

Program EVALPLOT  
(Version 2015-2)

by

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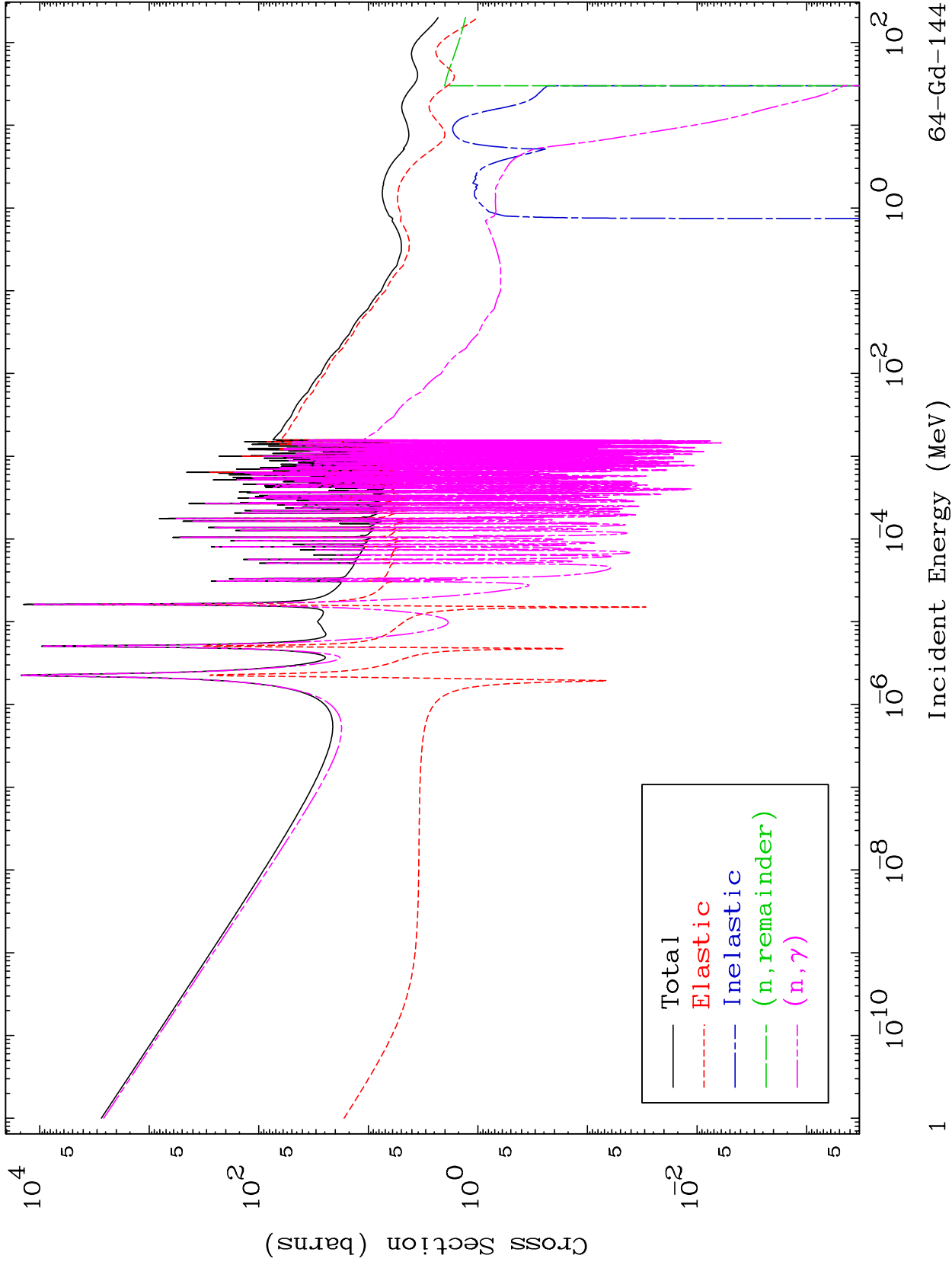
Press Mouse Button to Start

MAT 6401

Major

293 Kelvin Cross Sections

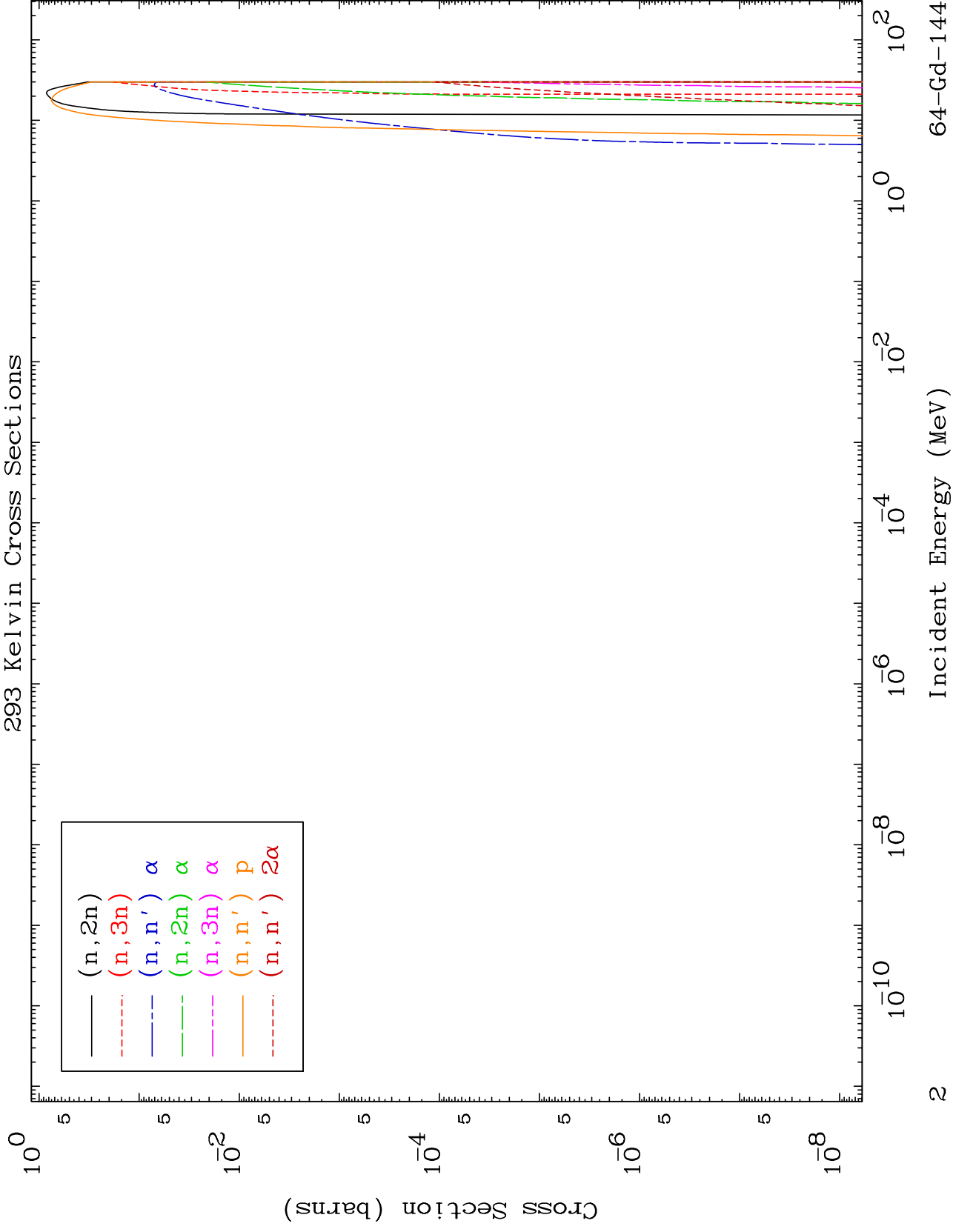
64-Gd-144



MAT 6401

Neutron Production  
293 Kelvin Cross Sections

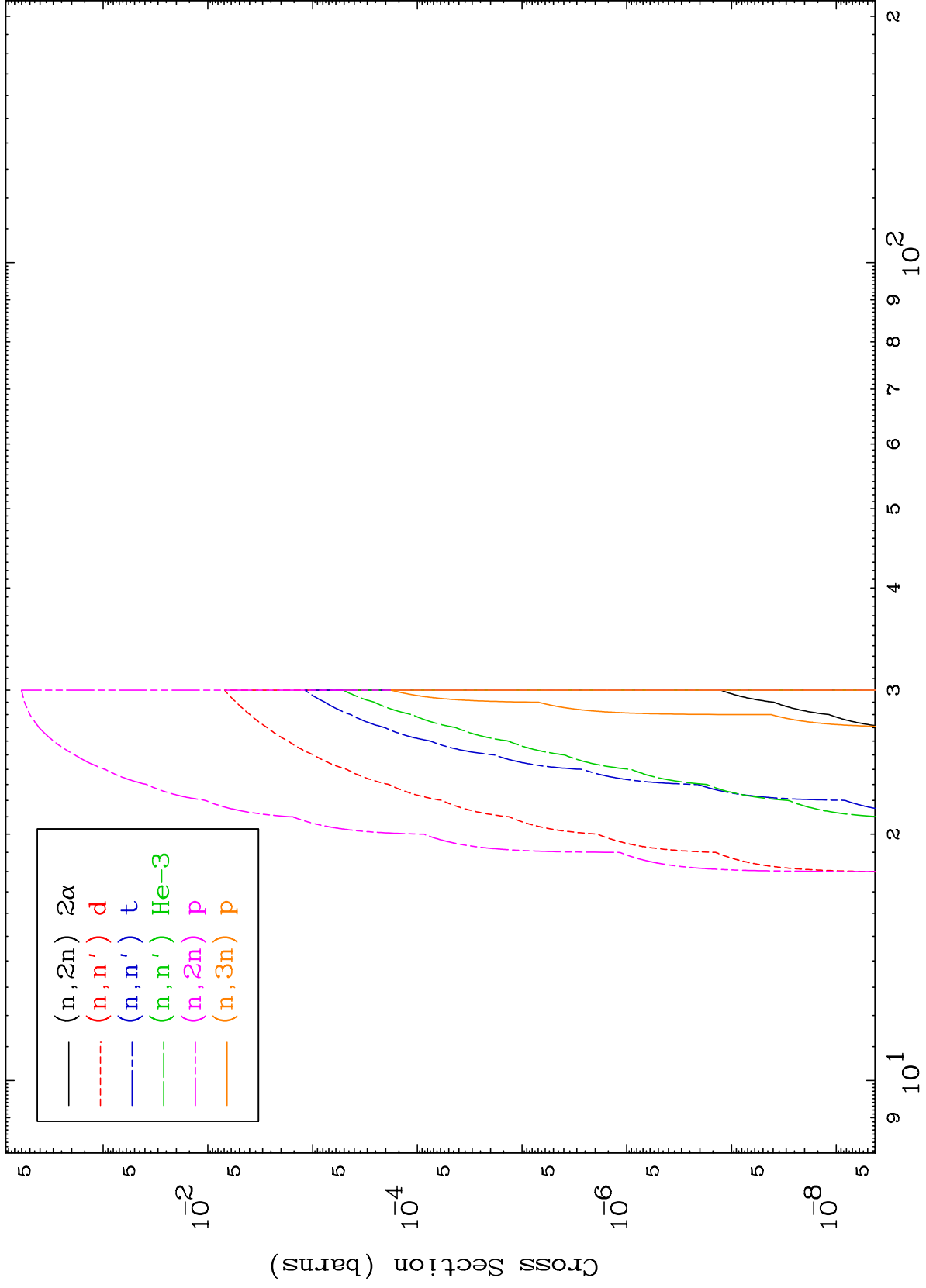
64-Gd-144



MAT 6401

Neutron Production  
293 Kelvin Cross Sections

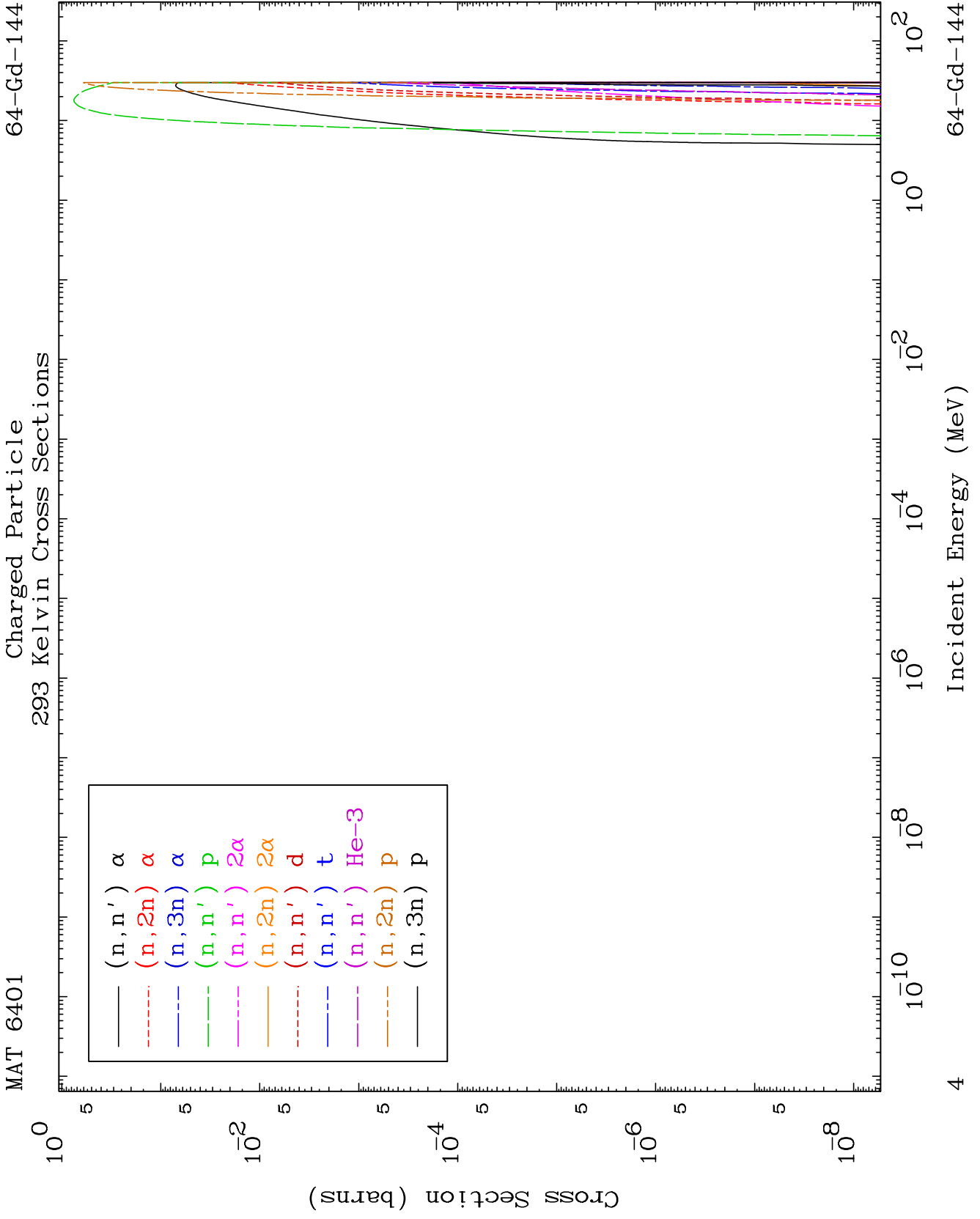
64-Gd-144



3

Incident Energy (MeV)

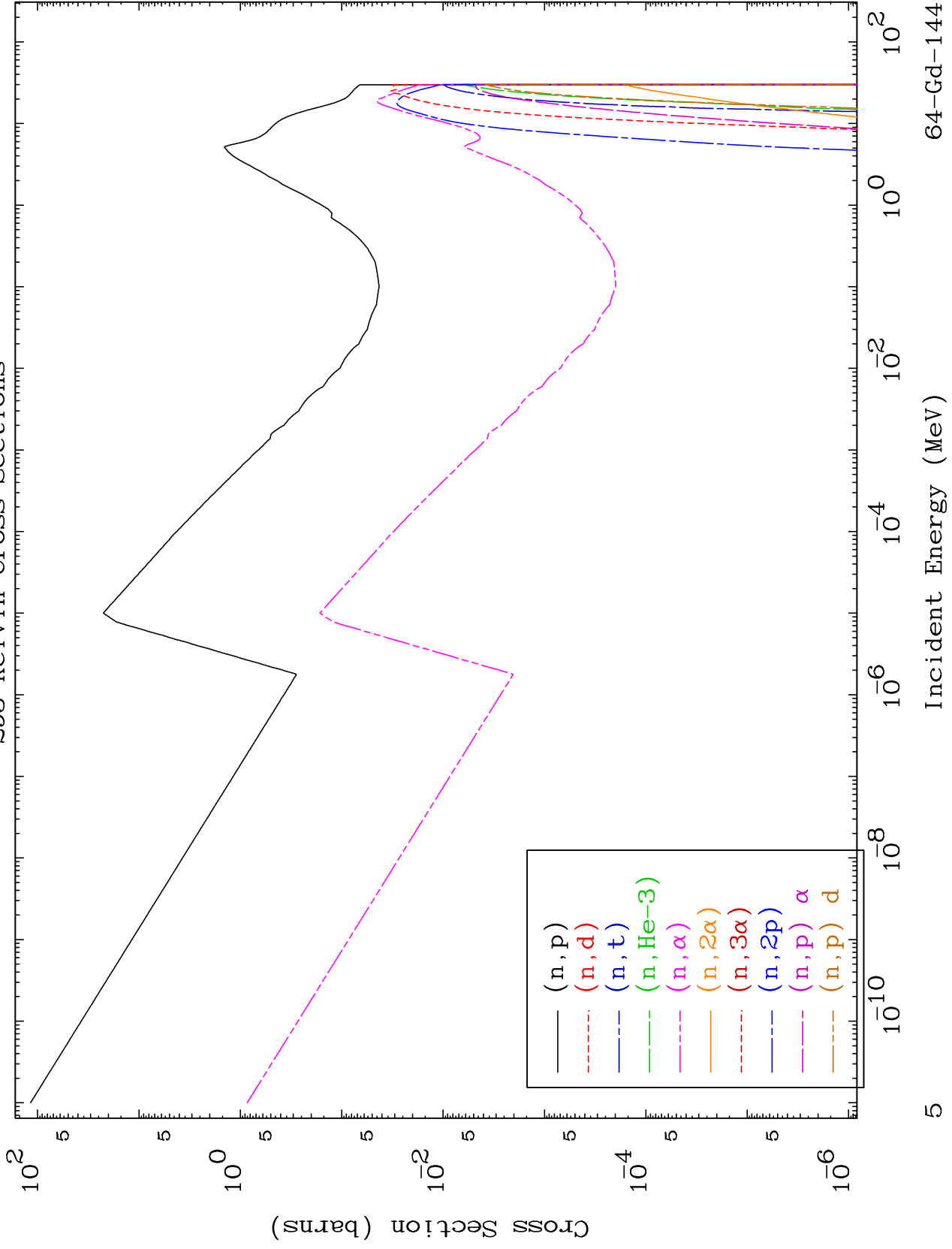
64-Gd-144



MAT 6401

Charged Particle  
293 Kelvin Cross Sections

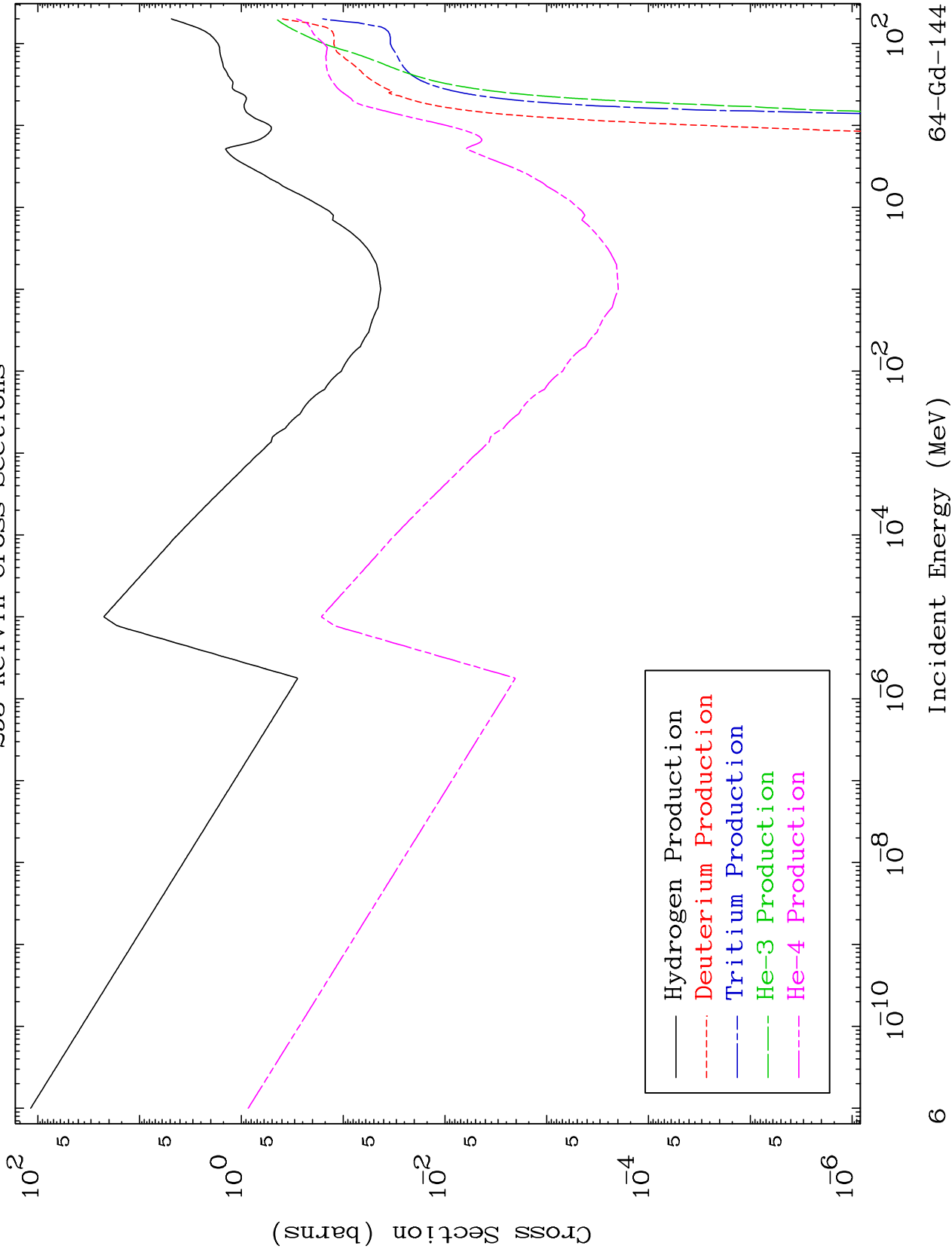
64-Gd-144



MAT 6401

Particle Production  
293 Kelvin Cross Sections

64-Gd-144

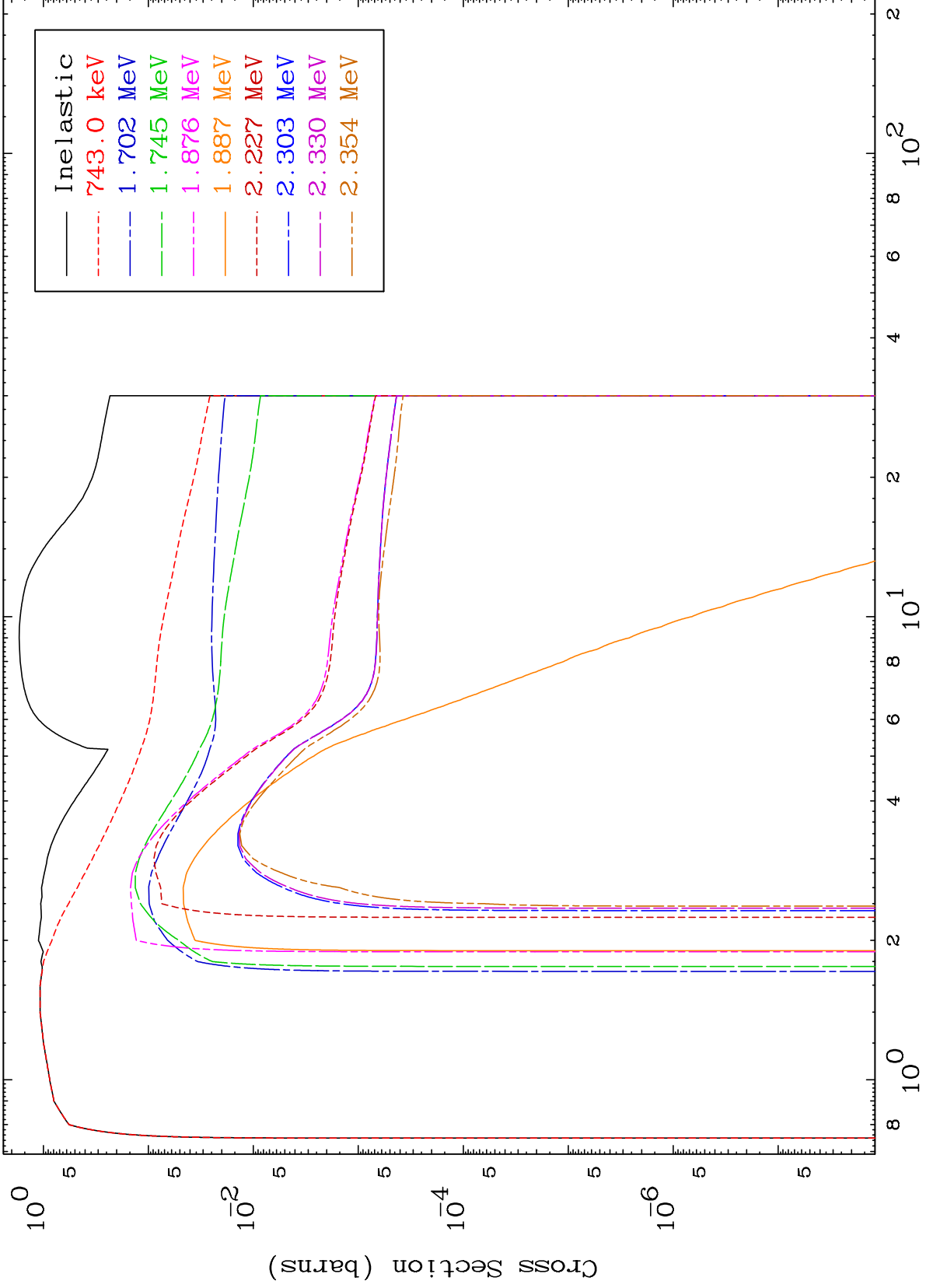


MAT 6401

(n,n') Level

64-Gd-144

293 Kelvin Cross Sections



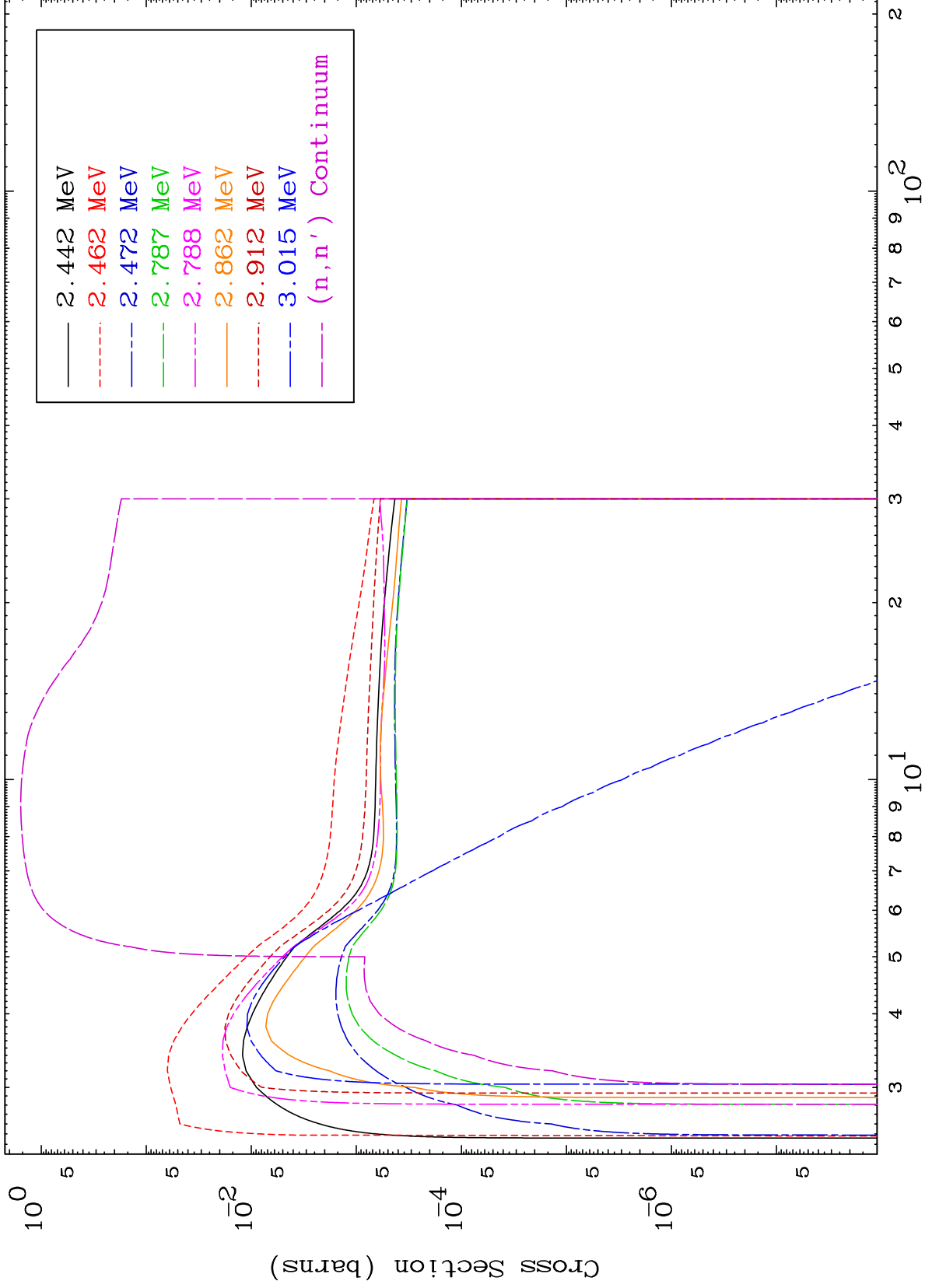
7

Incident Energy (MeV)

64-Gd-144



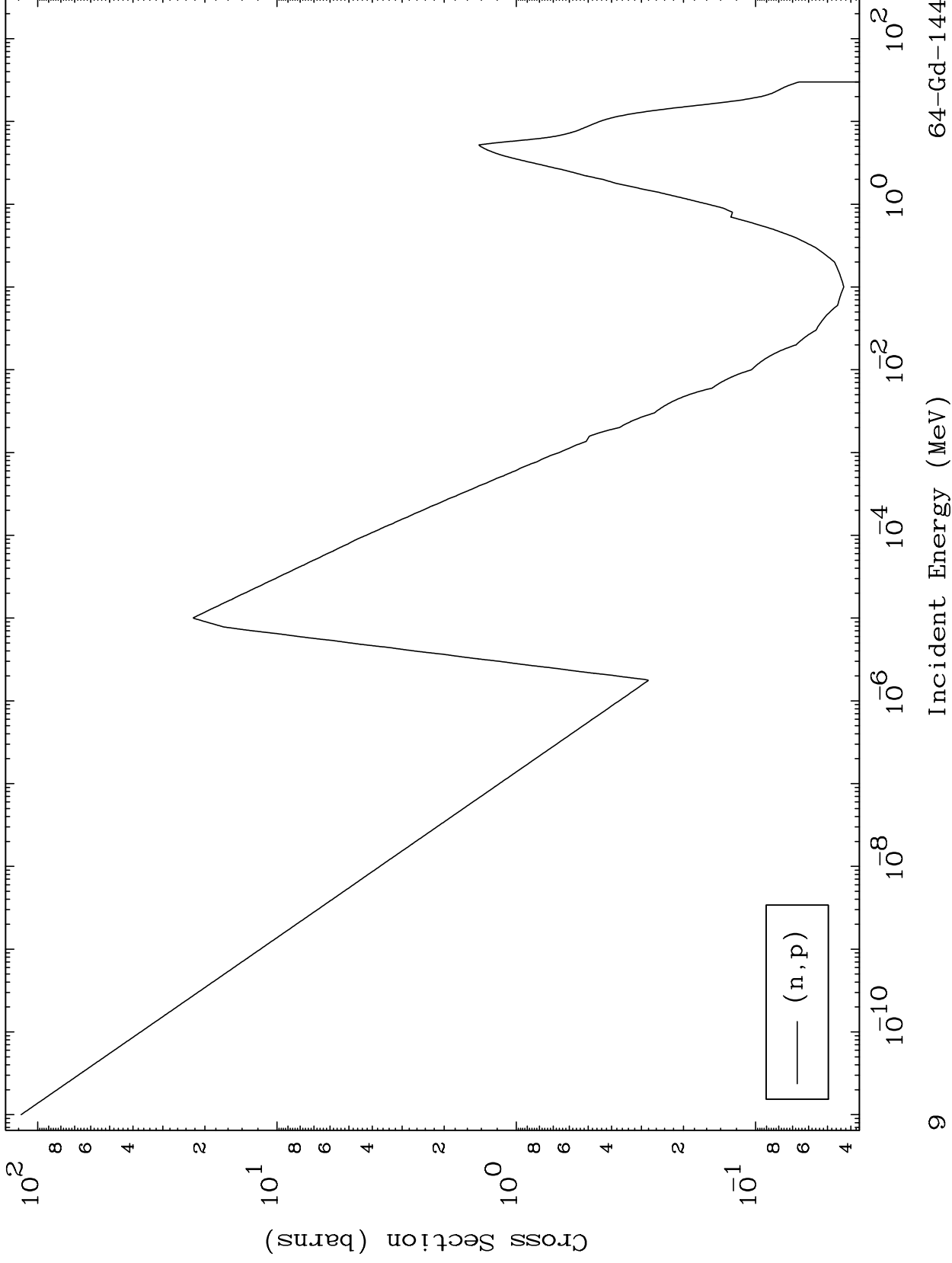
293 Kelvin Cross Sections



MAT 6401

(n,p) Levels  
293 Kelvin Cross Sections

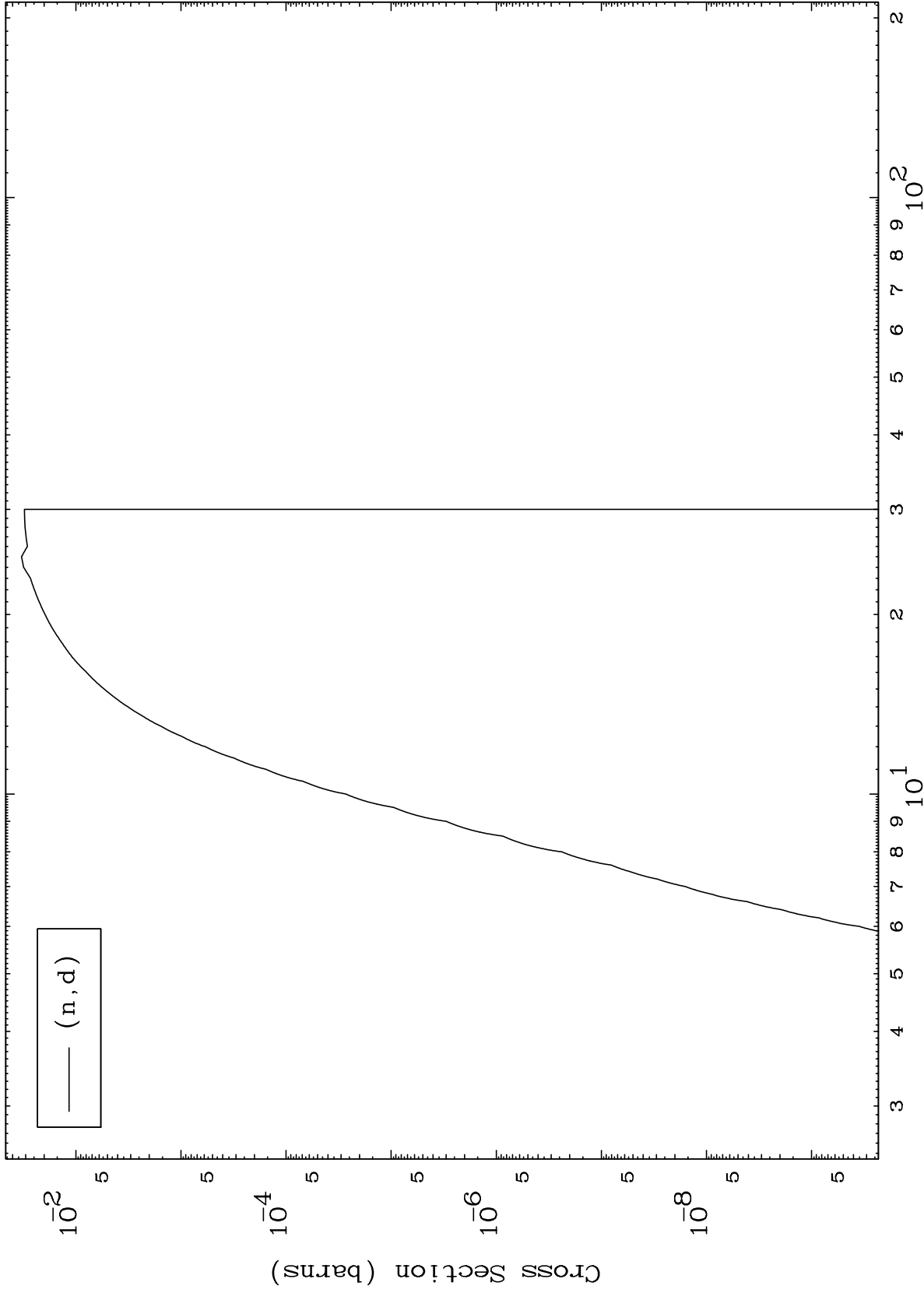
64-Gd-144



MAT 6401

(n,d) Levels  
293 Kelvin Cross Sections

64-Gd-144



10

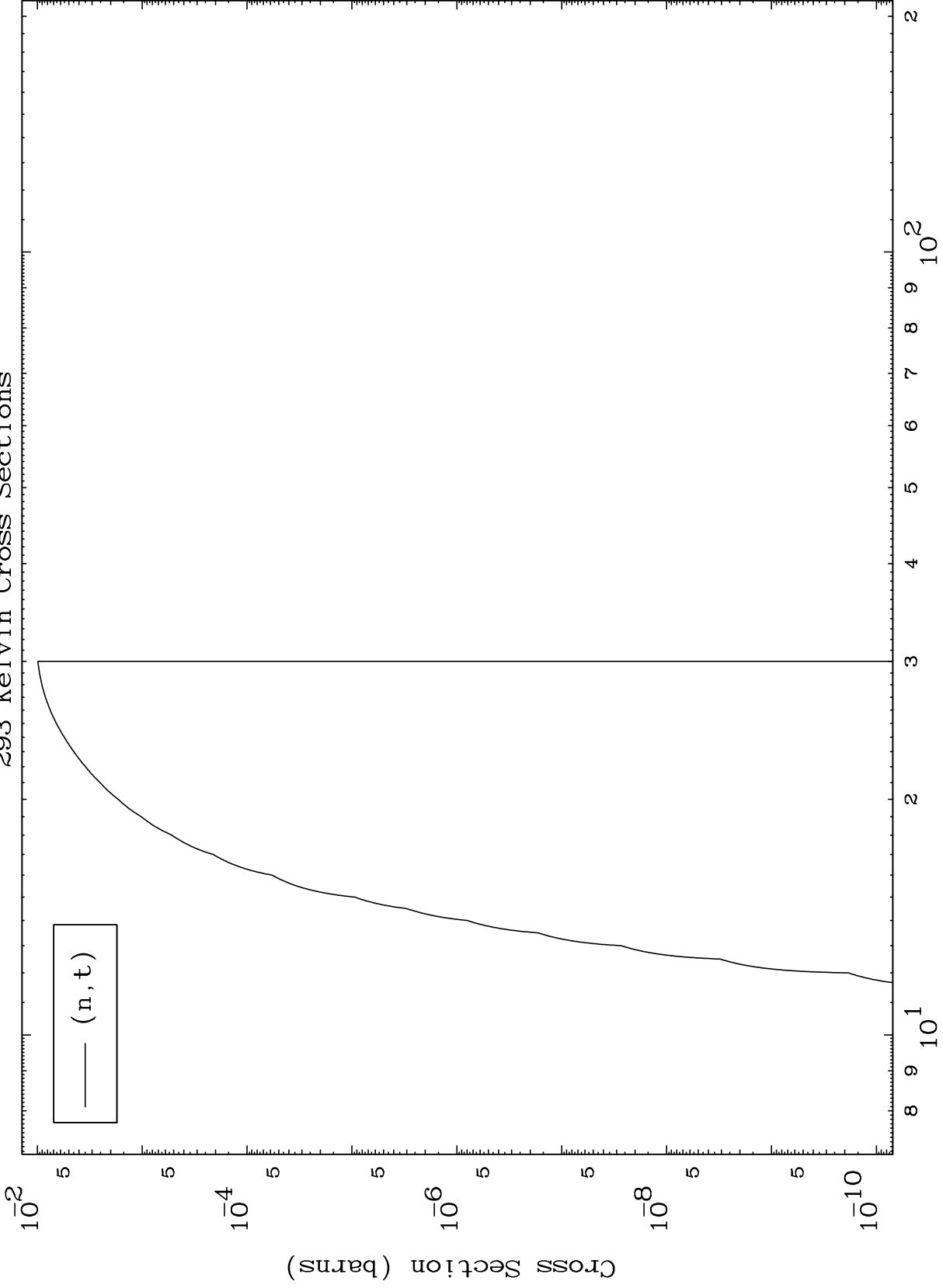
Incident Energy (MeV)

64-Gd-144

MAT 6401

(n,t) Levels  
293 Kelvin Cross Sections

64-Gd-144



11

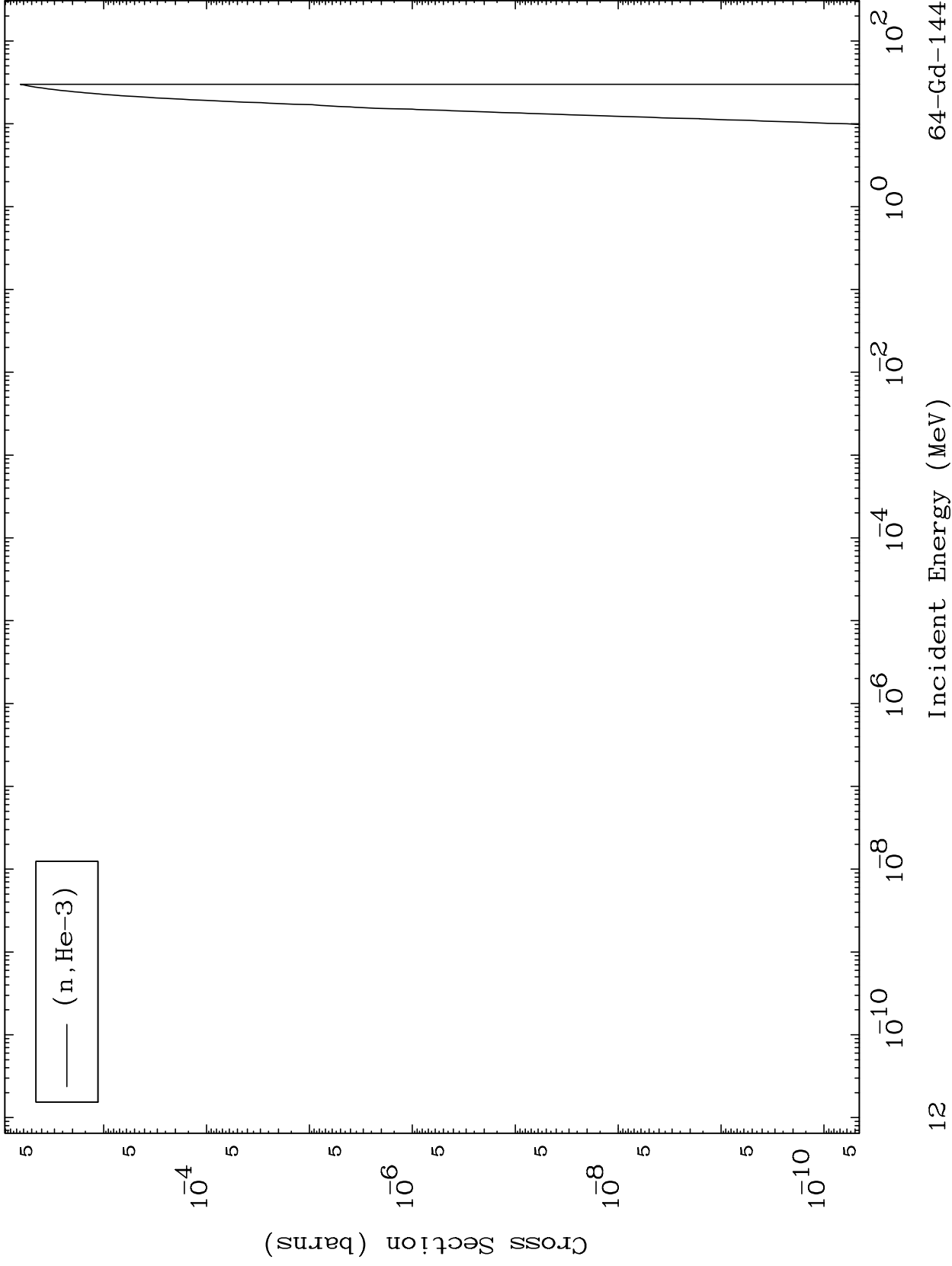
Incident Energy (MeV)

64-Gd-144

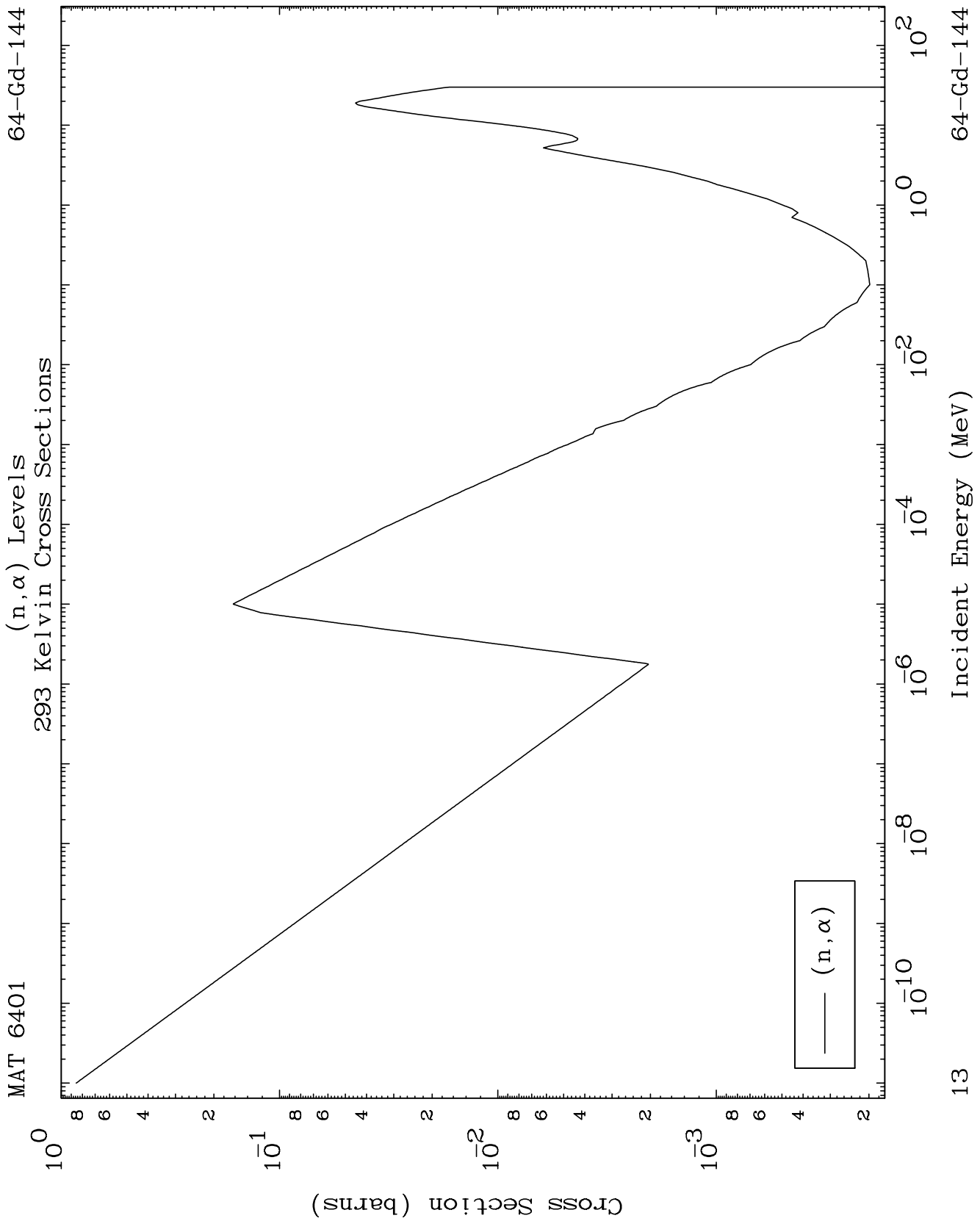
MAT 6401

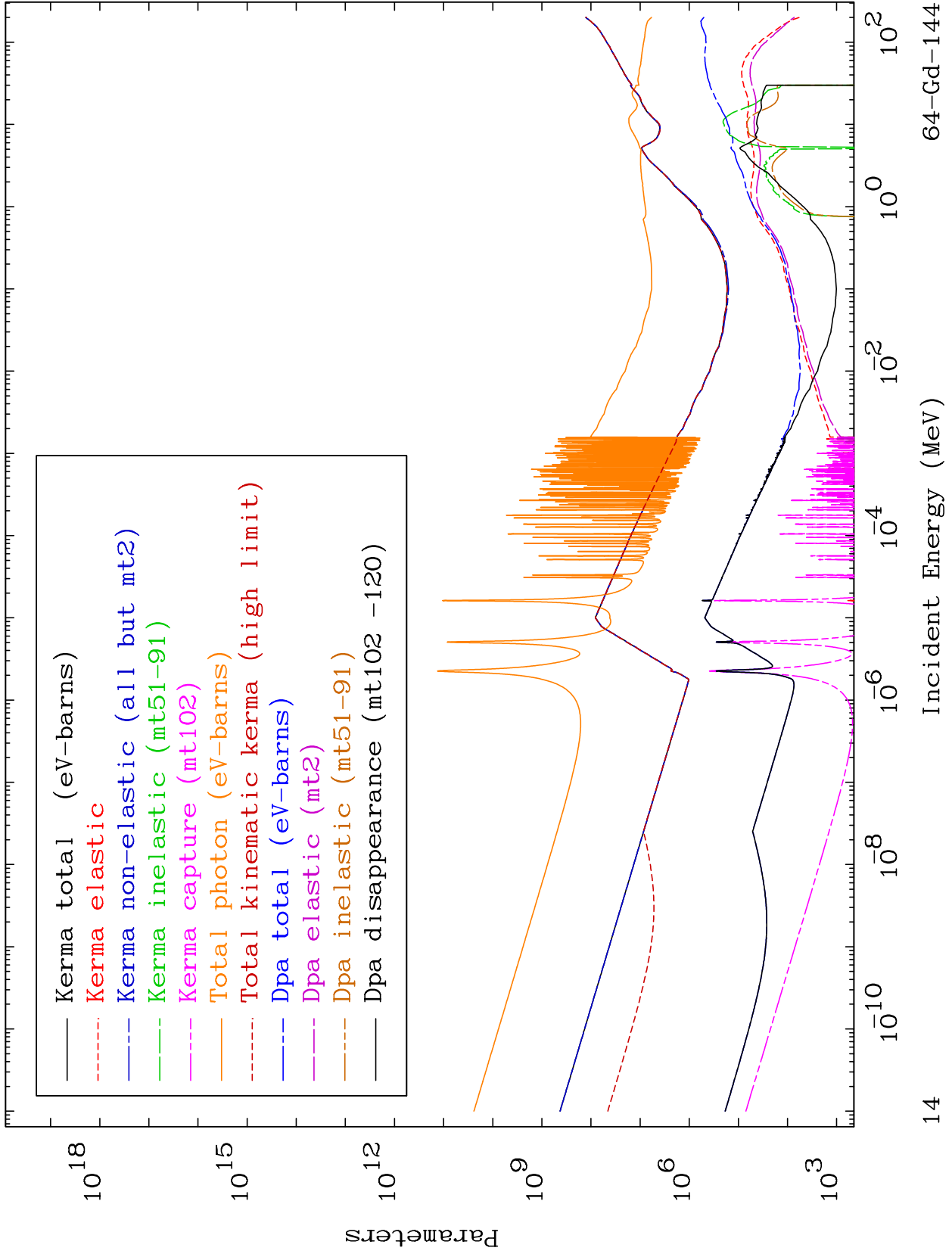
(n,He3) Levels  
293 Kelvin Cross Sections

64-Gd-144



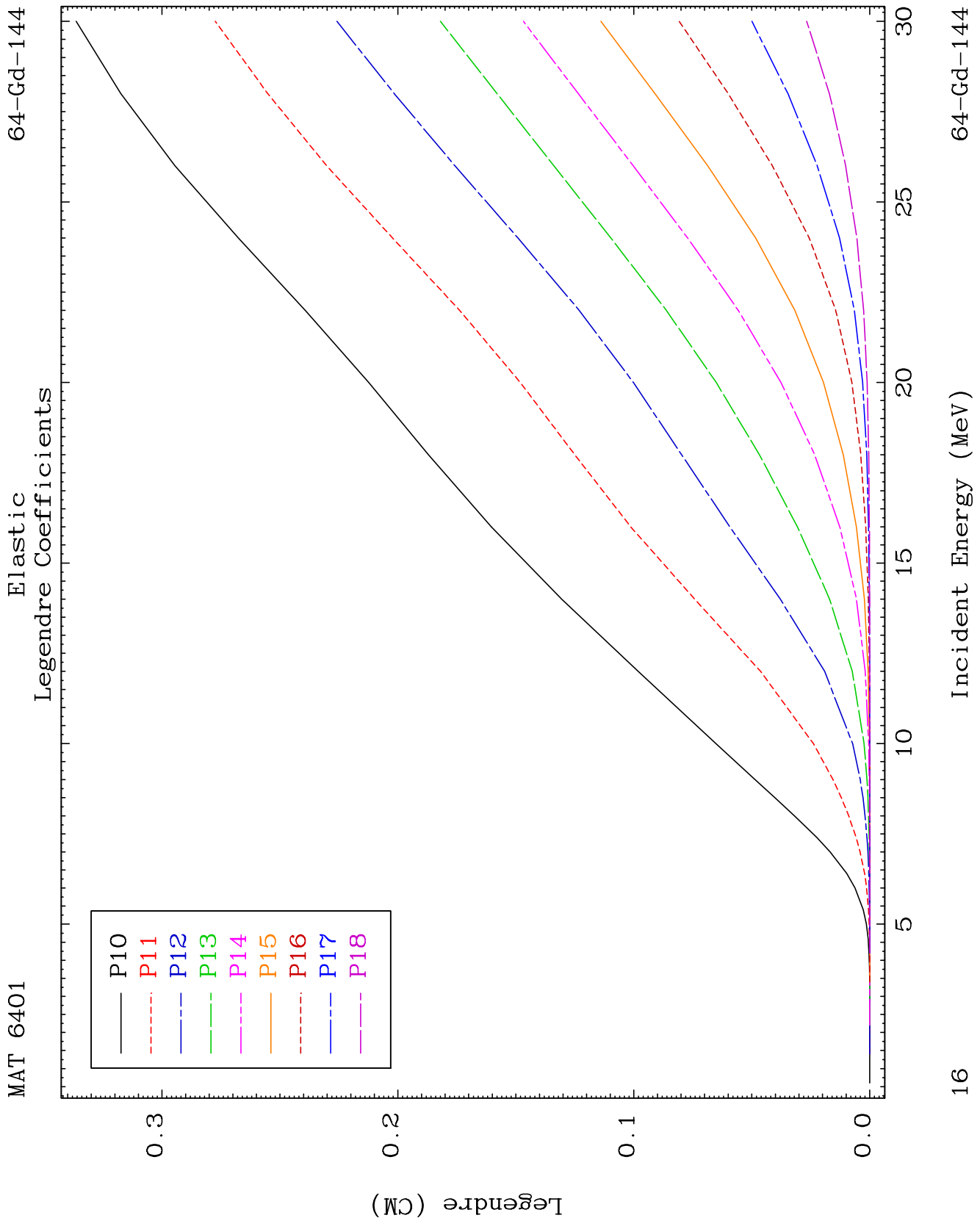
12







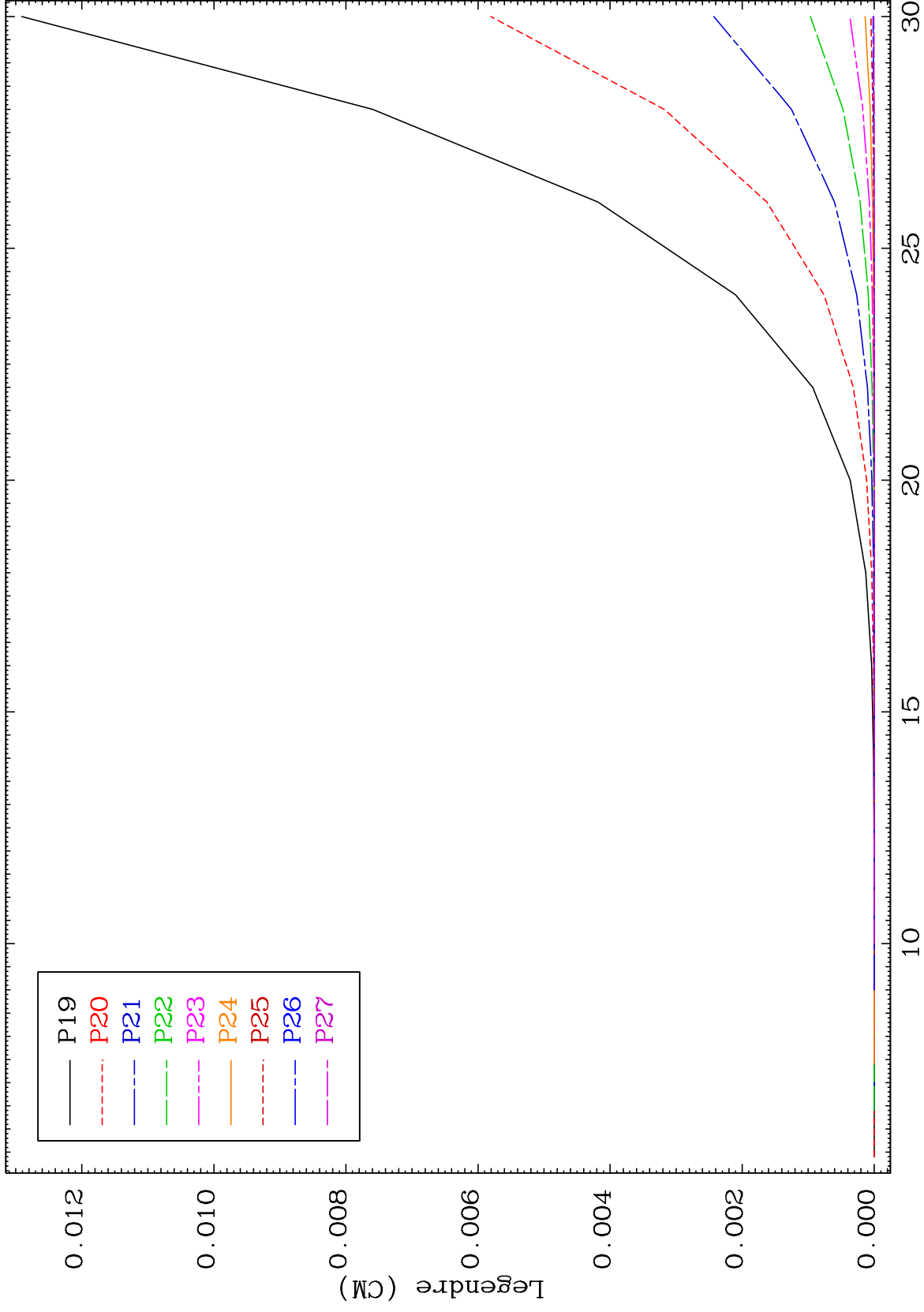




MAT 6401

### Elastic Legendre Coefficients

64-Gd-144



17

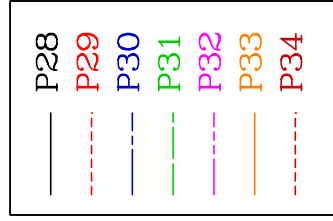
Incident Energy (MeV)

64-Gd-144

MAT 6401

Elastic  
Legendre Coefficients

64-Gd-144



$\times 10^{-6}$

1.5

Legendre (CM)

1.0

0.5

0.0

15

20

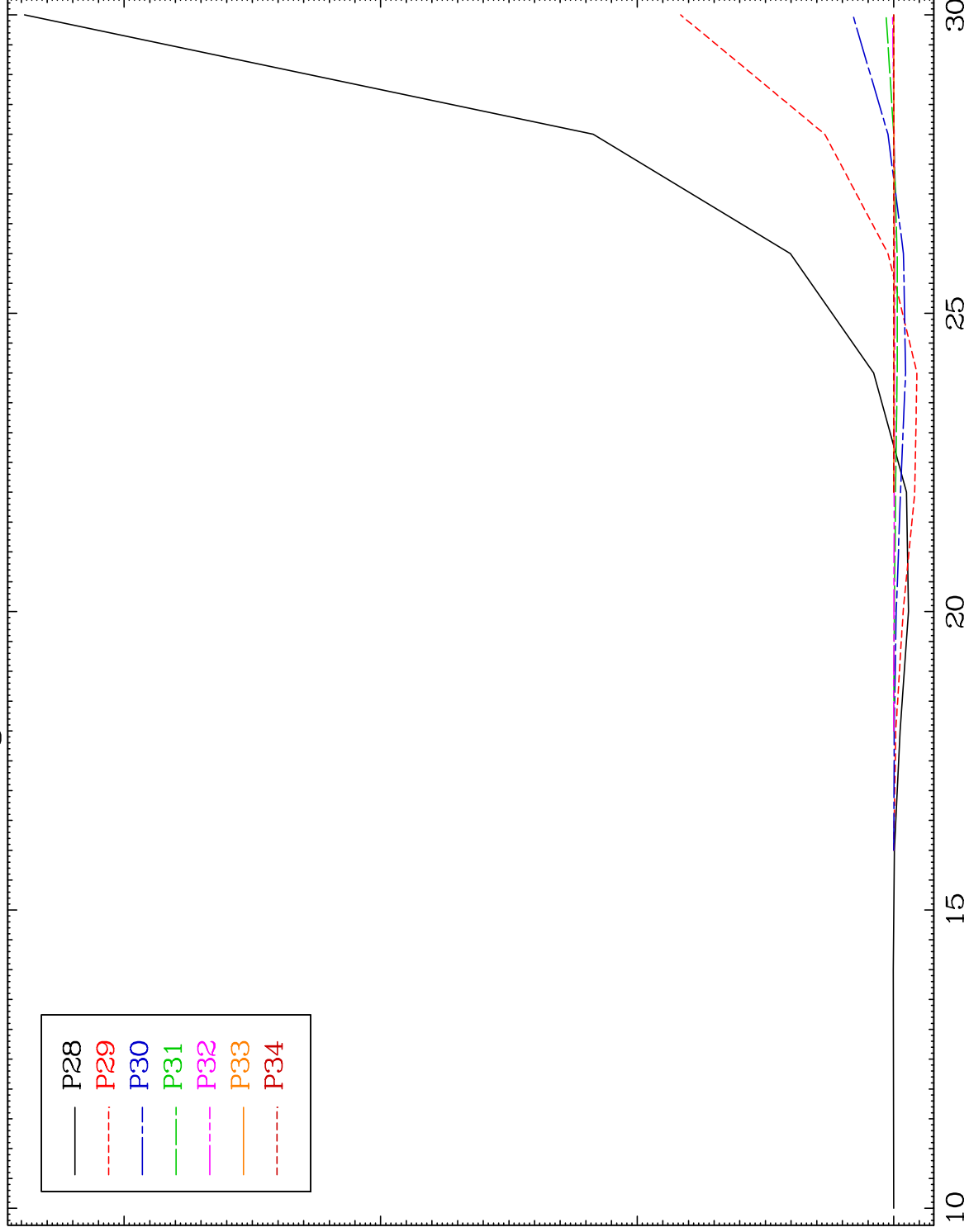
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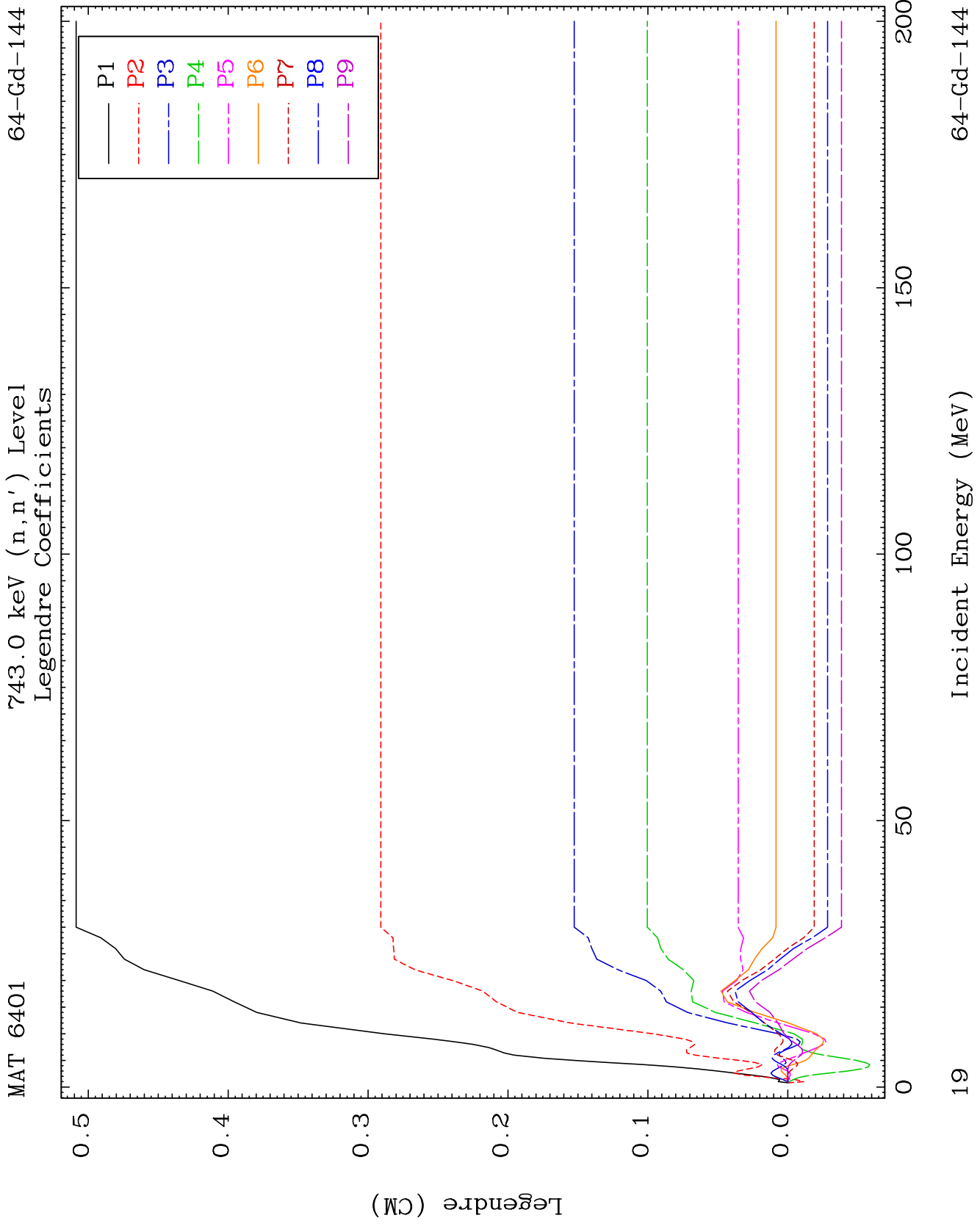
30

18

Incident Energy (MeV)

64-Gd-144



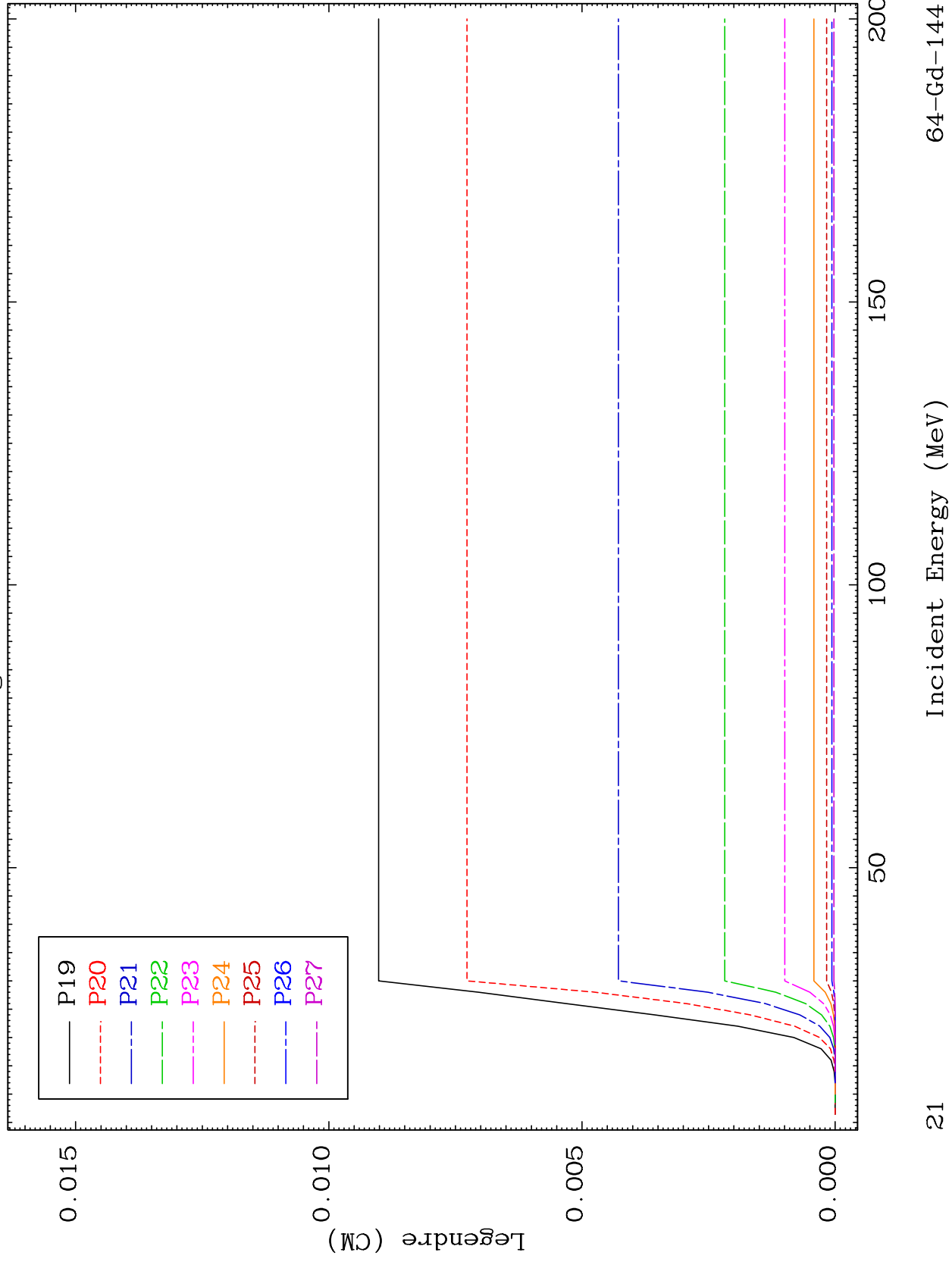




MAT 6401

743.0 keV (n,n') Level  
Legendre Coefficients

64-Gd-144



21

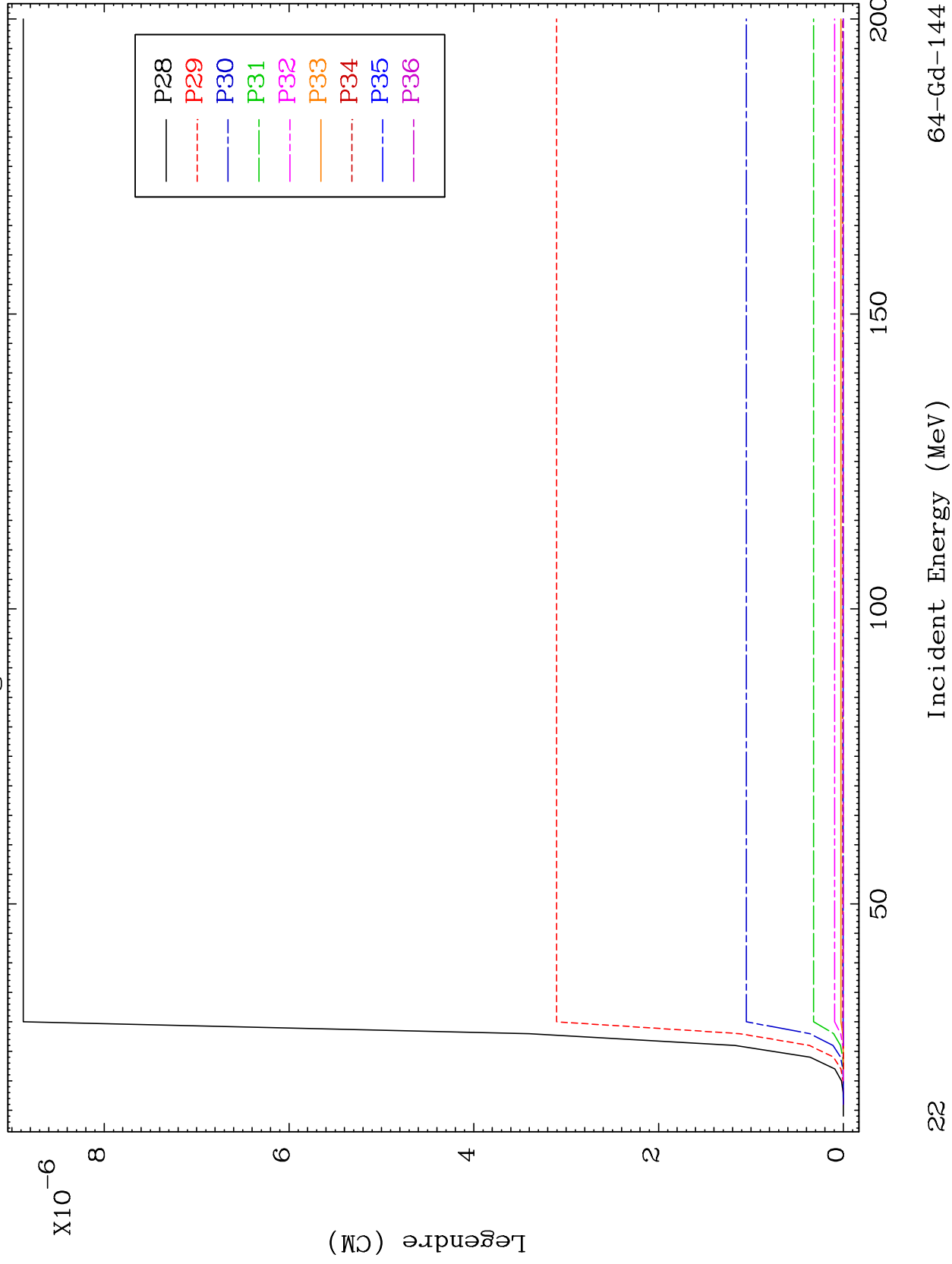
Incident Energy (MeV)

64-Gd-144

MAT 6401

743.0 keV (n,n') Level  
Legendre Coefficients

64-Gd-144



22

Incident Energy (MeV)

64-Gd-144



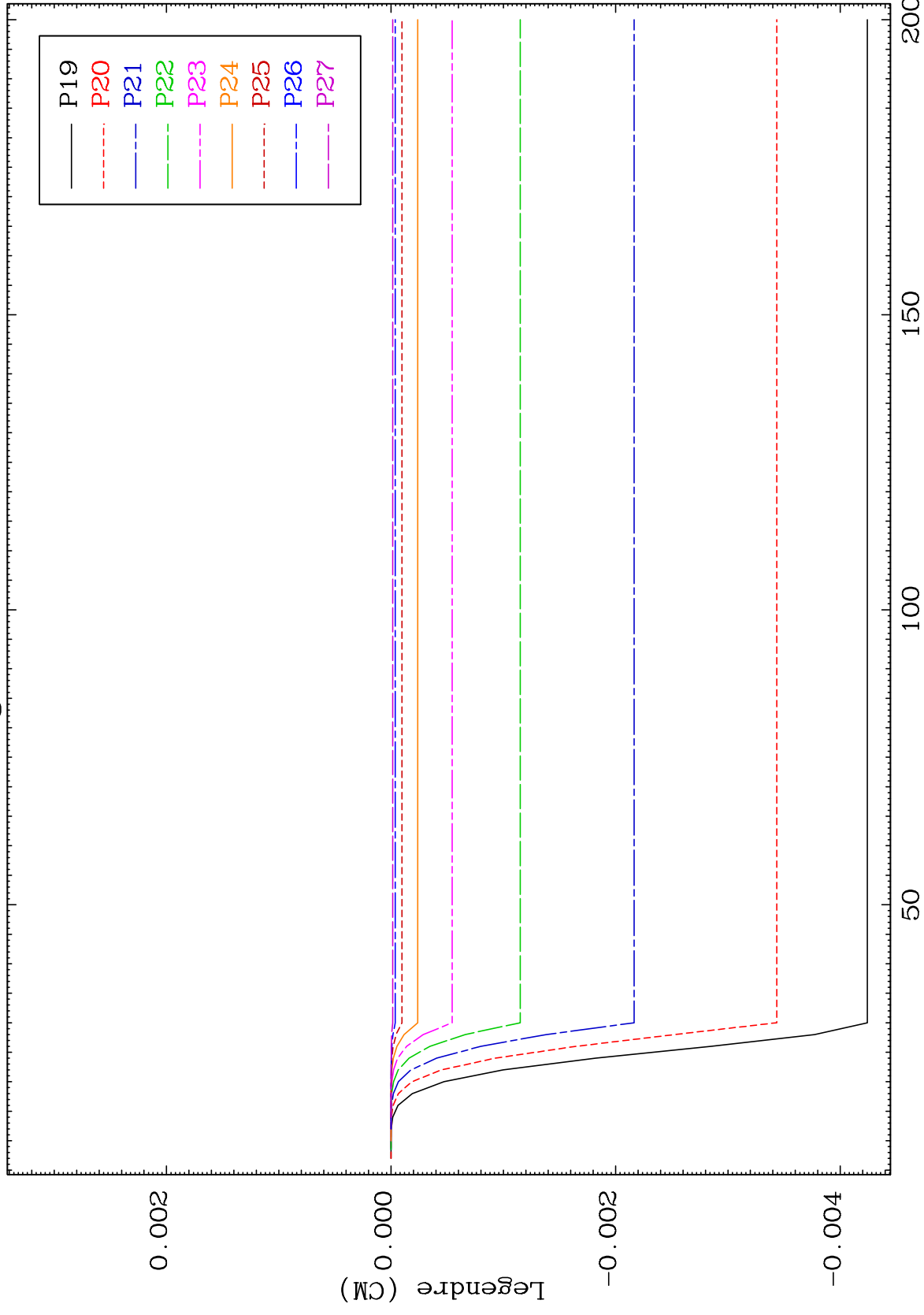




MAT 6401

1.702 MeV (n,n') Level  
Legendre Coefficients

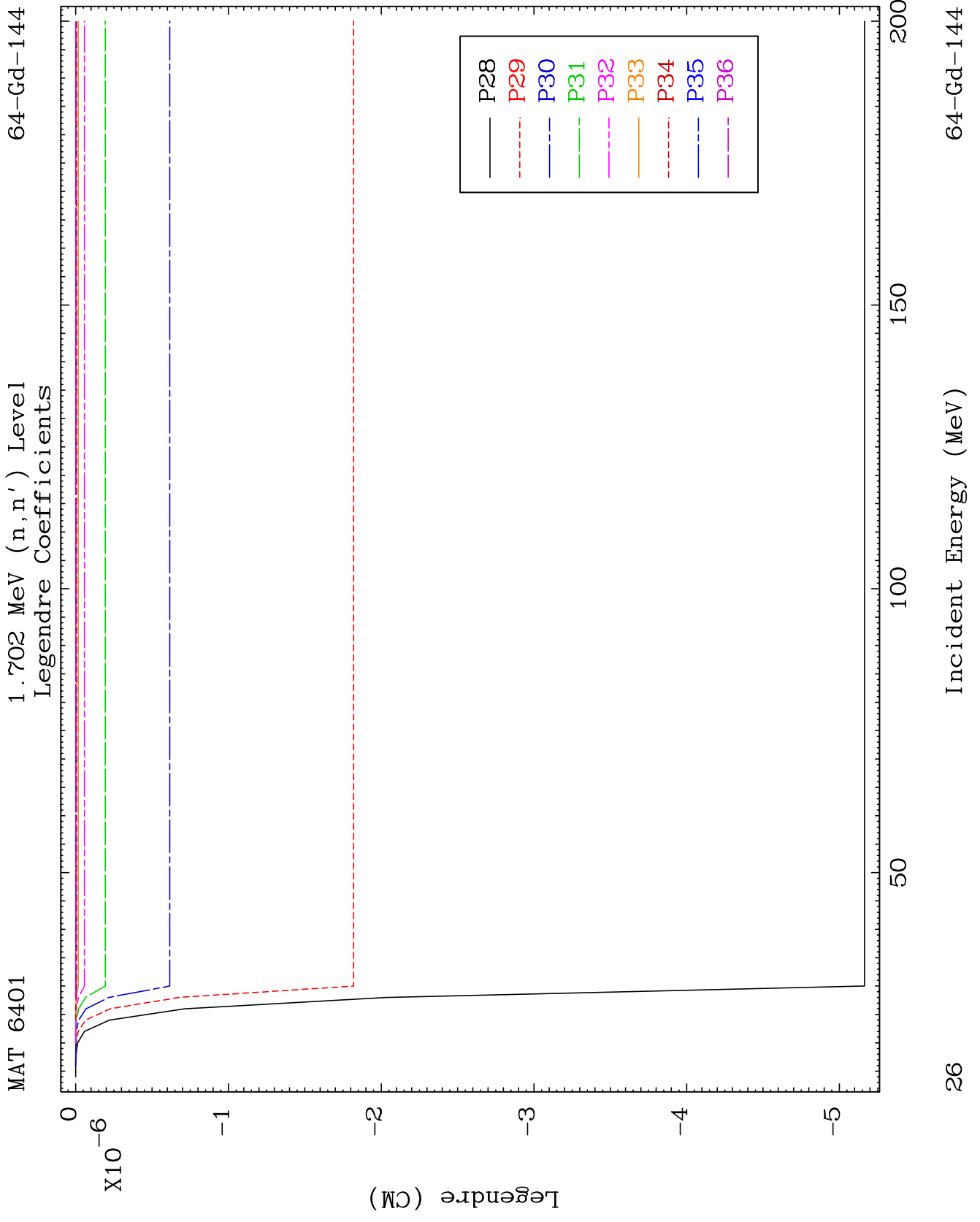
64-Gd-144

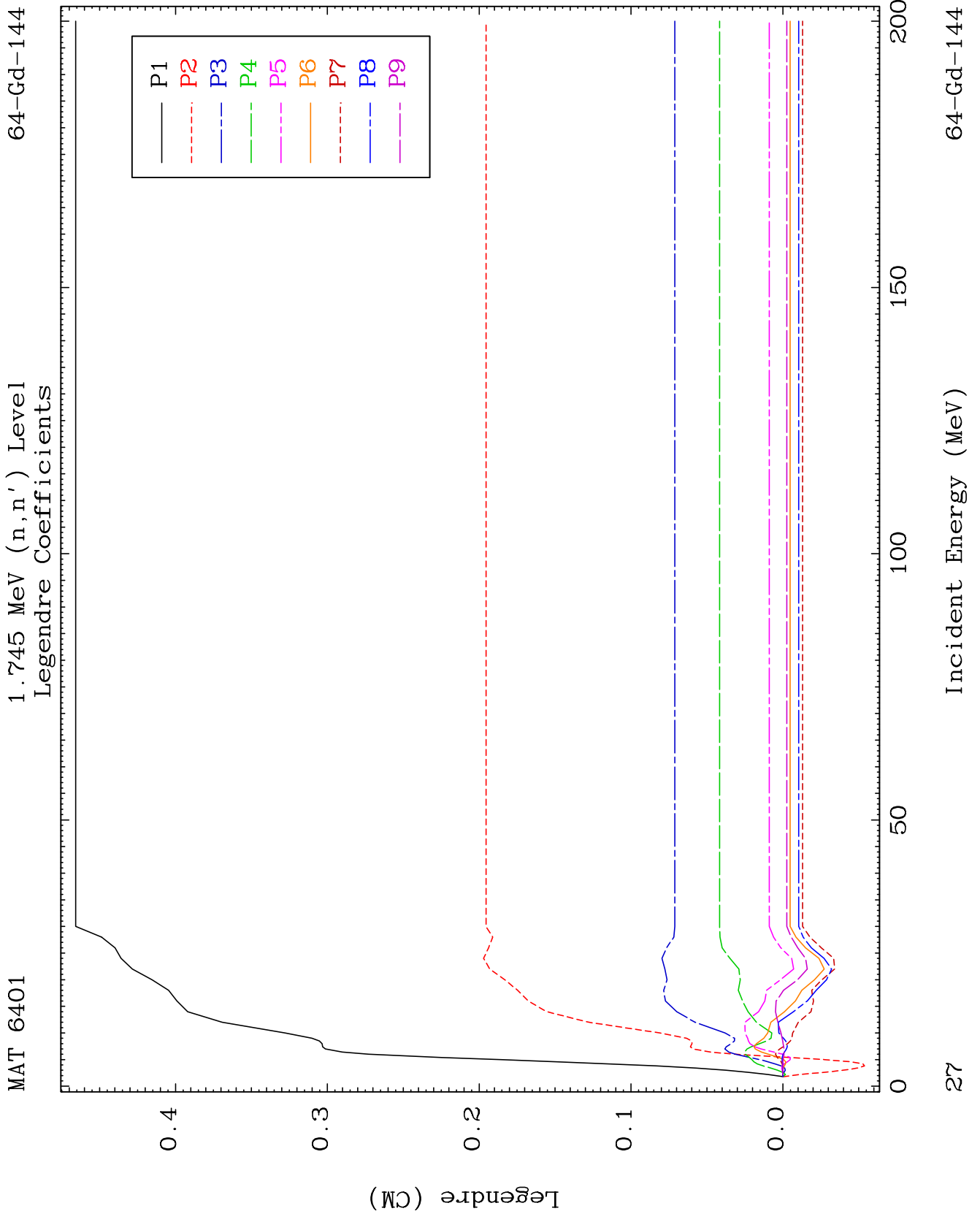


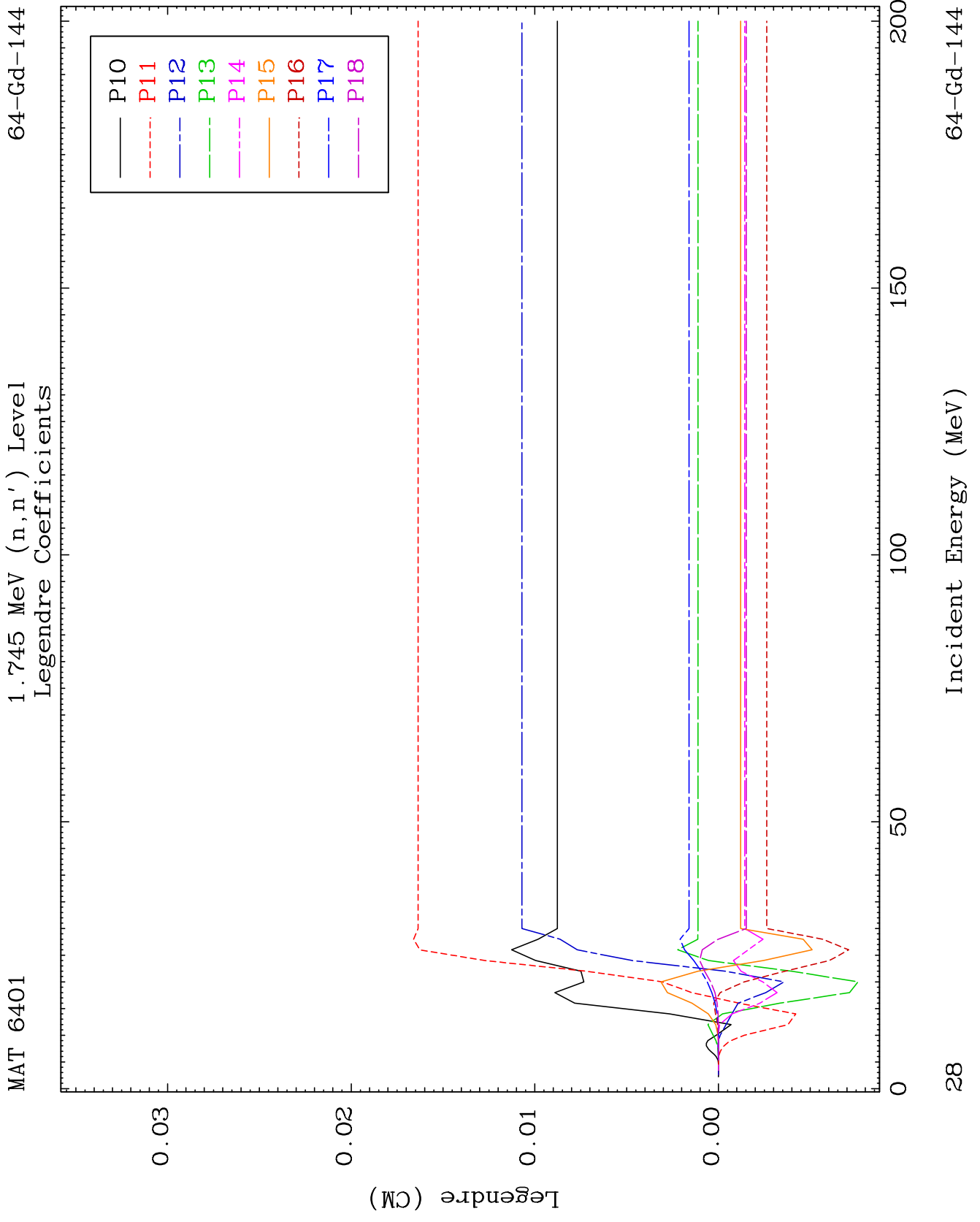
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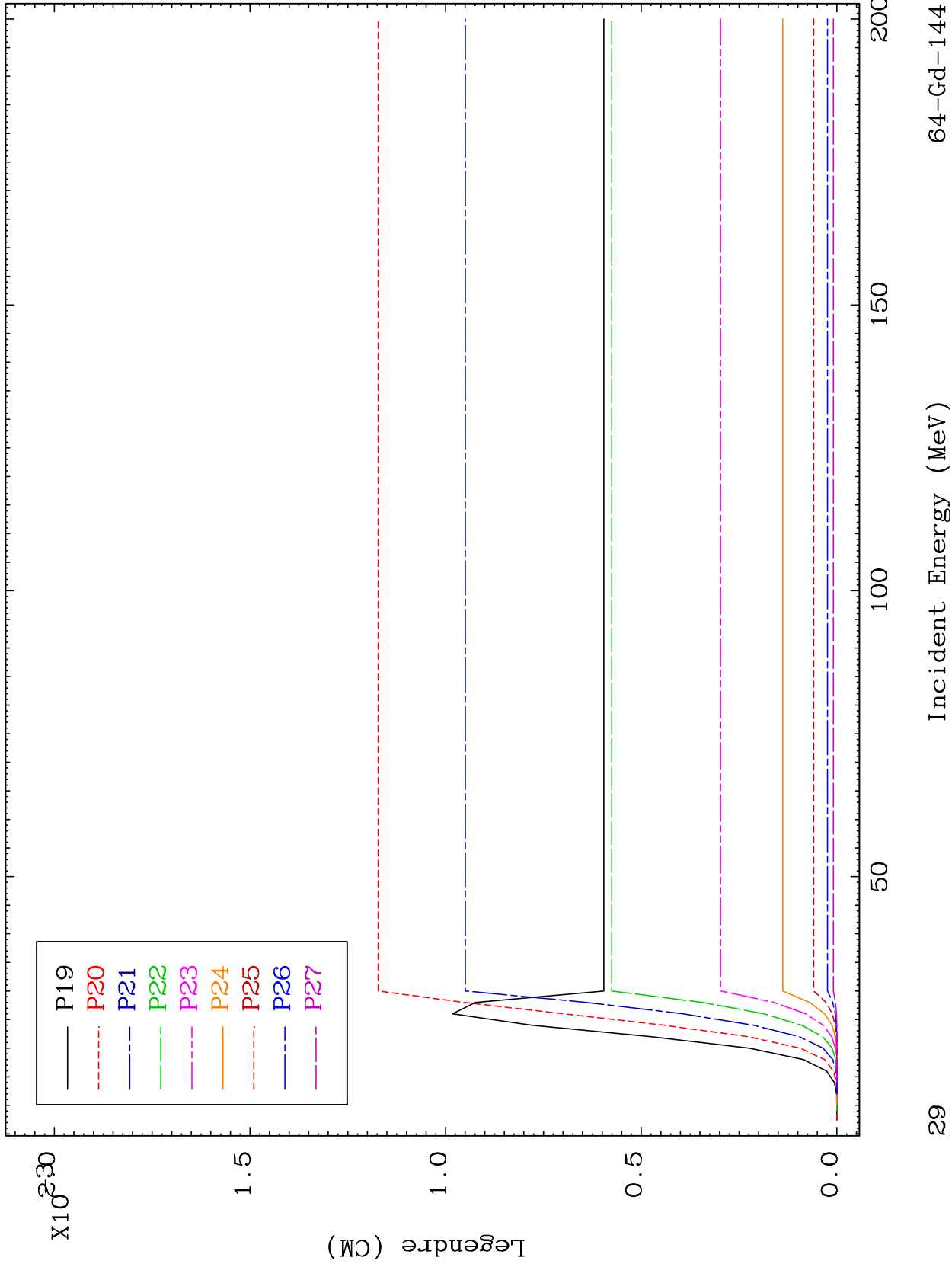
Incident Energy (MeV)

64-Gd-144





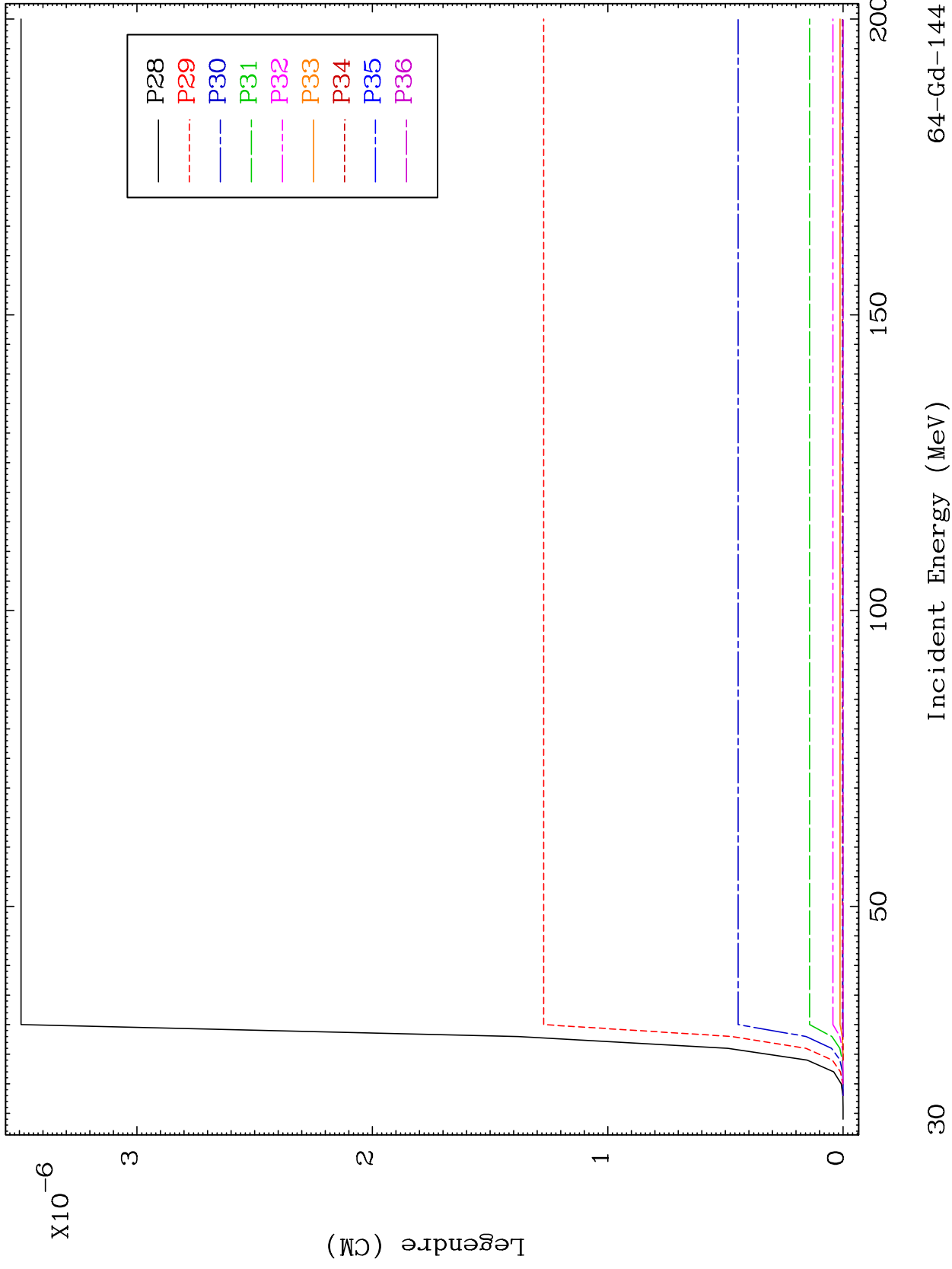




MAT 6401

1.745 MeV (n,n') Level  
Legendre Coefficients

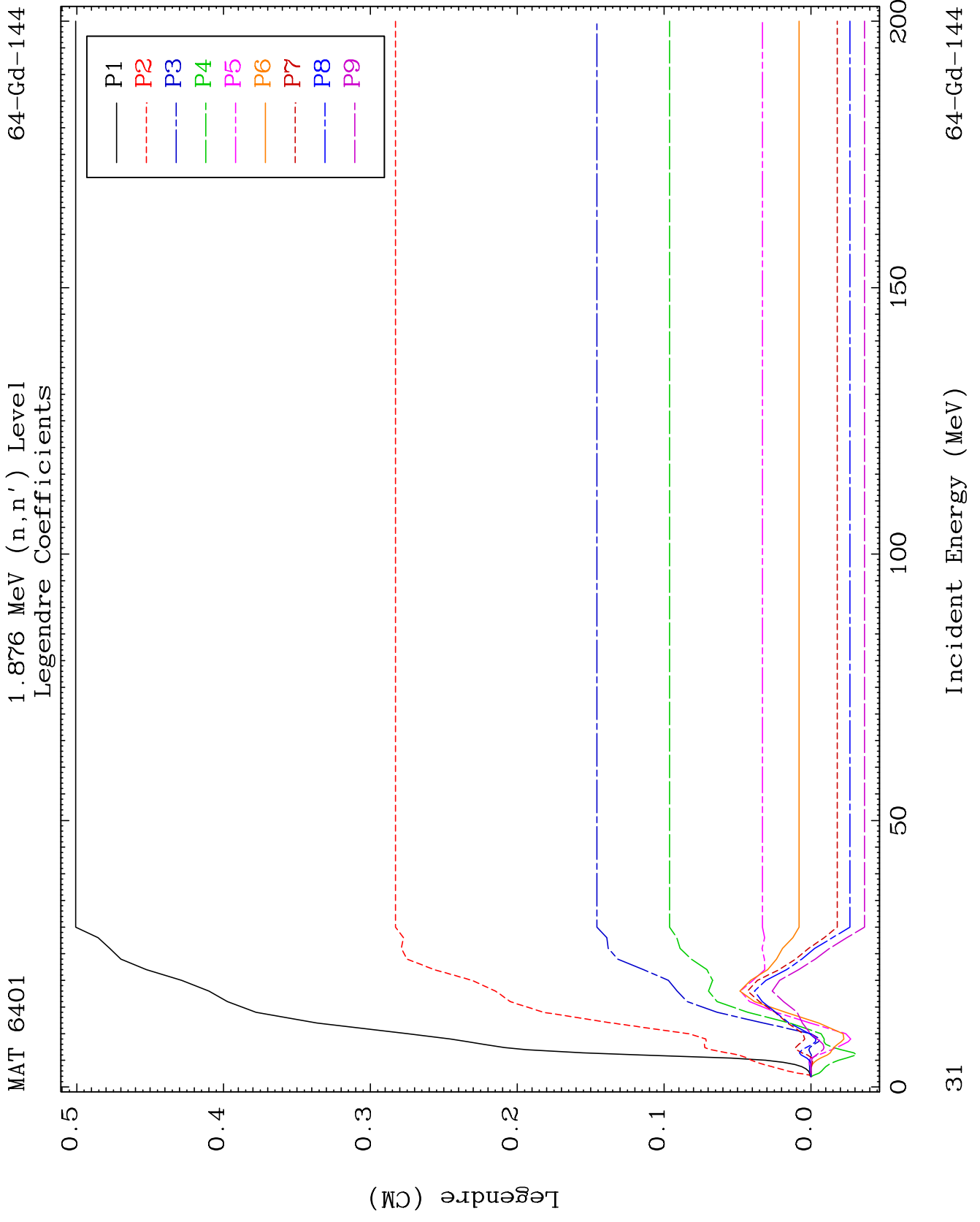
64-Gd-144



64-Gd-144

Incident Energy (MeV)

30

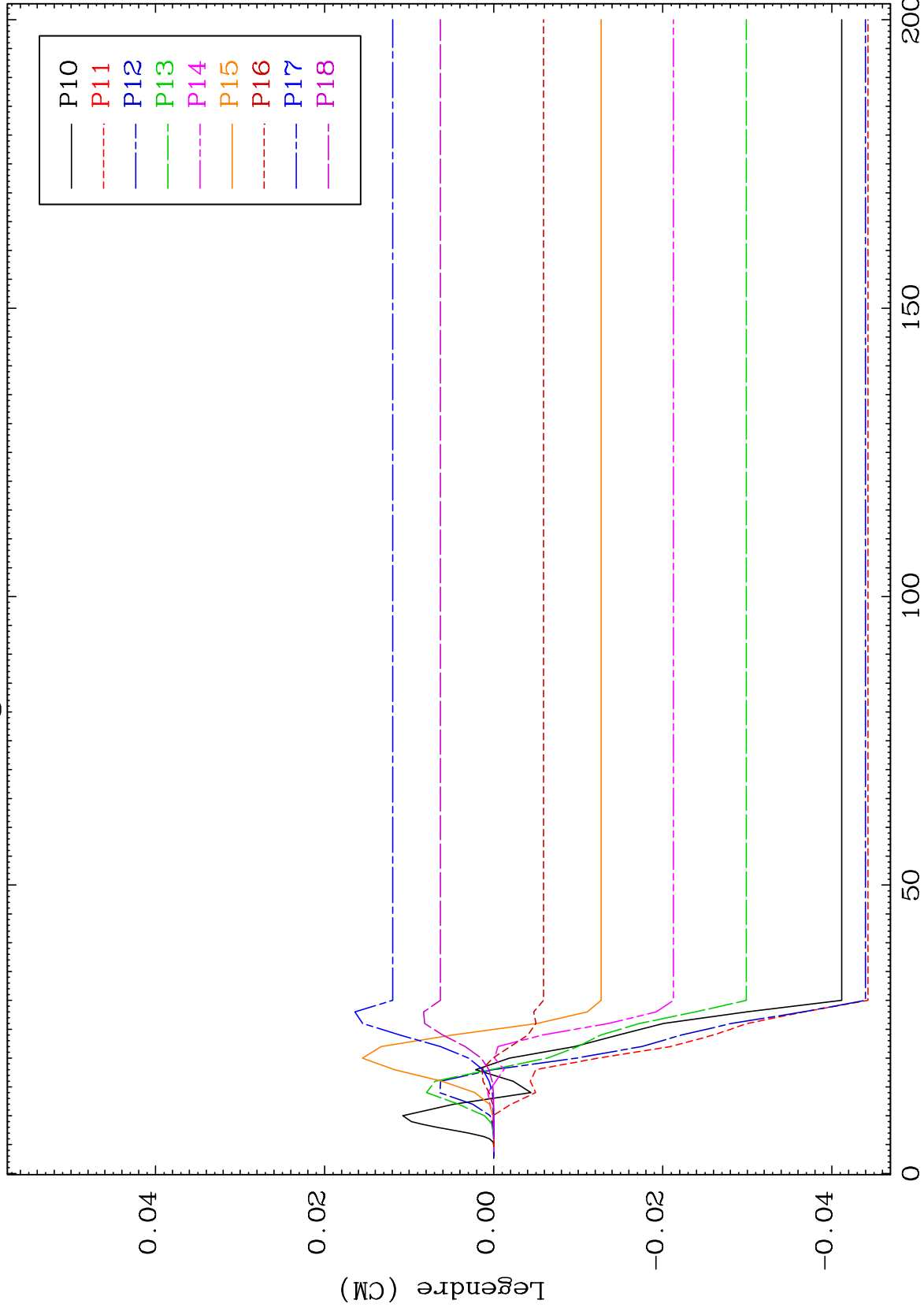




MAT 6401

1.876 MeV (n,n') Level  
Legendre Coefficients

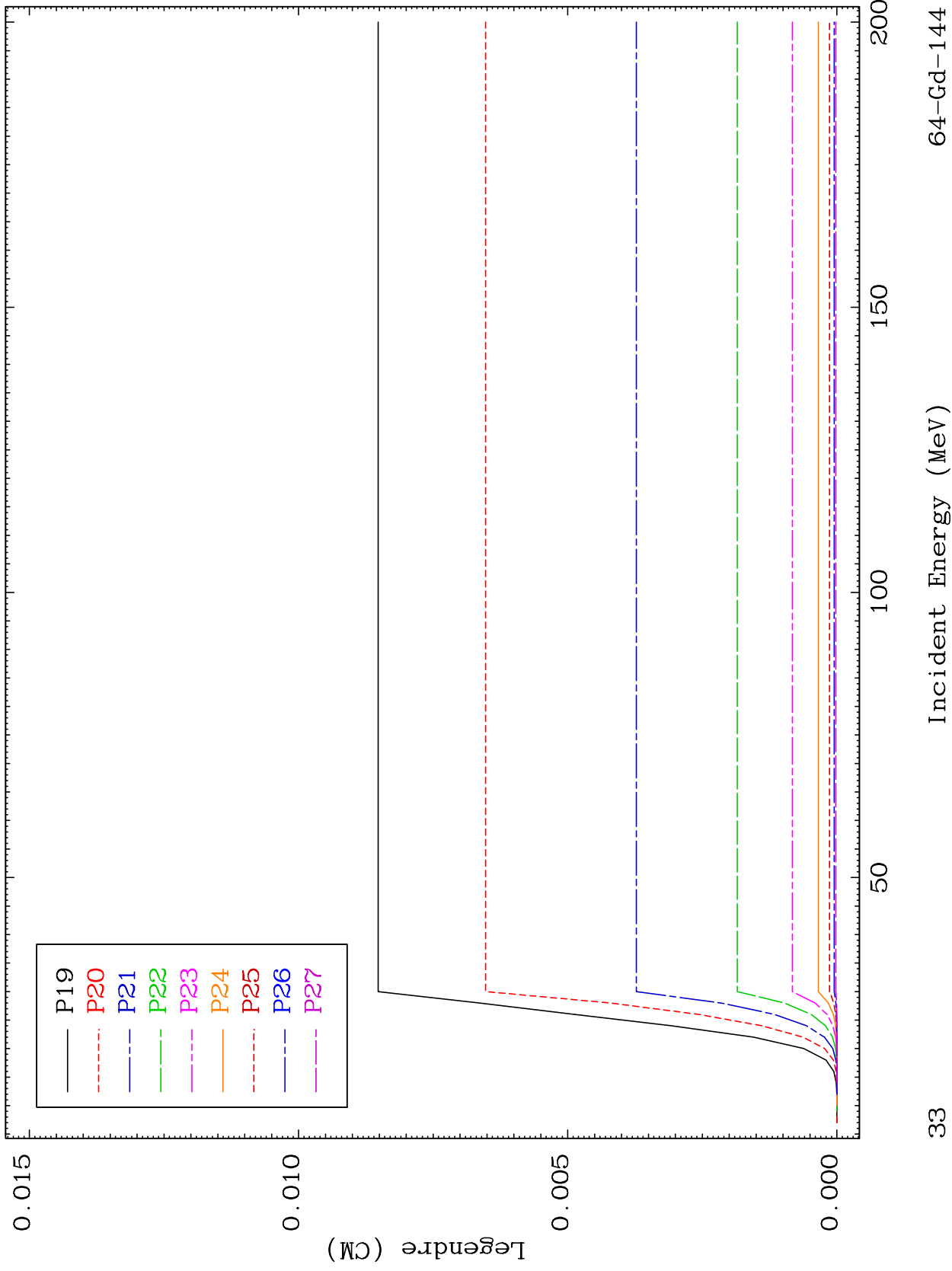
64-Gd-144



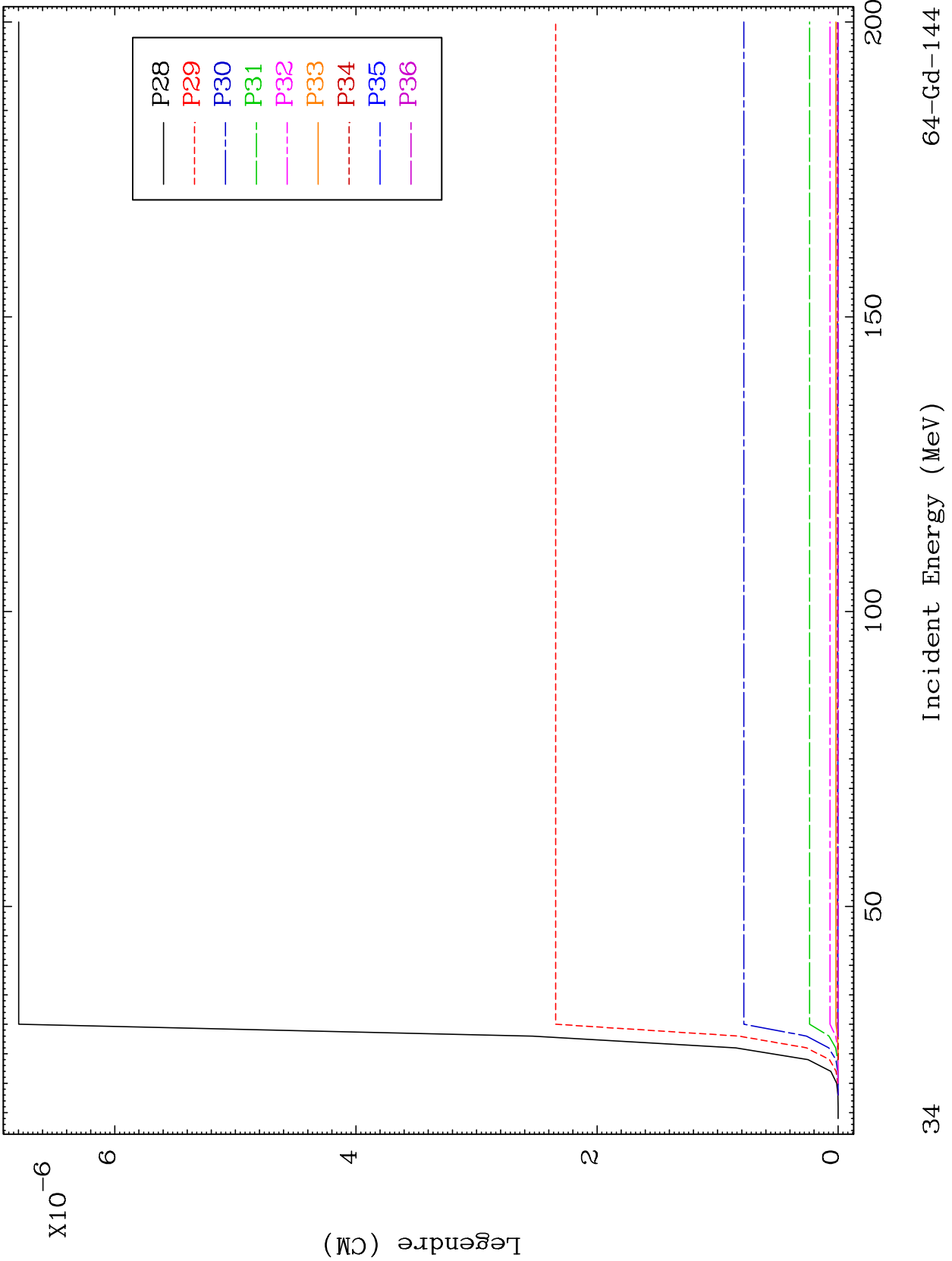
32

Incident Energy (MeV)

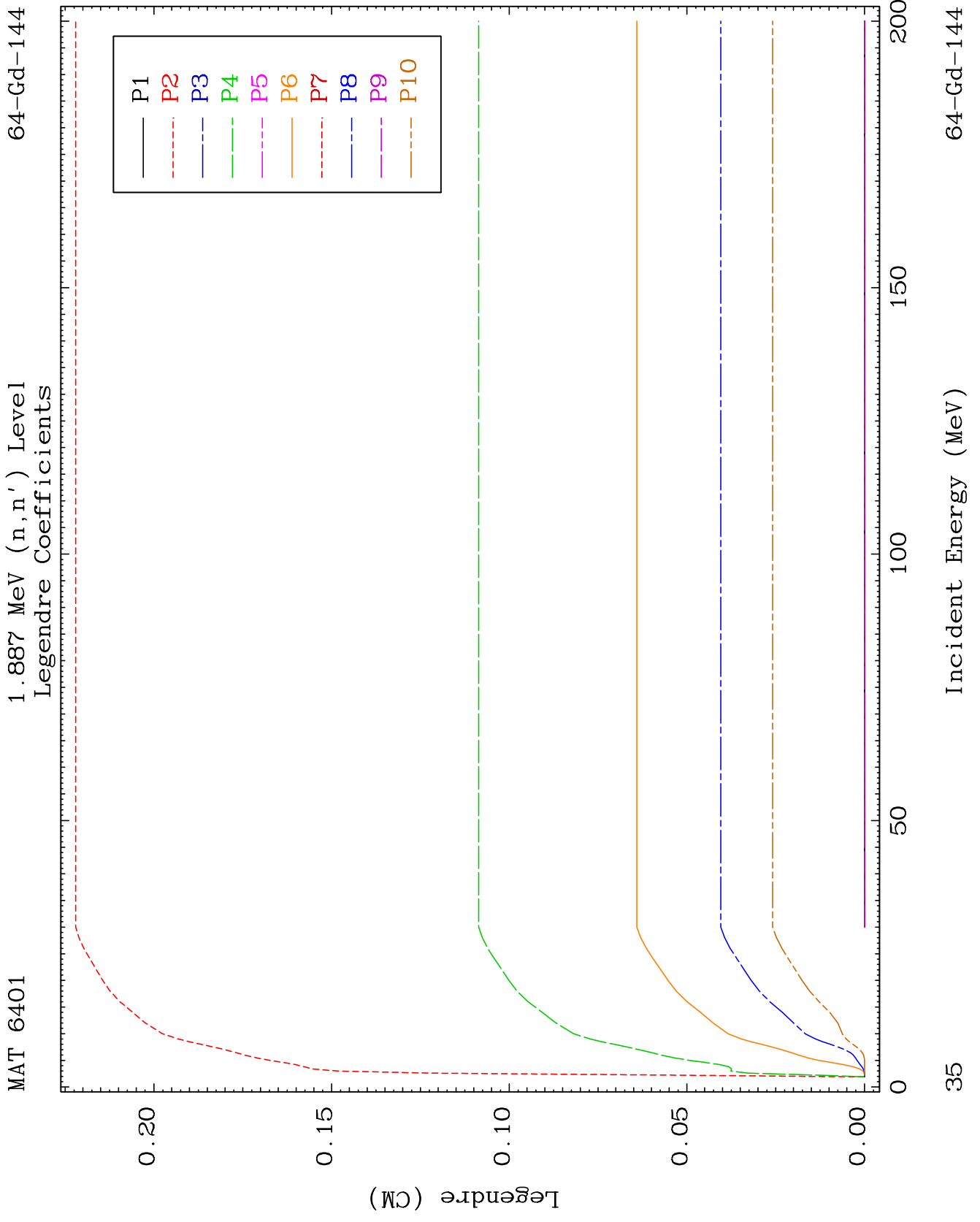
64-Gd-144

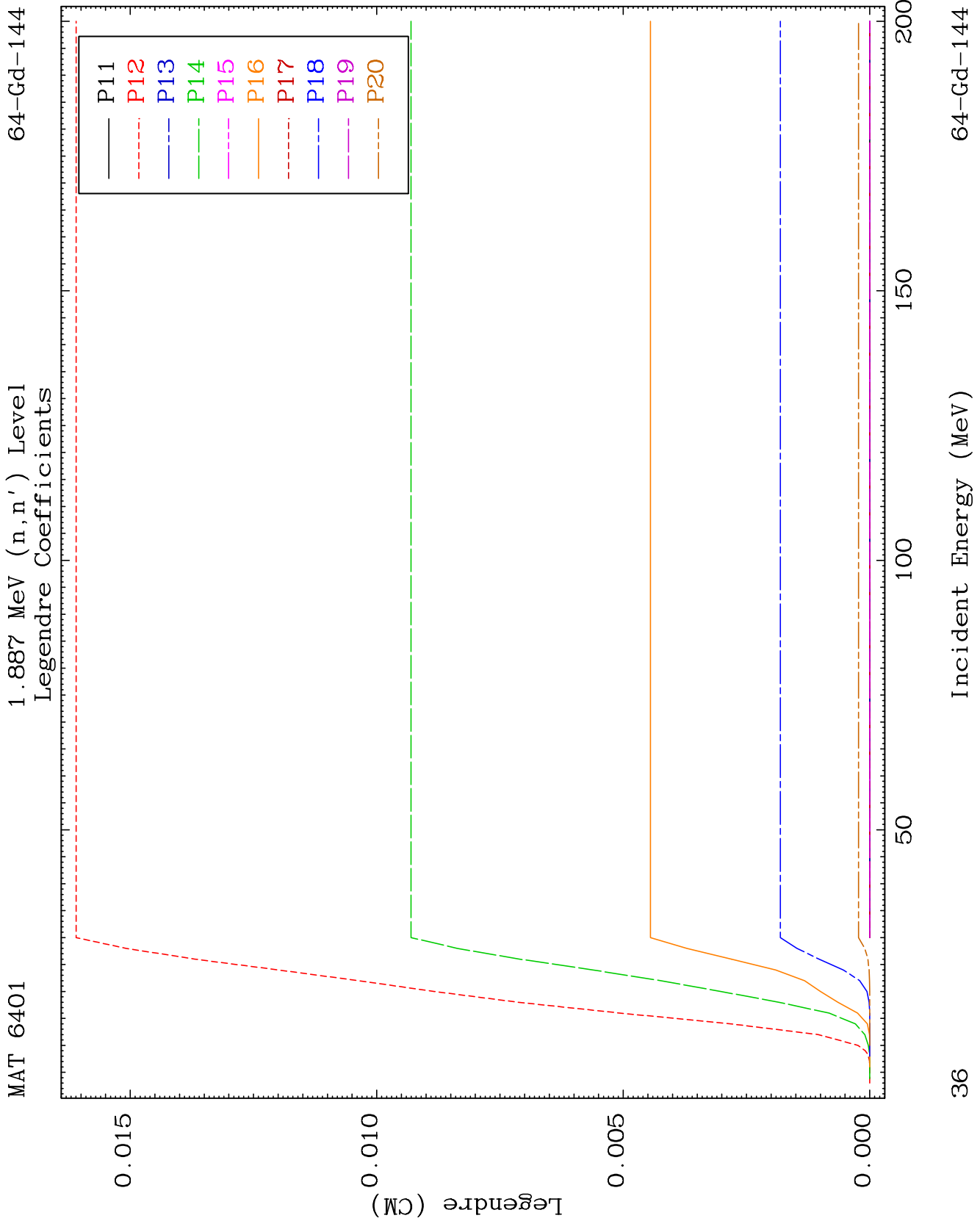


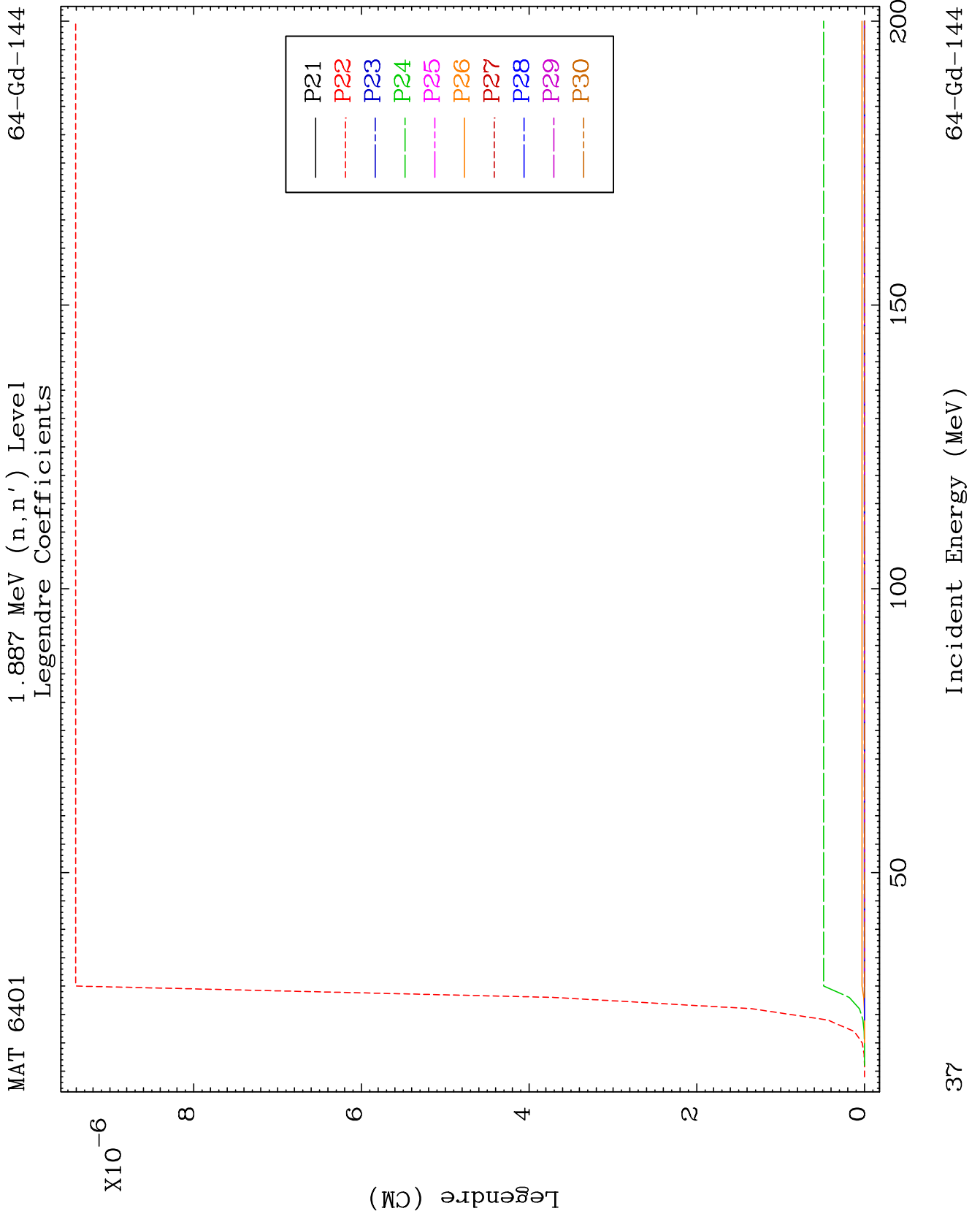
MAT 6401 1.876 MeV (n,n') Level Legendre Coefficients 64-Gd-144



34 50 100 150 200 64-Gd-144





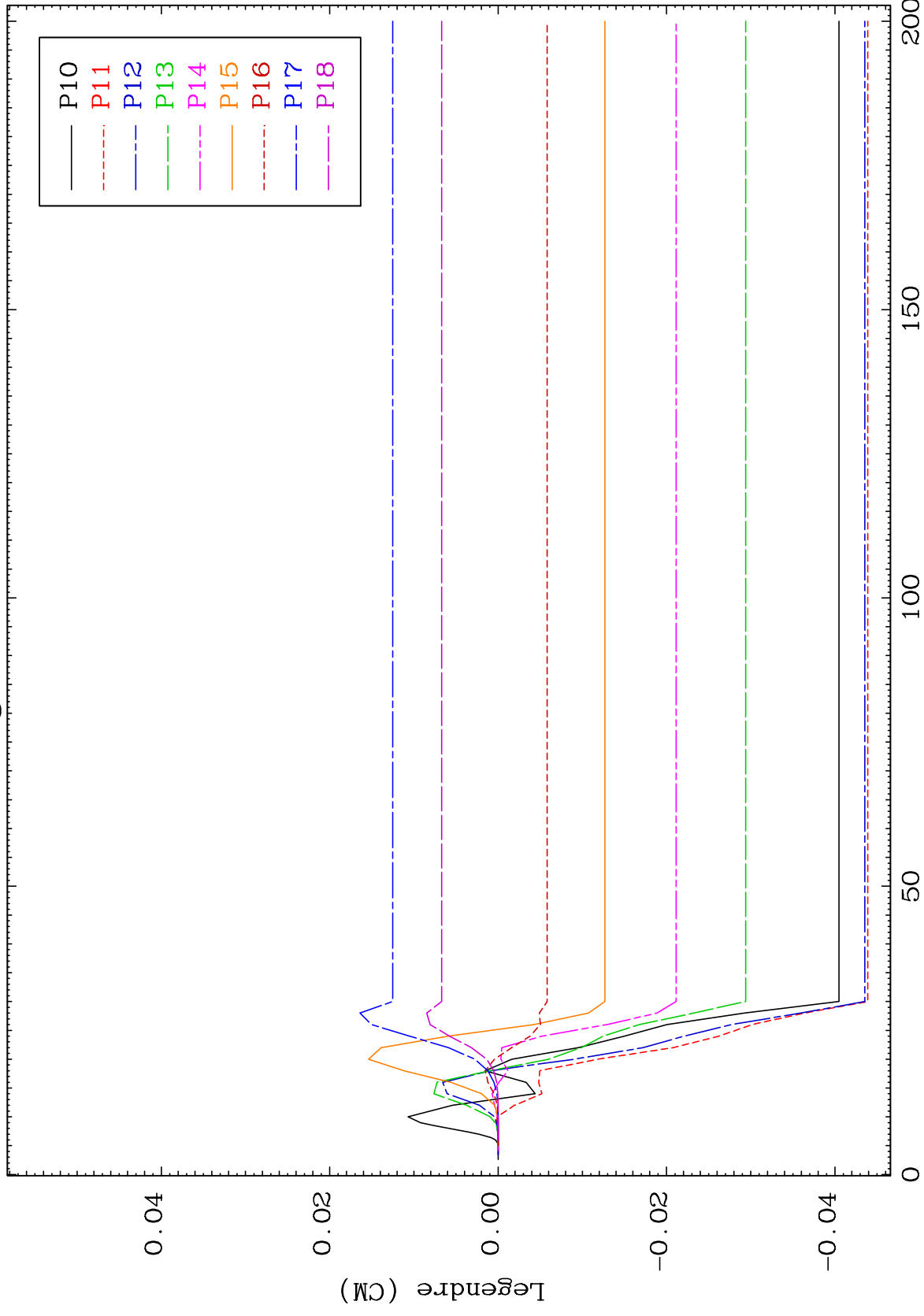




MAT 6401

2.227 MeV (n, n') Level  
Legendre Coefficients

64-Gd-144

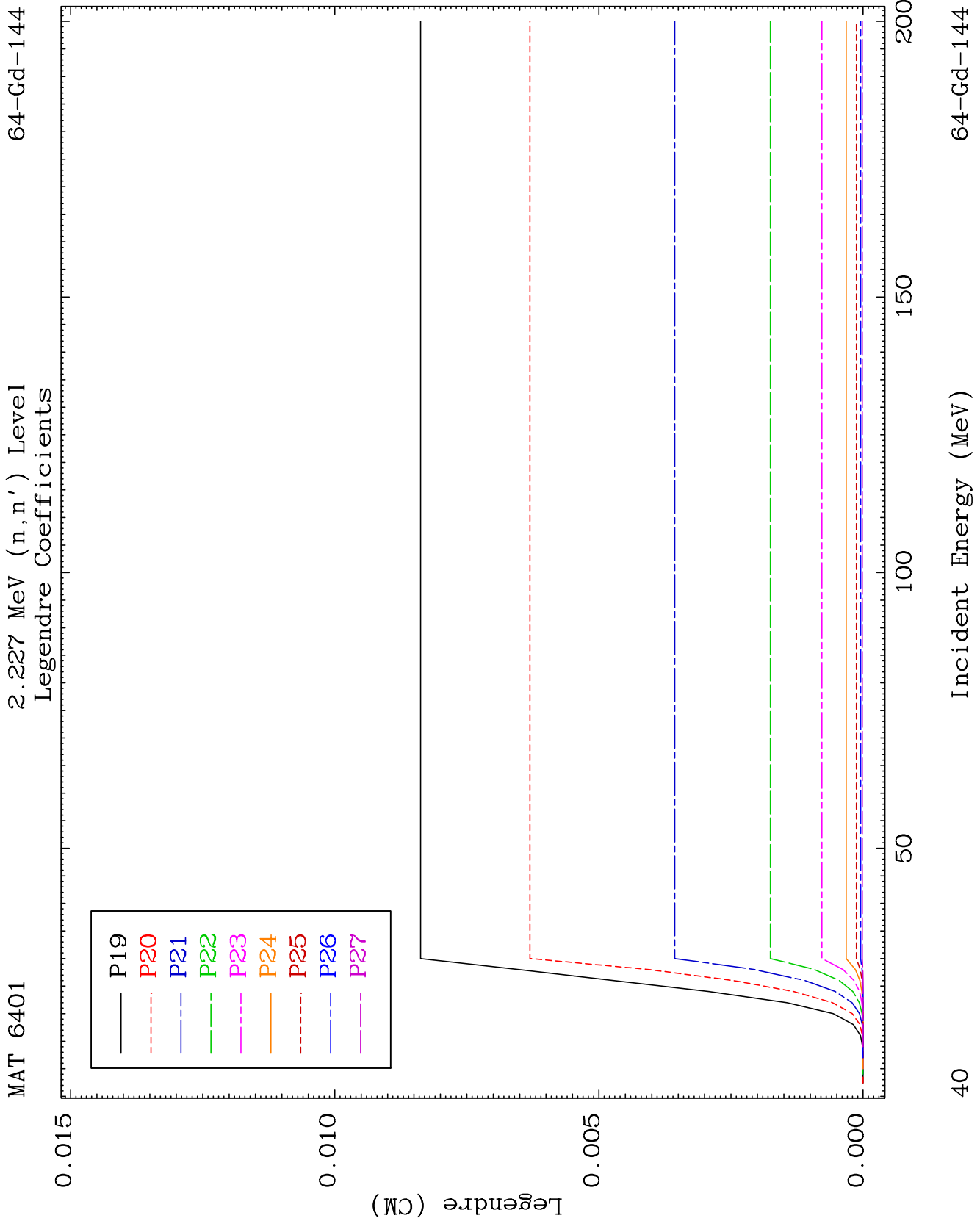


39

Incident Energy (MeV)

64-Gd-144

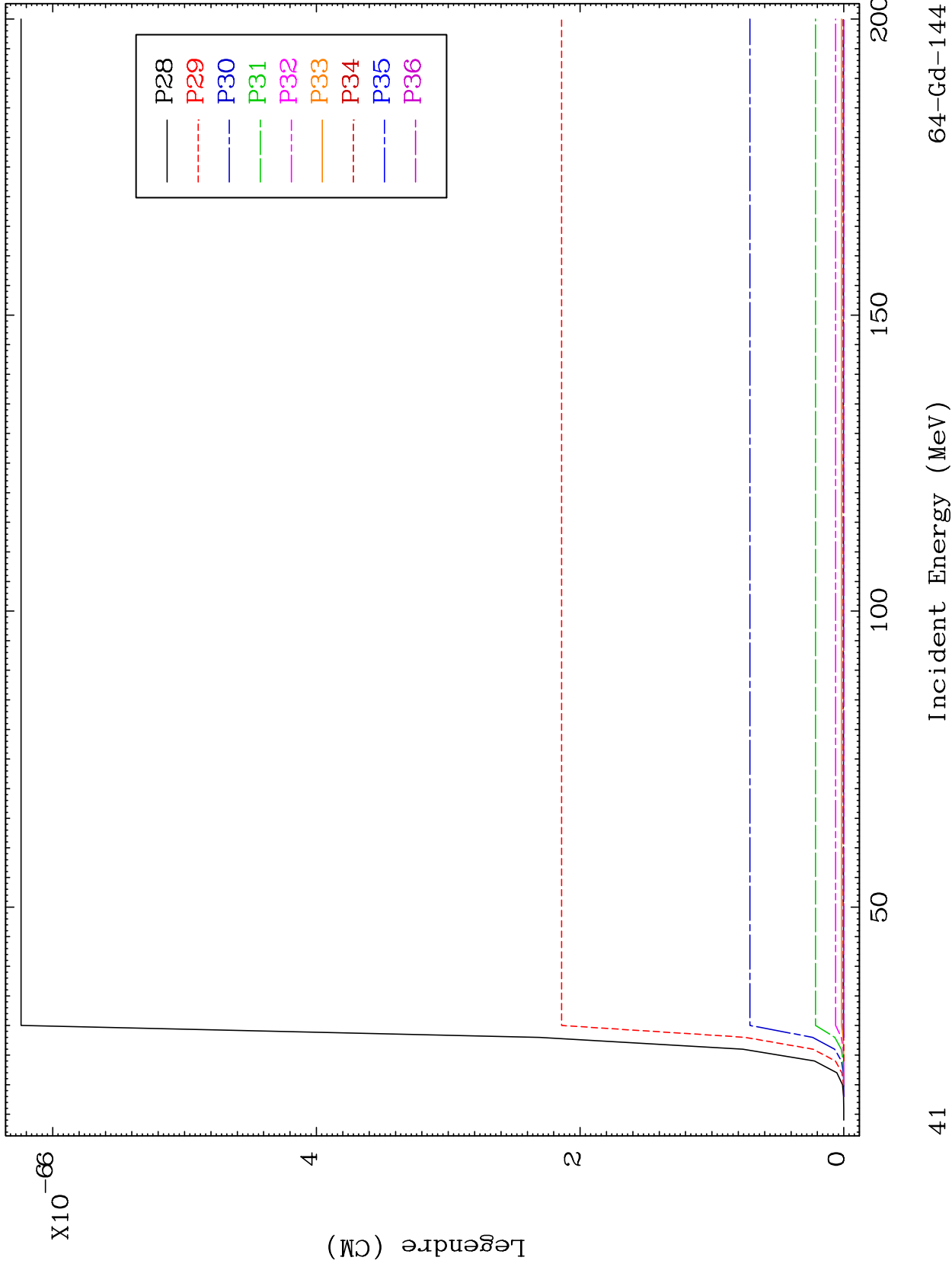




MAT 6401

2.227 MeV (n, n') Level  
Legendre Coefficients

64-Gd-144

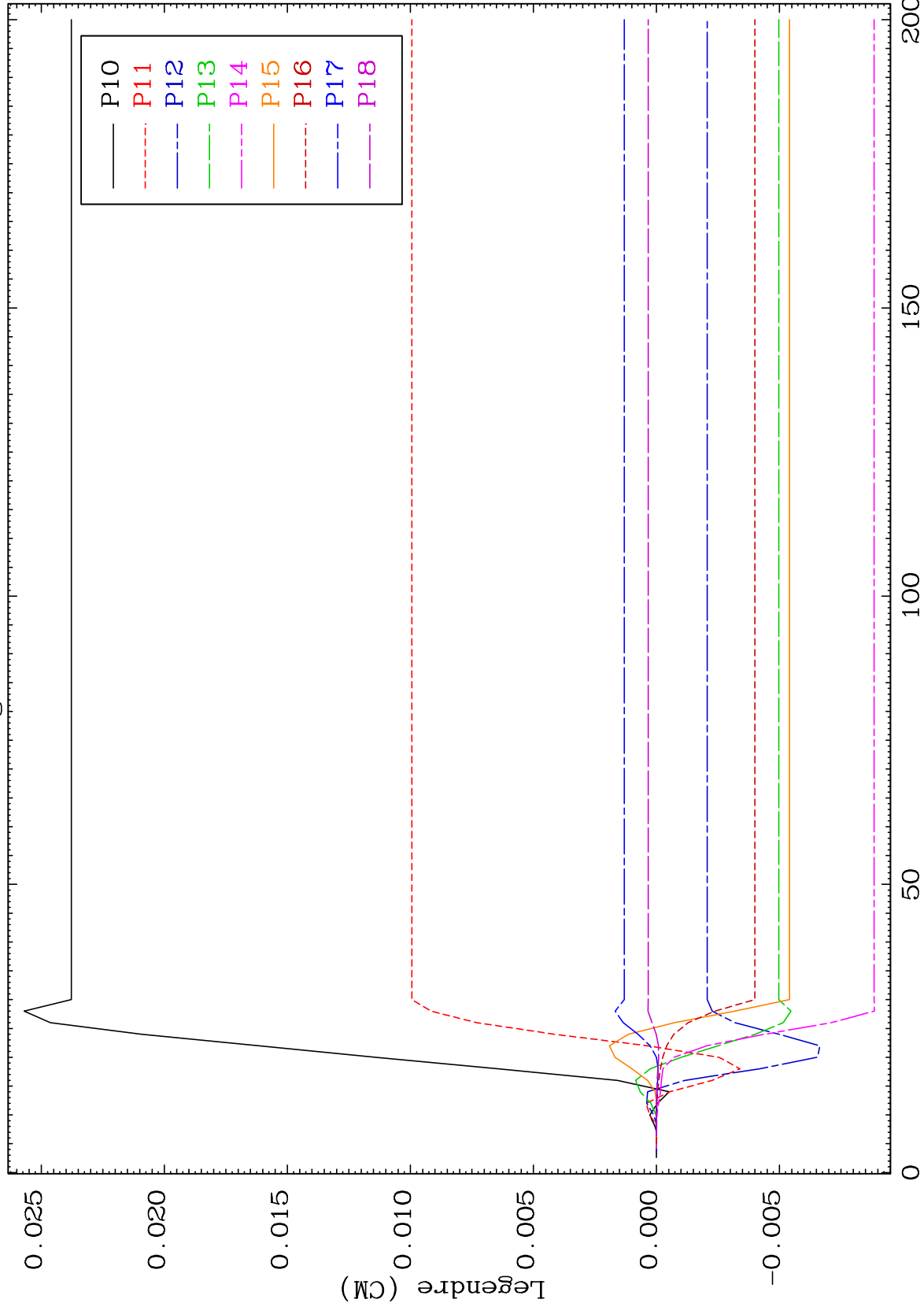




MAT 6401

2.303 MeV (n, n') Level  
Legendre Coefficients

64-Gd-144



43

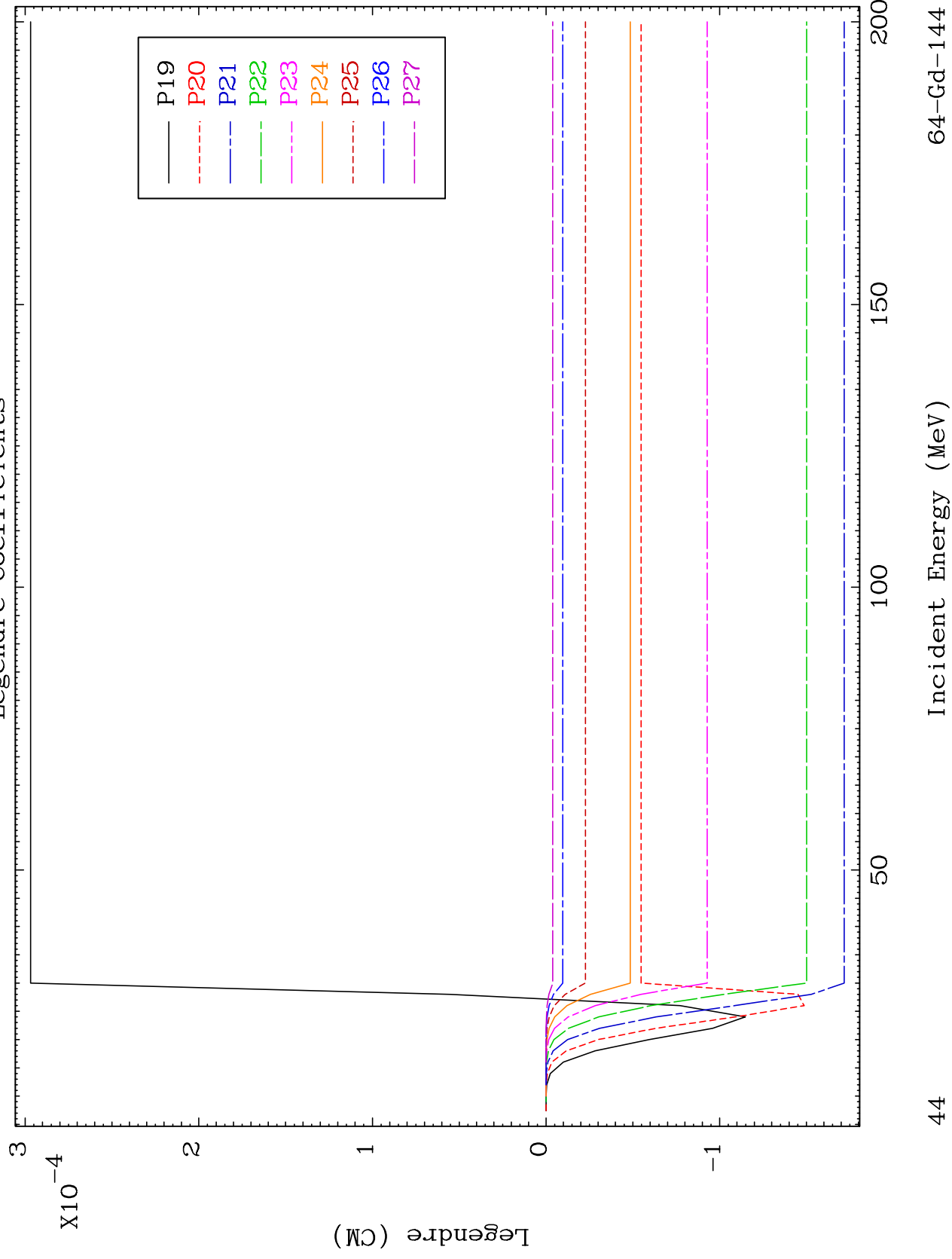
Incident Energy (MeV)

64-Gd-144

MAT 6401

2.303 MeV (n,n') Level  
Legendre Coefficients

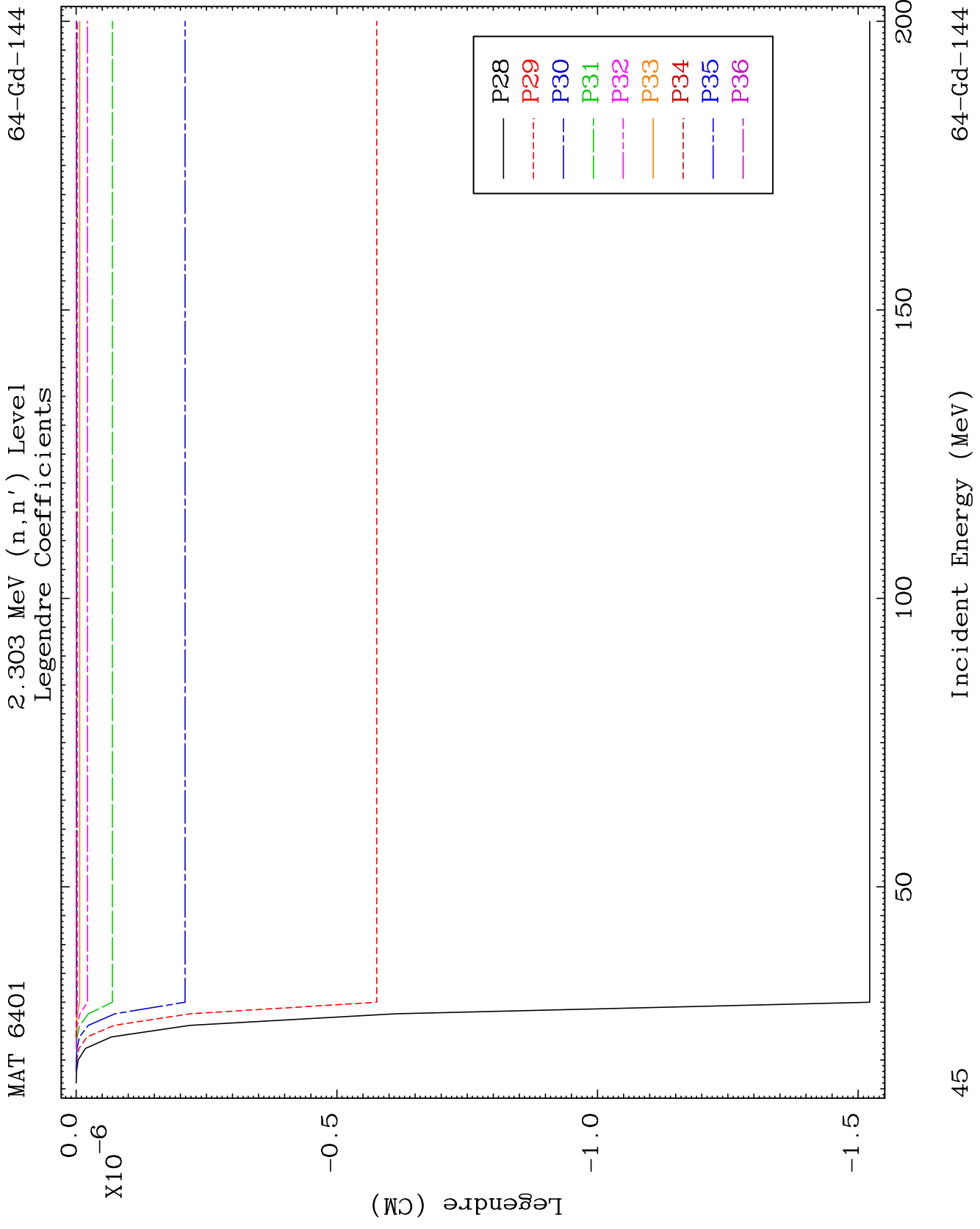
64-Gd-144



44

Incident Energy (MeV)

64-Gd-144

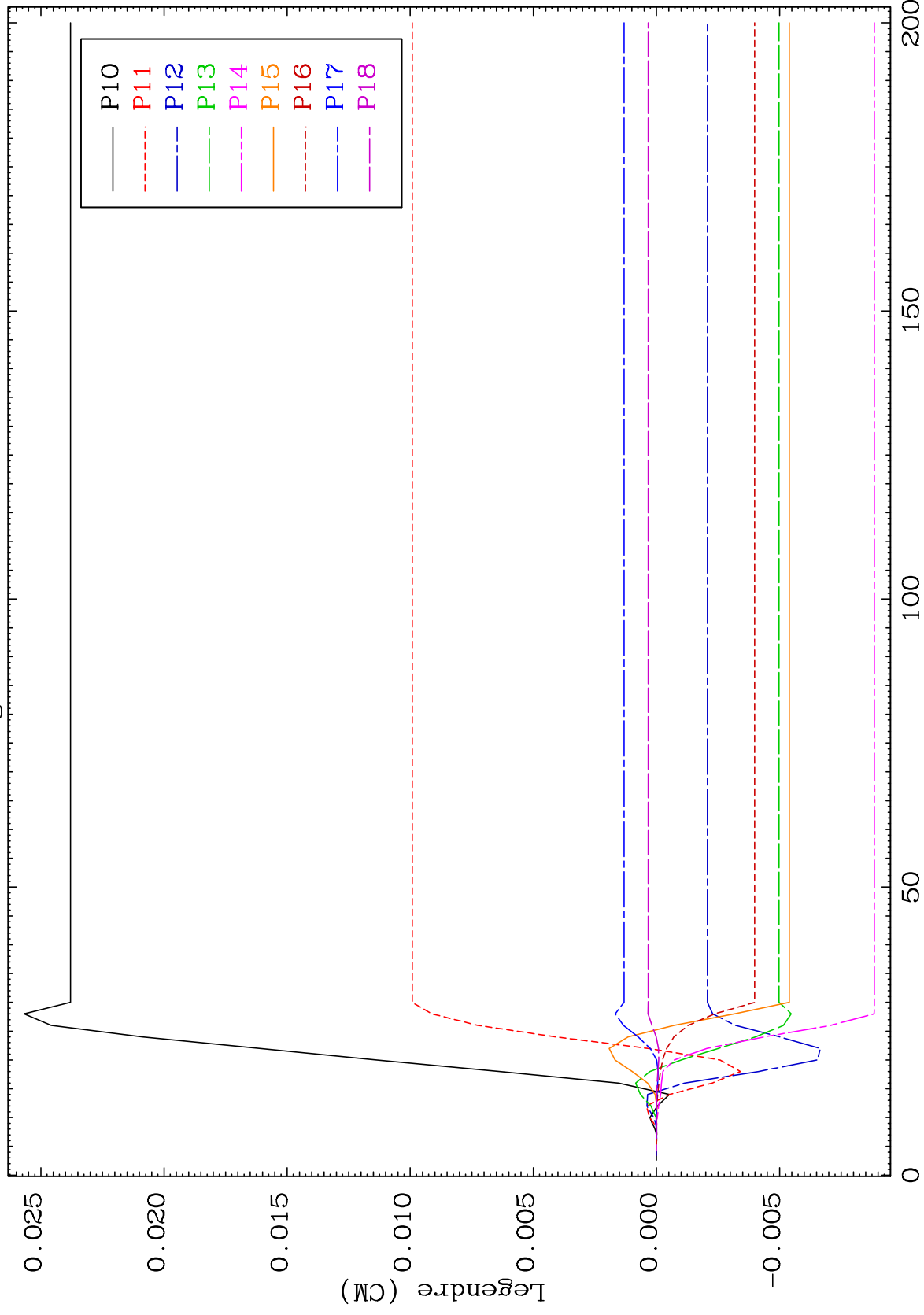




MAT 6401

2.330 MeV (n,n') Level  
Legendre Coefficients

64-Gd-144



47

Incident Energy (MeV)

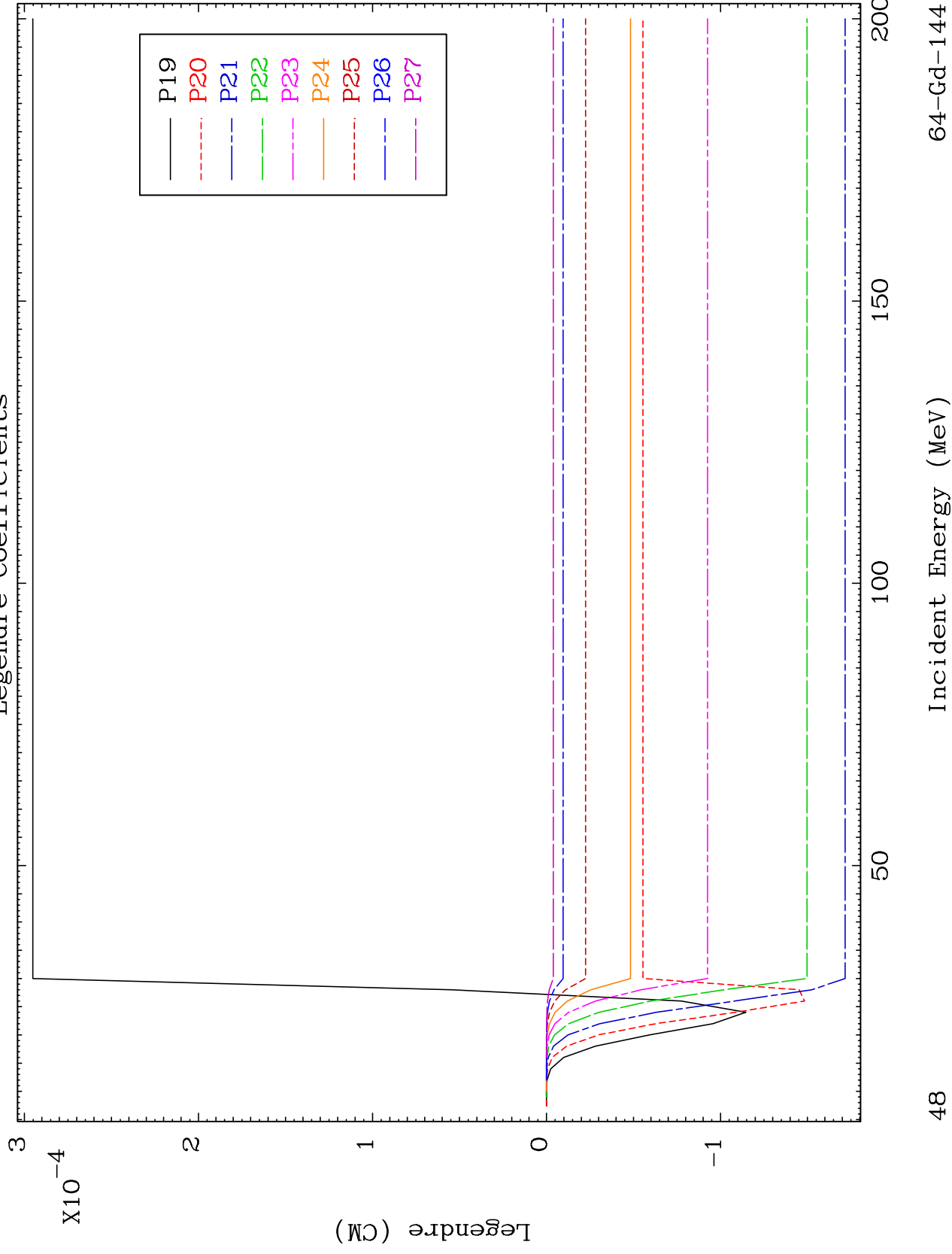
64-Gd-144



MAT 6401

2.330 MeV (n,n') Level  
Legendre Coefficients

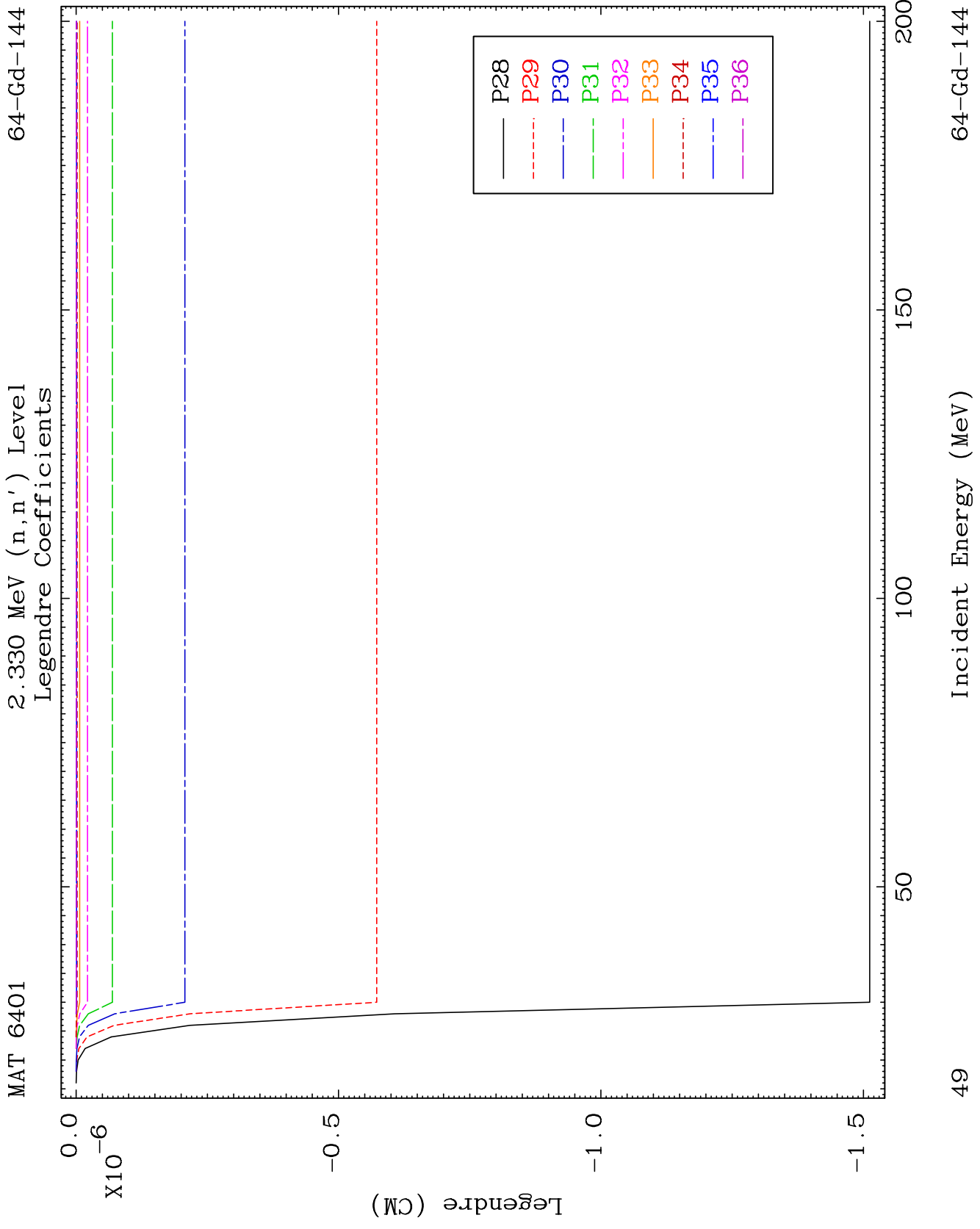
64-Gd-144

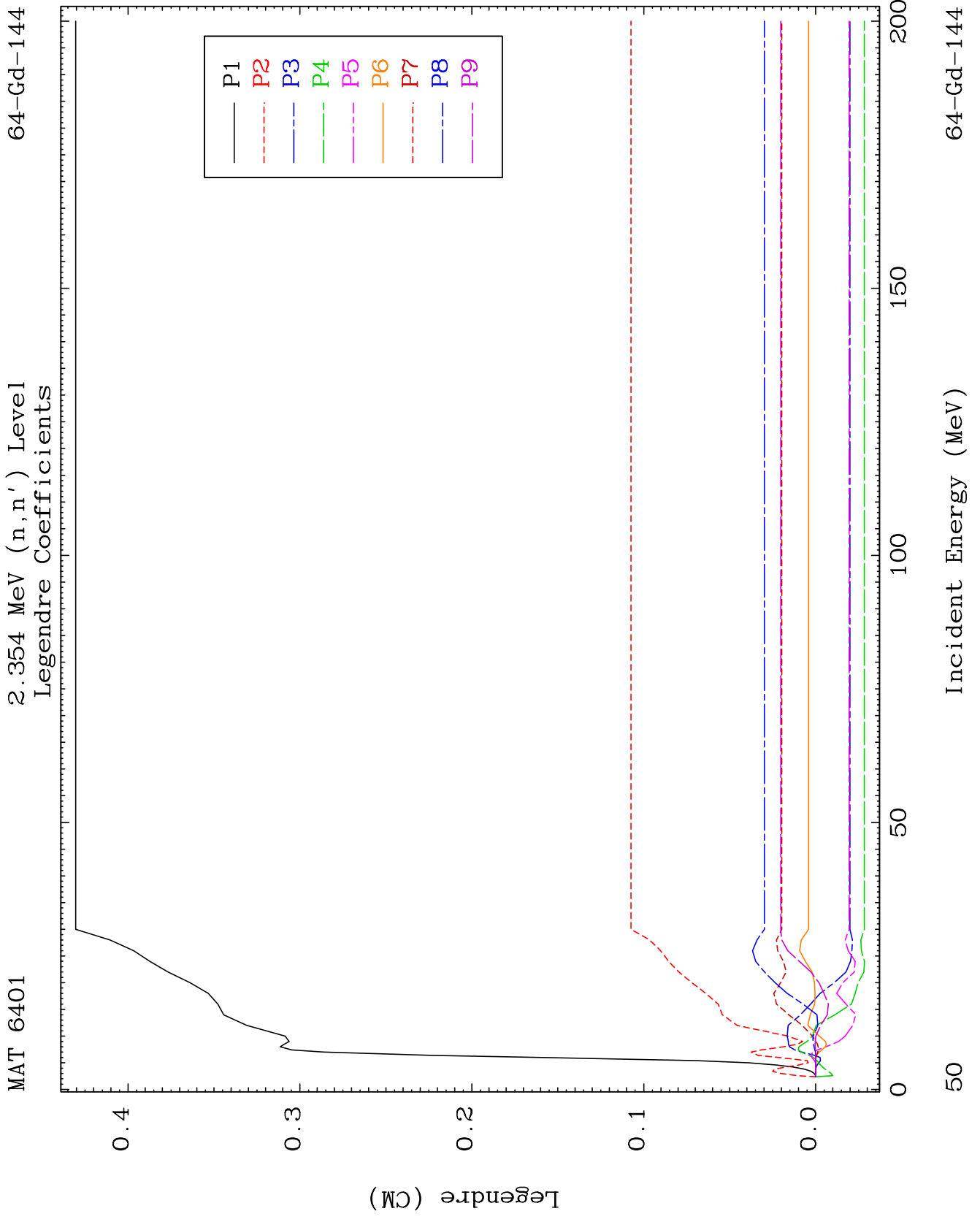


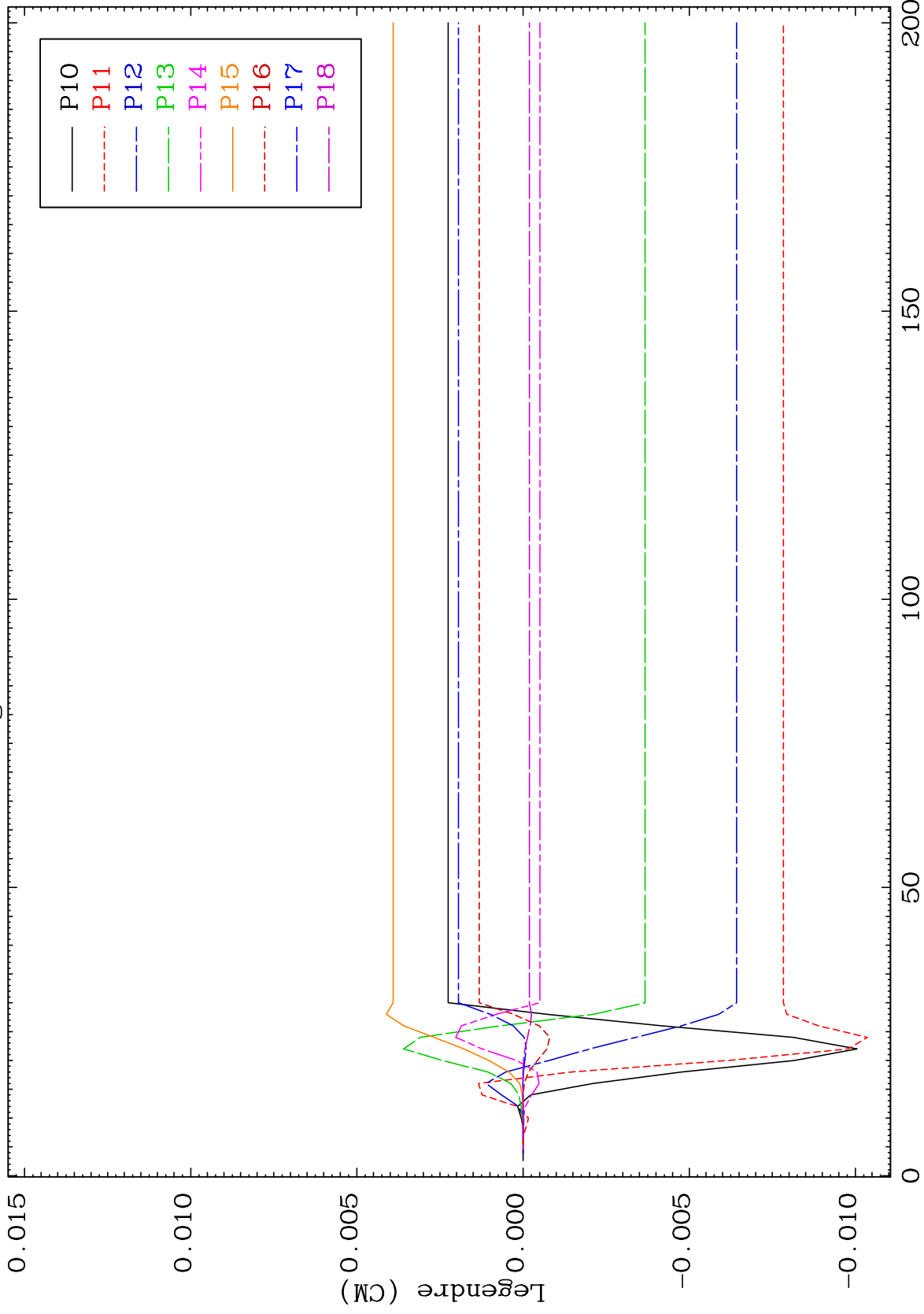
48

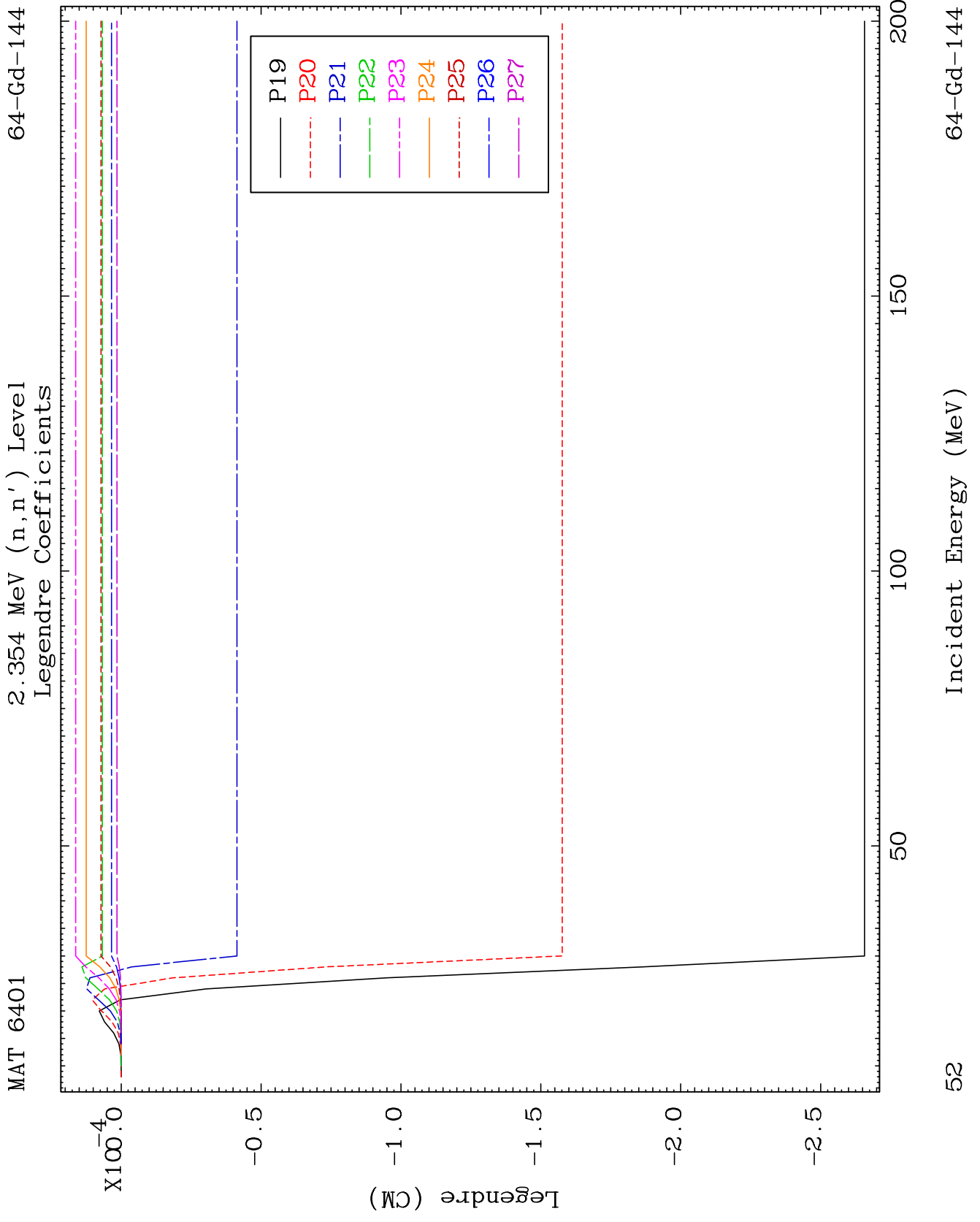
Incident Energy (MeV)

64-Gd-144





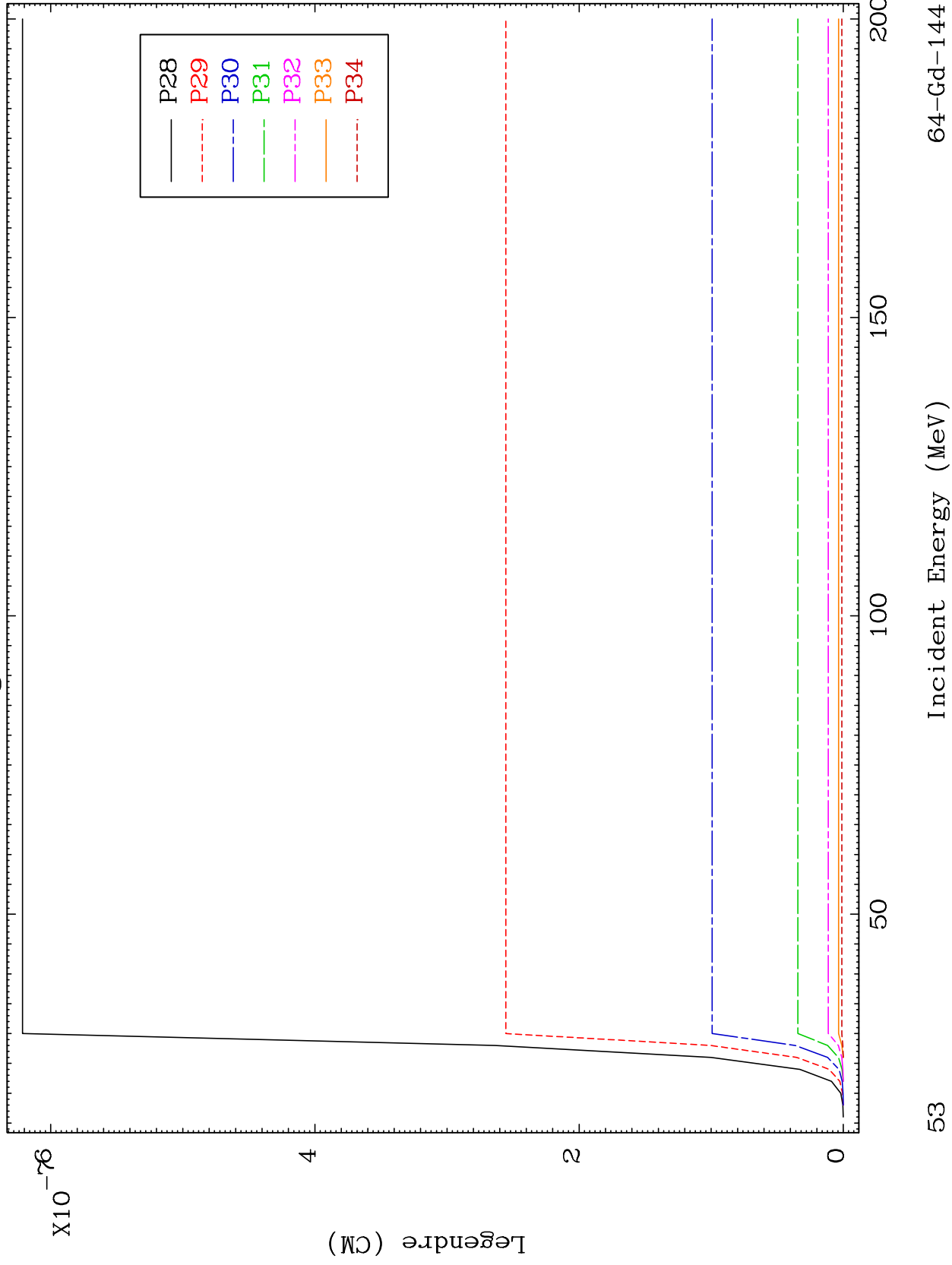




MAT 6401

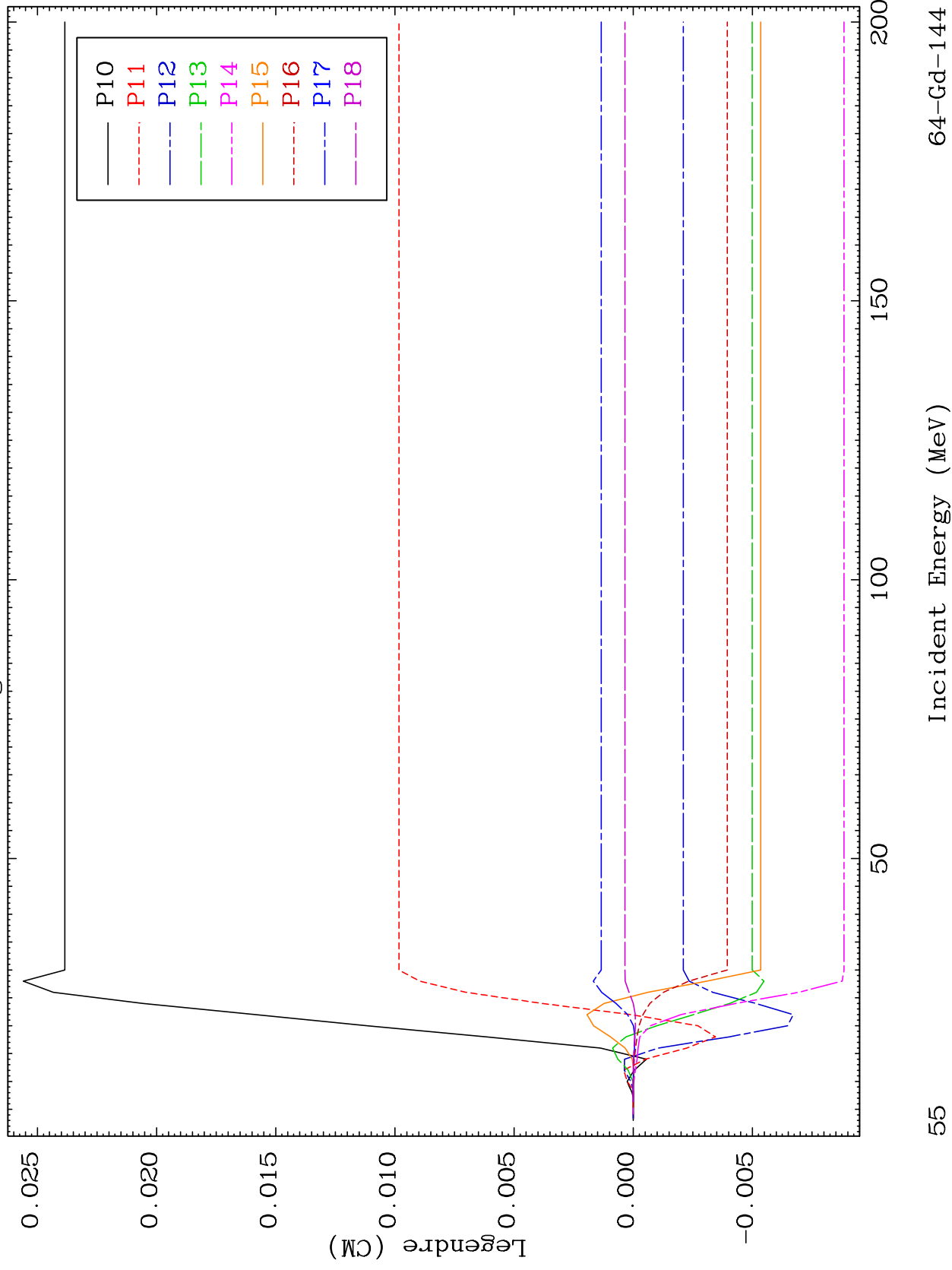
2.354 MeV (n,n') Level  
Legendre Coefficients

64-Gd-144

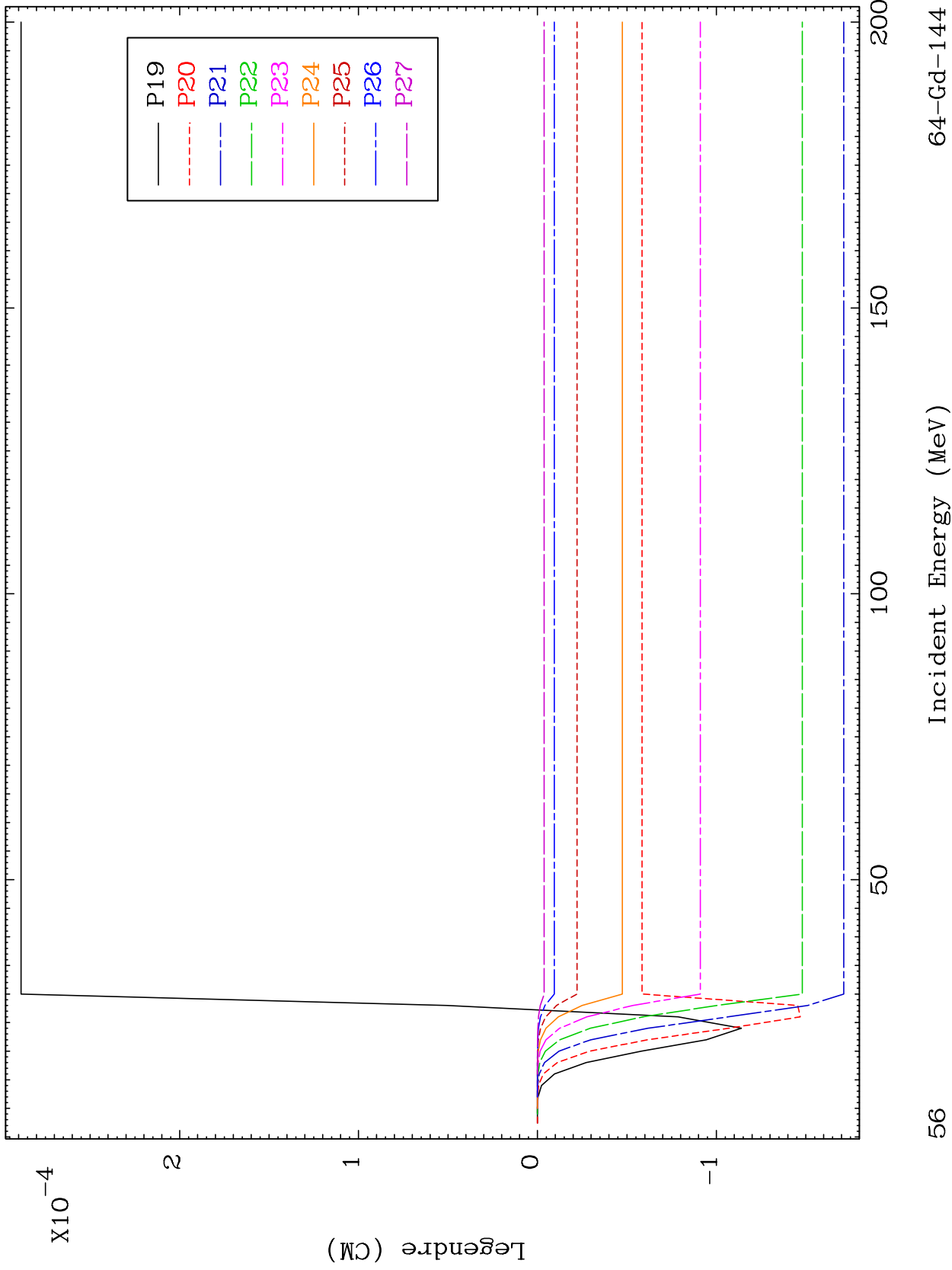


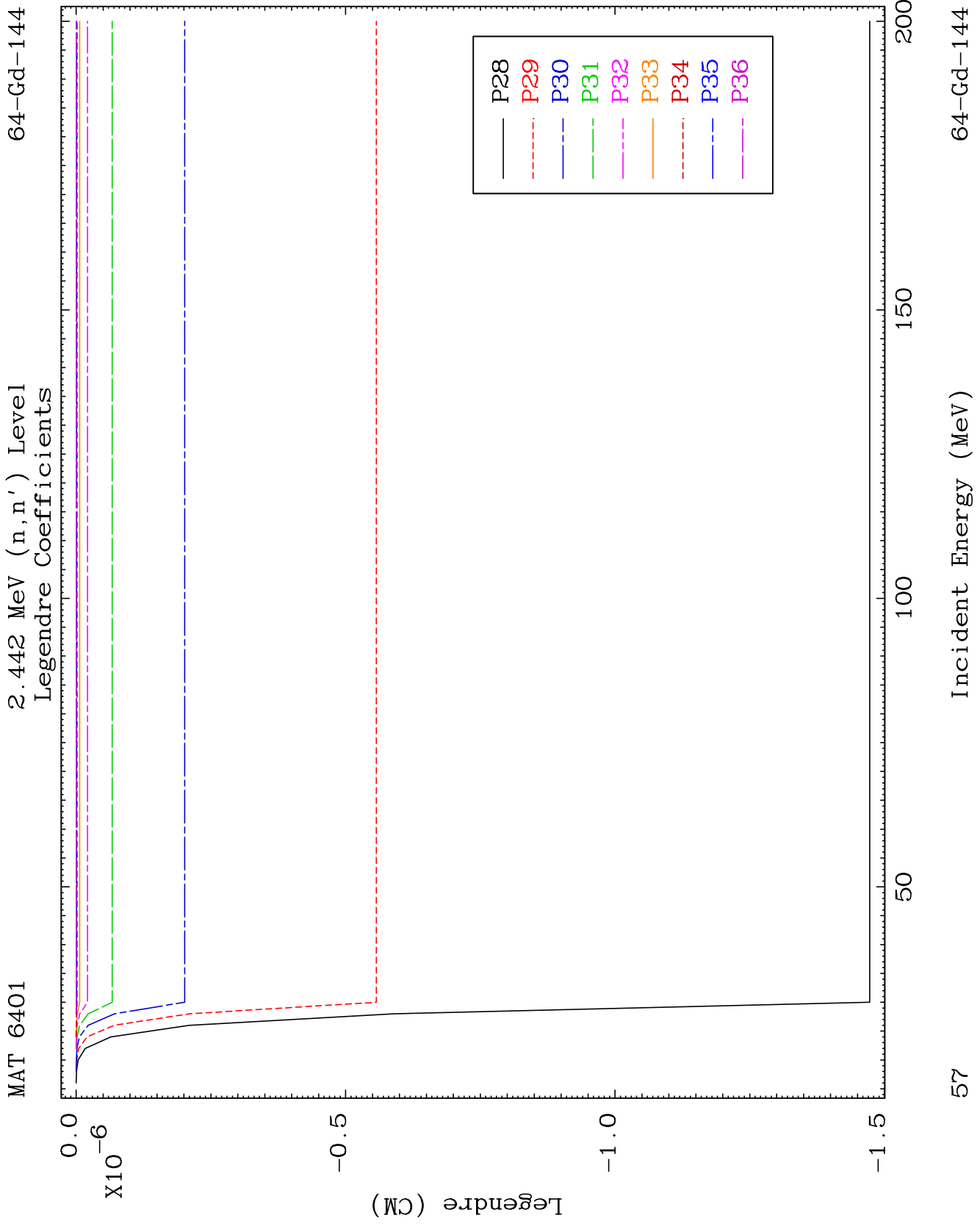
53

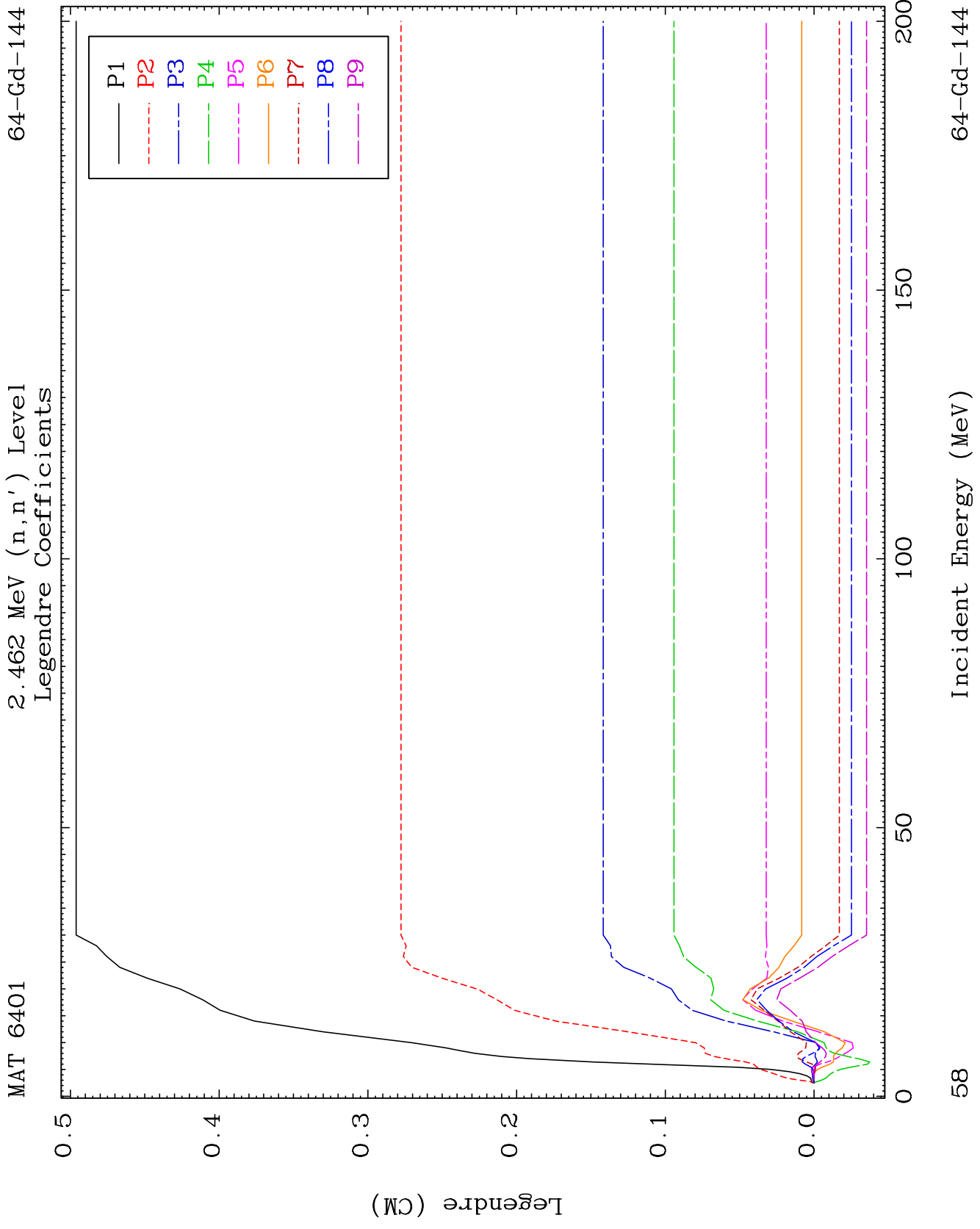


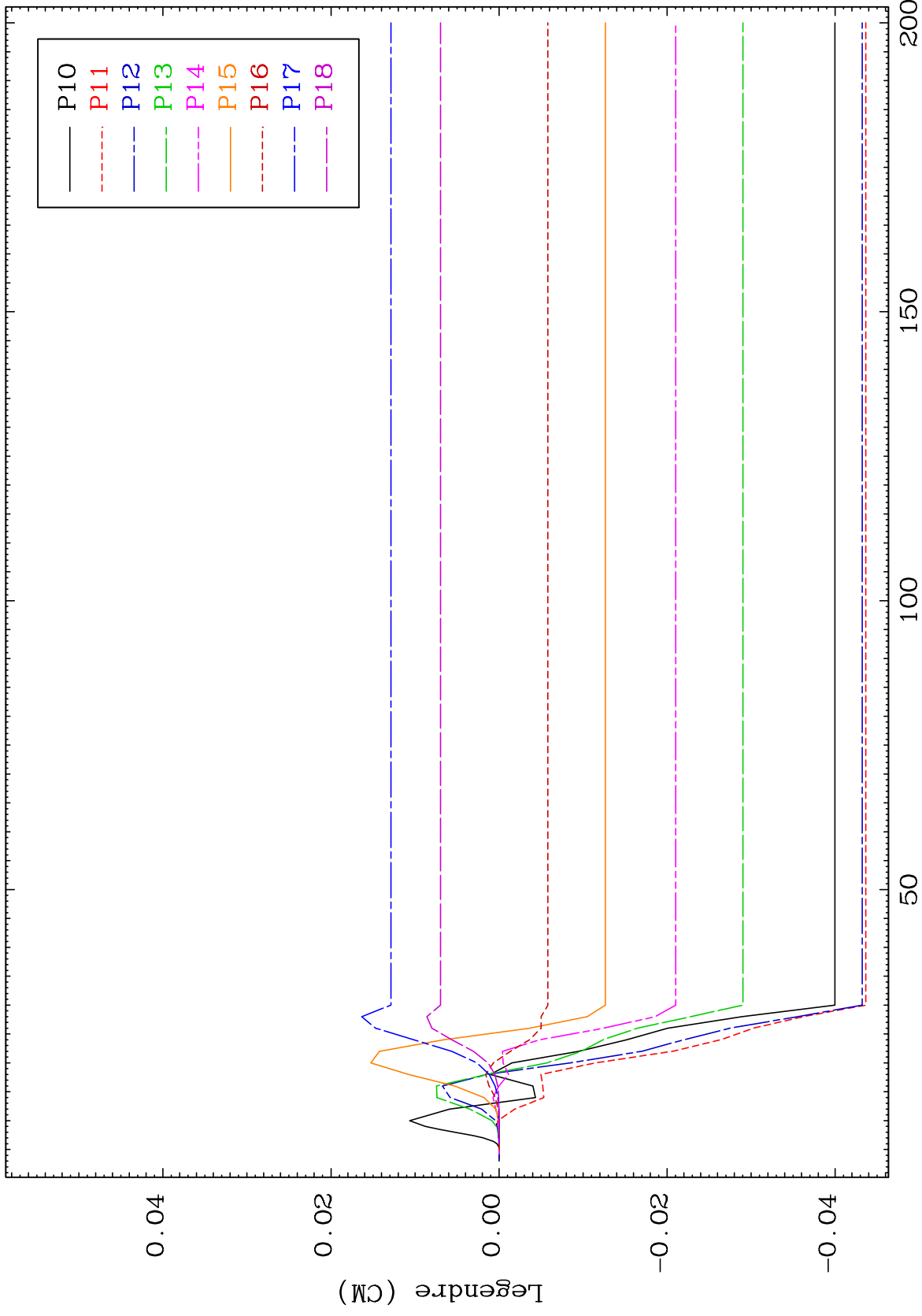








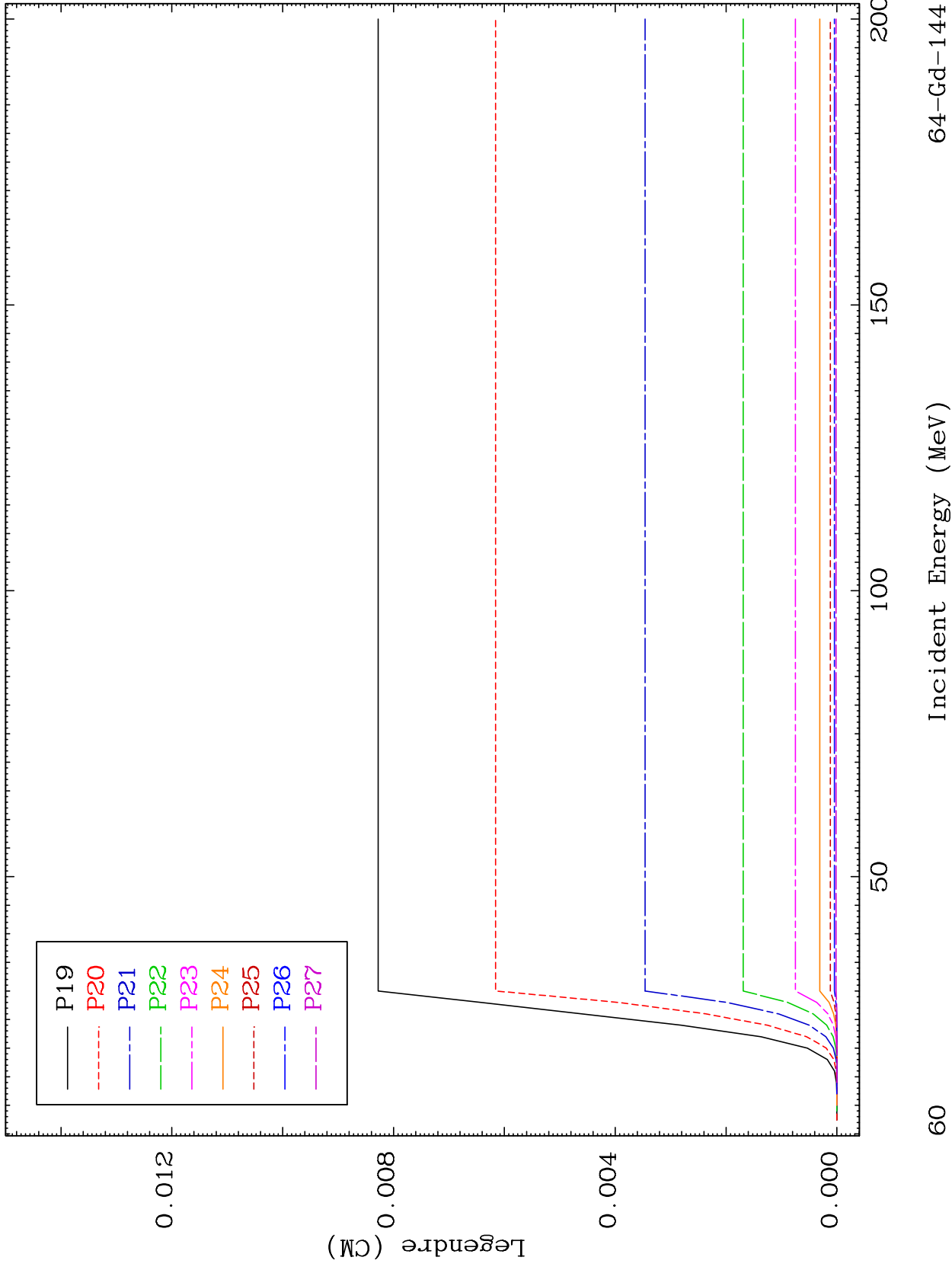




MAT 6401

2.462 MeV (n,n') Level  
Legendre Coefficients

64-Gd-144



64-Gd-144

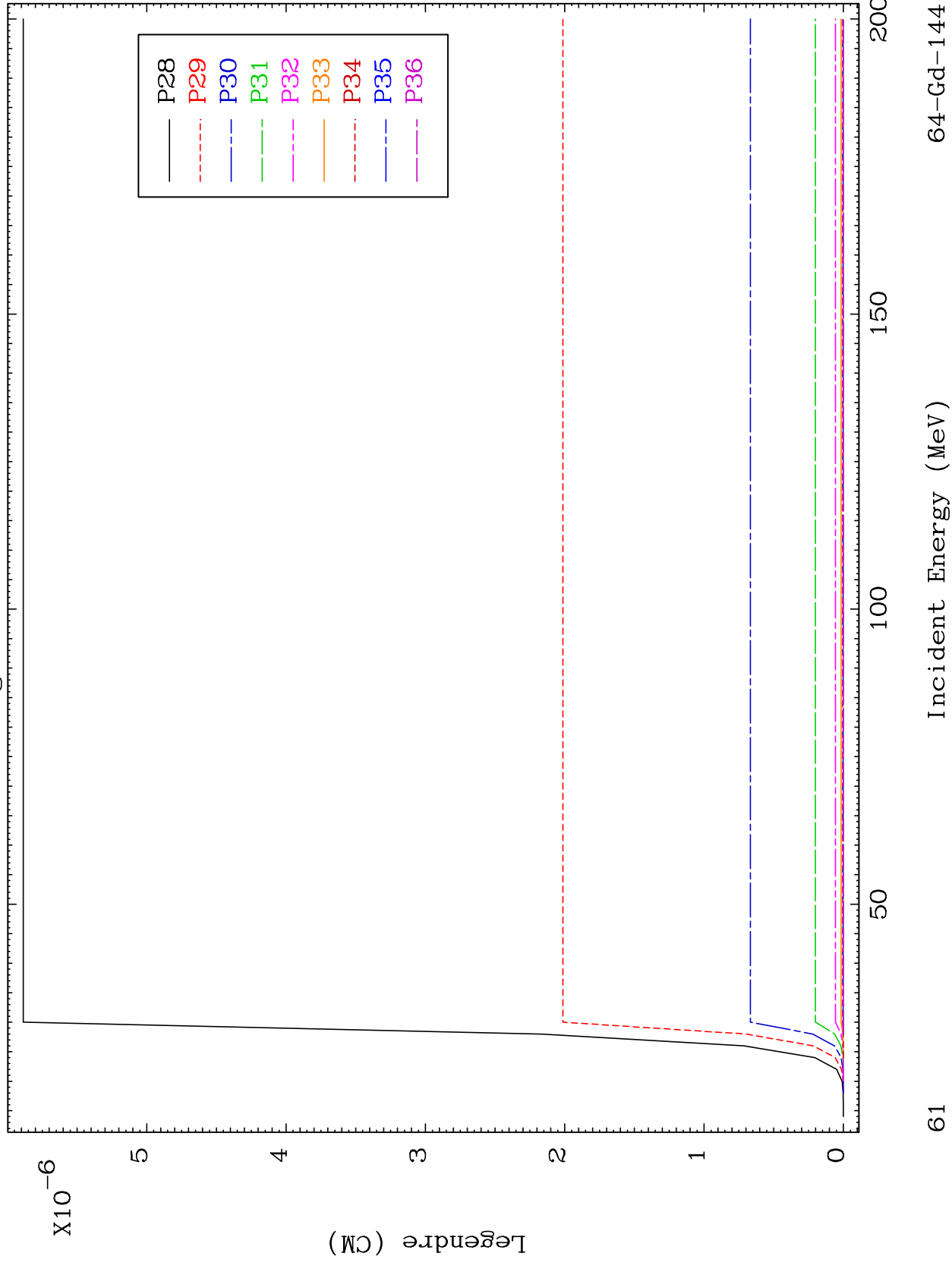
Incident Energy (MeV)

60

MAT 6401

2.462 MeV (n, n') Level  
Legendre Coefficients

64-Gd-144



61

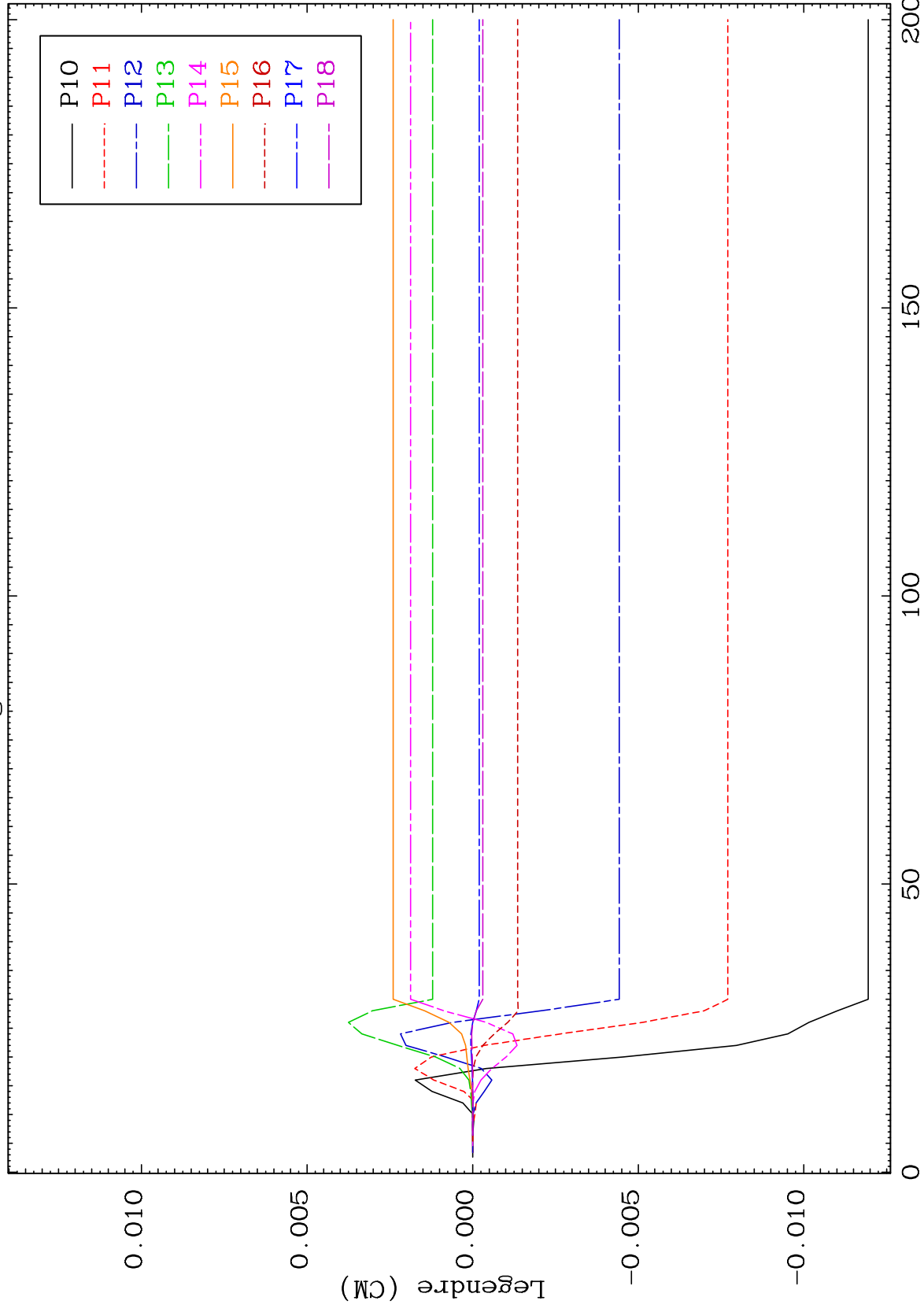
64-Gd-144



MAT 6401

2.472 MeV (n,n') Level  
Legendre Coefficients

64-Gd-144

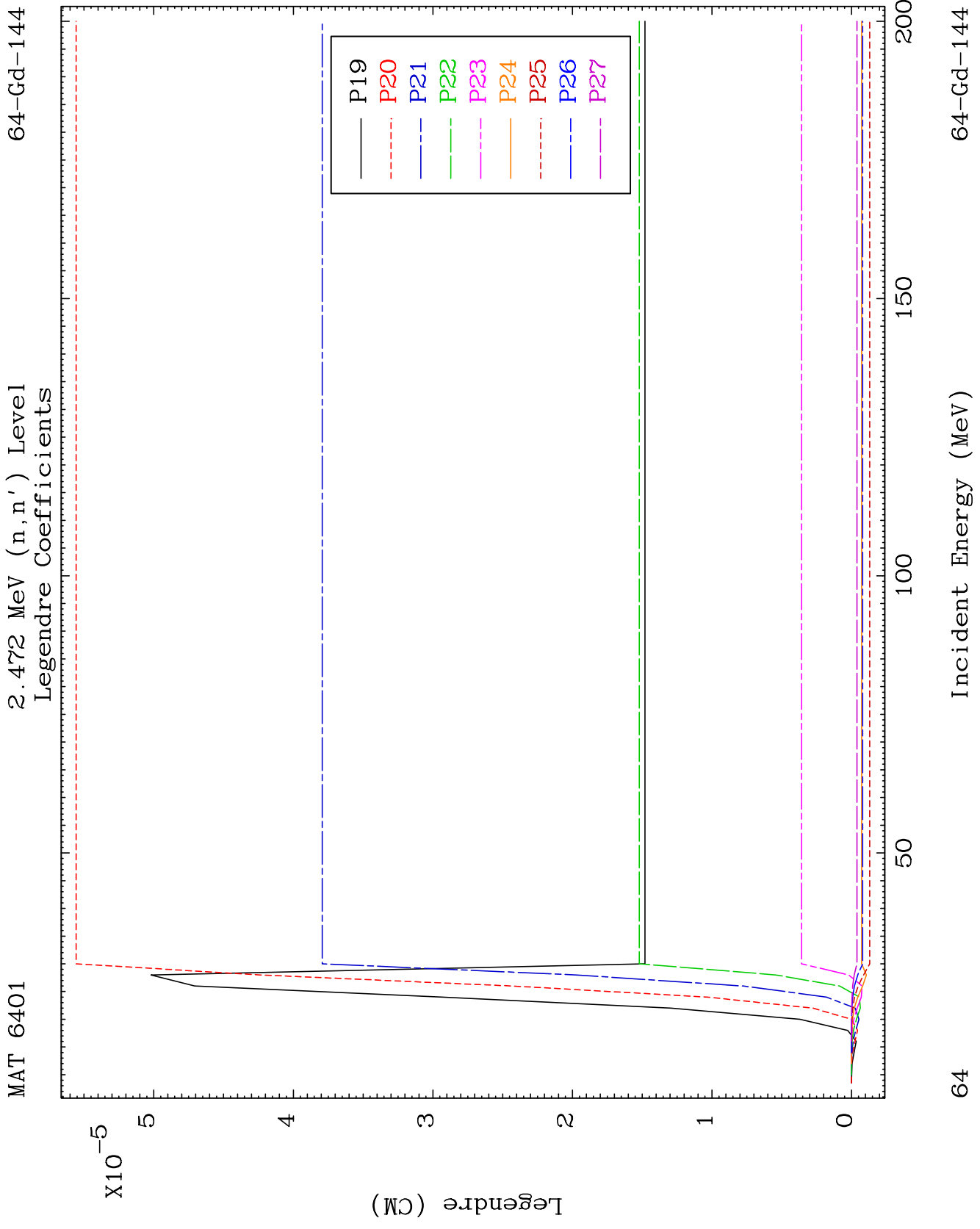


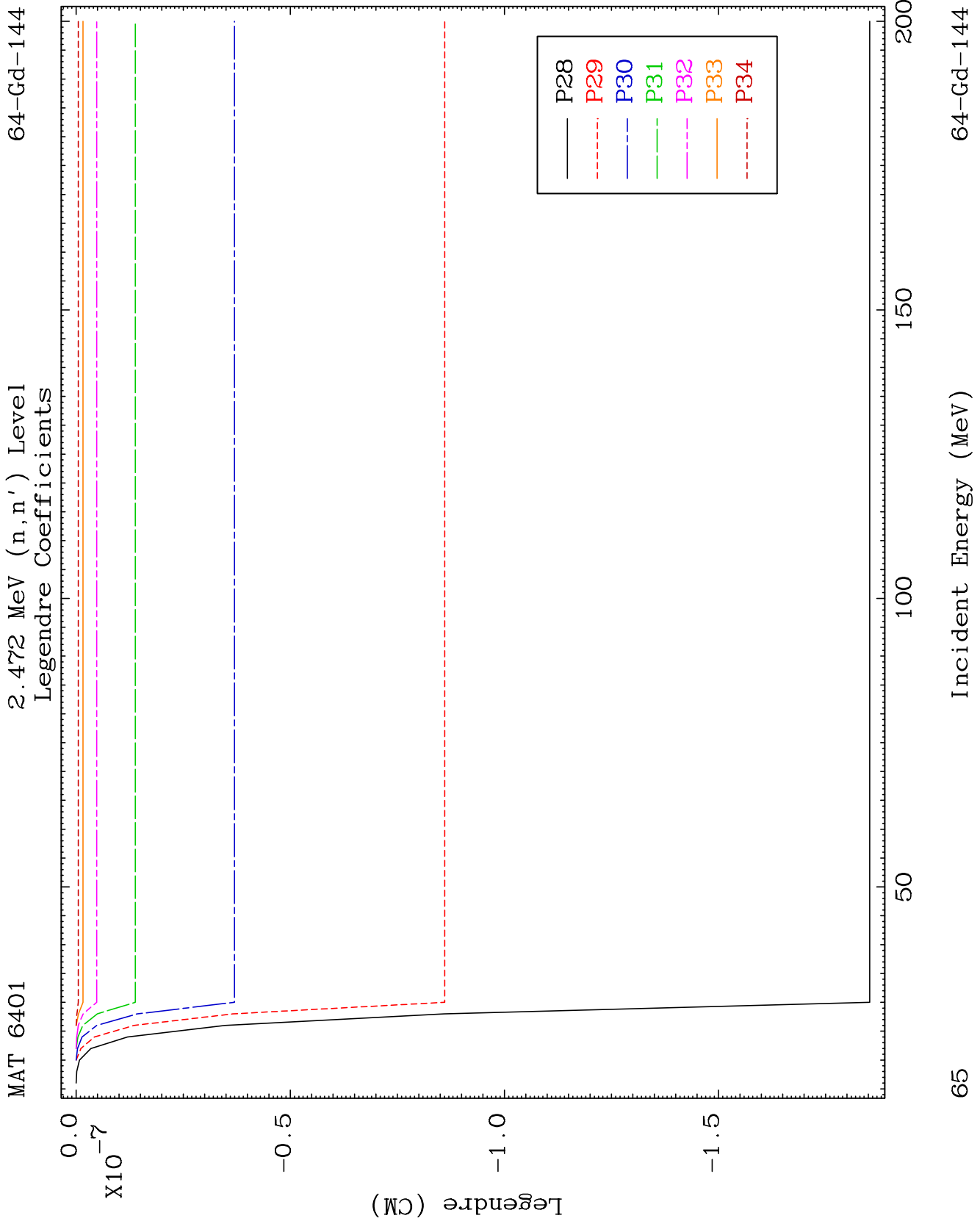
63

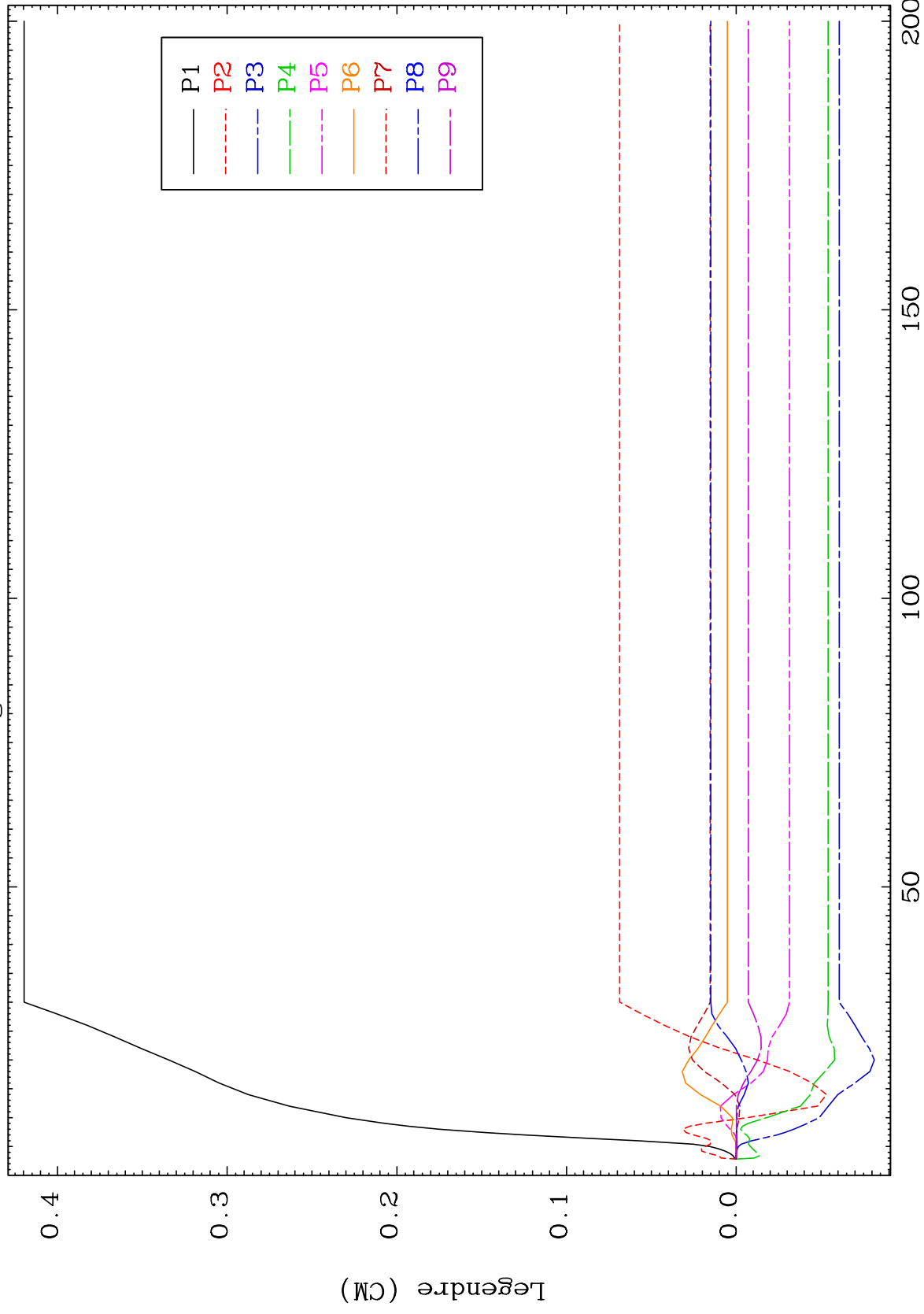
Incident Energy (MeV)

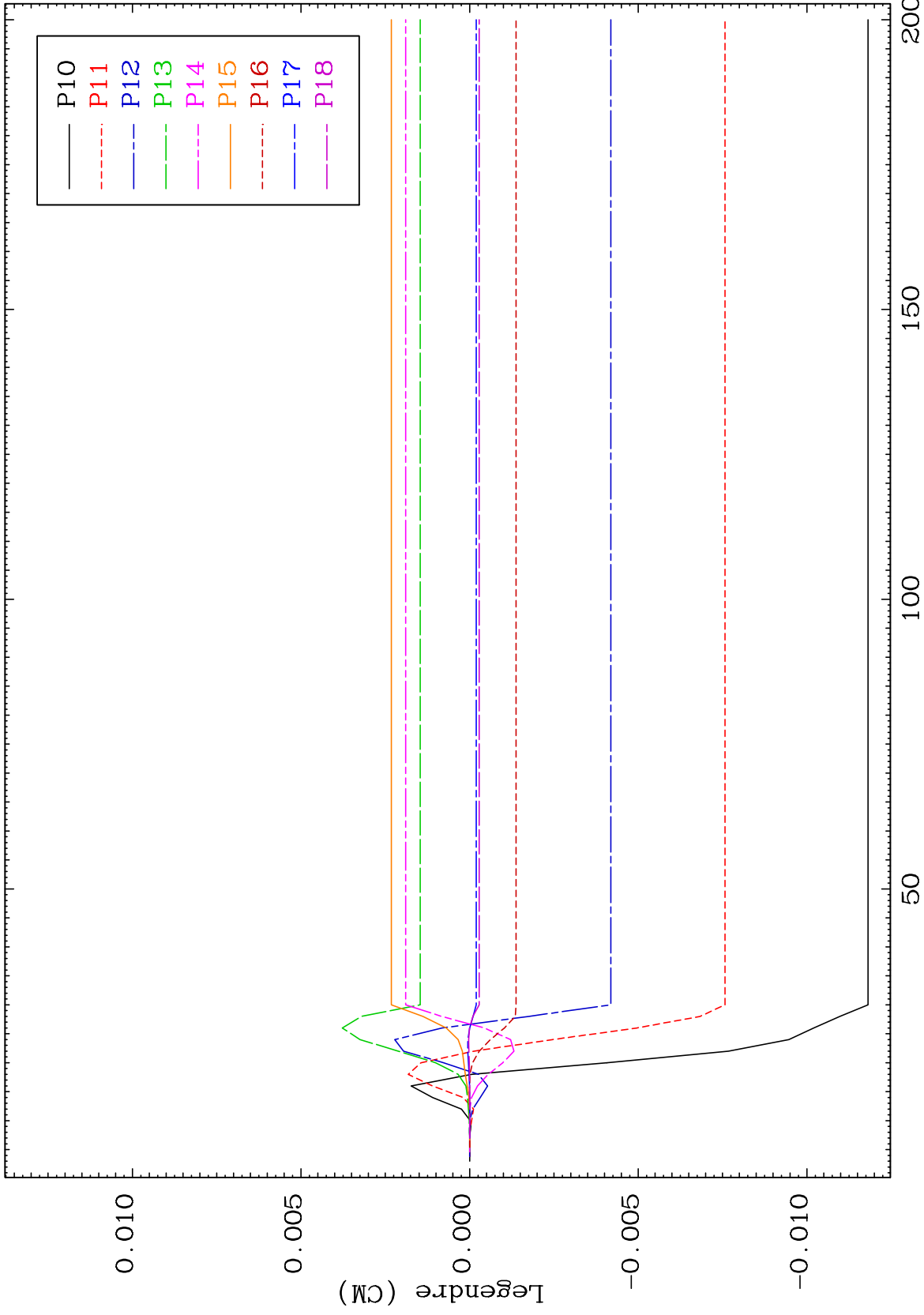
64-Gd-144



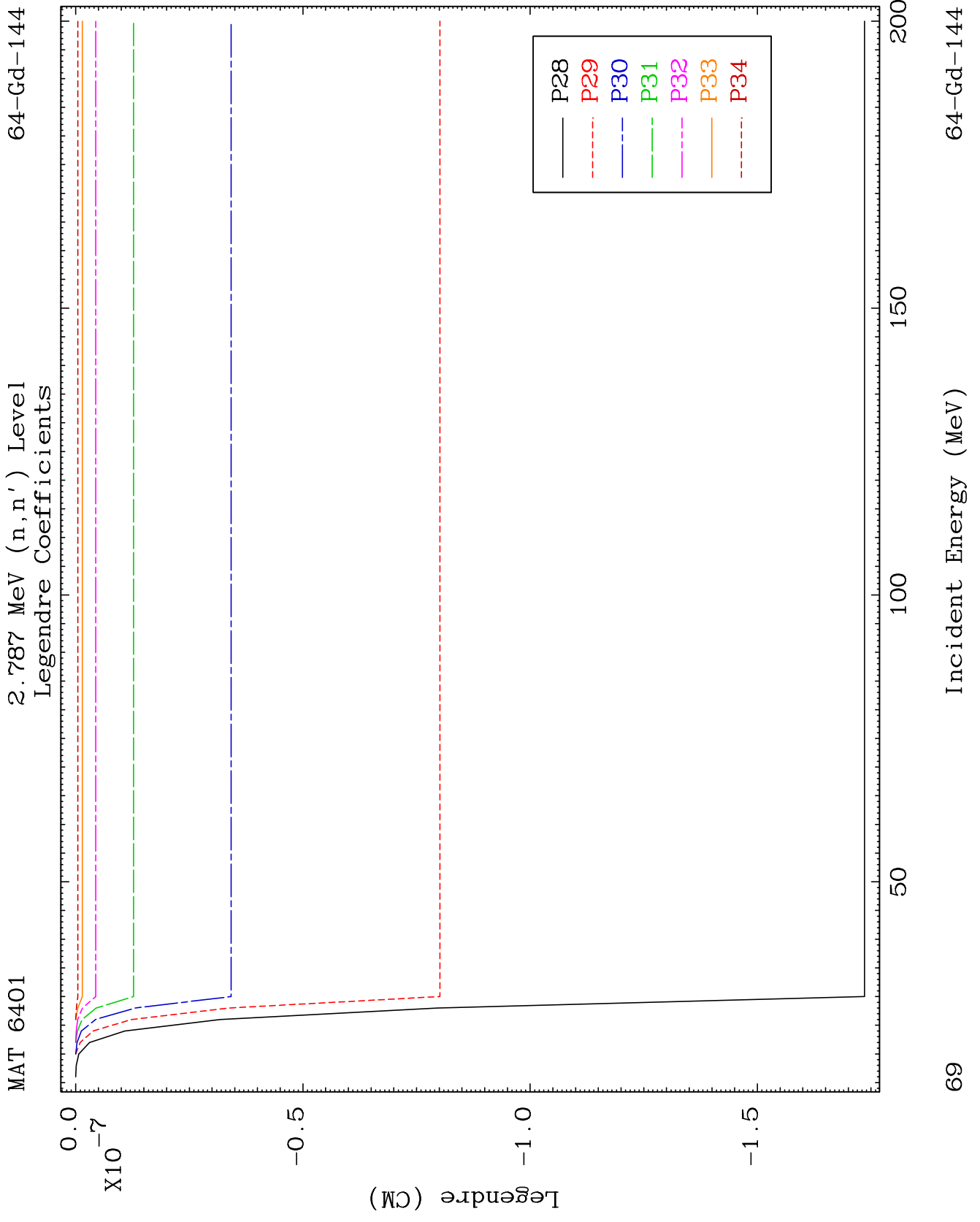








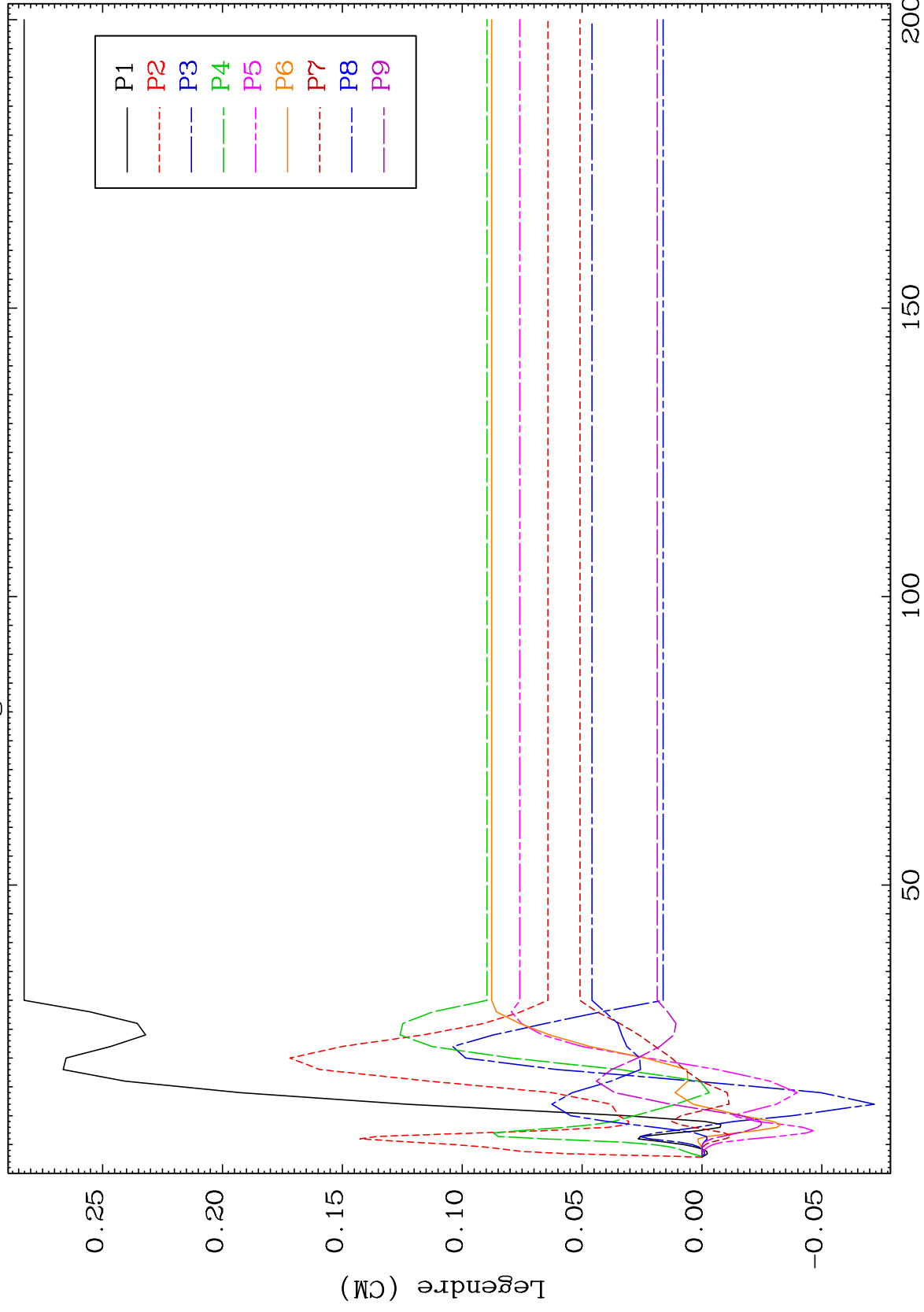




MAT 6401

2.788 MeV (n,n') Level  
Legendre Coefficients

64-Gd-144



70

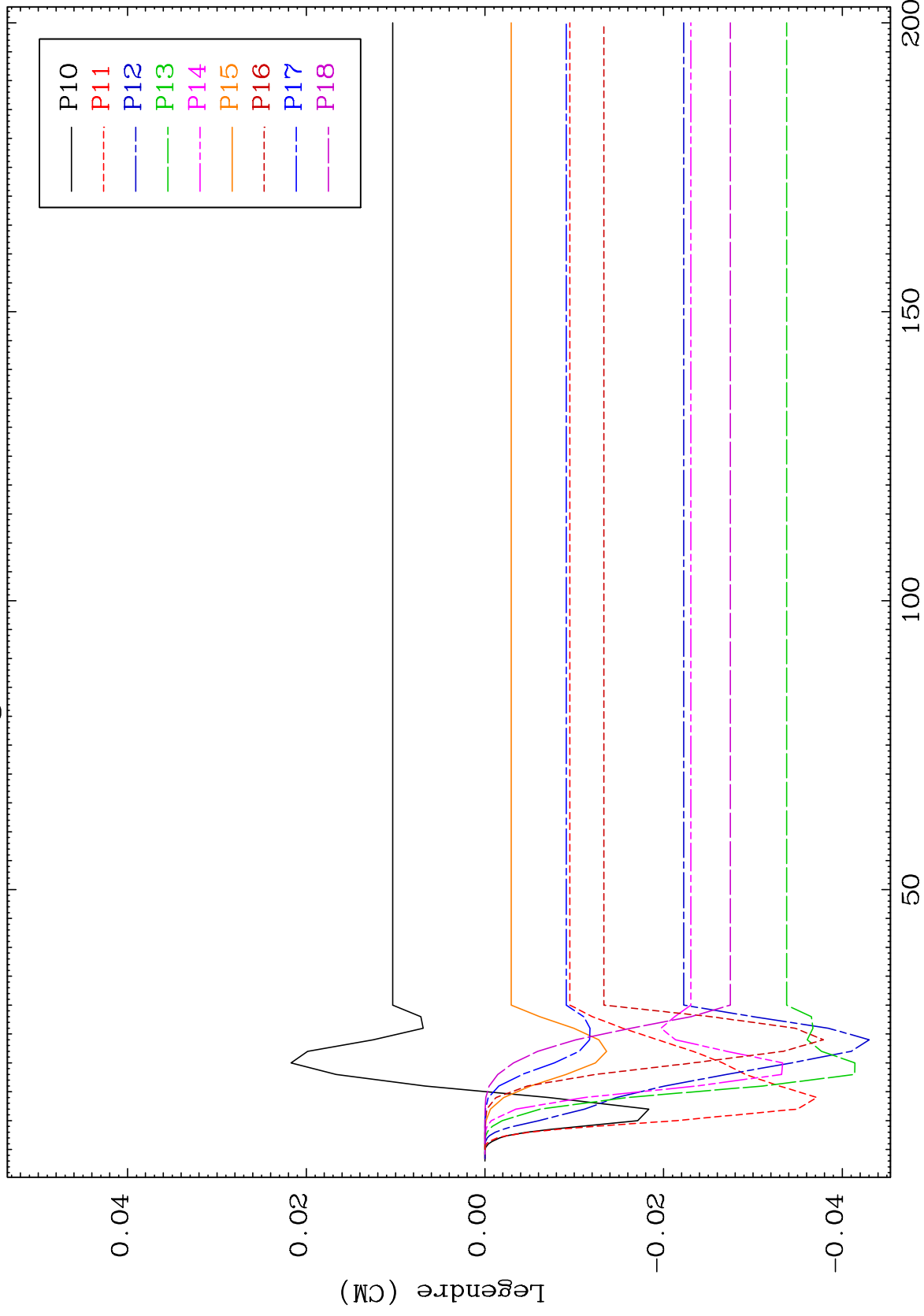
Incident Energy (MeV)

64-Gd-144

MAT 6401

2.788 MeV (n,n') Level  
Legendre Coefficients

64-Gd-144

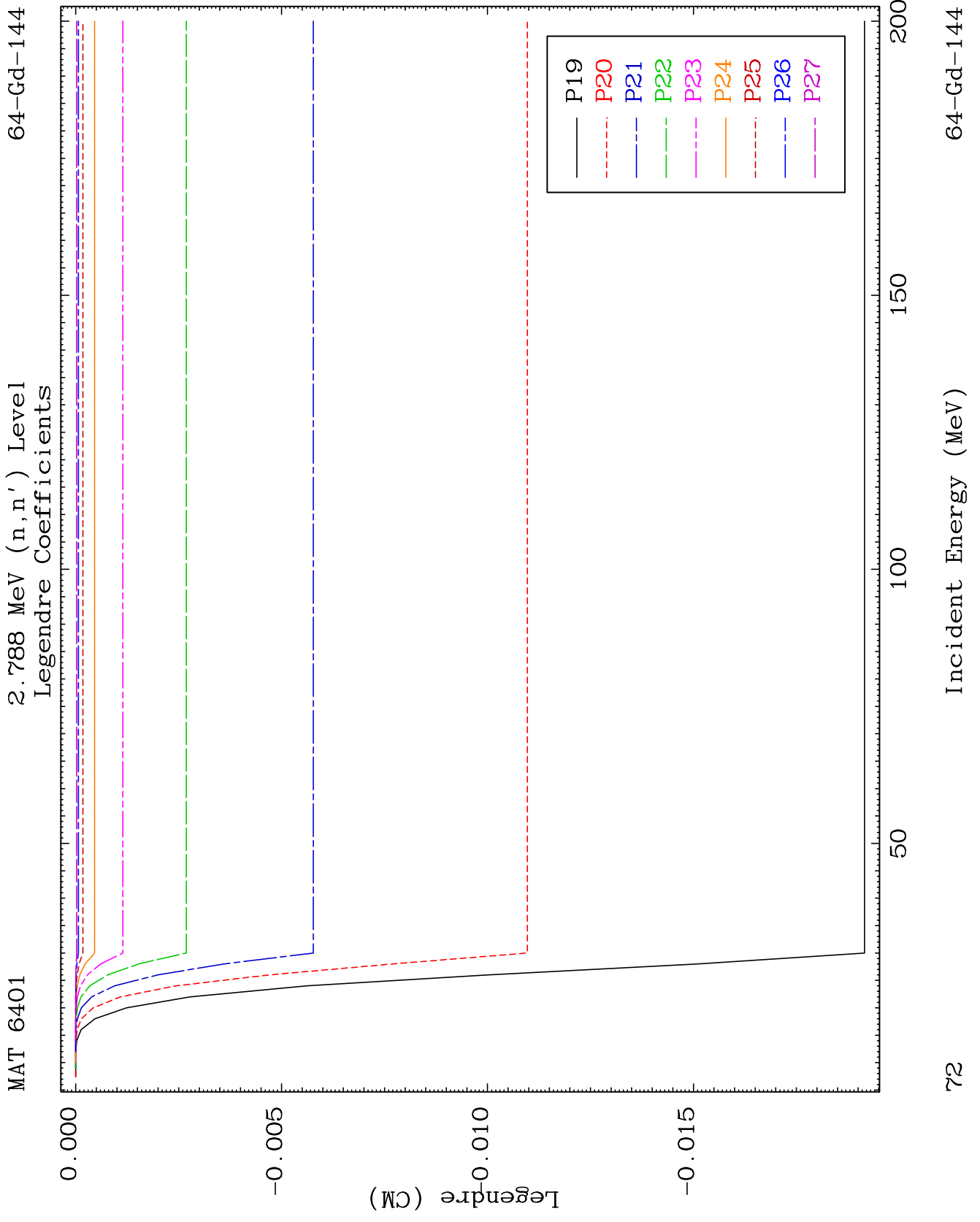


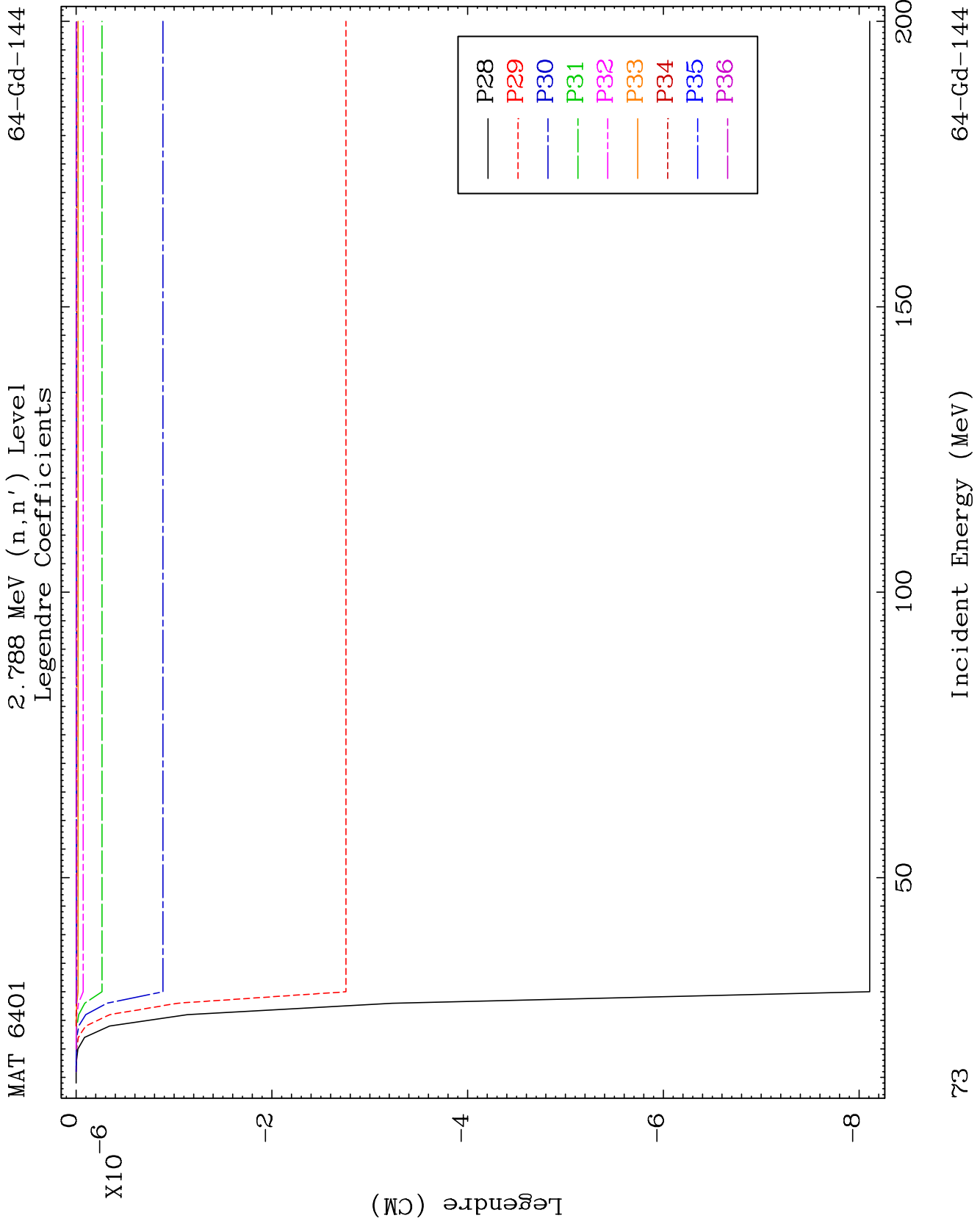
71

Incident Energy (MeV)

64-Gd-144



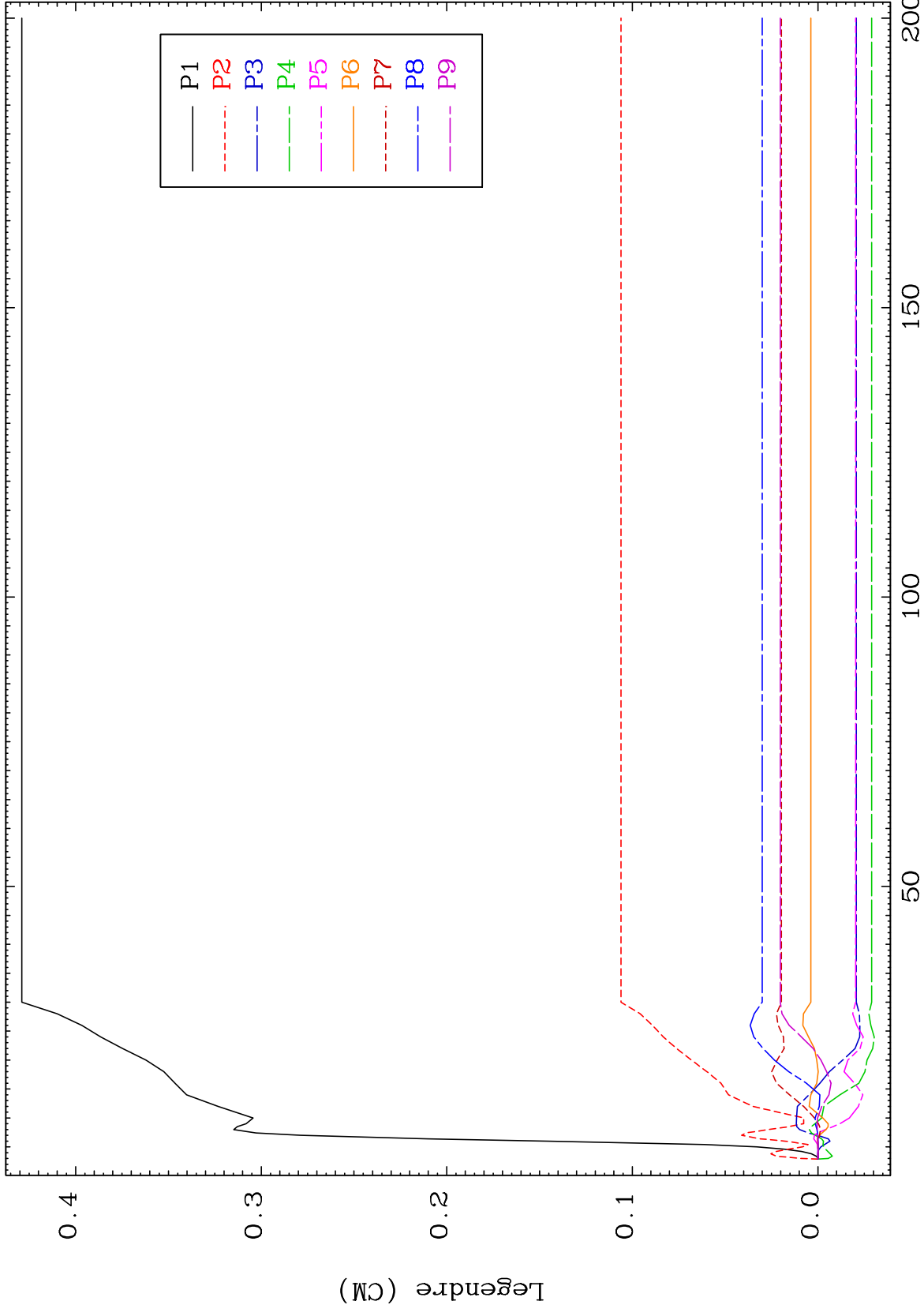




MAT 6401

2.862 MeV (n, n') Level  
Legendre Coefficients

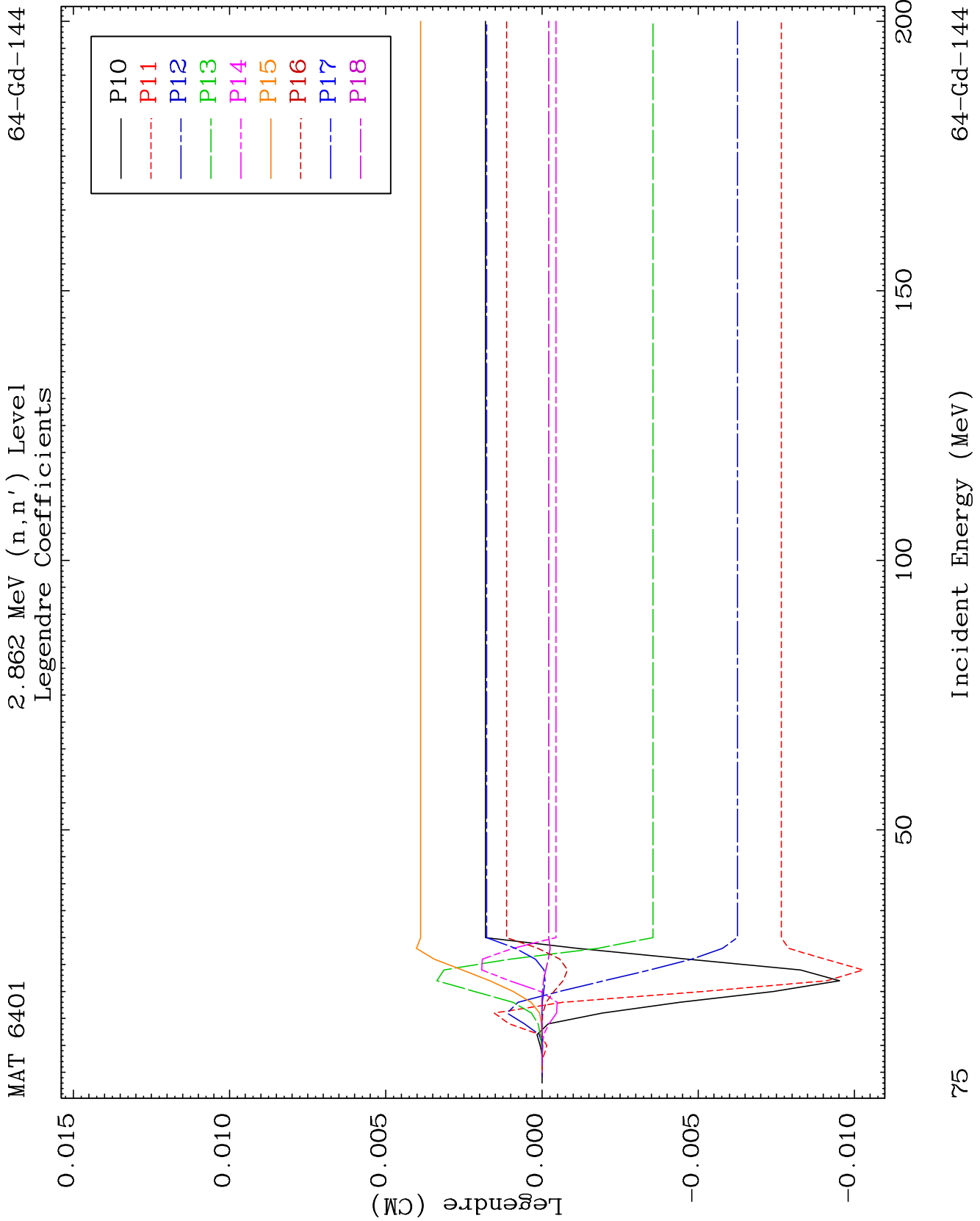
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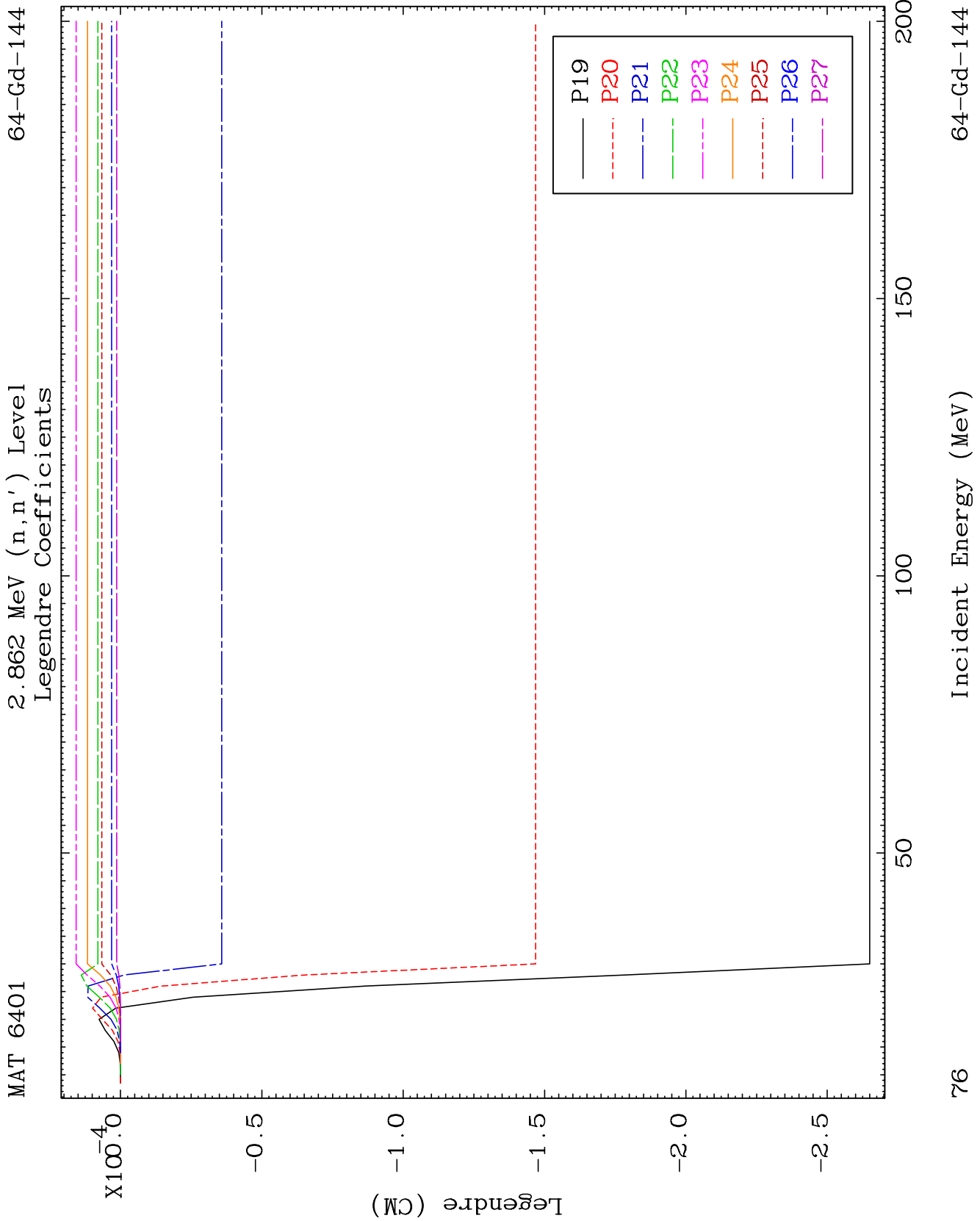


74

Incident Energy (MeV)

64-Gd-144

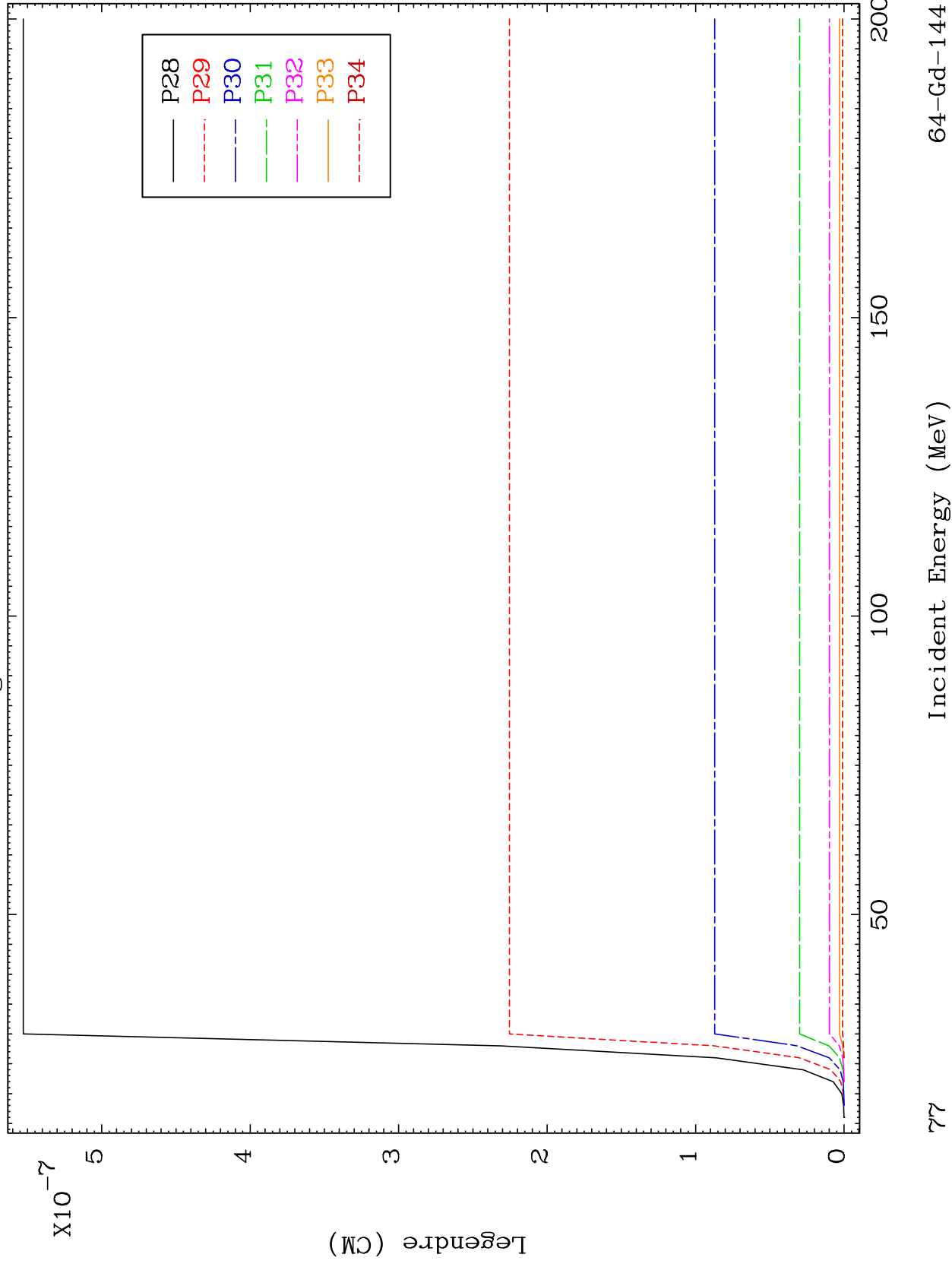




MAT 6401

2.862 MeV (n,n') Level  
Legendre Coefficients

64-Gd-144



77

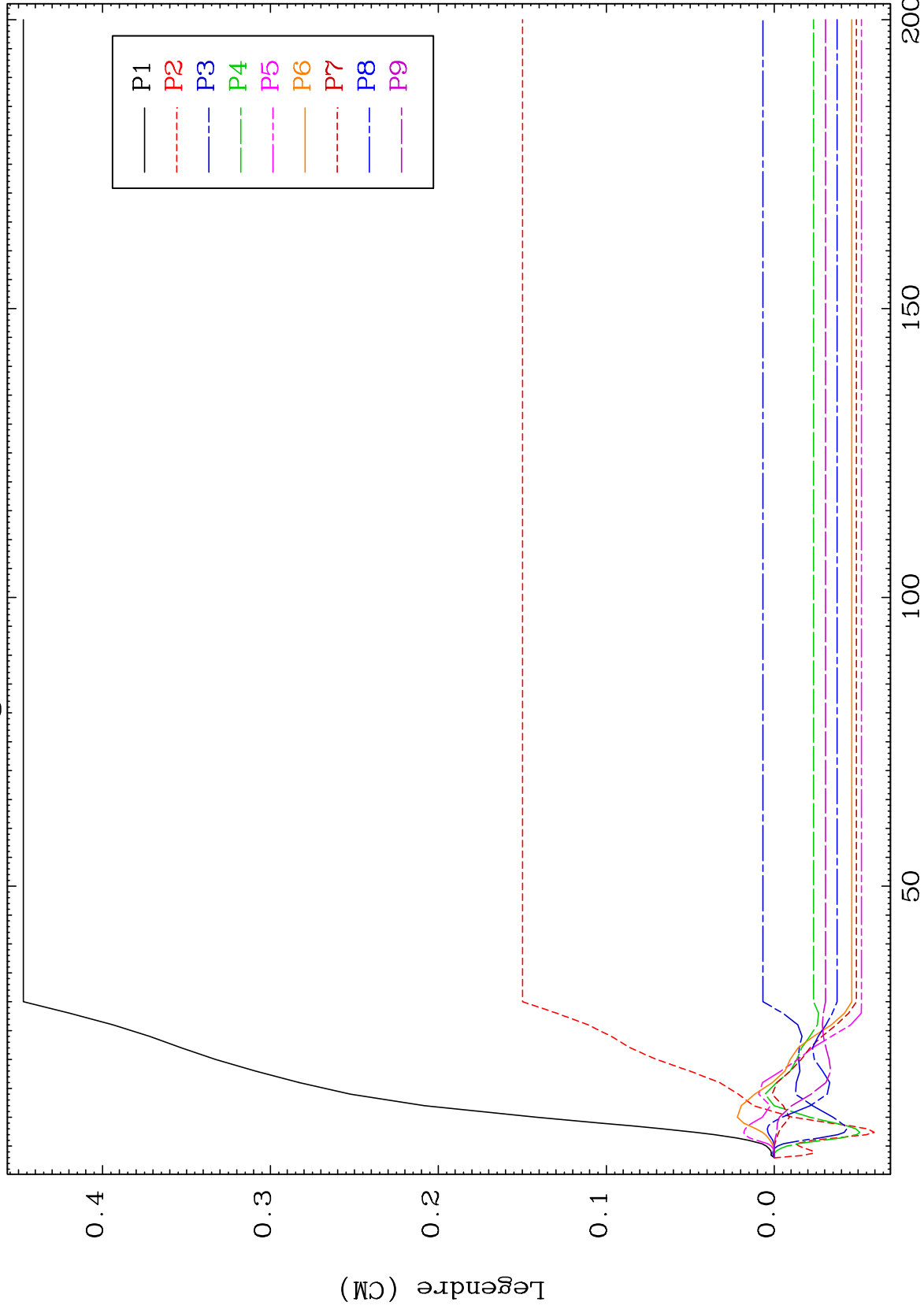
Incident Energy (MeV)

64-Gd-144

MAT 6401

2.912 MeV (n,n') Level  
Legendre Coefficients

64-Gd-144



78

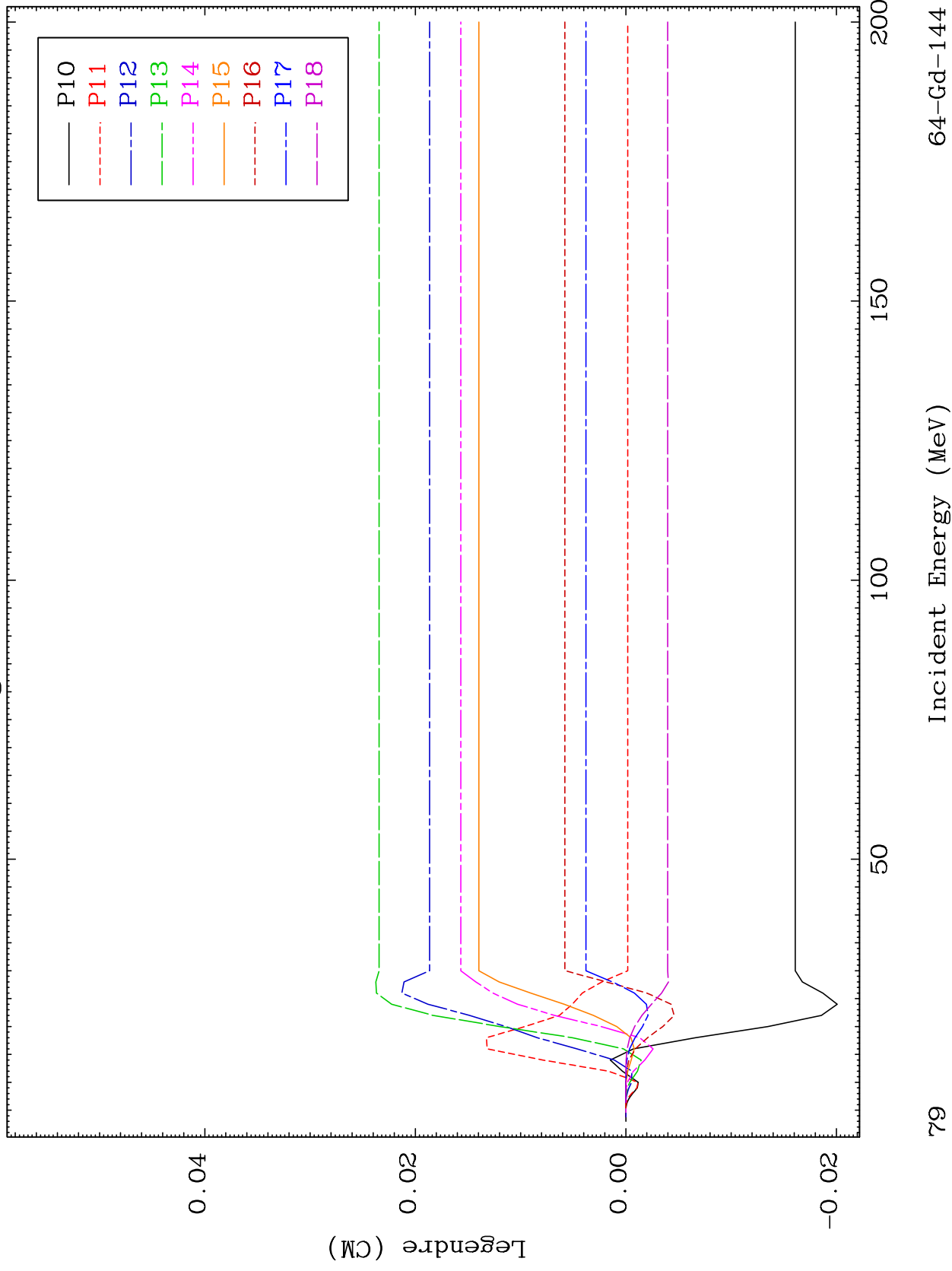
Incident Energy (MeV)

64-Gd-144

MAT 6401

2.912 MeV (n,n') Level  
Legendre Coefficients

64-Gd-144



79

Incident Energy (MeV)

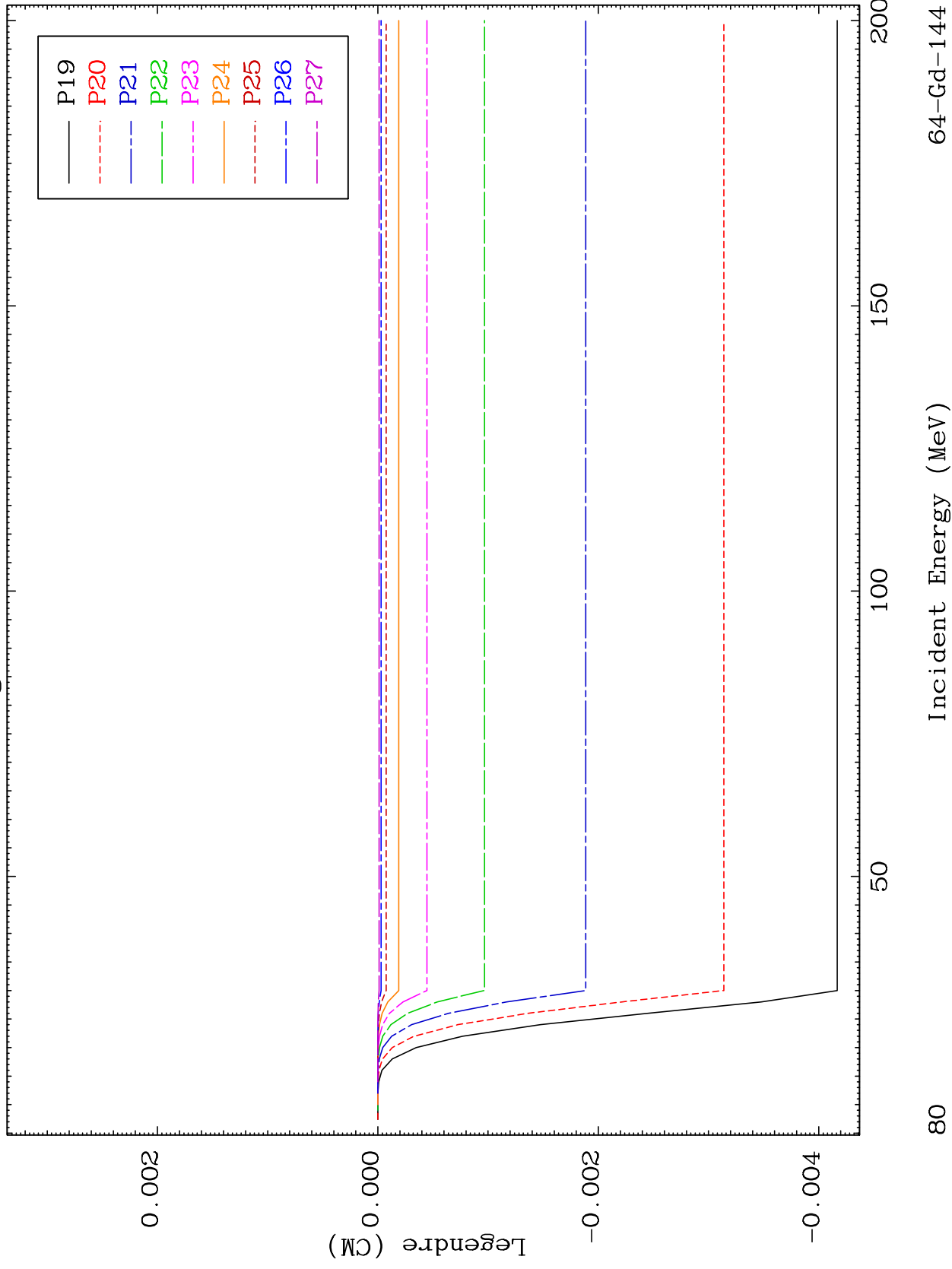
64-Gd-144

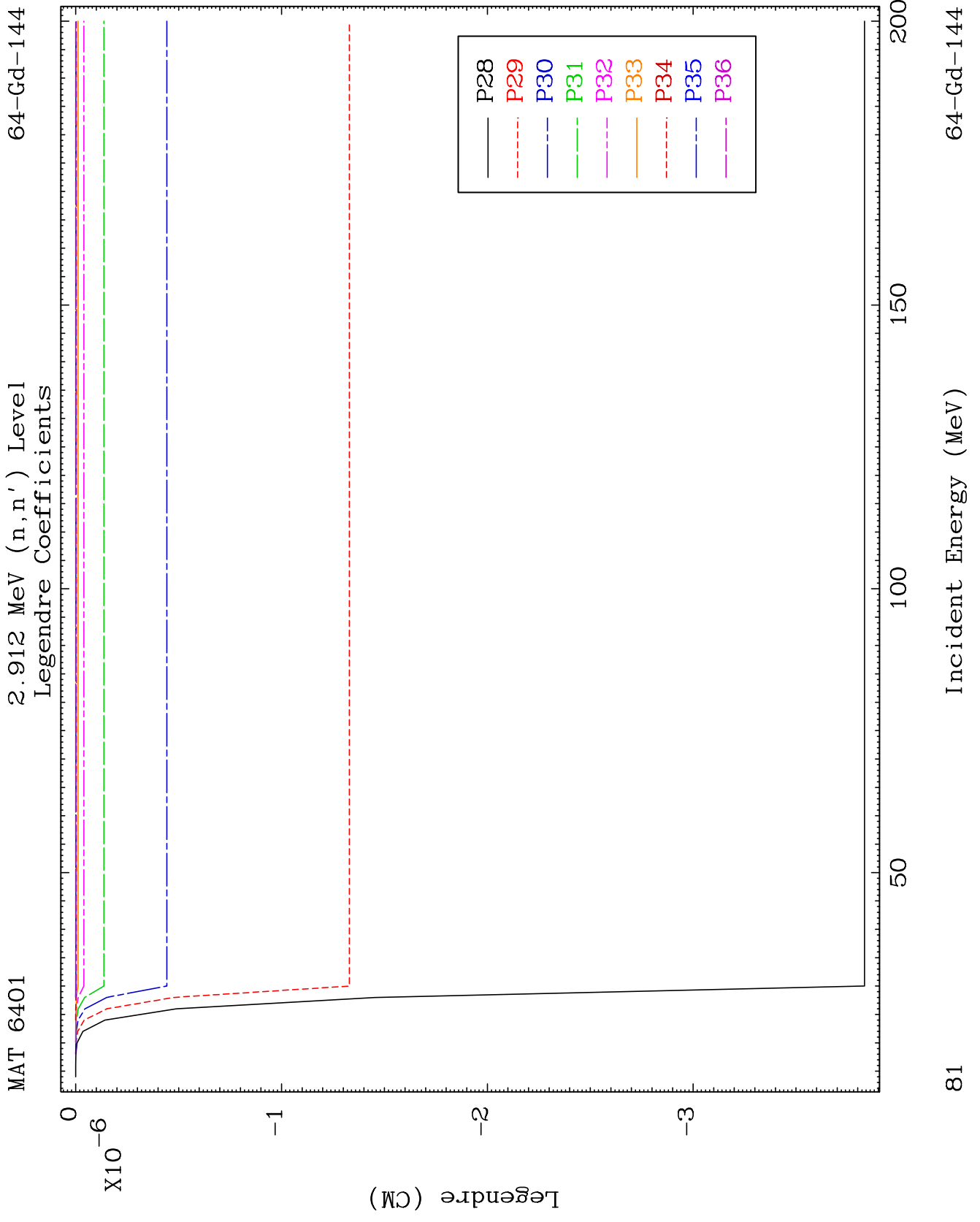


MAT 6401

2.912 MeV (n,n') Level  
Legendre Coefficients

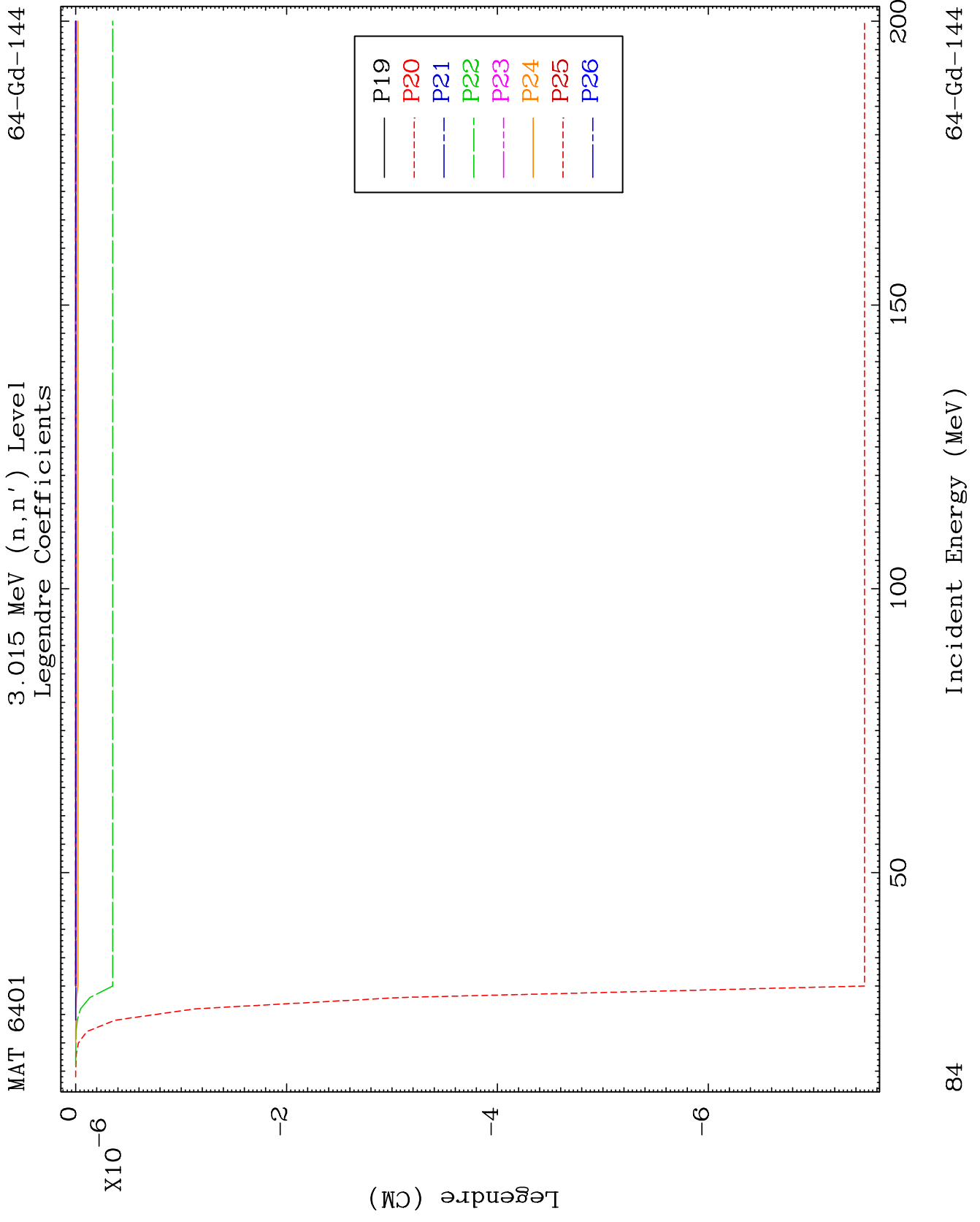
64-Gd-144









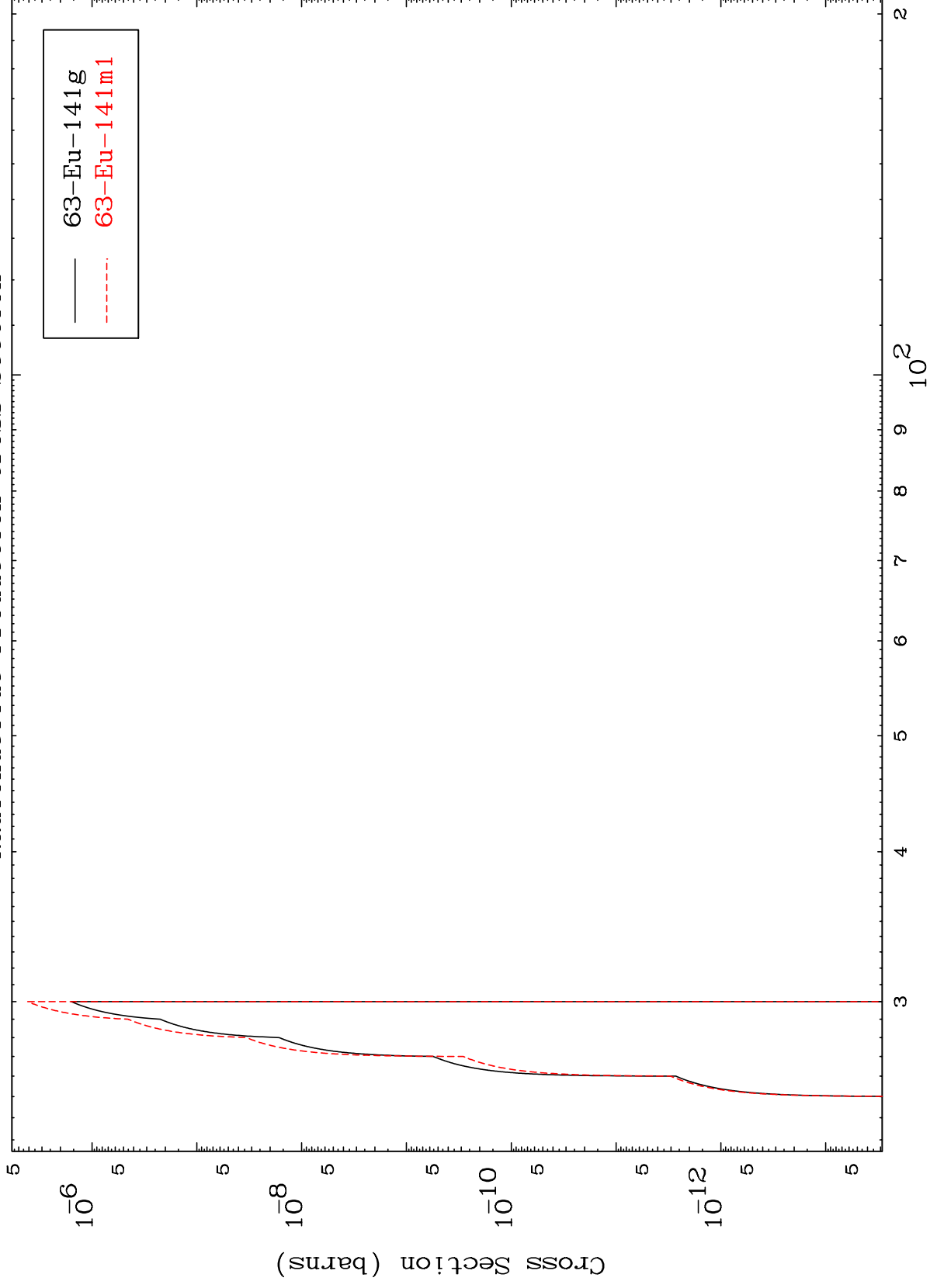


MAT 6401

(n,2n) d

64-Gd-144

Radionuclide Production Cross Section



85

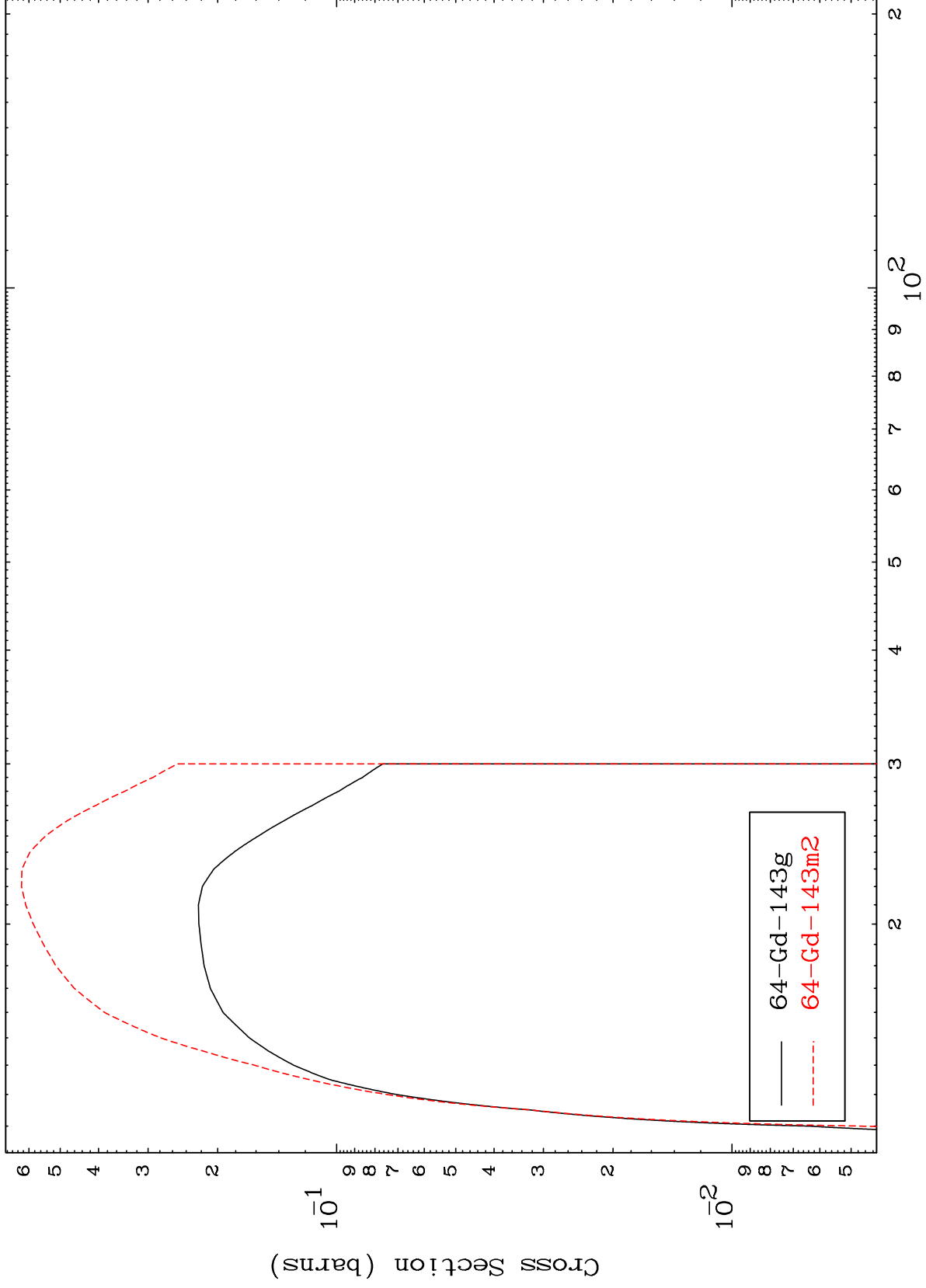
Incident Energy (MeV)

64-Gd-144

MAT 6401

64-Gd-144

(n,2n)  
Radionuclide Production Cross Section



86

64-Gd-144

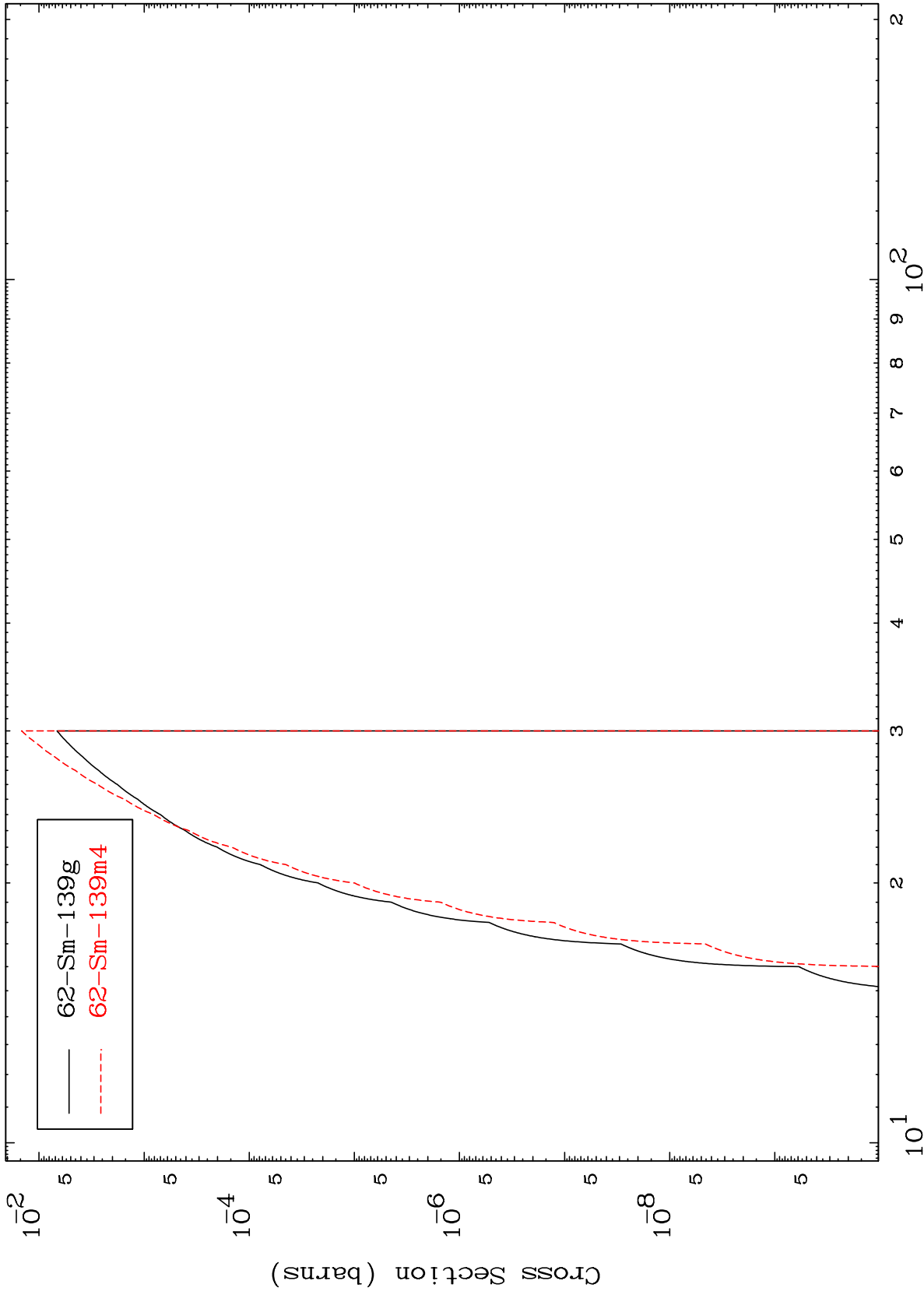
Incident Energy (MeV)

MAT 6401

(n,2n)  $\alpha$

64-Gd-144

Radionuclide Production Cross Section



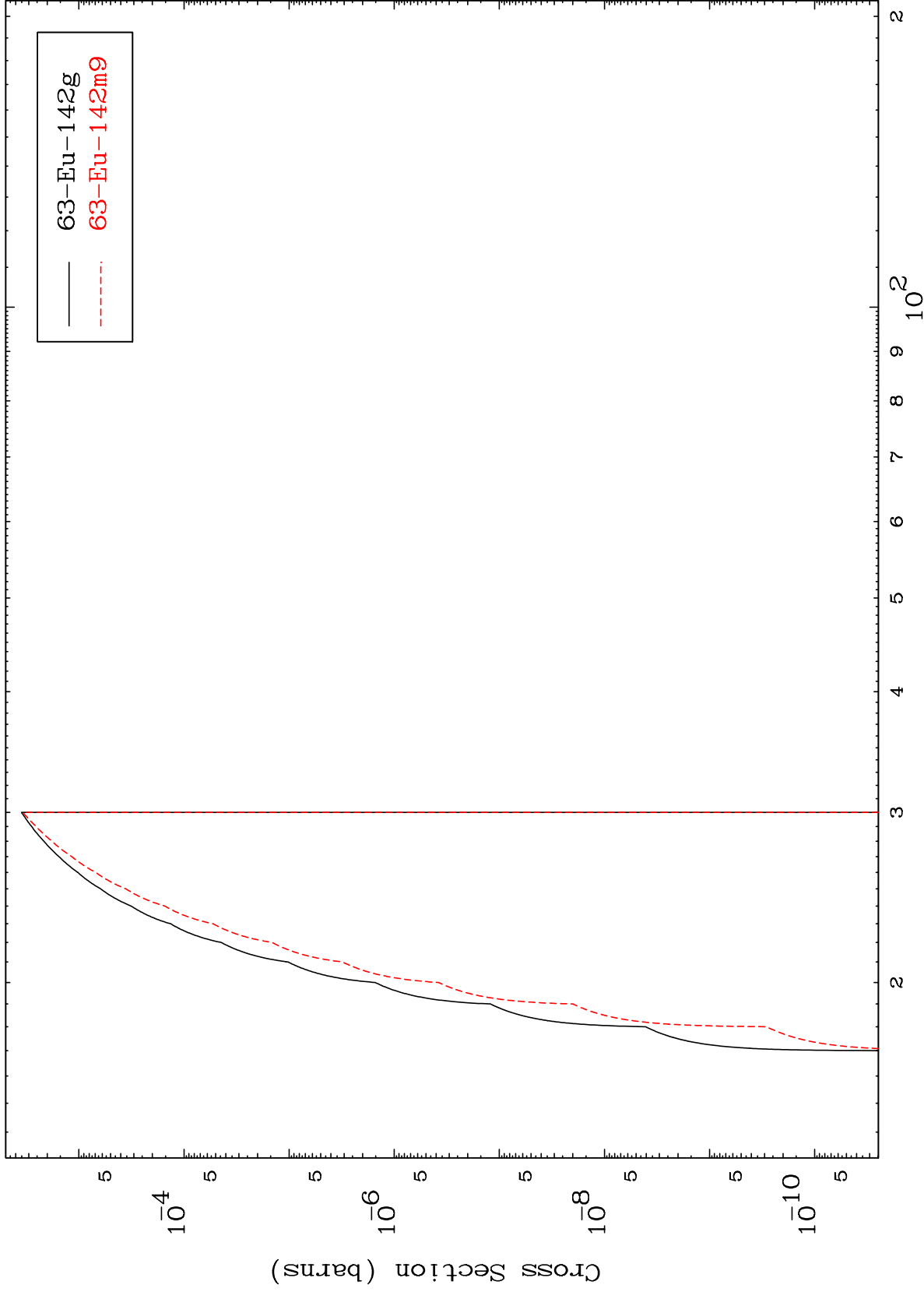
87

Incident Energy (MeV)

64-Gd-144



Radionuclide Production Cross Section

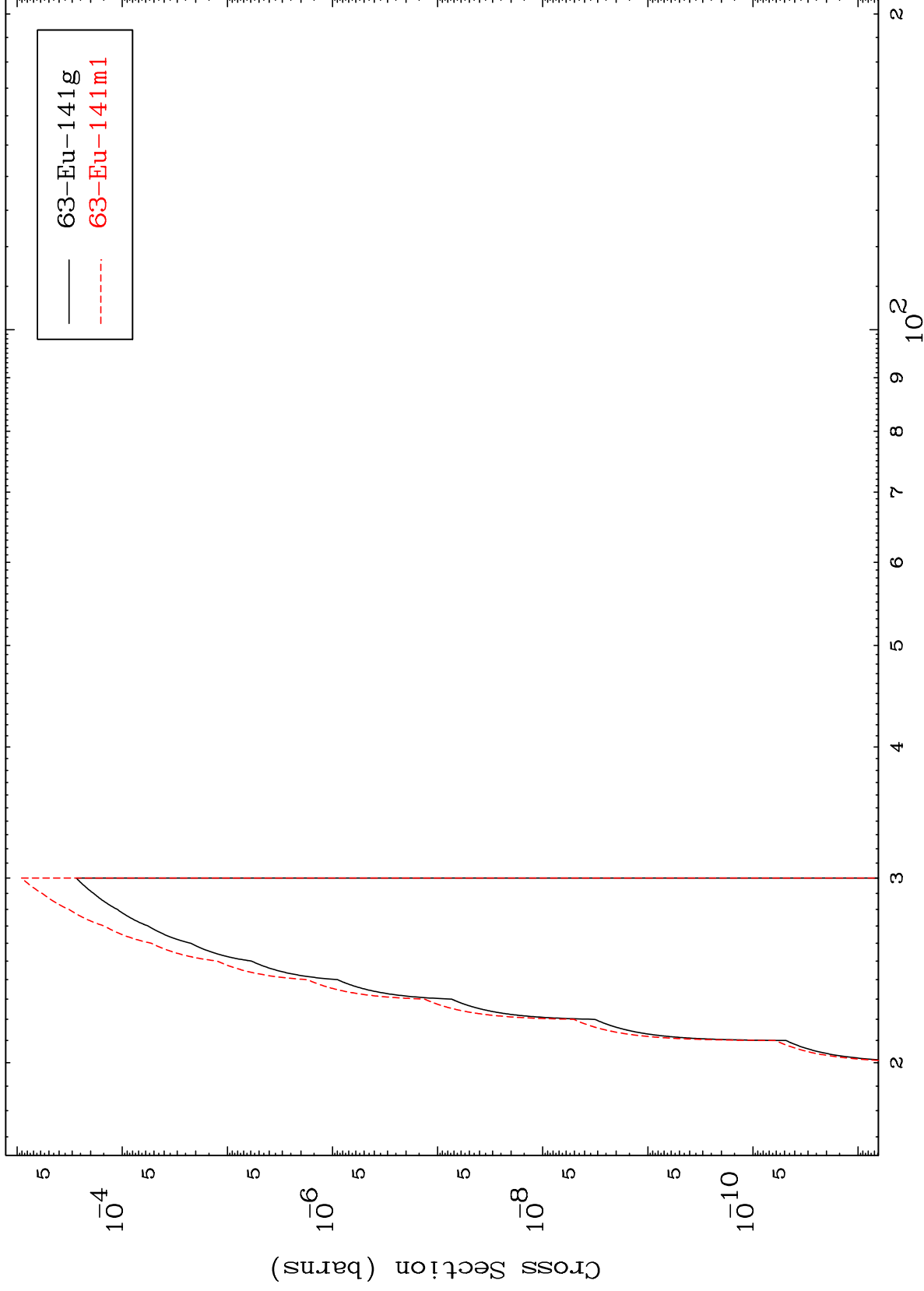


MAT 6401

(n,n') t

64-Gd-144

Radionuclide Production Cross Section



89

Incident Energy (MeV)

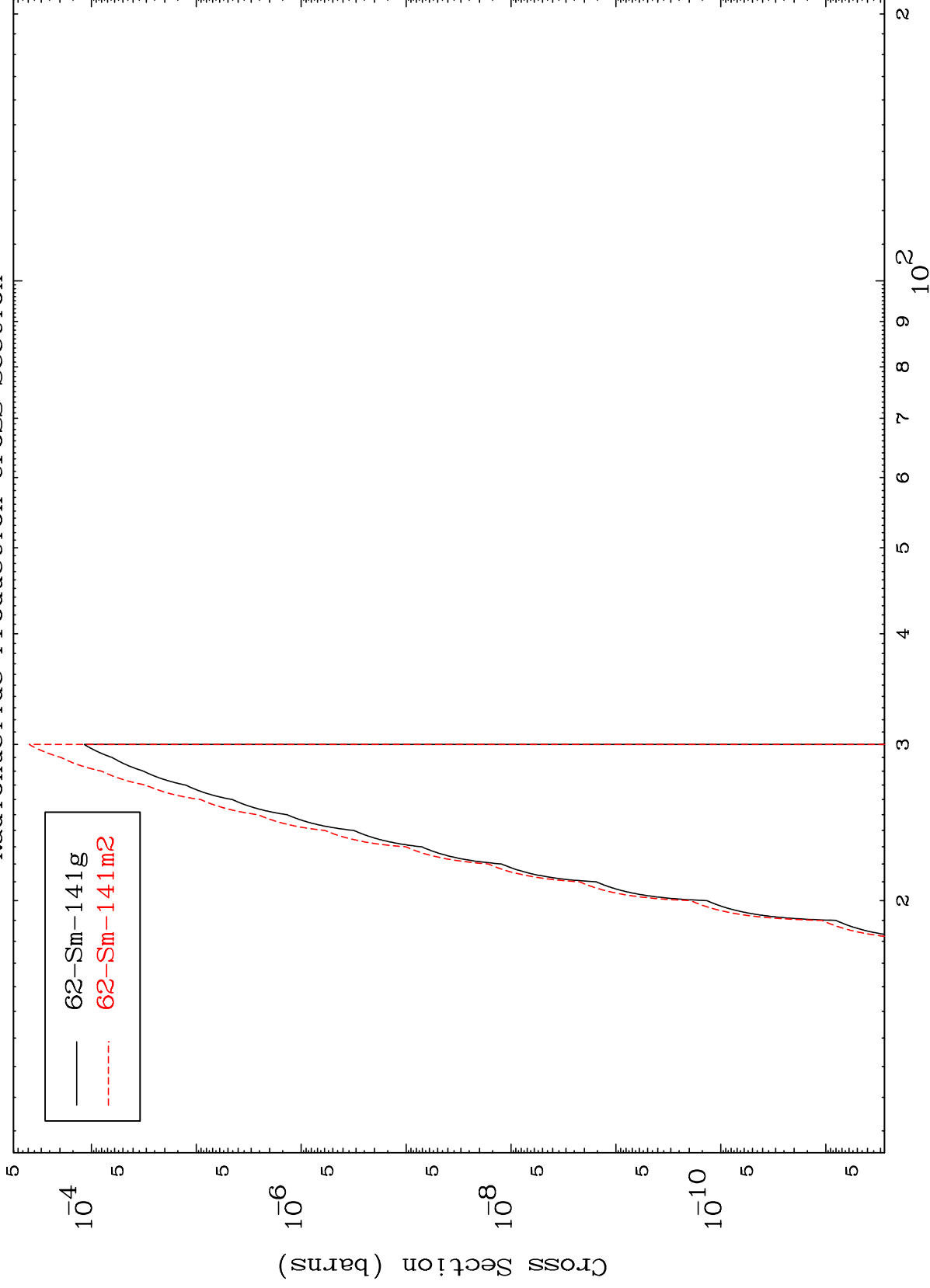
64-Gd-144

MAT 6401

(n,n') He-3

64-Gd-144

Radionuclide Production Cross Section

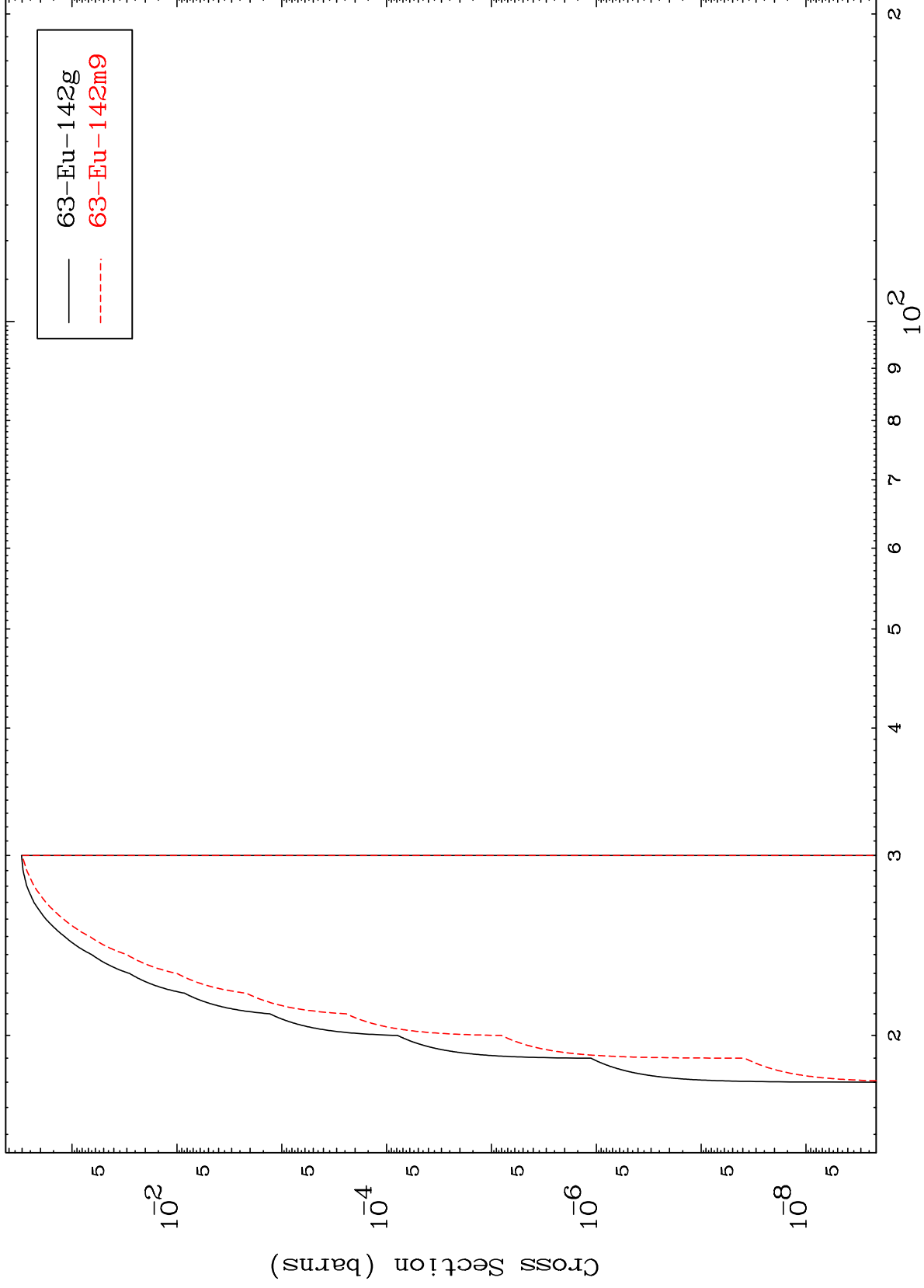


90

Incident Energy (MeV)

64-Gd-144

Radionuclide Production Cross Section

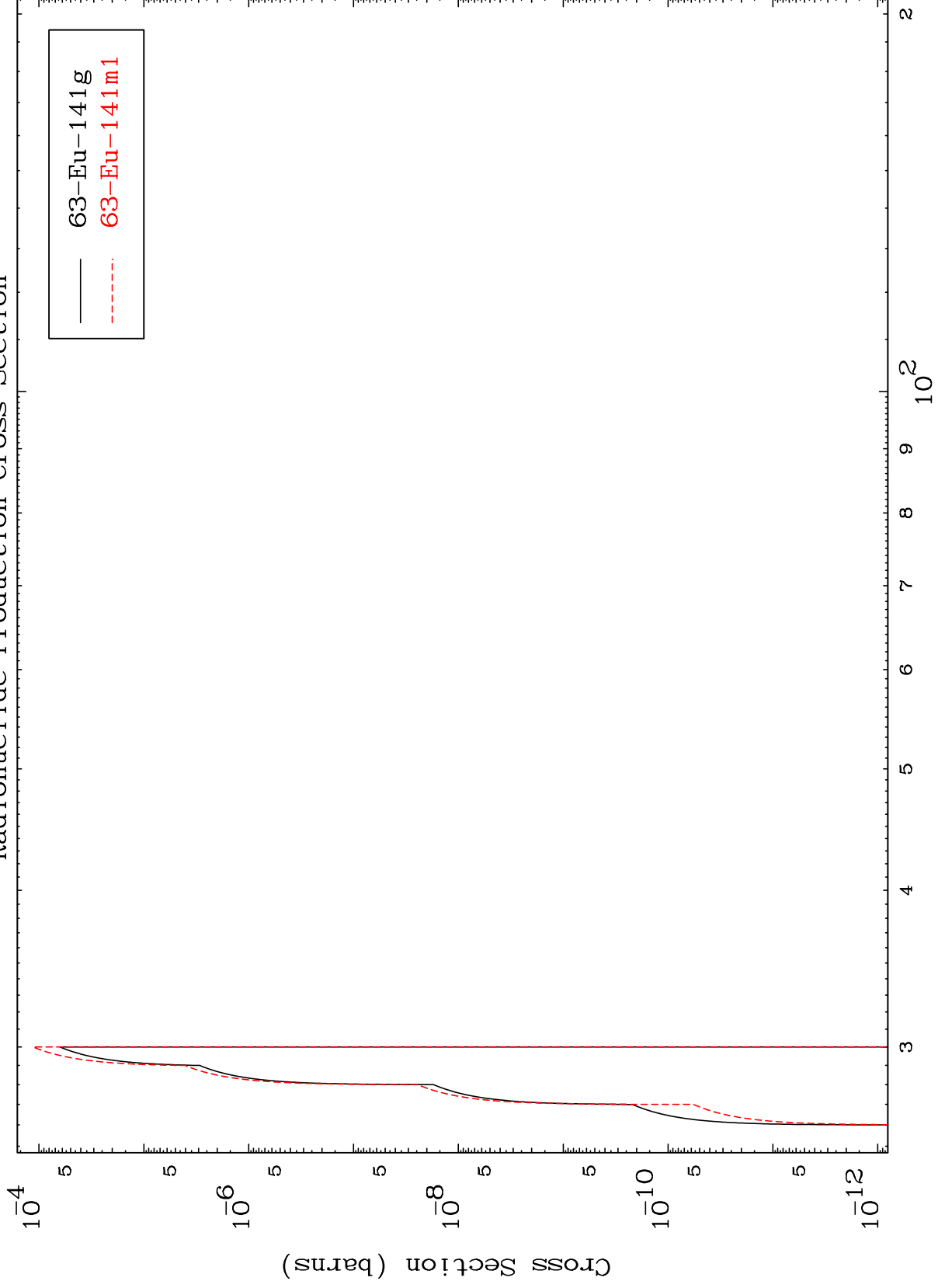


MAT 6401

(n,3n) p

64-Gd-144

Radionuclide Production Cross Section



92

Incident Energy (MeV)

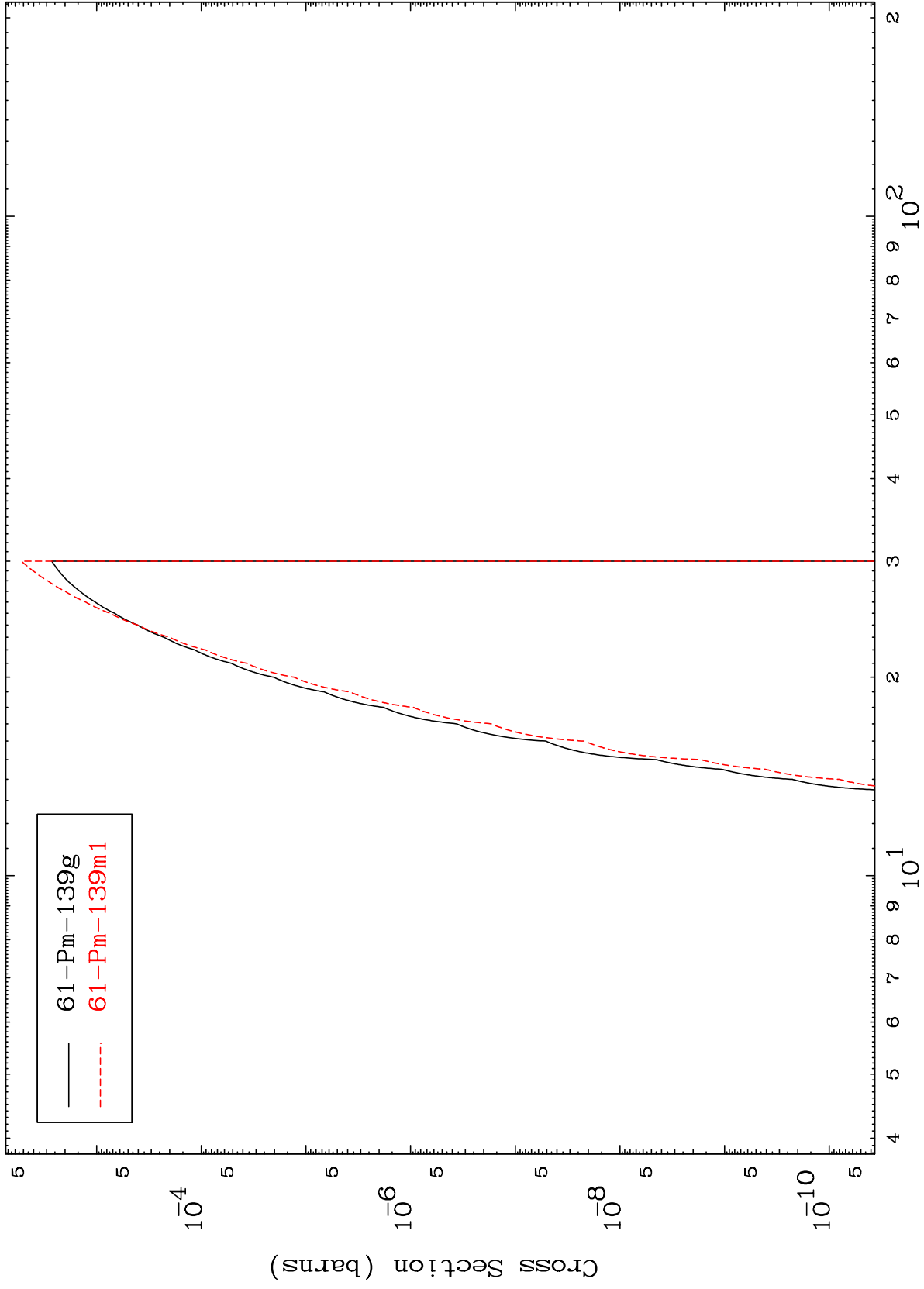
64-Gd-144

MAT 6401

(n,n') p  $\alpha$

64-Gd-144

Radionuclide Production Cross Section



61-Pm-139g  
61-Pm-139m1

93

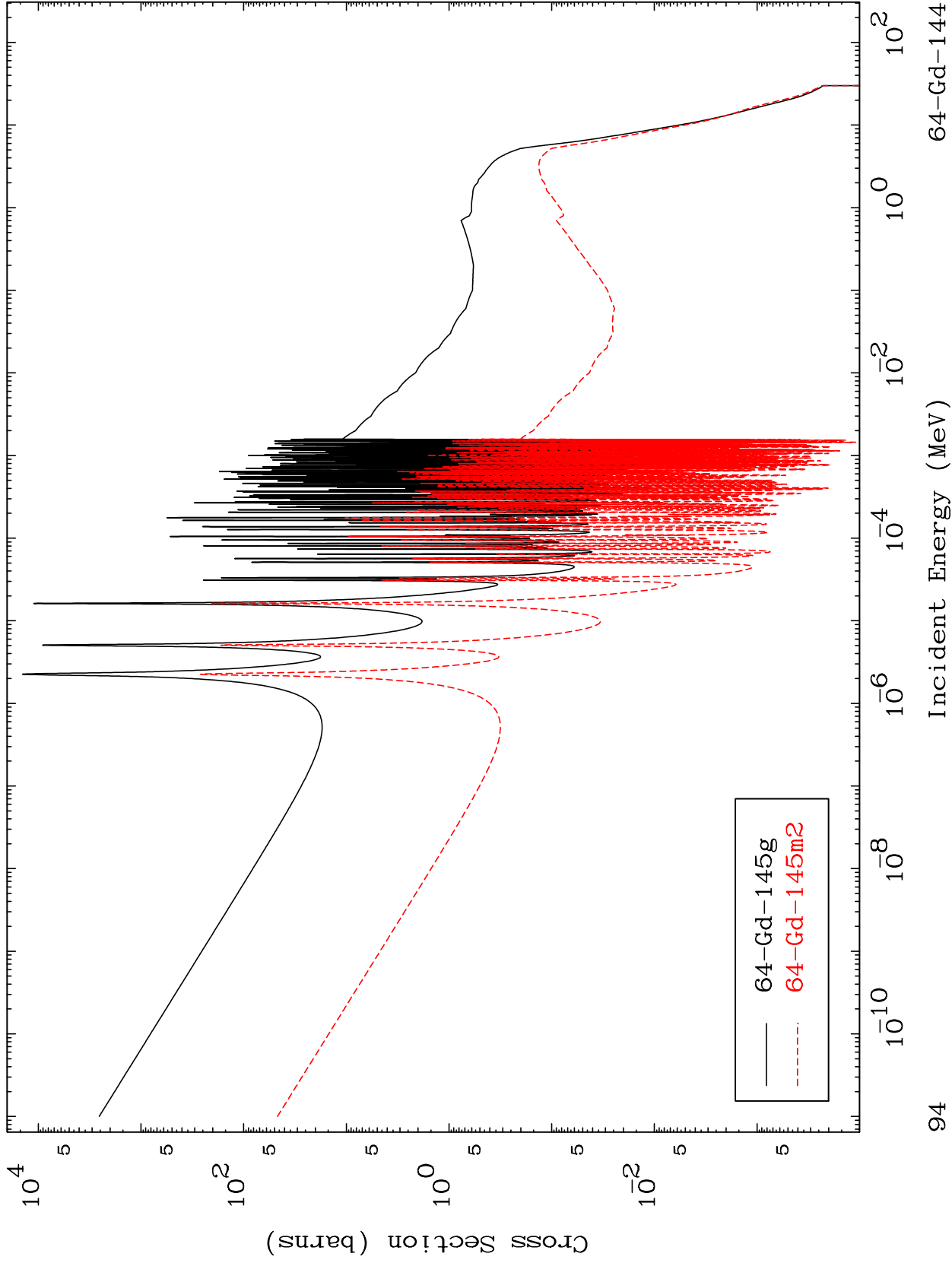
Incident Energy (MeV)

64-Gd-144

MAT 6401

64-Gd-144

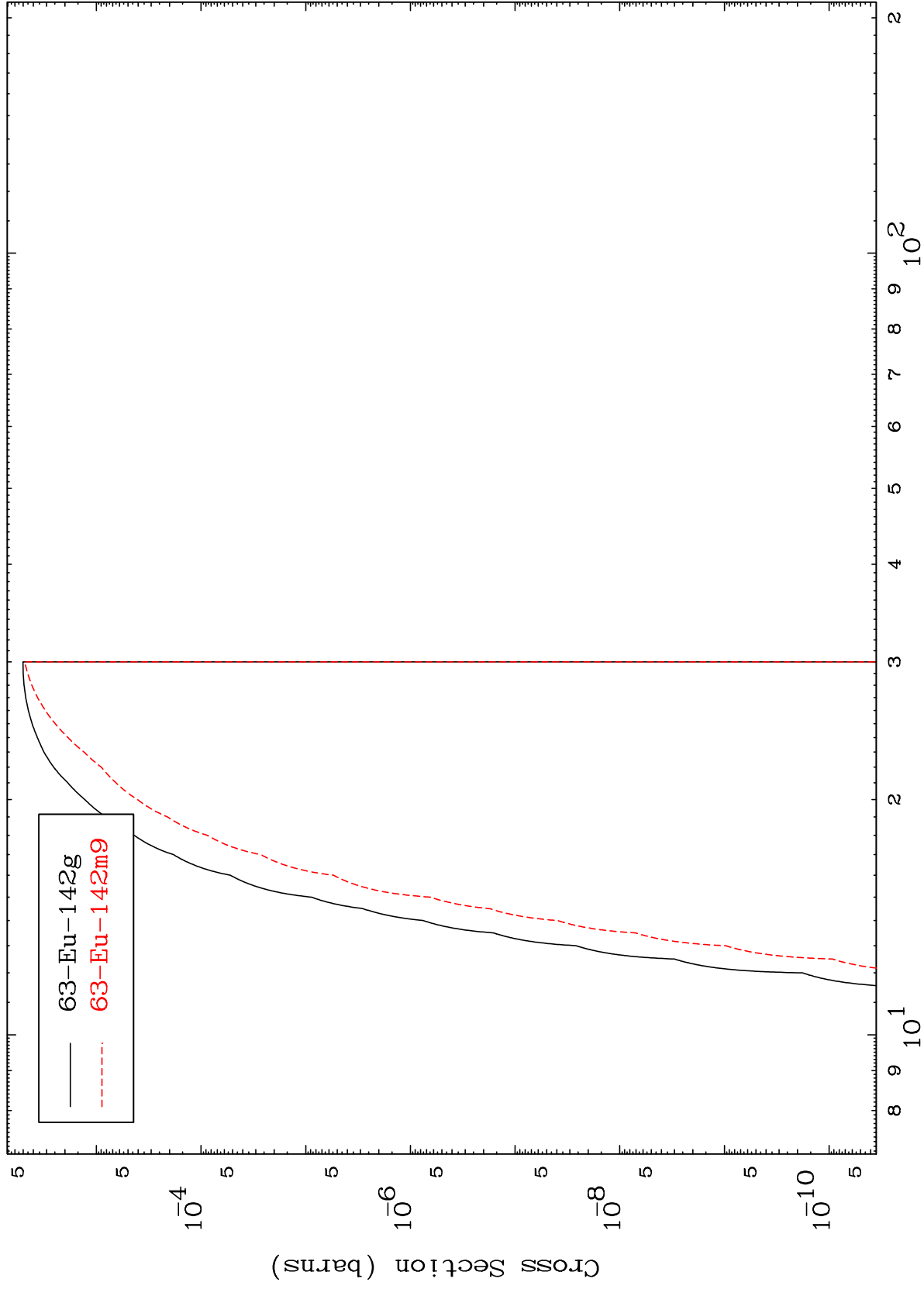
(n,γ)  
Radionuclide Production Cross Section



MAT 6401

64-Gd-144

(n, t)  
Radionuclide Production Cross Section



95

Incident Energy (MeV)

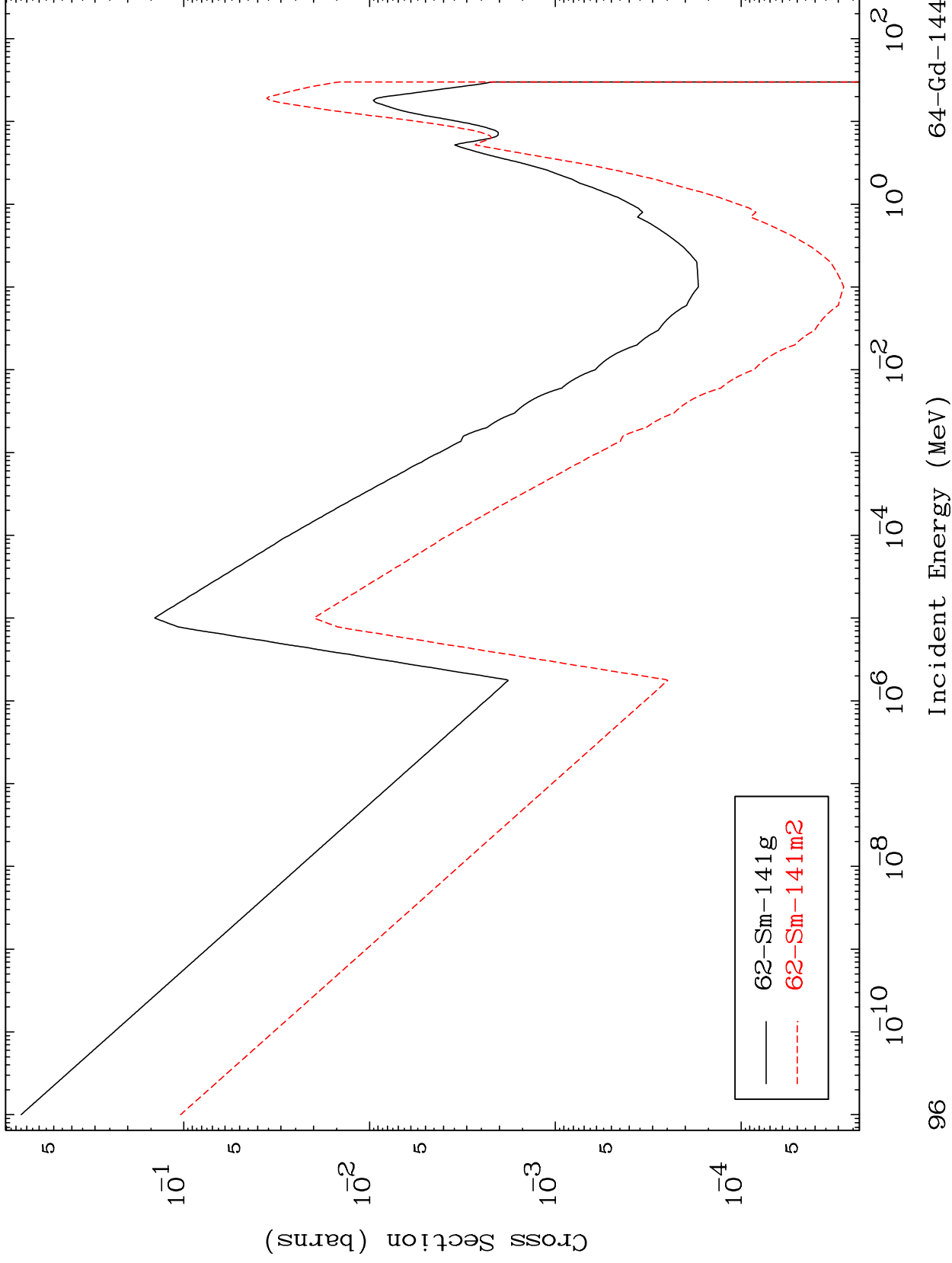
64-Gd-144



MAT 6401

64-Gd-144

Radionuclide Production Cross Section  
(n,  $\alpha$ )

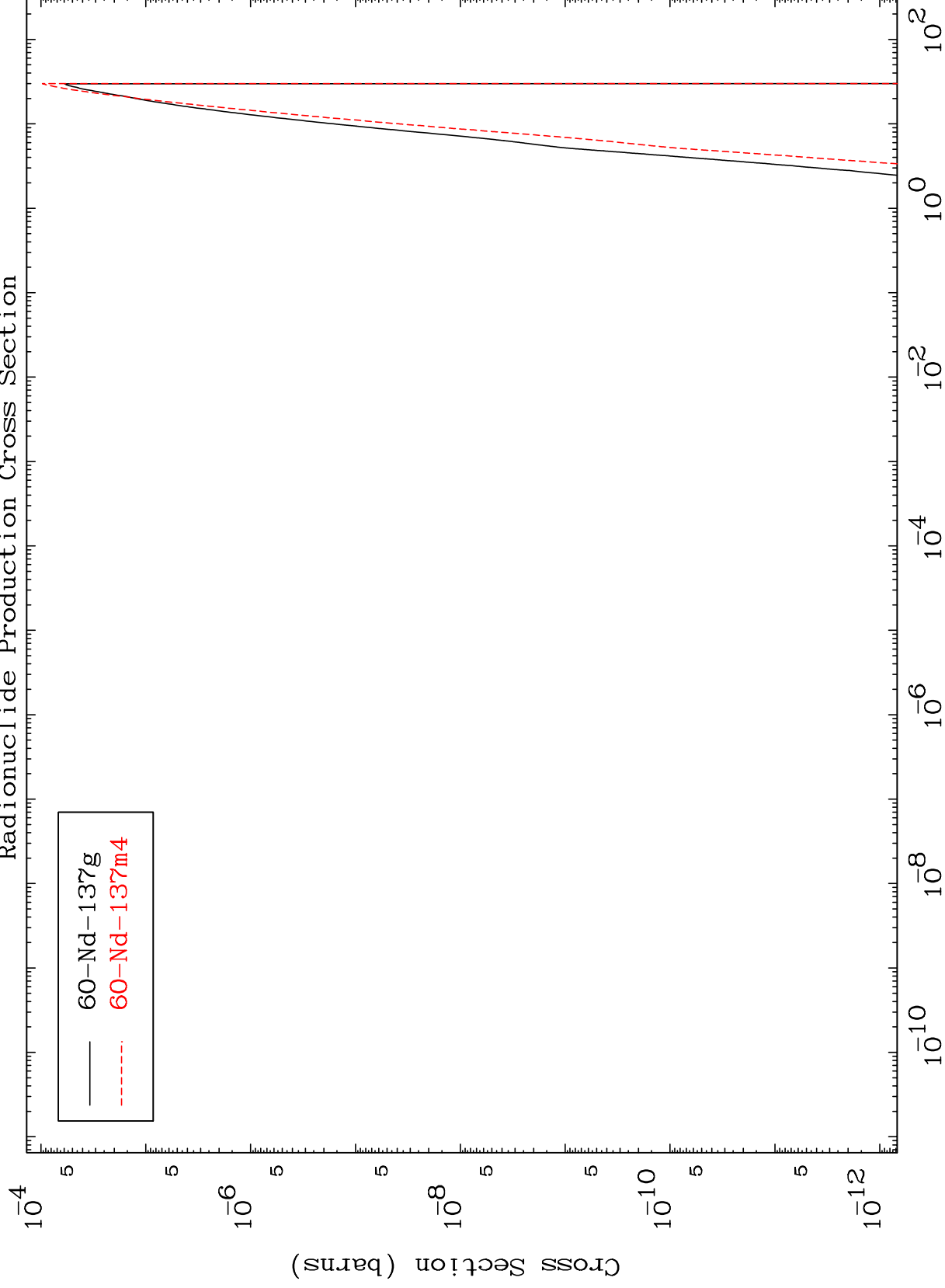


MAT 6401

(n,2α)

64-Gd-144

Radionuclide Production Cross Section



97

Incident Energy (MeV)

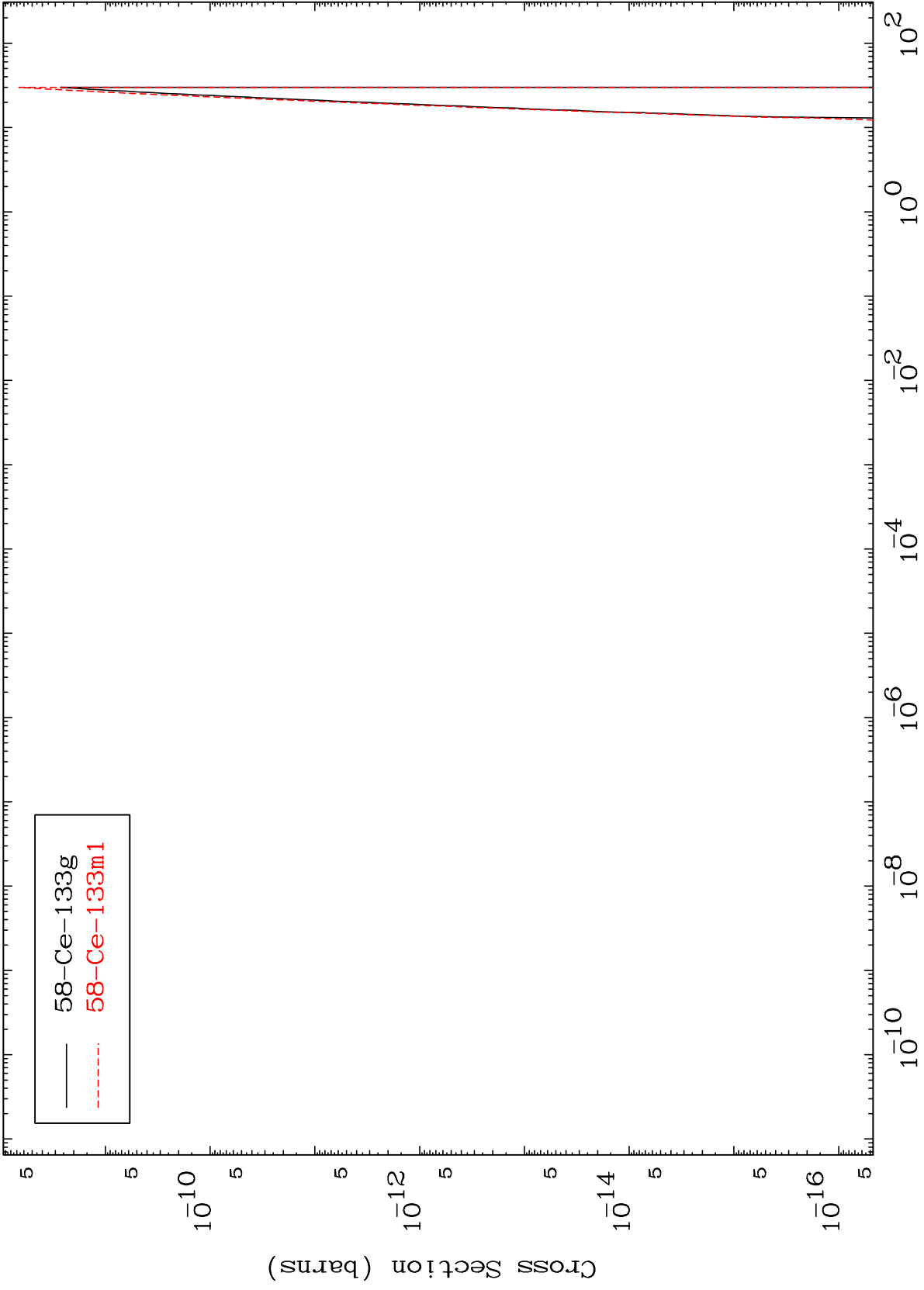
64-Gd-144

MAT 6401

(n, 3α)

64-Gd-144

Radionuclide Production Cross Section



98

Incident Energy (MeV)

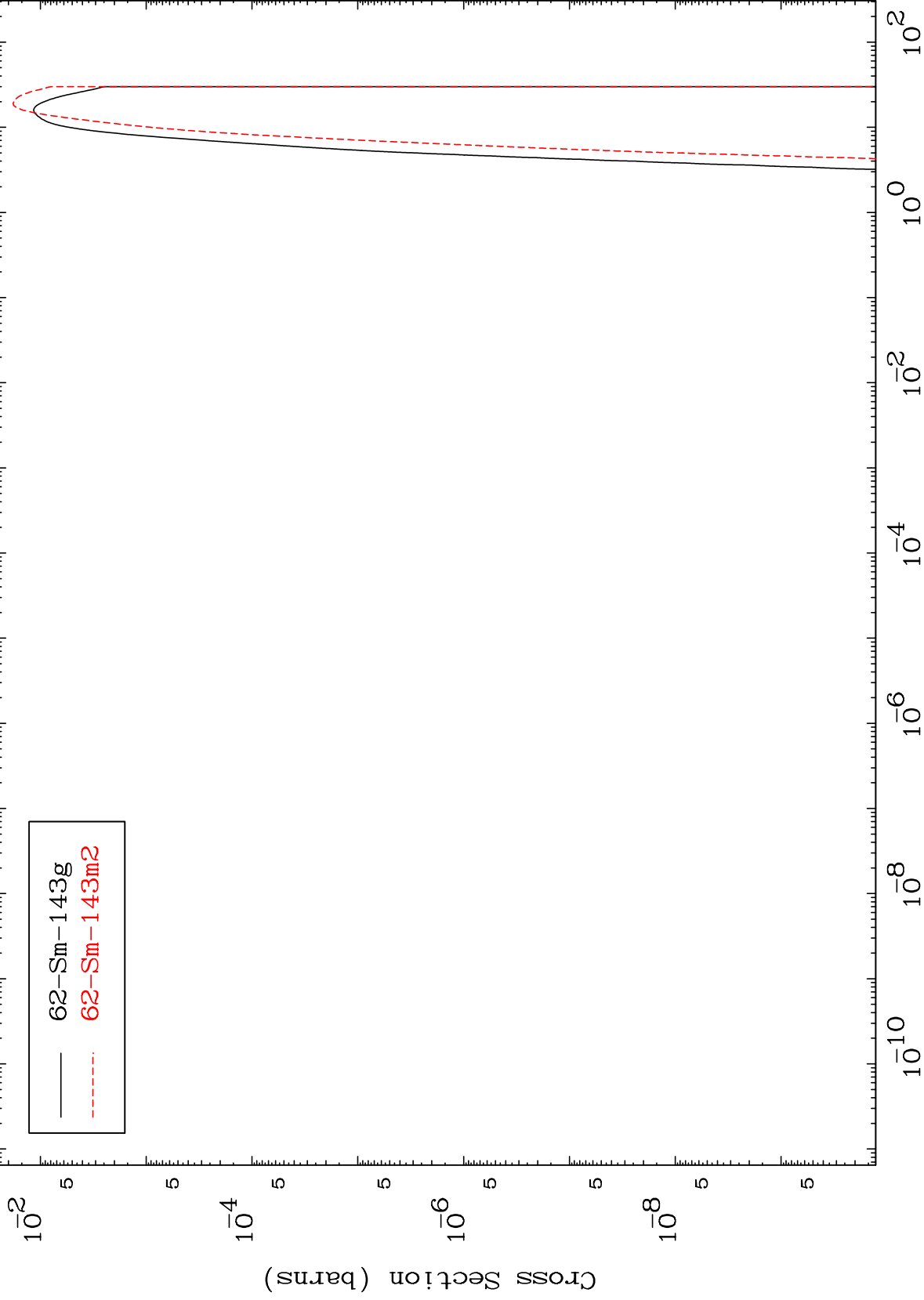
64-Gd-144

MAT 6401

(n,2p)

64-Gd-144

Radionuclide Production Cross Section



99

Incident Energy (MeV)

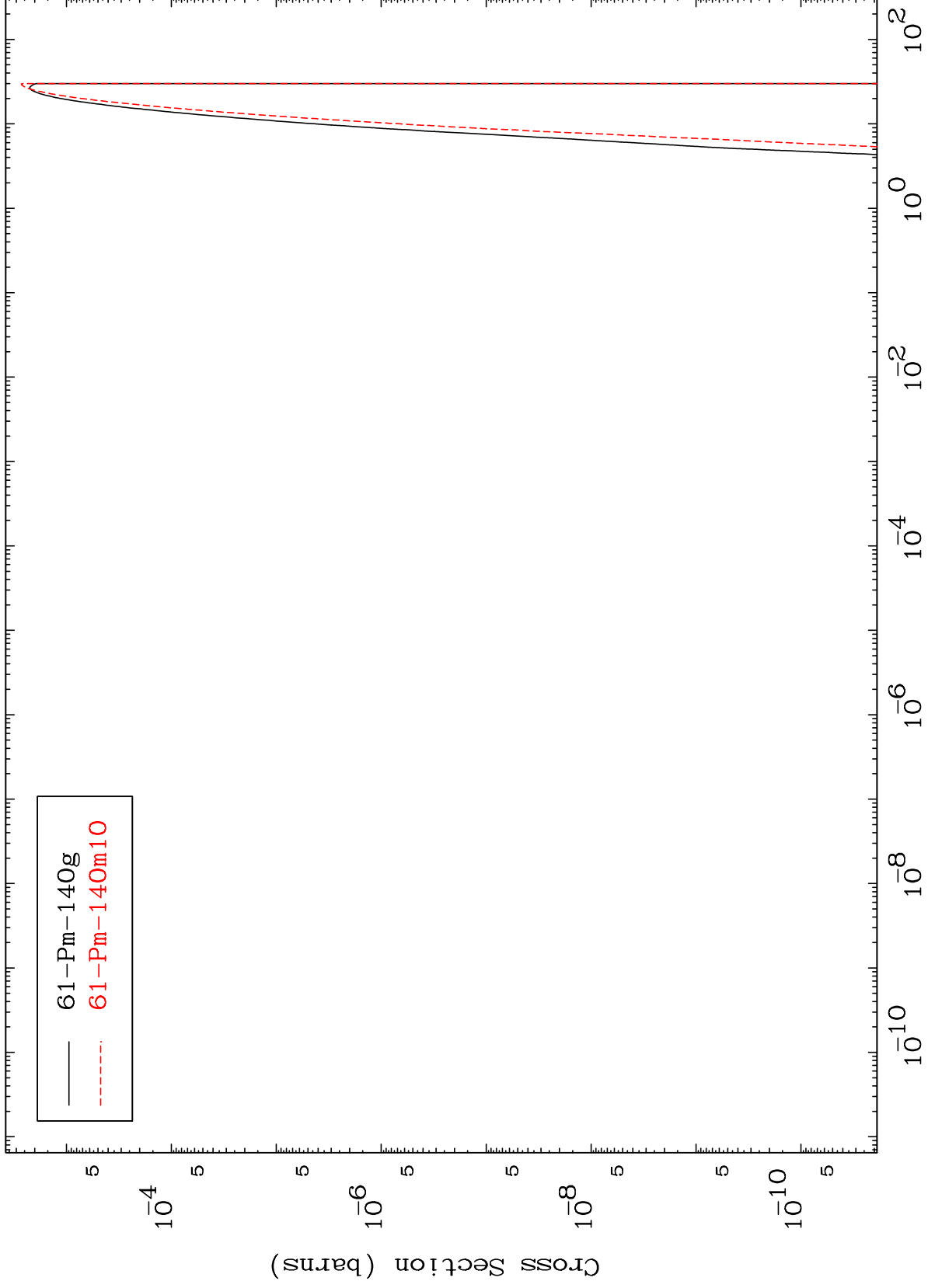
64-Gd-144

MAT 6401

(n,p)  $\alpha$

64-Gd-144

Radionuclide Production Cross Section



100

Incident Energy (MeV)

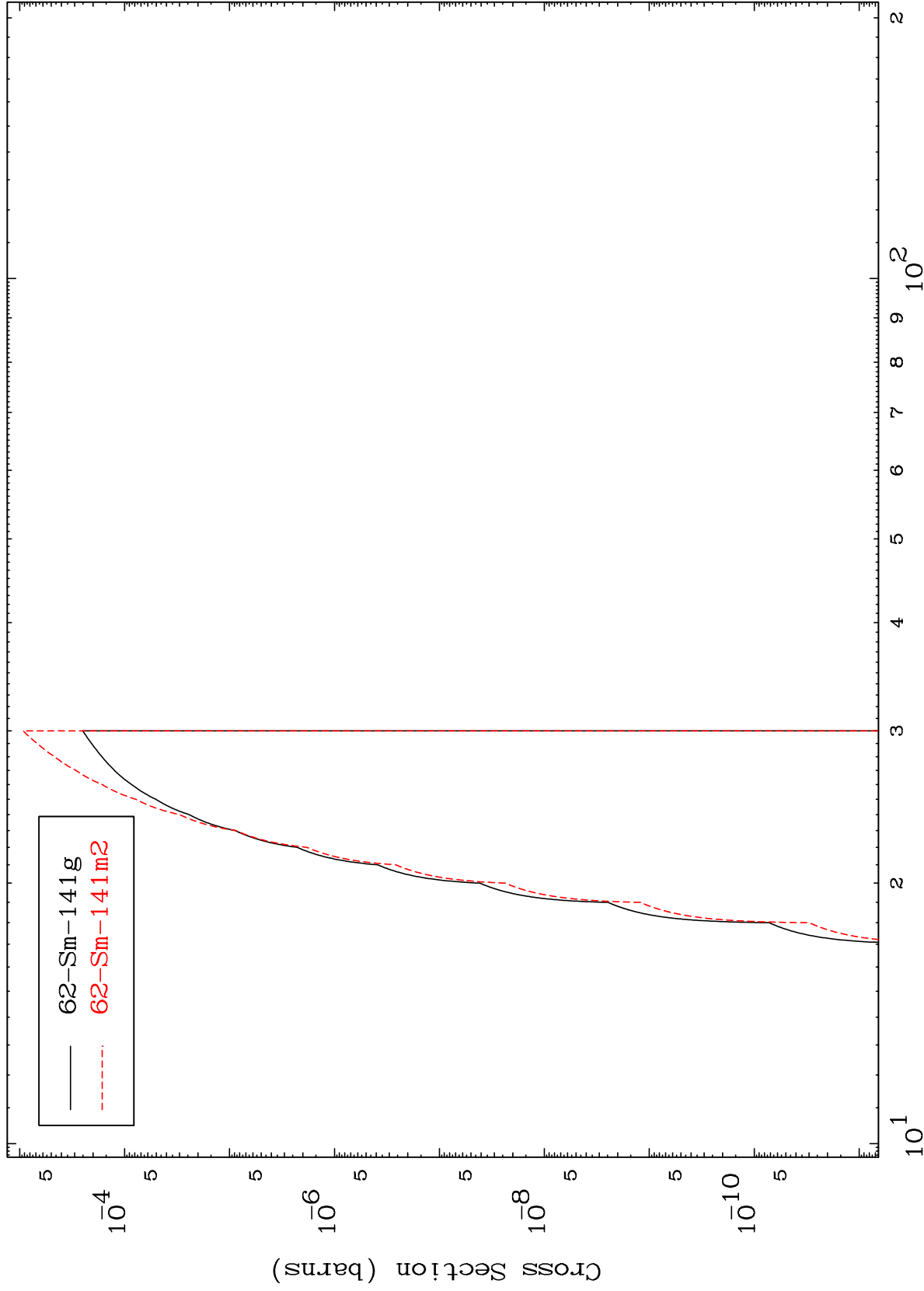
64-Gd-144

MAT 6401

(n,p) t

64-Gd-144

Radionuclide Production Cross Section



Incident Energy (MeV)

64-Gd-144

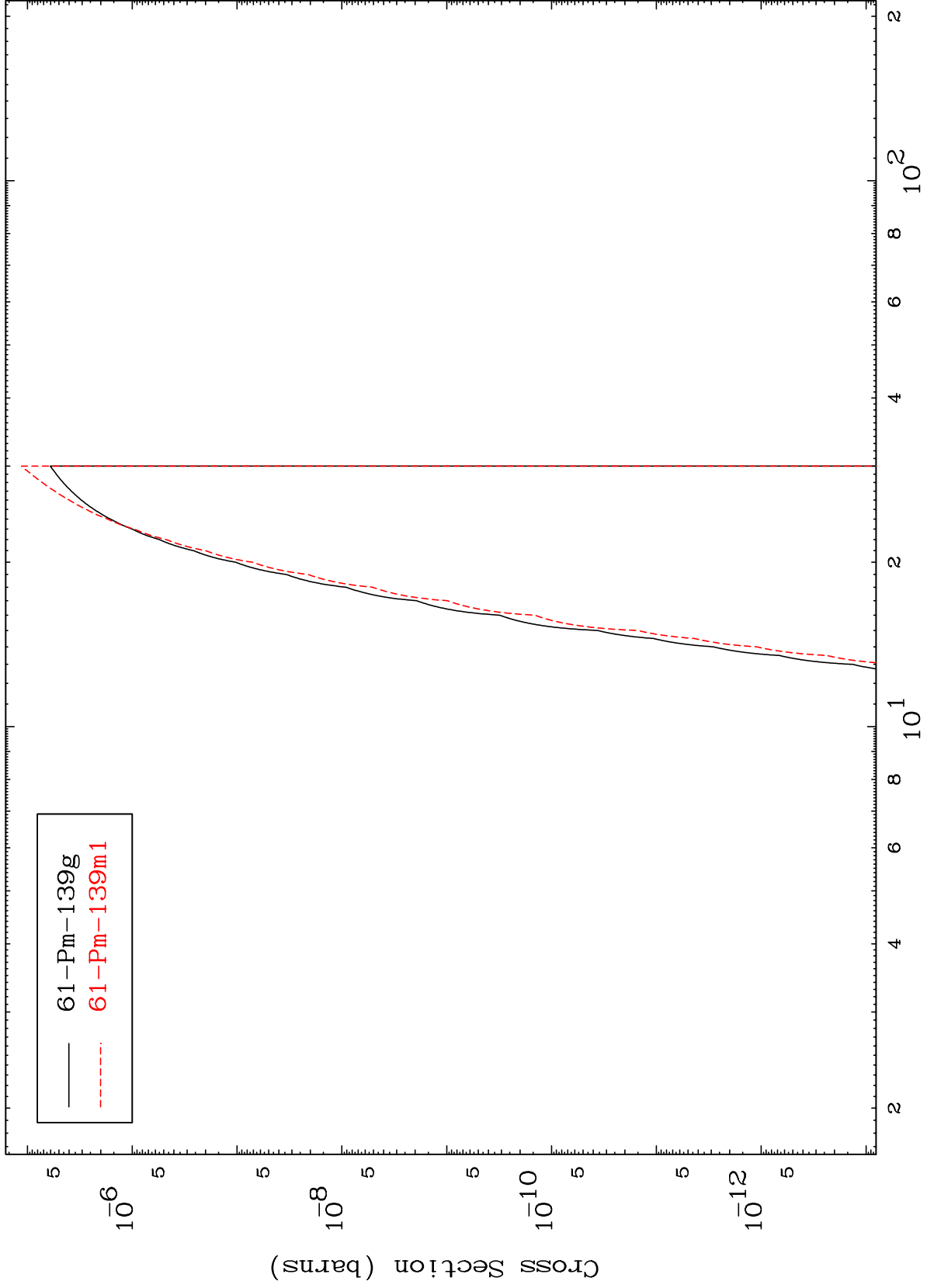
101

MAT 6401

(n,d)  $\alpha$

64-Gd-144

Radionuclide Production Cross Section



102

Incident Energy (MeV)

64-Gd-144