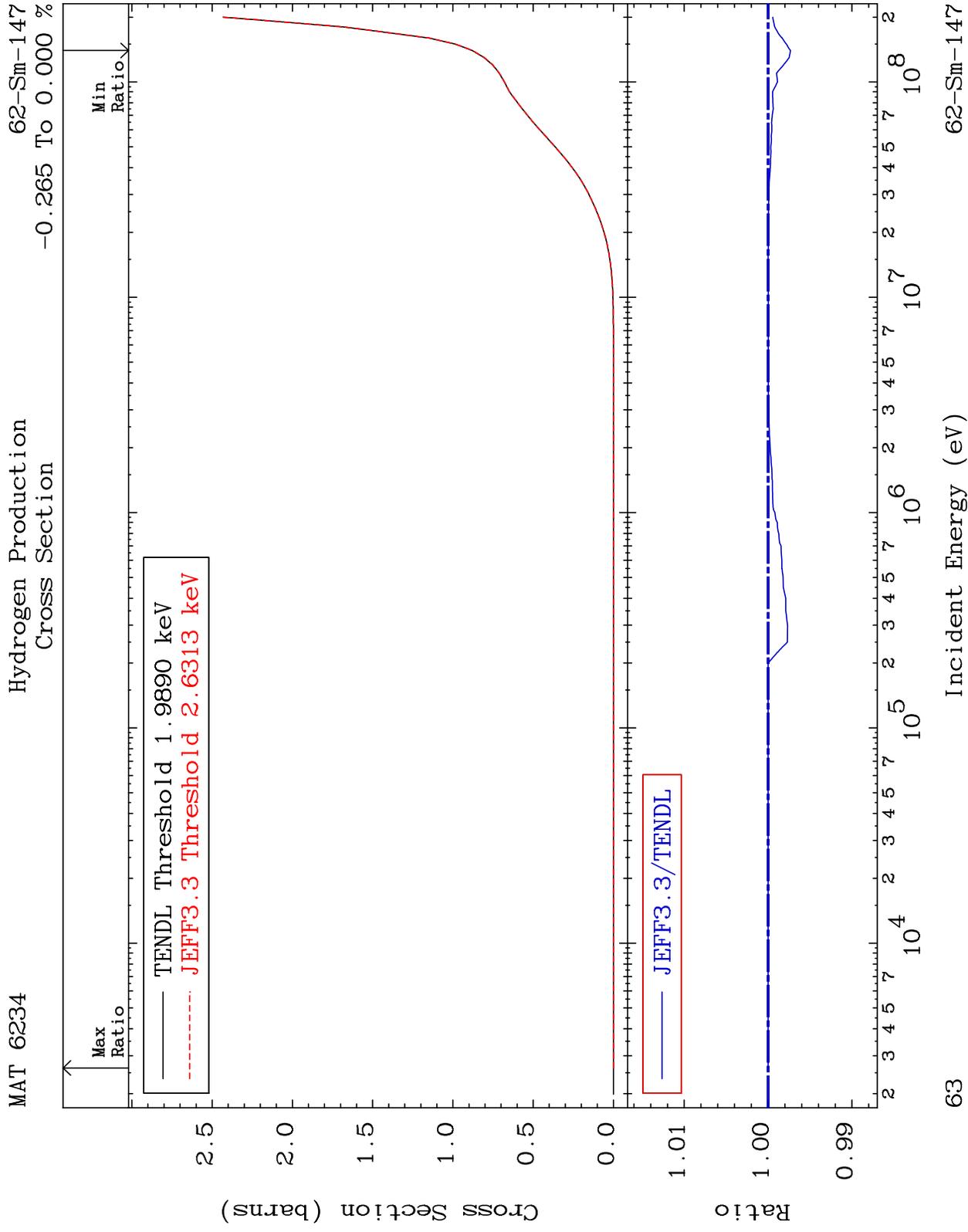
62-Sm-147
To 9999. %
0.000



62

Incident Energy (eV)

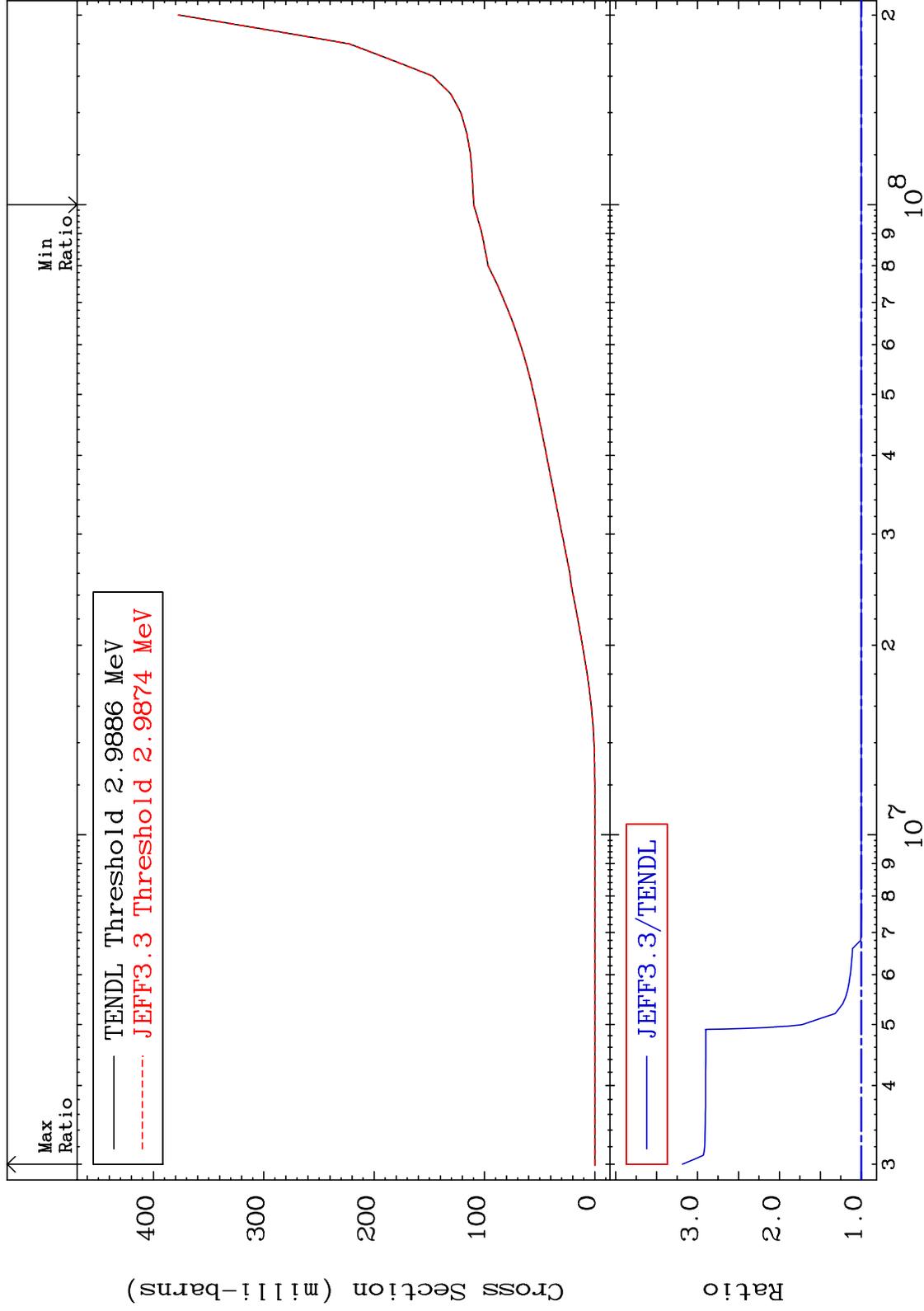
62-Sm-147



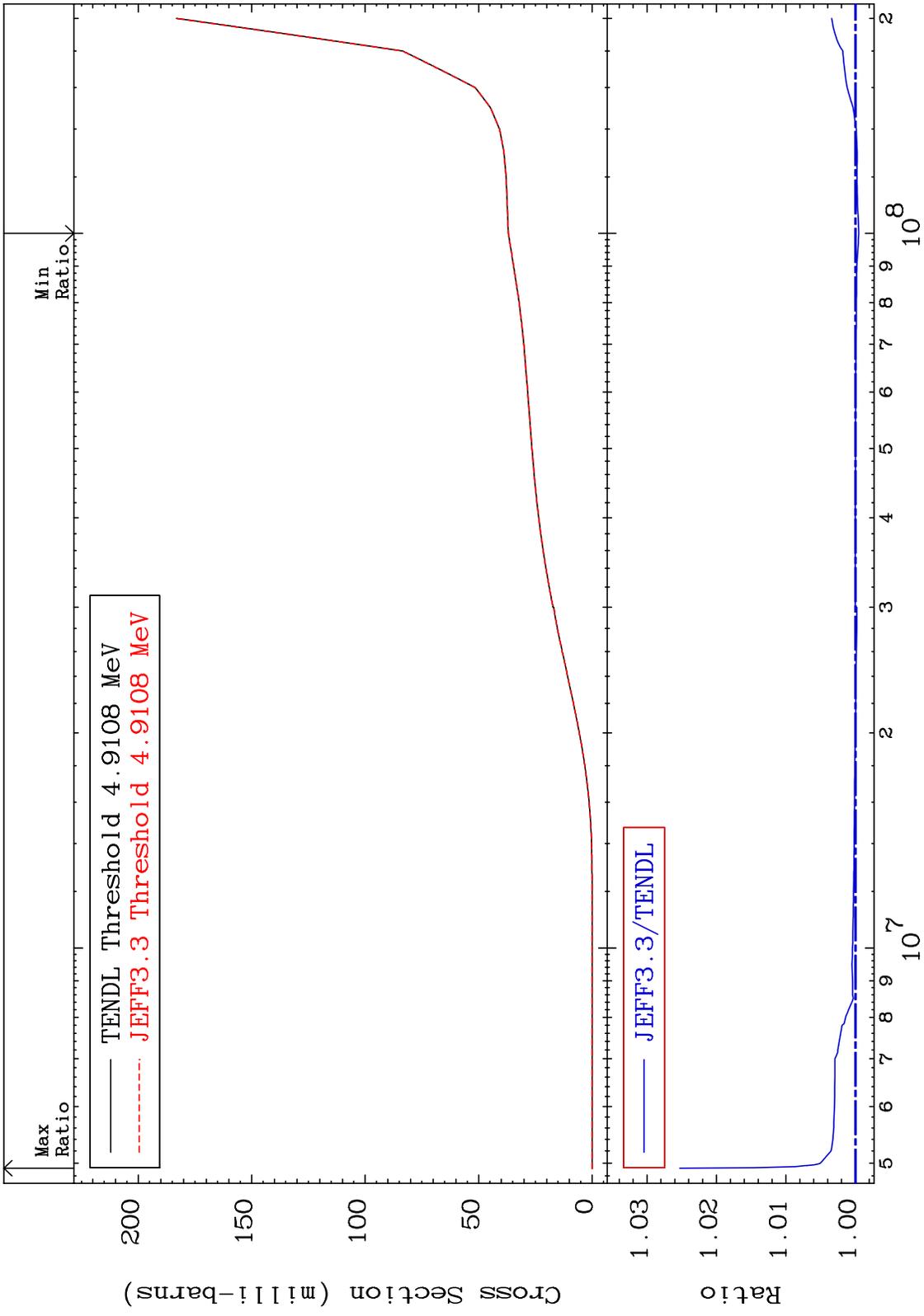
MAT 6234

Deuterium Production Cross Section

62-Sm-147
-0.058 To 218.5 %



MAT 6234 Tritium Production Cross Section 62-Sm-147 -0.049 To 2.529 %

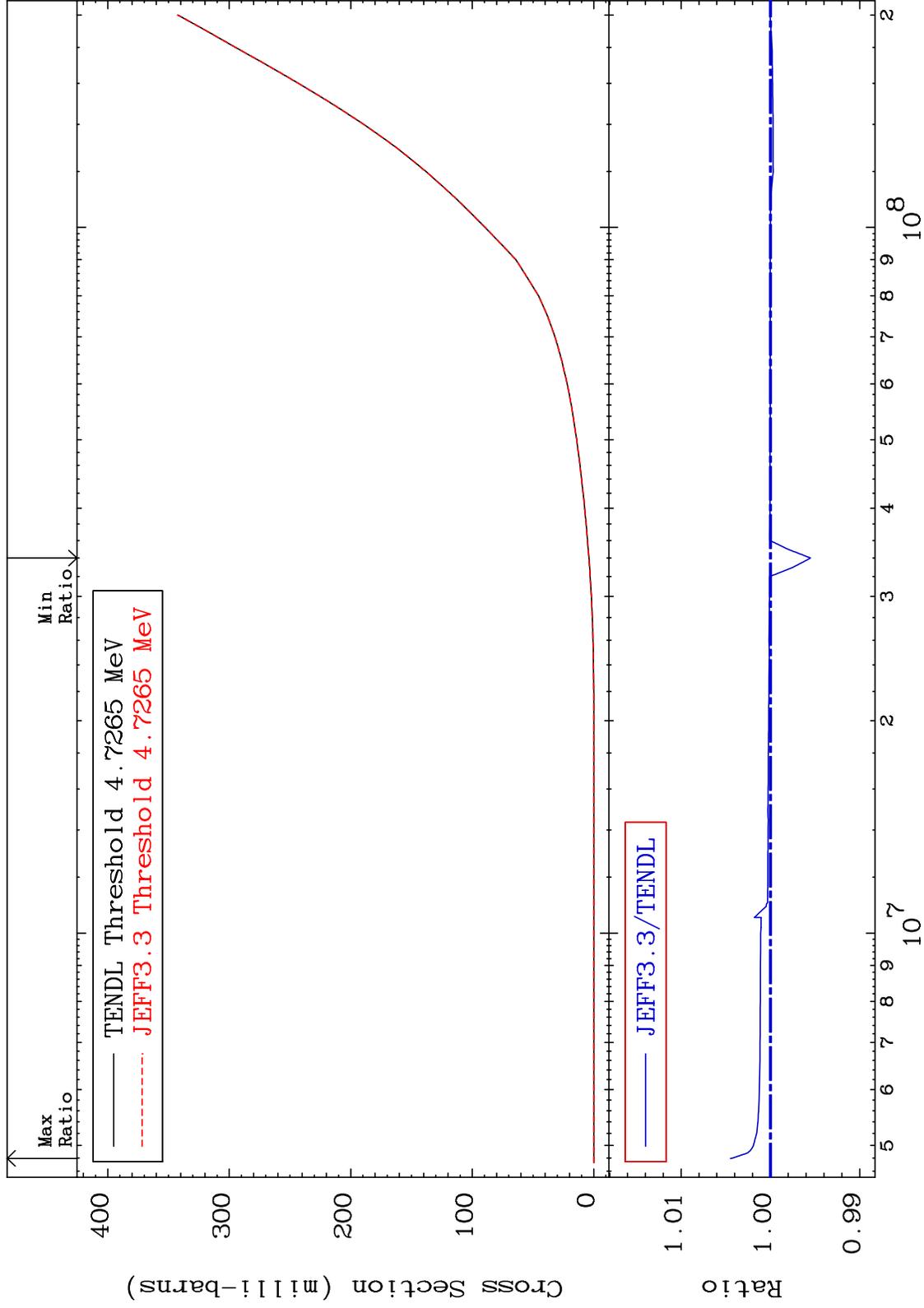


65 62-Sm-147 Incident Energy (eV)

MAT 6234

He-3 Production
Cross Section

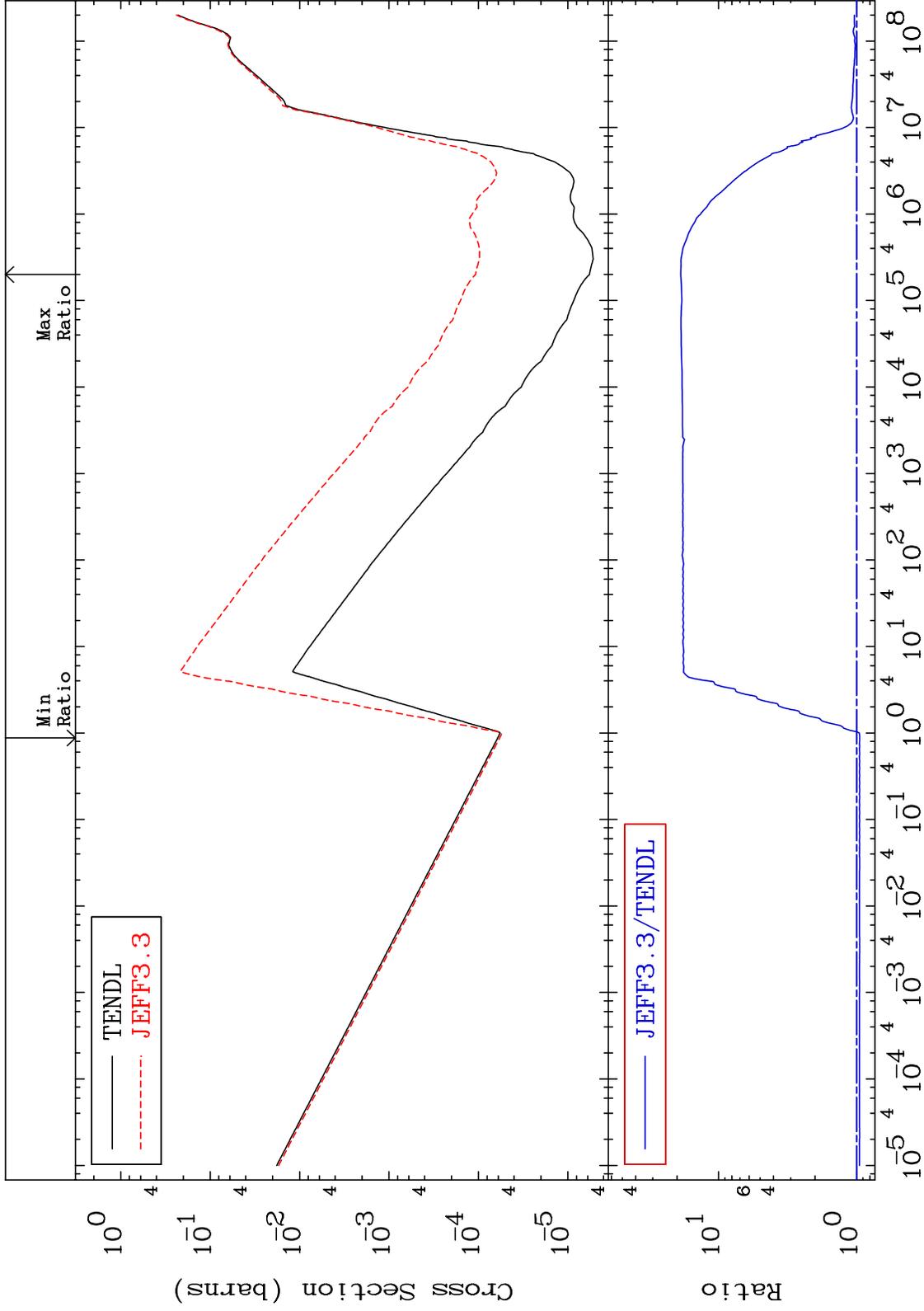
62-Sm-147
-0.449 To 0.447 %



MAT 6234

He-4 Production
Cross Section

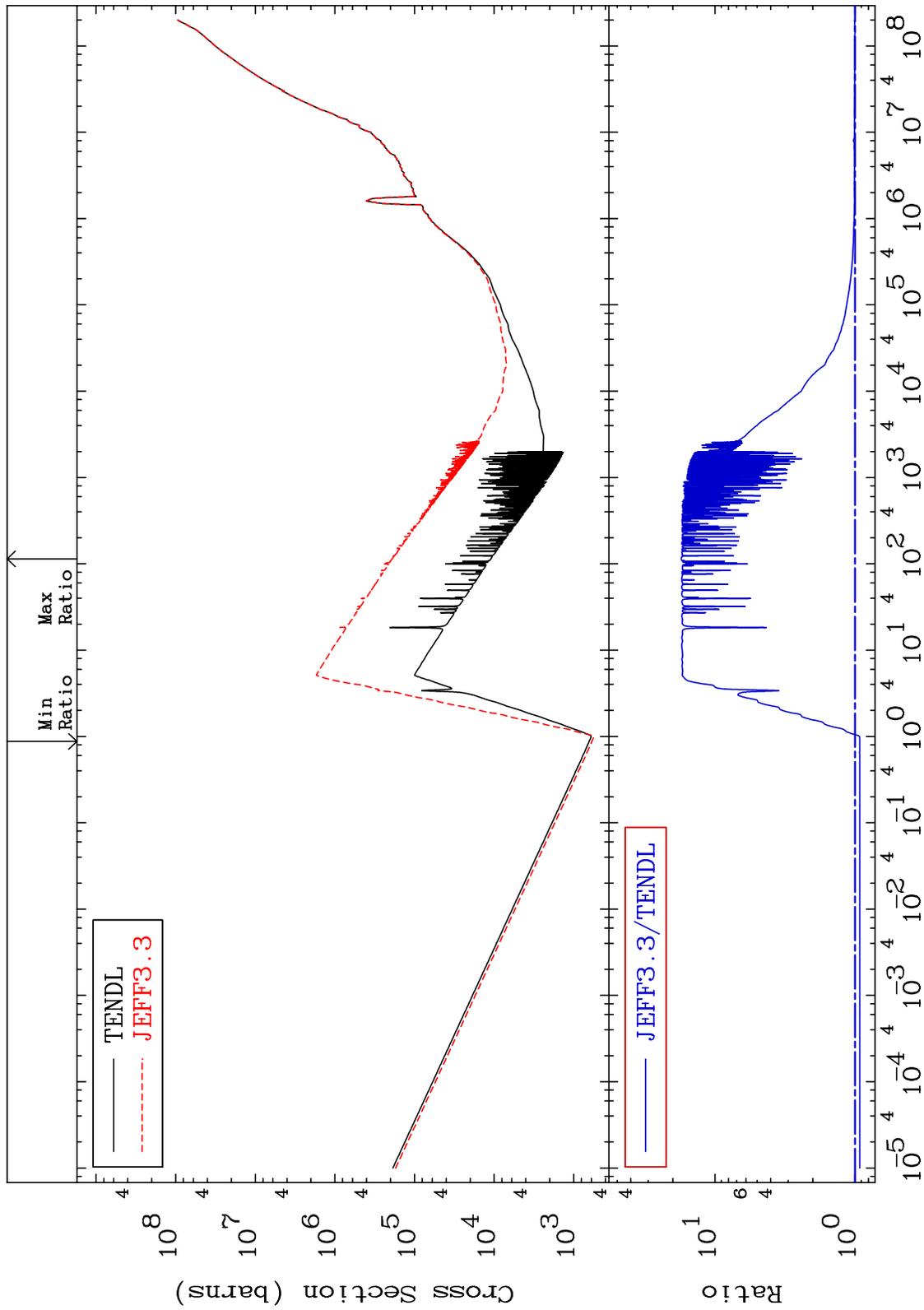
62-Sm-147
-5.065 To 1781. %



MAT 6234

Kerma total (eV-barns)
Cross Section

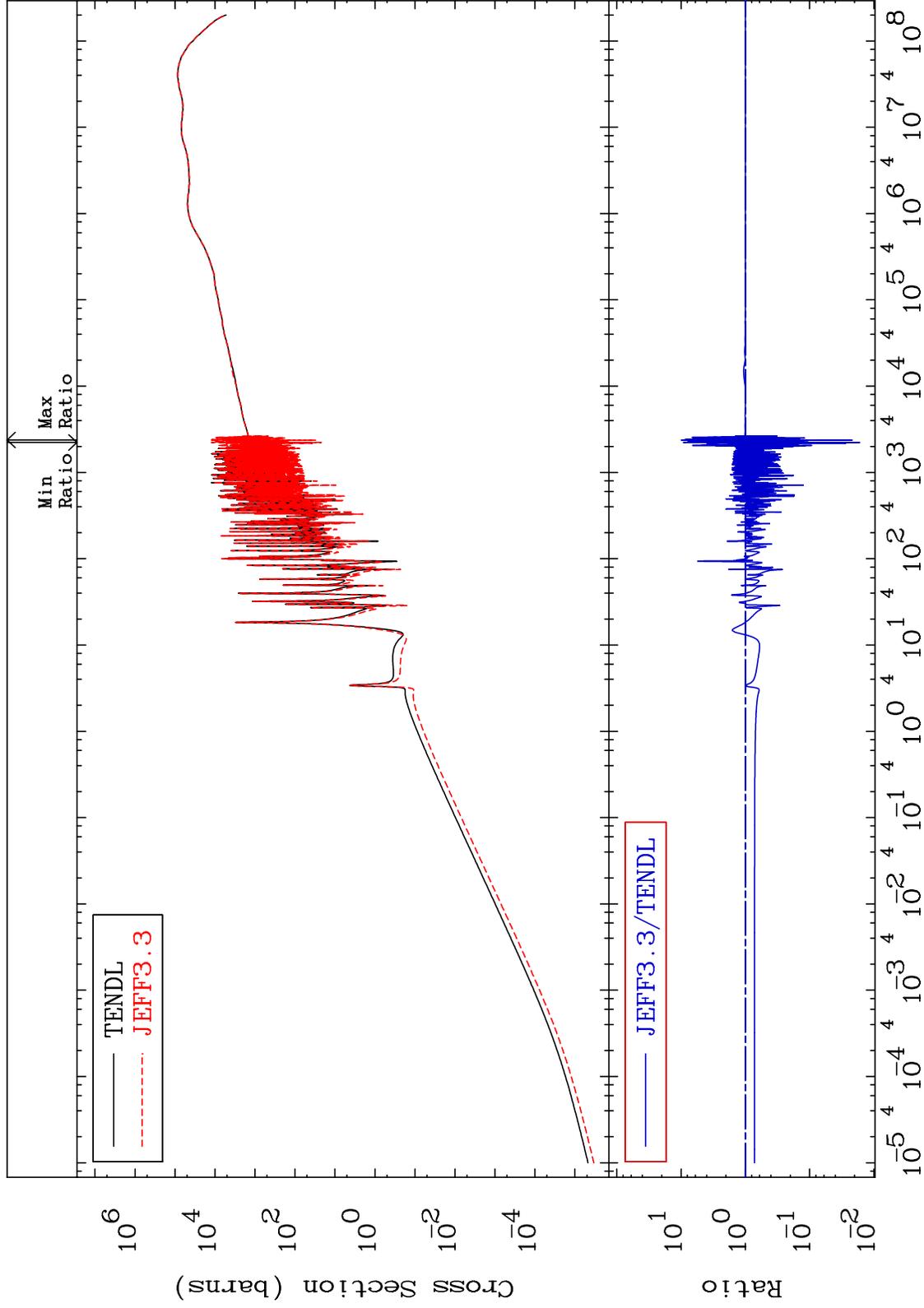
62-Sm-147
-7.746 To 1643. %



MAT 6234

Kerma elastic
Cross Section

62-Sm-147
-98.34 To 894.7 %

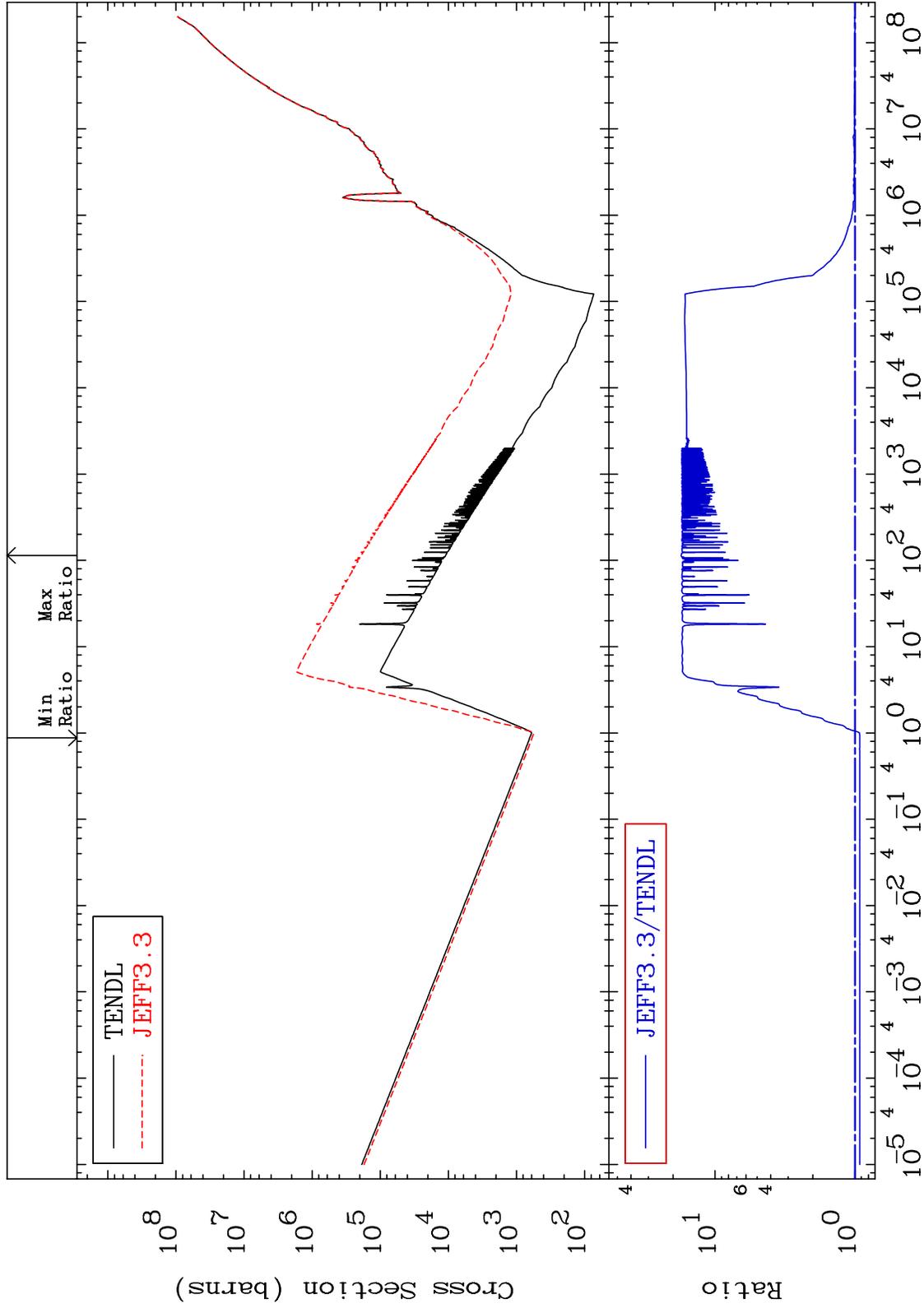


MAT 6234

Kerma non-elastic (all but mt2)

62-Sm-147
-7.743 To 1646. %

Cross Section

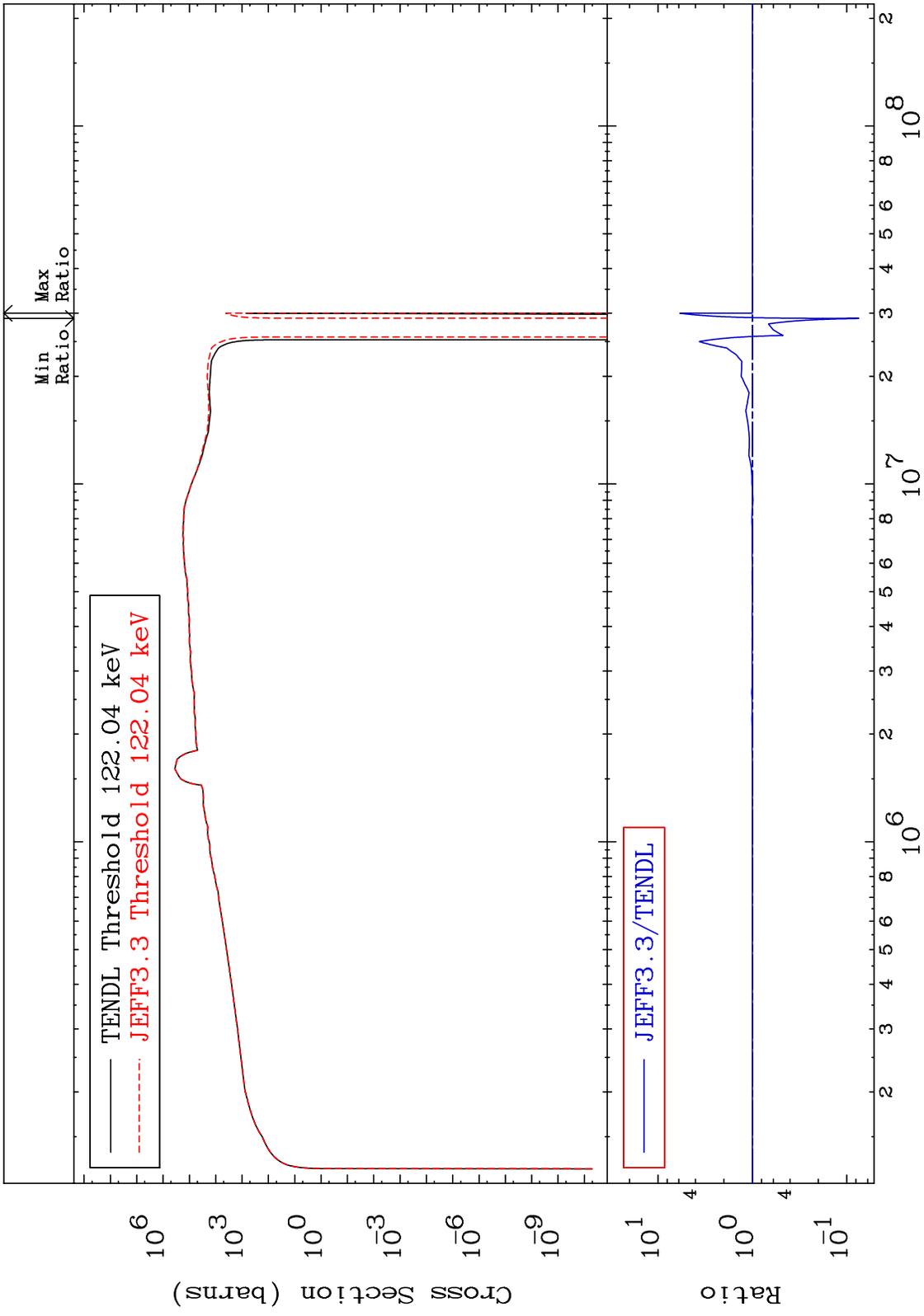


70

Incident Energy (eV)

62-Sm-147

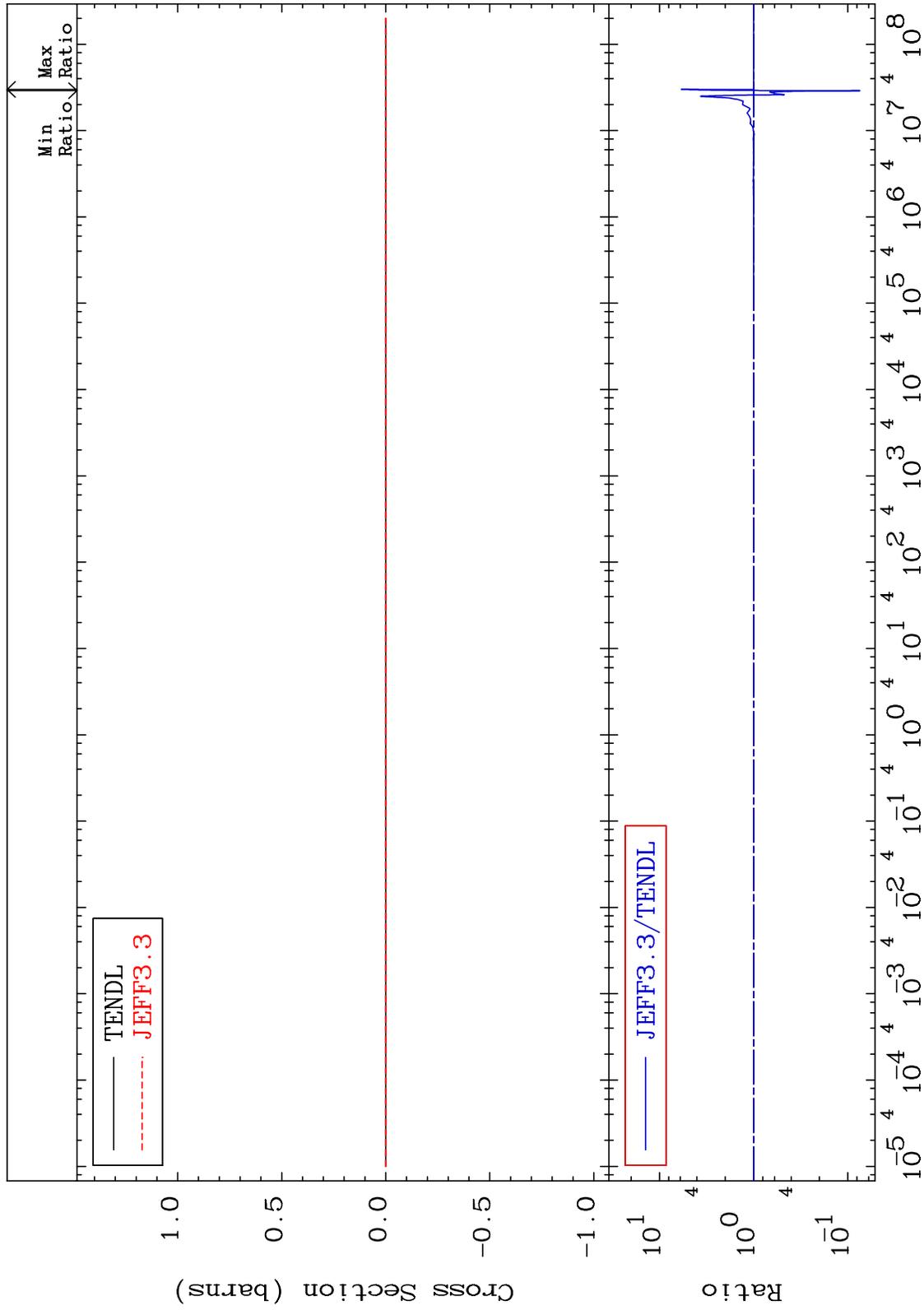
MAT 6234 Kerma inelastic (mt51-91) 62-Sm-147
 Cross Section -92.54 To 487.8 %



MAT 6234

Kerma fission (mt18 or mt19-20-21-38)
Cross Section

62-Sm-147
-92.54 To 487.8 %



72

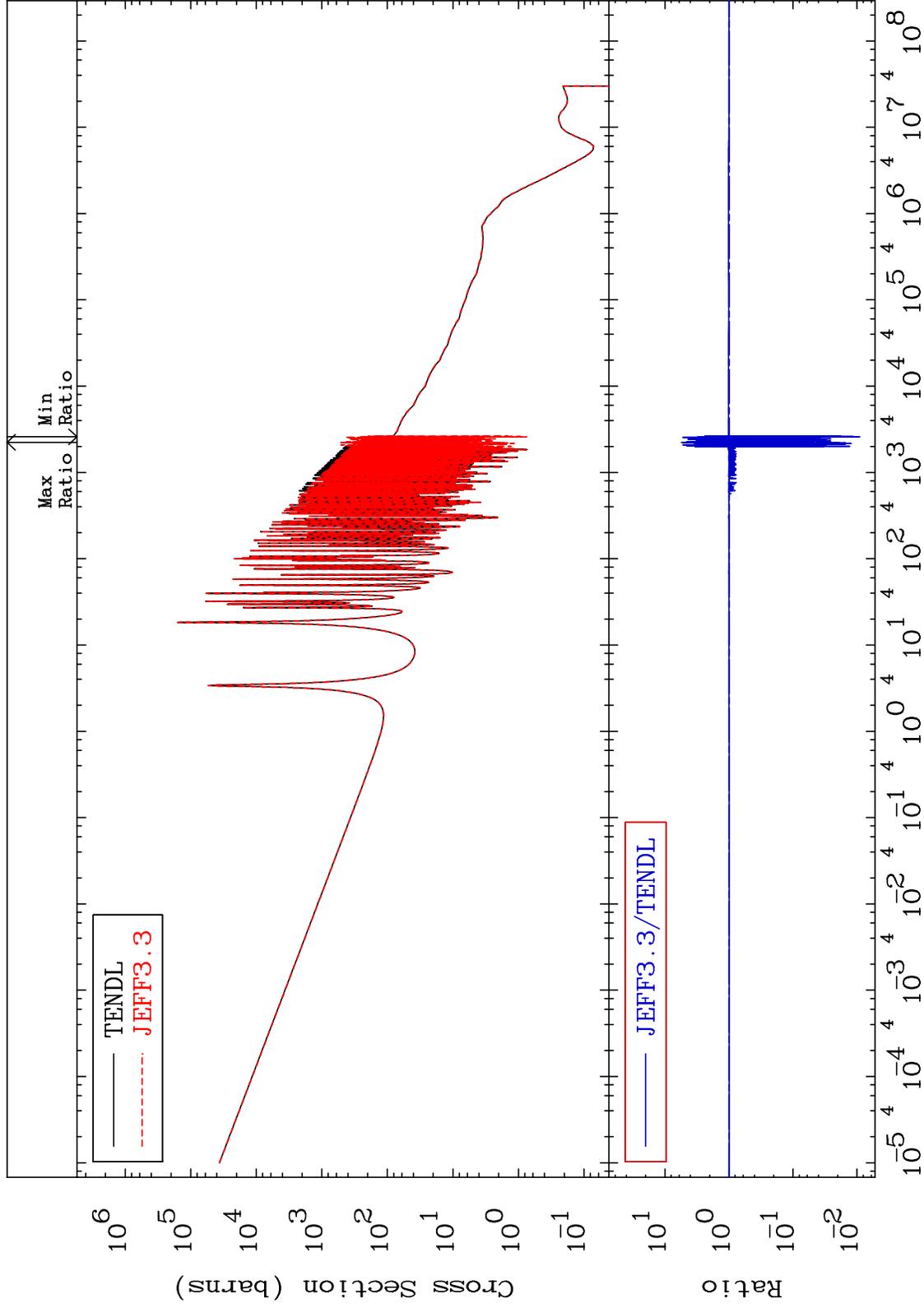
Incident Energy (eV)

62-Sm-147

MAT 6234

Kerma capture (mt102)
Cross Section

62-Sm-147
-99.10 To 456.9 %



73

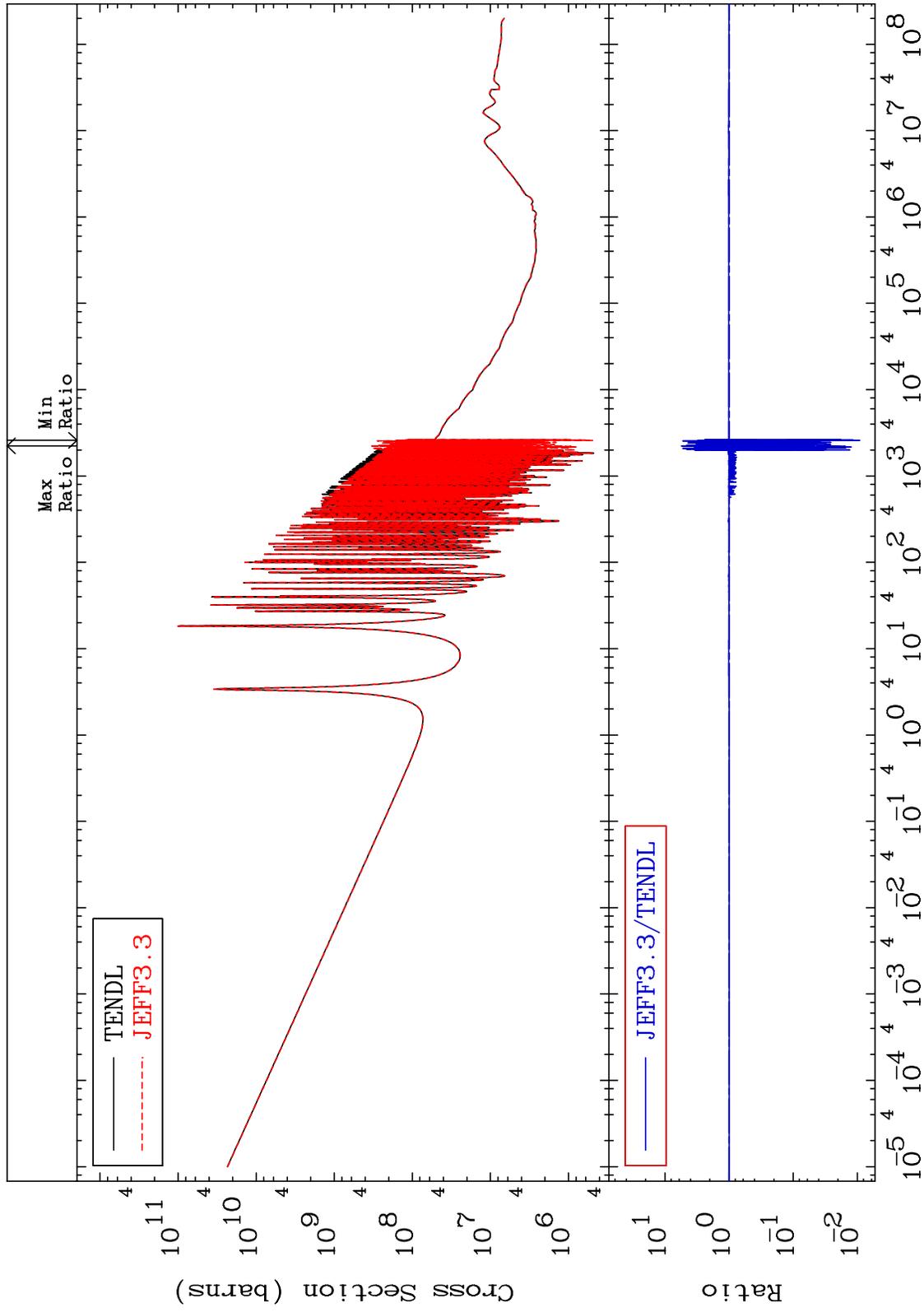
Incident Energy (eV)

62-Sm-147

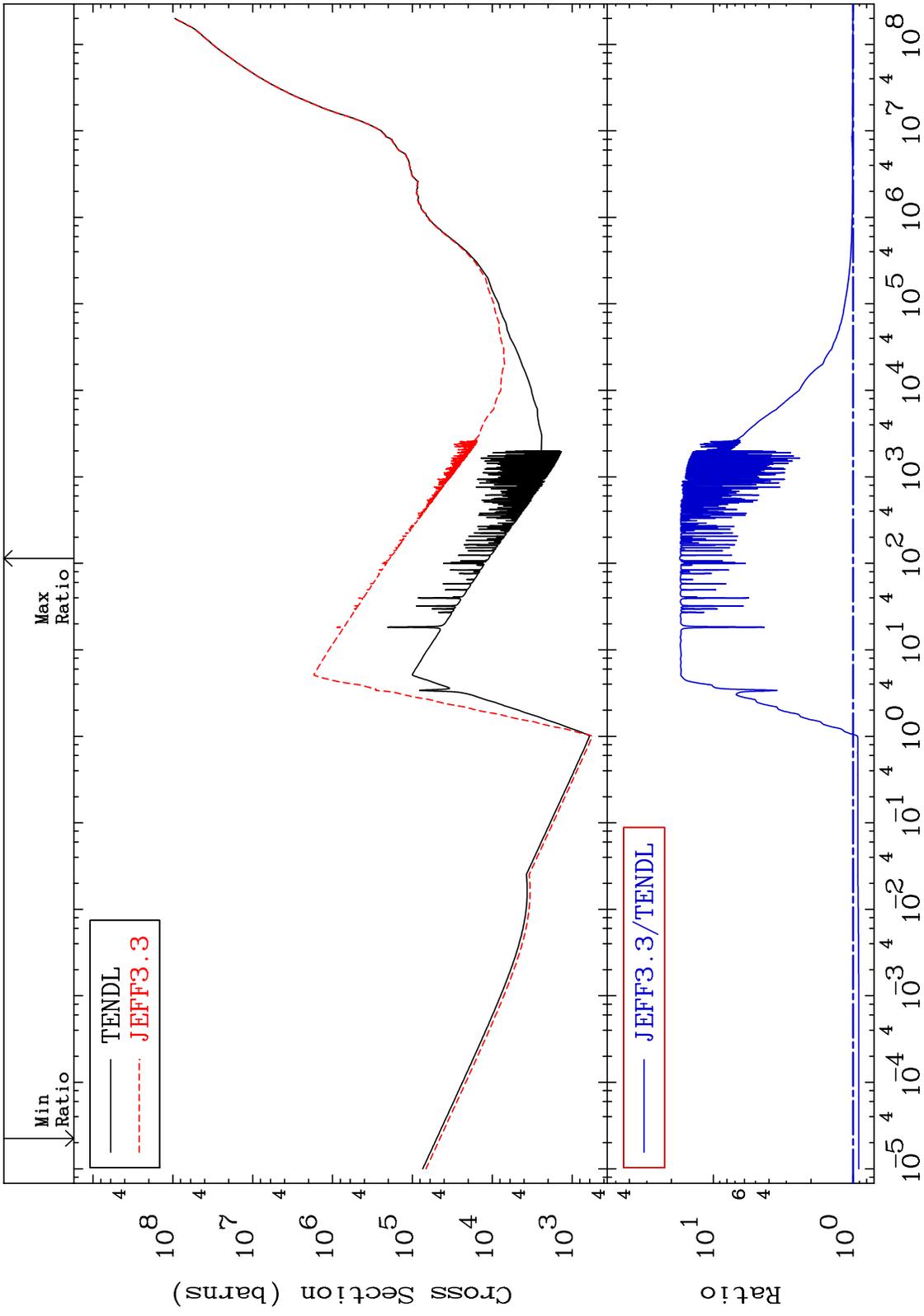
MAT 6234

Total photon (eV-barns)
Cross Section

62-Sm-147
-99.09 To 456.9 %



MAT 6234 Total kinematic kerma (high limit) 62-Sm-147
Cross Section -9.110 To 1642. %

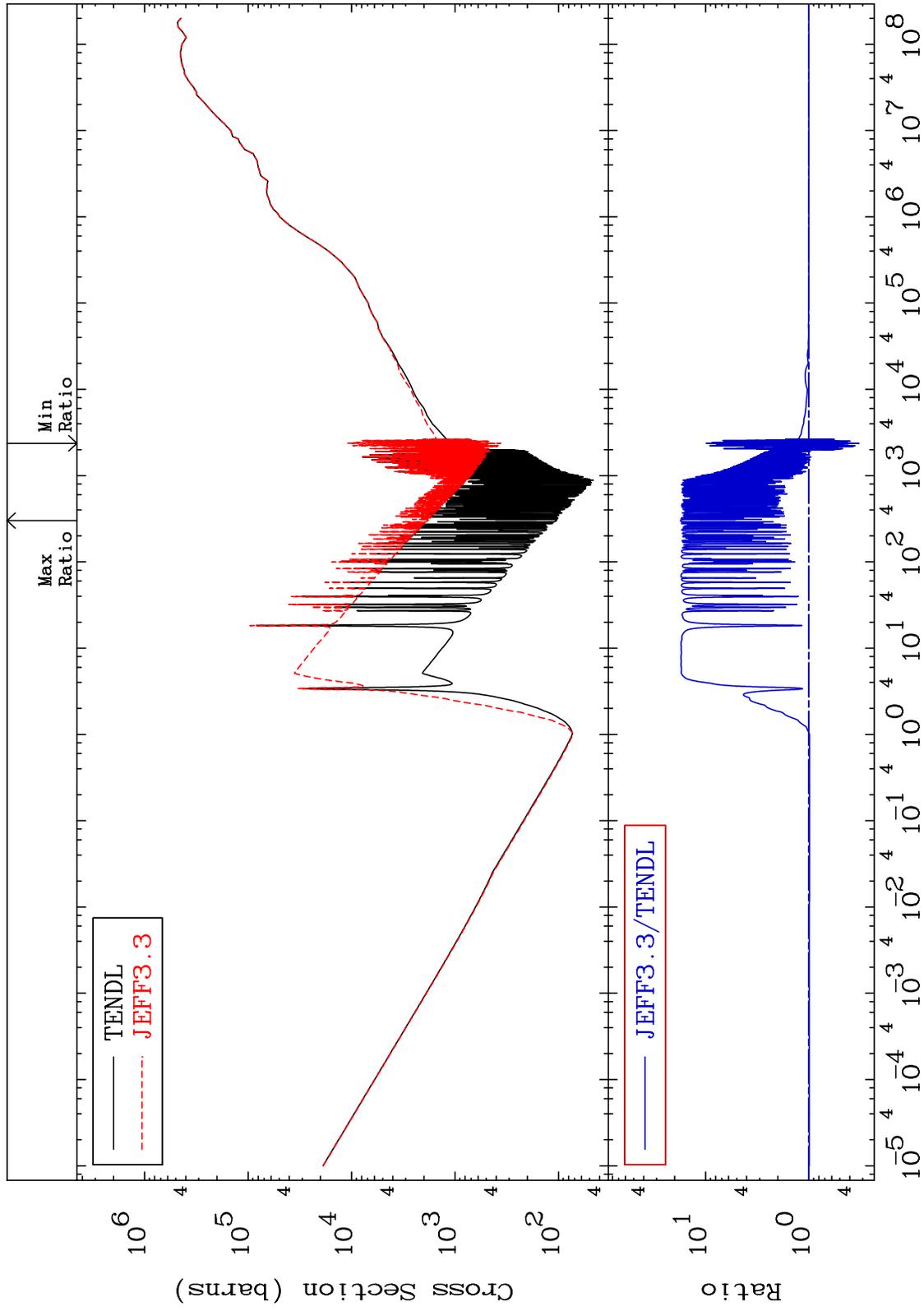


75 Incident Energy (eV) 62-Sm-147

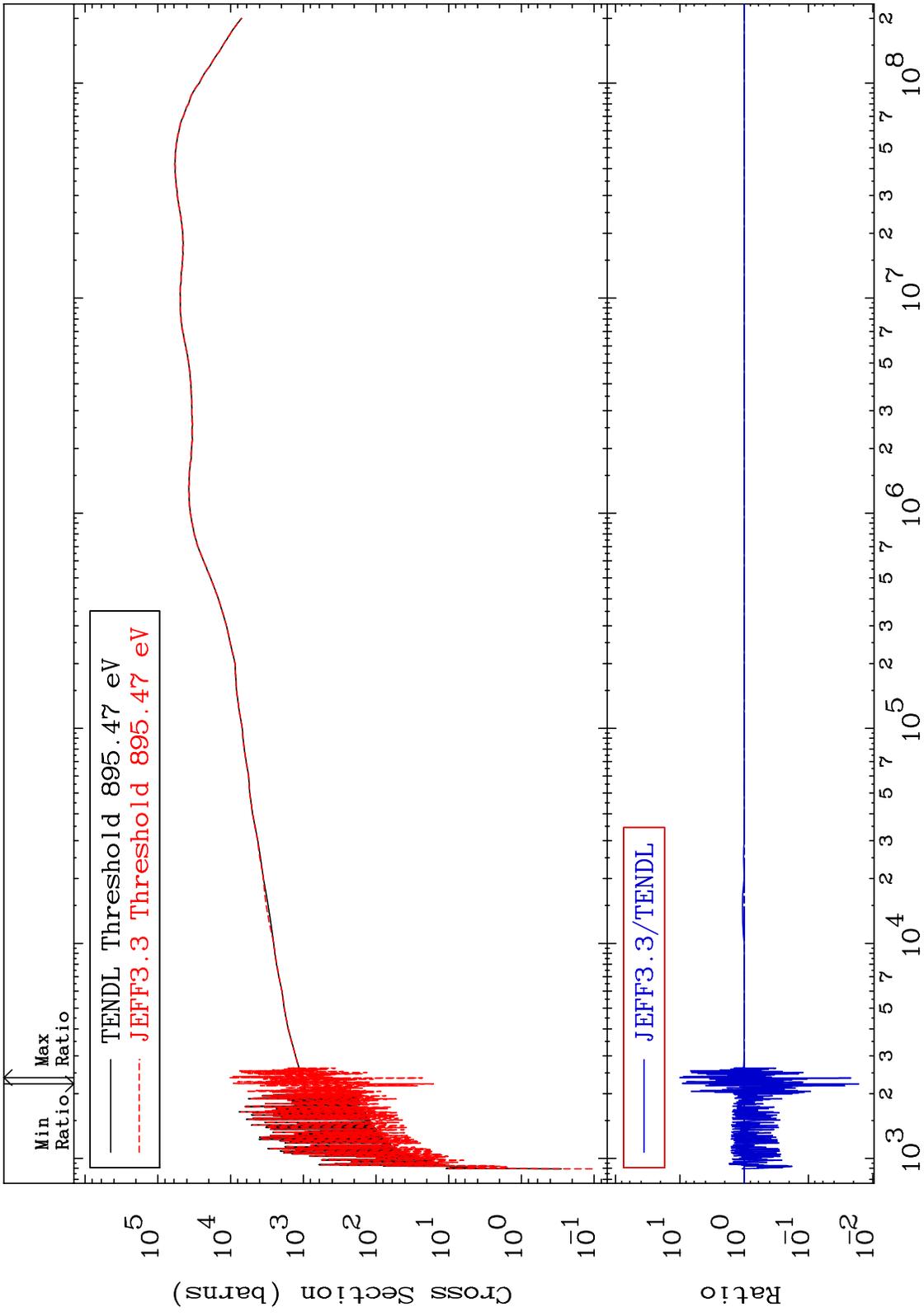
MAT 6234

Dpa total (eV-barns)
Cross Section

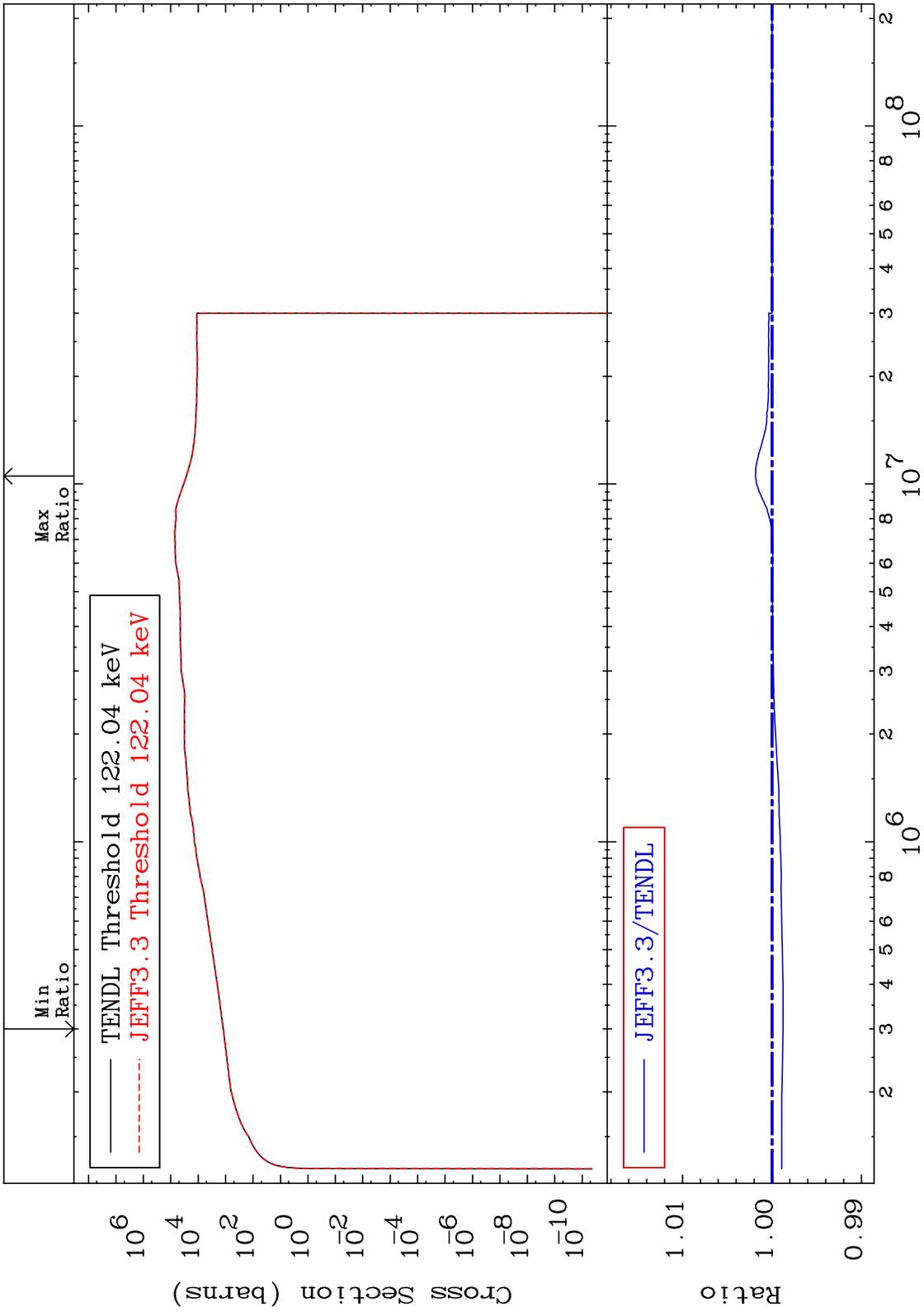
62-Sm-147
-67.39 To 1650. %



MAT 6234 Dpa elastic (mt2) 62-Sm-147
 Cross Section -98.35 To 902.6 %



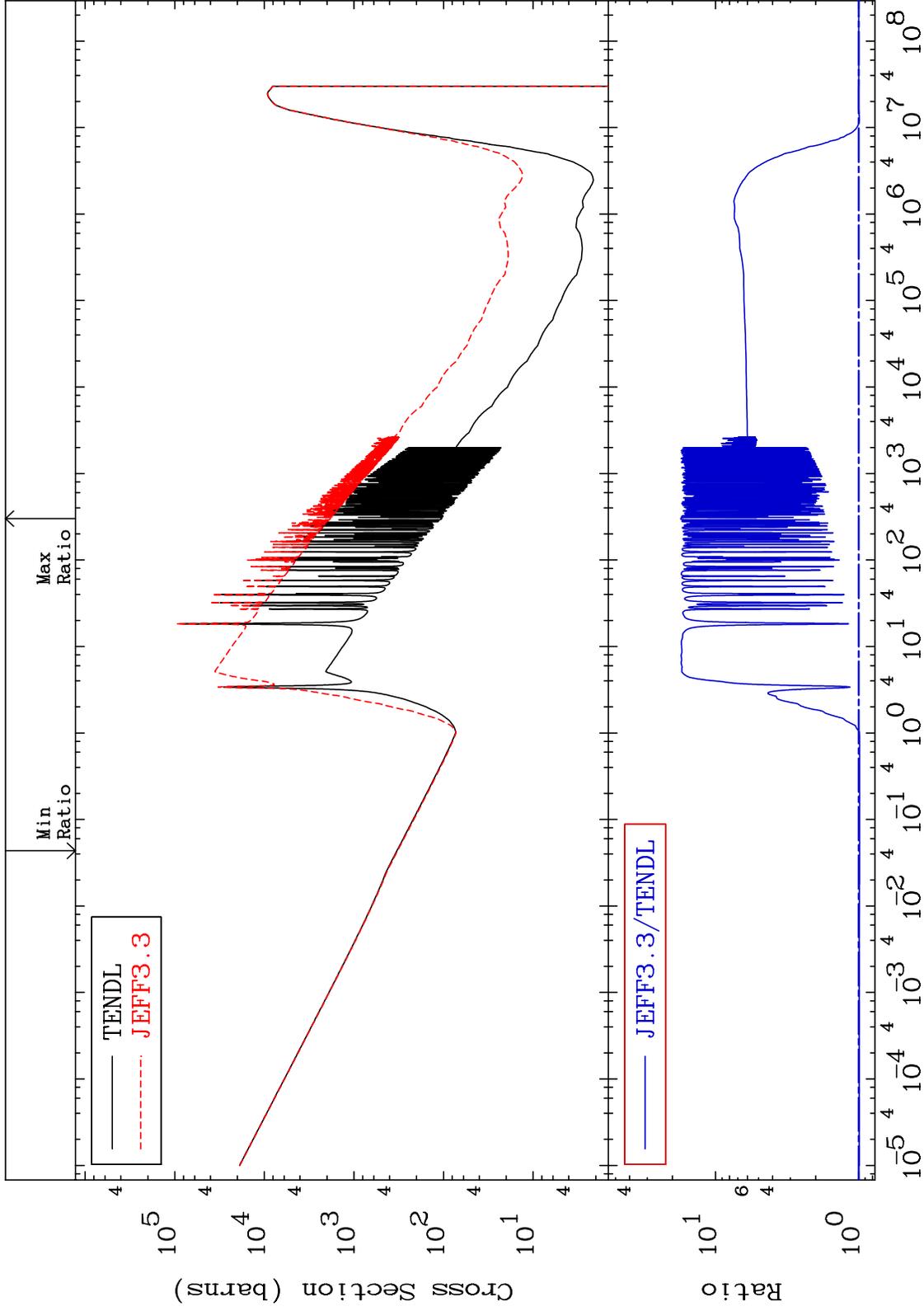
MAT 6234 Dpa inelastic (mt51-91) 62-Sm-147
 Cross Section -0.124 To 0.185 %



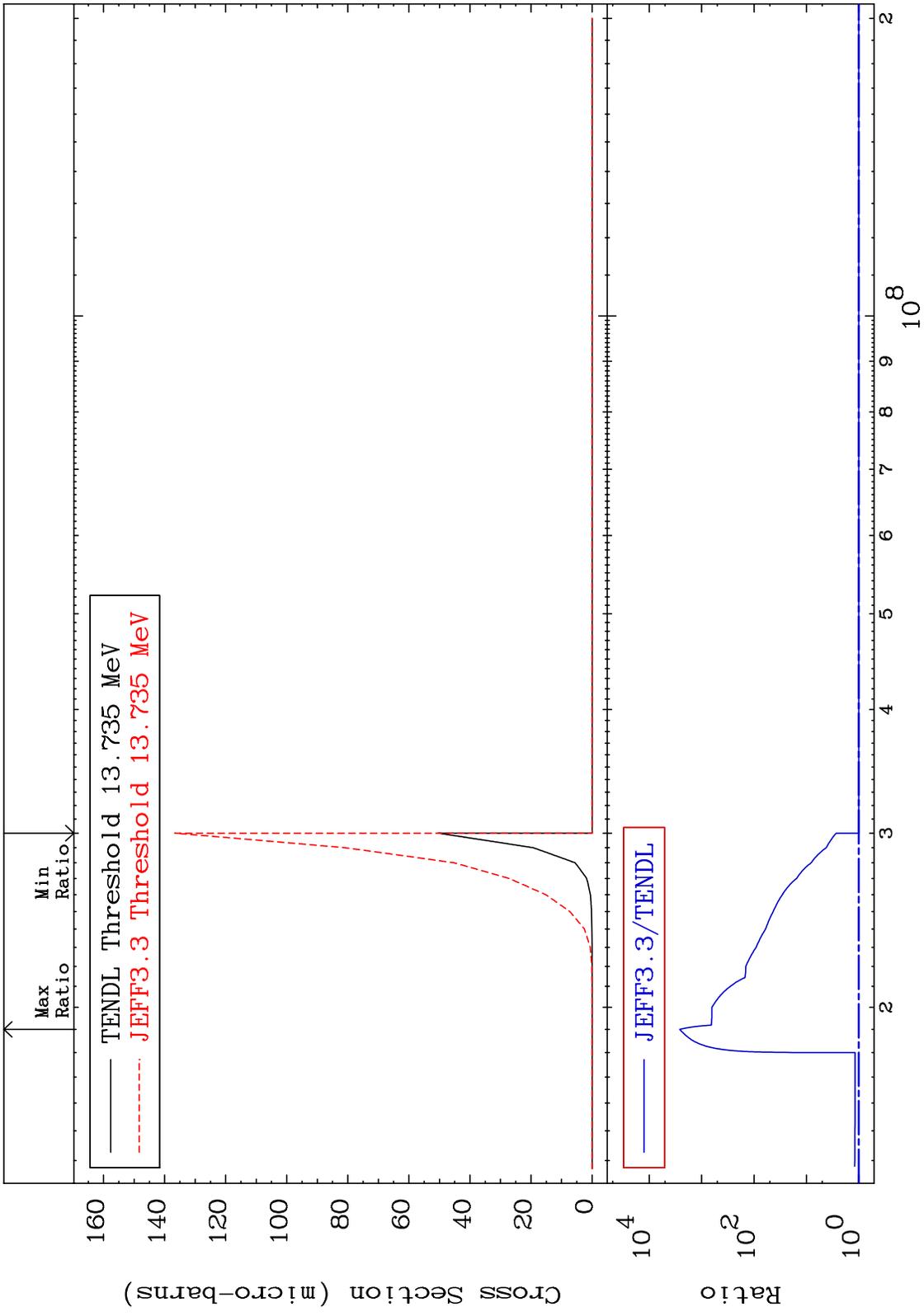
MAT 6234

Dpa disappearance (mt102 -120)
Cross Section

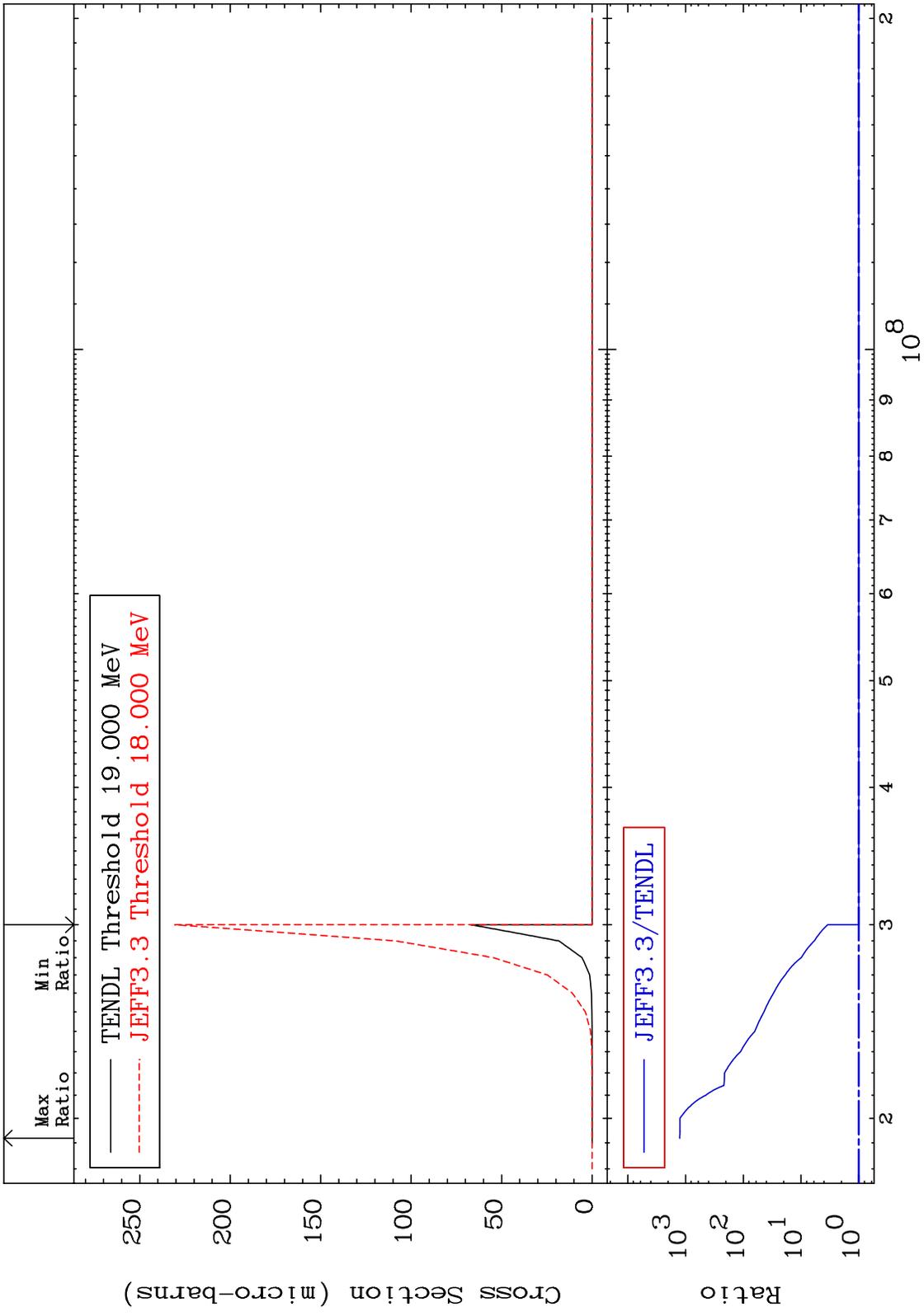
62-Sm-147
-1.628 To 1650. %



MAT 6234 (n,3n) α :60-Nd-141g 62-Sm-147
 Radionuclide Production Cross Section 0.000 To 9999. %

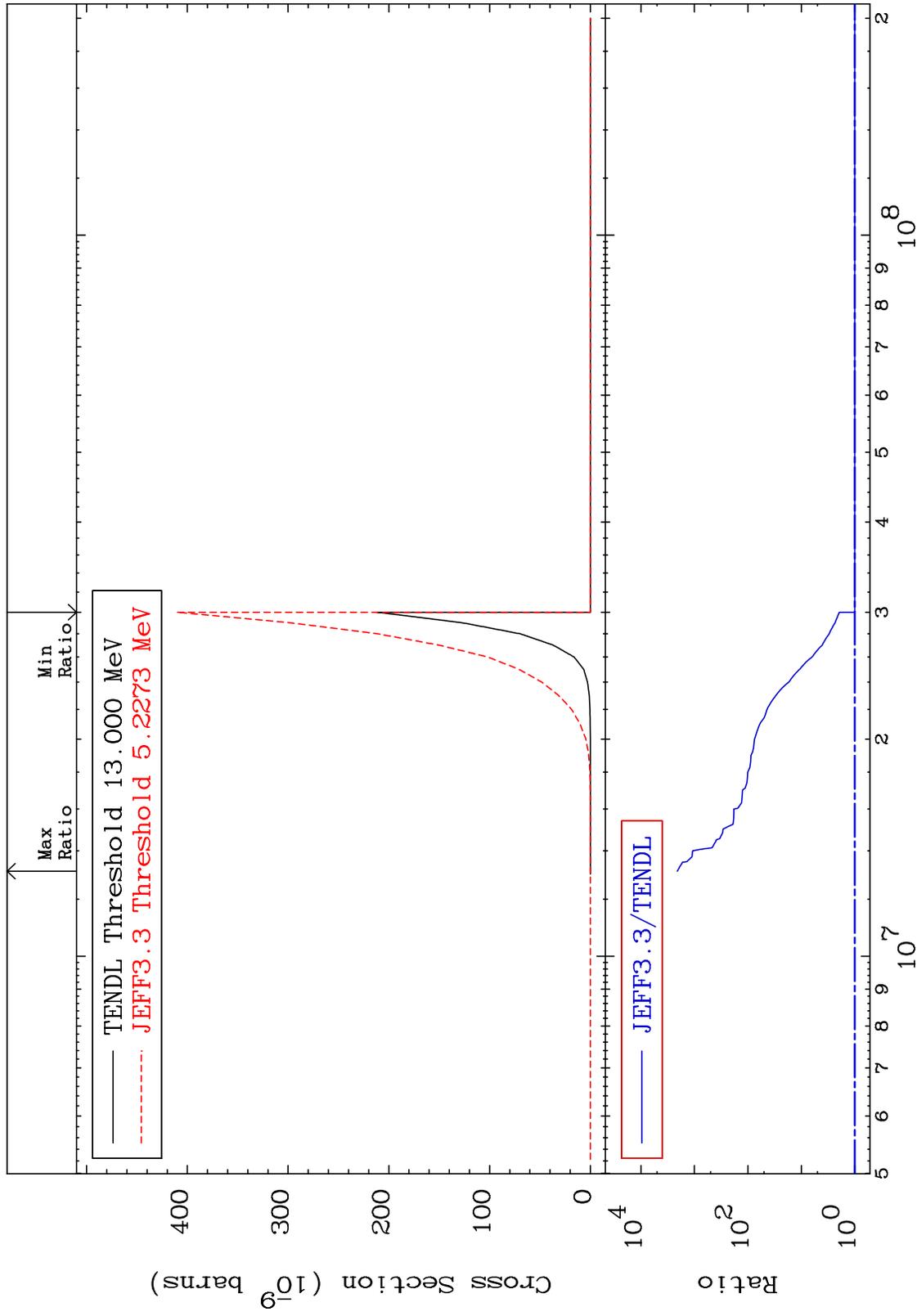


MAT 6234 (n,3n) α : 60-Nd-141m2 62-Sm-147
 Radionuclide Production Cross Section 0.000 To 9999. %



MAT 6234

(n,n') p α :59-Pr-142g 62-Sm-147
Radionuclide Production Cross Section 0.000 To 9999. %



82

Incident Energy (eV)

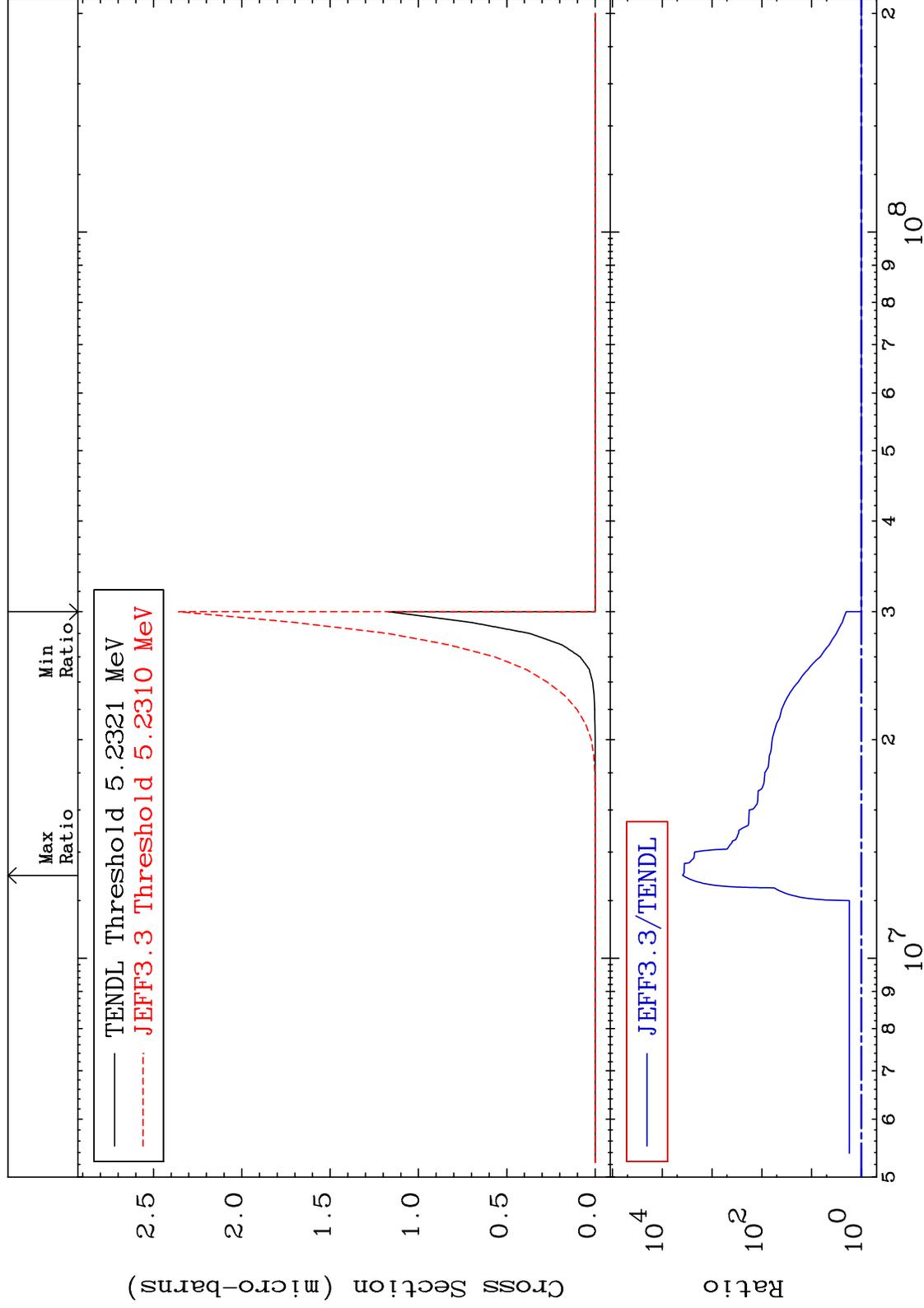
62-Sm-147

MAT 6234

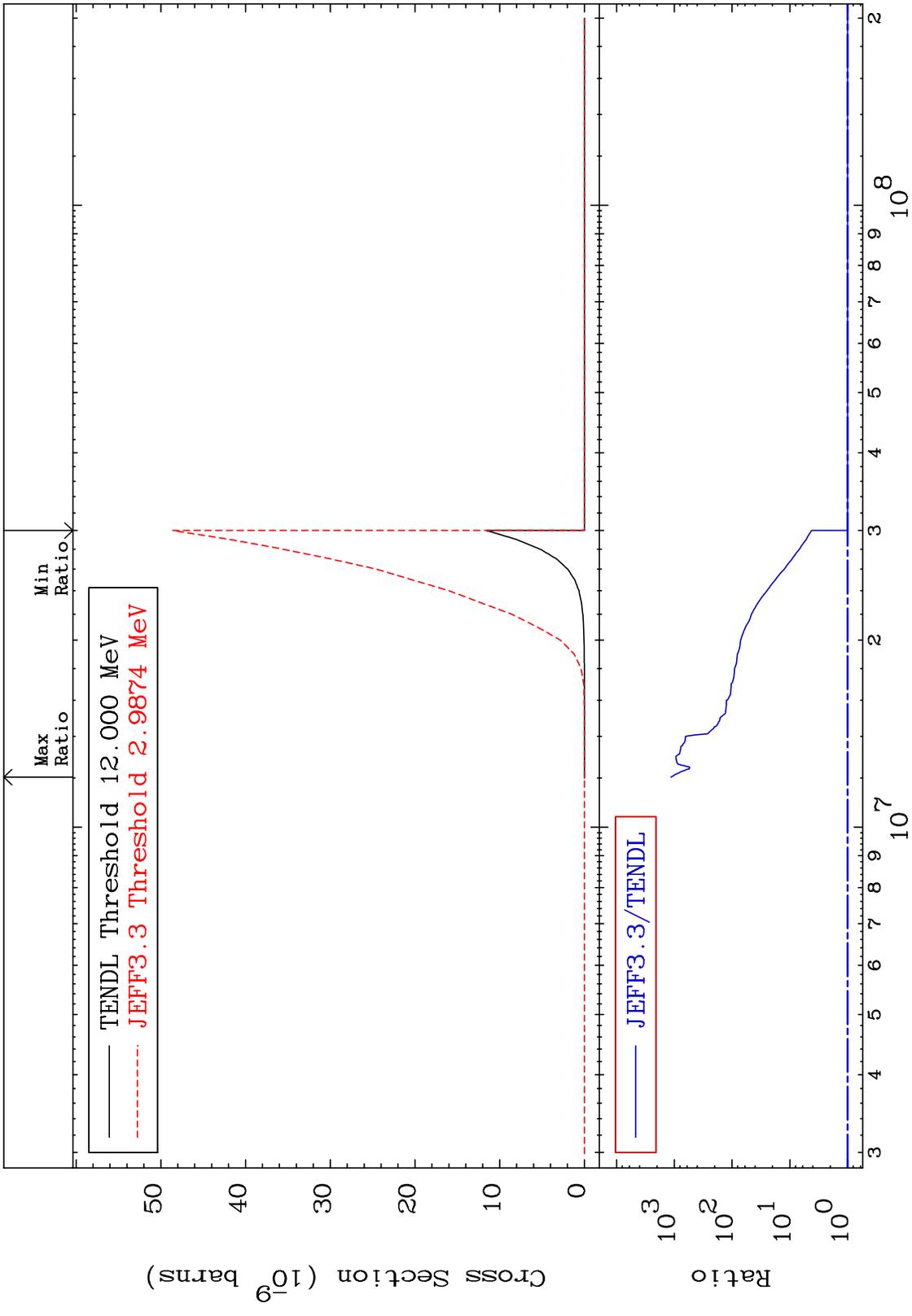
(n,n') p α :59-Pr-142m1

62-Sm-147

Radionuclide Production Cross Section 0.000 To 9999. %



MAT 6234 (n, d) α :59-Pr-142g 62-Sm-147
 Radionuclide Production Cross Section 0.000 To 9999. %

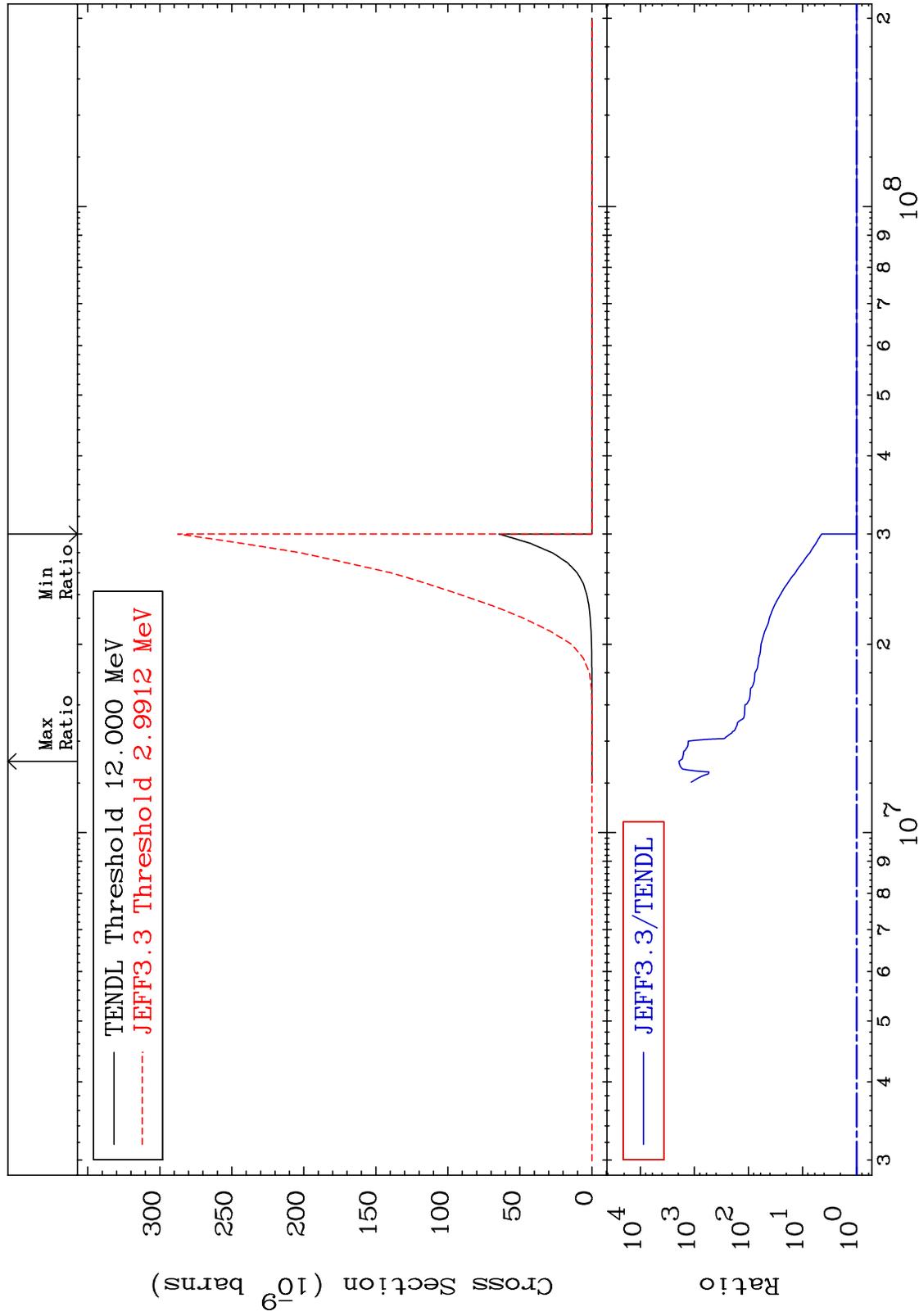


MAT 6234

(n, d) α :59-Pr-142m1

62-Sm-147

Radionuclide Production Cross Section 0.000 To 9999. %



85

Incident Energy (eV)

62-Sm-147