ENDF/B-VII SE-77
Principal cross sections

![Graph showing principal cross sections with energy on the x-axis and cross section on the y-axis, with three curves representing total, absorption, and elastic cross sections.](image-url)
ENDF/B-VII SE-77
resonance total cross section

![Graph showing resonance total cross section](image-url)
ENDF/B-VII SE-77
resonance total cross section

Cross section (barns)

Energy (MeV)
ENDF/B-VII SE-77
resonance total cross section

Energy (MeV) vs. Cross section (barns)
ENDF/B-VII SE-77
resonance total cross section

Cross section (barns)

Energy (MeV)

10^0 10^1

total
ENDF/B-VII SE-77
resonance absorption cross sections

![Graph showing resonance absorption cross sections. The y-axis represents the cross section in barns, ranging from $10^{-4}$ to $10^{2}$, and the x-axis represents Energy (MeV) ranging from $10^{-4}$ to $10^{-3}$. The graph features multiple peaks representing resonances.]
ENDF/B-VII SE-77
resonance absorption cross sections

Energy (MeV)

Cross section (barns)

capture
ENDF/B-VII SE-77
resonance absorption cross sections

![Graph showing the relationship between energy (MeV) and capture cross section (barns). The cross section decreases as energy increases.]
ENDF/B-VII SE-77
resonance absorption cross sections

Capture cross section as a function of energy (MeV), showing a decrease with increasing energy.
ENDF/B-VII SE-77
UR total cross section

Energy (MeV)

Cross section (barns)

- Inf. Dil.
- 100 b

$10^{-2}$ $10^{-1}$

$10^{1}$ $10^{2}$
ENDF/B-VII SE-77
UR capture cross section

Energy (MeV)

Cross section (barns)

Inf. Dil.
100 b
ENDF/B-VII SE-77
Damage

Damage (MeV-barns) vs. Energy (MeV)
ENDF/B-VII SE-77
Non-threshold reactions

Cross section (barns) vs. Energy (MeV)
ENDF/B-VII SE-77
Principal cross sections

Energy (MeV)

Cross section (barns)

- total
- absorption
- elastic

Energy (MeV)
ENDF/B-VII SE-77
Heating

Heating (MeV/reaction) vs. Energy (MeV)

- Heating curve

The graph shows the heating (MeV/reaction) as a function of energy (MeV). The heating value increases with energy, with a peak around 10 MeV and a steady rise thereafter.
ENDF/B-VII SE-77
Damage

Damage (MeV-barns) vs. Energy (MeV)

- Damage

Energy (MeV) scale: 0 to 20
Damage (MeV-barns) scale: 0 to 400

Damage increases with energy.
ENDF/B-VII SE-77
Non-threshold reactions

Cross section (barns) vs. Energy (MeV)

(n,gma)
ENDF/B-VII SE-77
Inelastic levels

Energy (MeV)

Cross section (barns)

(n,n*6)
(n,n*7)
(n,n*8)
(n,n*9)
(n,n*10)
ENDF/B-VII SE-77
Inelastic levels

Energy (MeV)

Cross section (barns)

(n,n*16)
(n,n*17)
(n,n*18)
(n,n*19)
(n,n*20)
ENDF/B-VII SE-77
Inelastic levels

Energy (MeV)

Cross section (barns)

*10^{-3}

(n,n*21)
(n,n*22)
(n,n*23)
(n,n*24)
(n,n*25)
ENDF/B-VII SE-77
Threshold reactions

Cross section (barns) vs. Energy (MeV)

- (n,a)
- (n,2p)
ENDF/B-VII SE-77
angular distribution for elastic
ENDF/B-VII SE-77
angular distribution for (n,2n)
ENDF/B-VII SE-77
angular distribution for (n,n*)a

Energy (MeV)

10

8

6

4

2

0

10

8

6

4

2

0

Pro/Co

1.0 0.5 0.0 -0.5 -1.0

Cosine

1.0 0.5 0.0 -0.5 -1.0

Pro/Co
ENDF/B-VII SE-77
angular distribution for (n,n*)p

Energy (MeV)

Cosine

Probability
ENDF/B-VII SE-77
angular distribution for (n,n*)d
ENDF/B-VII SE-77 angular distribution for (n,n*1)
ENDF/B-VII SE-77
angular distribution for (n,n*2)
ENDF/B-VII SE-77
angular distribution for (n,n*3)
ENDF/B-VII SE-77
angular distribution for (n,n*4)
ENDF/B-VII SE-77
angular distribution for (n,n*5)
ENDF/B-VII SE-77
angular distribution for (n,n*6)
ENDF/B-VII SE-77
angular distribution for (n,n*7)
ENDF/B-VII SE-77
angular distribution for (n,n*8)
ENDF/B-VII SE-77
angular distribution for (n,n*10)
angular distribution for (n,n*11)

Energy (MeV)
ENDF/B-VII SE-77
angular distribution for (n,n*12)
ENDF/B-VII SE-77
angular distribution for (n,n*13)
ENDF/B-VII SE-77
angular distribution for (n,n*14)
ENDF/B-VII SE-77
angular distribution for (n,n*15)
ENDF/B-VII SE-77
angular distribution for (n,n*16)
ENDF/B-VII SE-77
angular distribution for (n,n^*17)
ENDF/B-VII SE-77
angular distribution for (n,n*18)
ENDF/B-VII SE-77
angular distribution for (n,n*19)
ENDF/B-VII SE-77
angular distribution for (n,n*20)
ENDF/B-VII SE-77
angular distribution for (n,n^*21)
ENDF/B-VII SE-77
angular distribution for (n,n*22)
ENDF/B-VII SE-77
angular distribution for (n,n*23)
ENDF/B-VII SE-77
angular distribution for (n,n*24)
ENDF/B-VII SE-77
angular distribution for (n,n*25)
ENDF/B-VII SE-77
angular distribution for (n,n*26)
ENDF/B-VII SE-77
angular distribution for (n,n*27)
ENDF/B-VII SE-77
angular distribution for (n,n*28)
ENDF/B-VII SE-77
angular distribution for (n,n*c)
ENDF/B-VII SE-77
Neutron emission for (n,2n)
ENDF/B-VII SE-77
Neutron emission for (n,3n)
ENDF/B-VII SE-77
Neutron emission for \((n,n^*)a\)
ENDF/B-VII SE-77
Neutron emission for \((n,n^*)p\)
ENDF/B-VII SE-77
Neutron emission for (n,n*)d

Energy (MeV)

10^{-1}, 10^{-1}, 10^{1}, 10^{3}

Possible Events

10^{-1}, 10^{-1}, 10^{1}, 10^{3}

Secondary Energy
ENDF/B-VII SE-77
Neutron emission for (n,n*c)