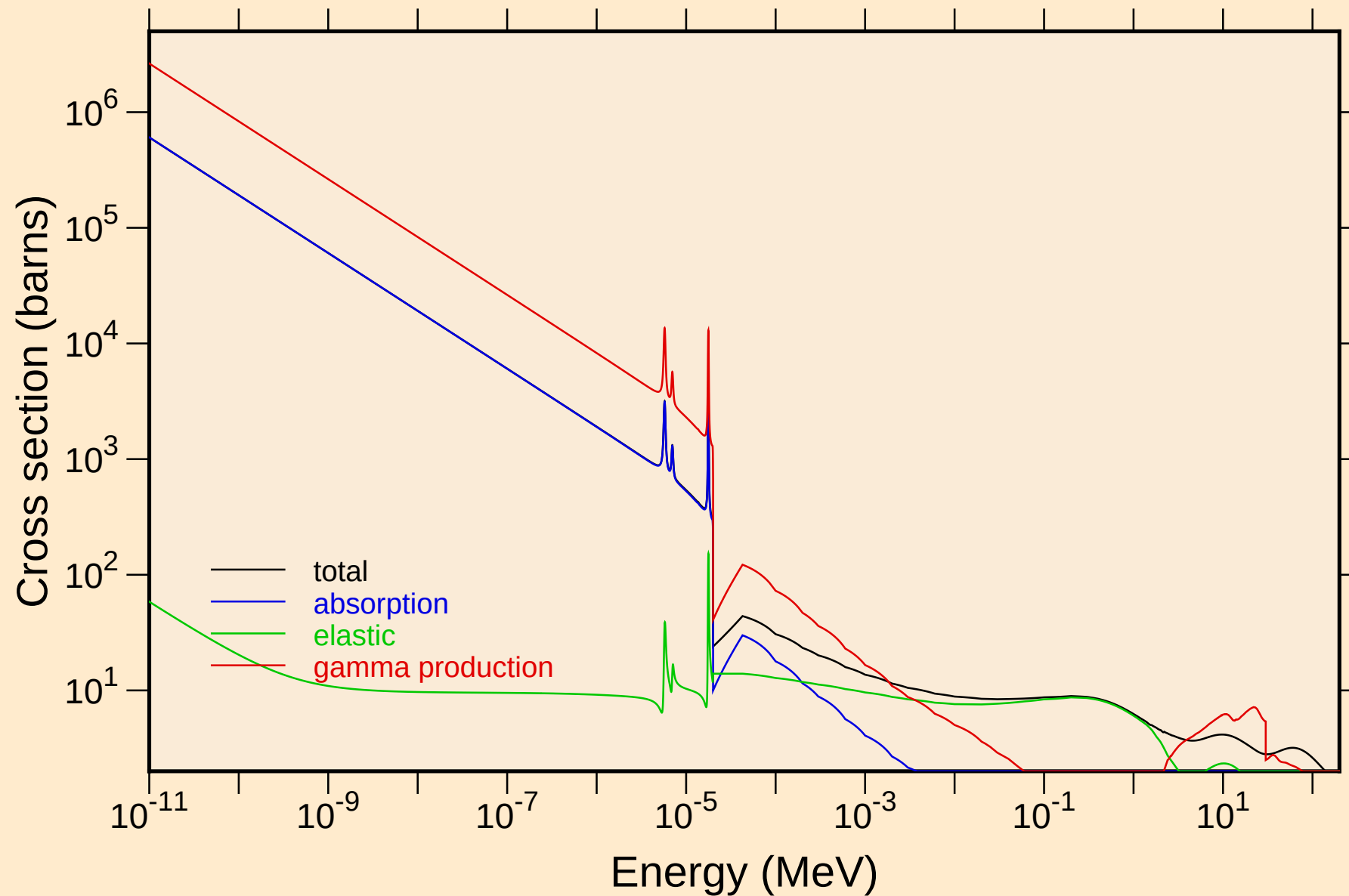


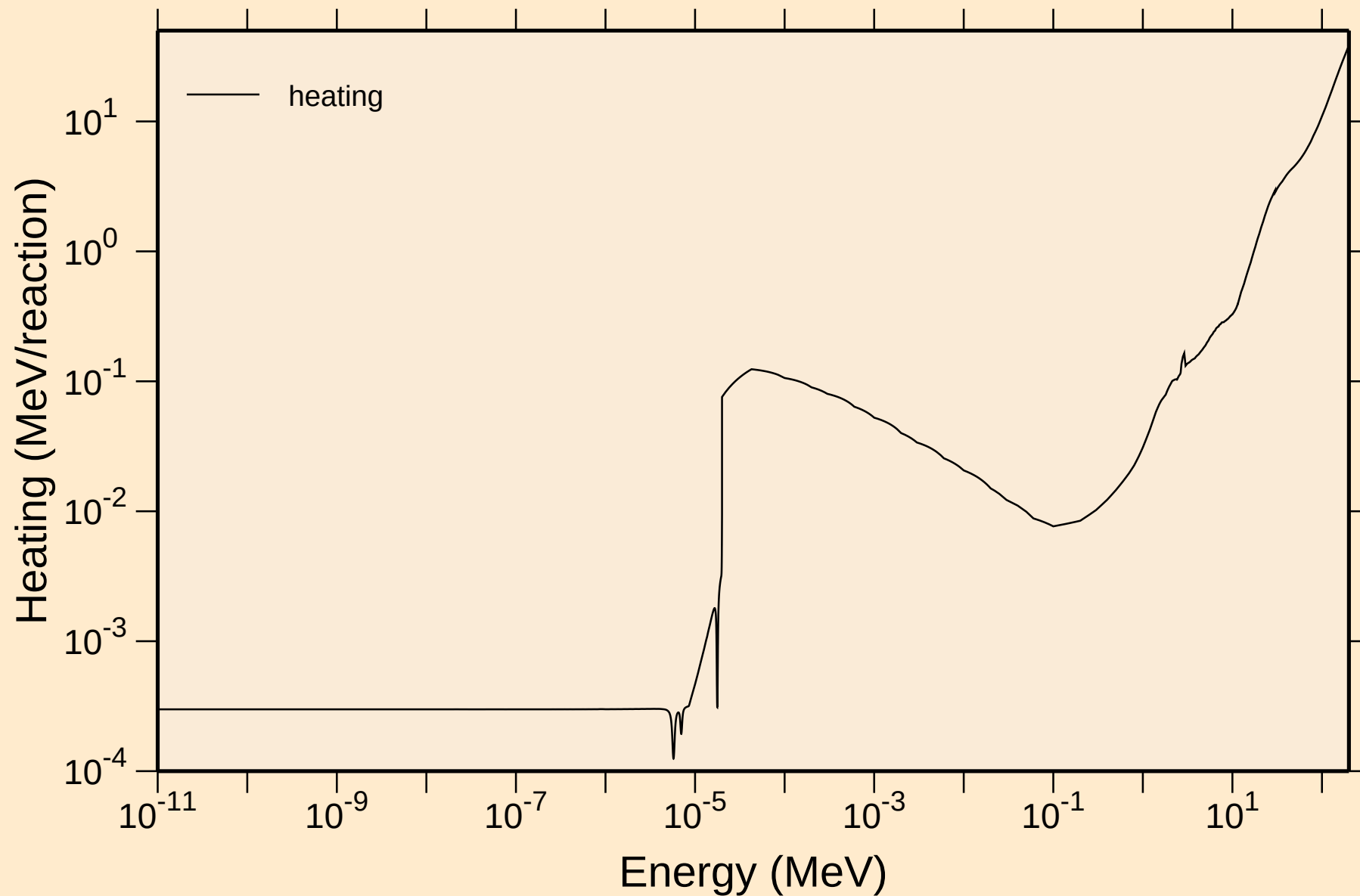
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

Principal cross sections



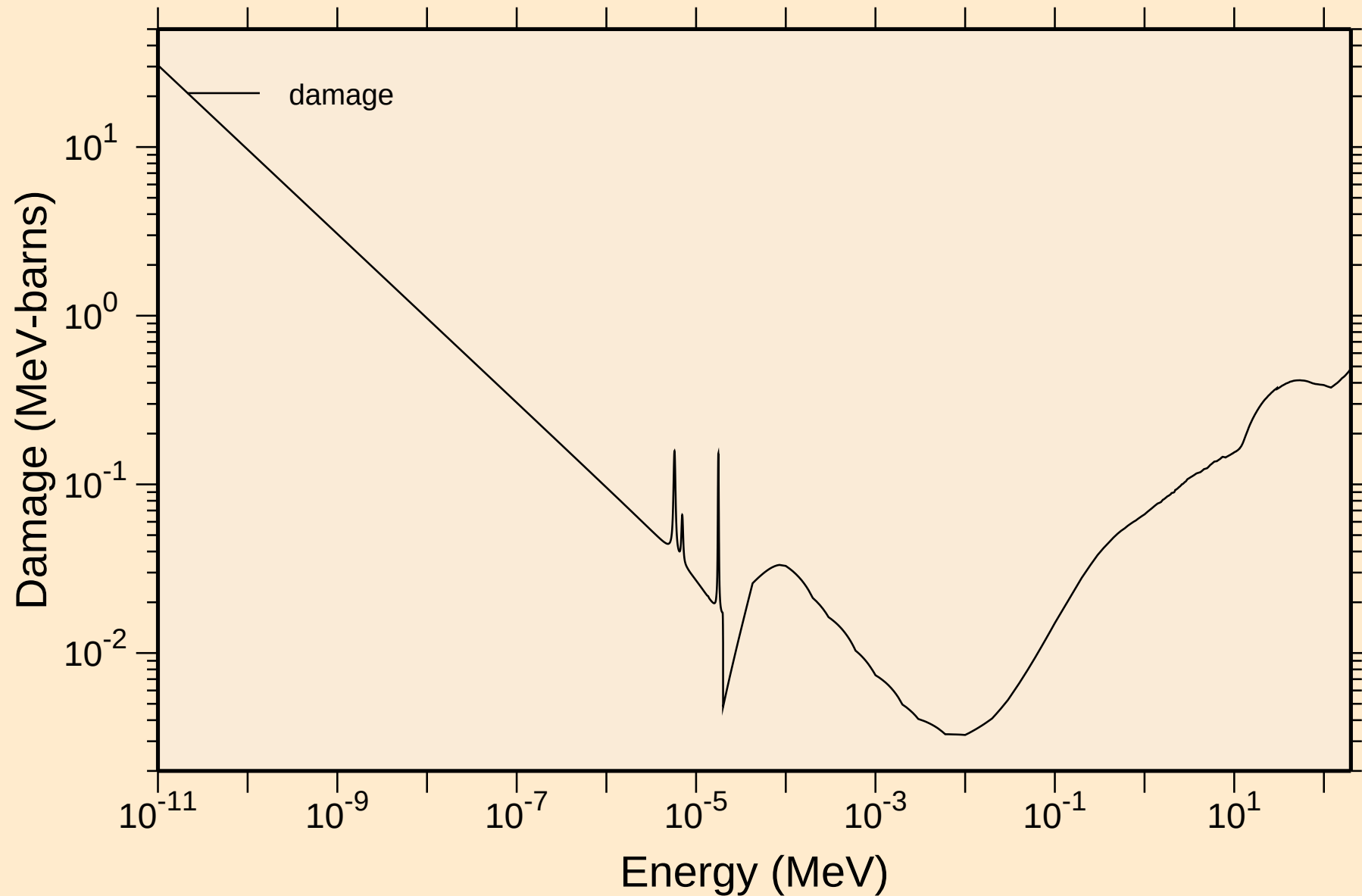
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

Heating

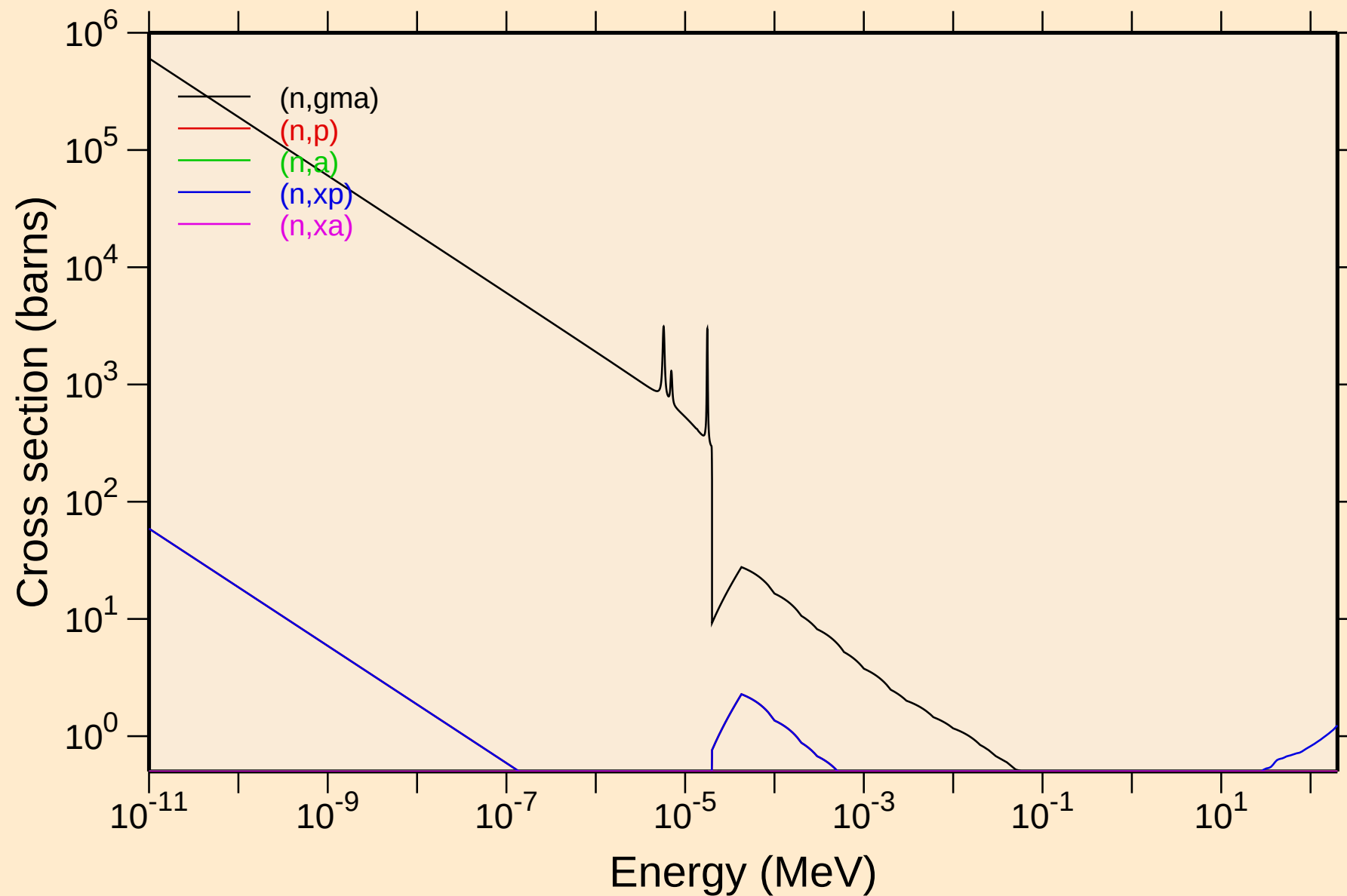


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

Damage

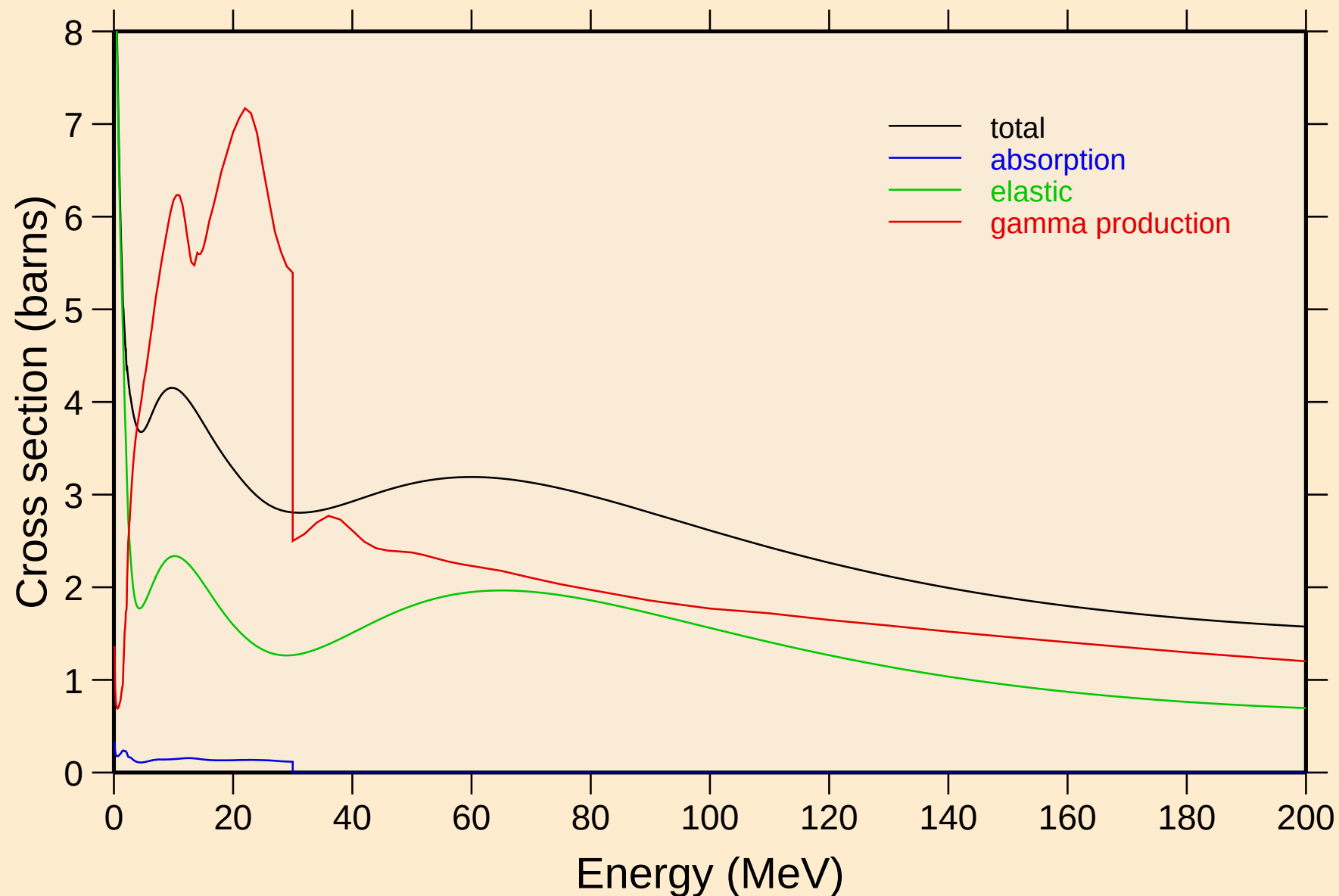


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Non-threshold reactions



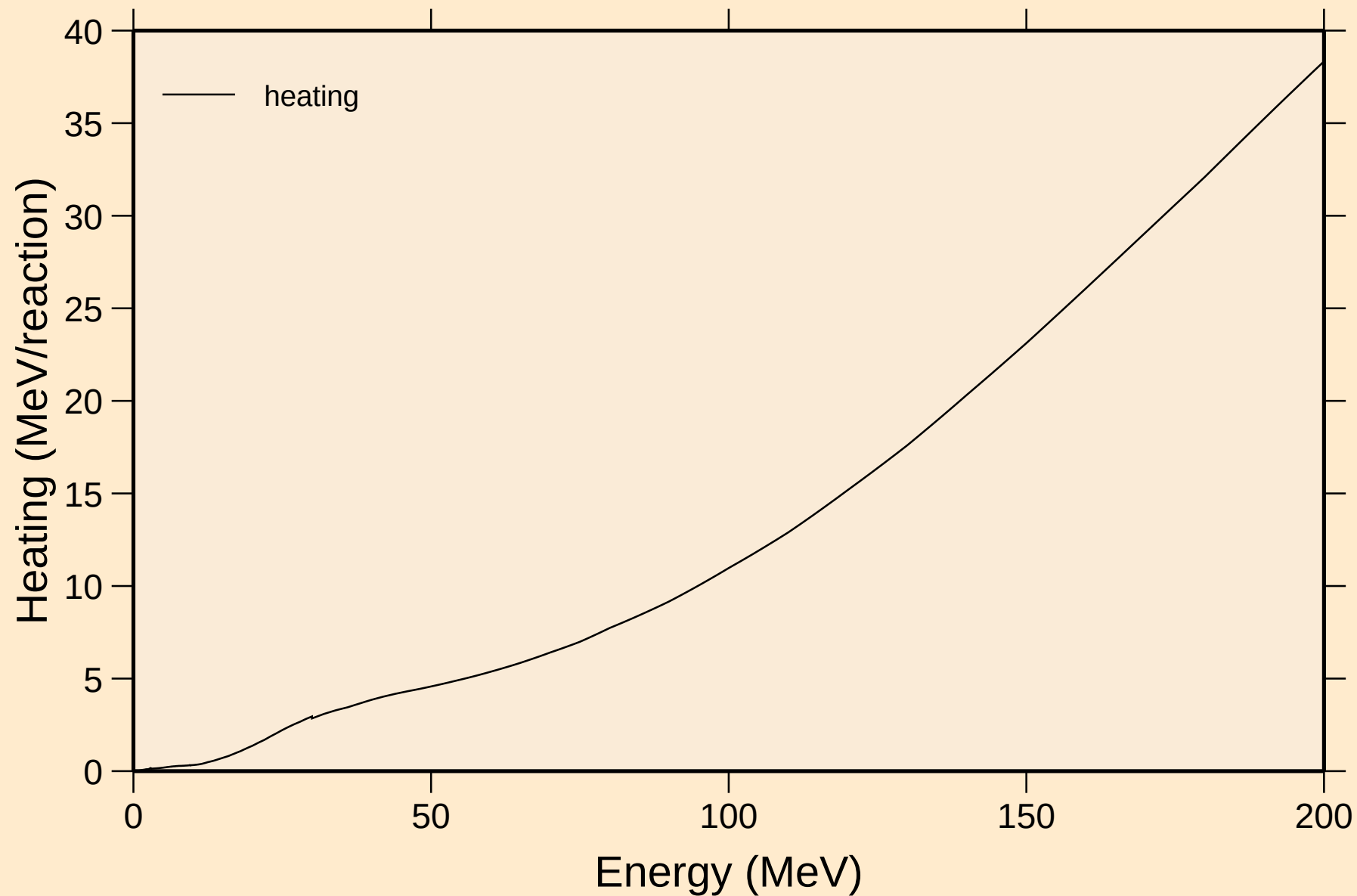
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

Principal cross sections



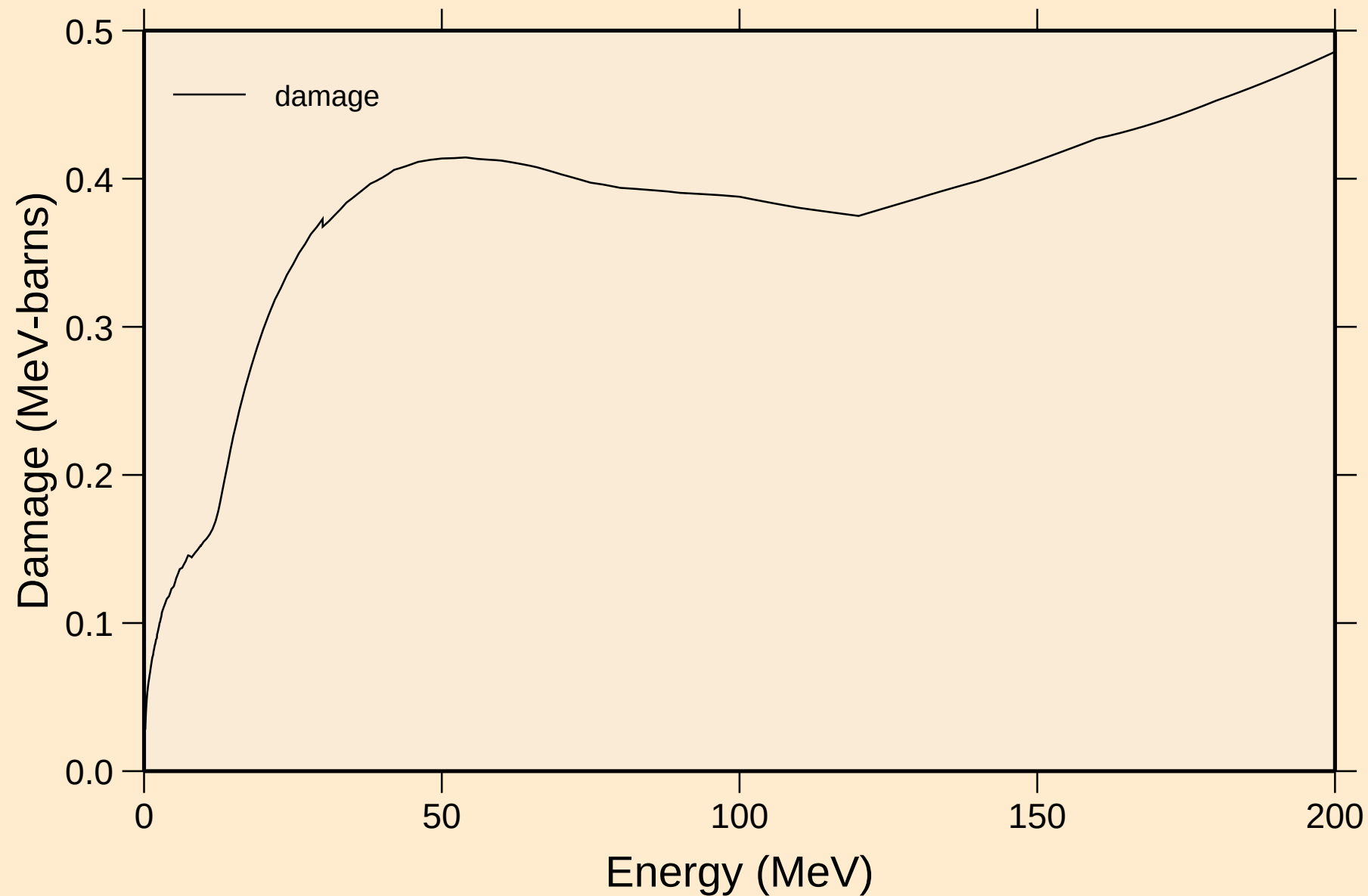
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

Heating

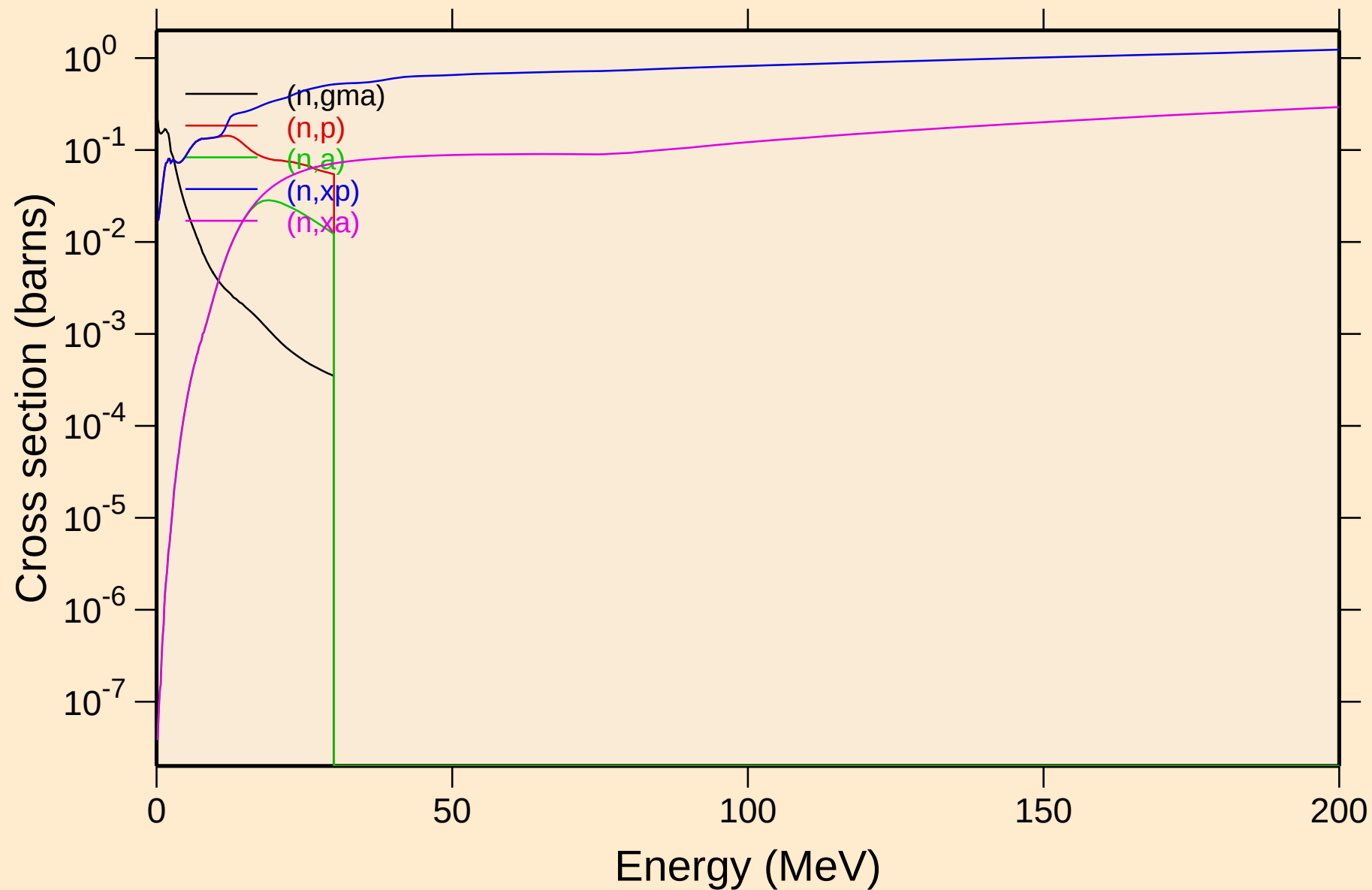


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

Damage

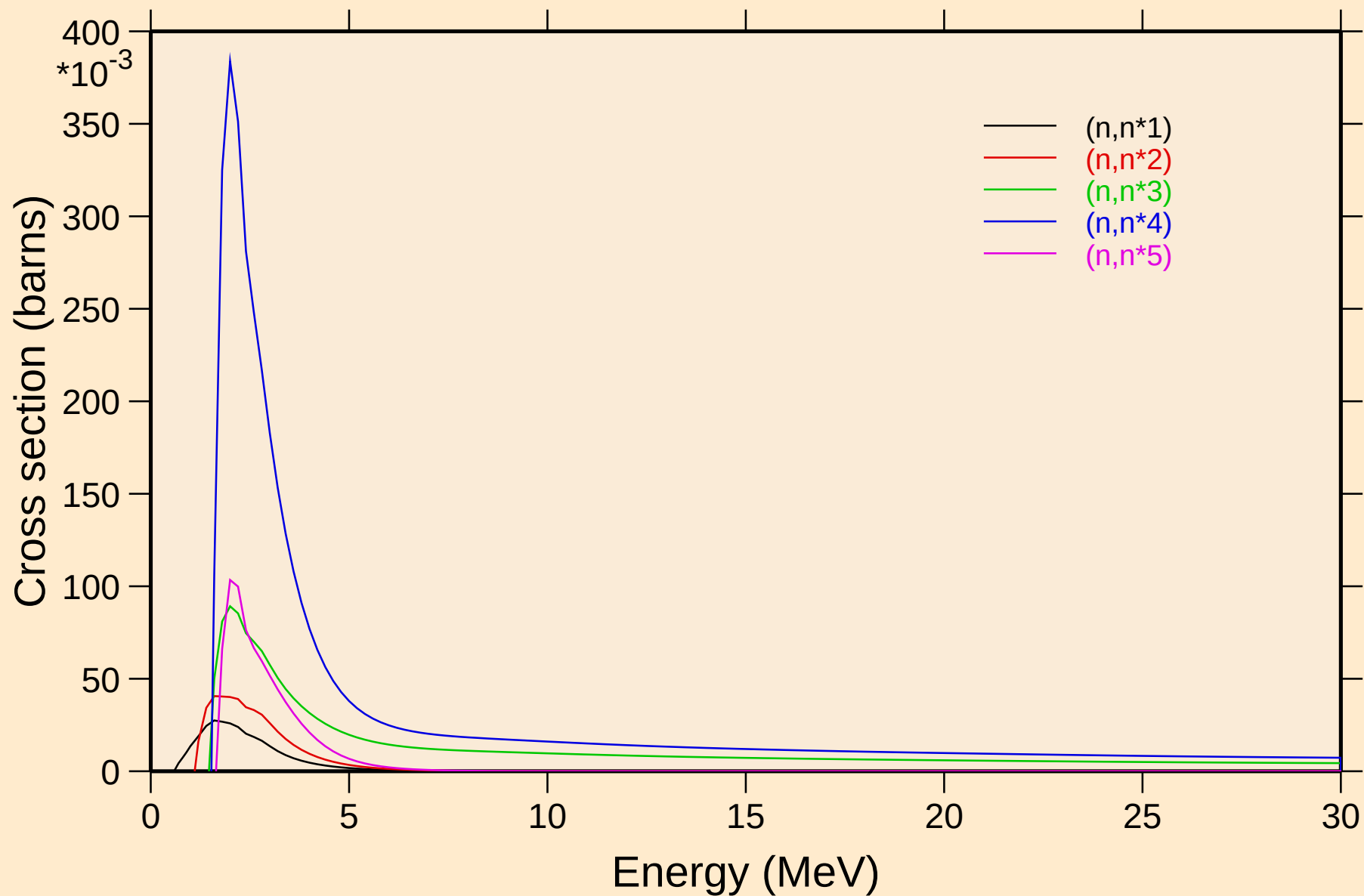


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Non-threshold reactions

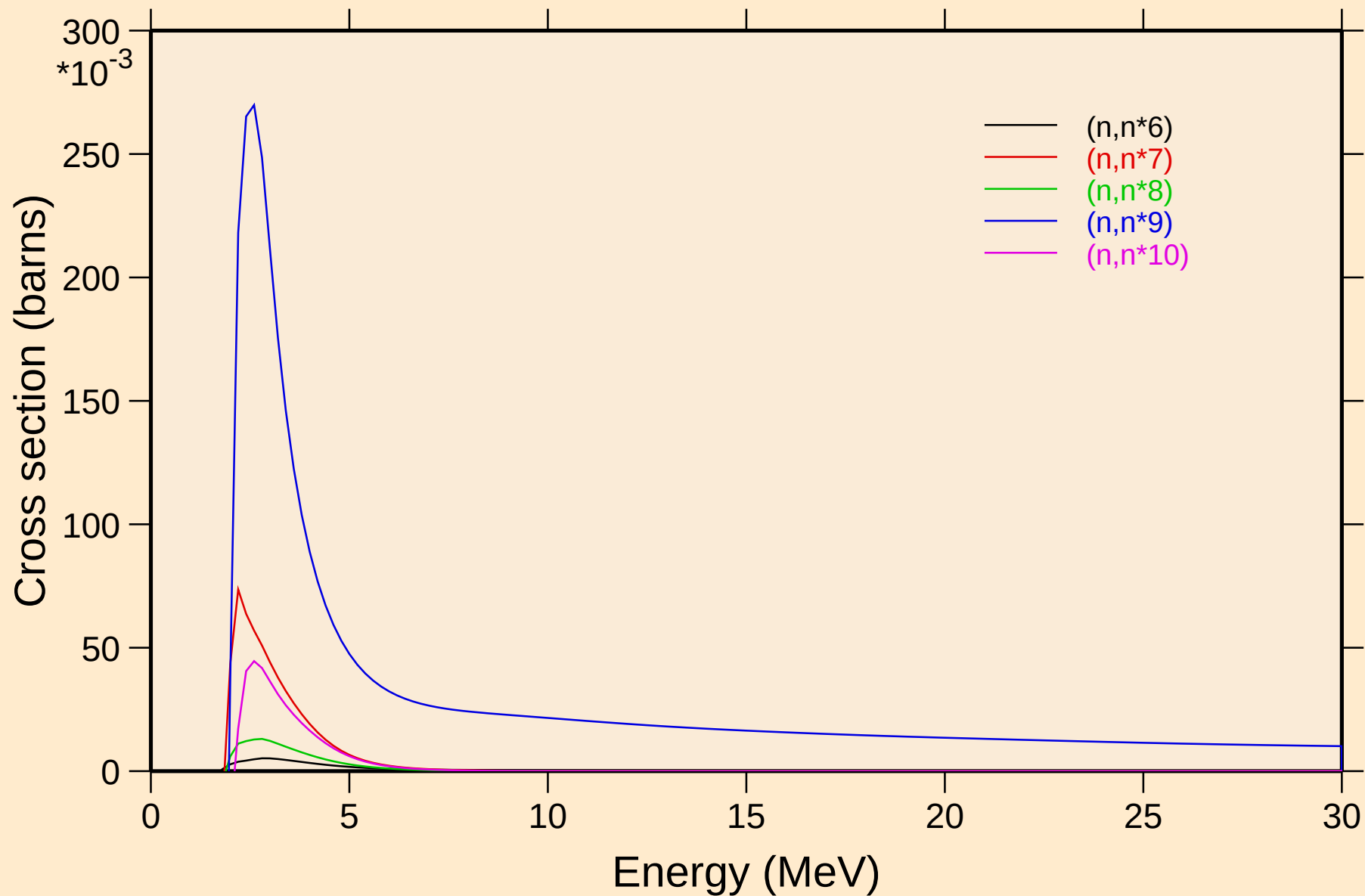


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

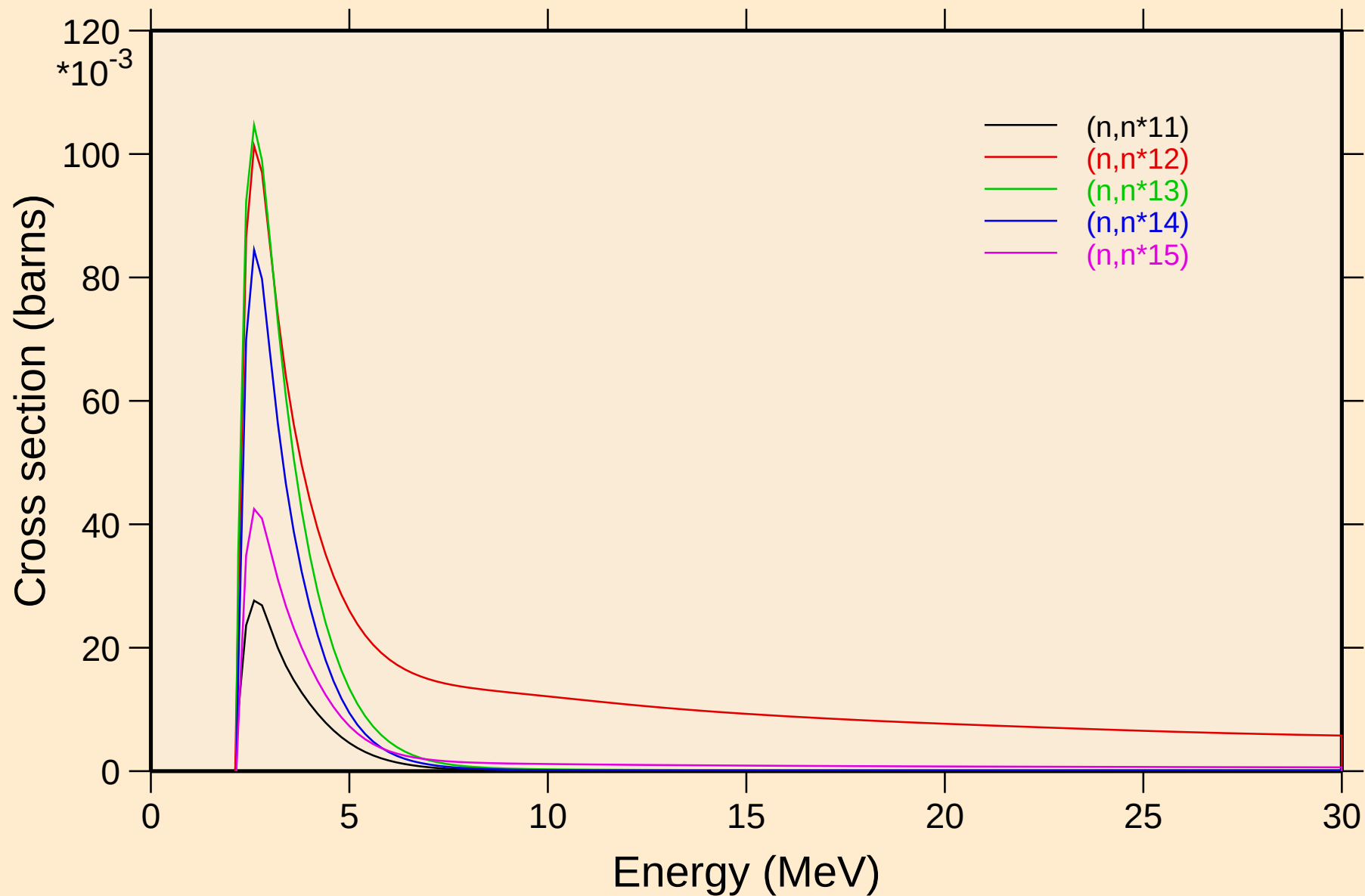
Inelastic levels



ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Inelastic levels

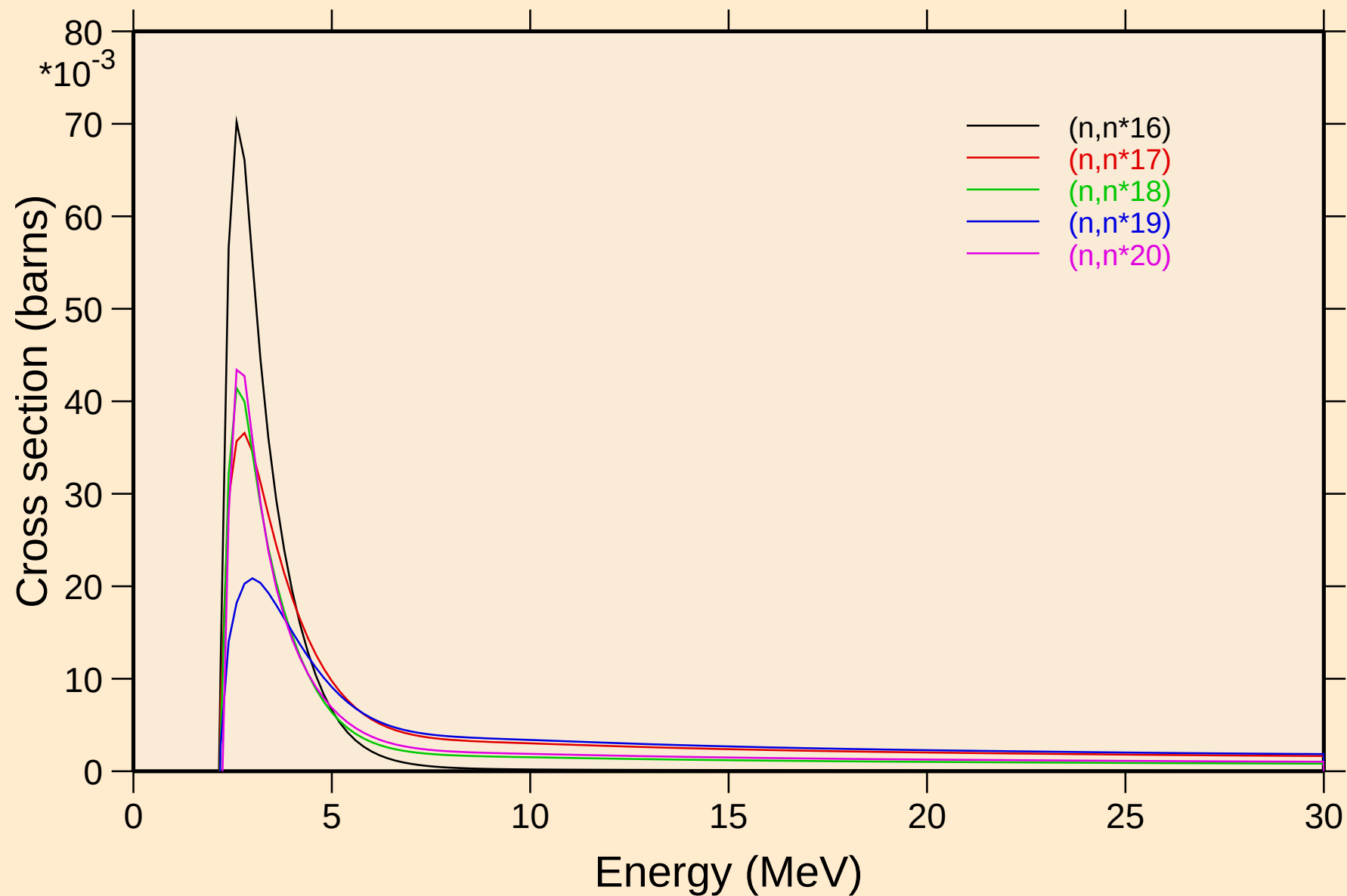


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Inelastic levels



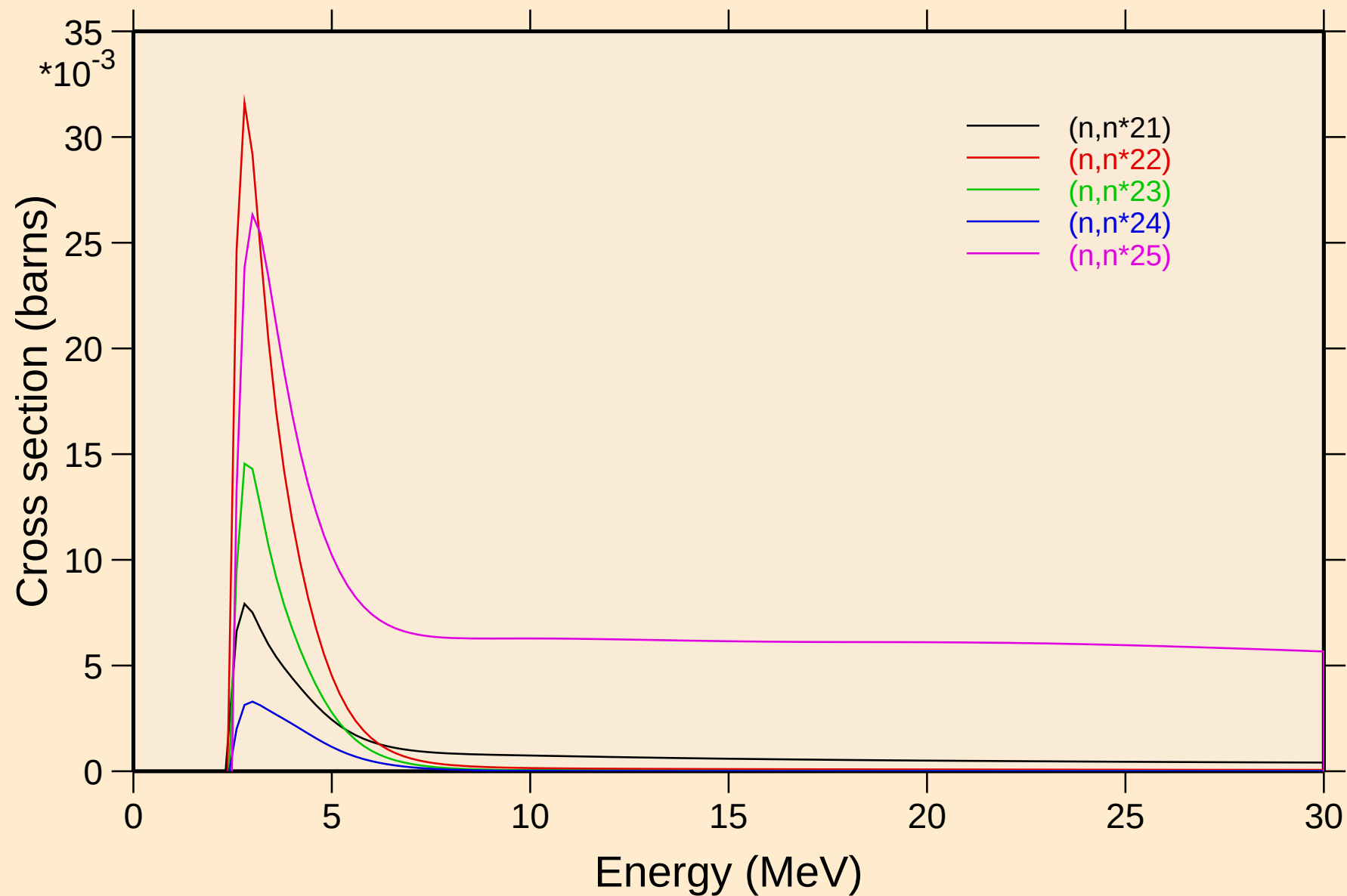
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

Inelastic levels



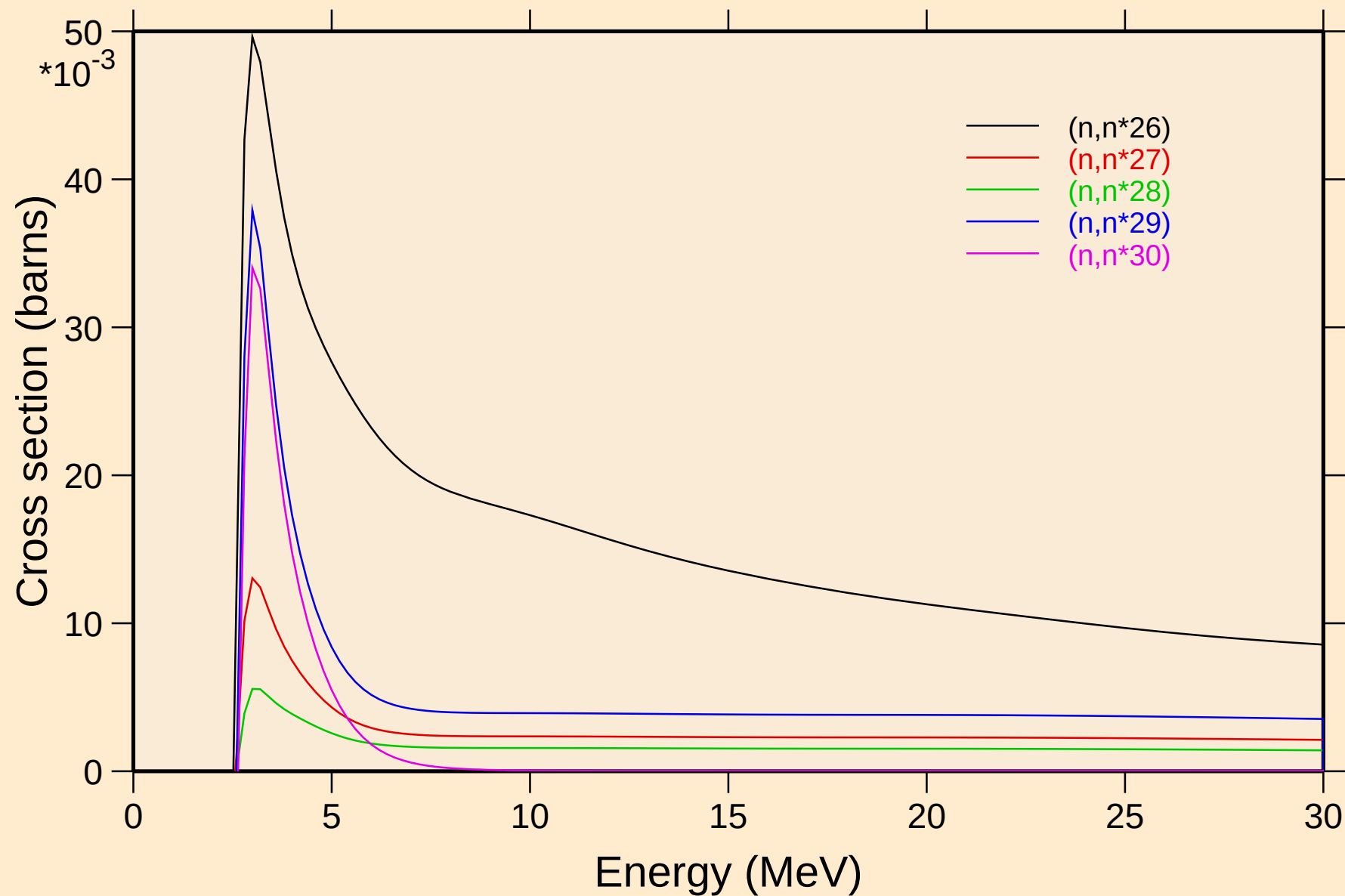
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

Inelastic levels



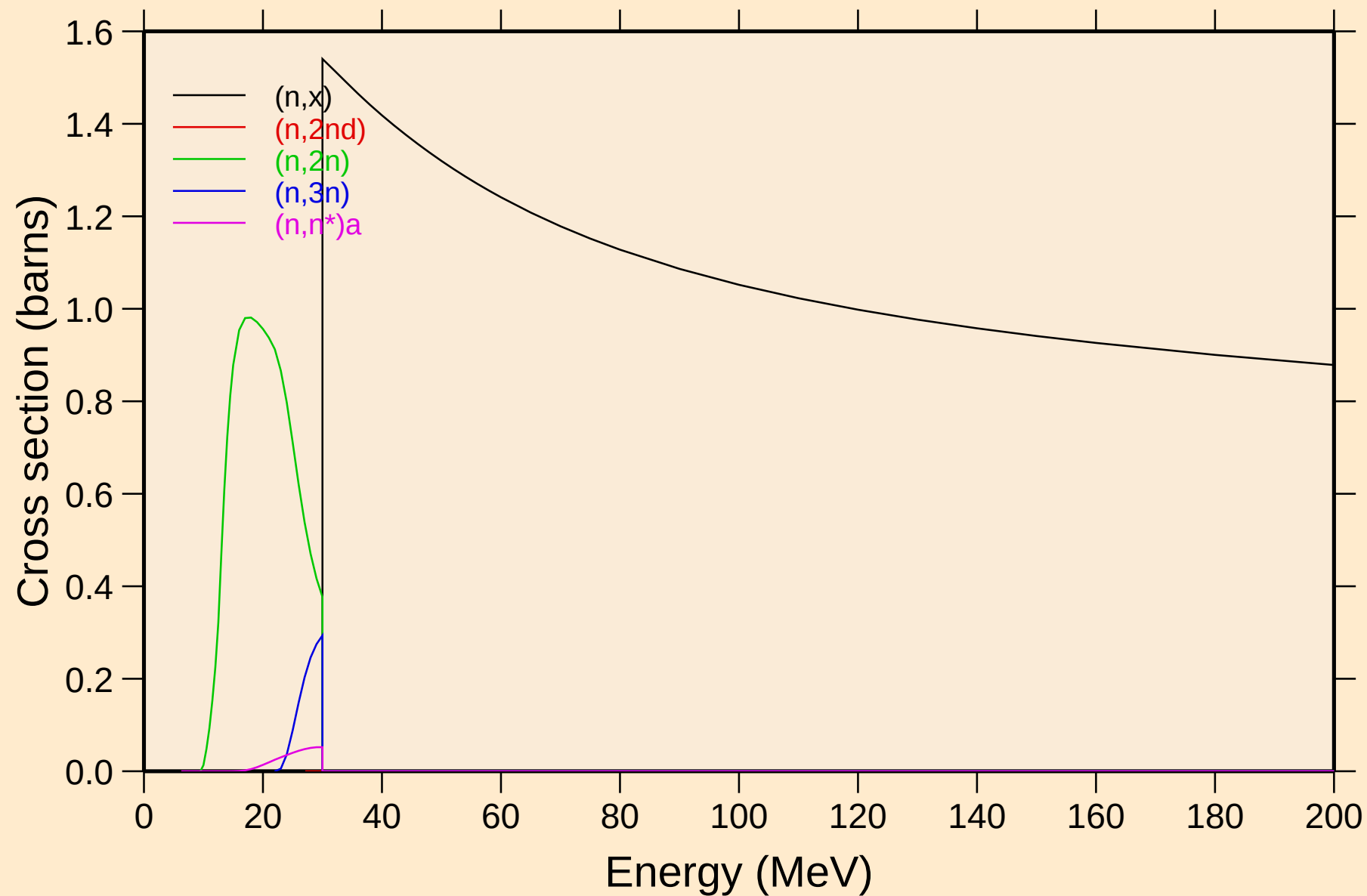
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

Inelastic levels

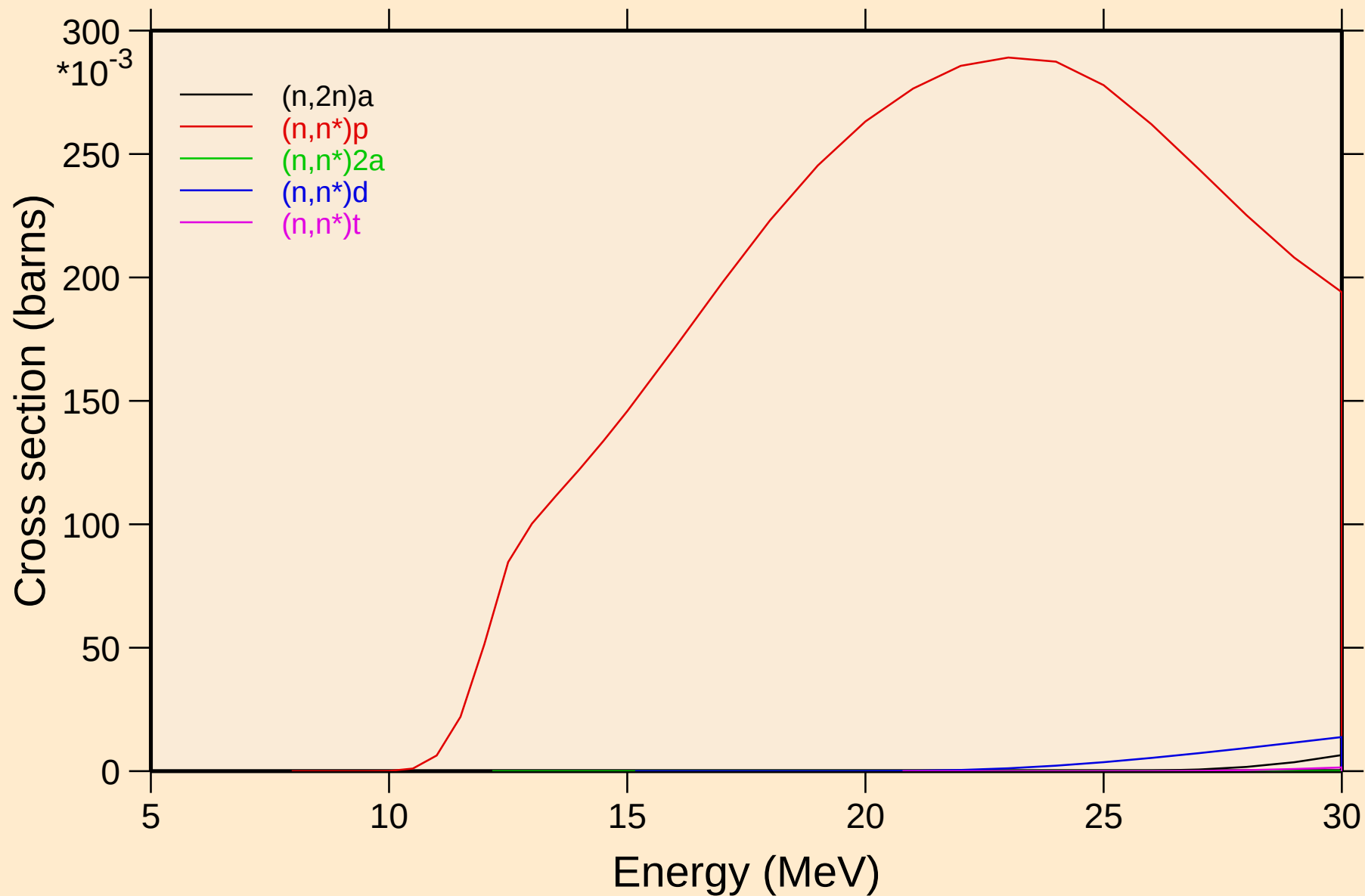


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

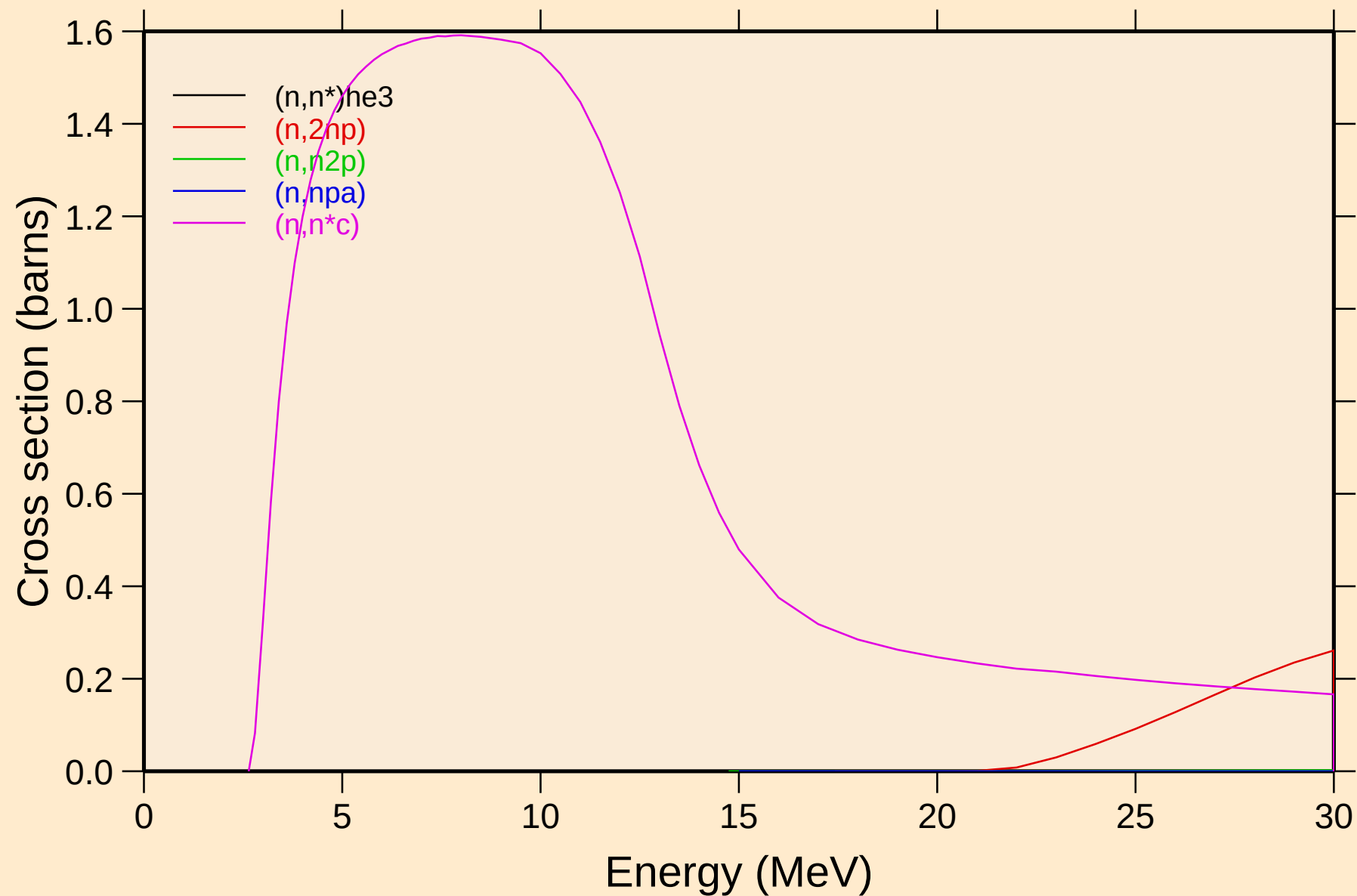
Threshold reactions



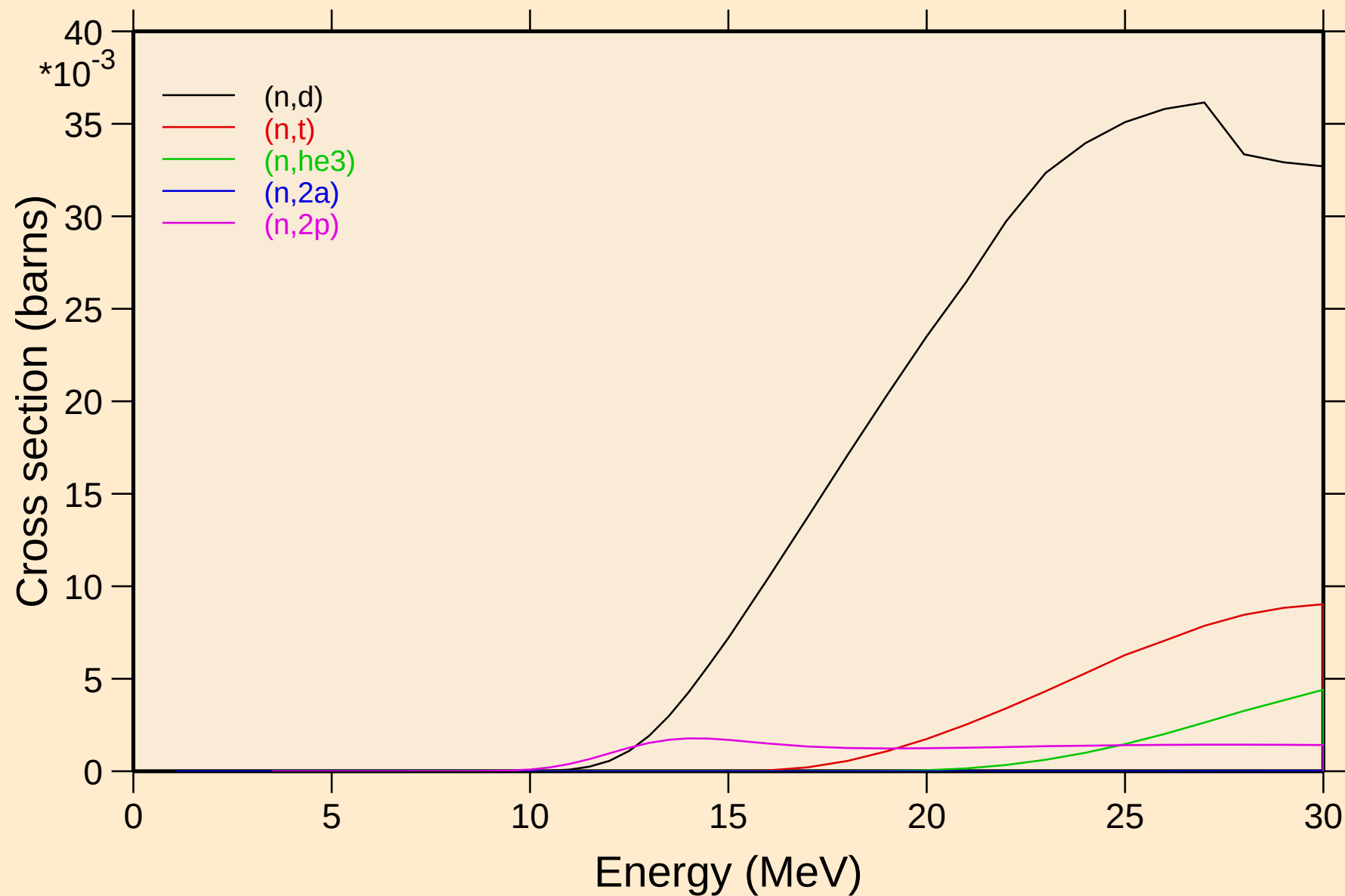
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Threshold reactions



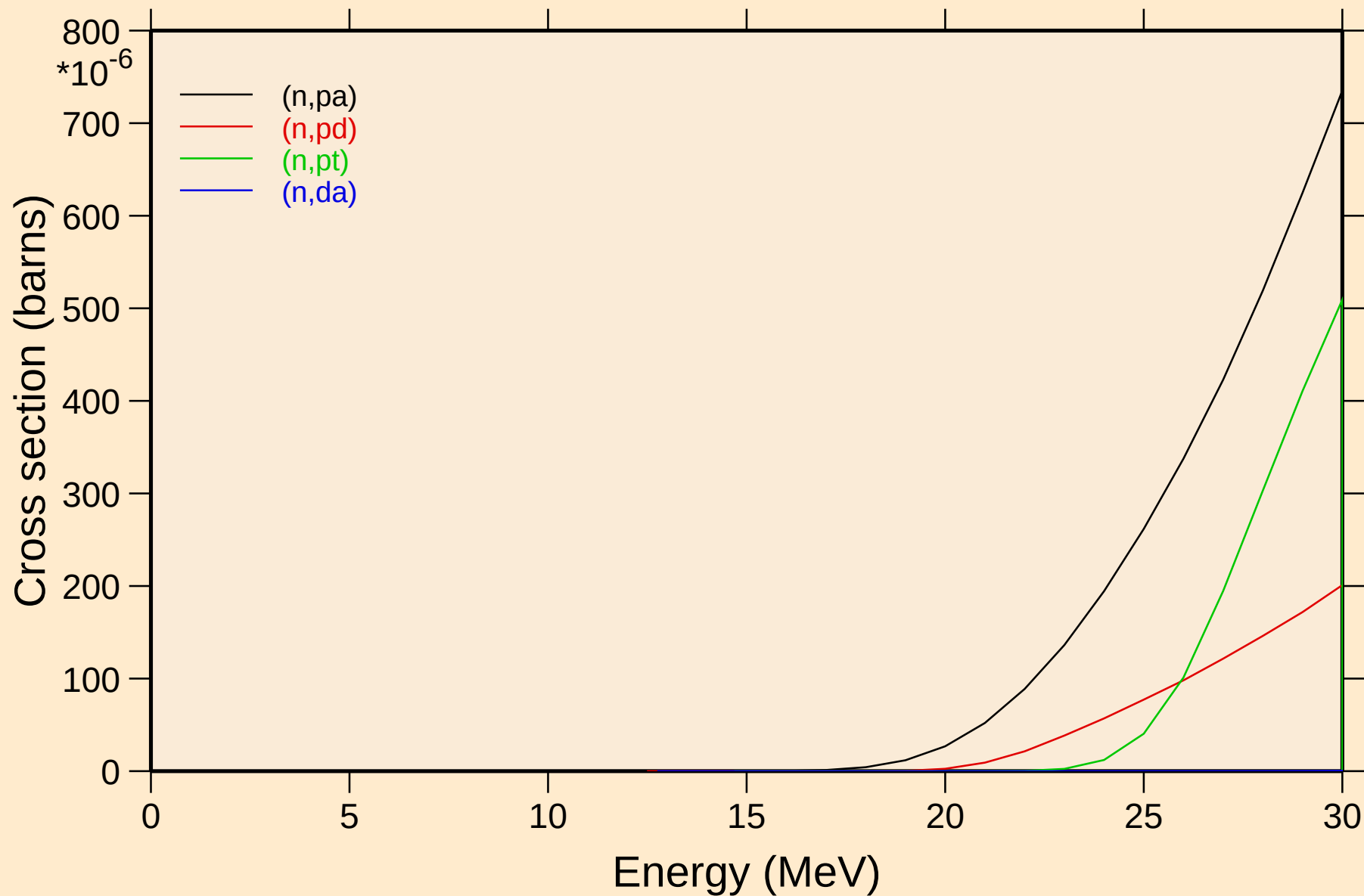
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Threshold reactions



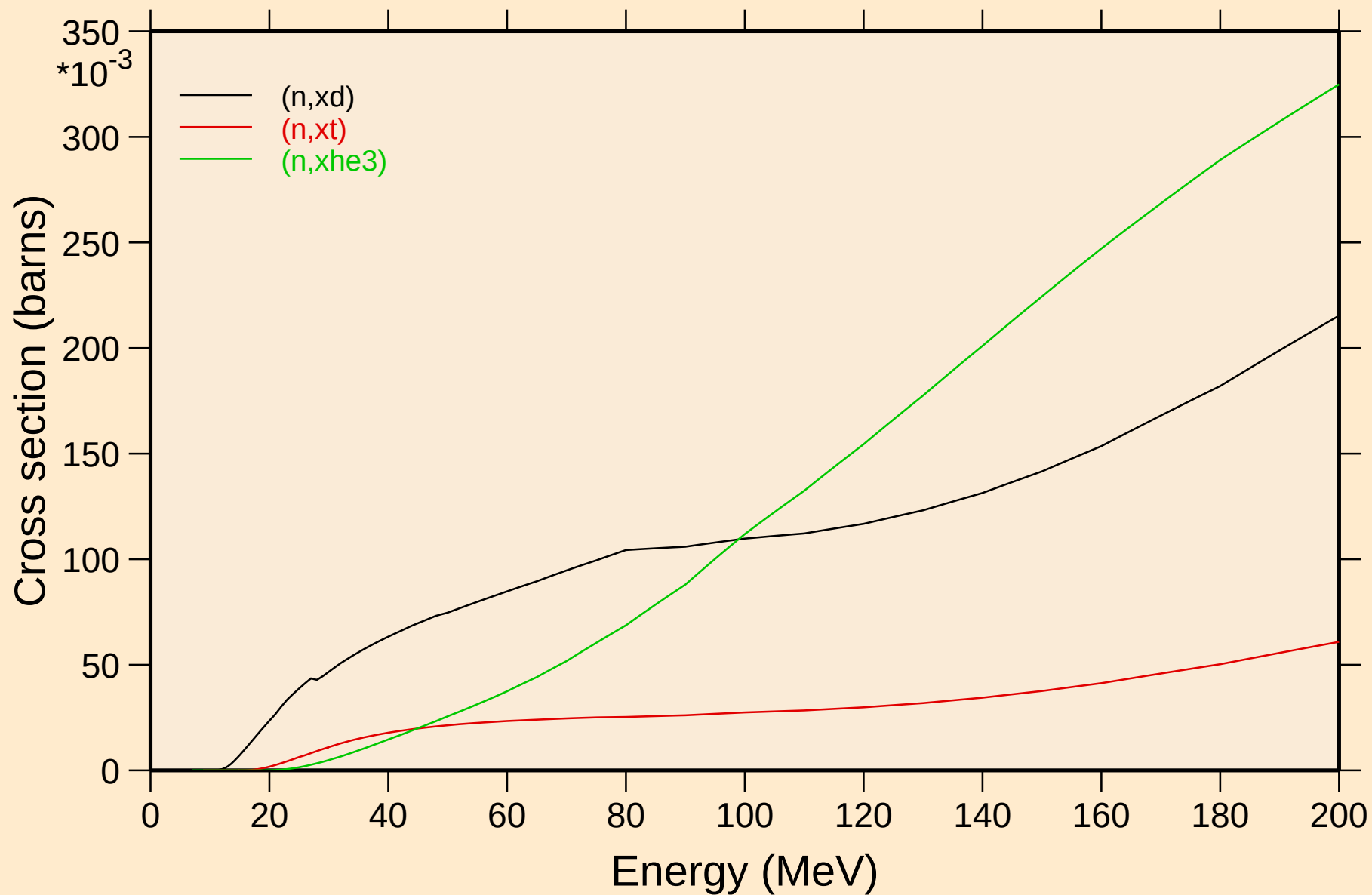
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Threshold reactions



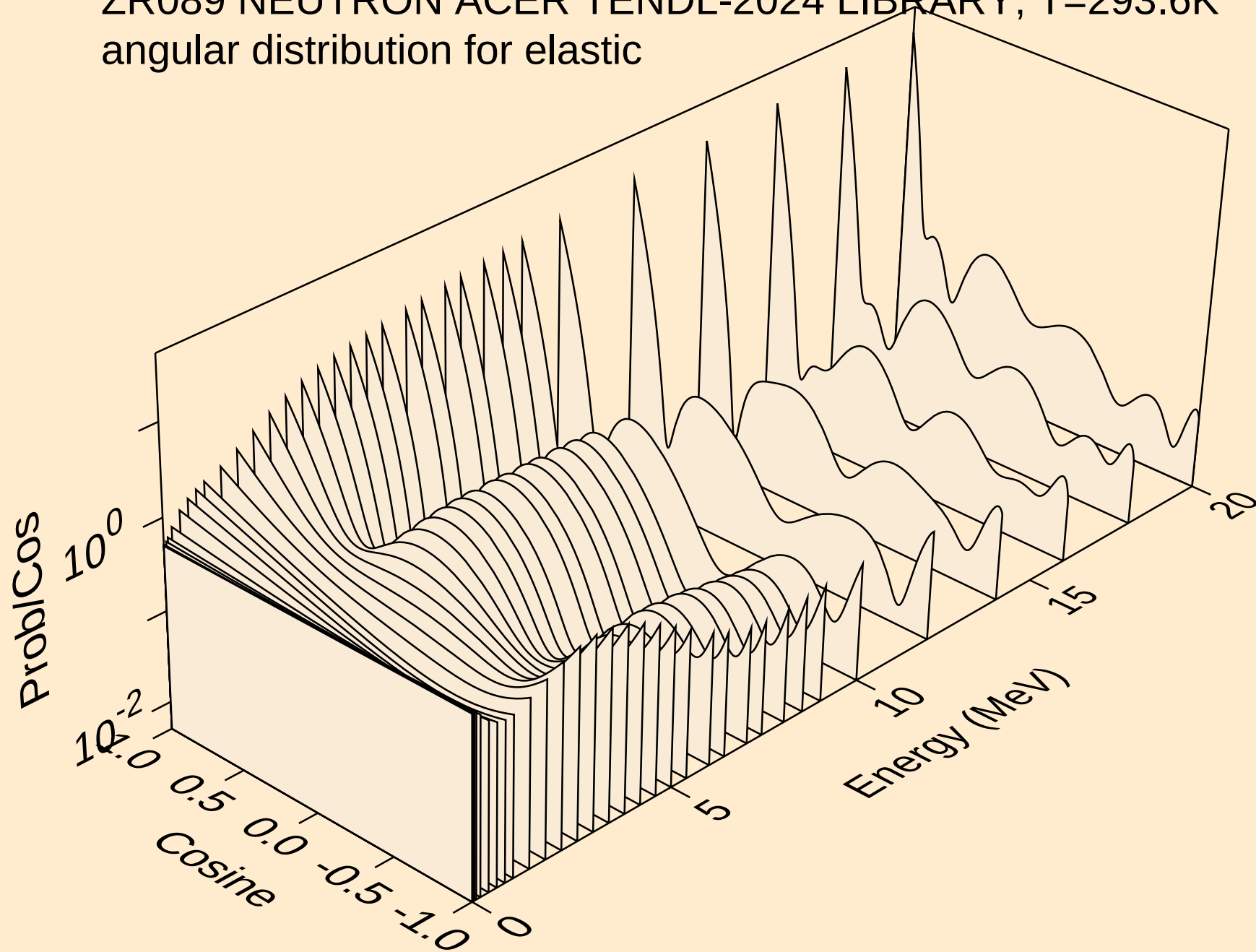
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Threshold reactions



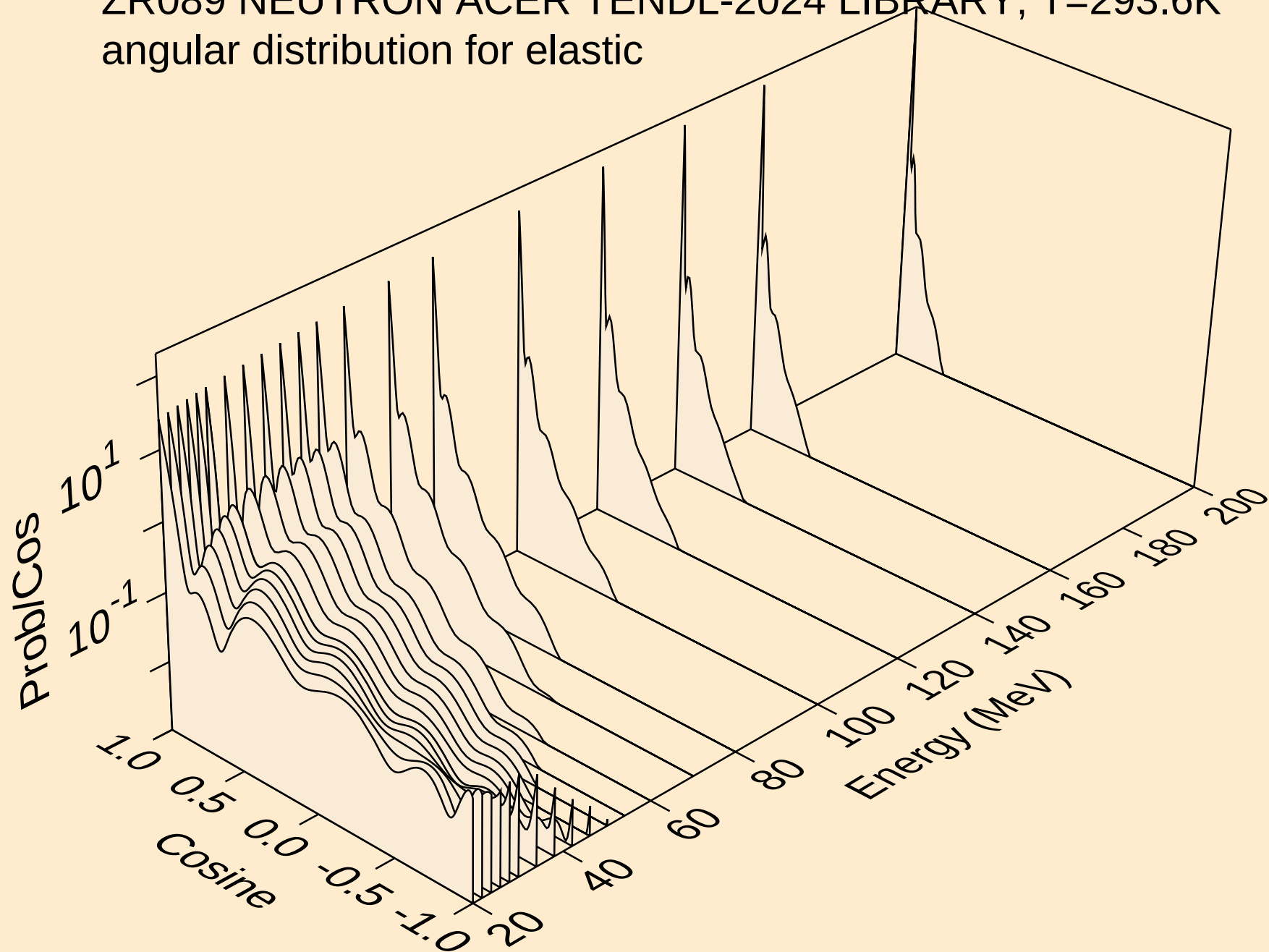
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Threshold reactions



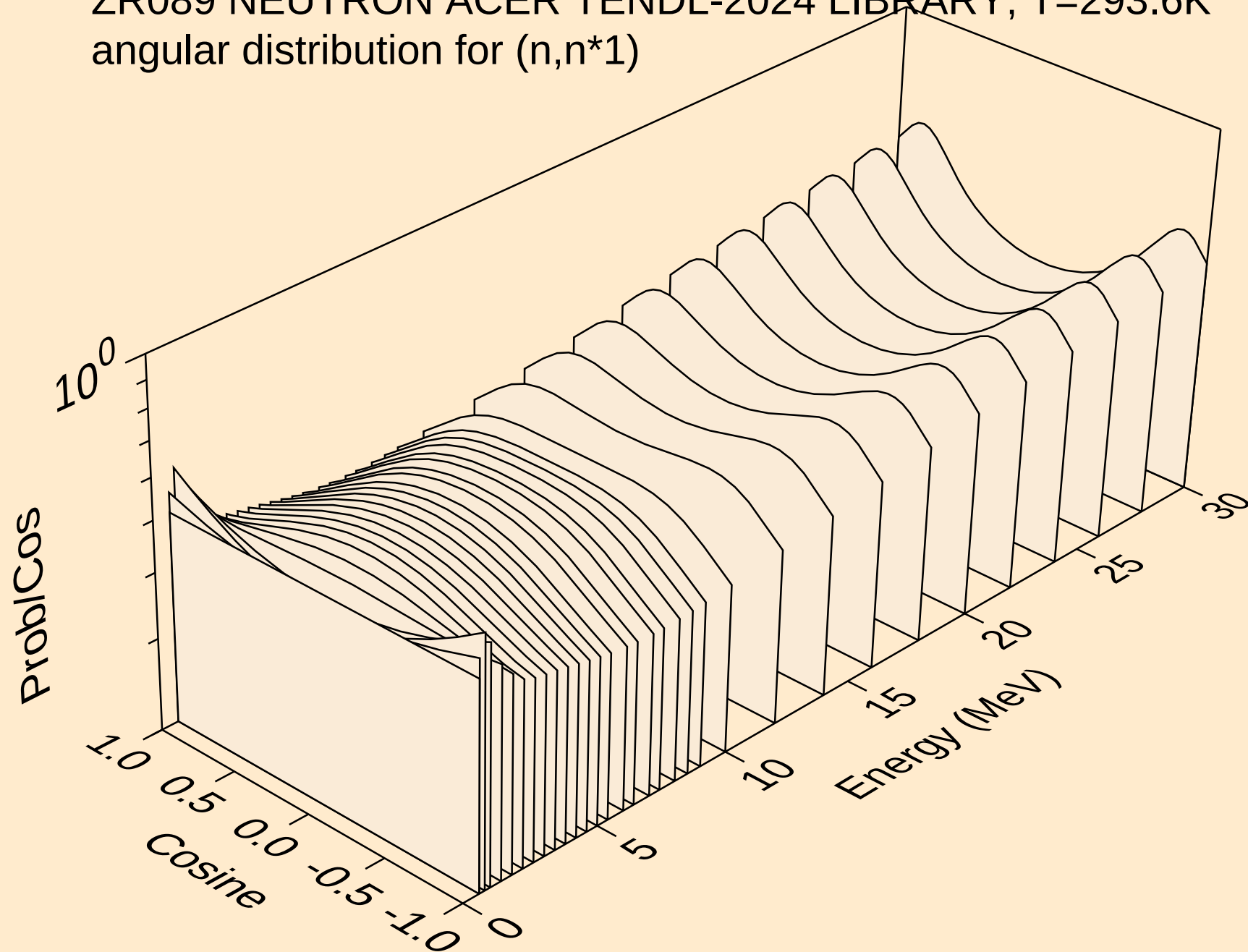
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
angular distribution for elastic



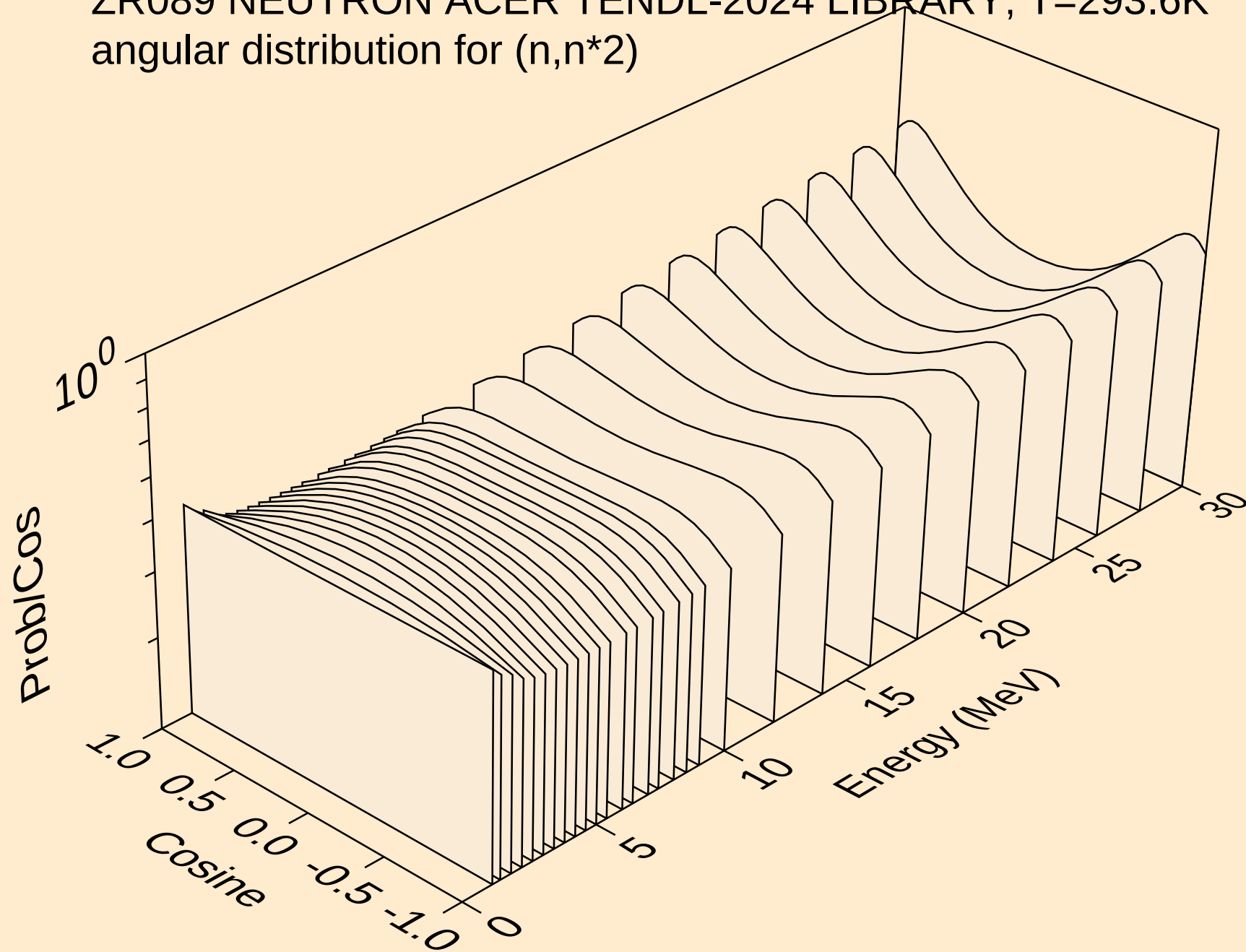
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angular distribution for elastic



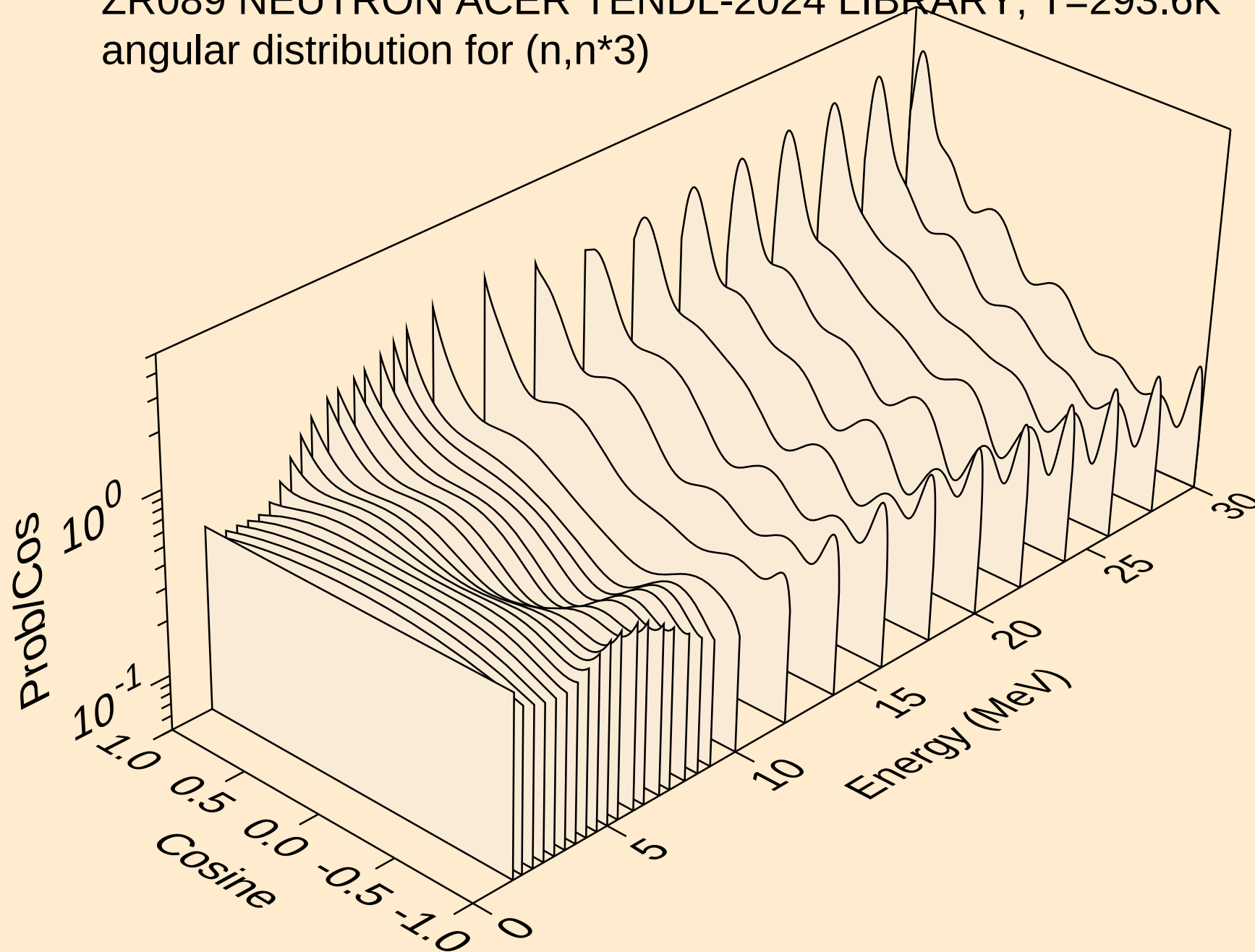
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
angular distribution for (n,n*1)



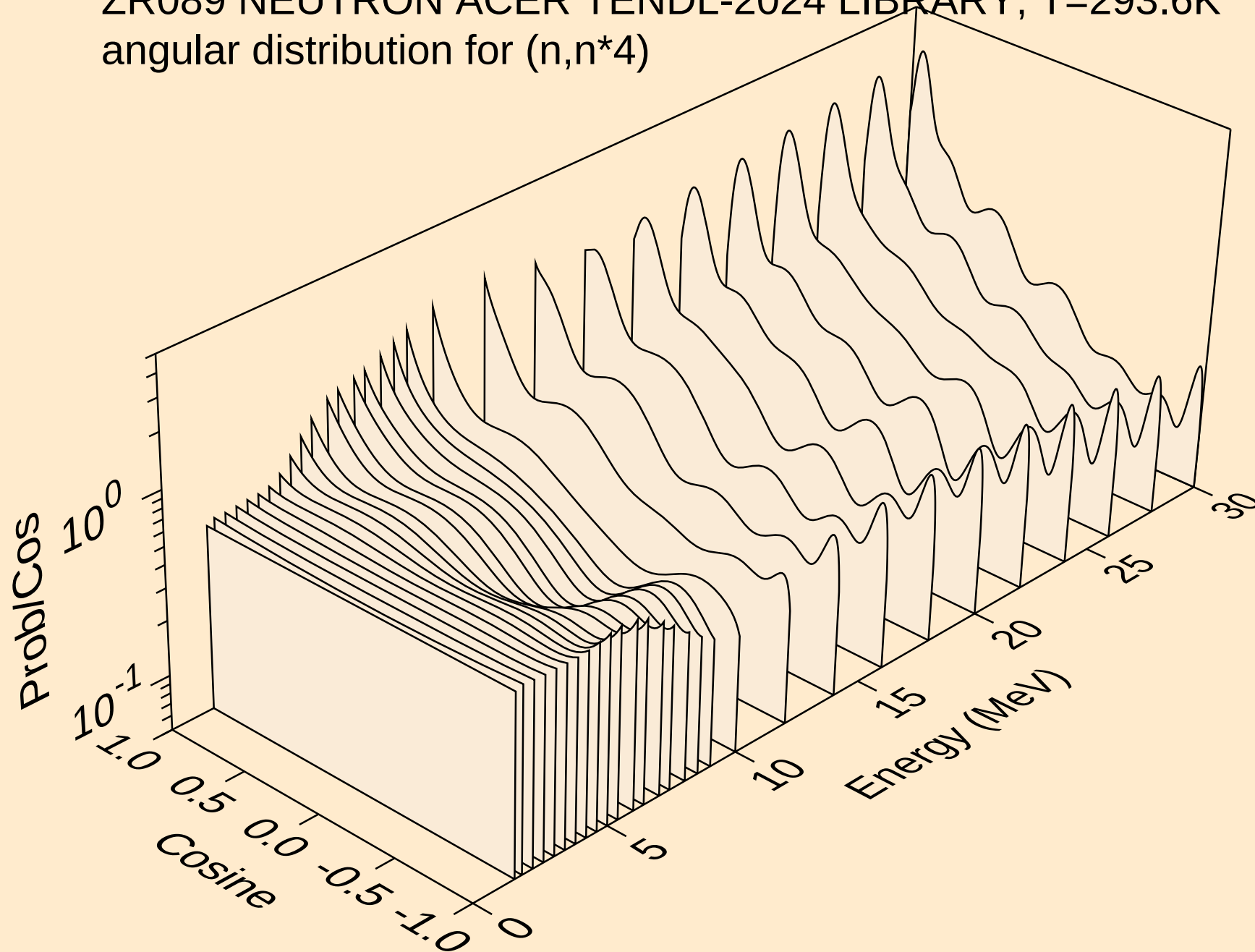
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angular distribution for (n,n*2)



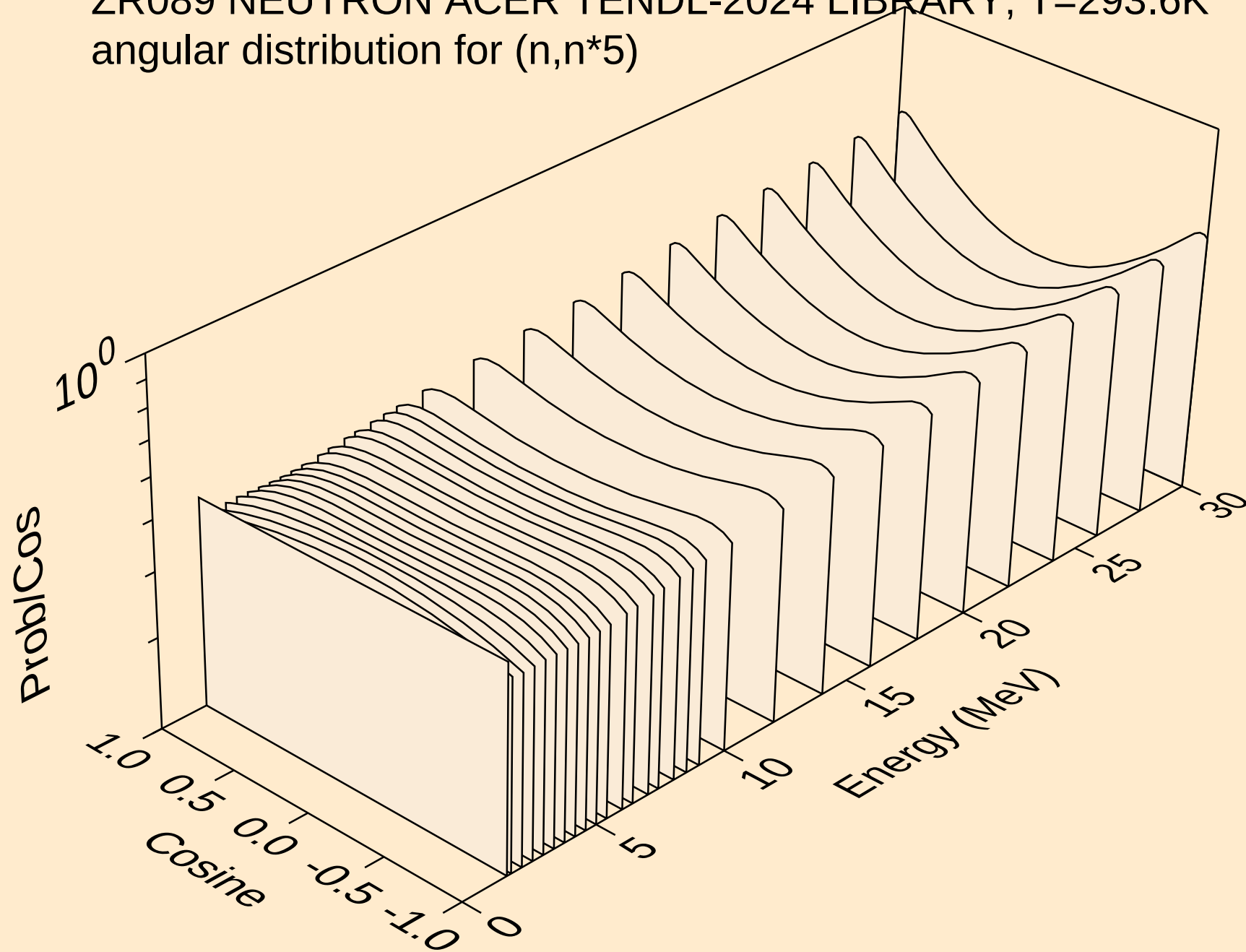
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angular distribution for (n,n*3)



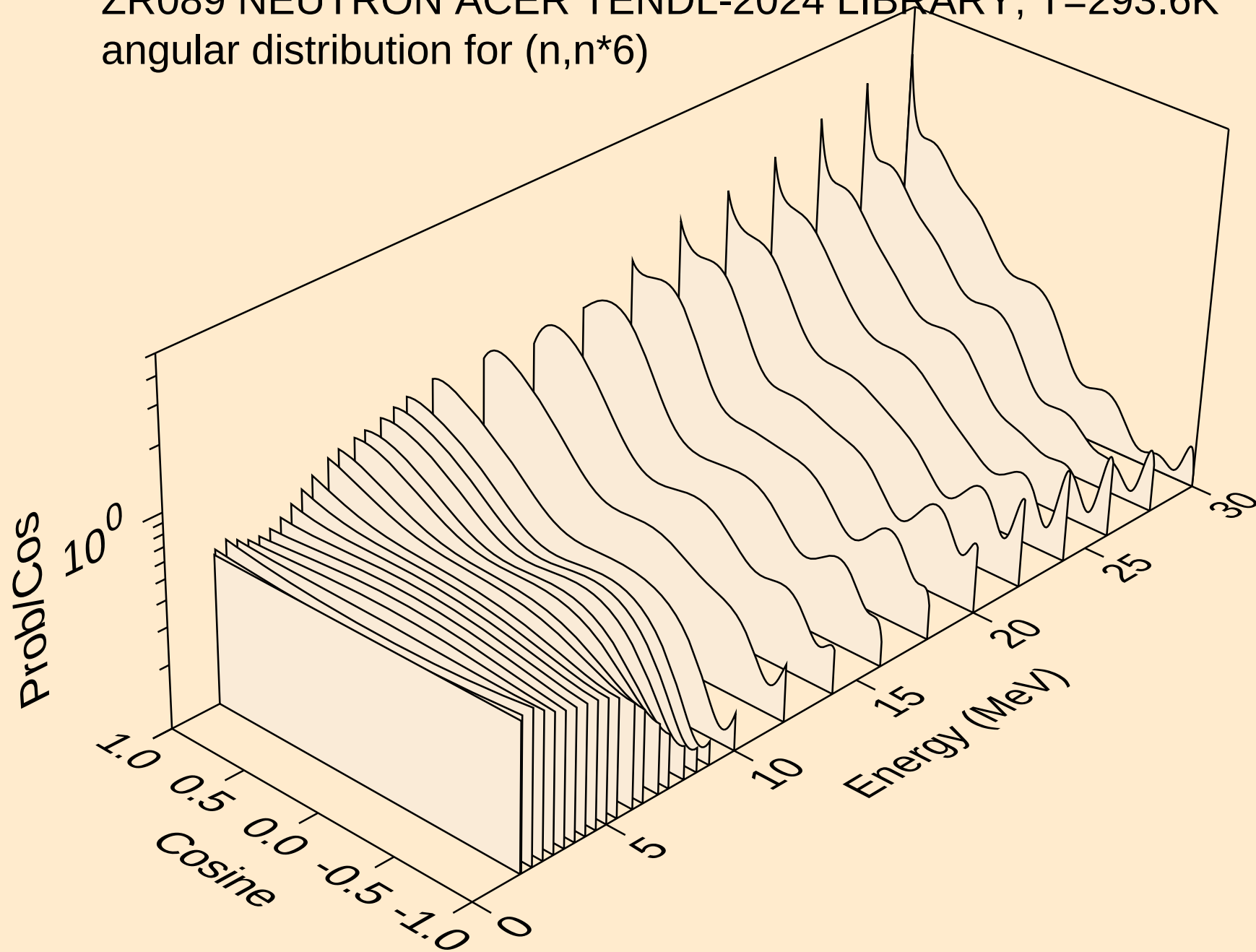
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angular distribution for (n,n*4)



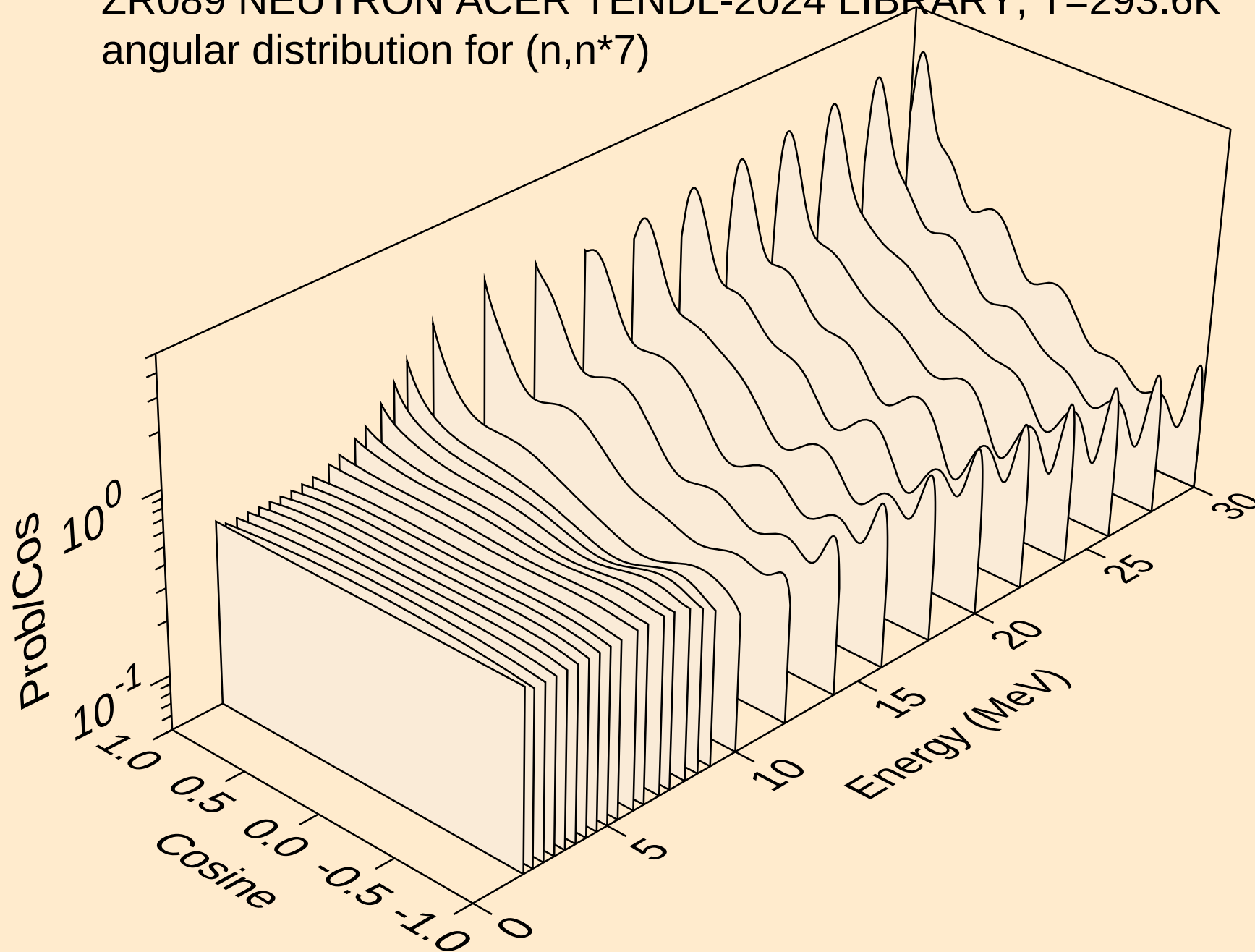
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angular distribution for (n,n*5)



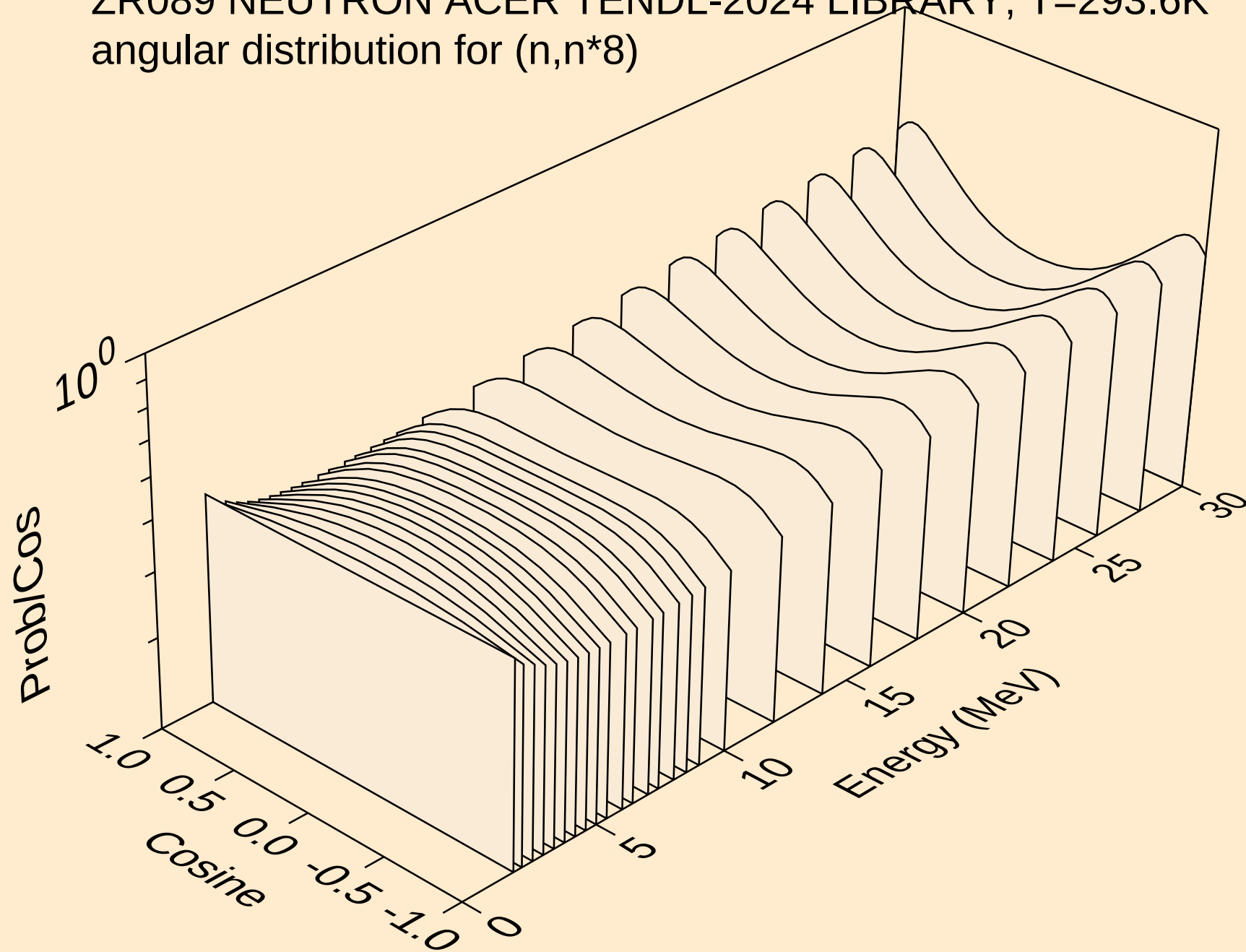
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angular distribution for (n,n*6)



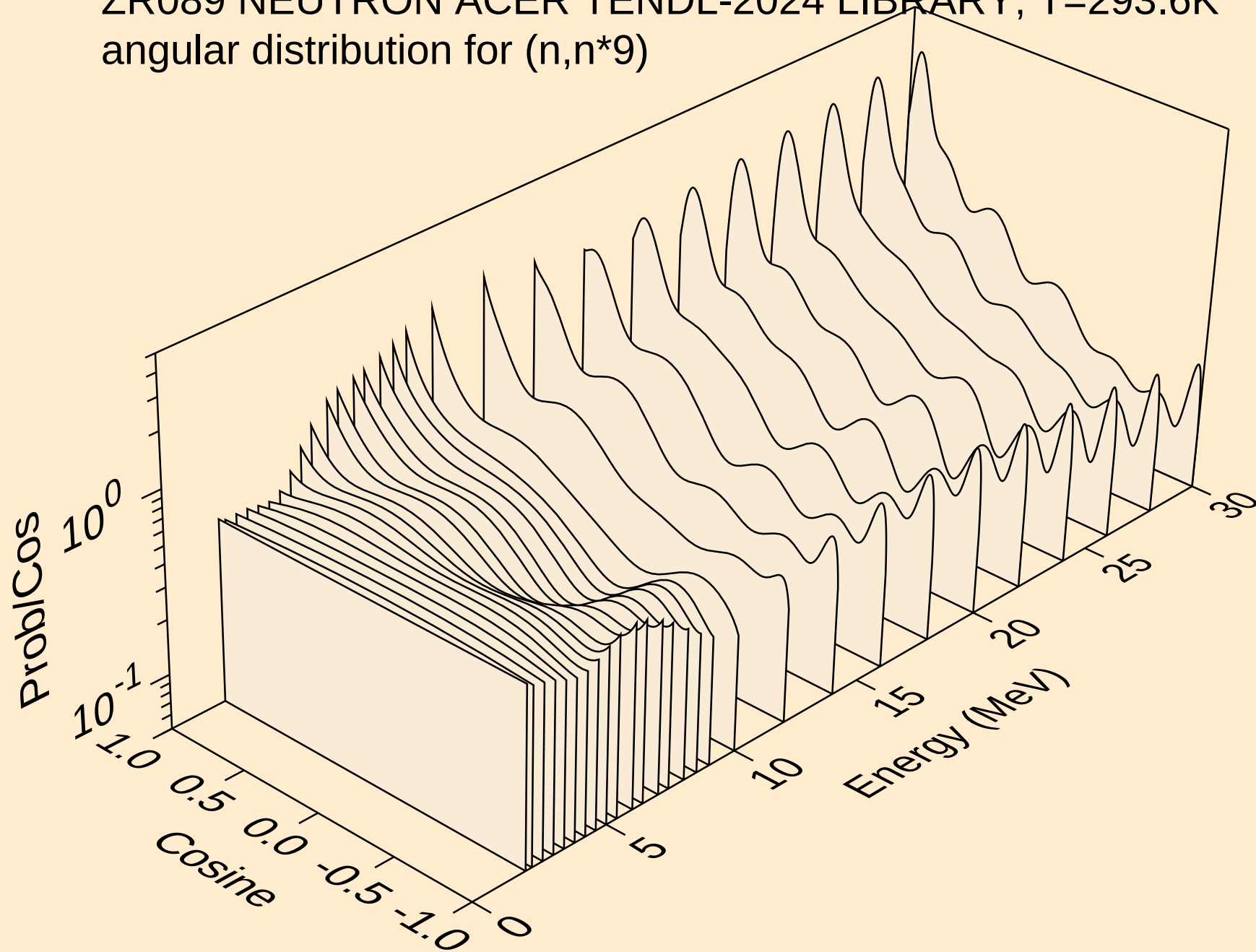
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angular distribution for (n,n*7)



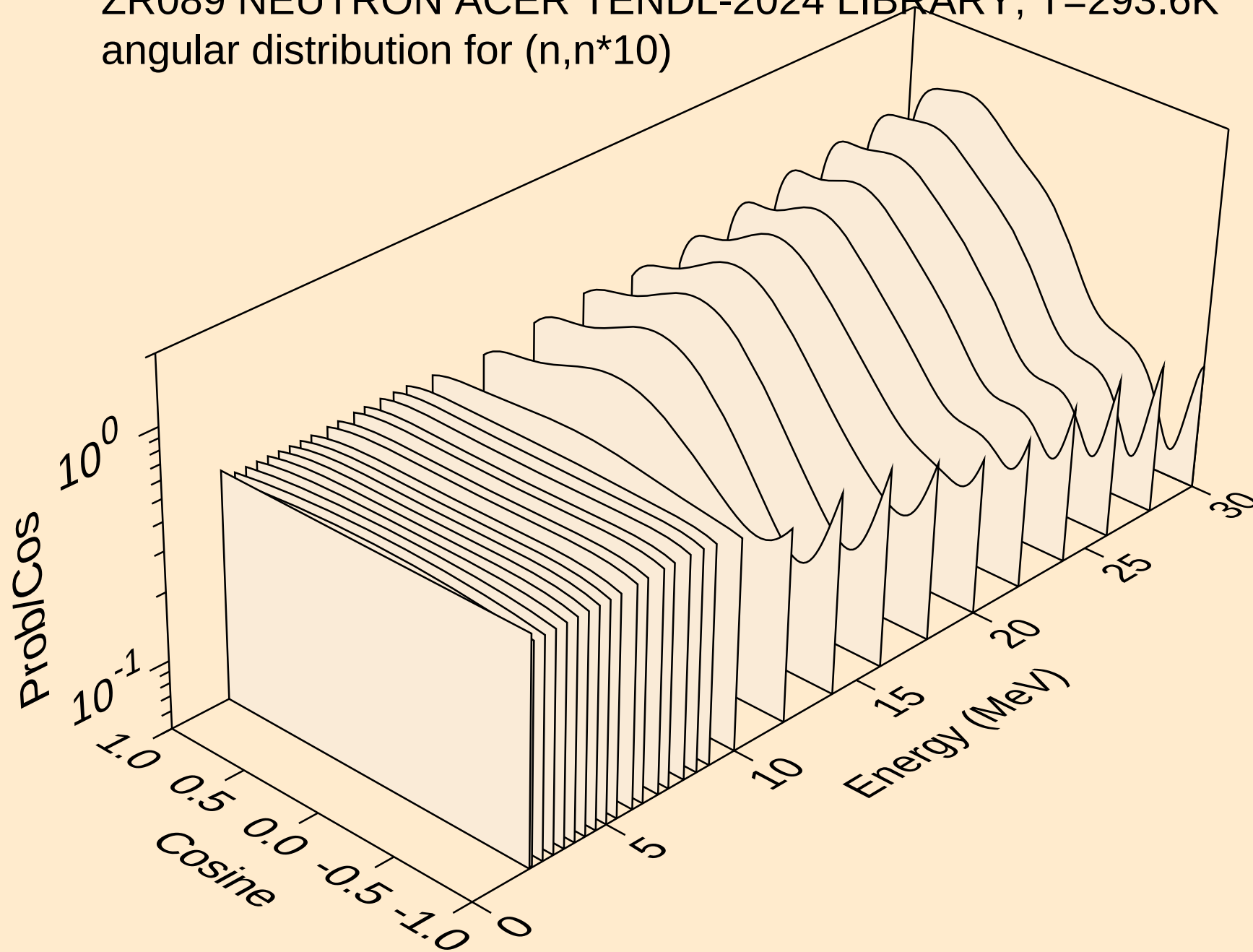
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angular distribution for (n,n*8)



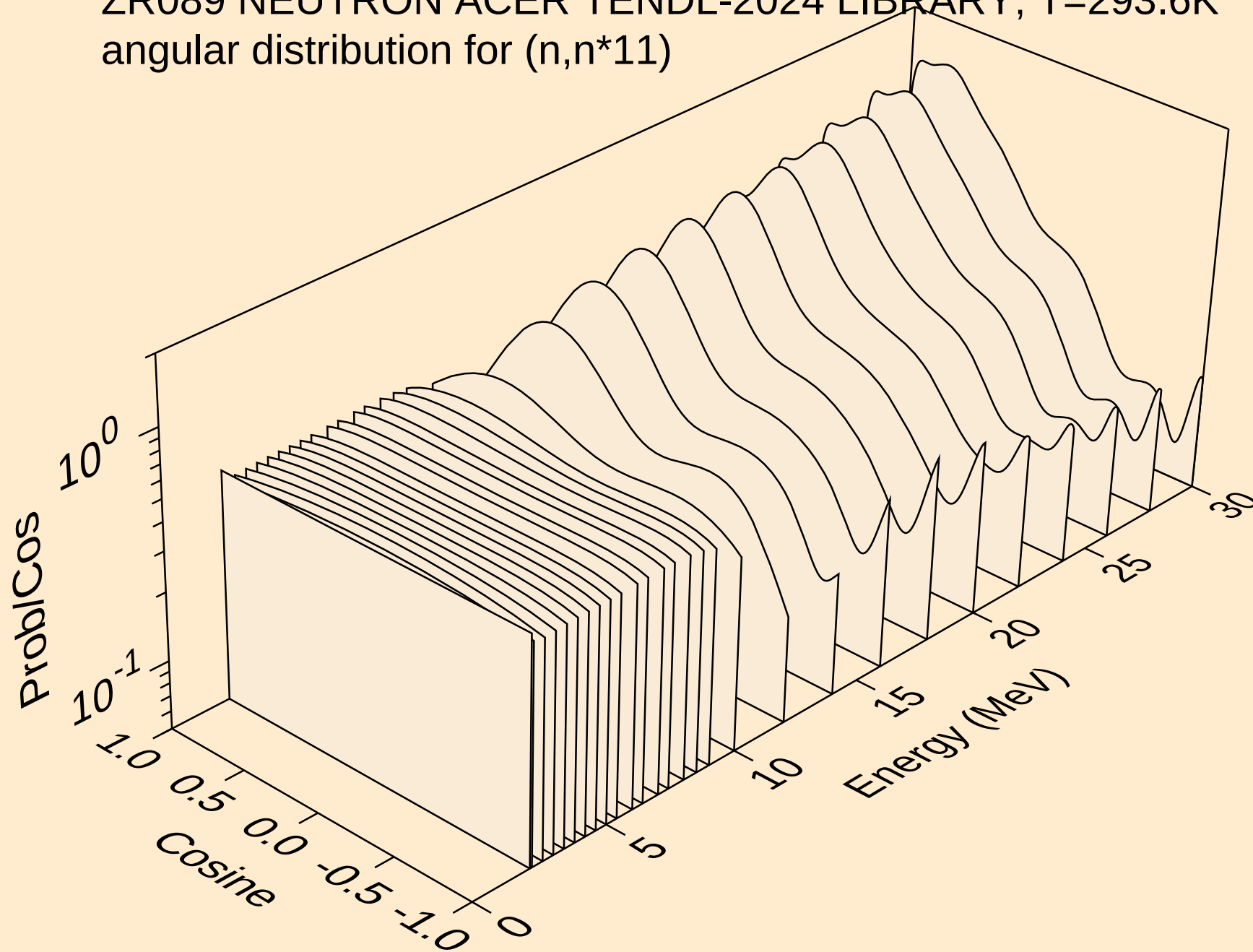
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angular distribution for (n,n*9)



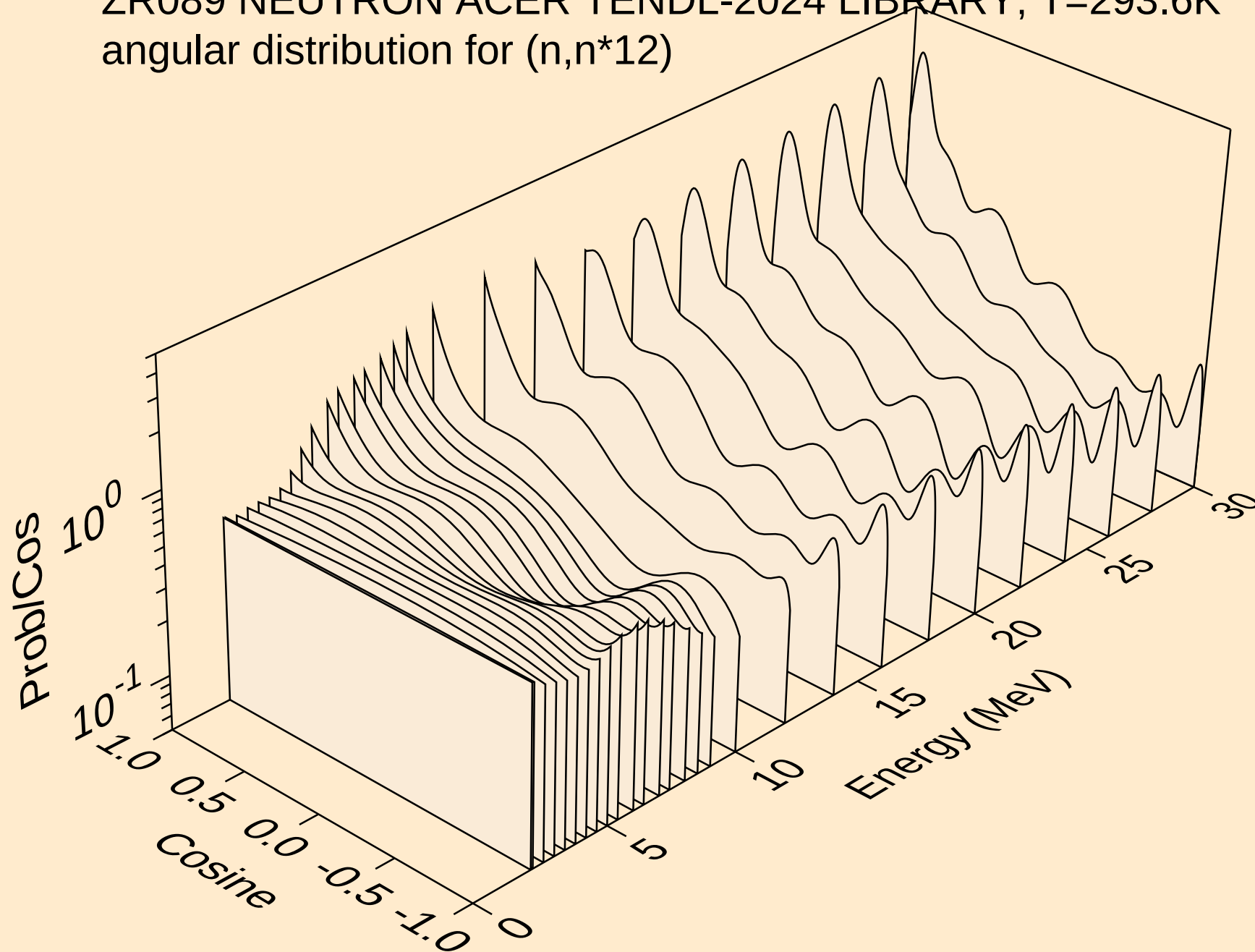
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angular distribution for (n,n*10)



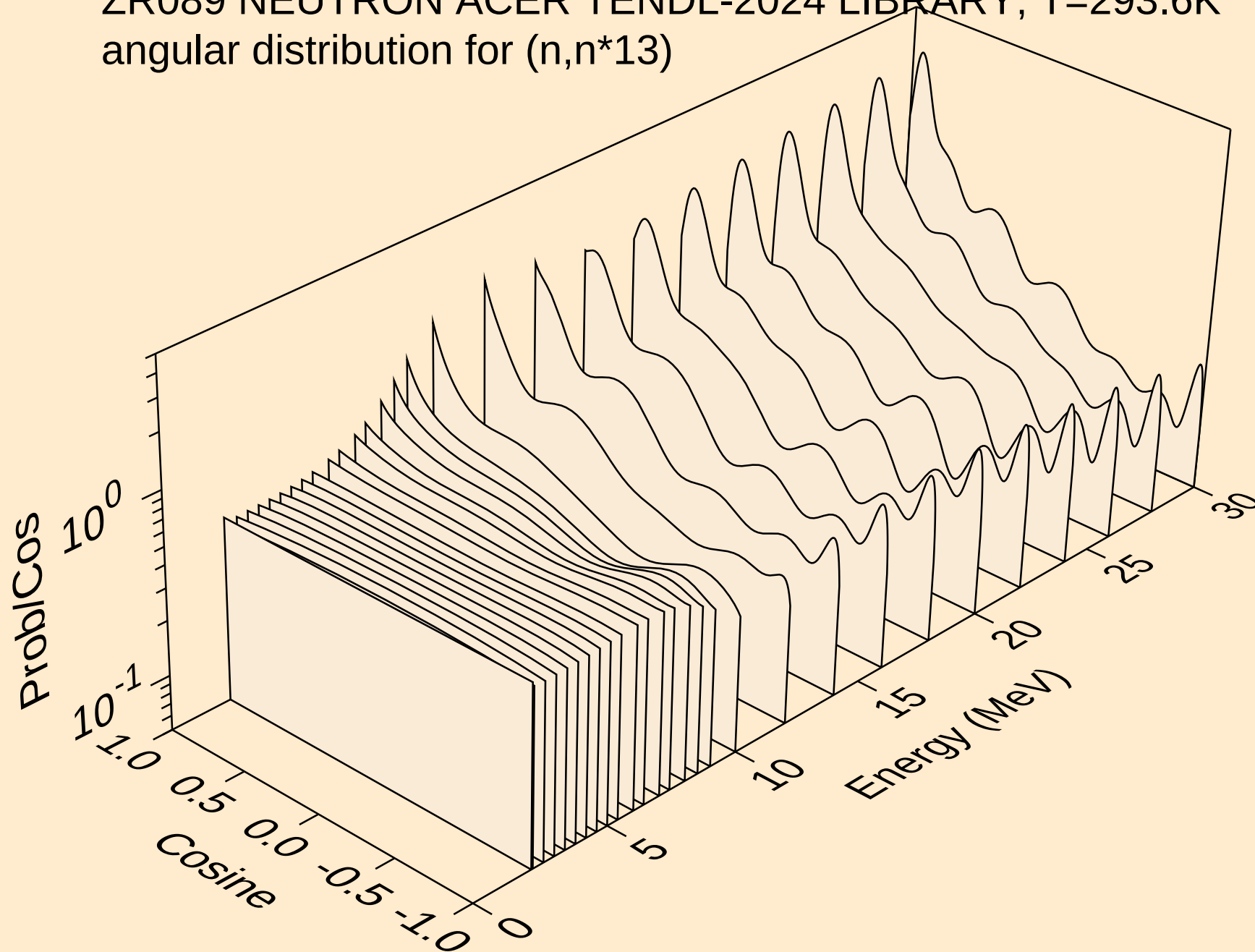
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angular distribution for (n,n*11)



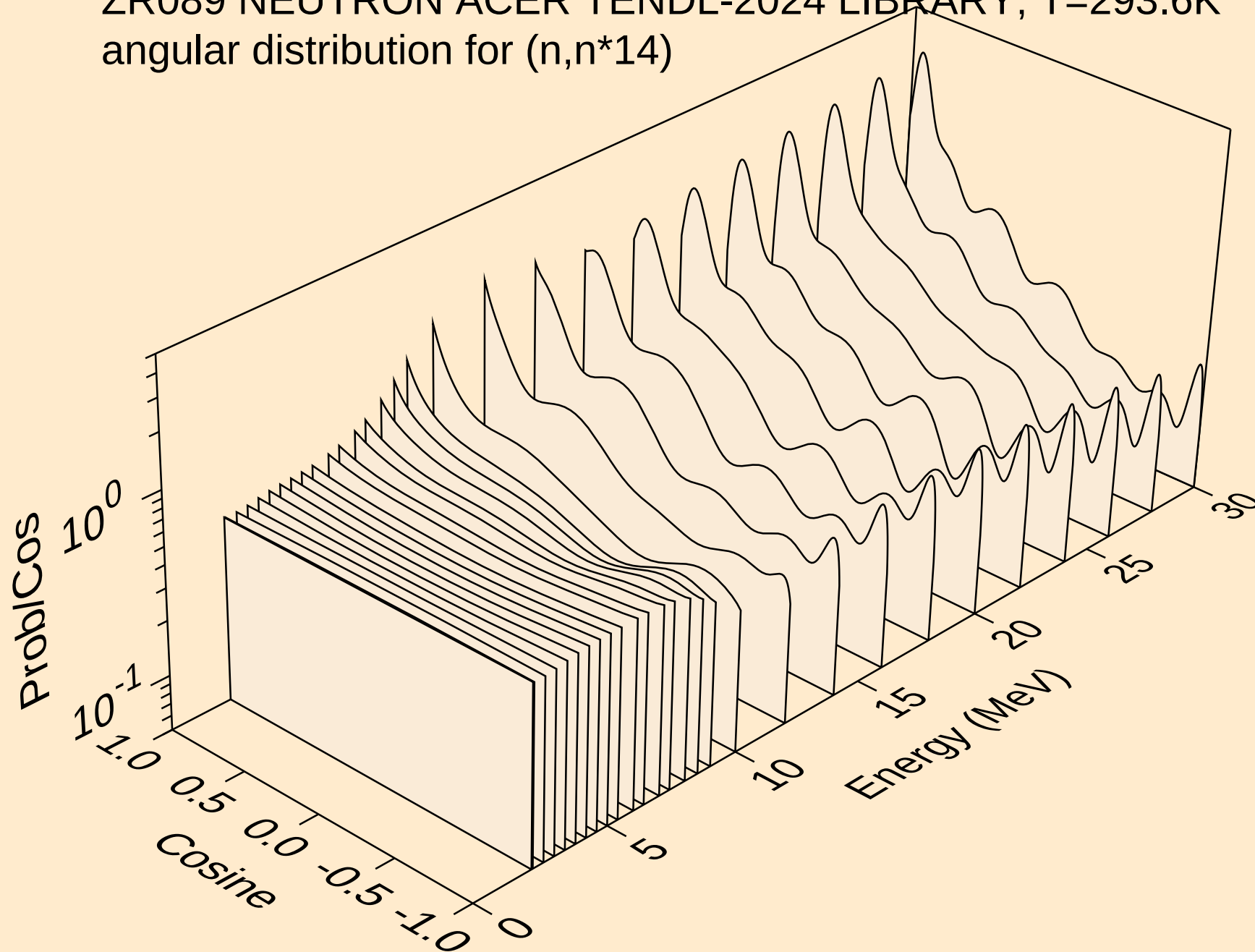
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angular distribution for (n,n*12)



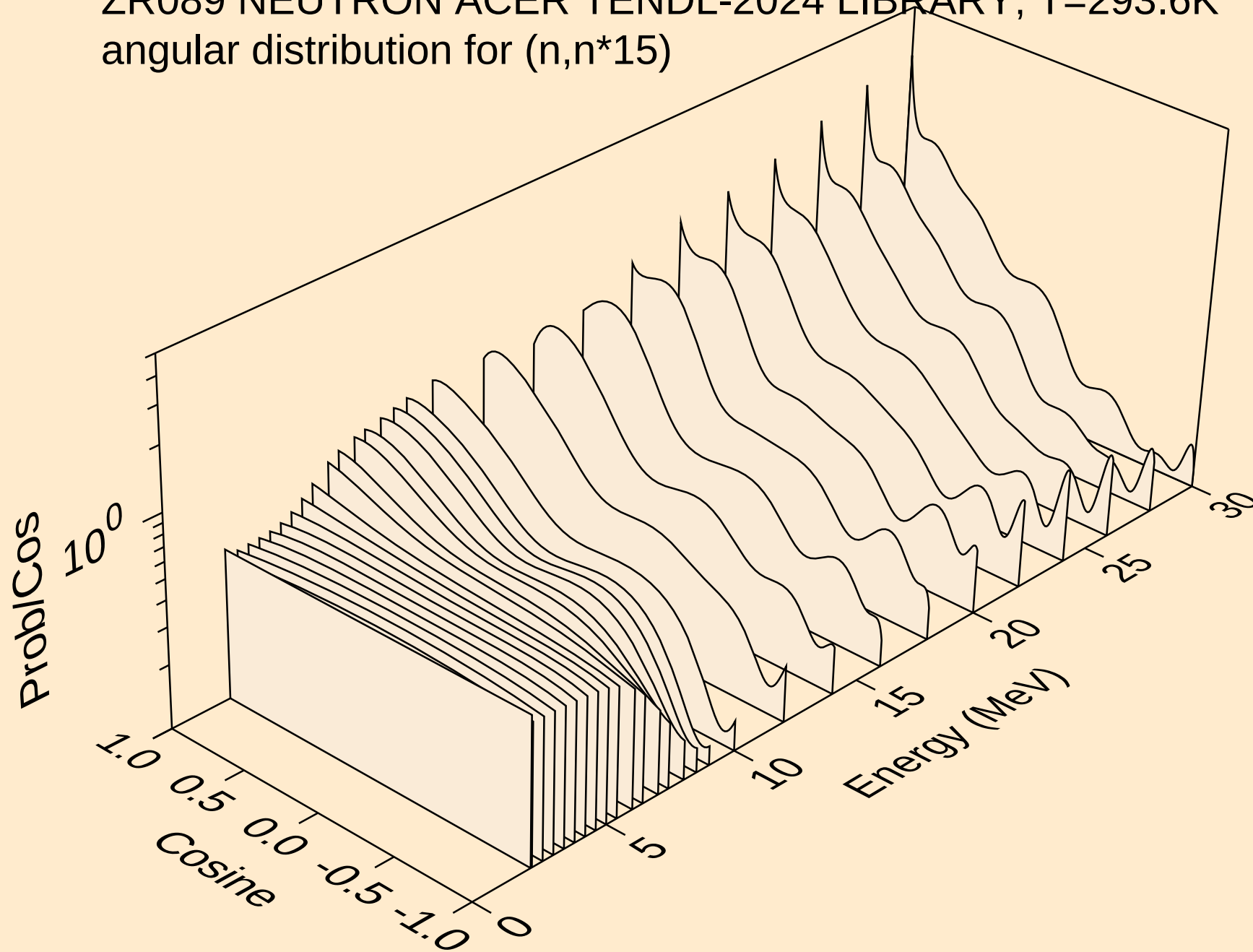
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angular distribution for (n,n*13)



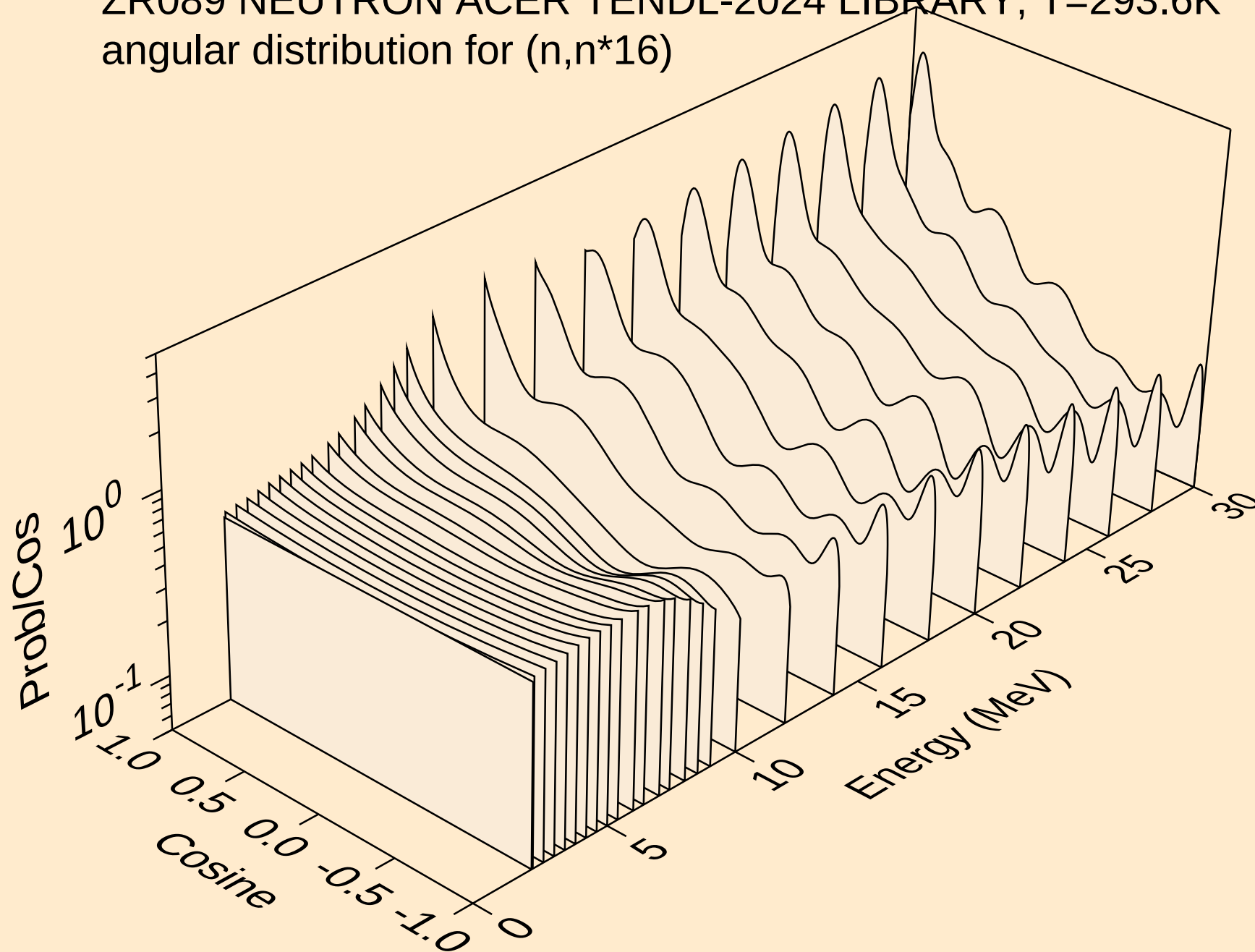
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angular distribution for (n,n*14)



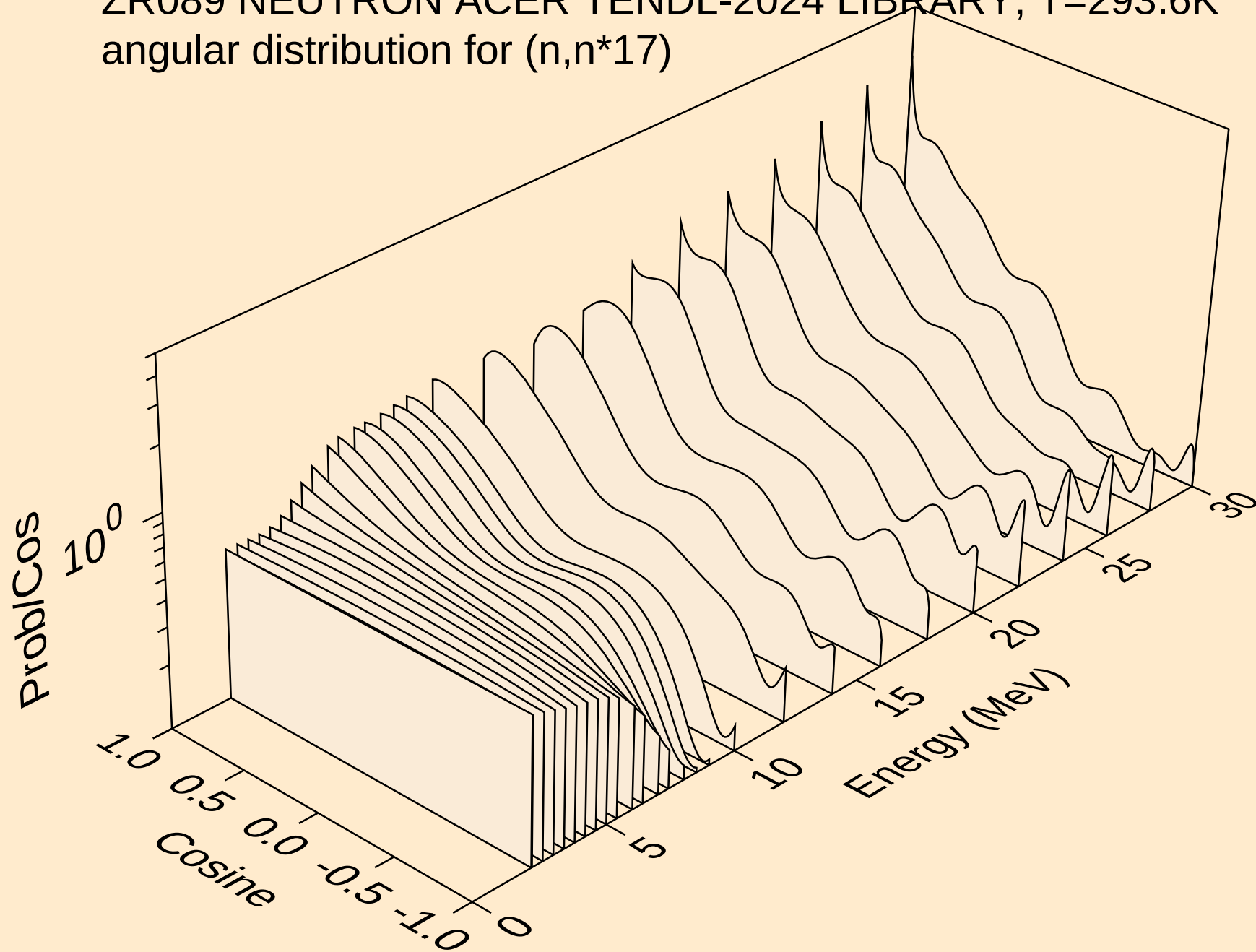
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angular distribution for (n,n*15)



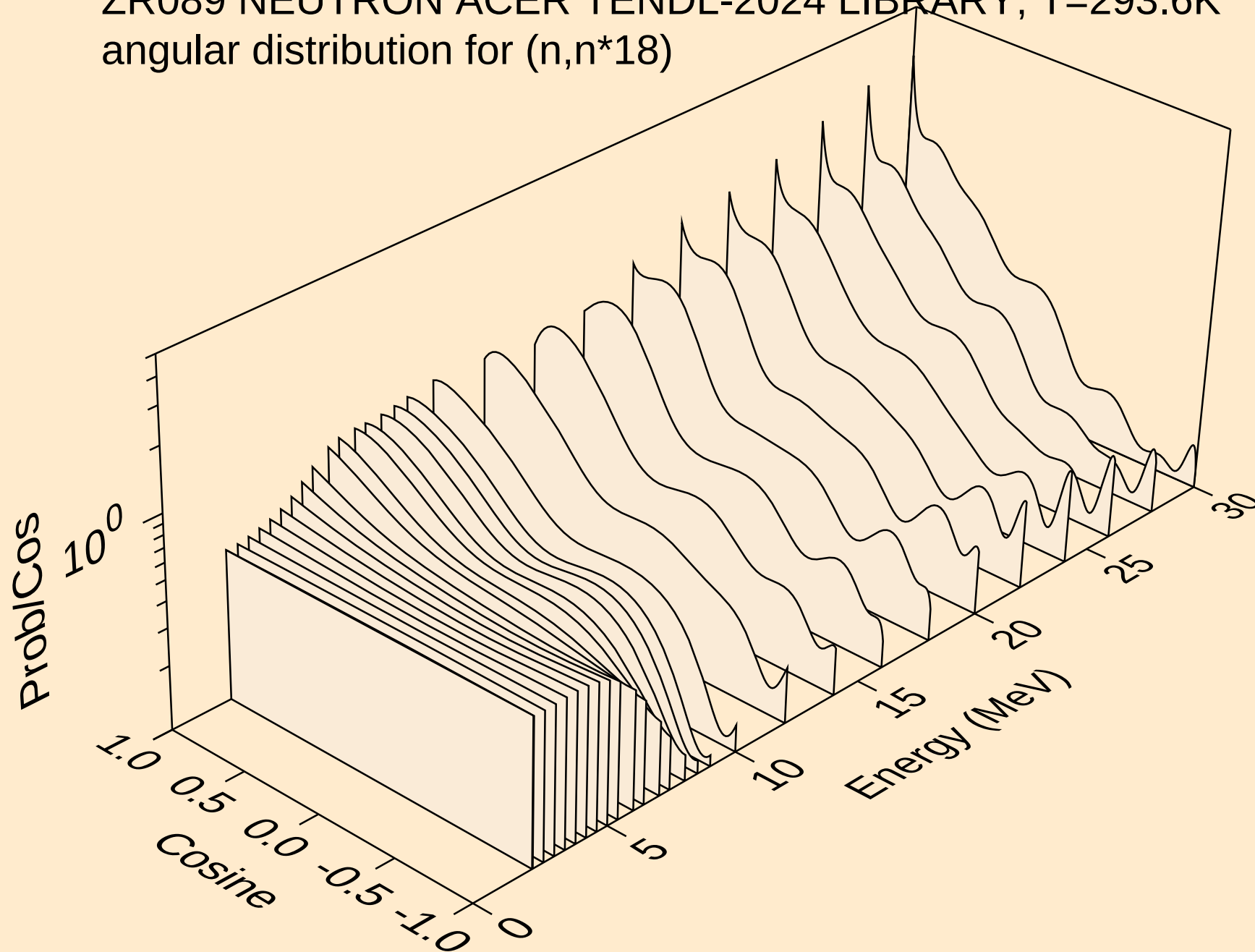
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angular distribution for (n,n*16)



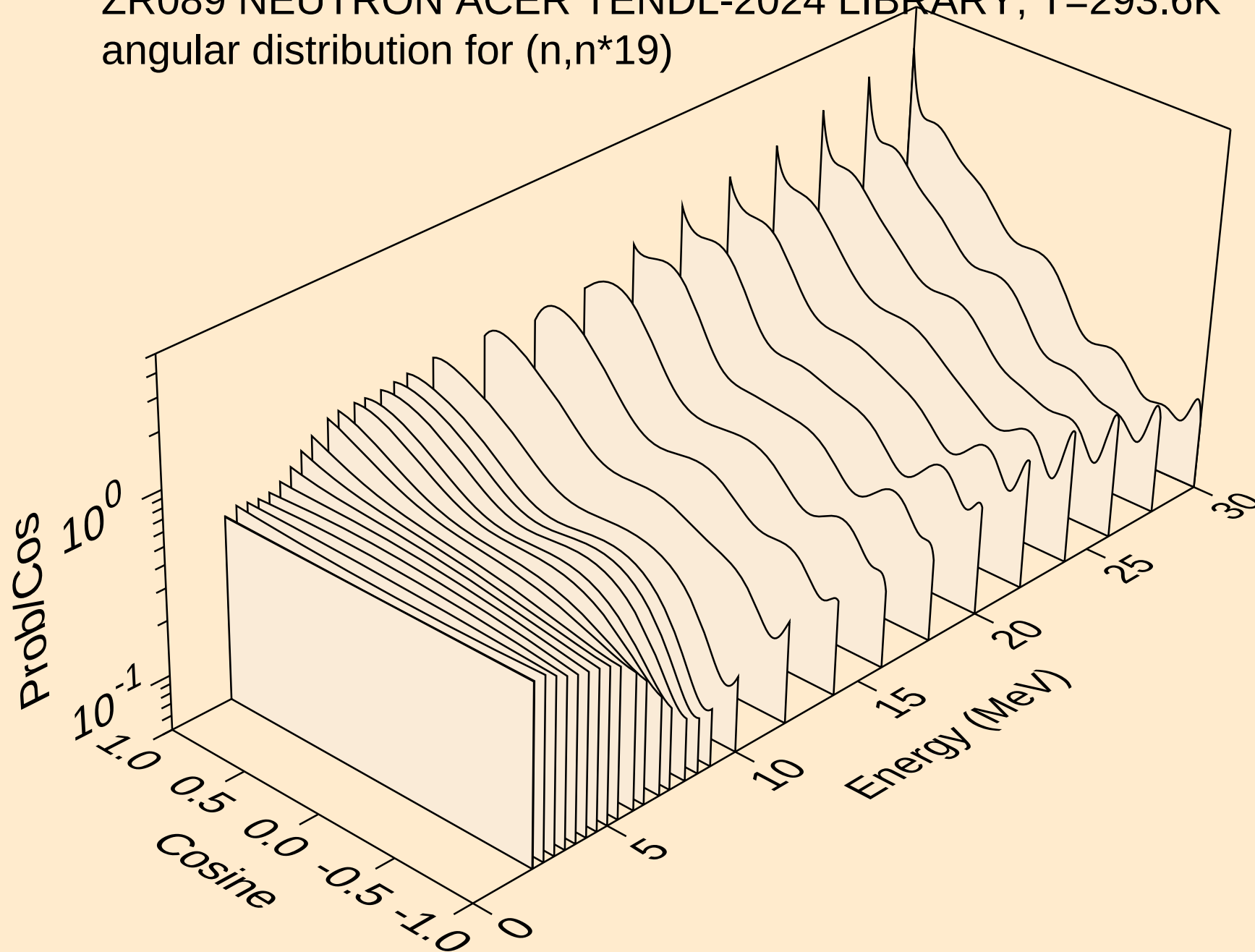
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angular distribution for (n,n*17)



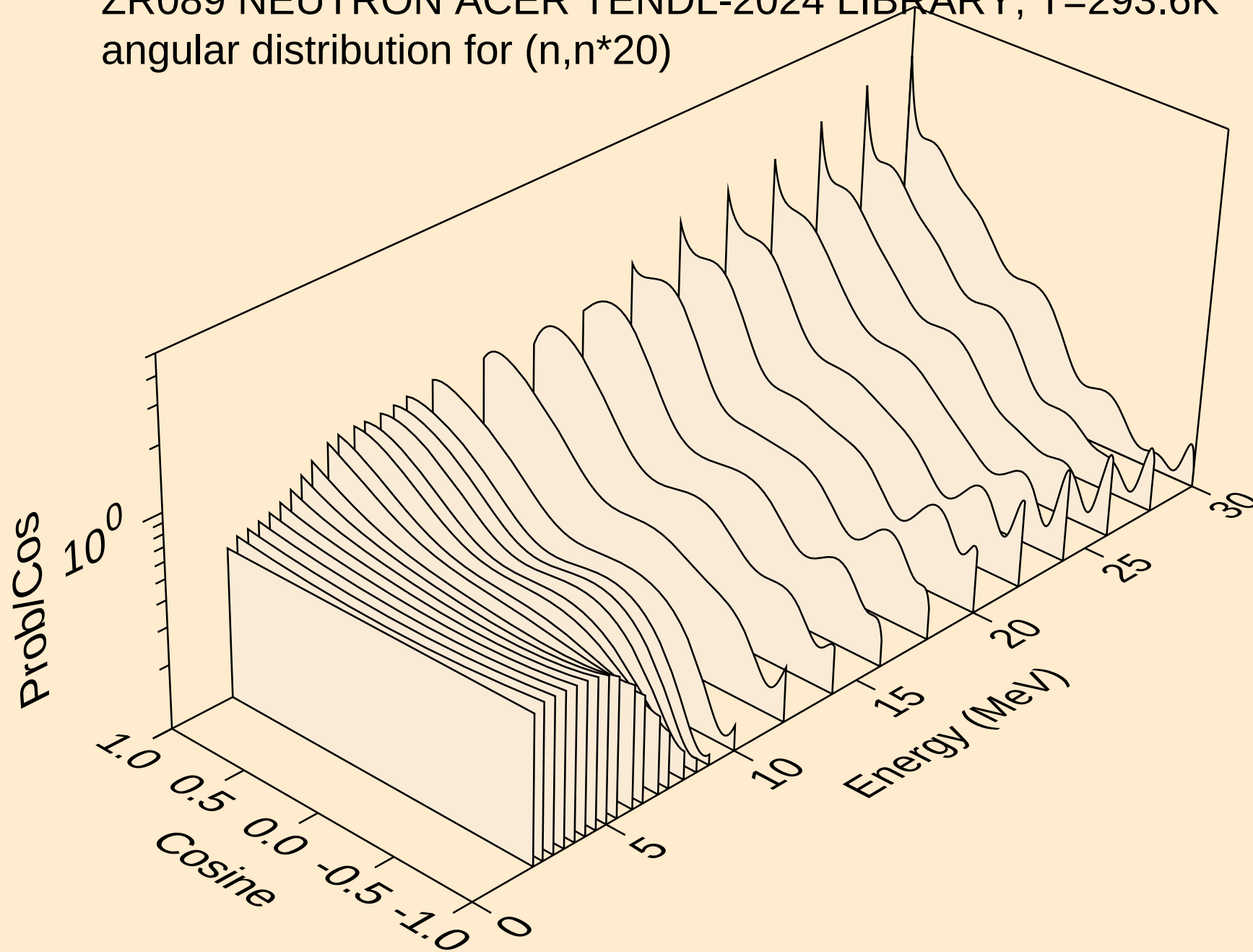
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angular distribution for (n,n*18)



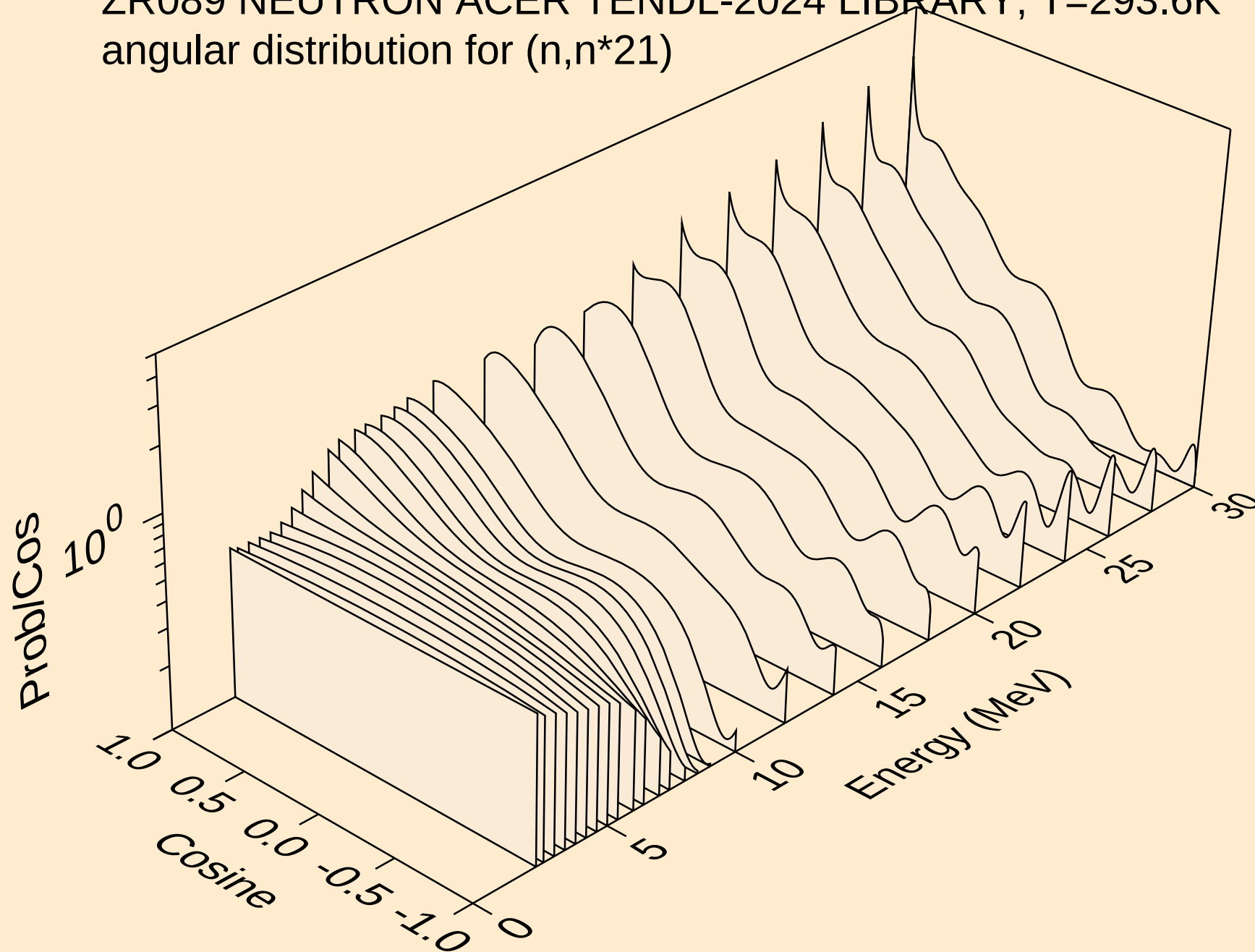
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angular distribution for (n,n*19)



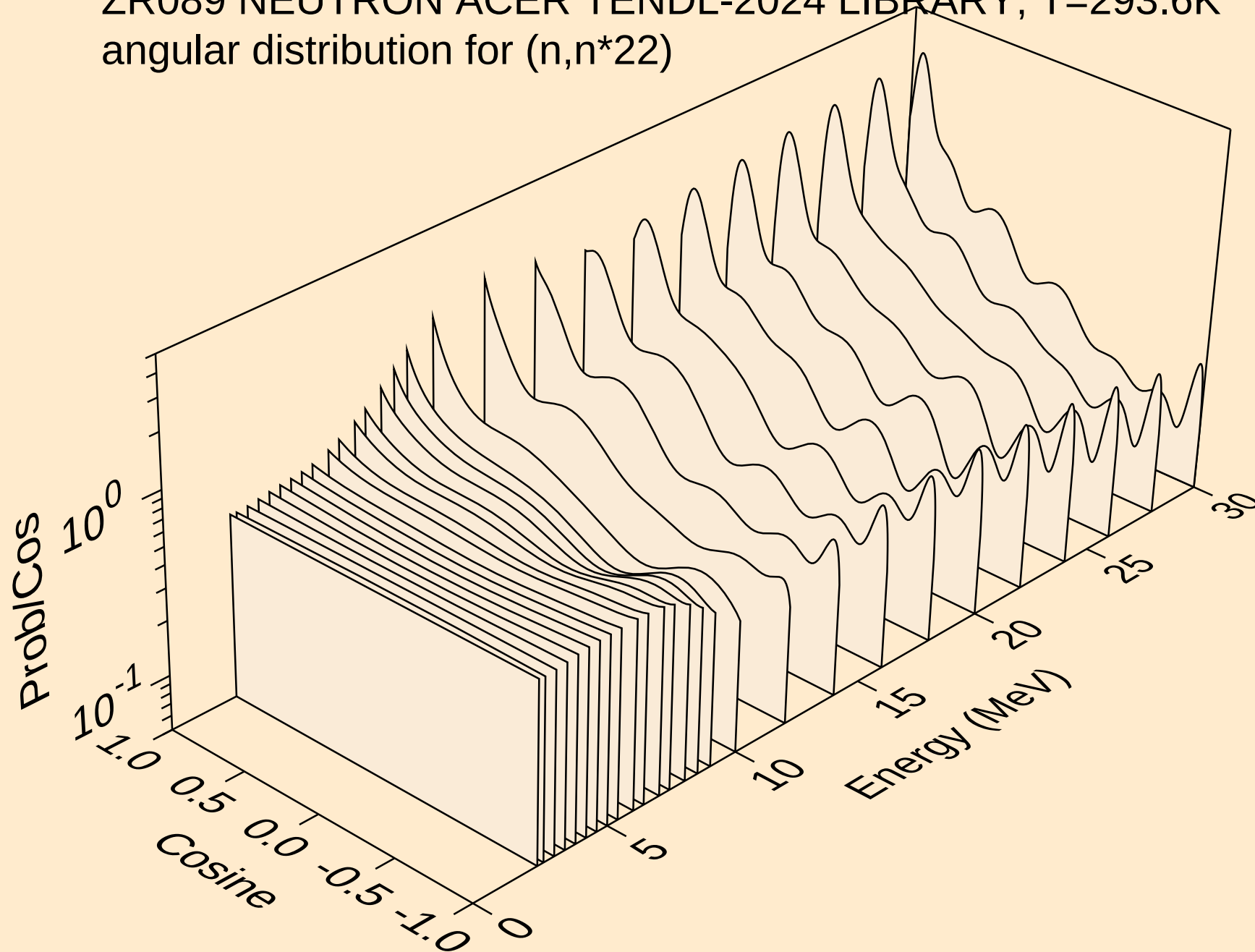
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angular distribution for (n,n*20)



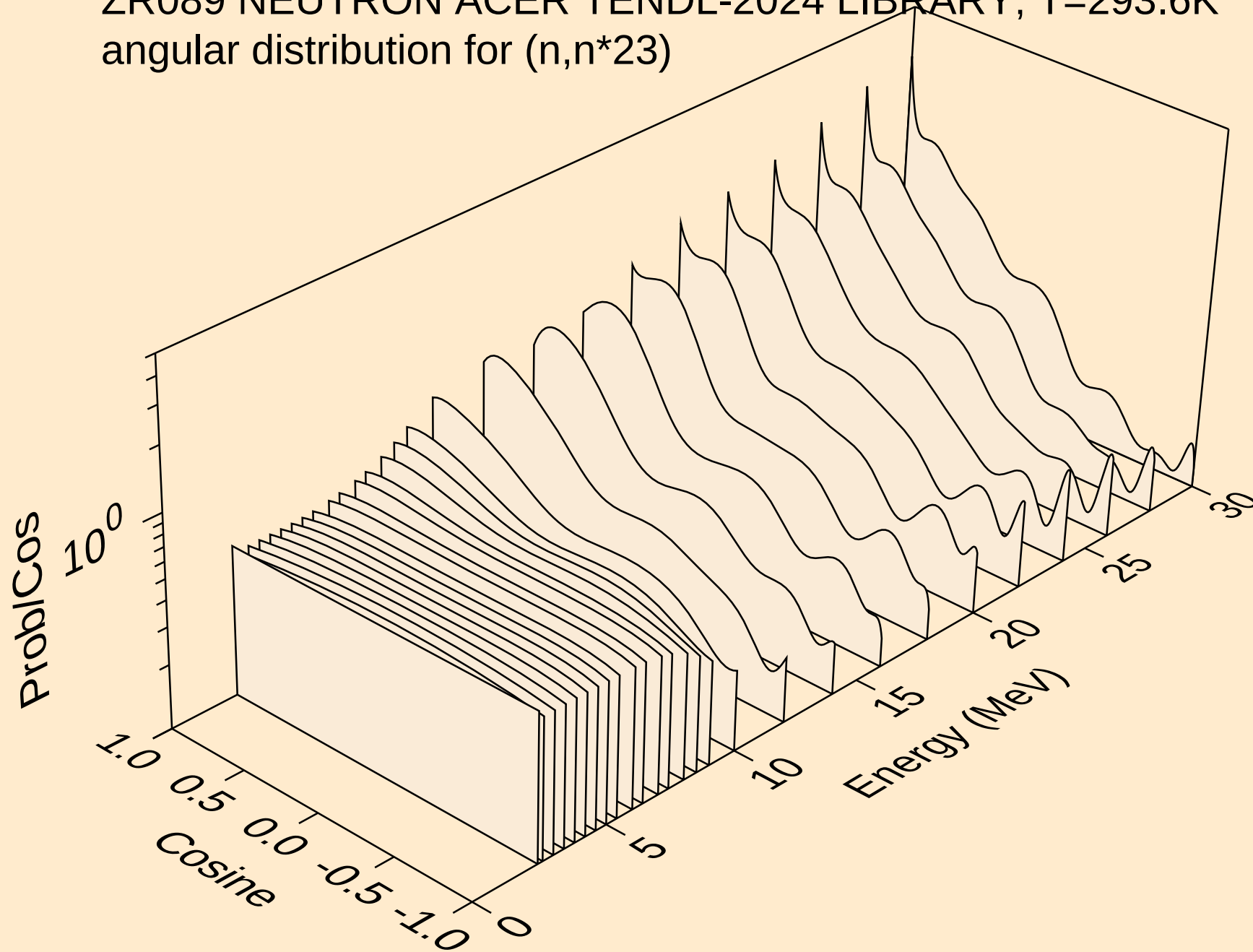
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angular distribution for (n,n*21)



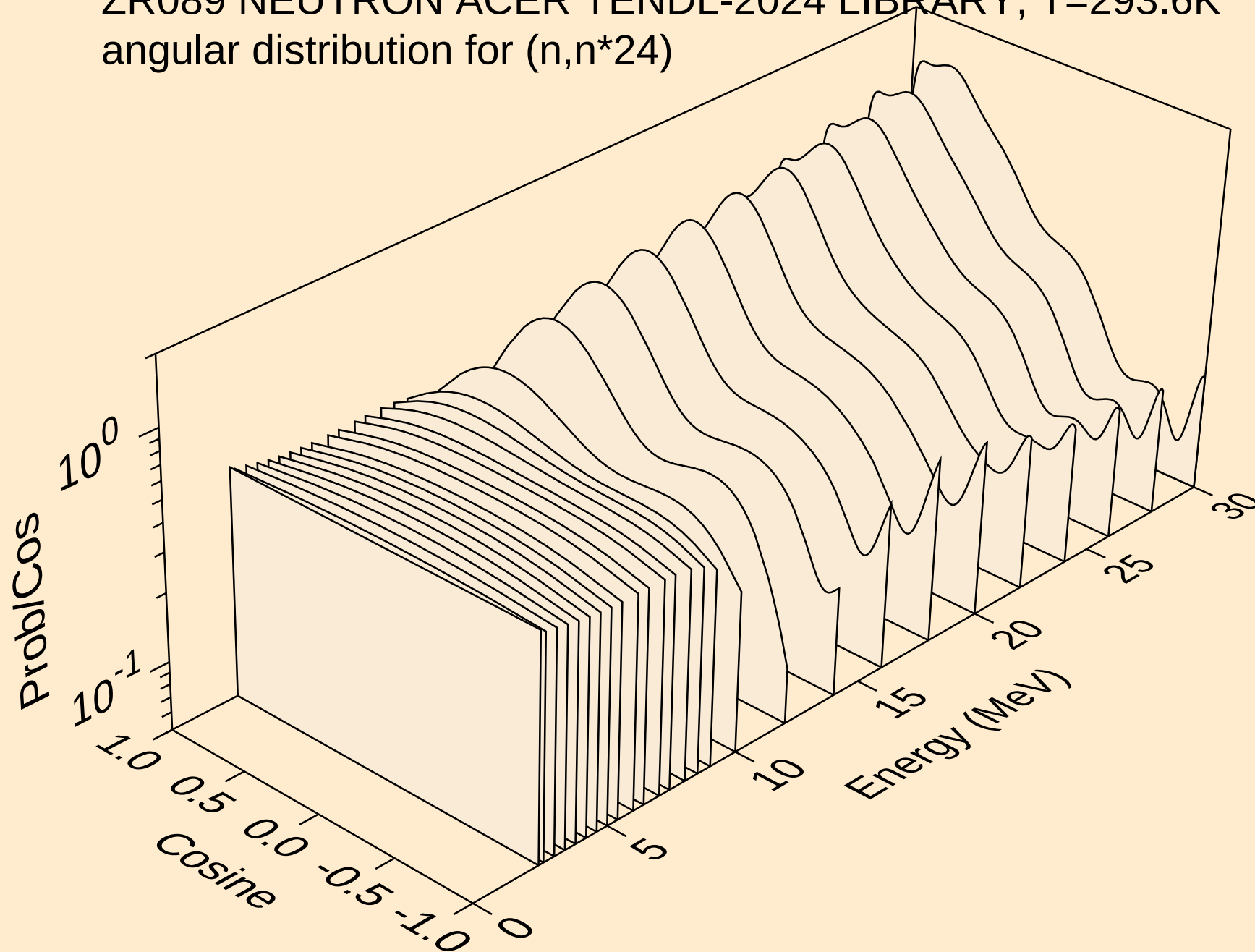
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angular distribution for (n,n*22)



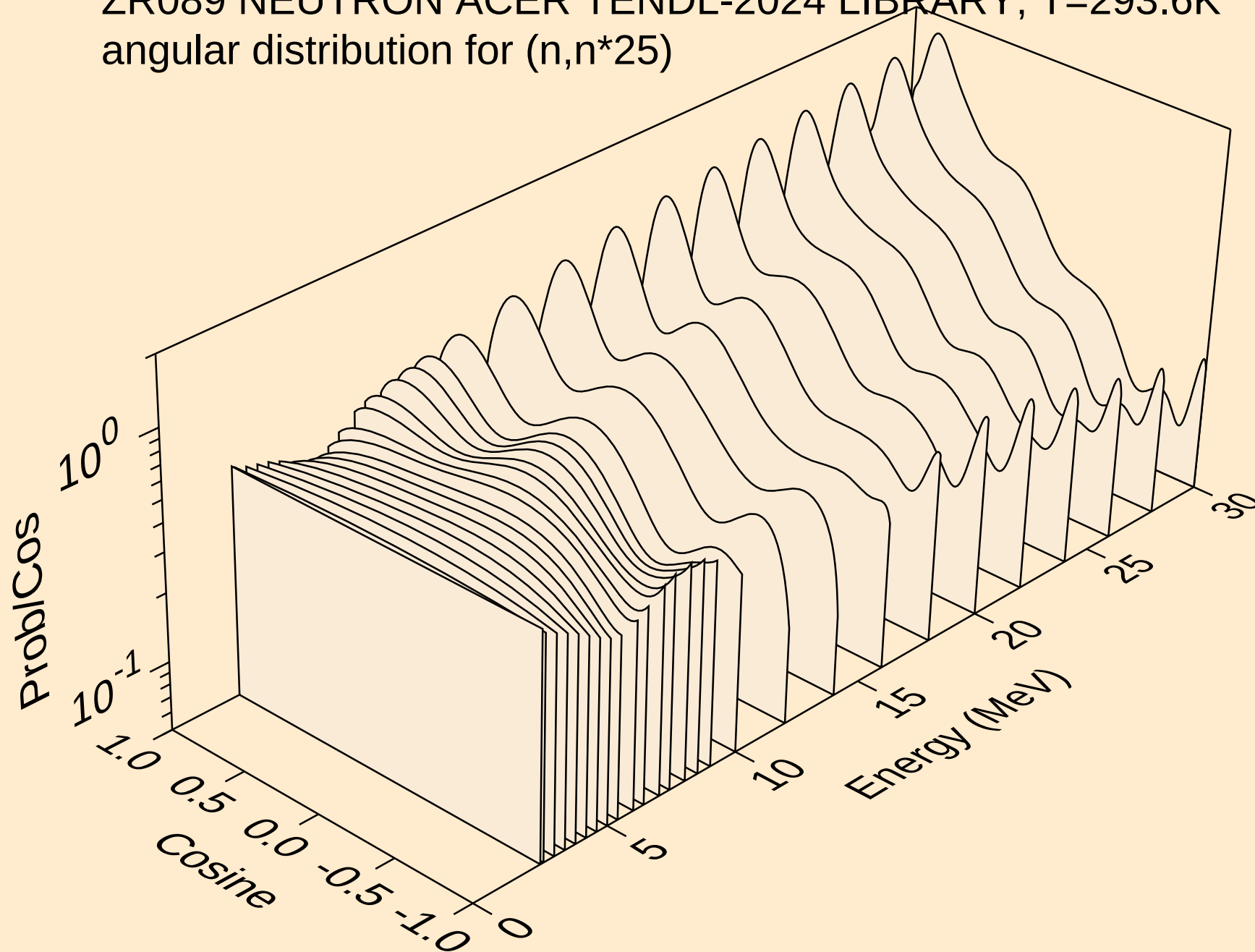
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angular distribution for (n,n*23)



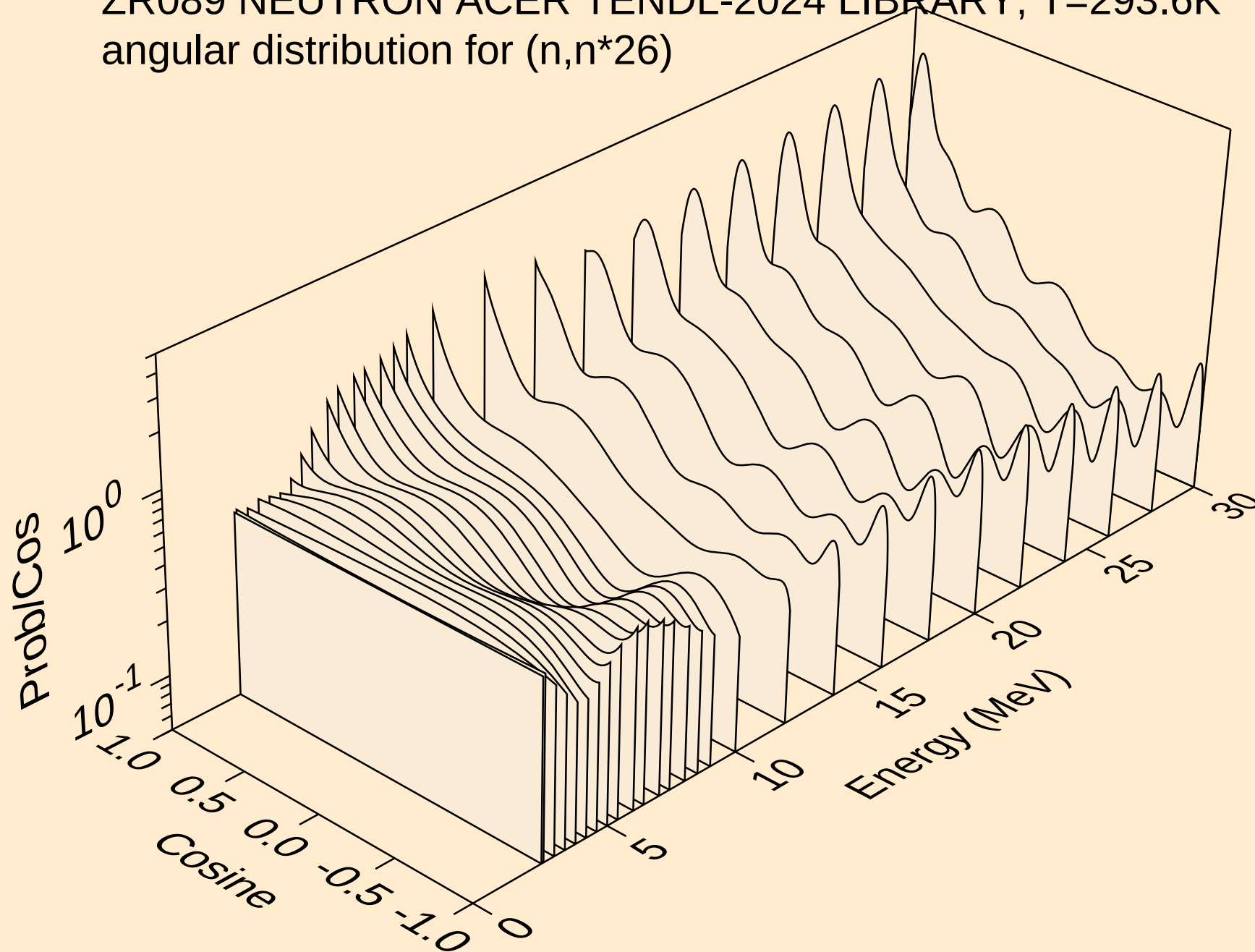
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angular distribution for (n,n*24)



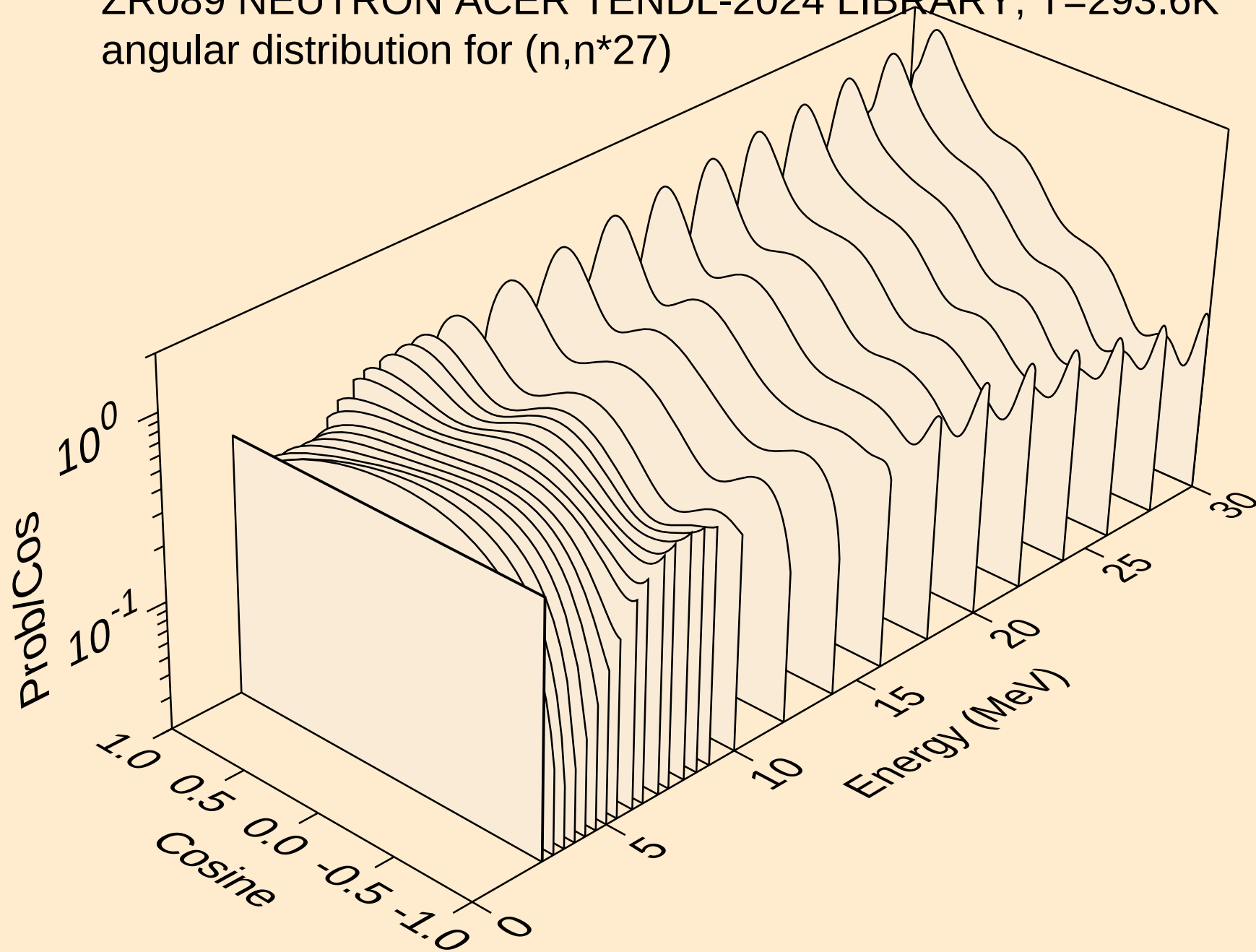
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
angular distribution for (n,n*25)



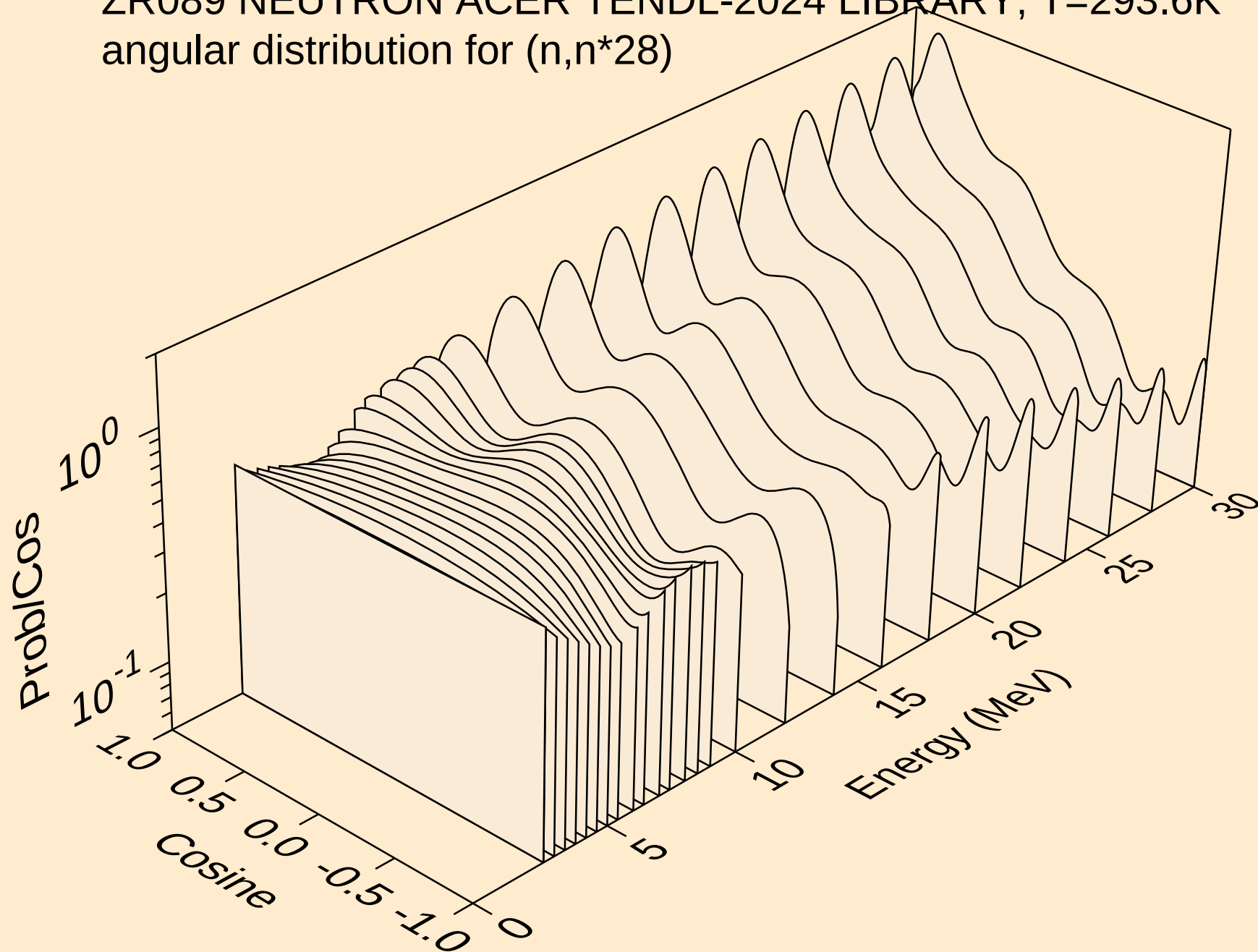
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
angular distribution for (n,n*26)



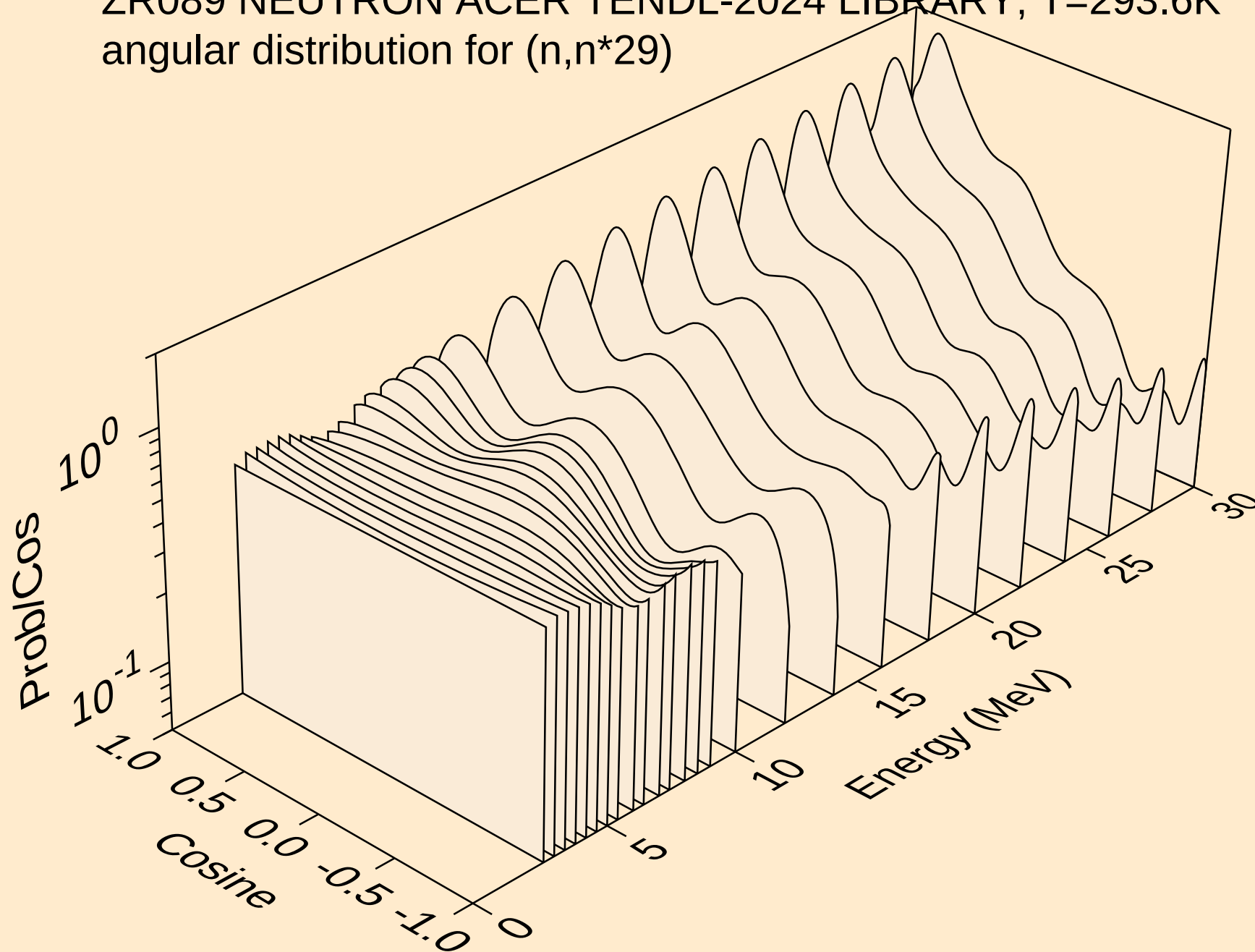
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
angular distribution for (n,n*27)



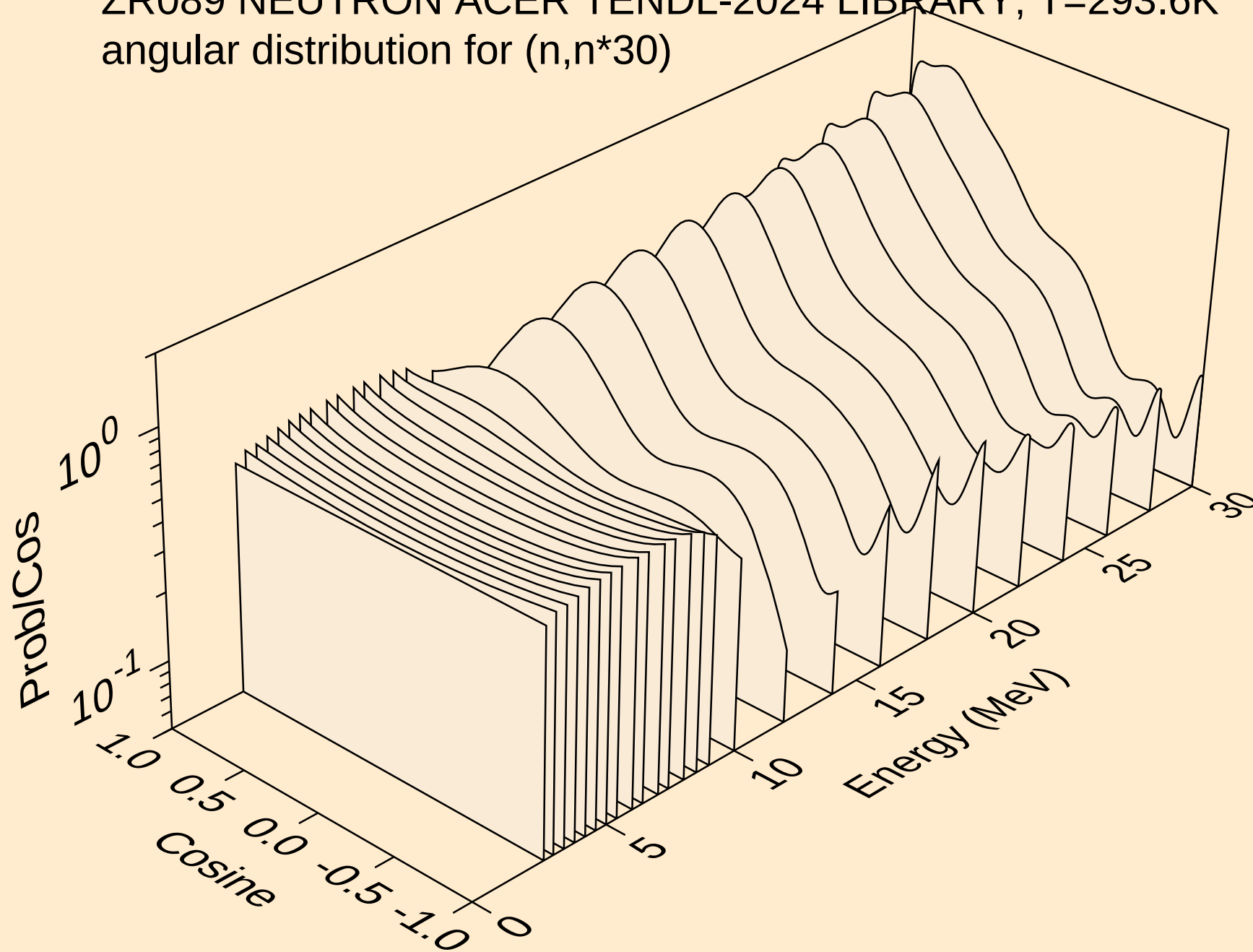
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
angular distribution for (n,n*28)



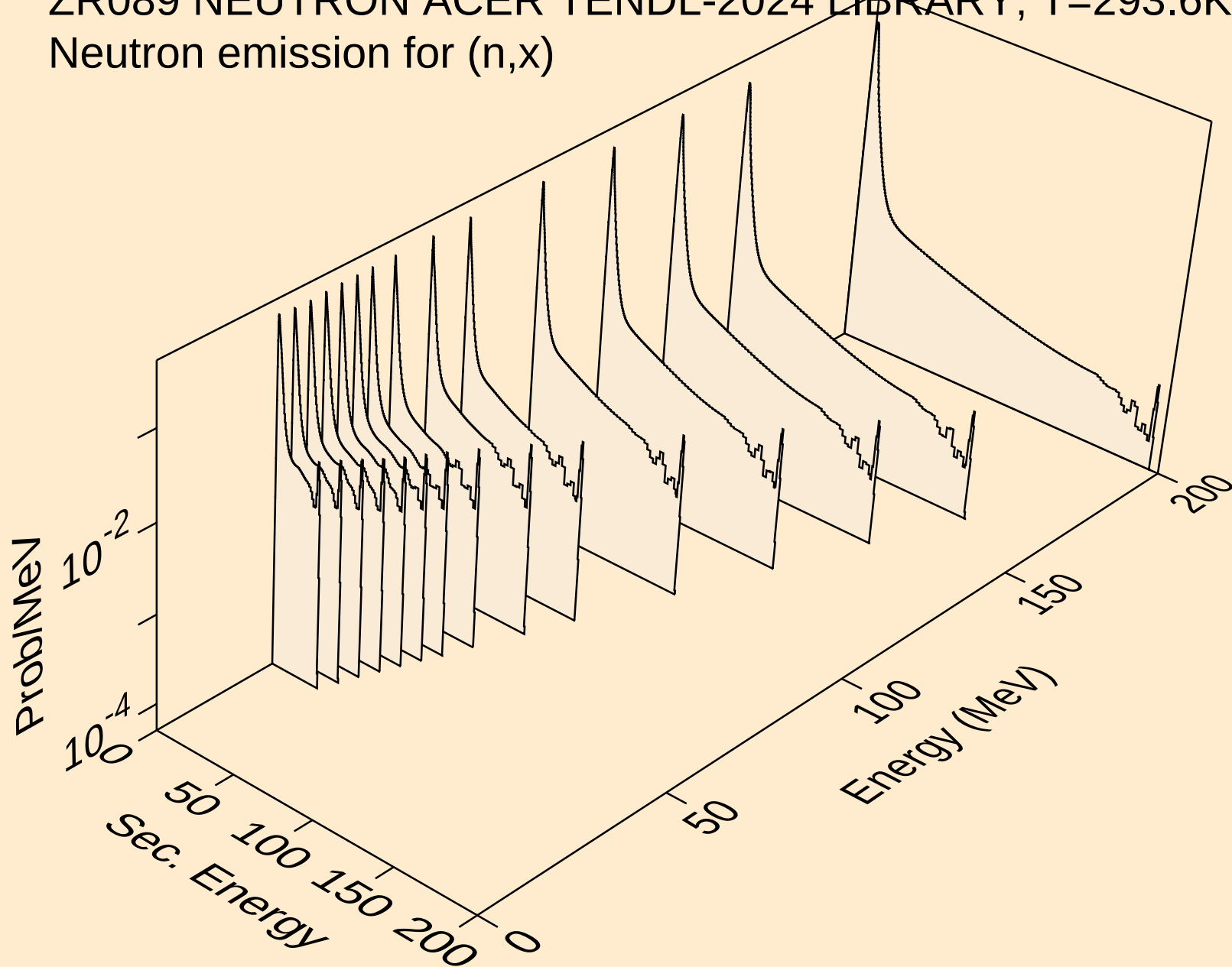
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
angular distribution for (n,n*29)



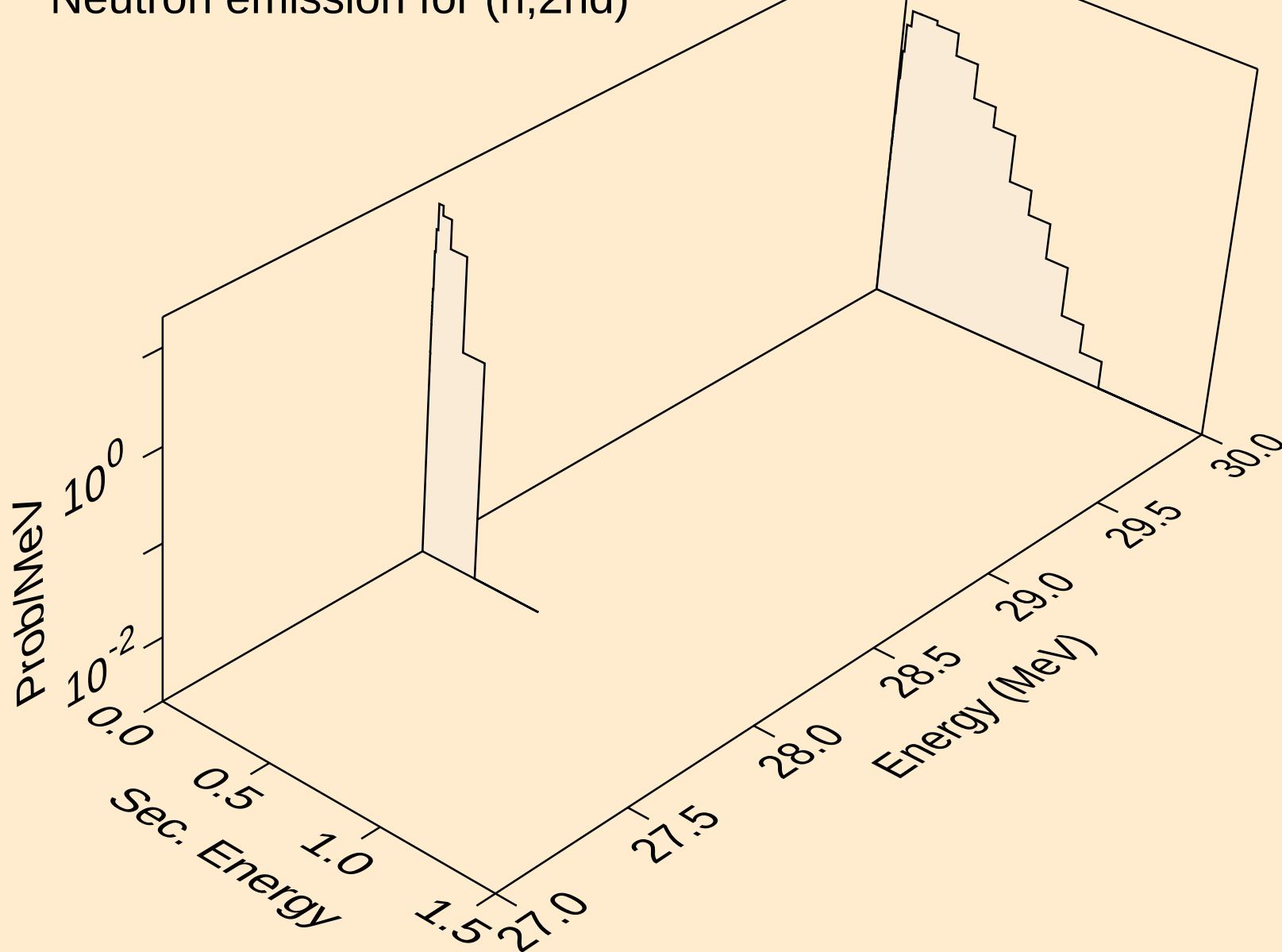
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angular distribution for (n,n*30)



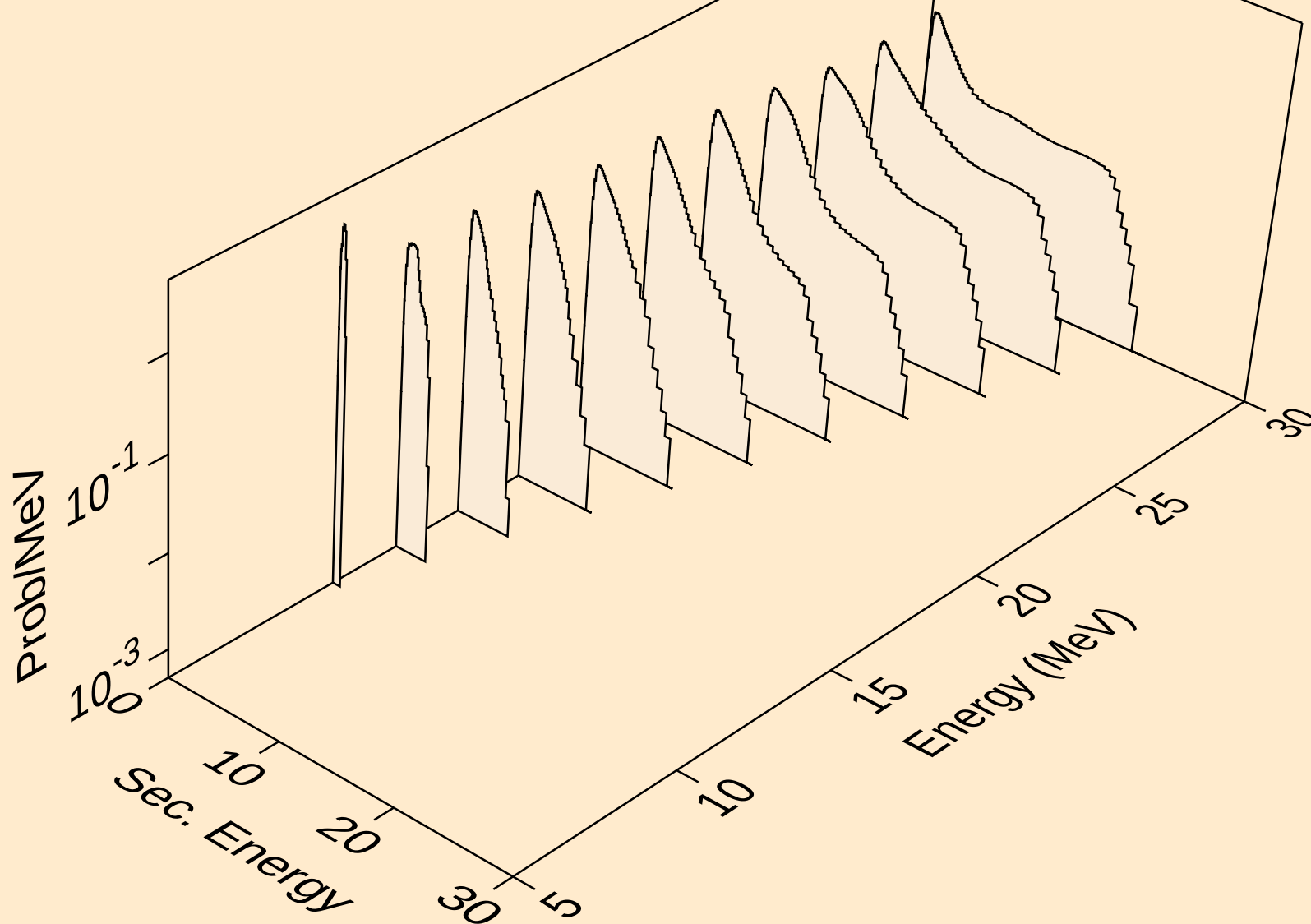
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Neutron emission for (n,x)



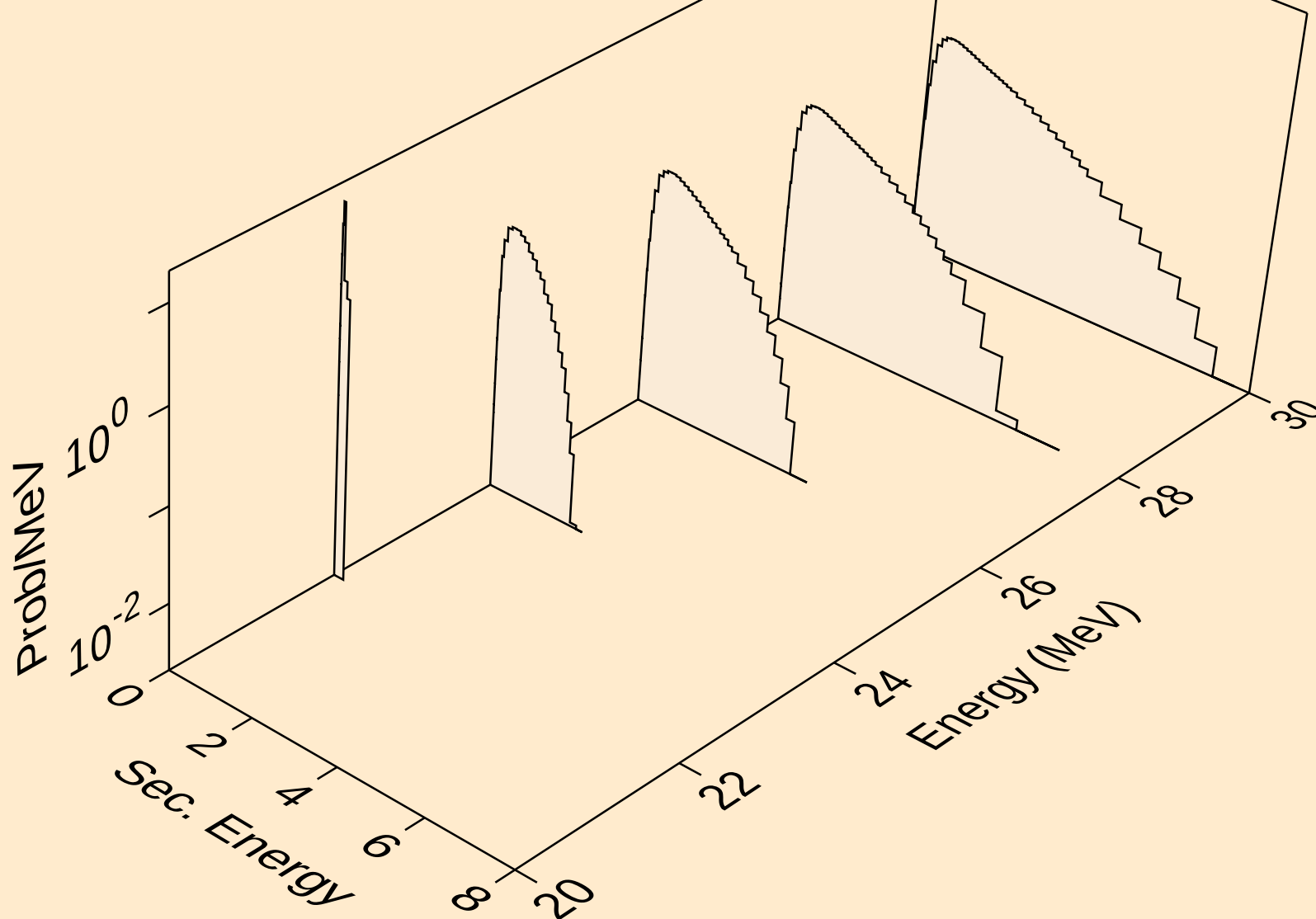
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Neutron emission for (n,2nd)



ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Neutron emission for (n,2n)

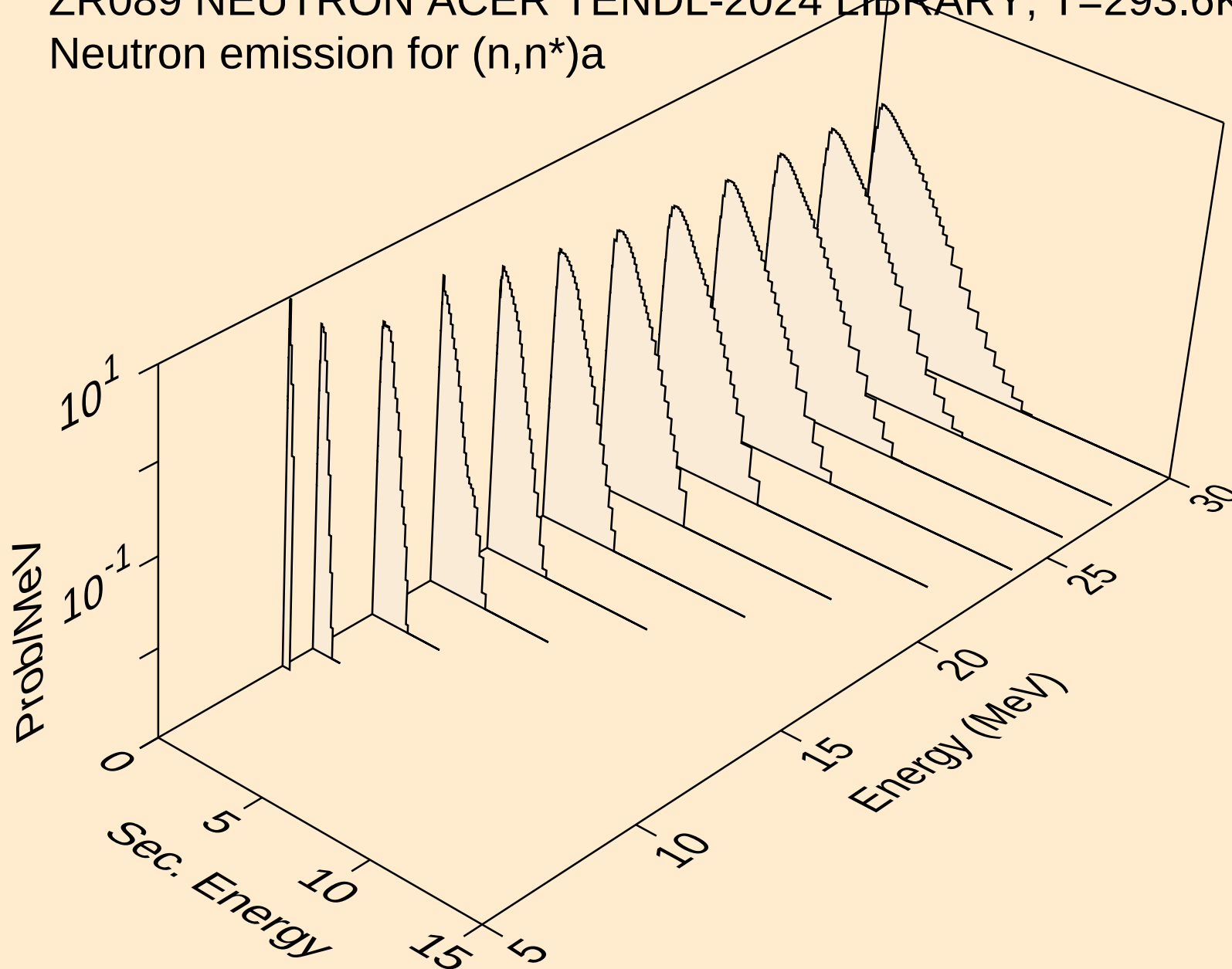


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Neutron emission for (n,3n)

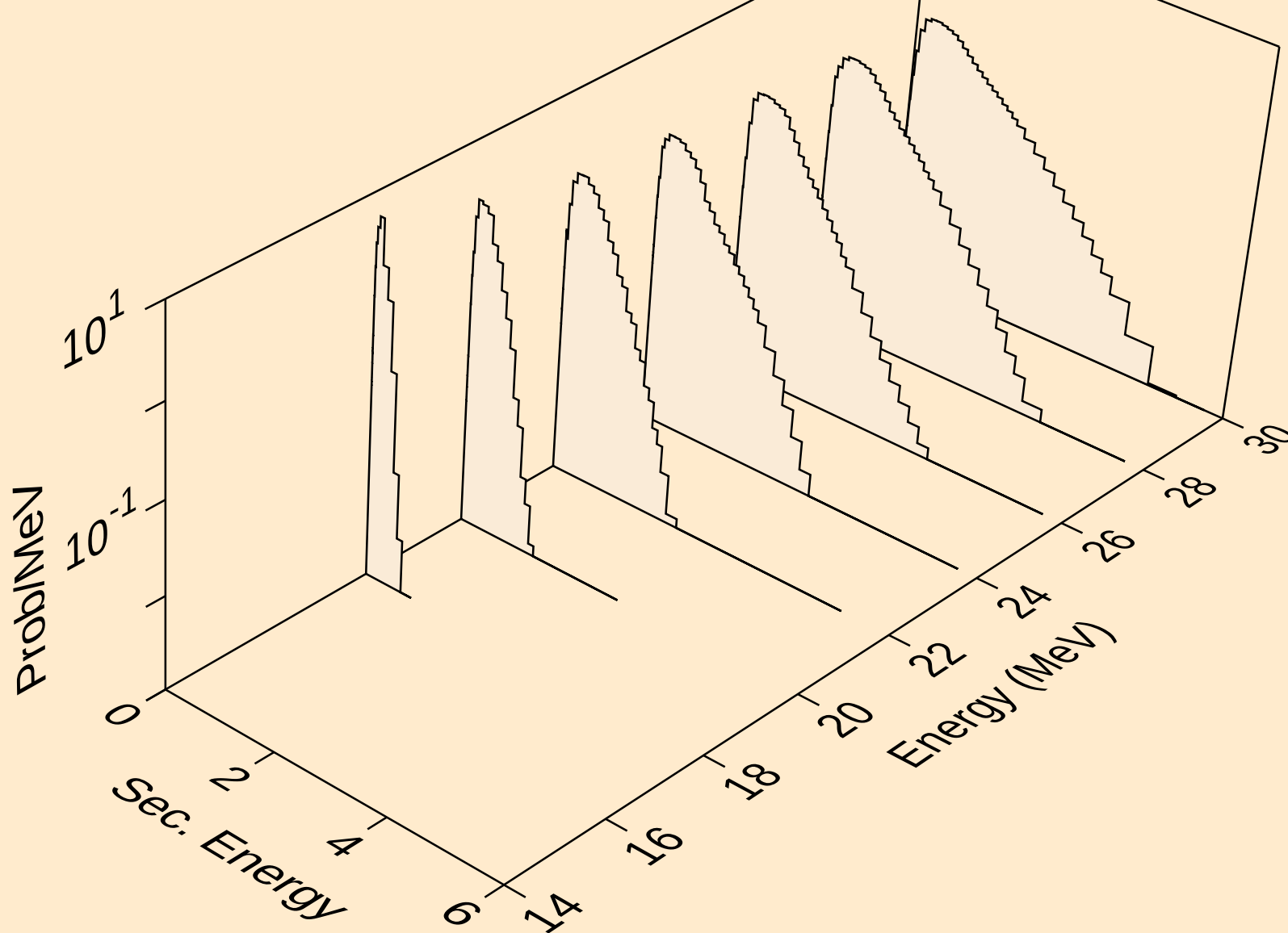


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

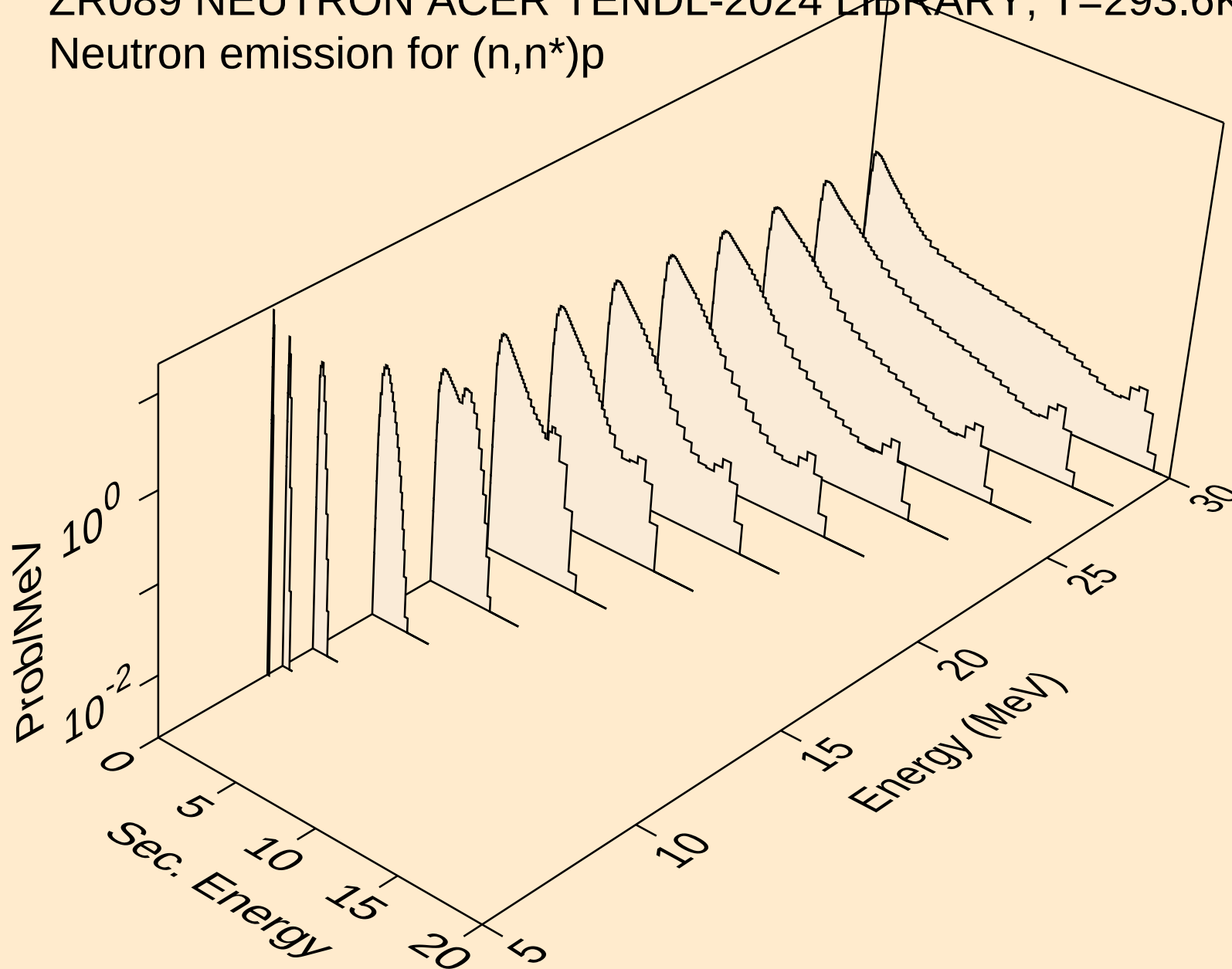
Neutron emission for (n,n*)a



ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Neutron emission for (n,2n)_a

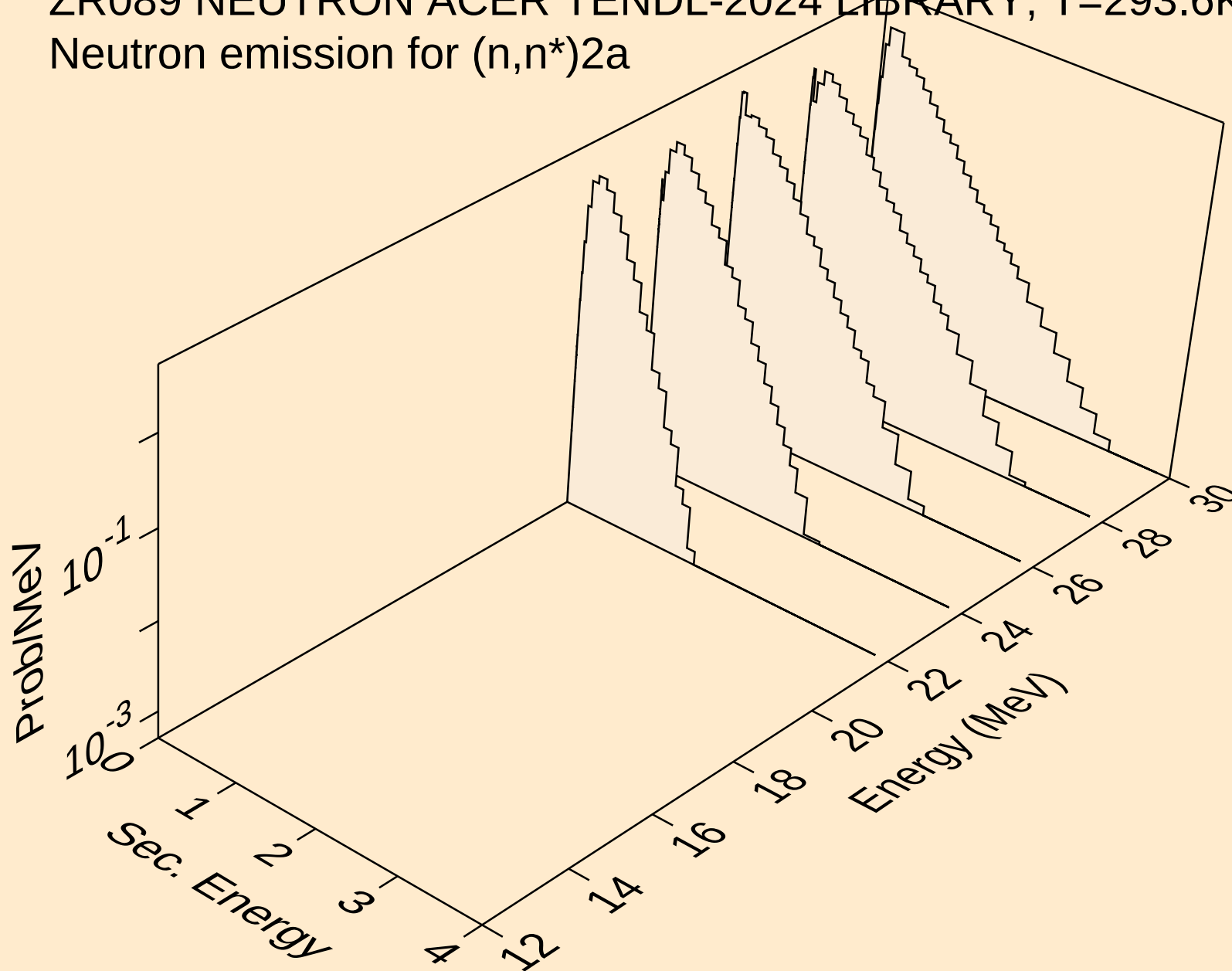


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Neutron emission for (n,n*)p

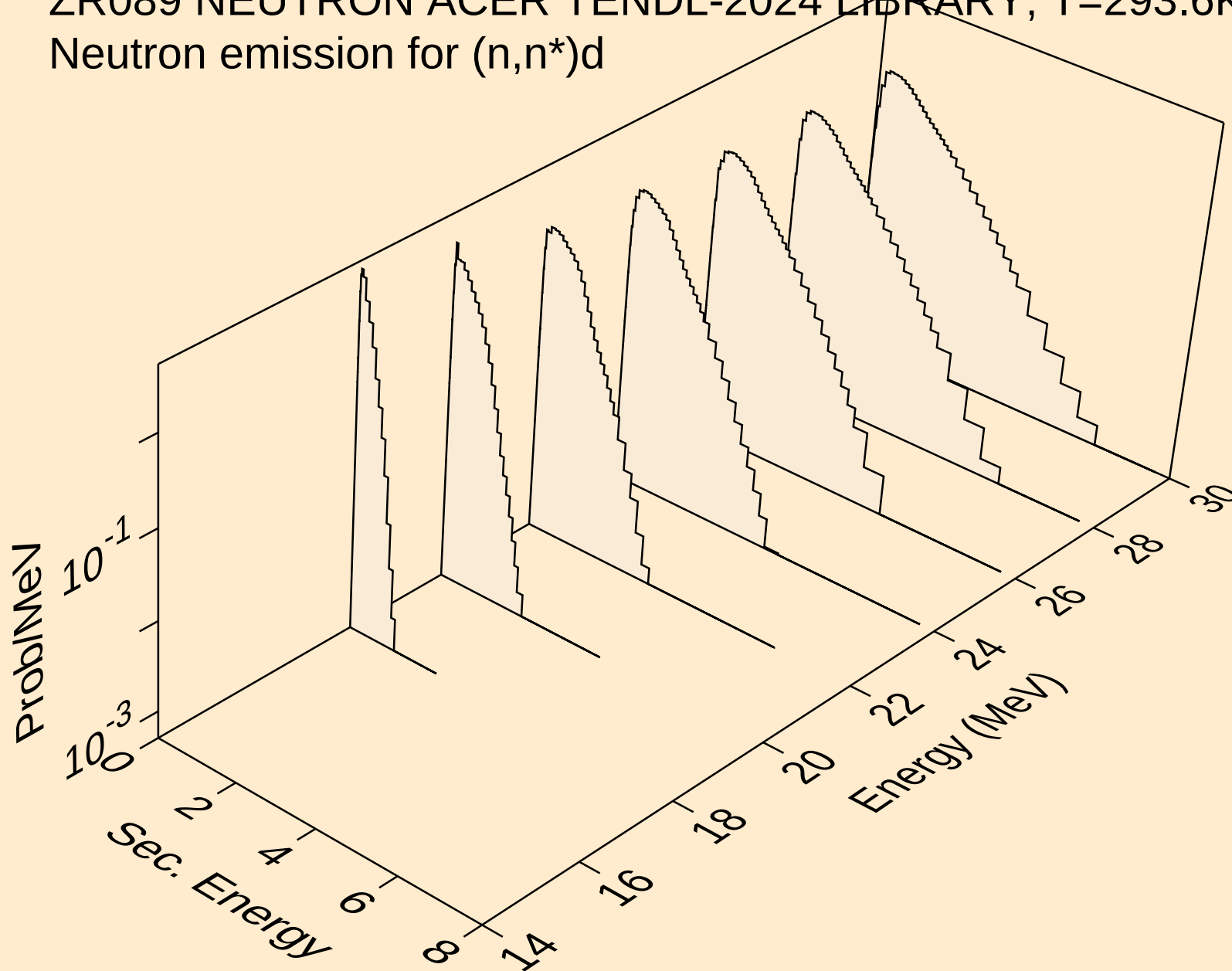


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

Neutron emission for (n,n*)2a

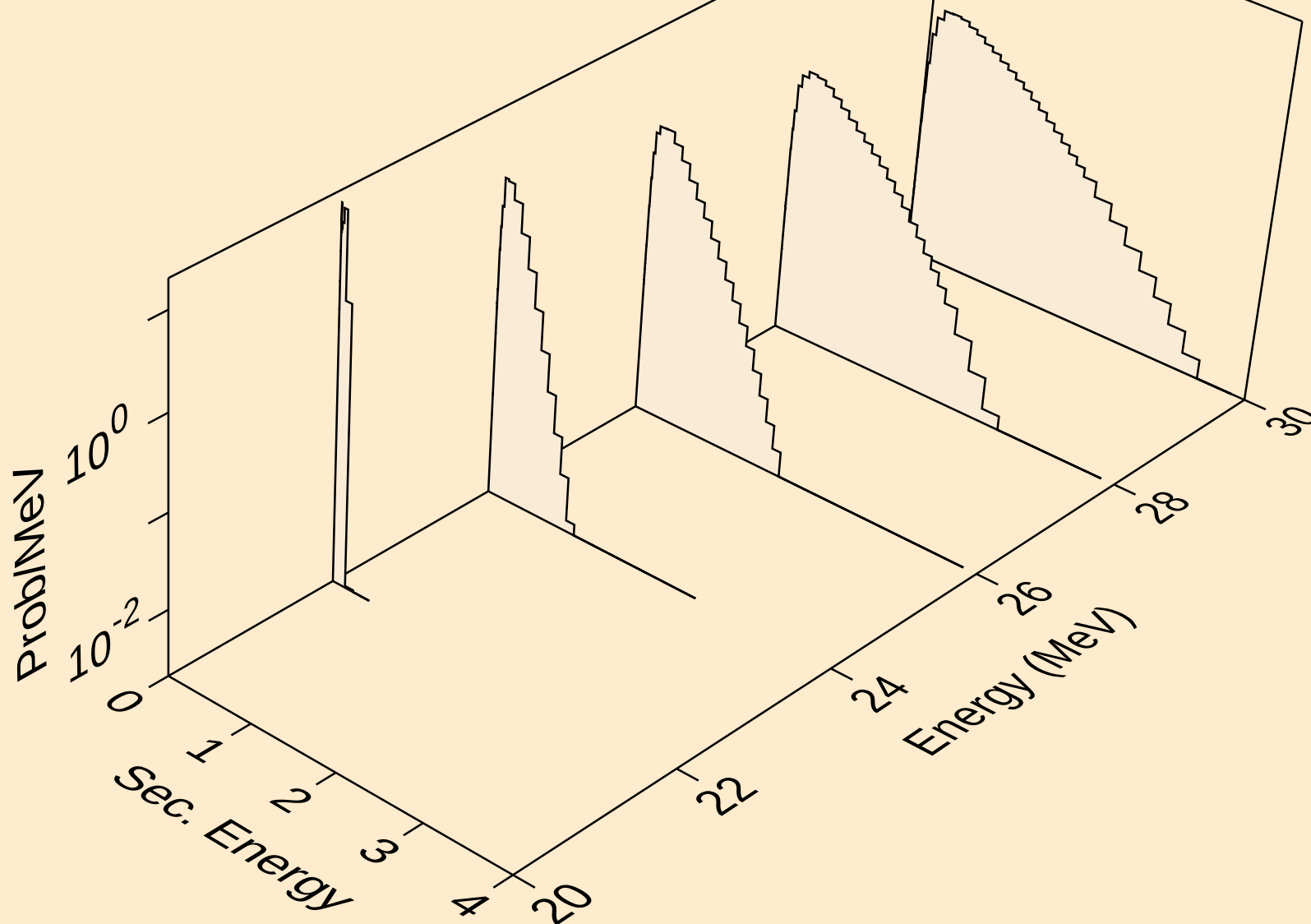


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Neutron emission for (n,n*)d

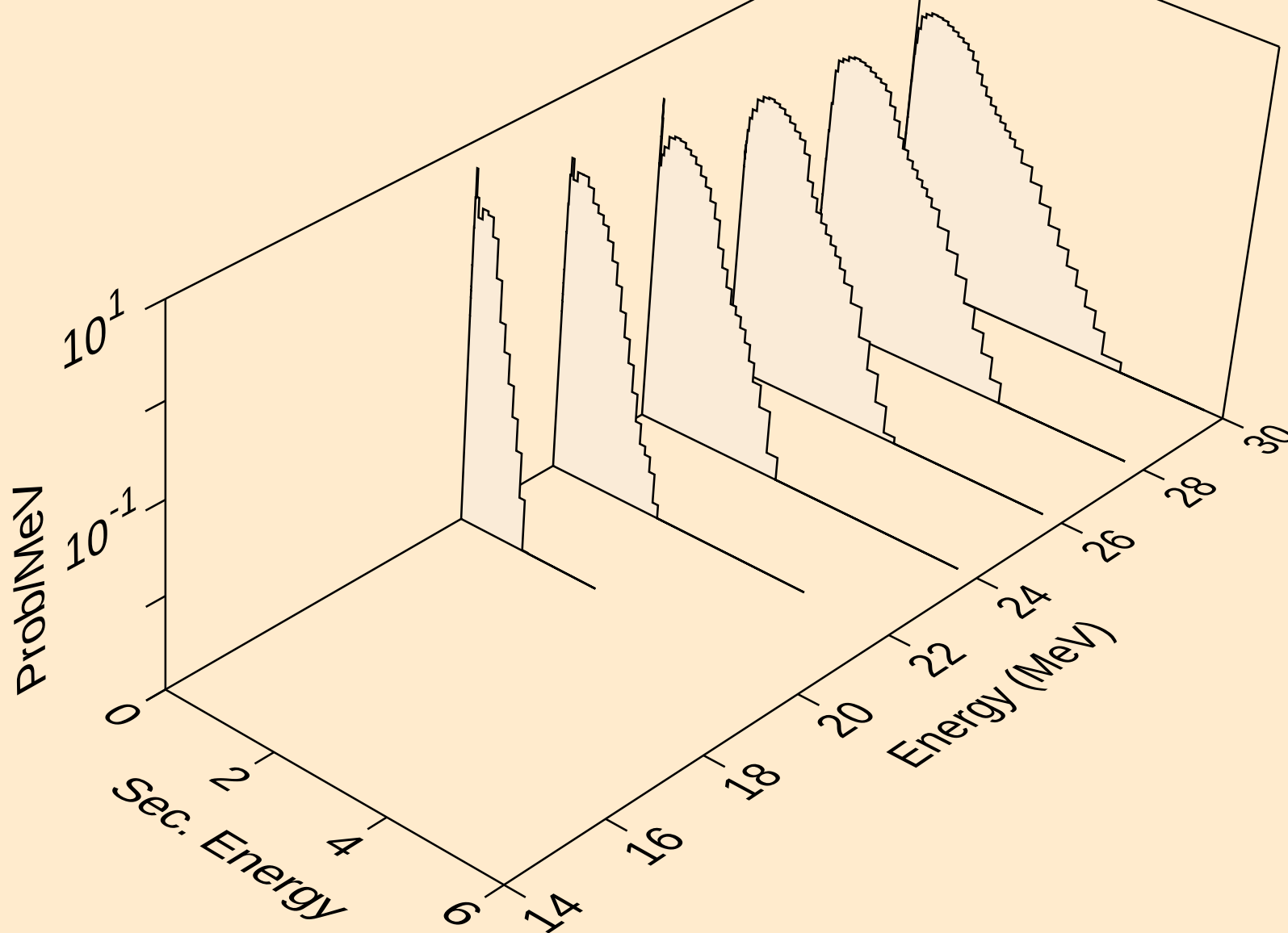


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

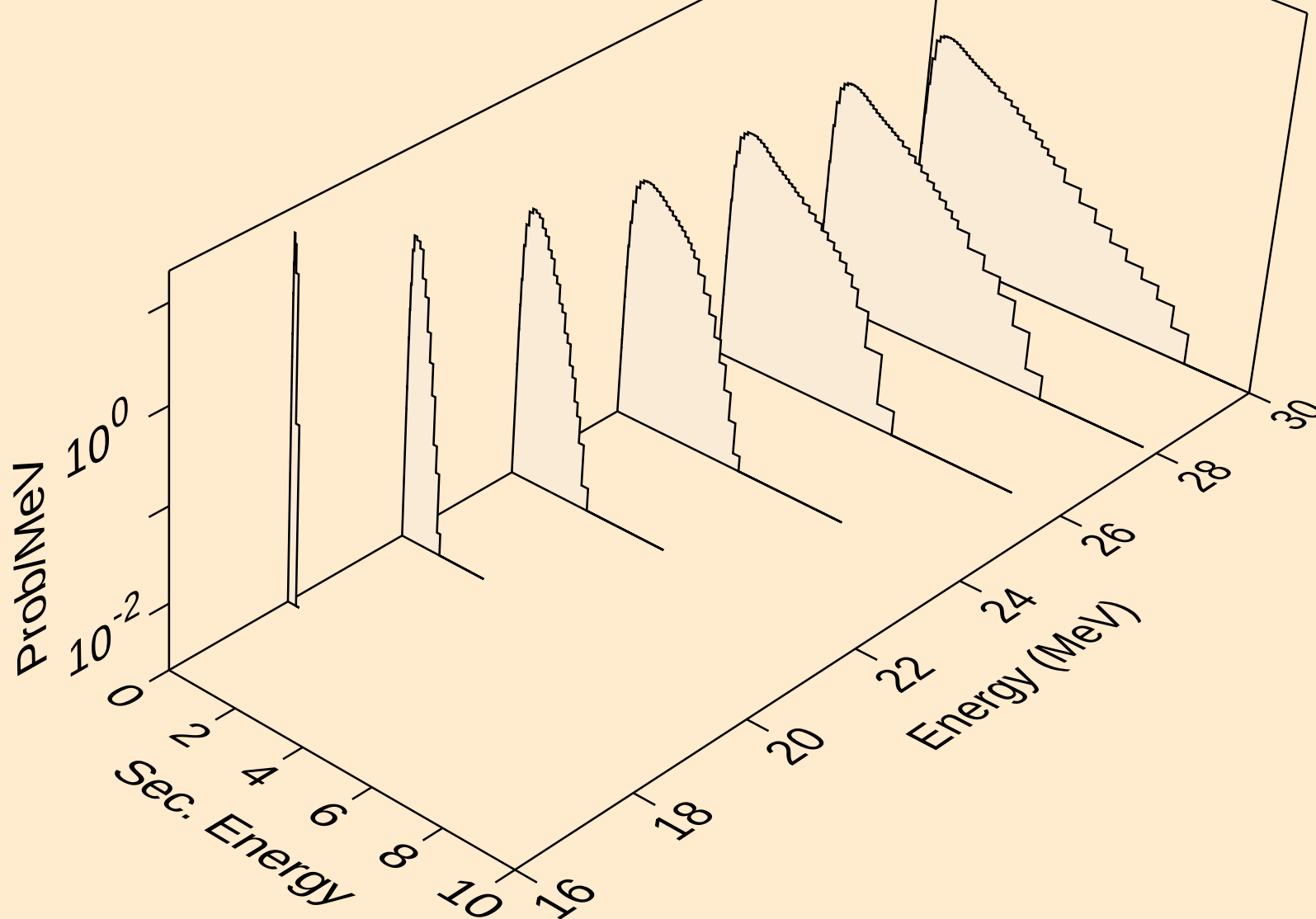
Neutron emission for (n,n*)t



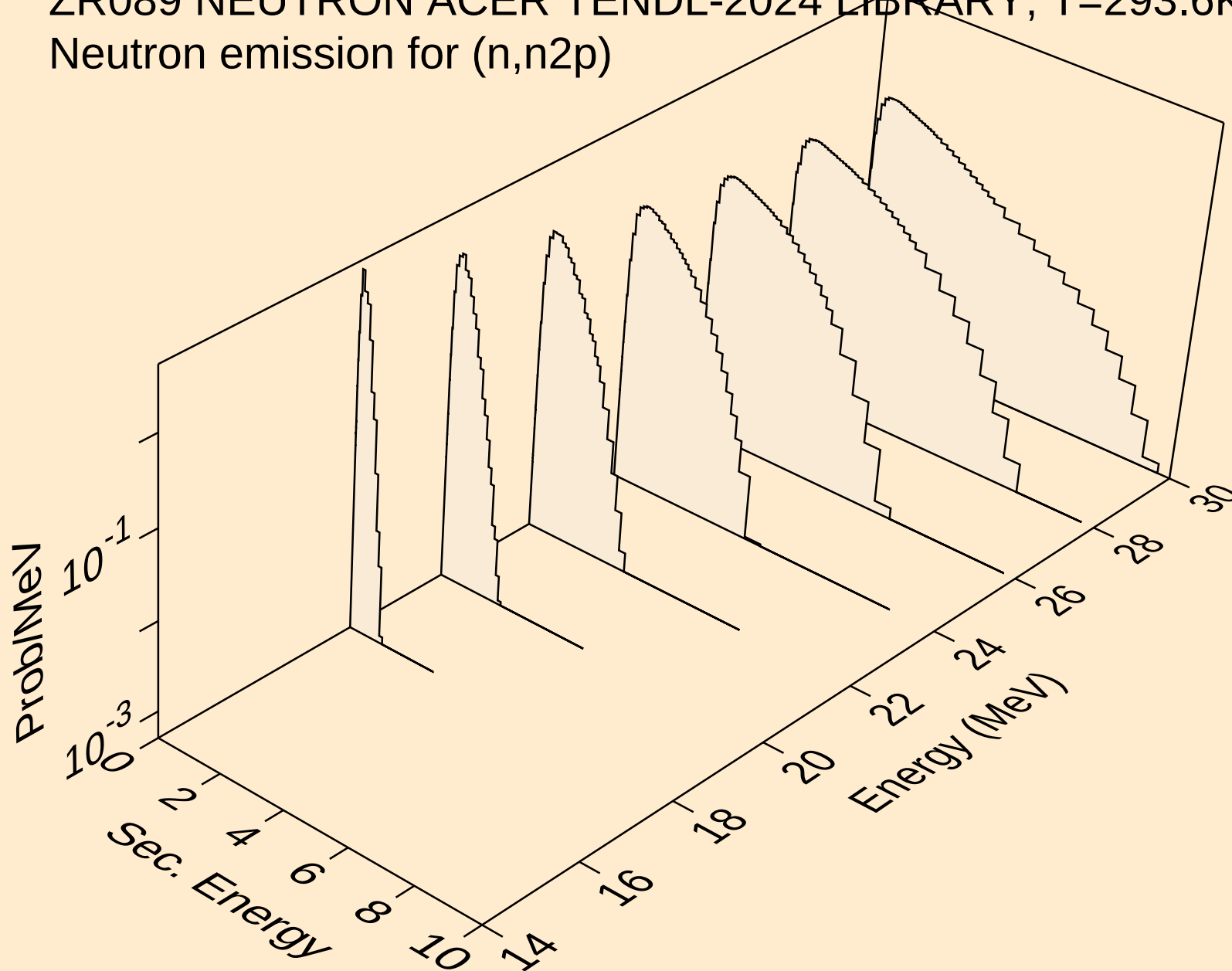
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Neutron emission for (n,n*)he3



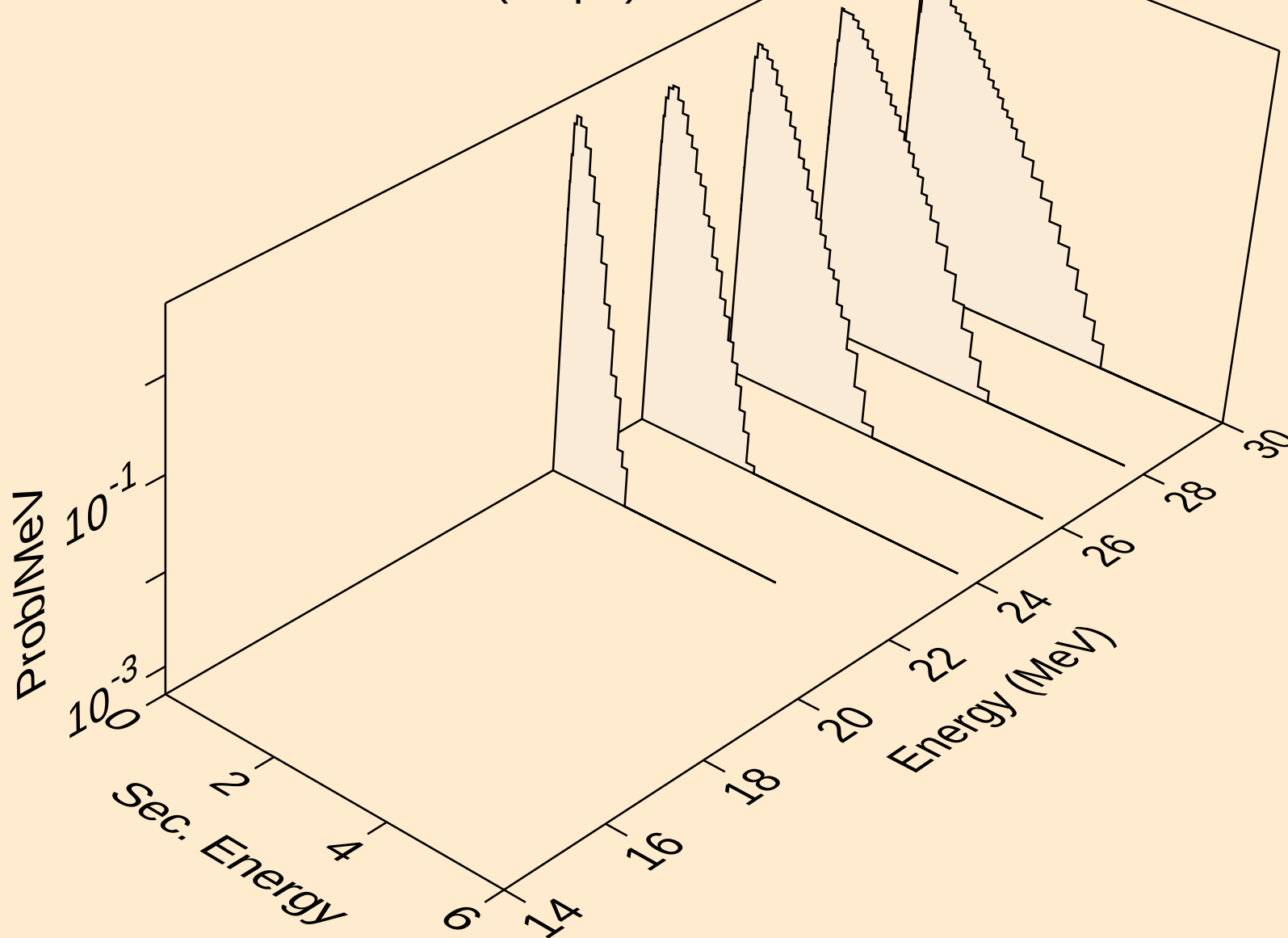
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Neutron emission for (n,2np)



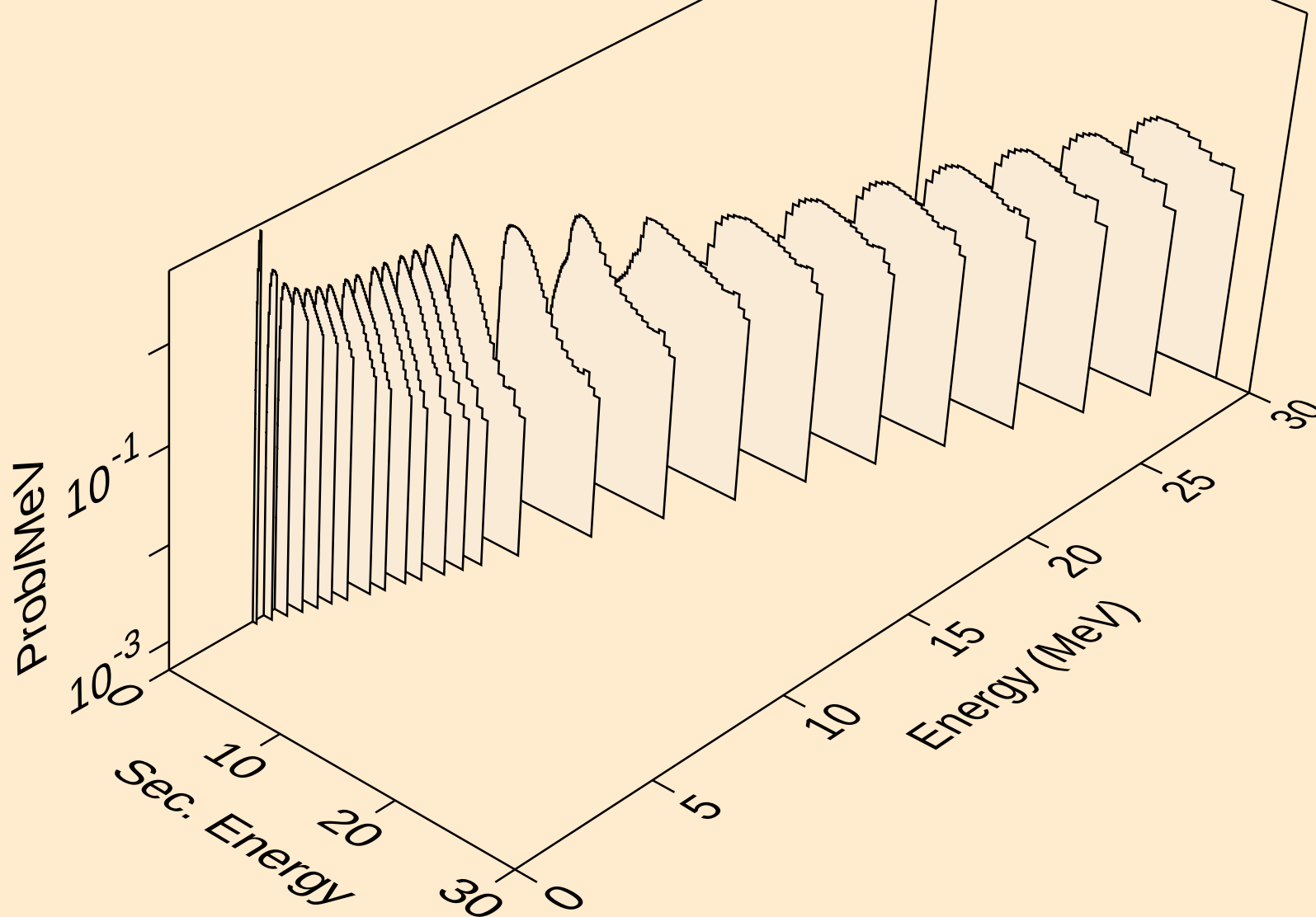
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Neutron emission for (n,n2p)



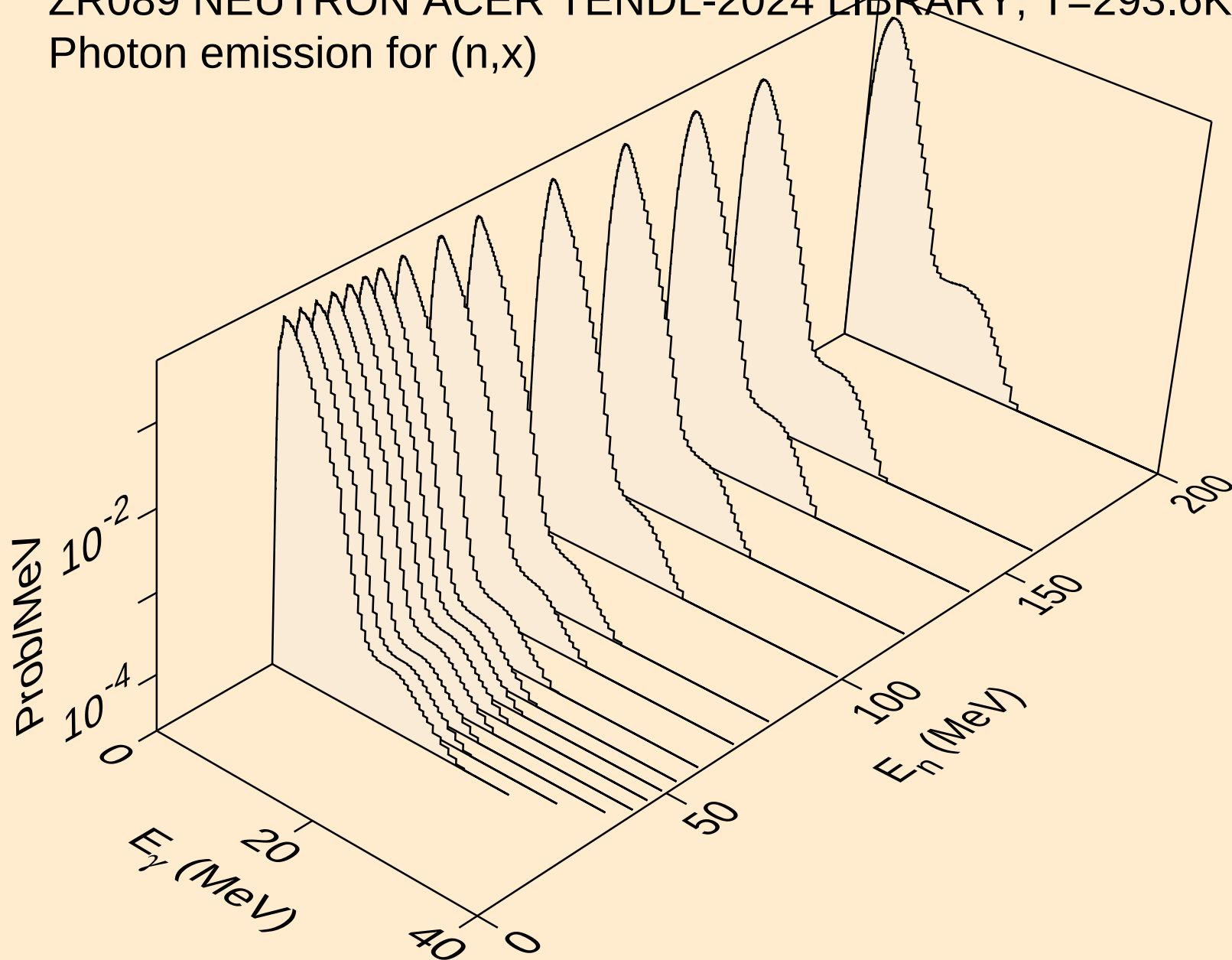
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Neutron emission for (n,npa)



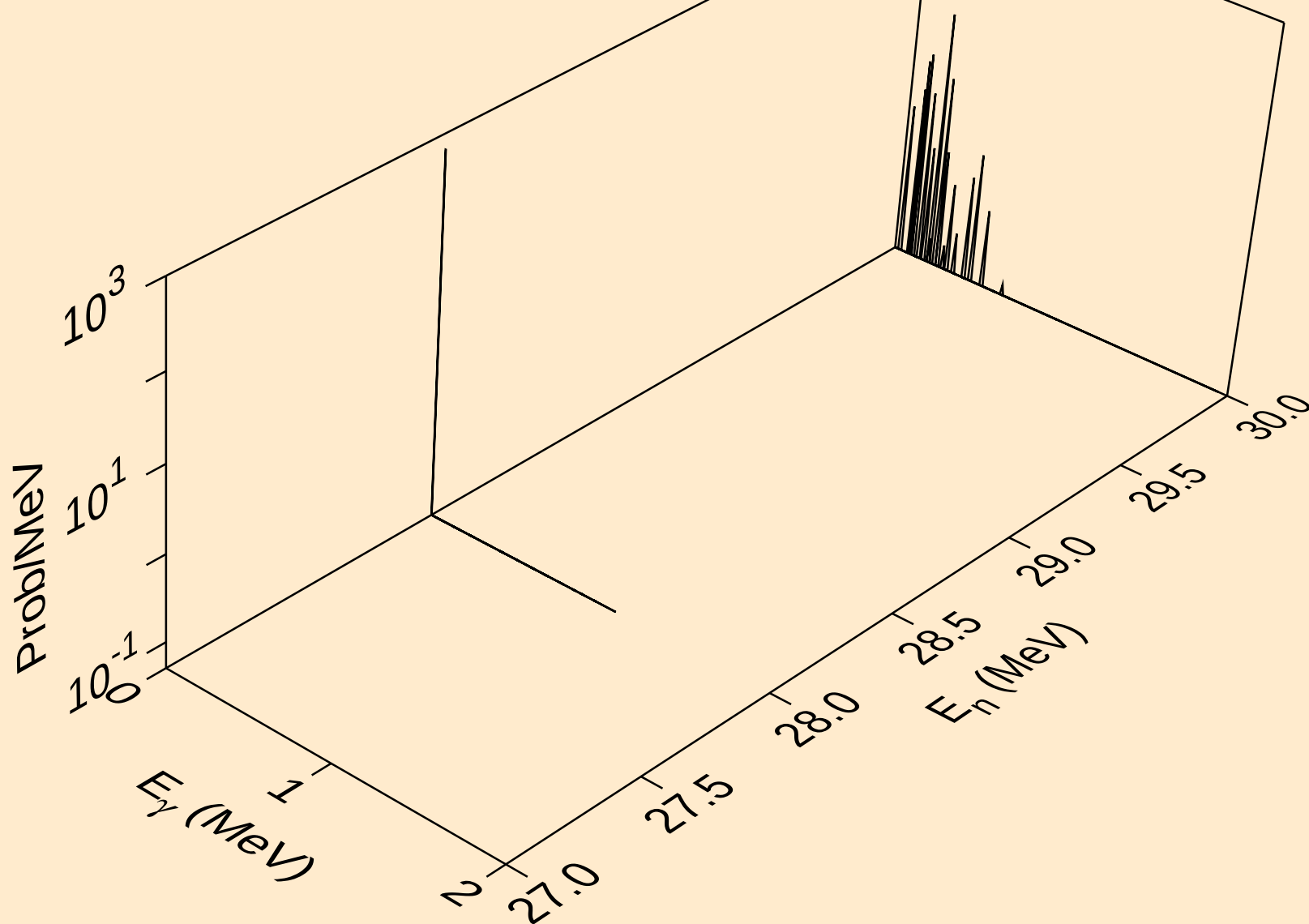
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Neutron emission for (n,n*c)



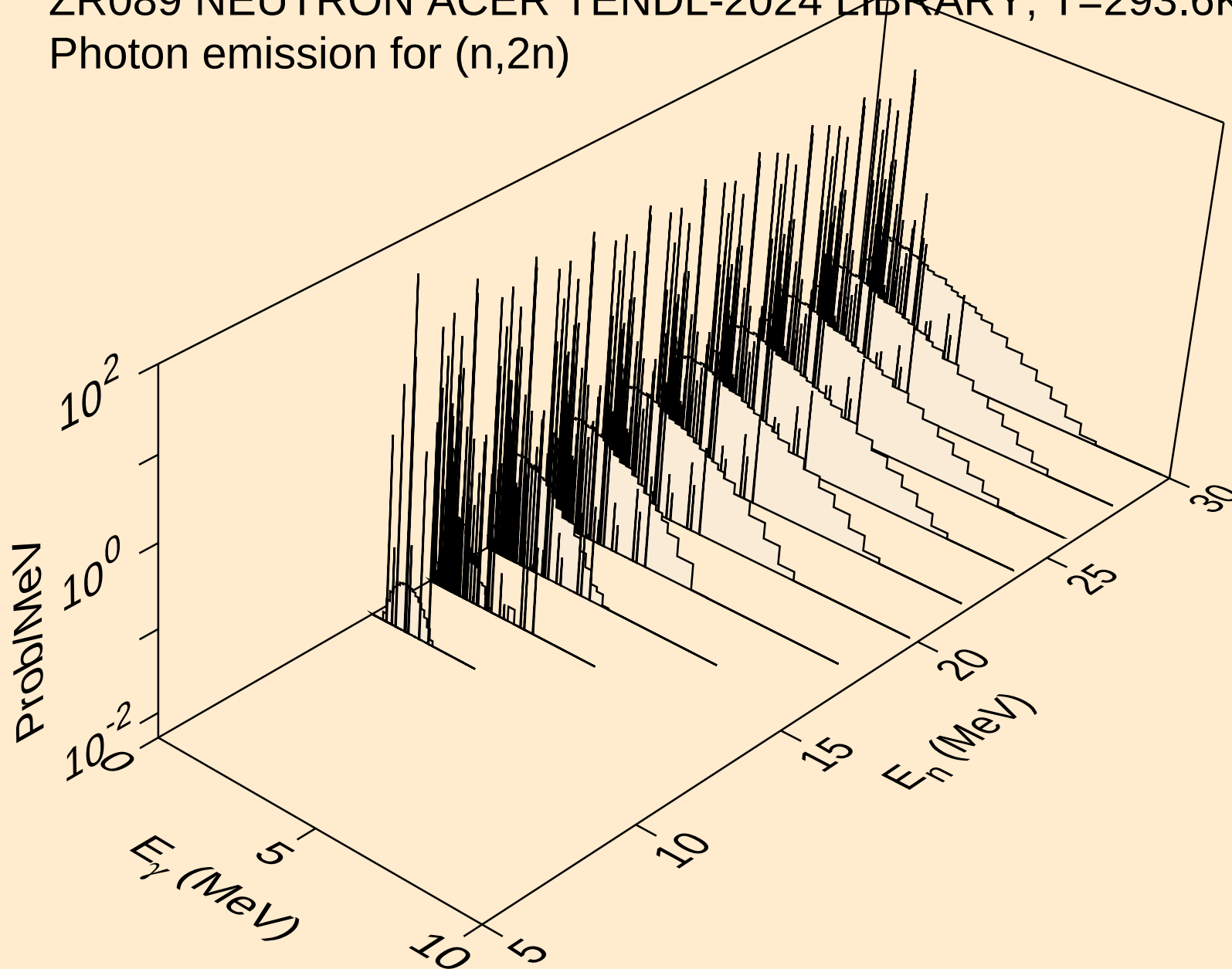
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,x)



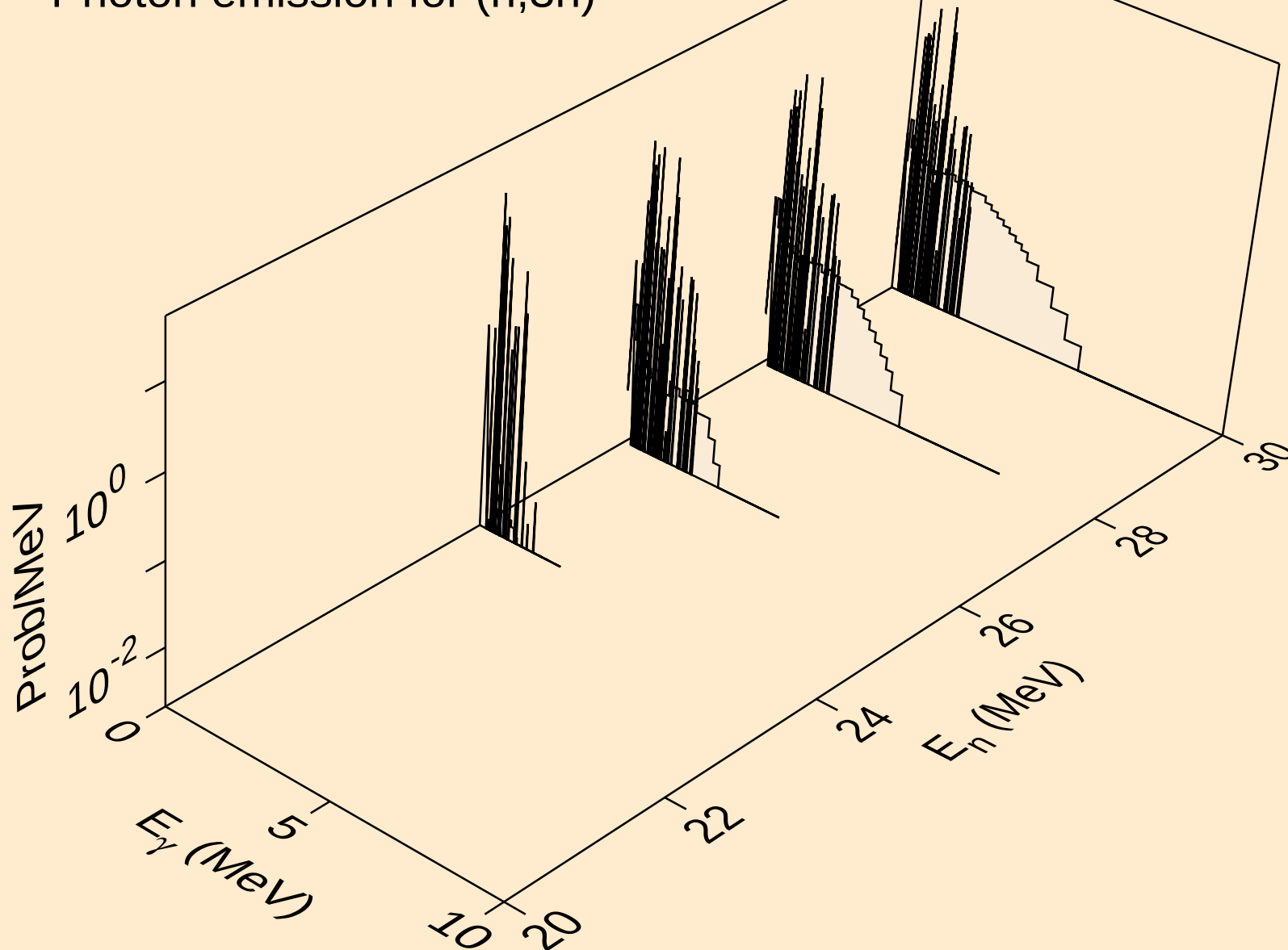
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,2nd)



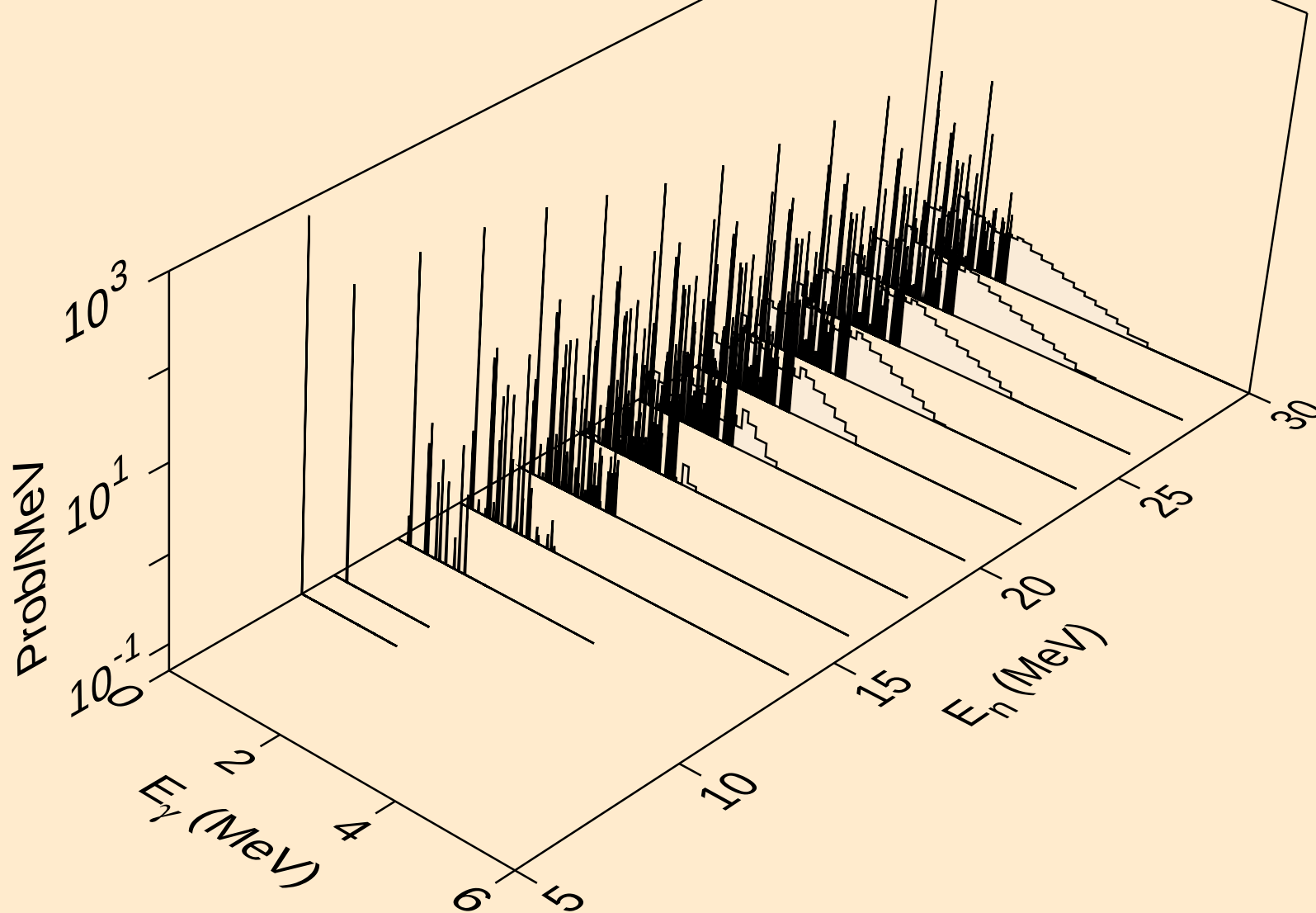
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,2n)



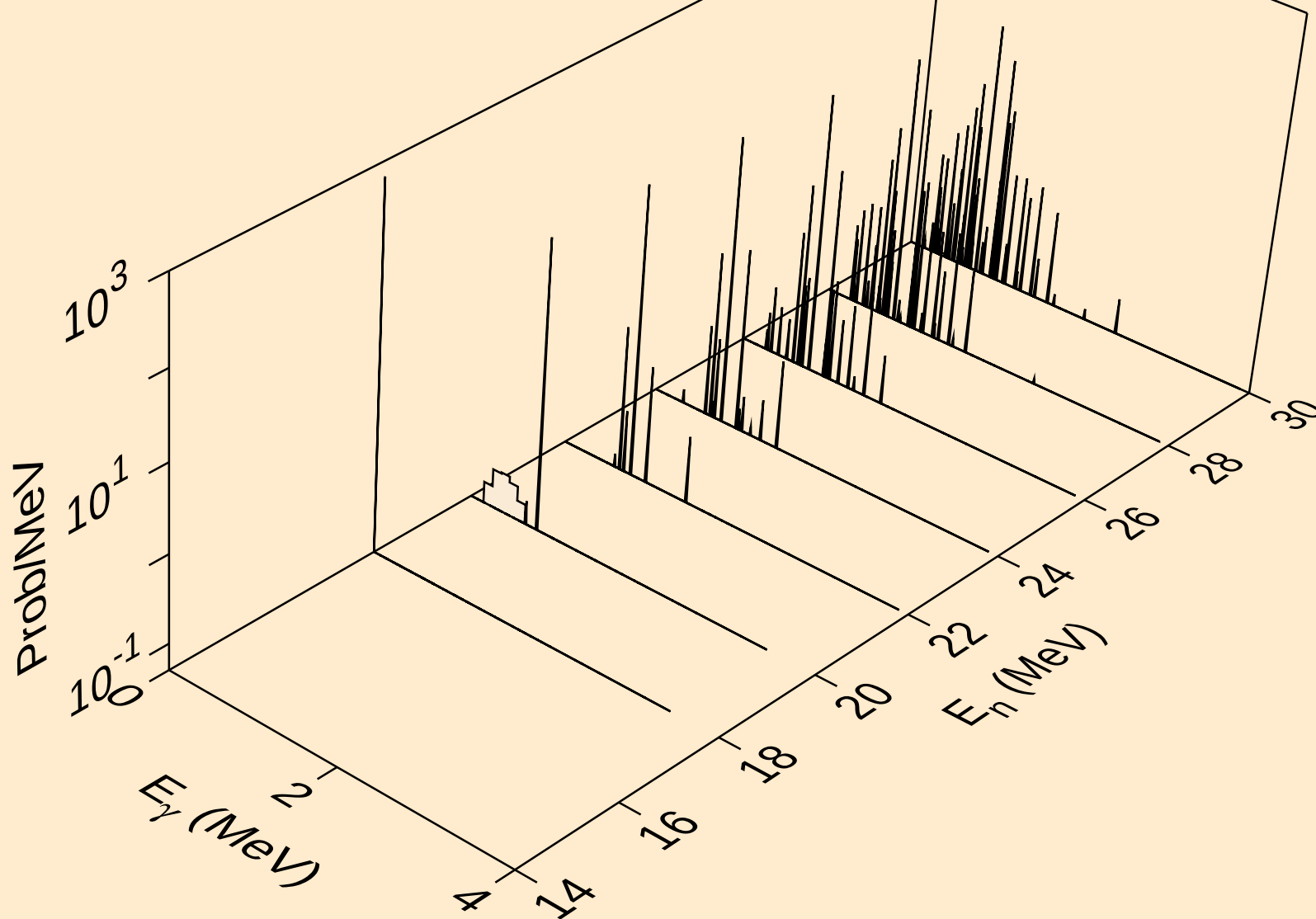
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,3n)



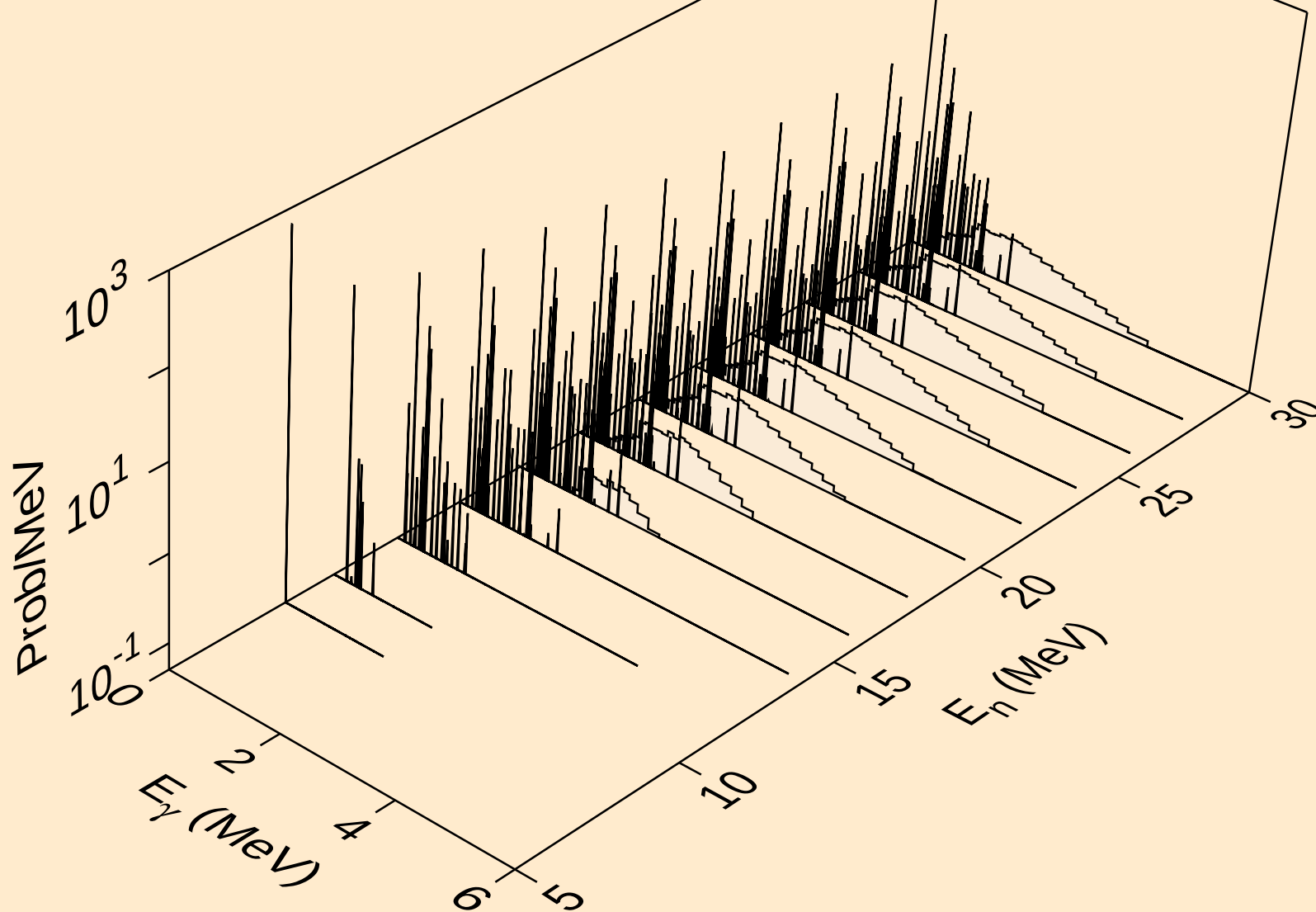
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,n*)a



ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,2n)a

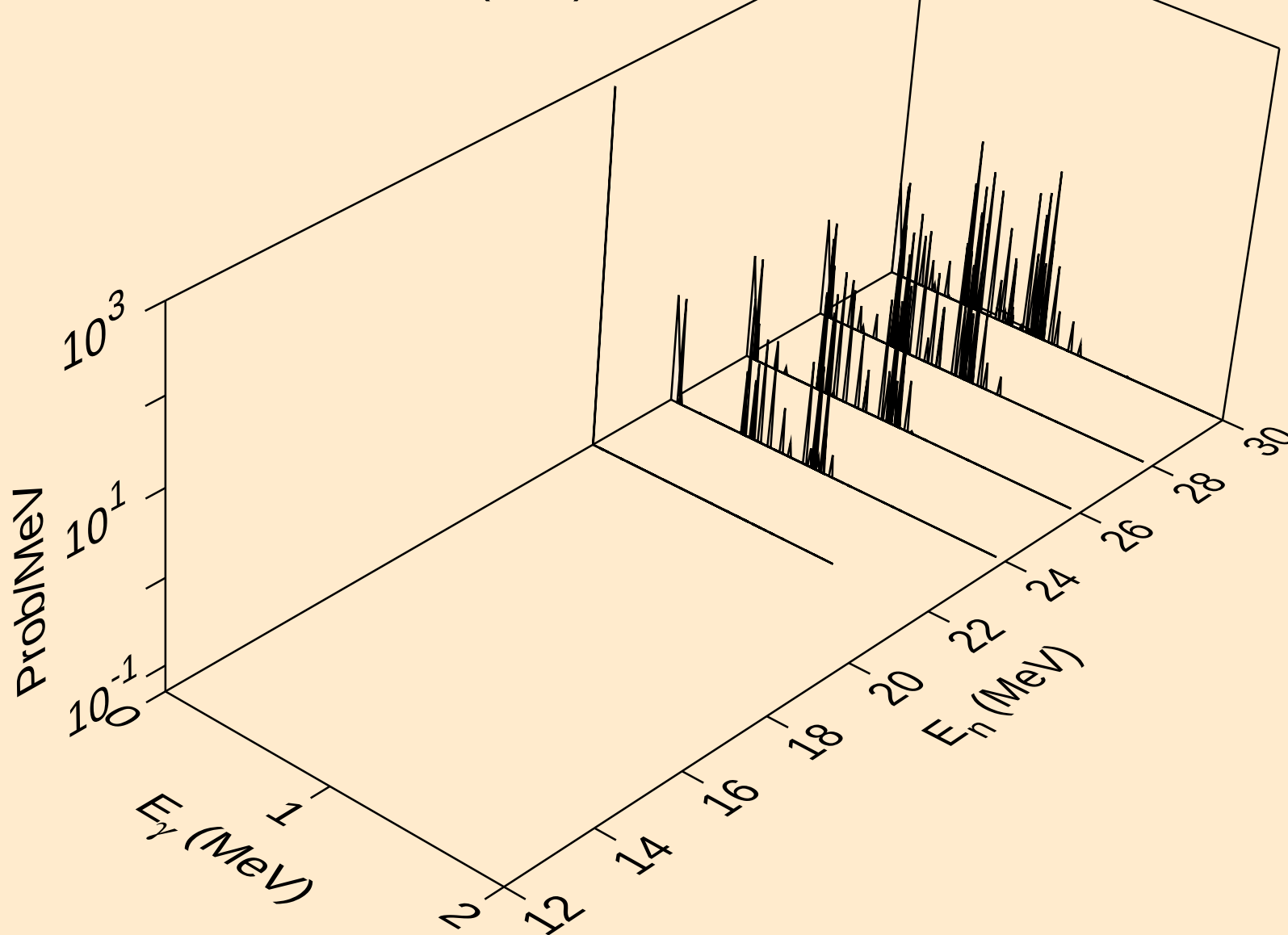


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,n*)p

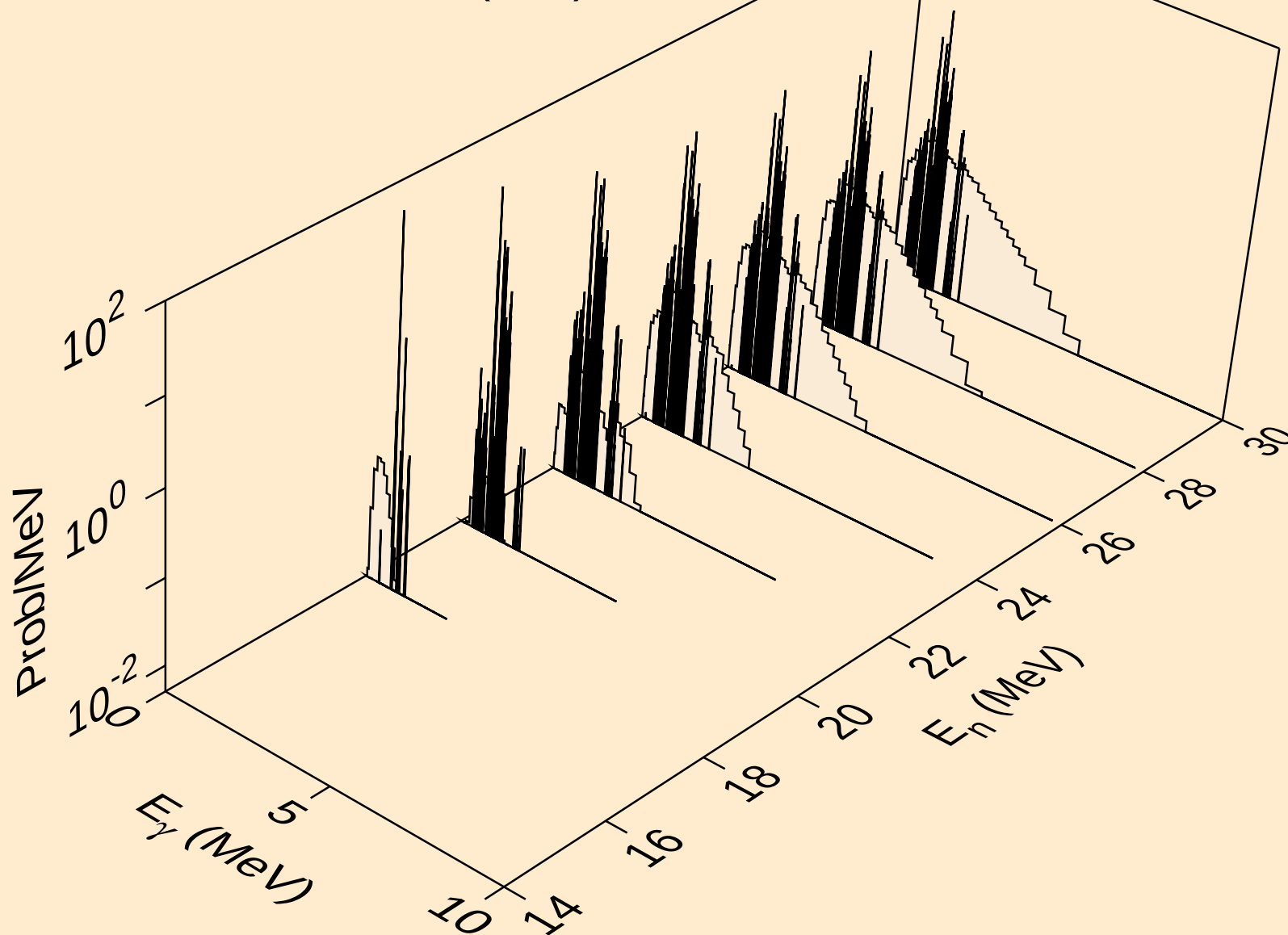


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

Photon emission for (n,n*)2a

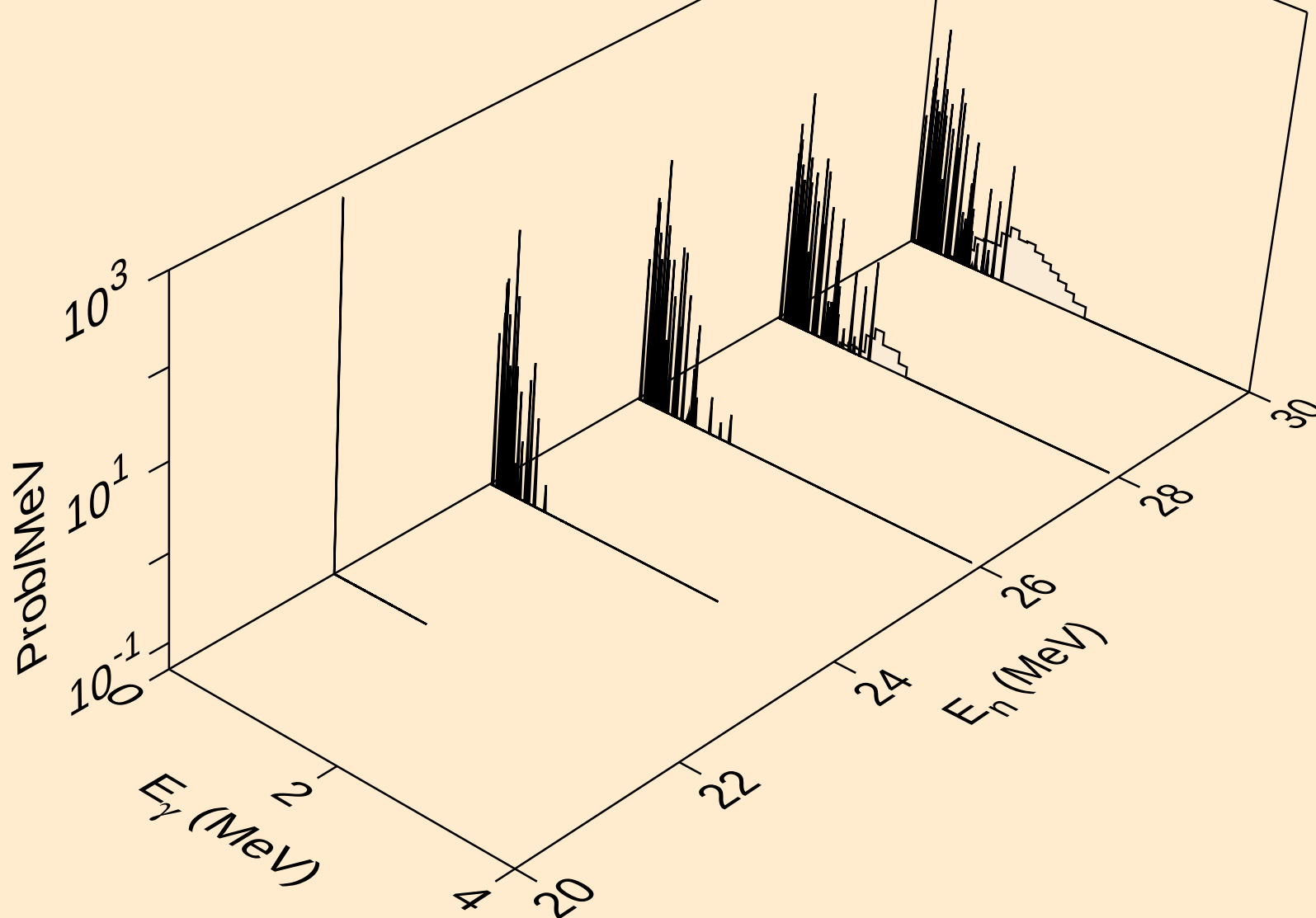


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,n*)d



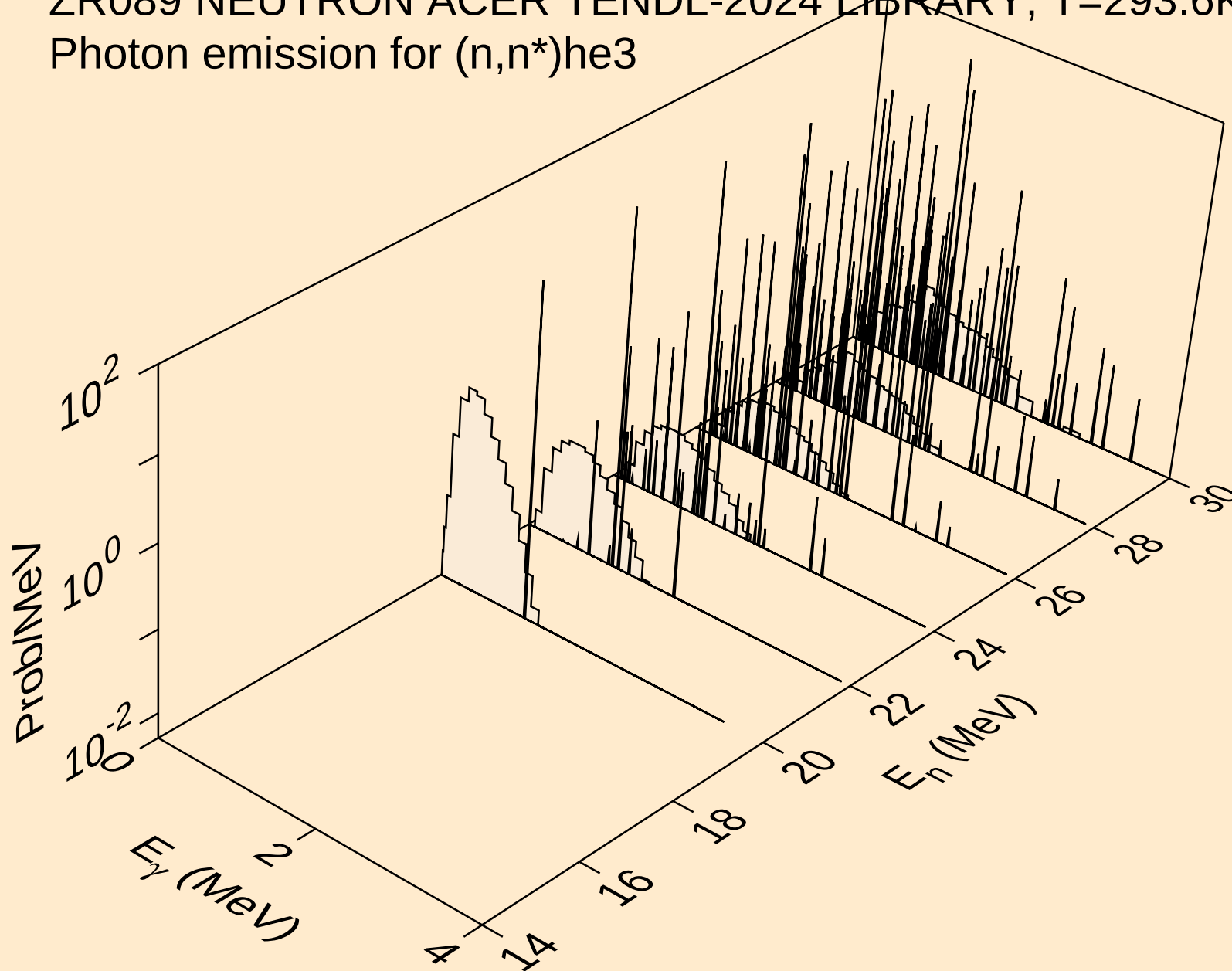
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

Photon emission for (n,n*)t

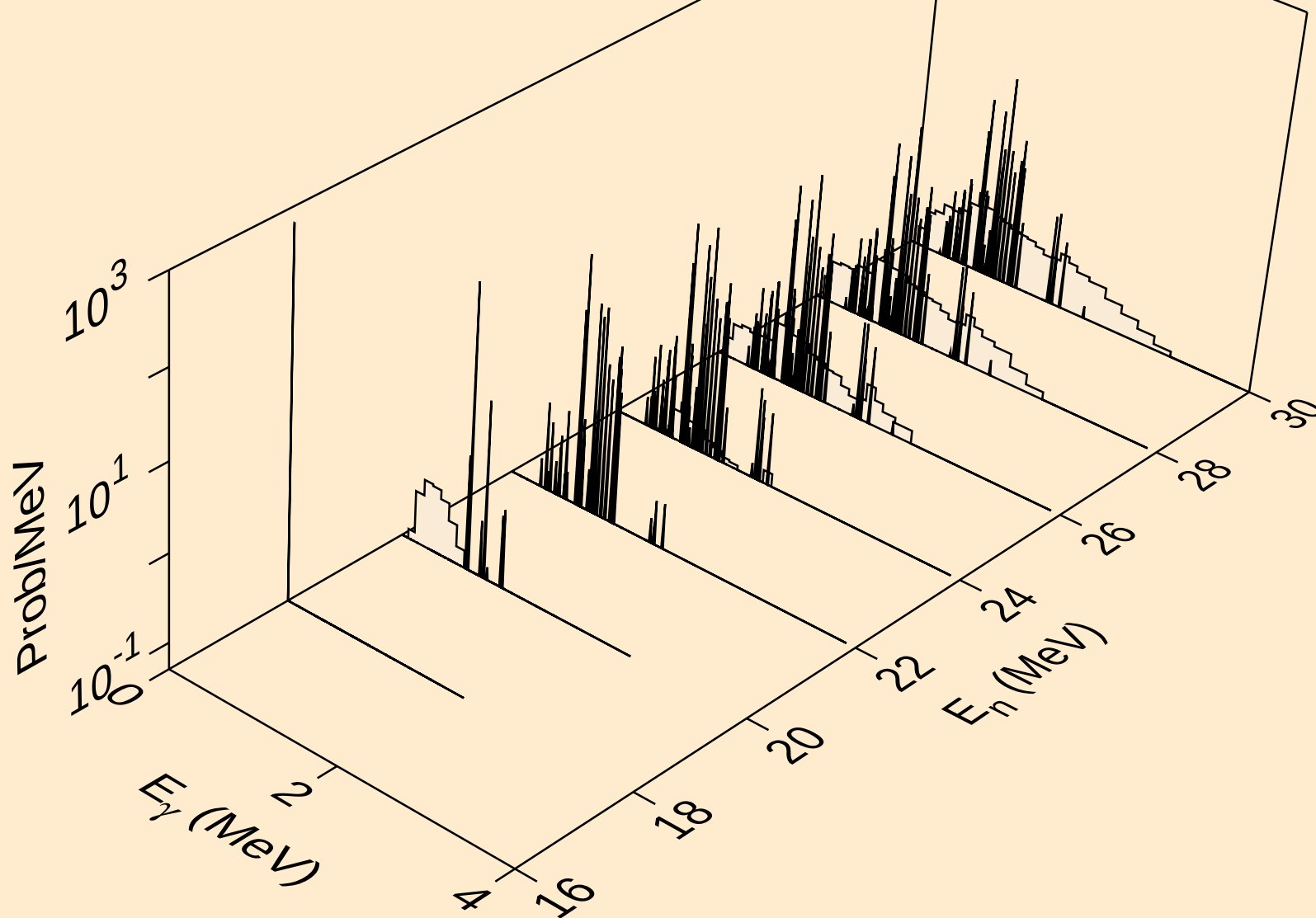


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K

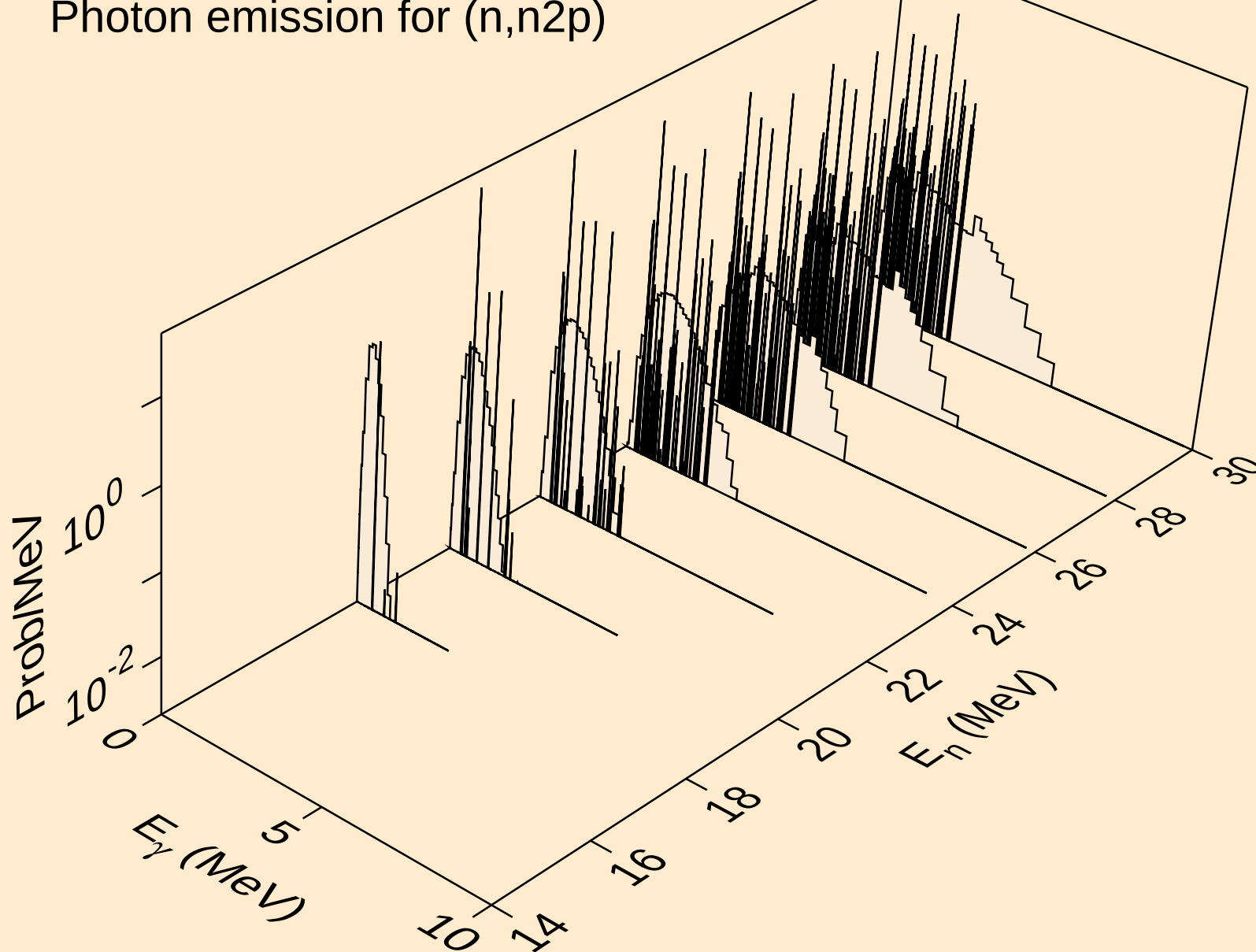
Photon emission for (n,n*)he3



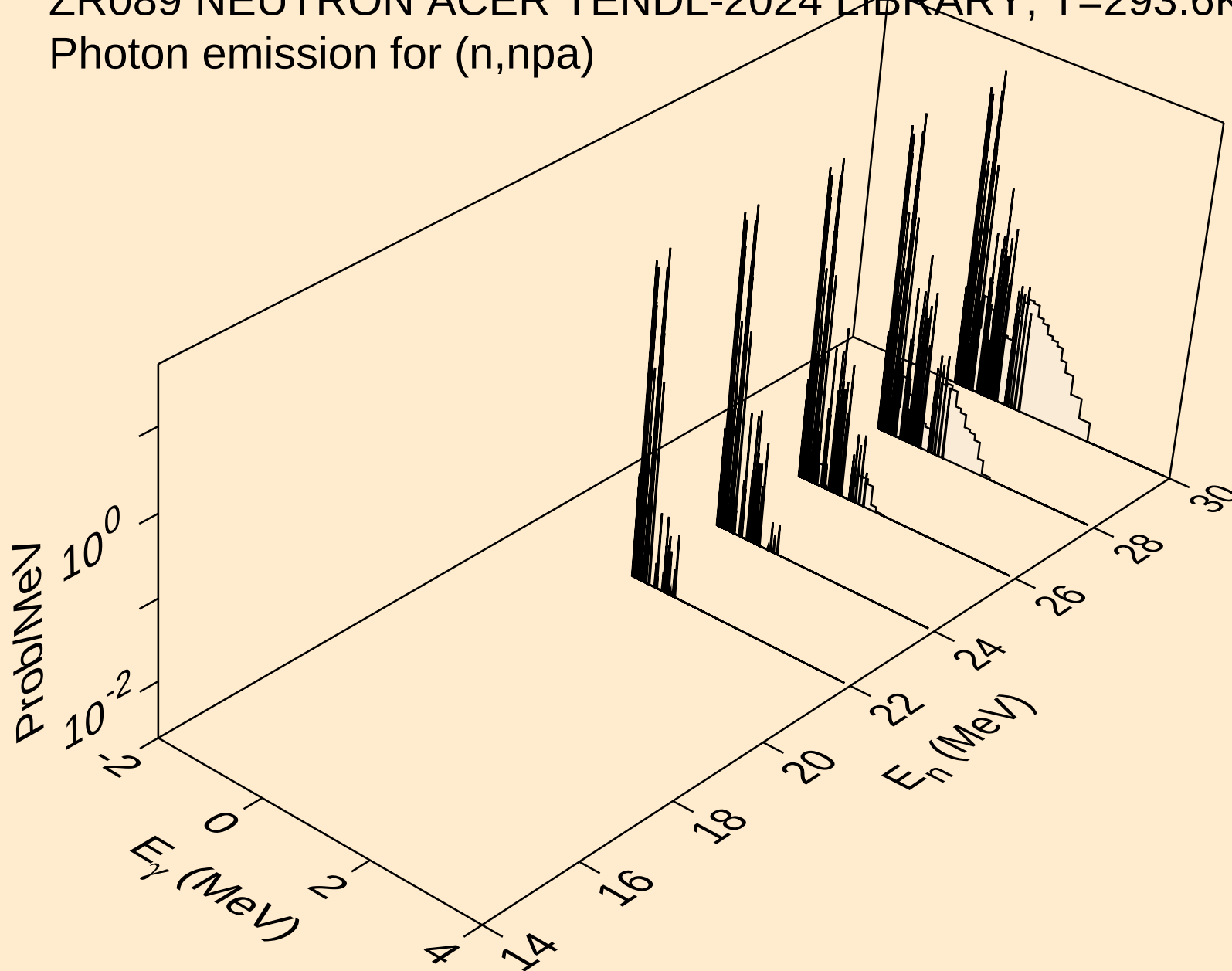
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,2np)



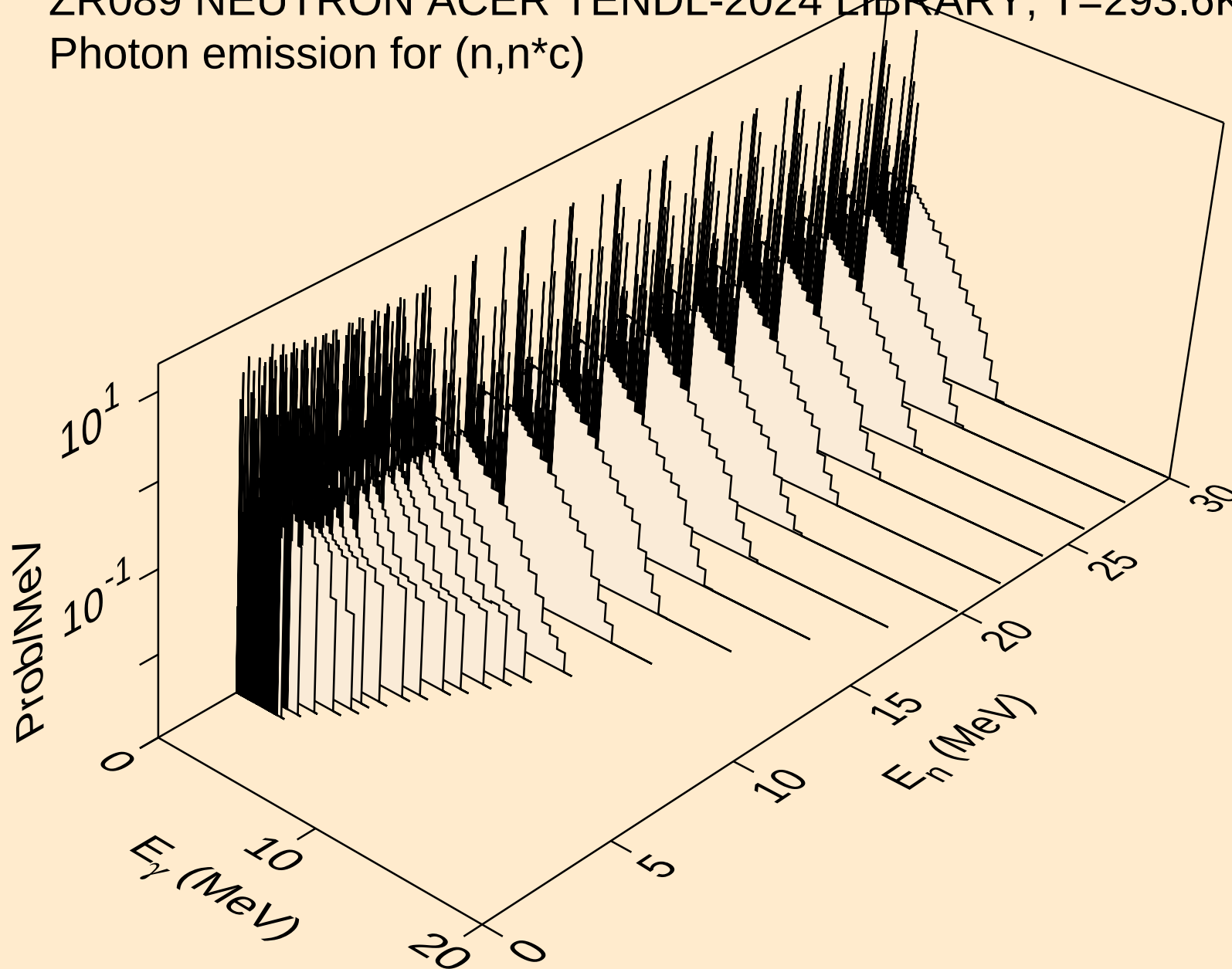
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,n2p)



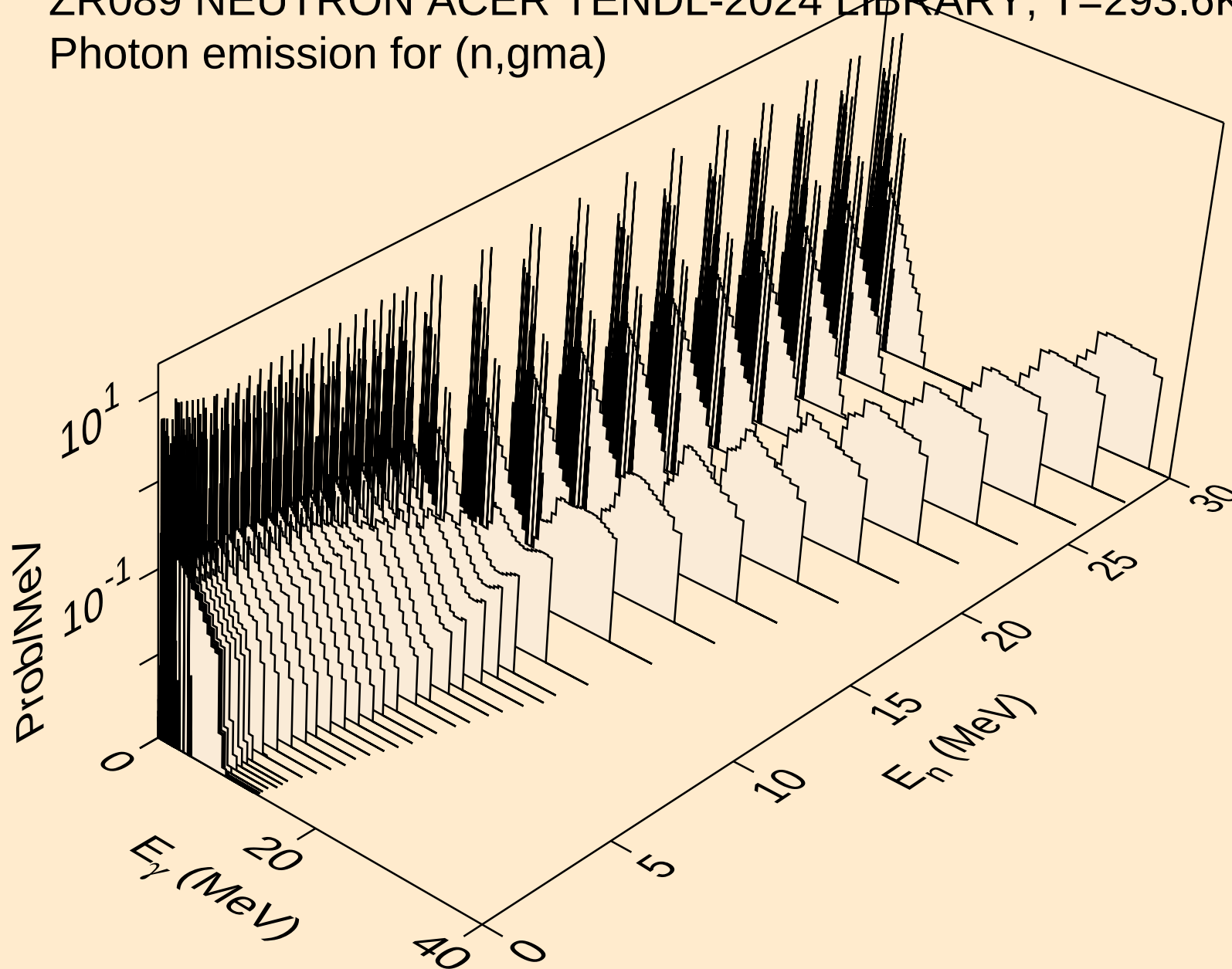
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,npa)



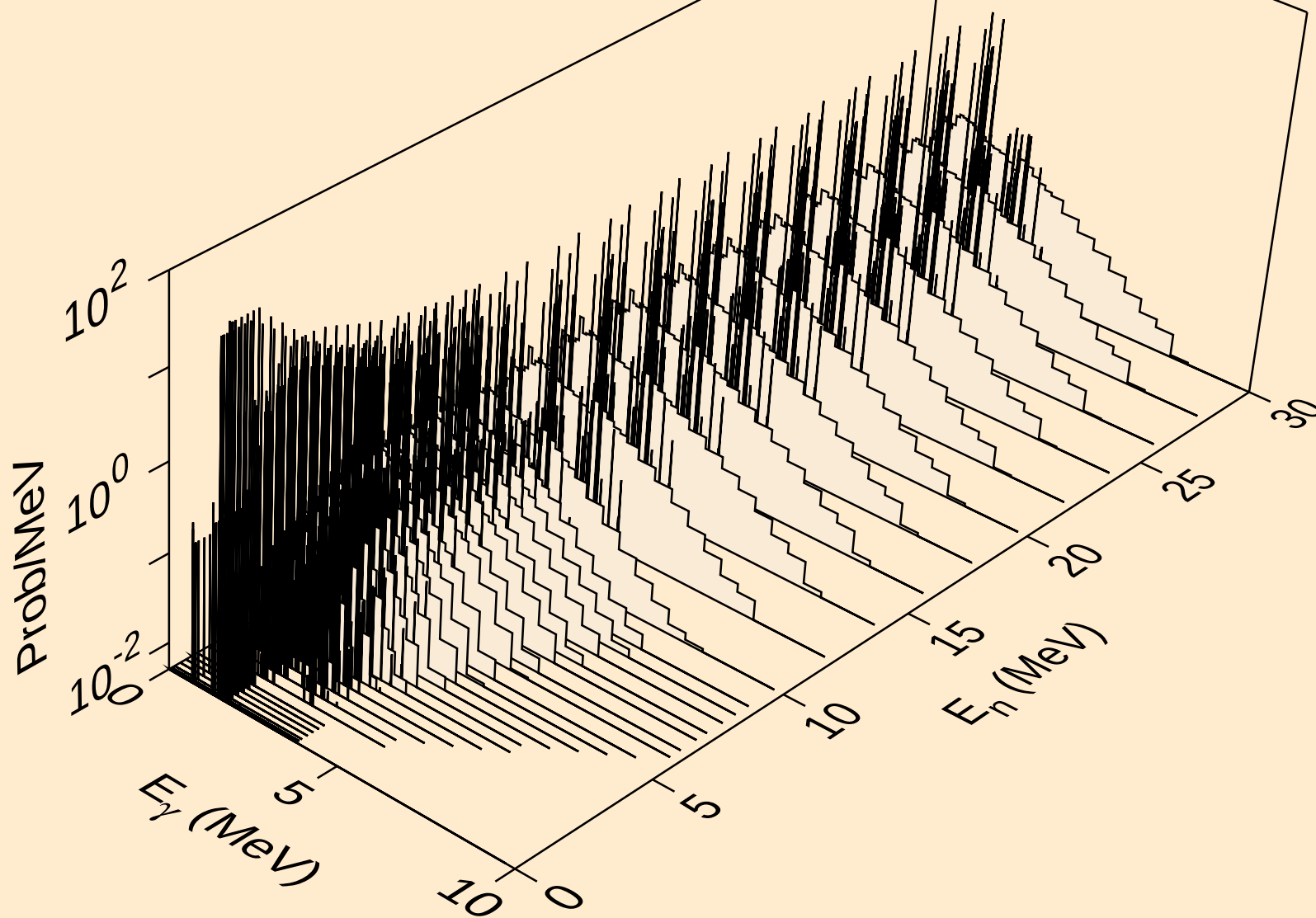
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,n*c)



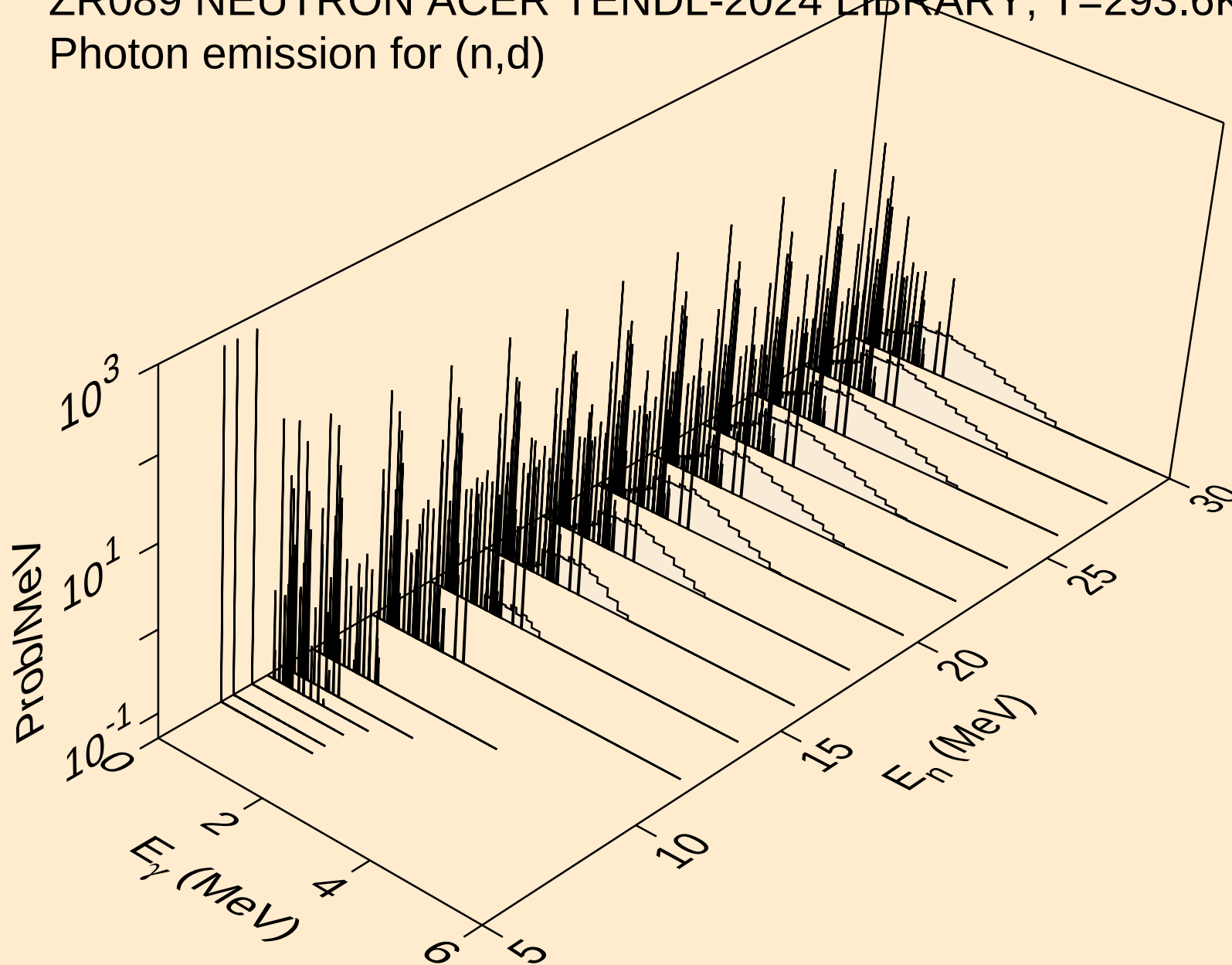
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Photon emission for (n,gma)



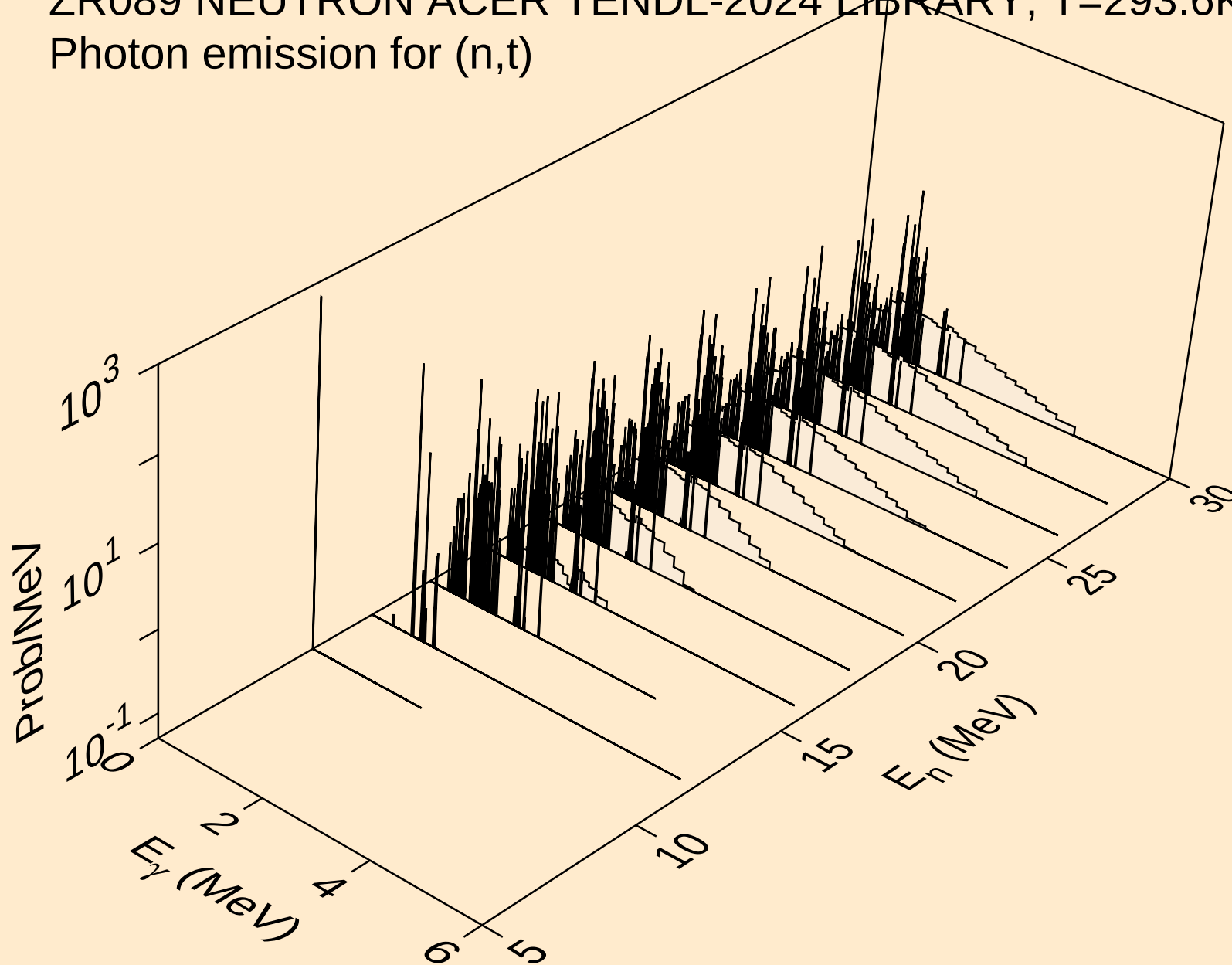
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,p)



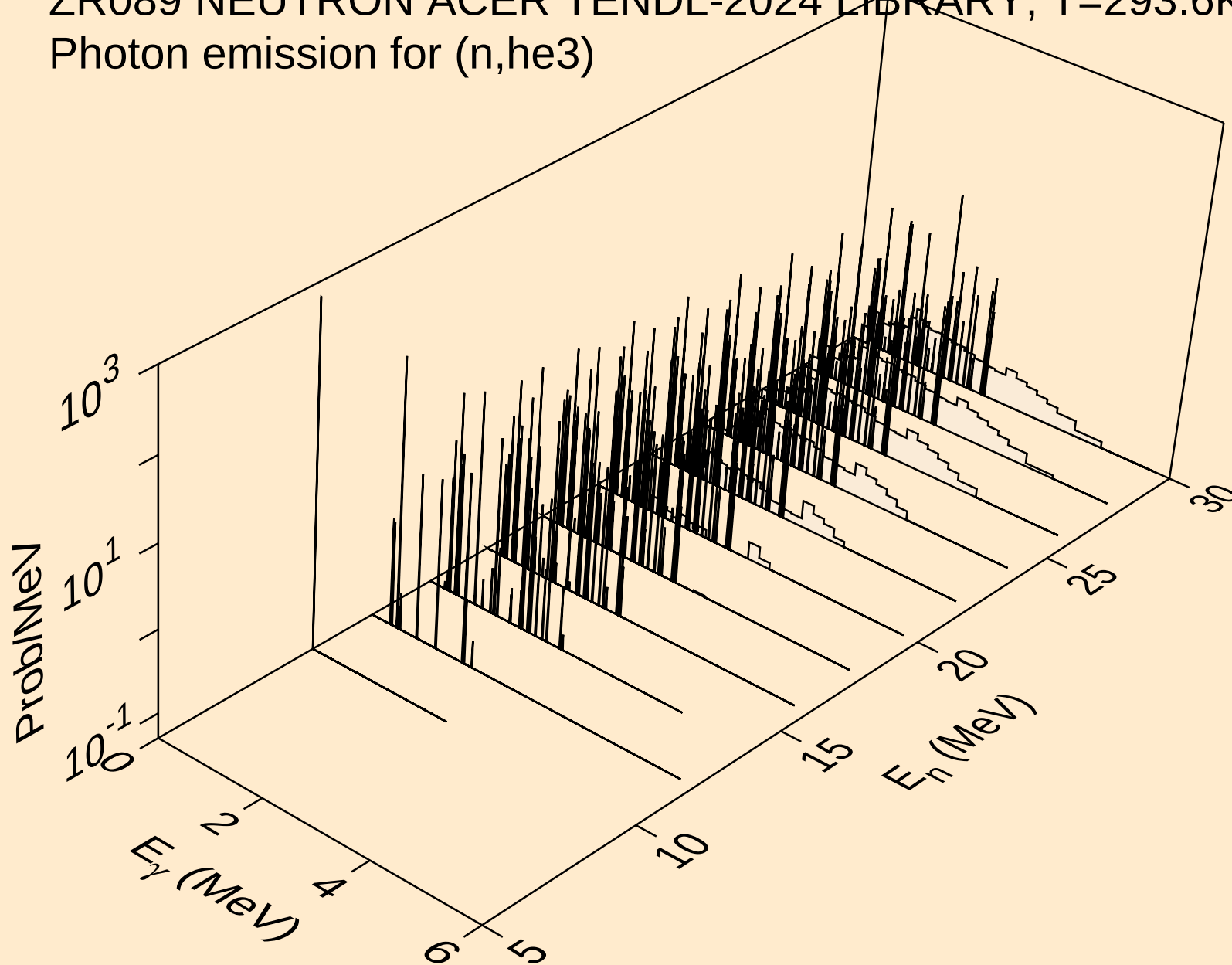
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,d)



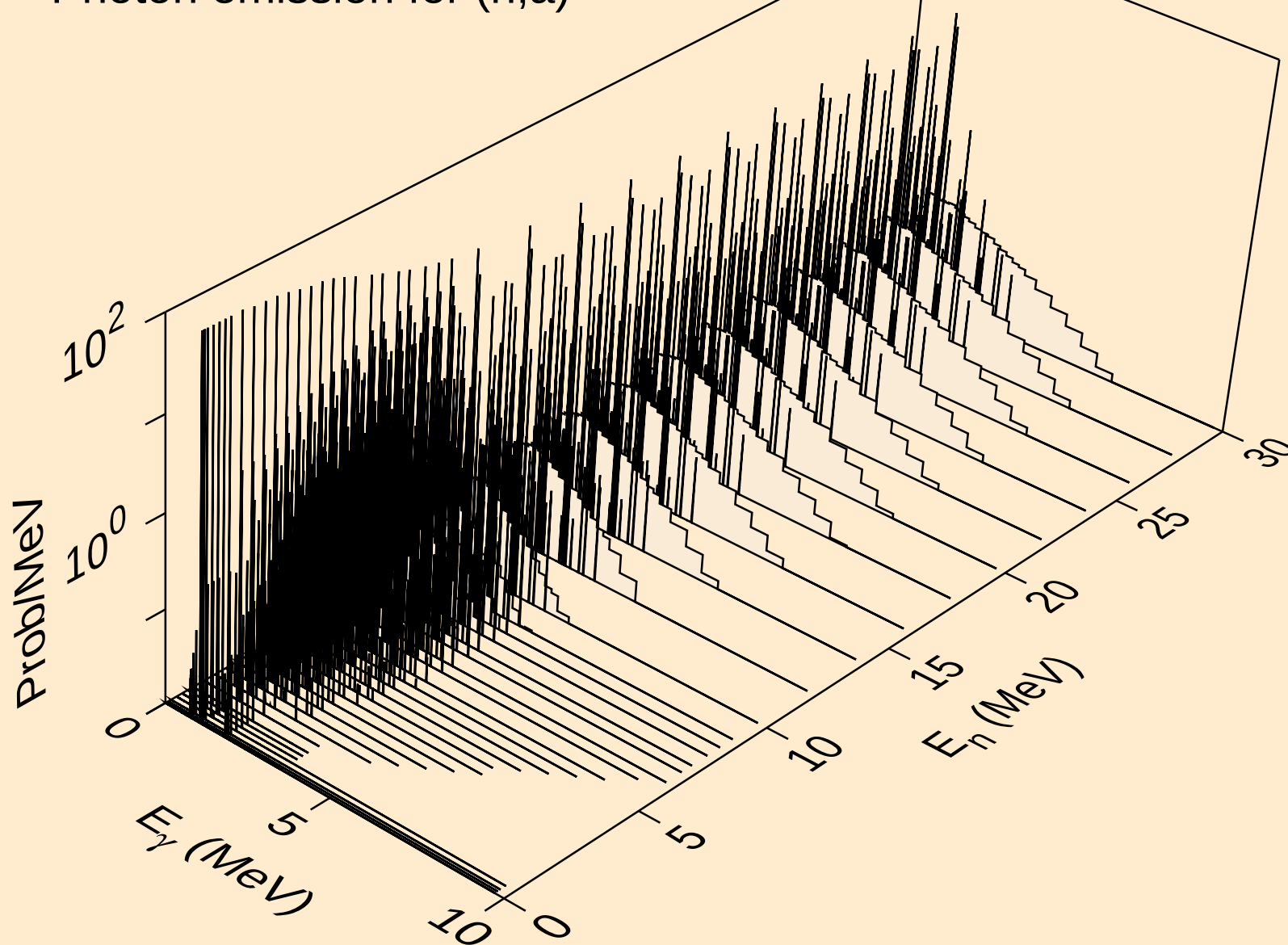
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,t)



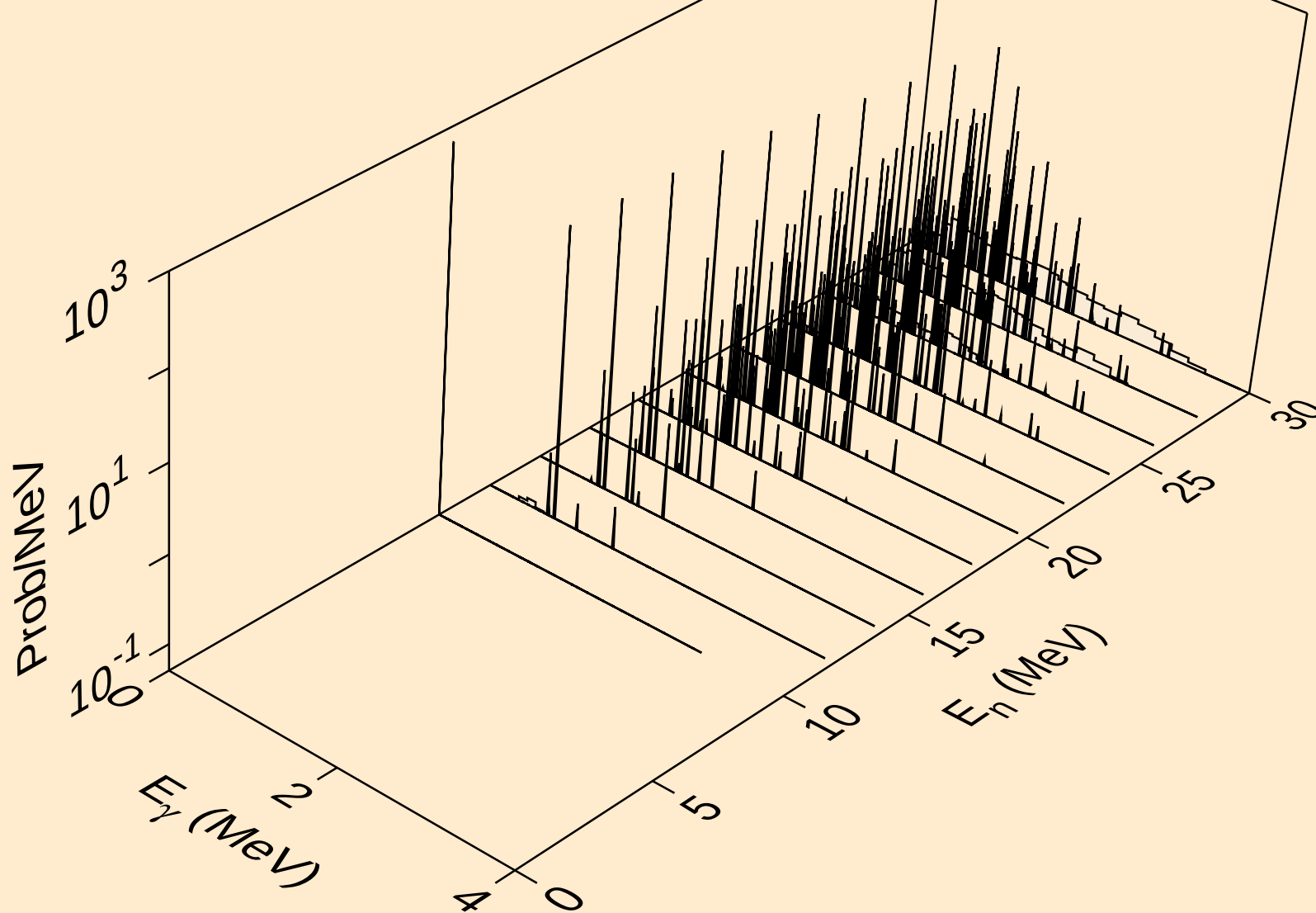
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,he3)



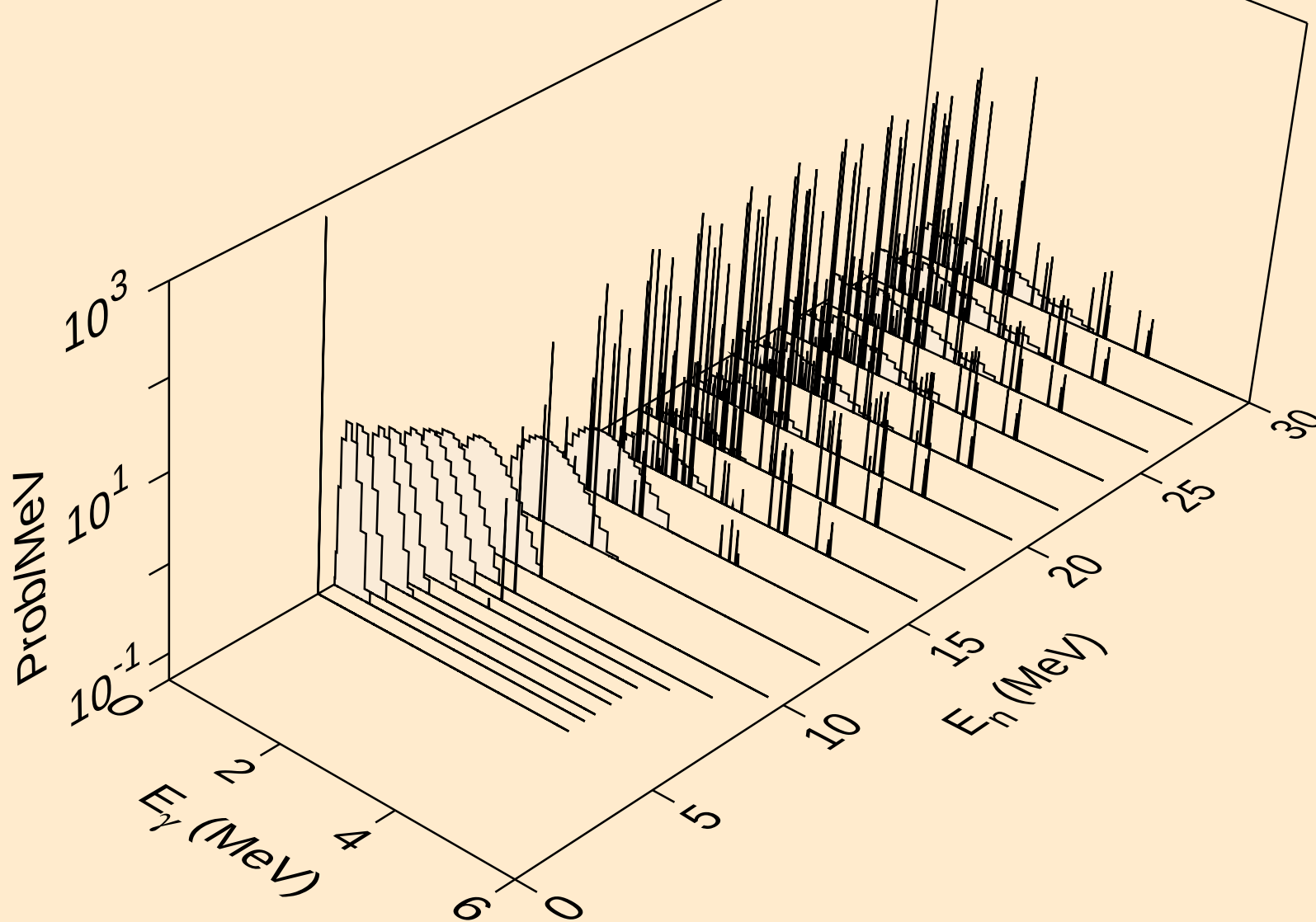
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,a)



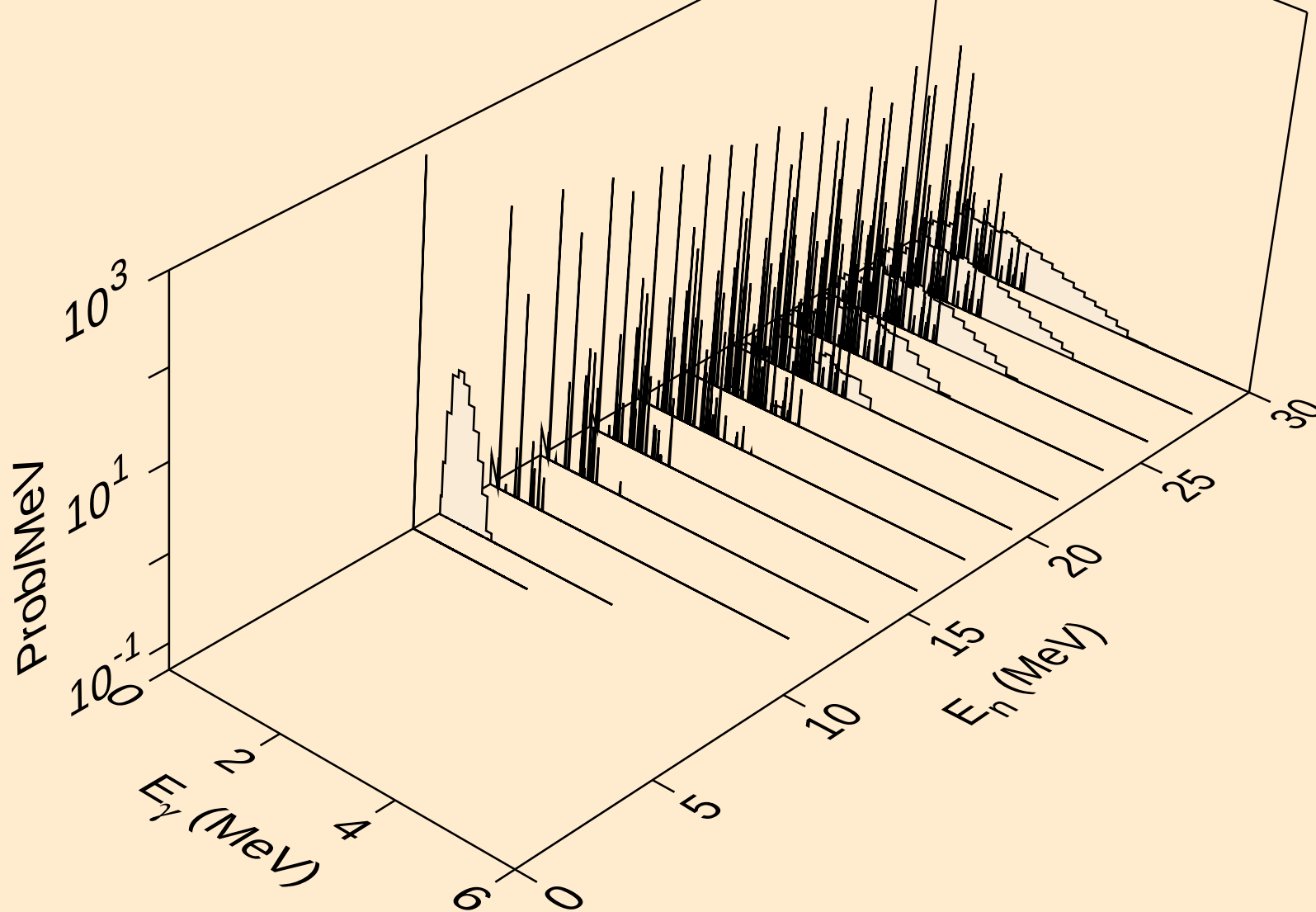
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,2a)



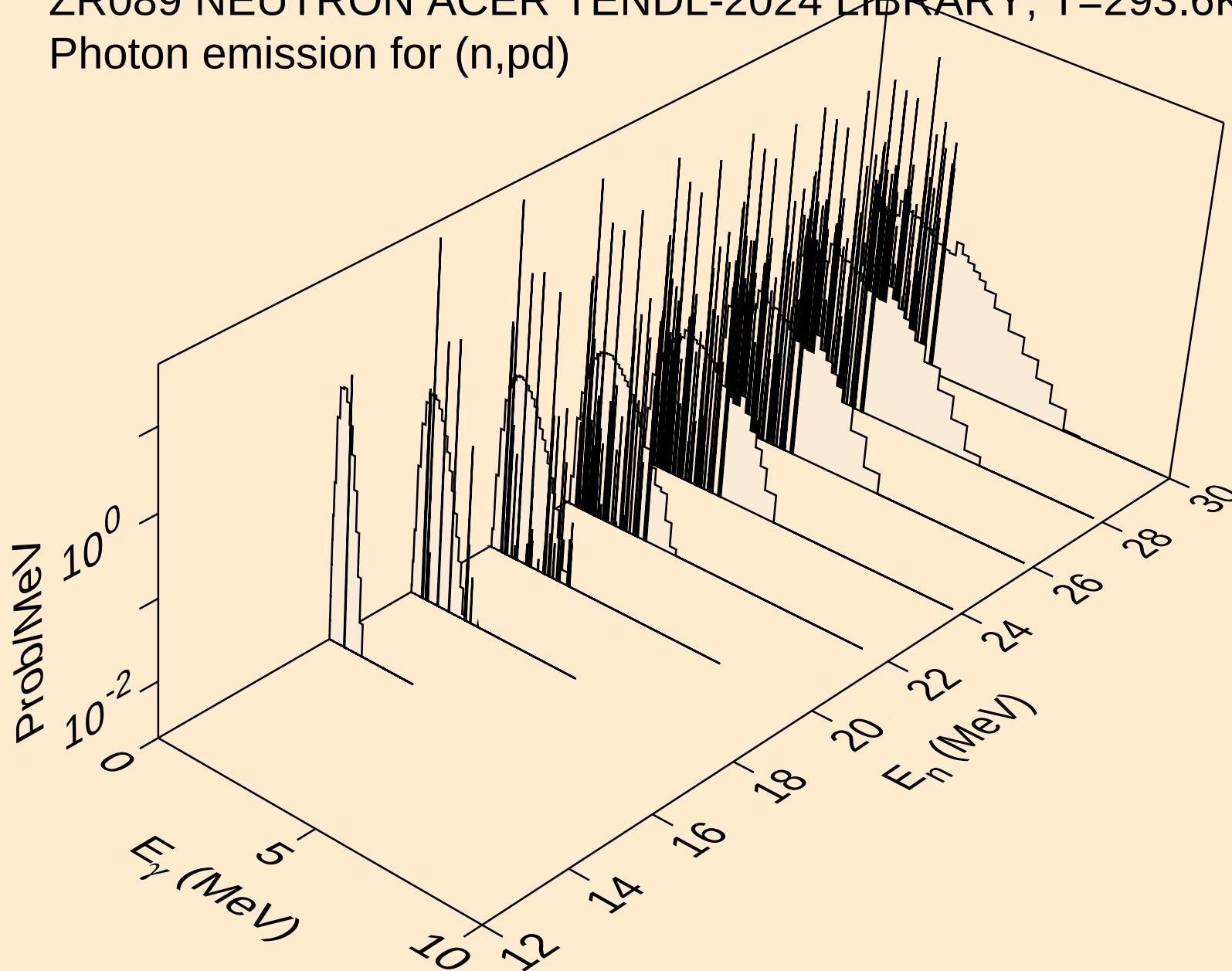
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,2p)



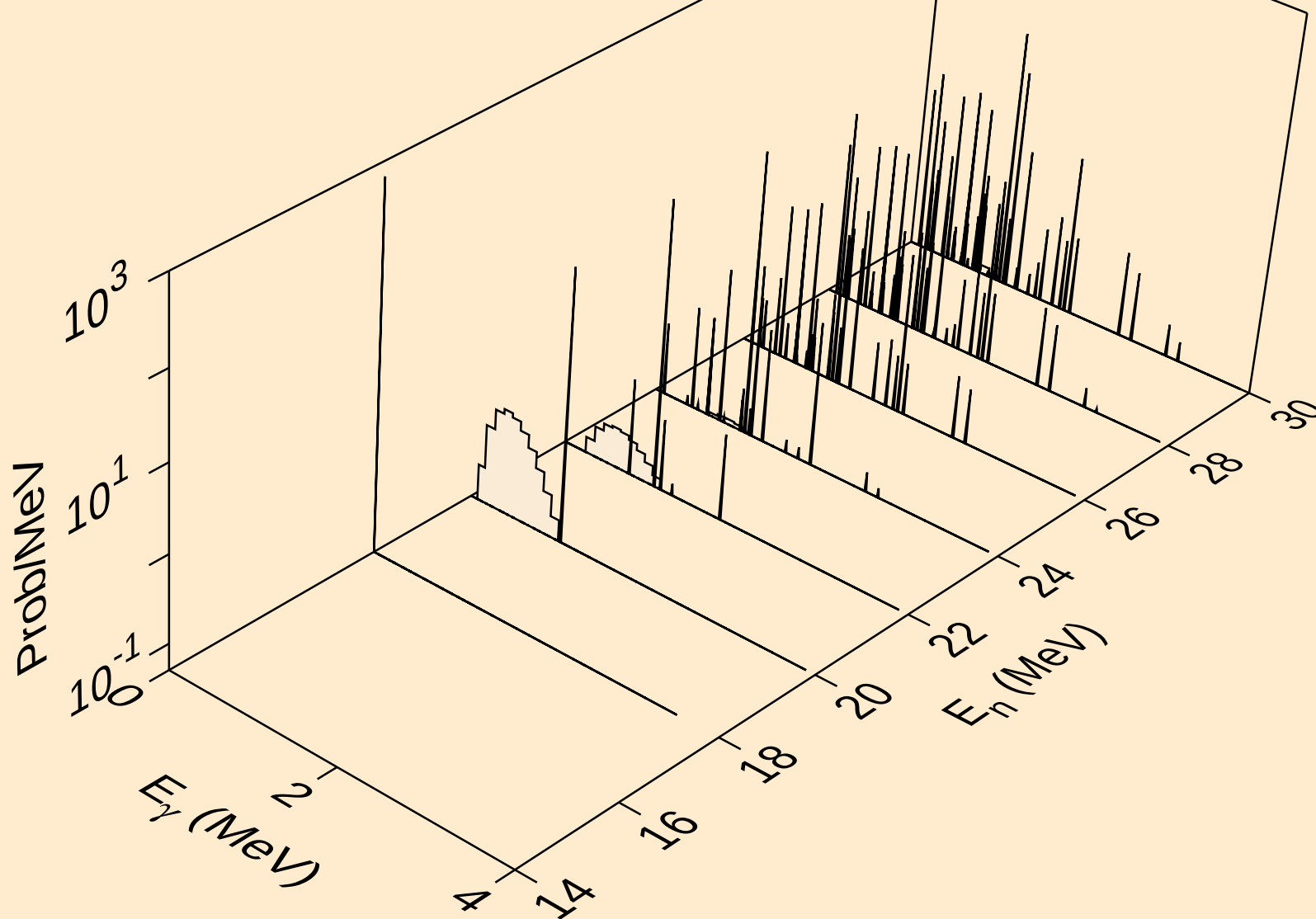
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,p α)



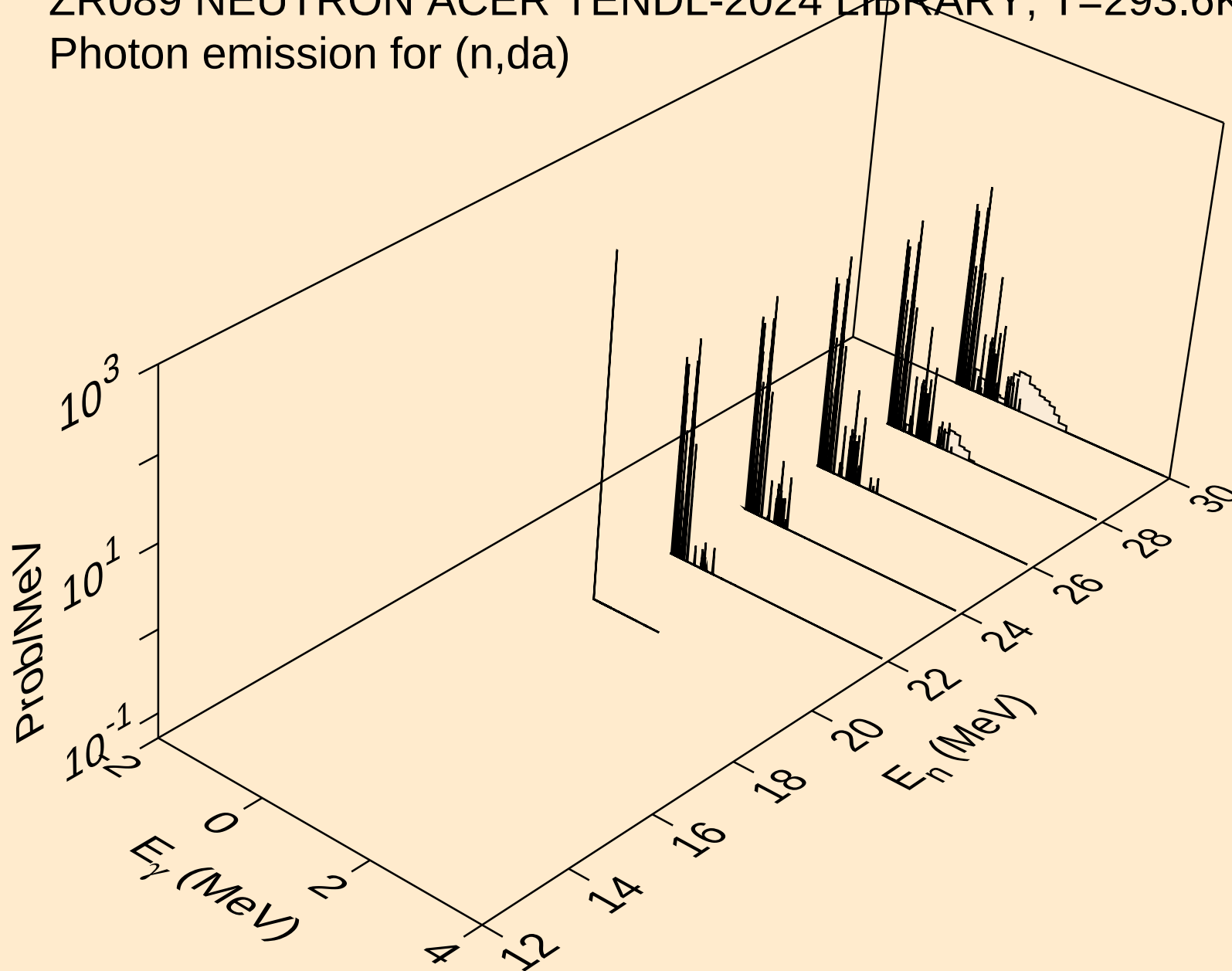
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,pd)



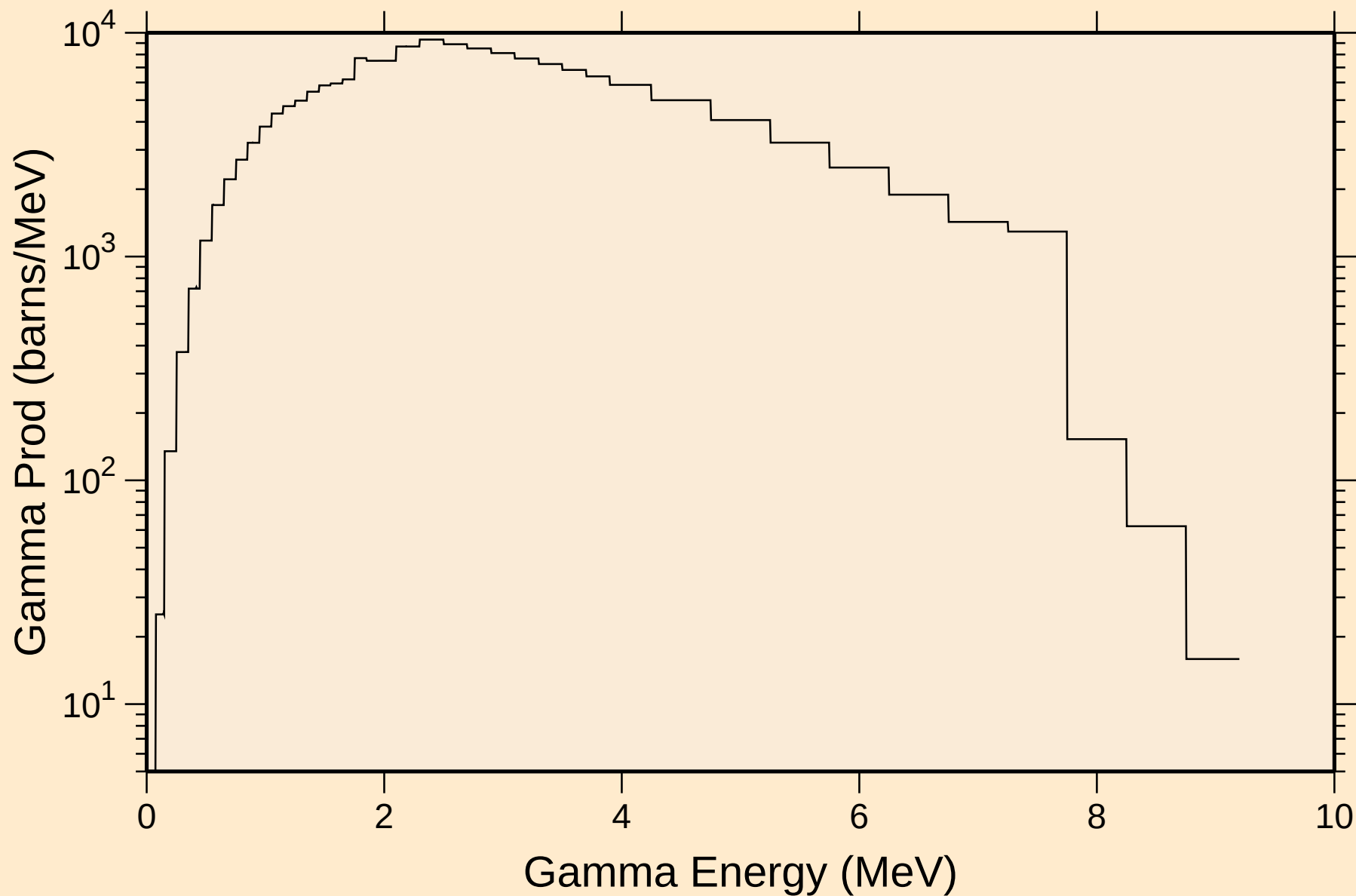
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,pt)



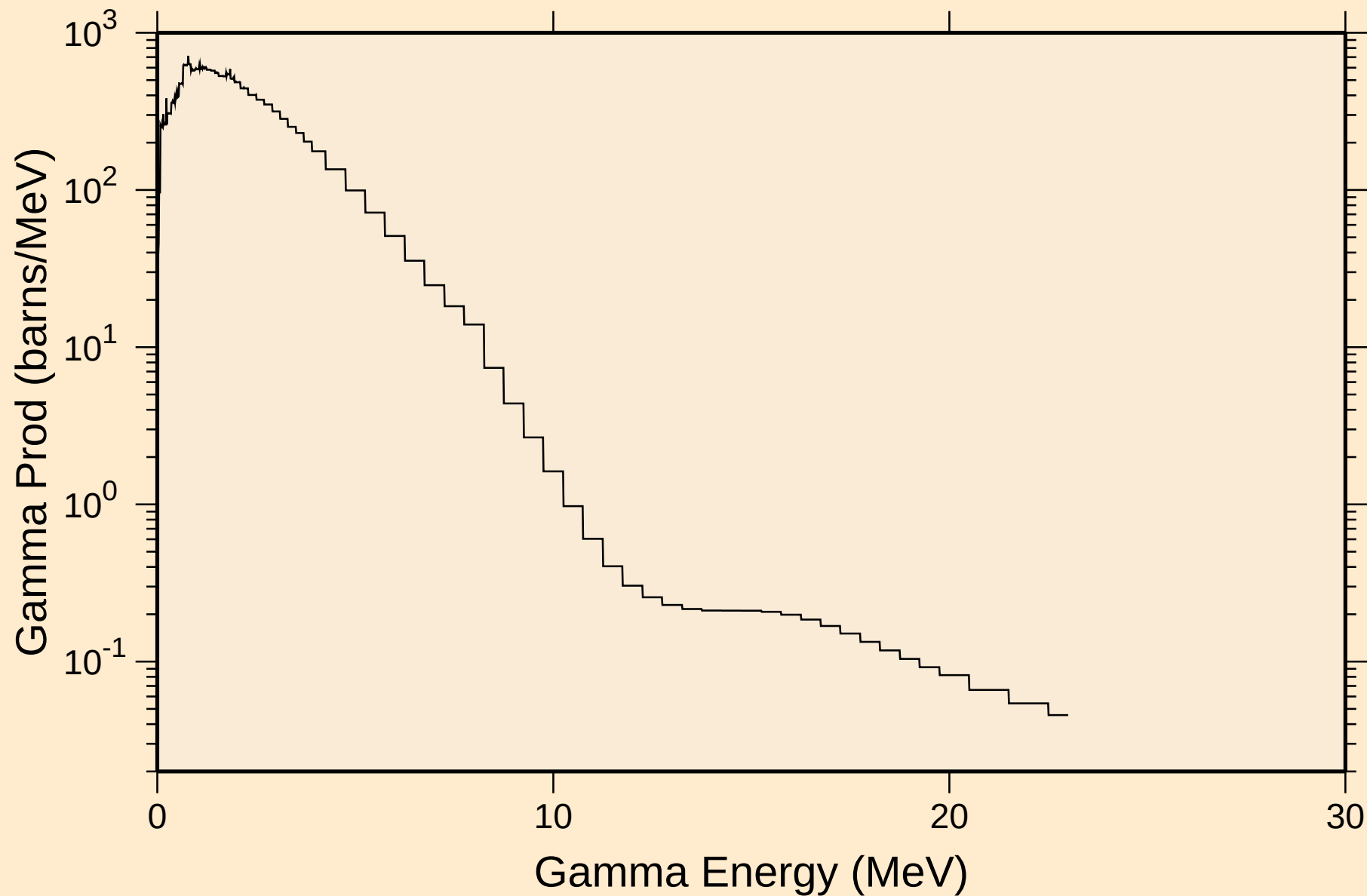
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Photon emission for (n,da)



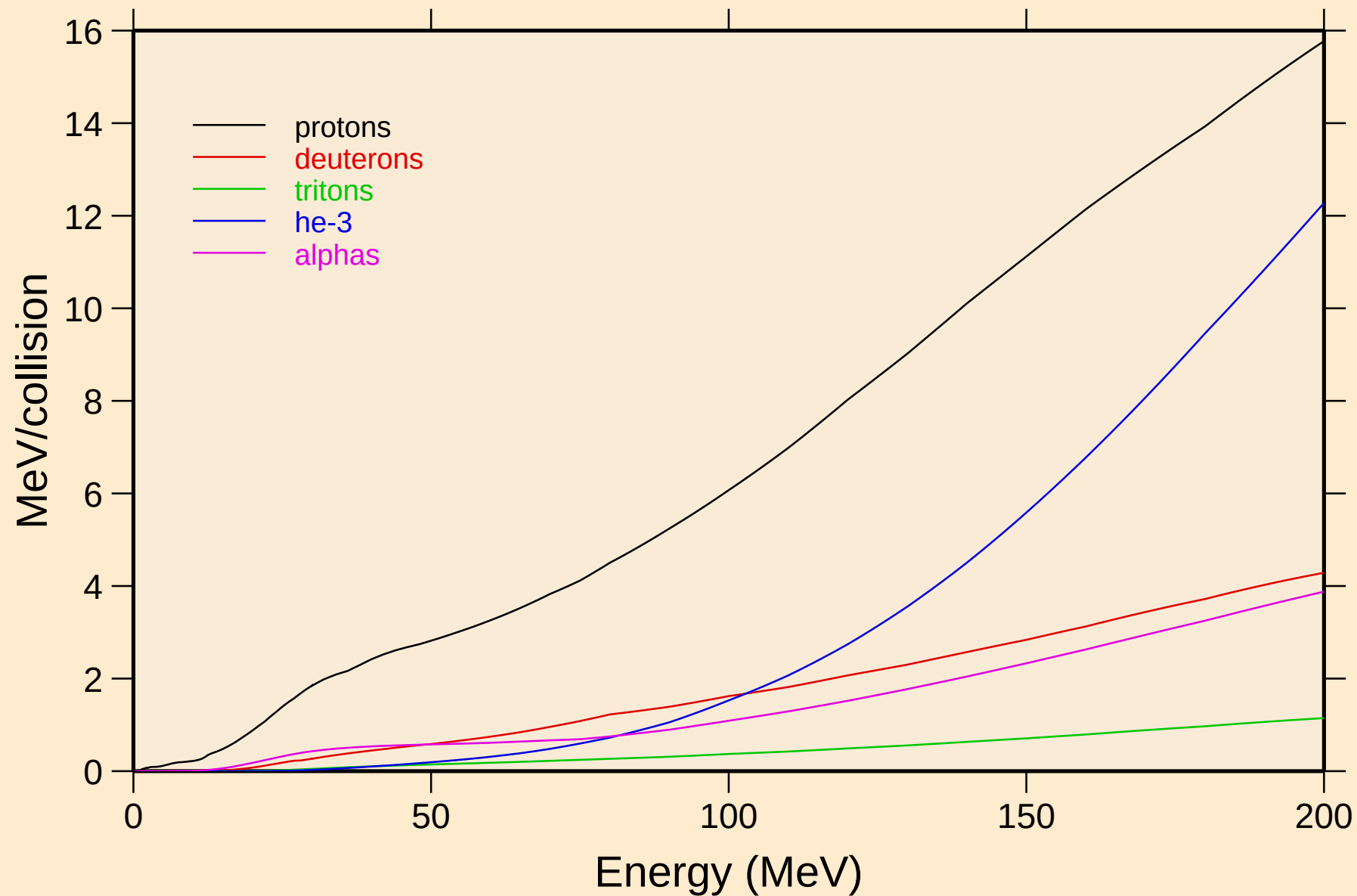
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
thermal capture photon spectrum



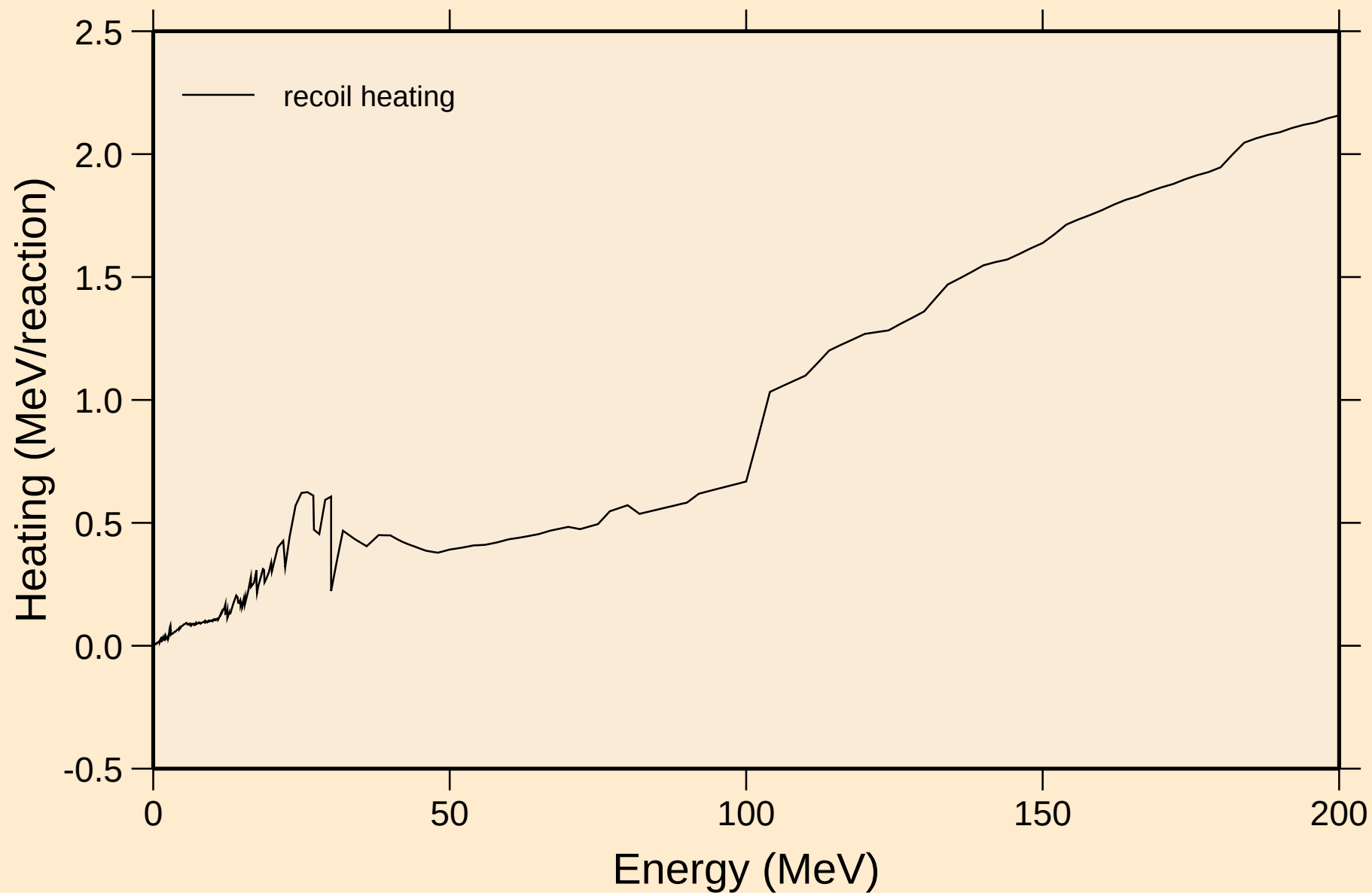
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
14 MeV photon spectrum



ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Particle heating contributions

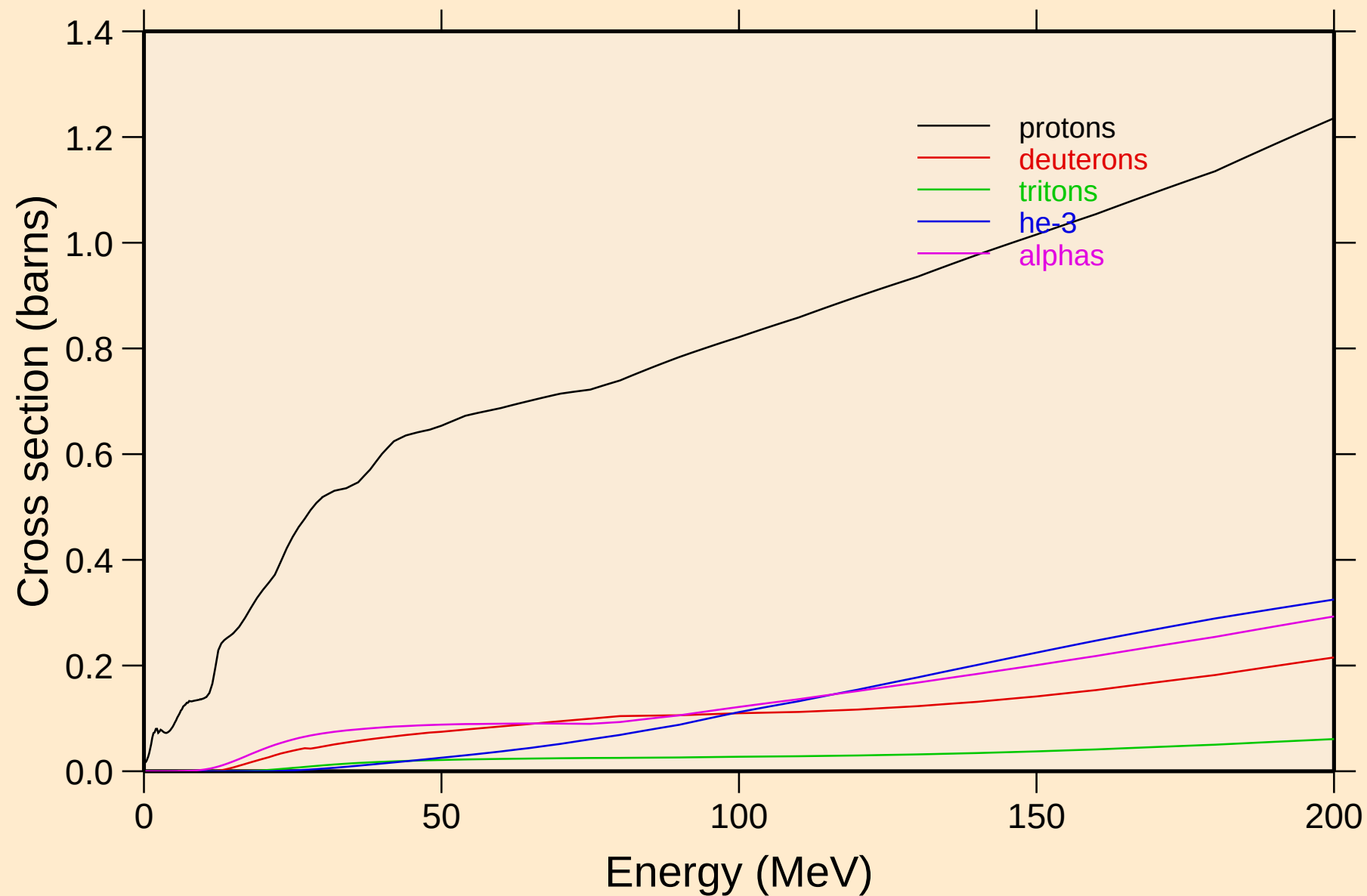


ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
Recoil Heating

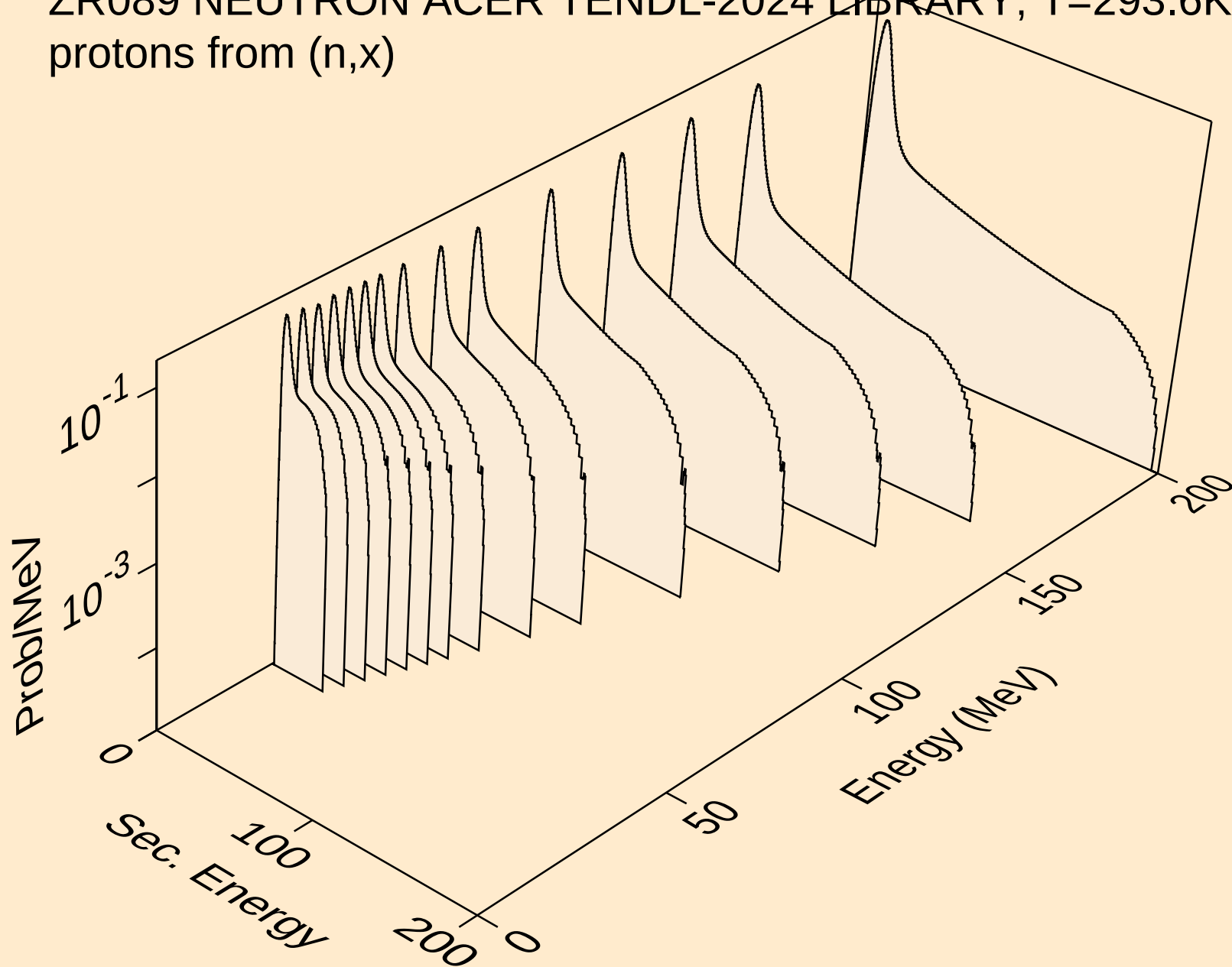


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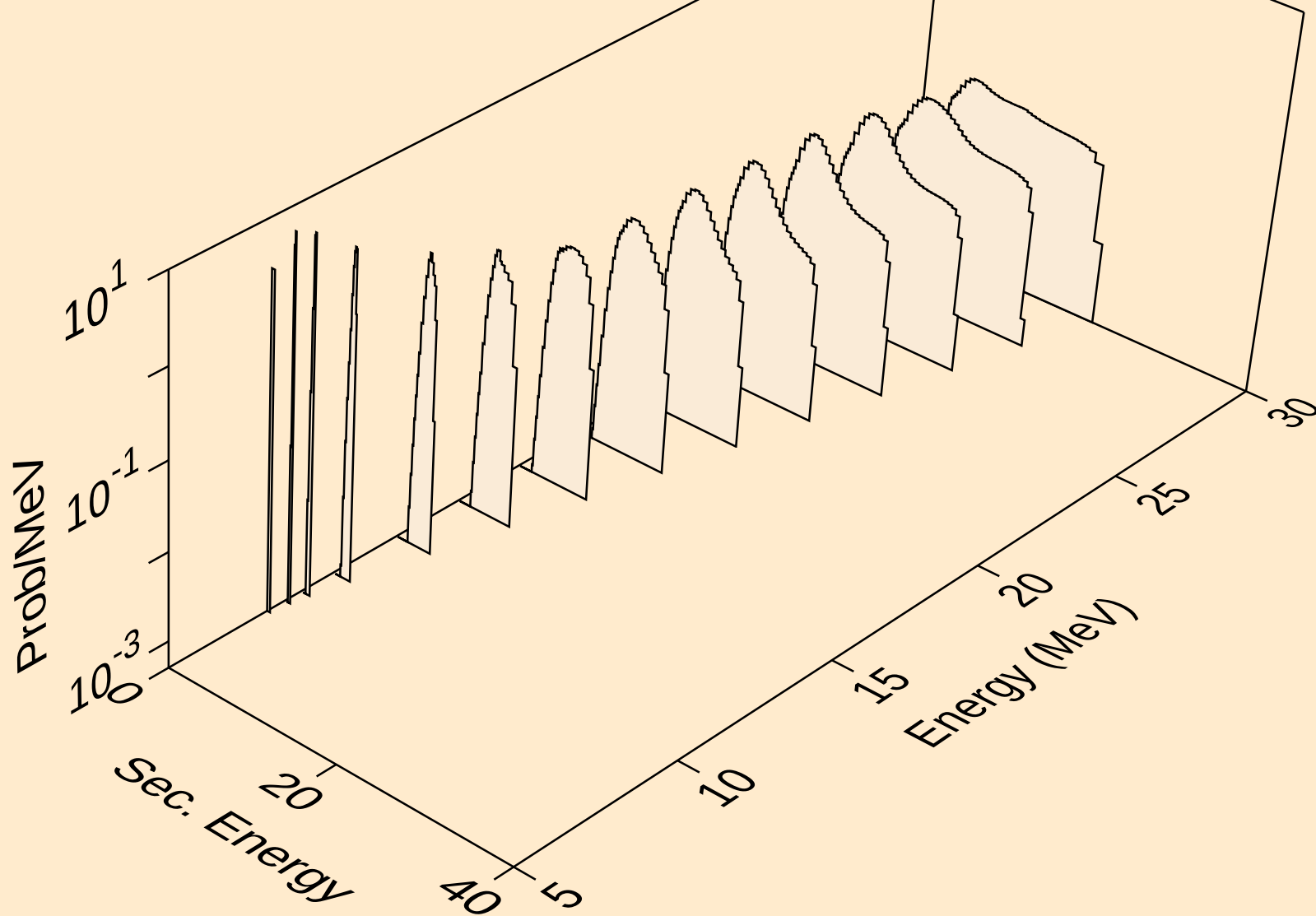
Particle production cross sections



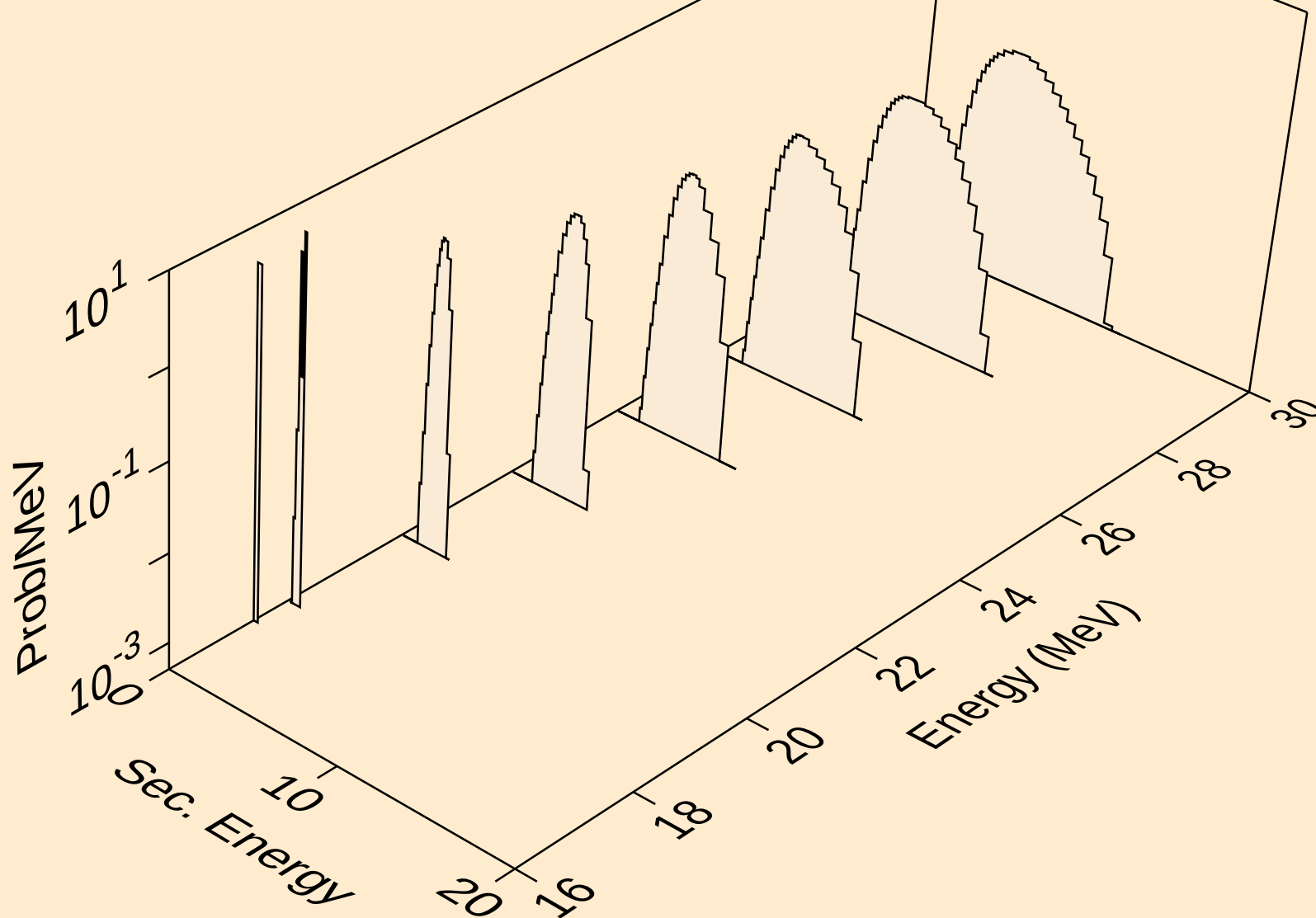
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
protons from (n,x)



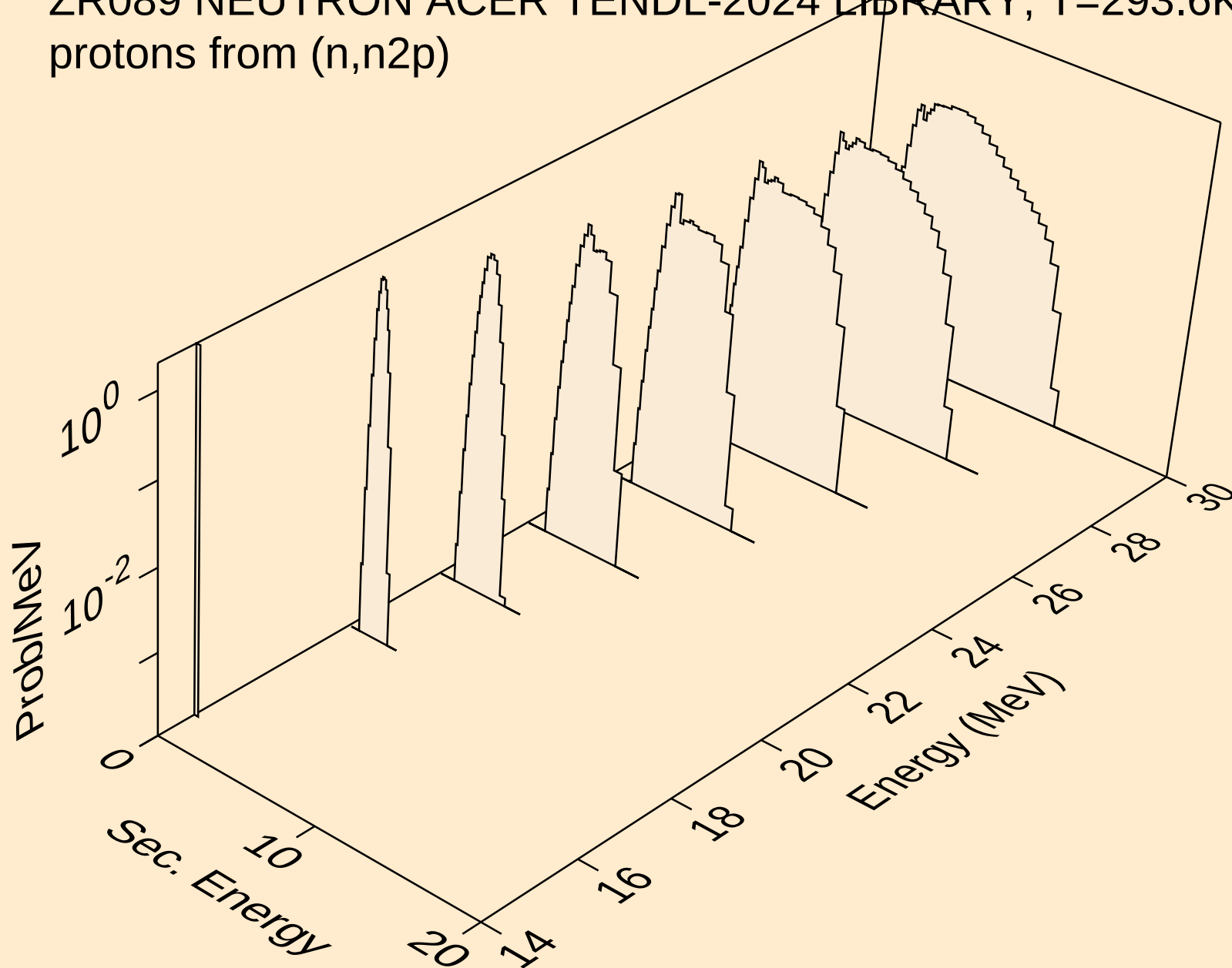
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
protons from (n,n*)p



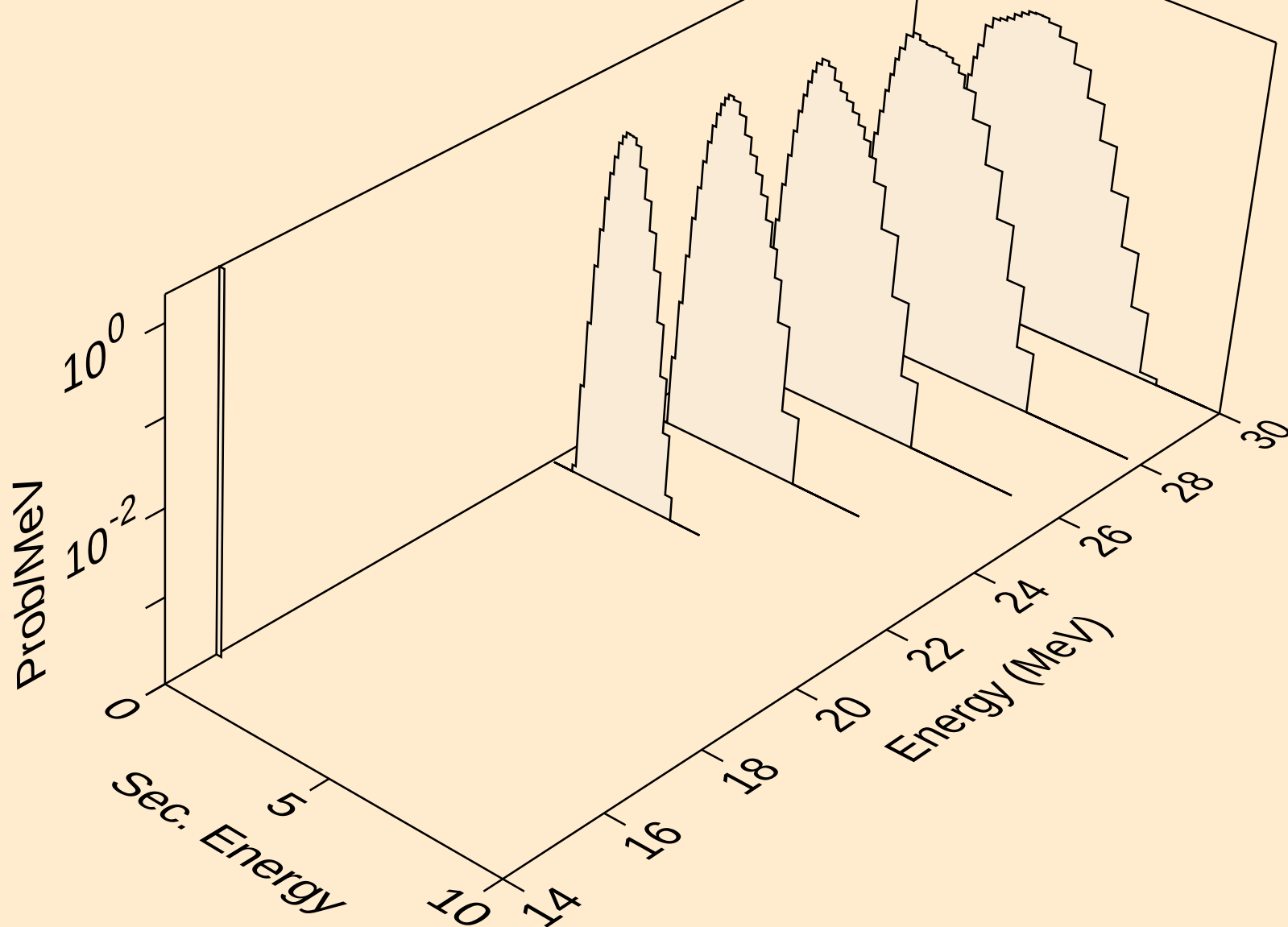
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protons from (n,2np)



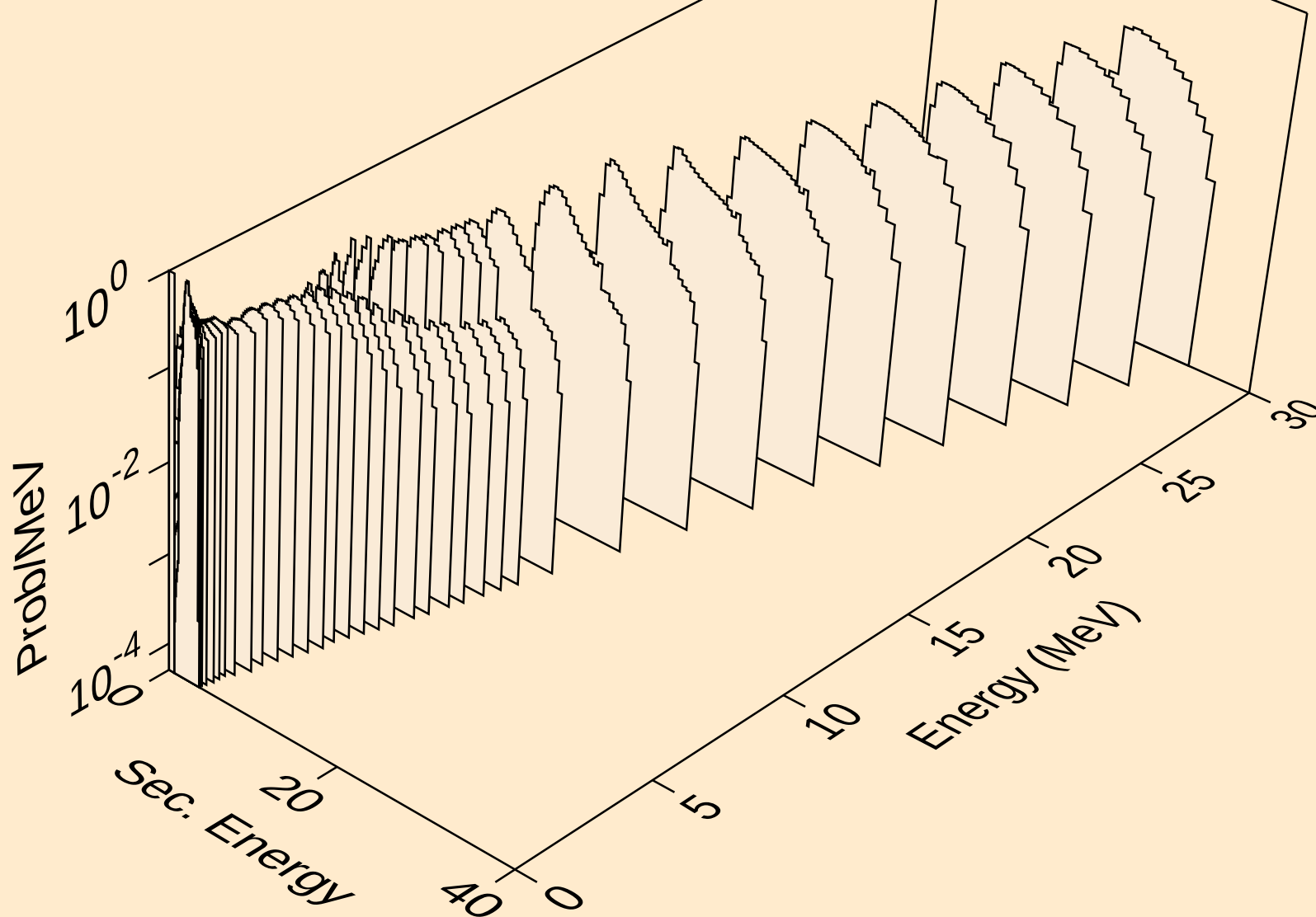
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protons from (n,n2p)



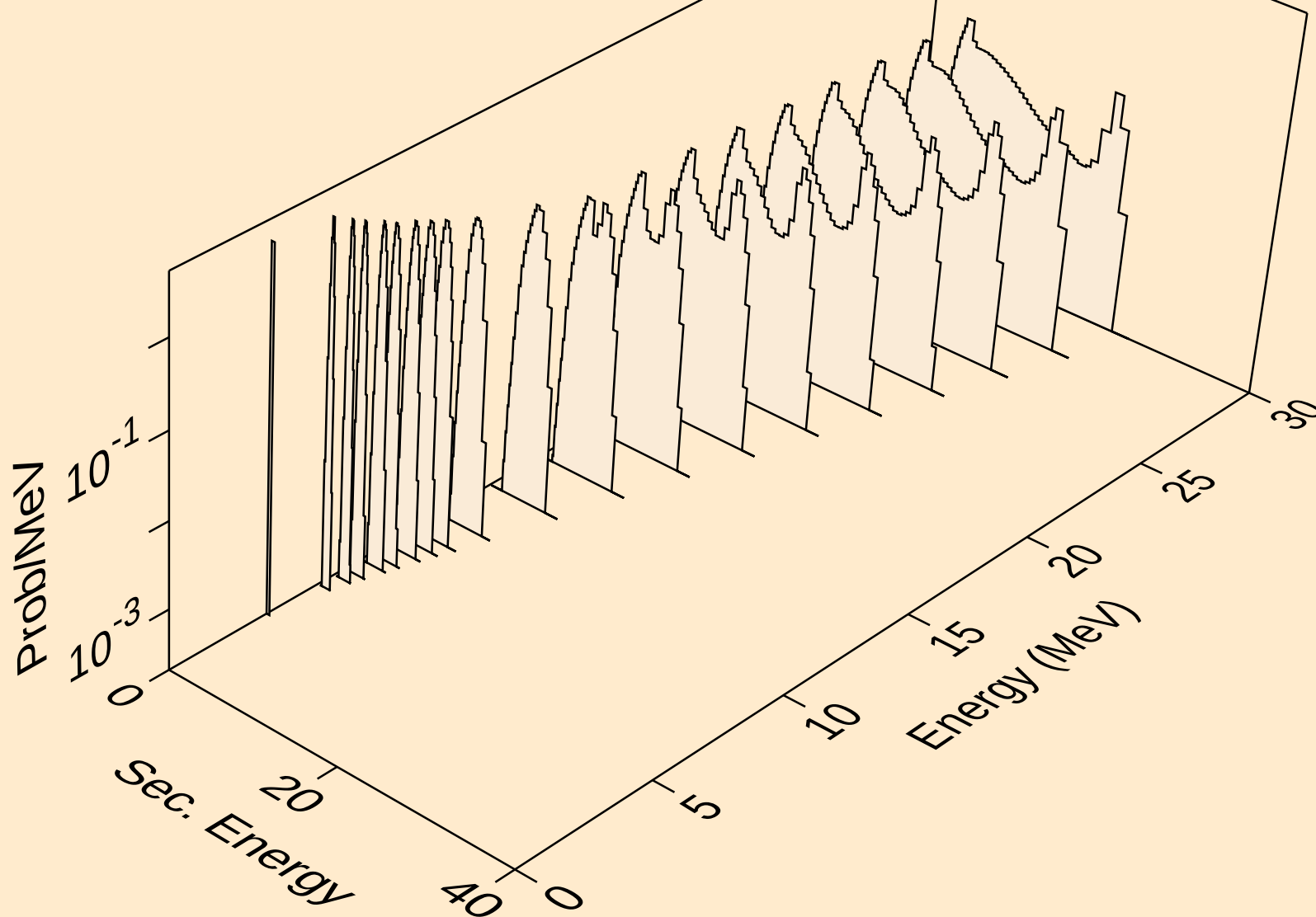
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protons from (n,npa)



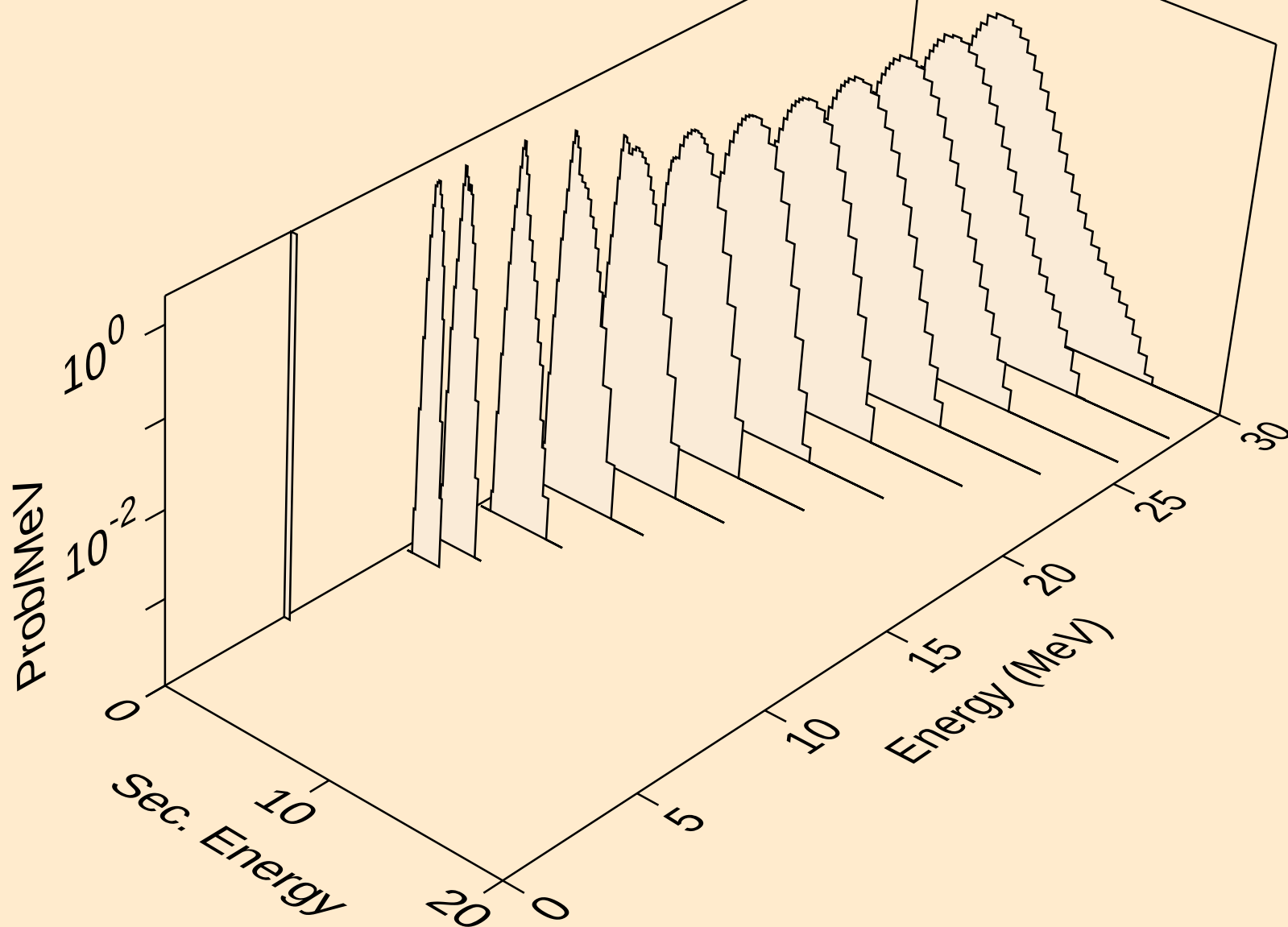
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protons from (n,p)



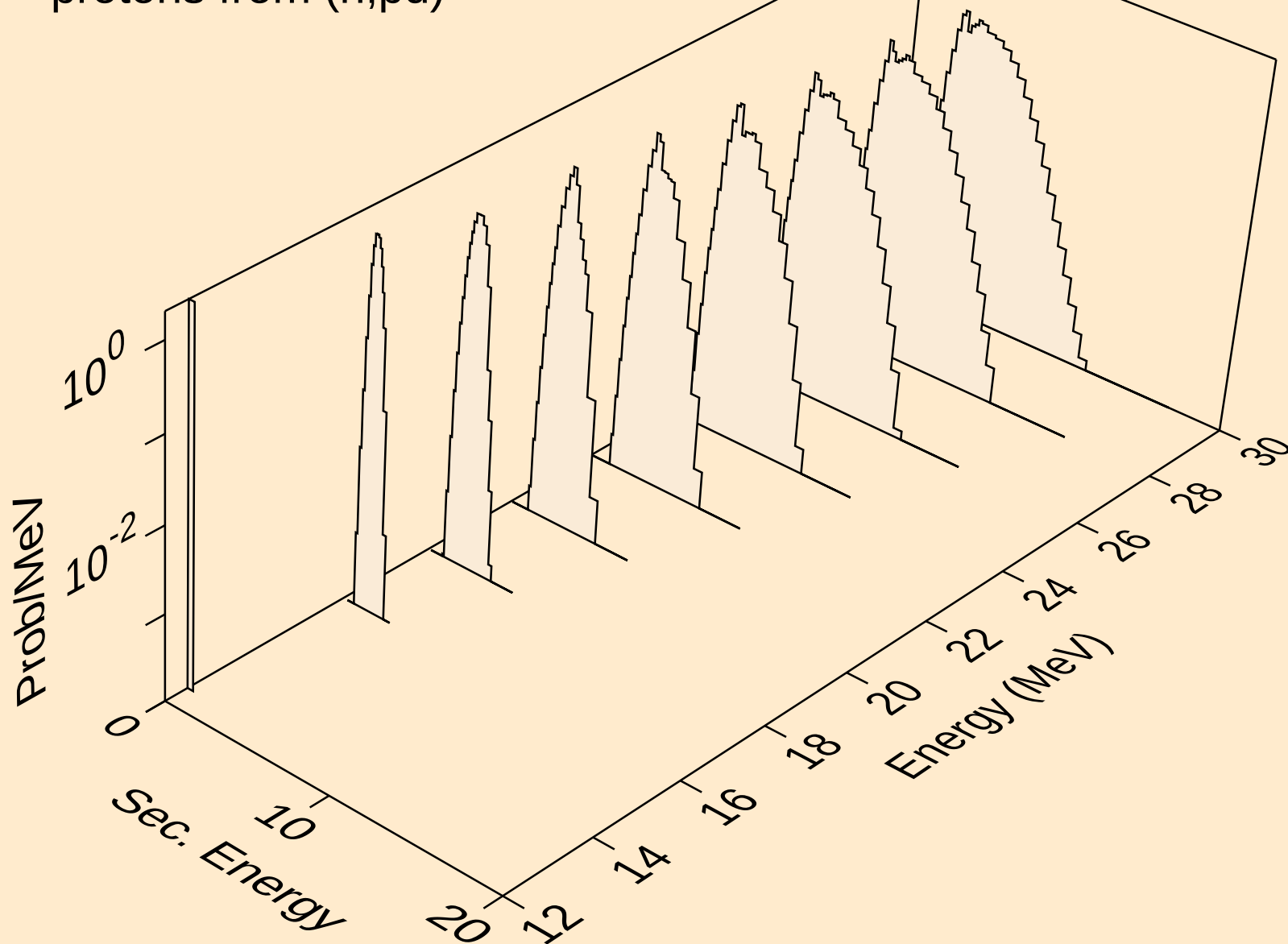
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protons from (n,2p)



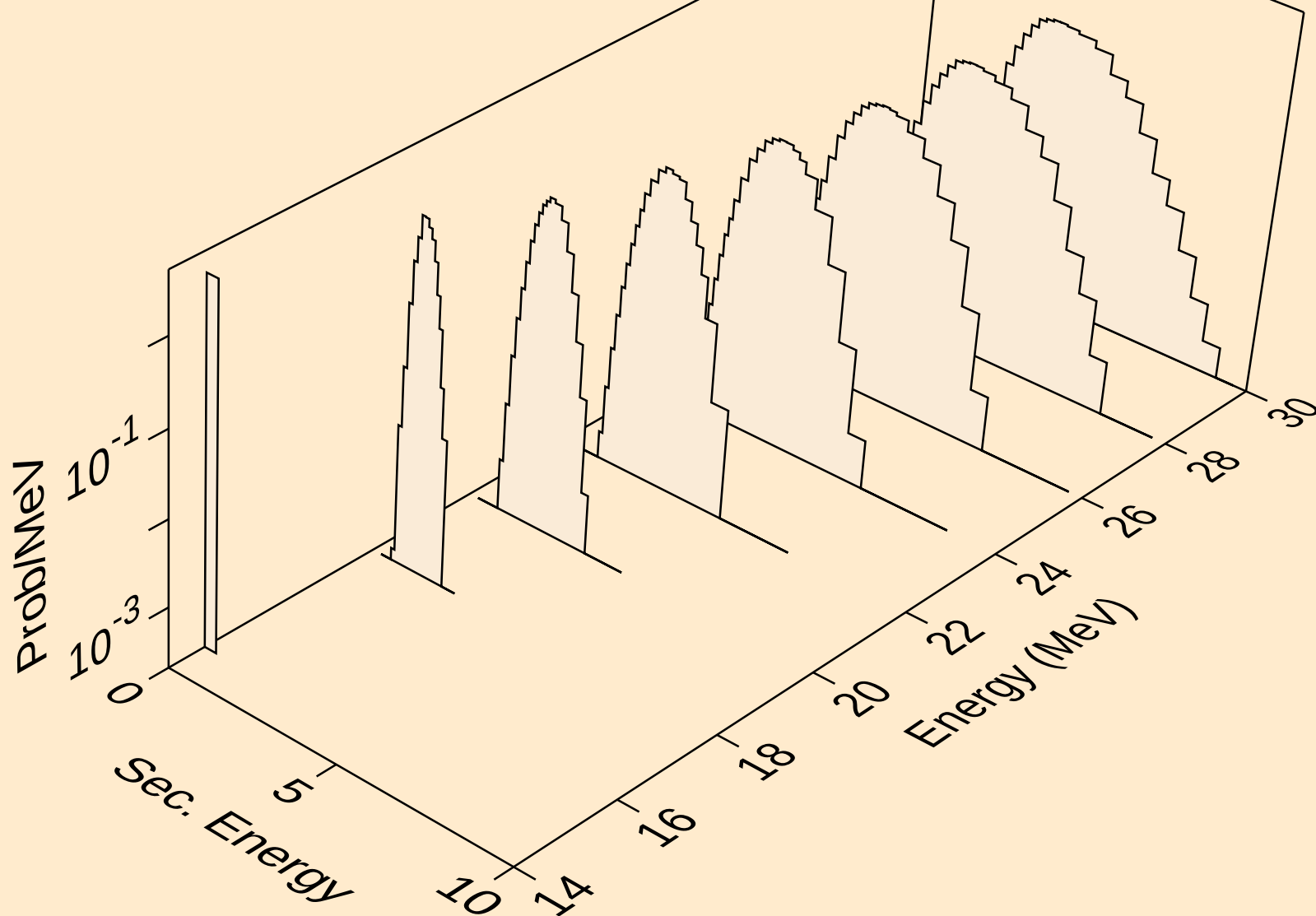
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protons from (n,p)



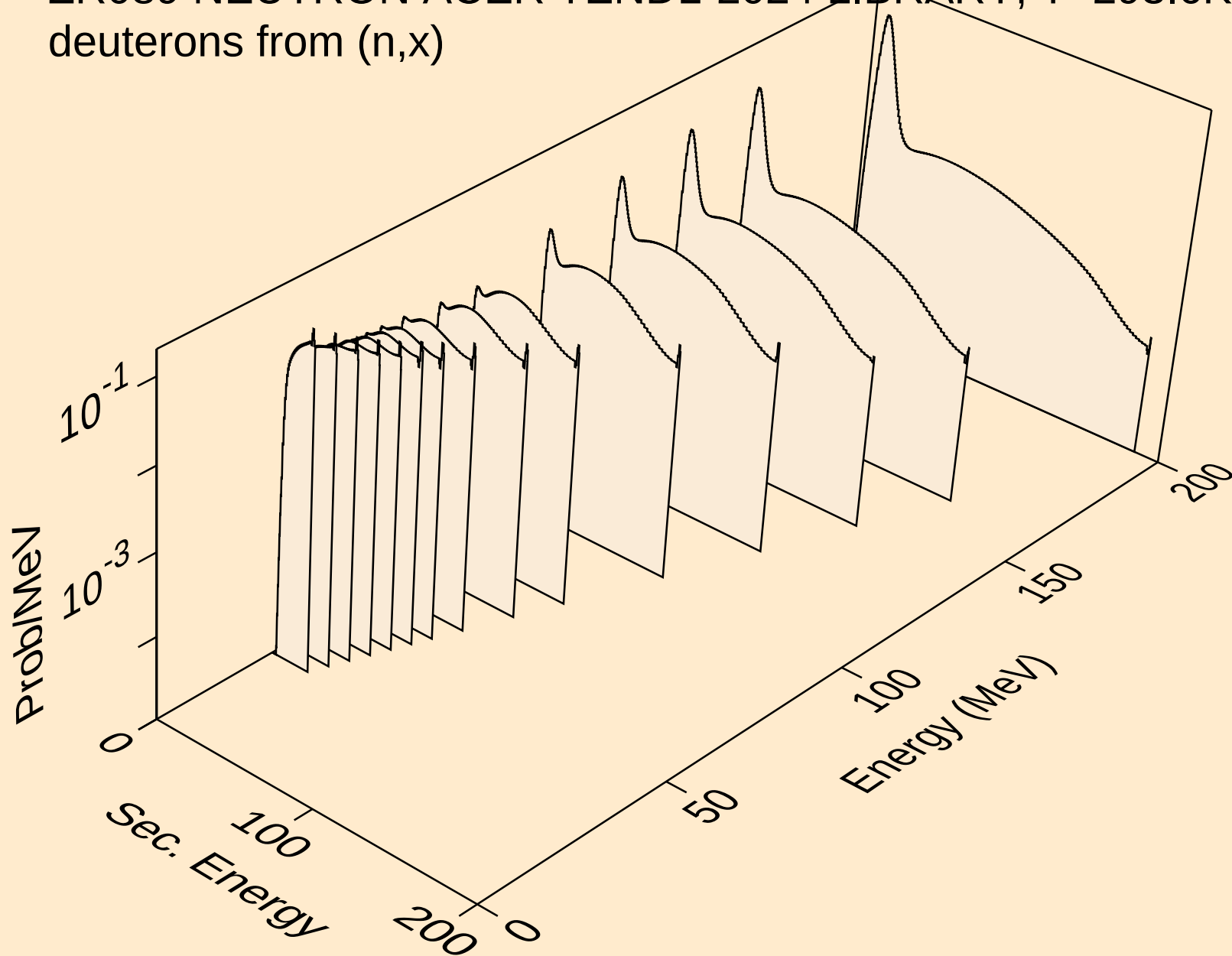
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protons from (n,pd)



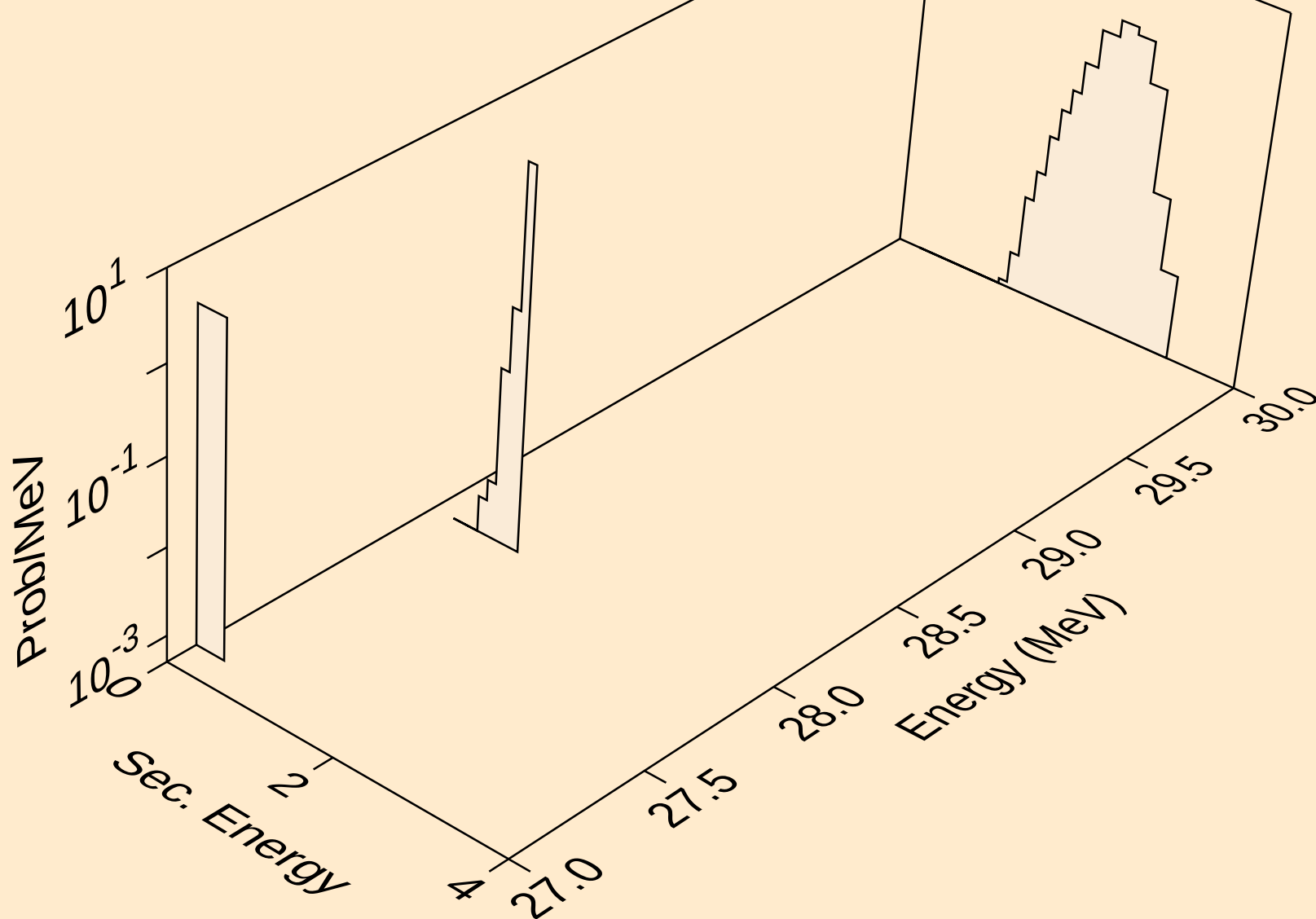
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protons from (n,pt)



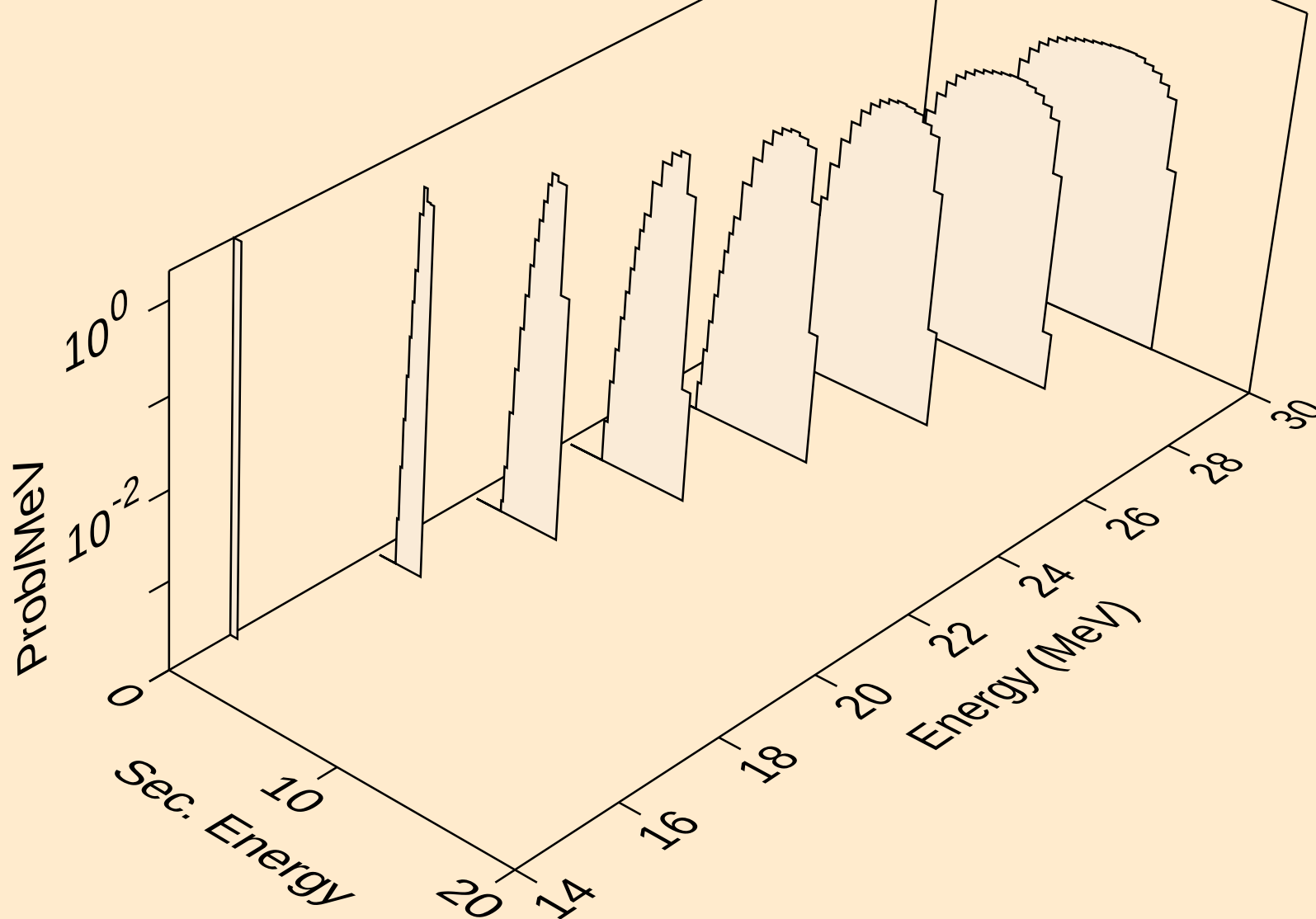
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
deuterons from (n,x)



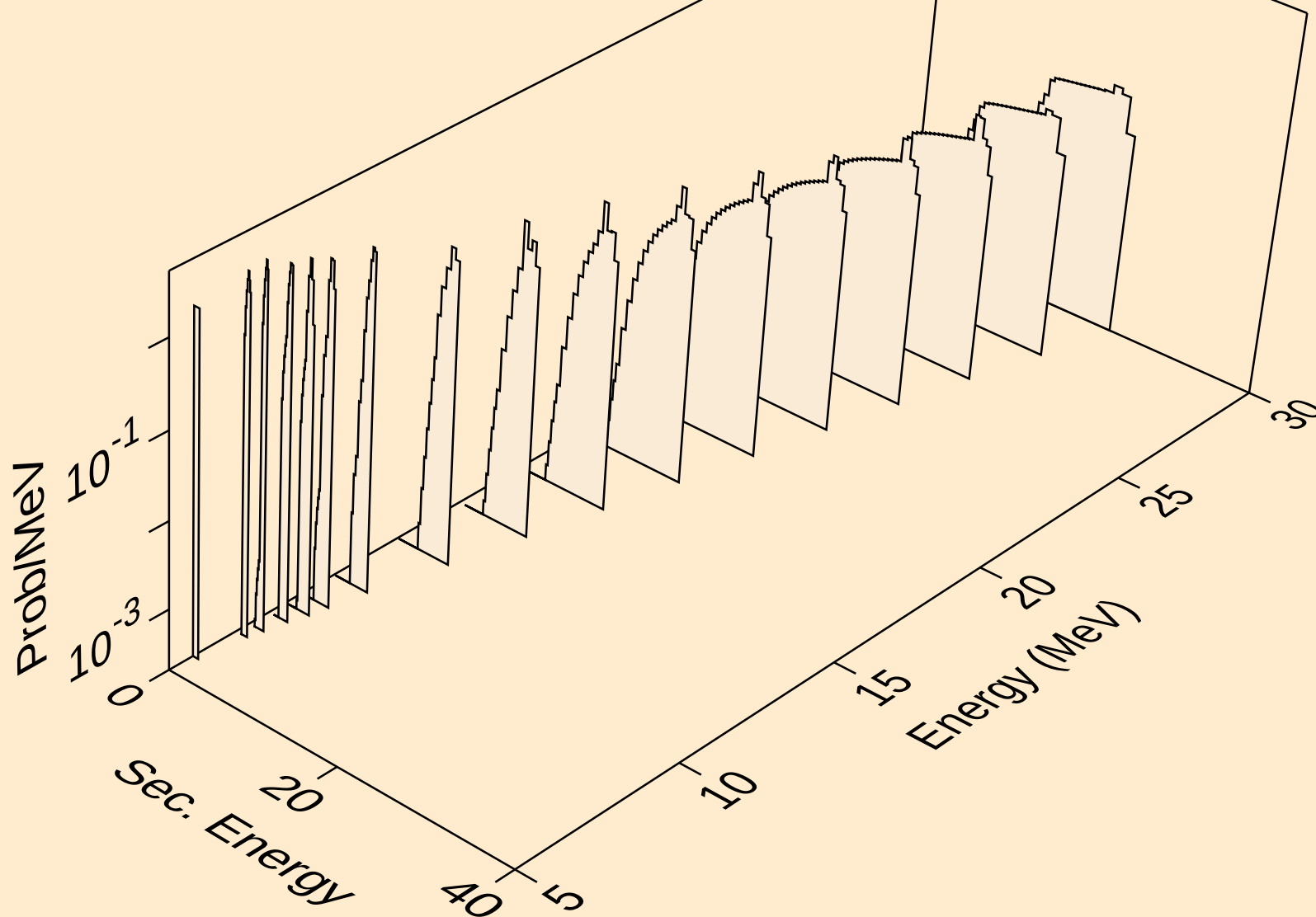
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
deuterons from (n,2nd)



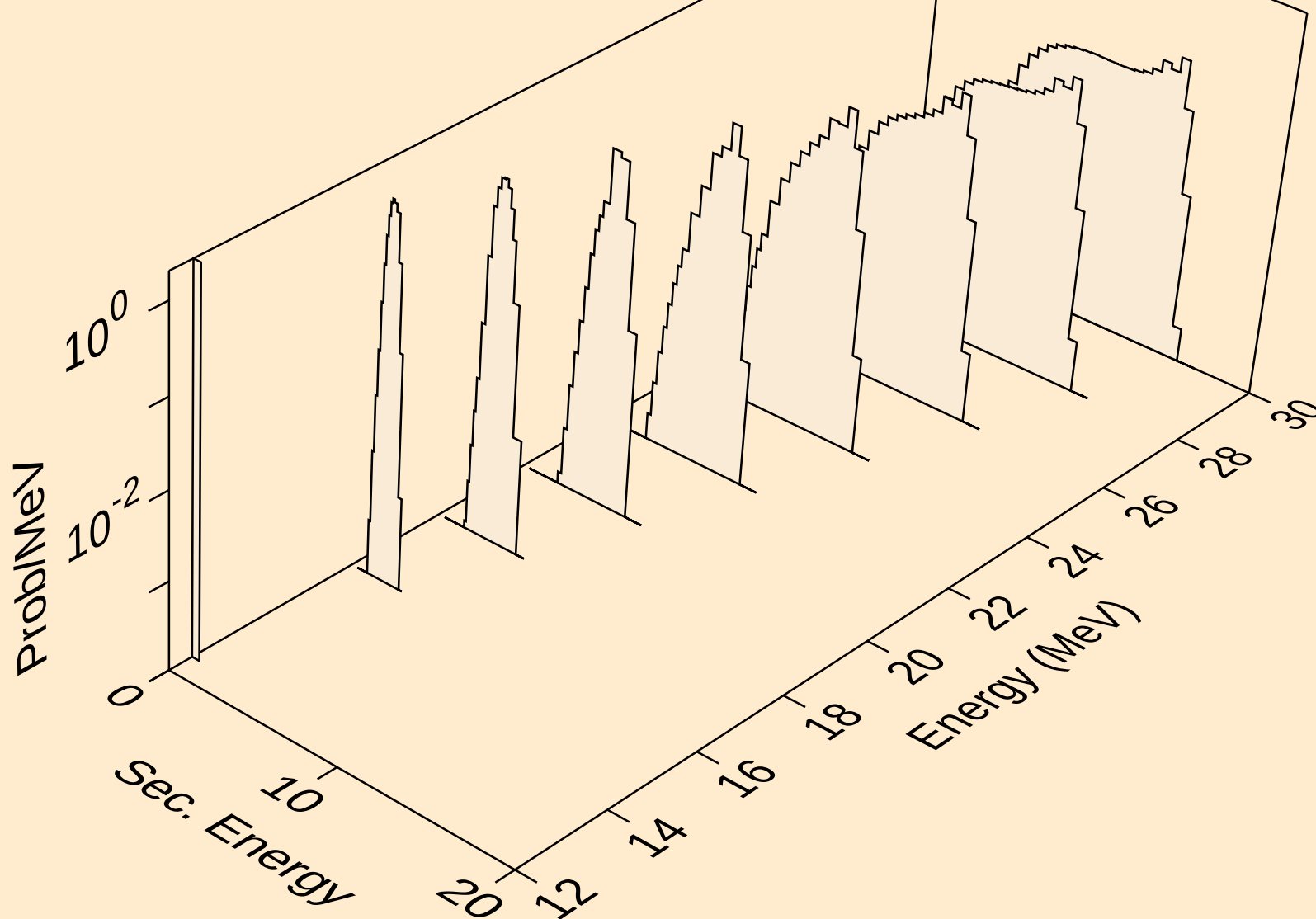
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
deuterons from (n,n*)d



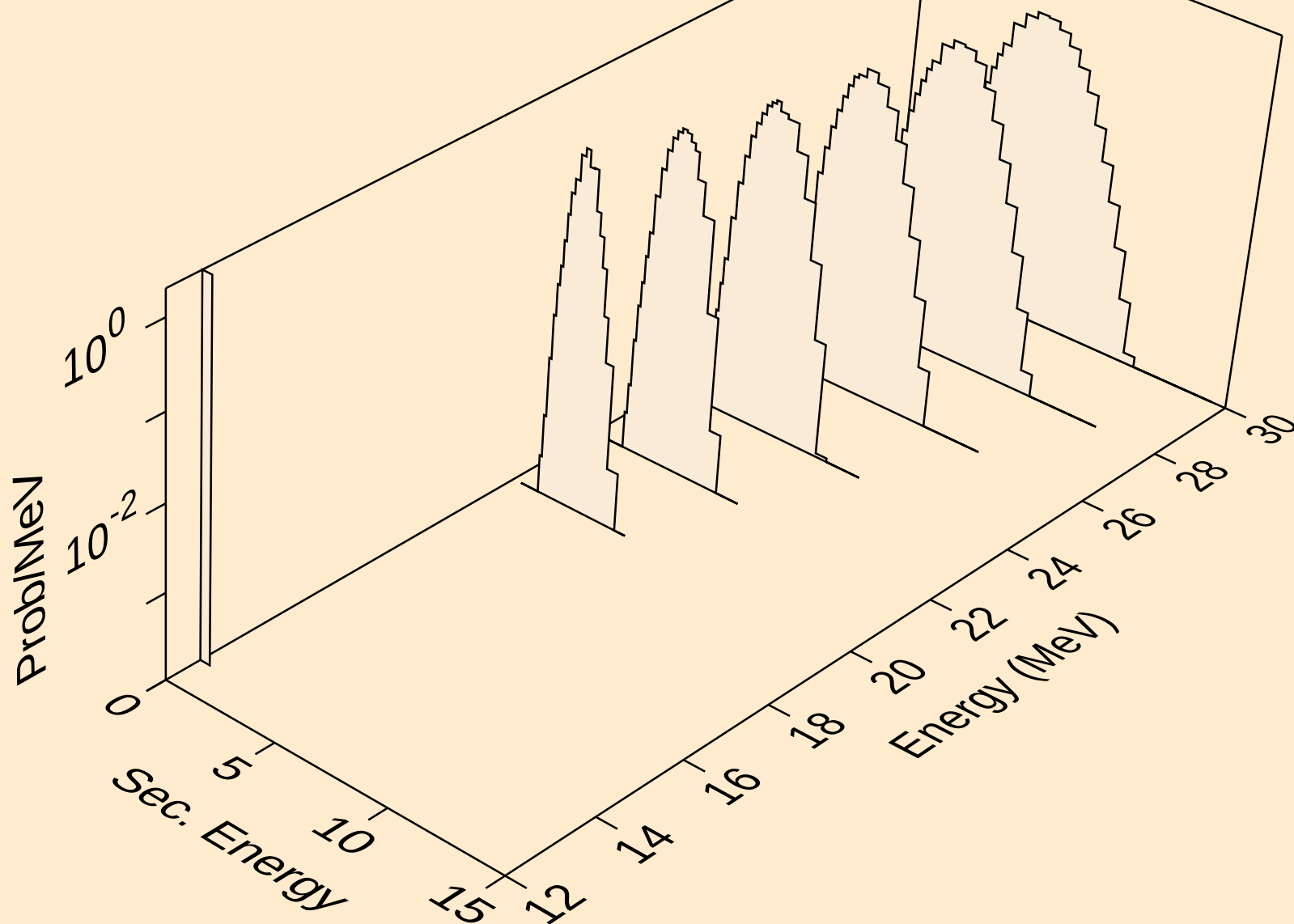
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
deuterons from (n,d)



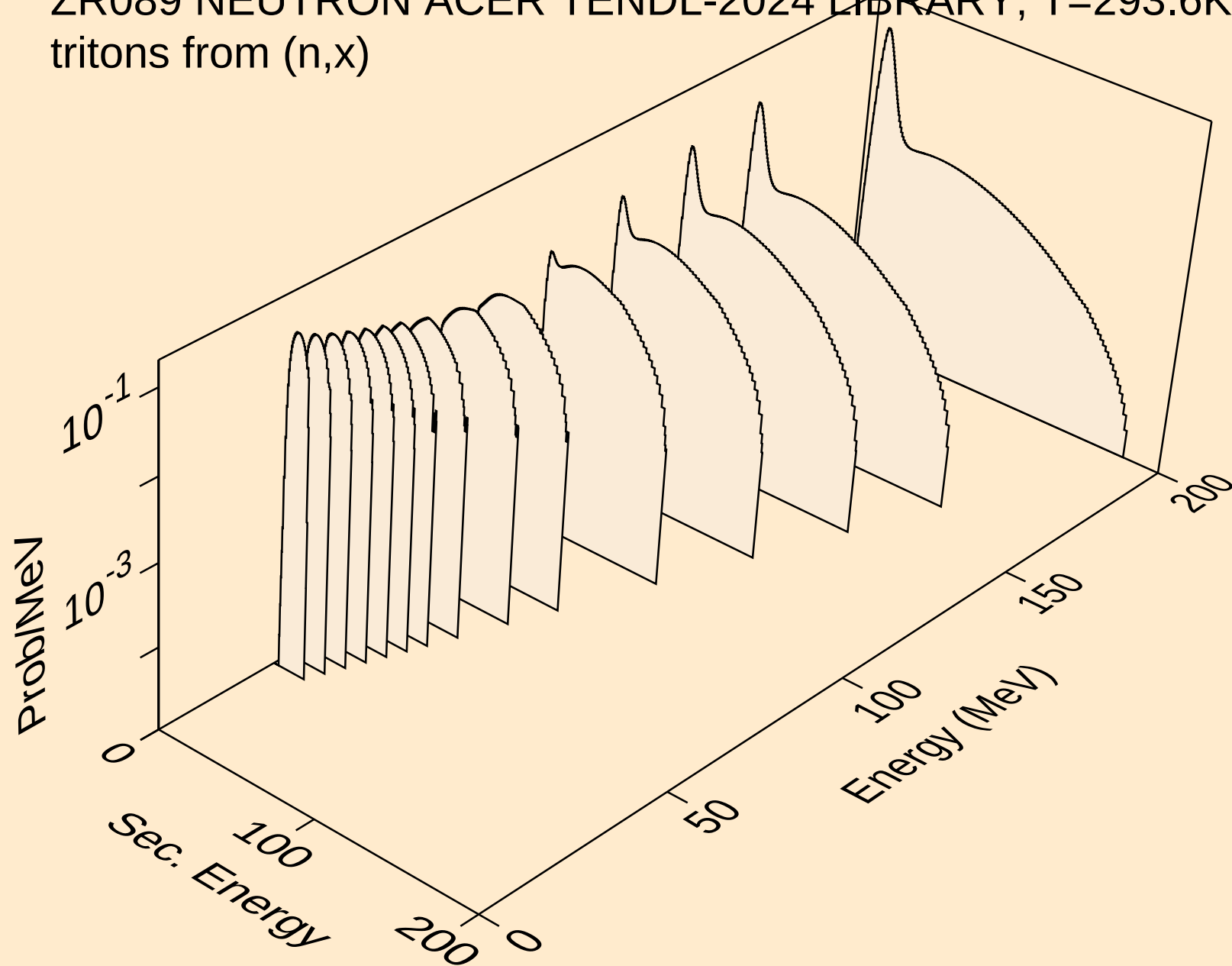
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
deuterons from (n,pd)



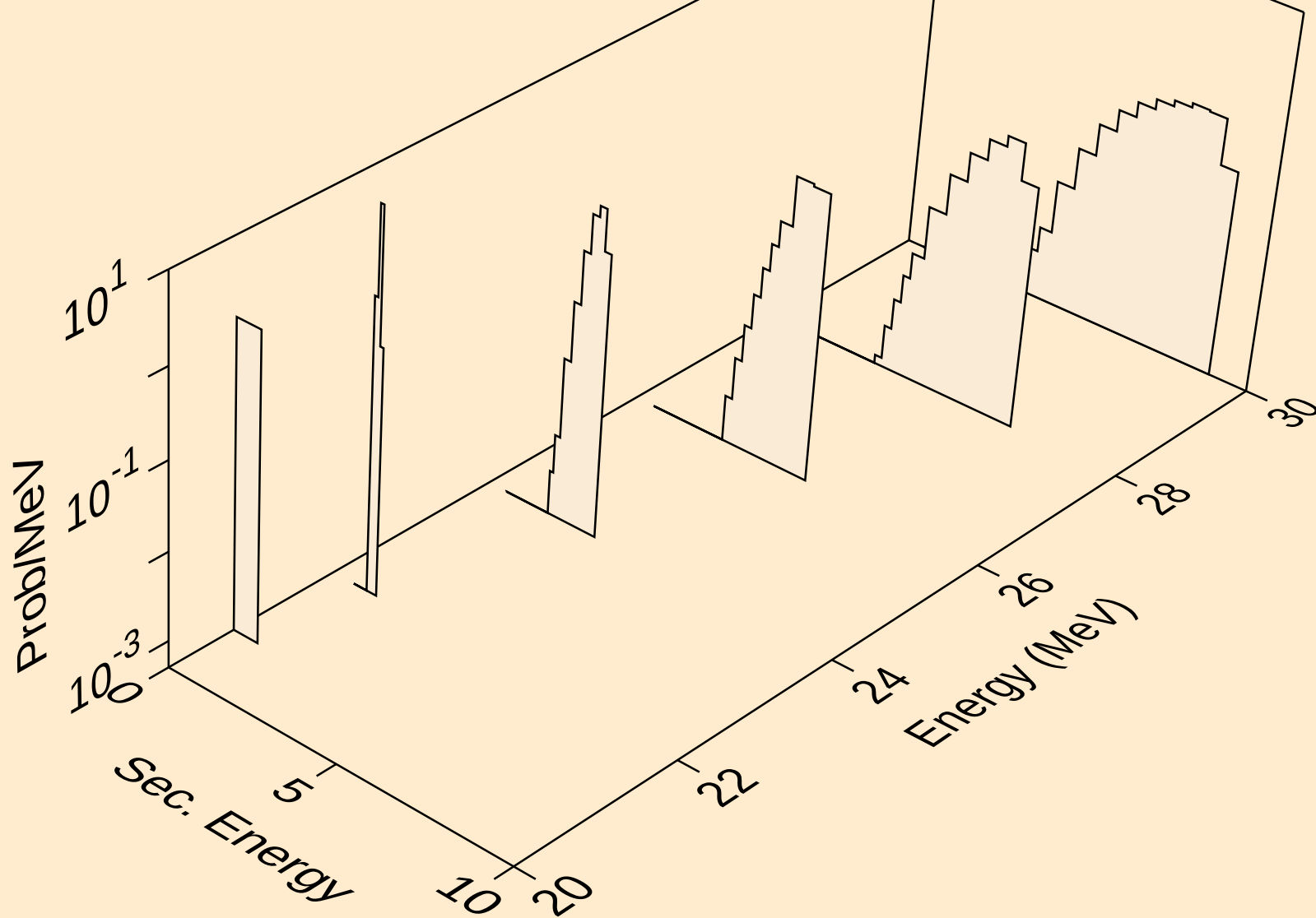
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
deuterons from (n,da)



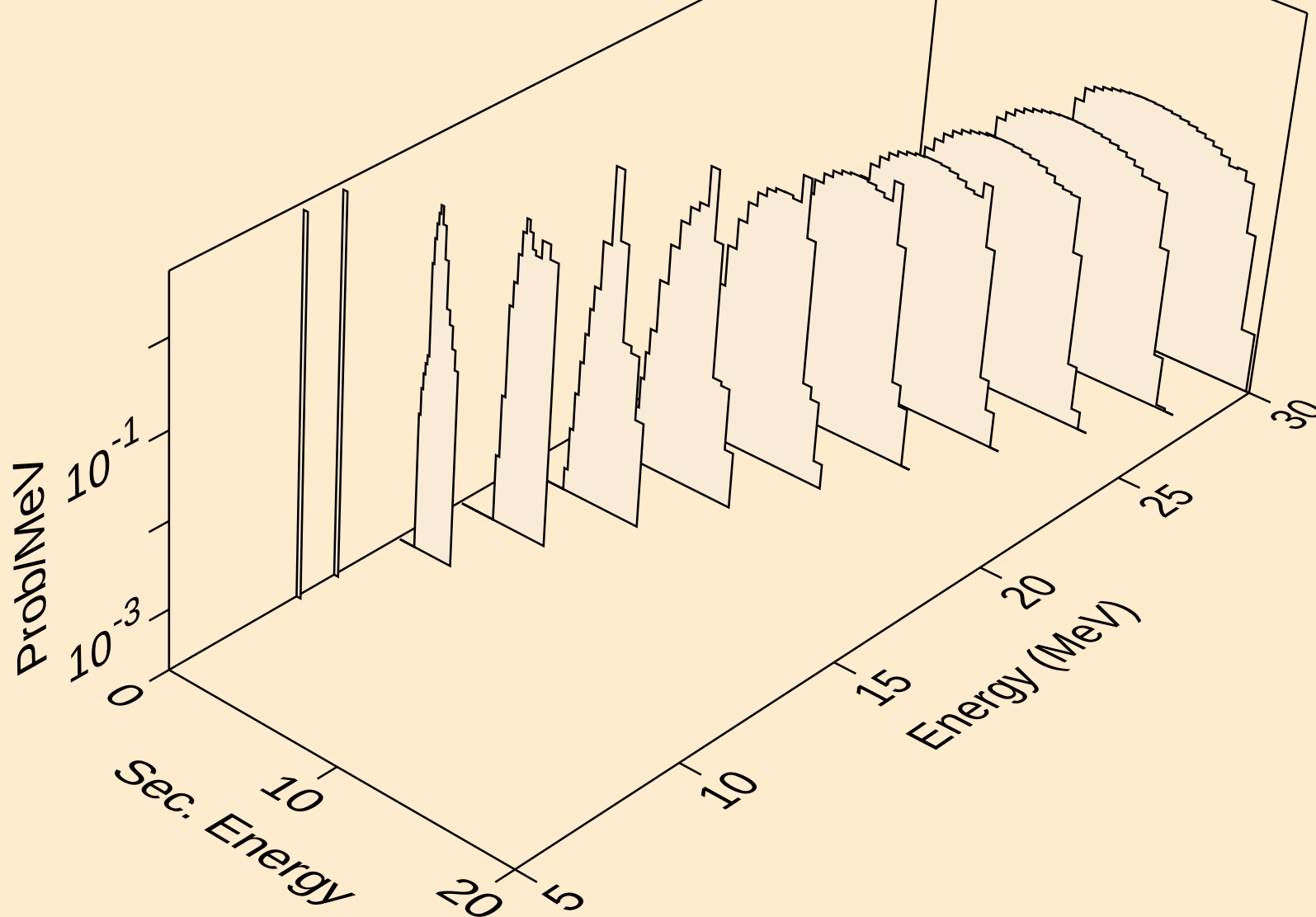
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
tritons from (n,x)



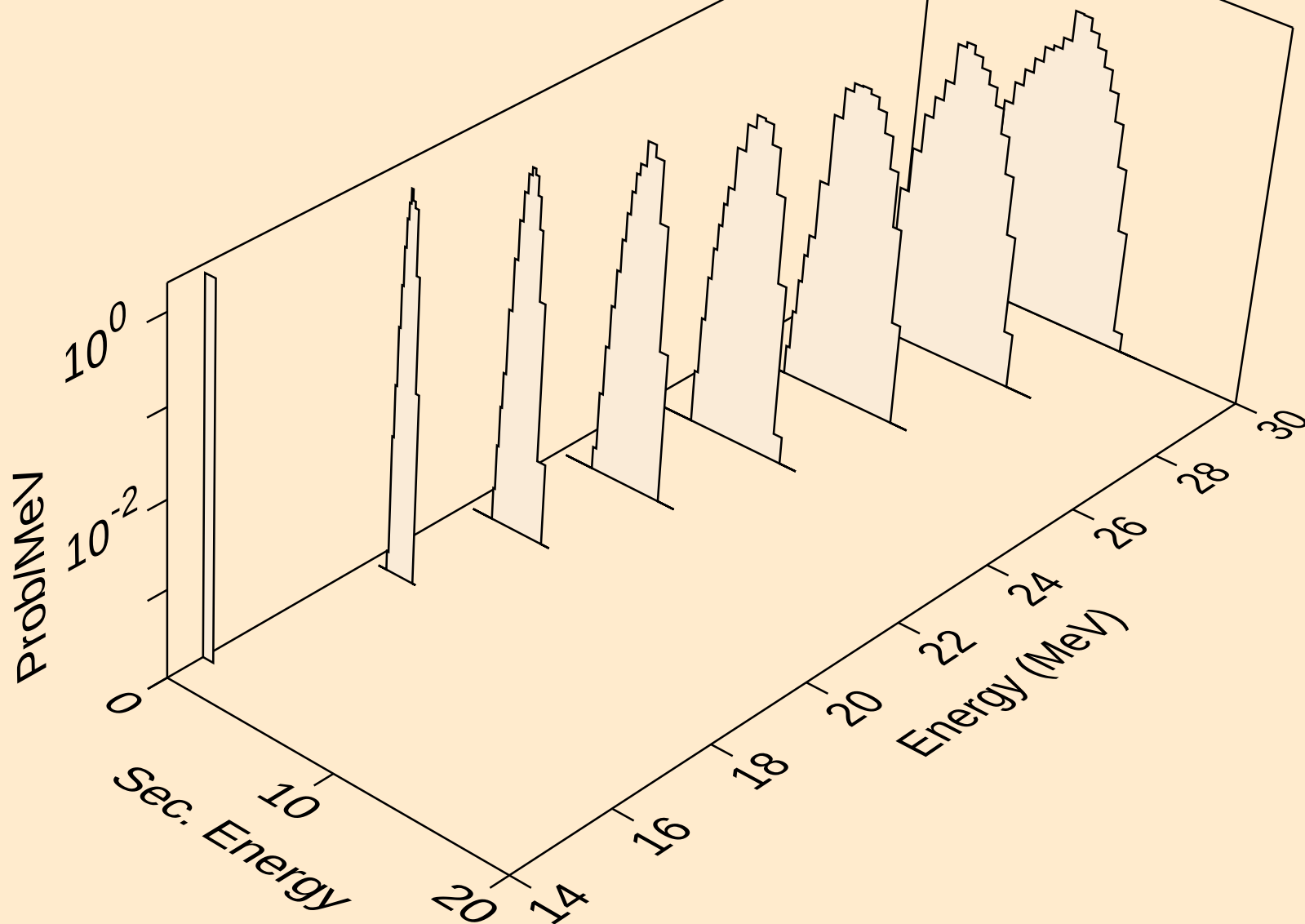
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
tritons from (n,n*)t



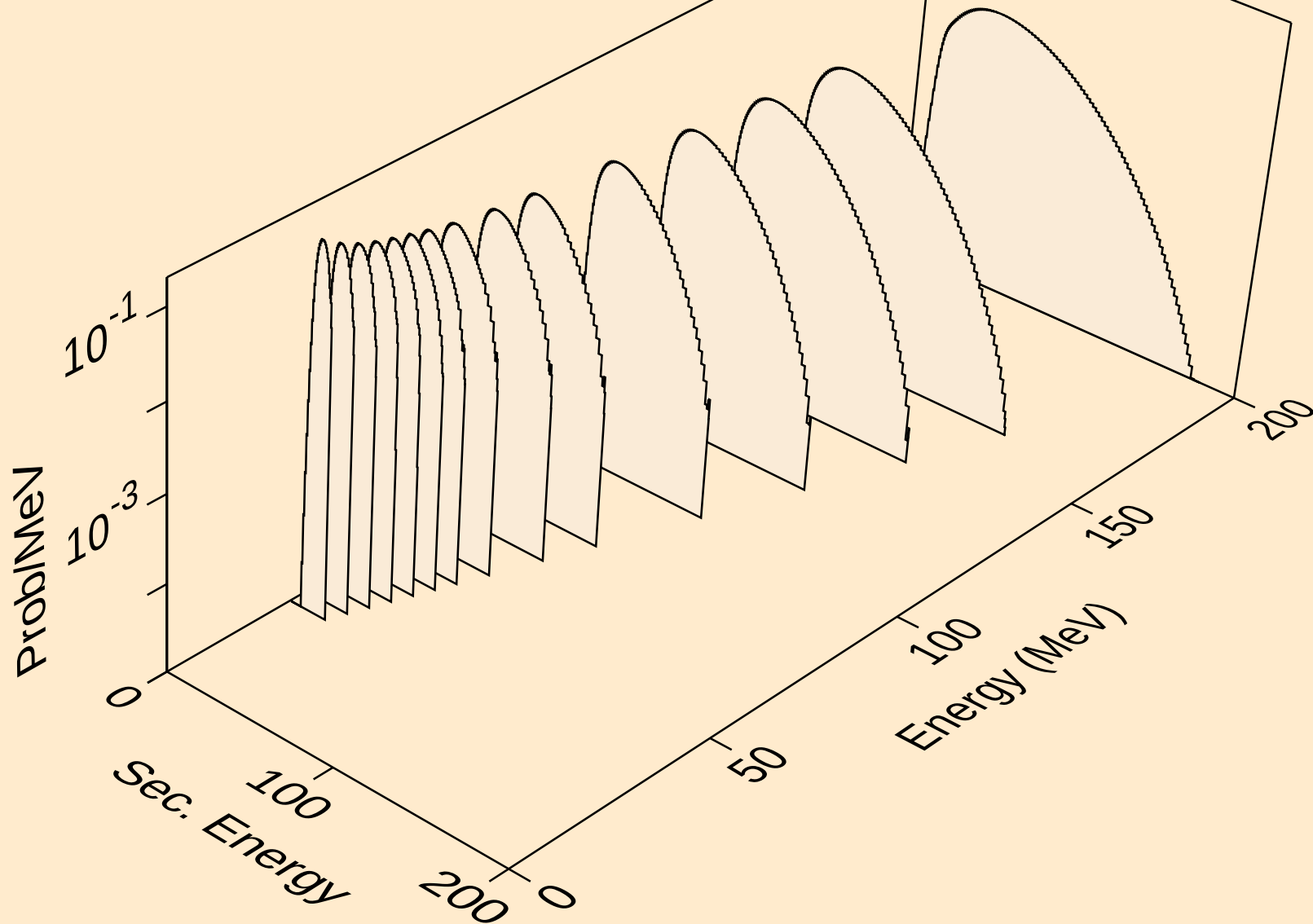
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
tritons from (n,t)



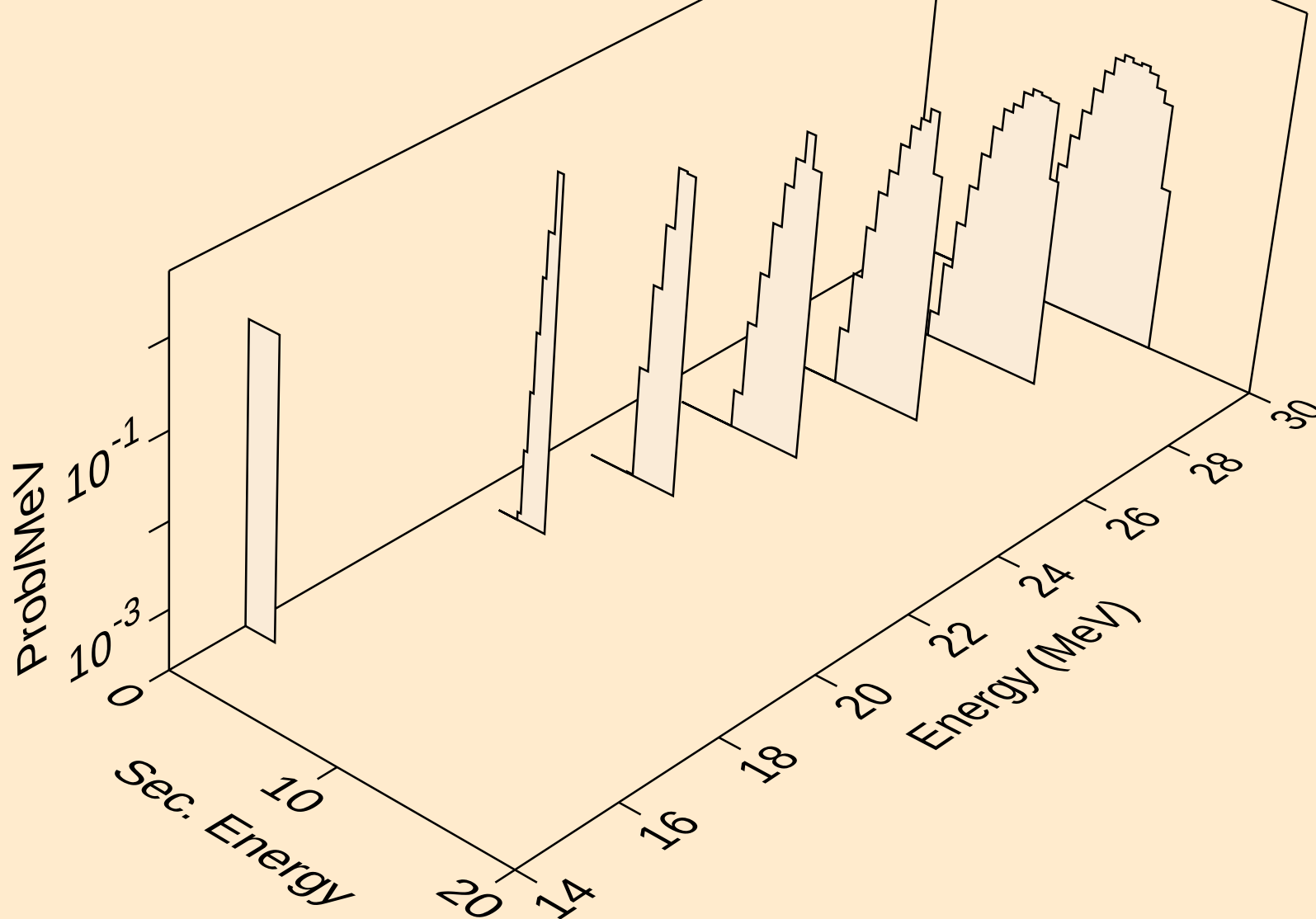
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tritons from (n,pt)



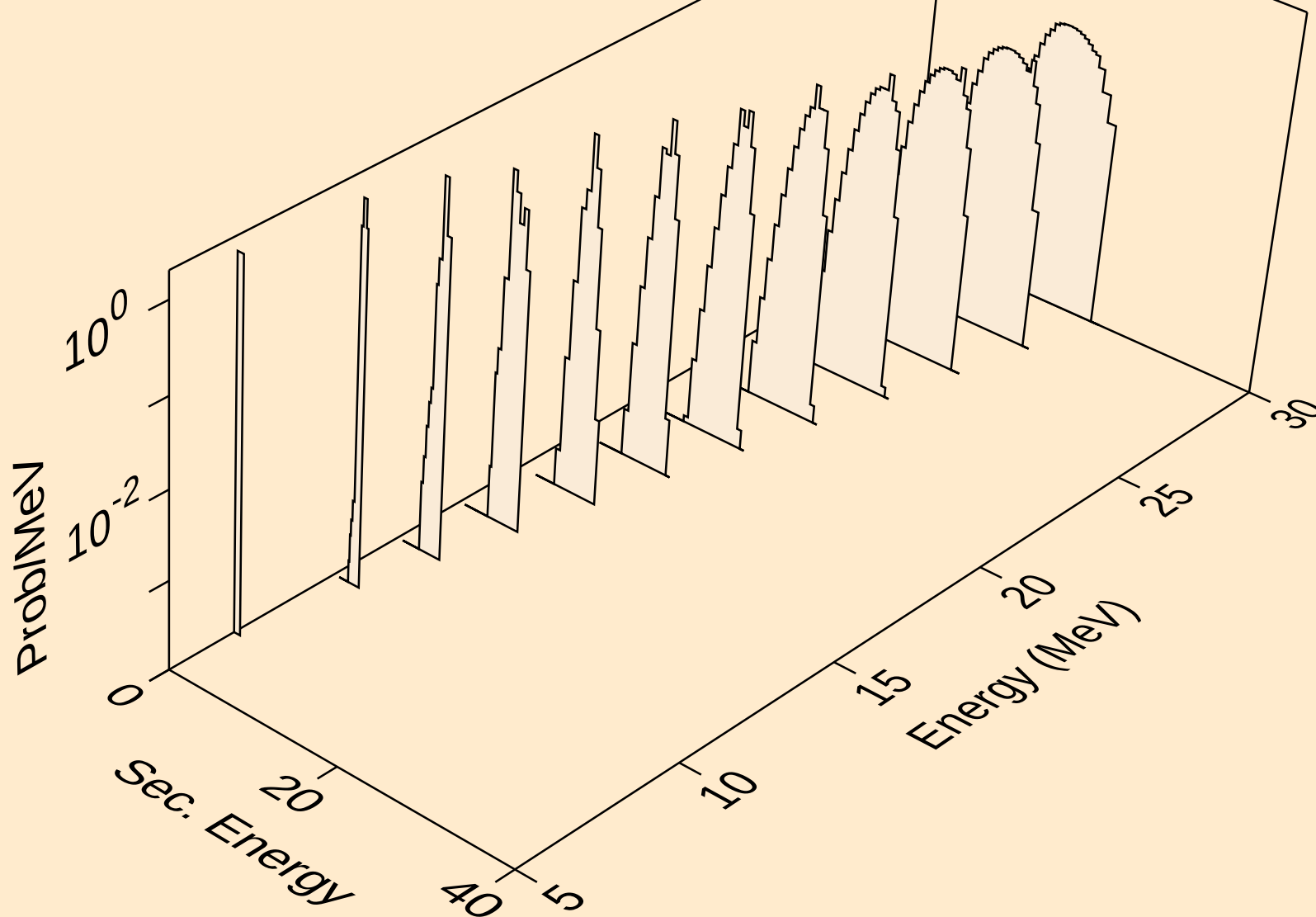
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
he3s from (n,x)



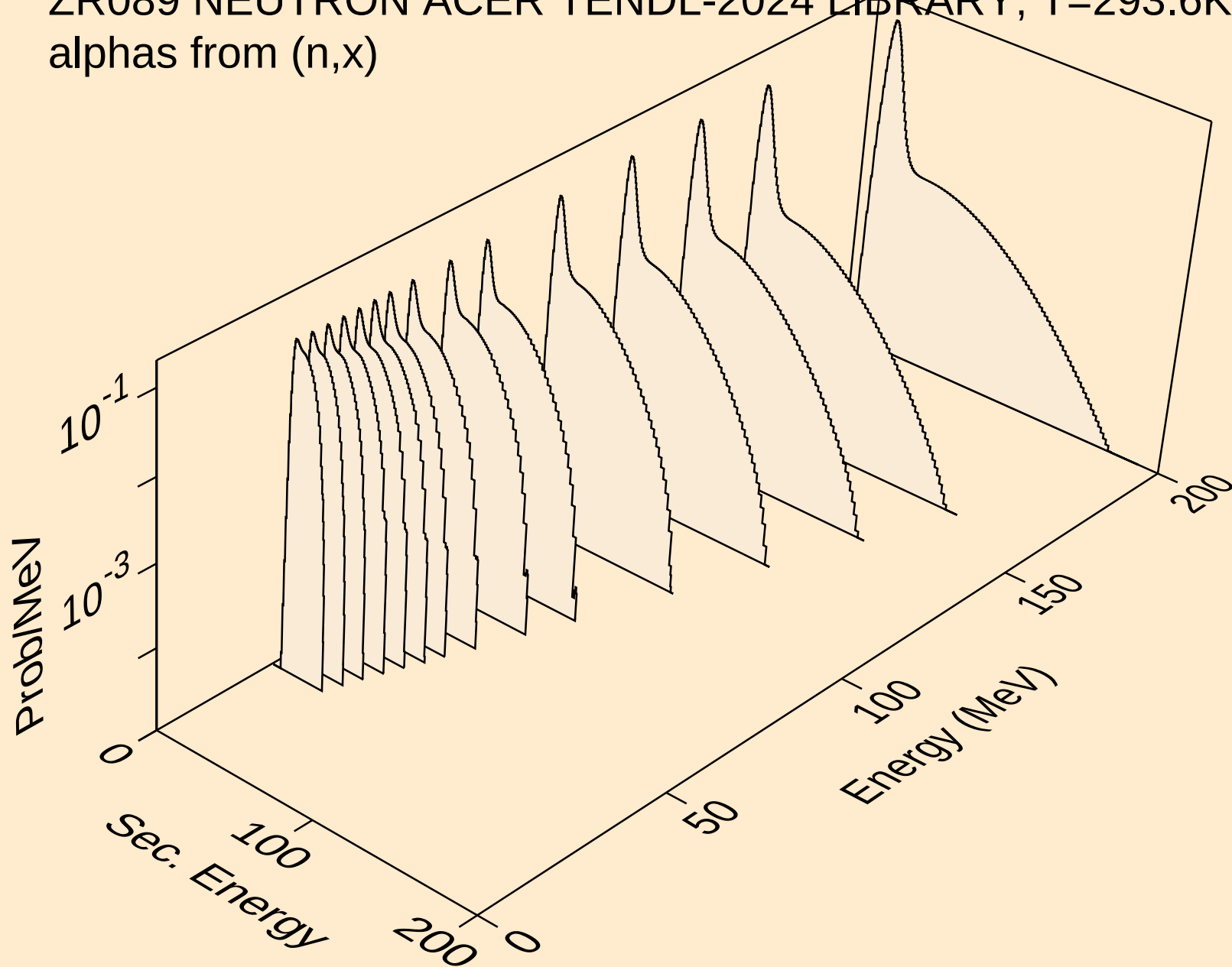
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
he3s from (n,n*)he3



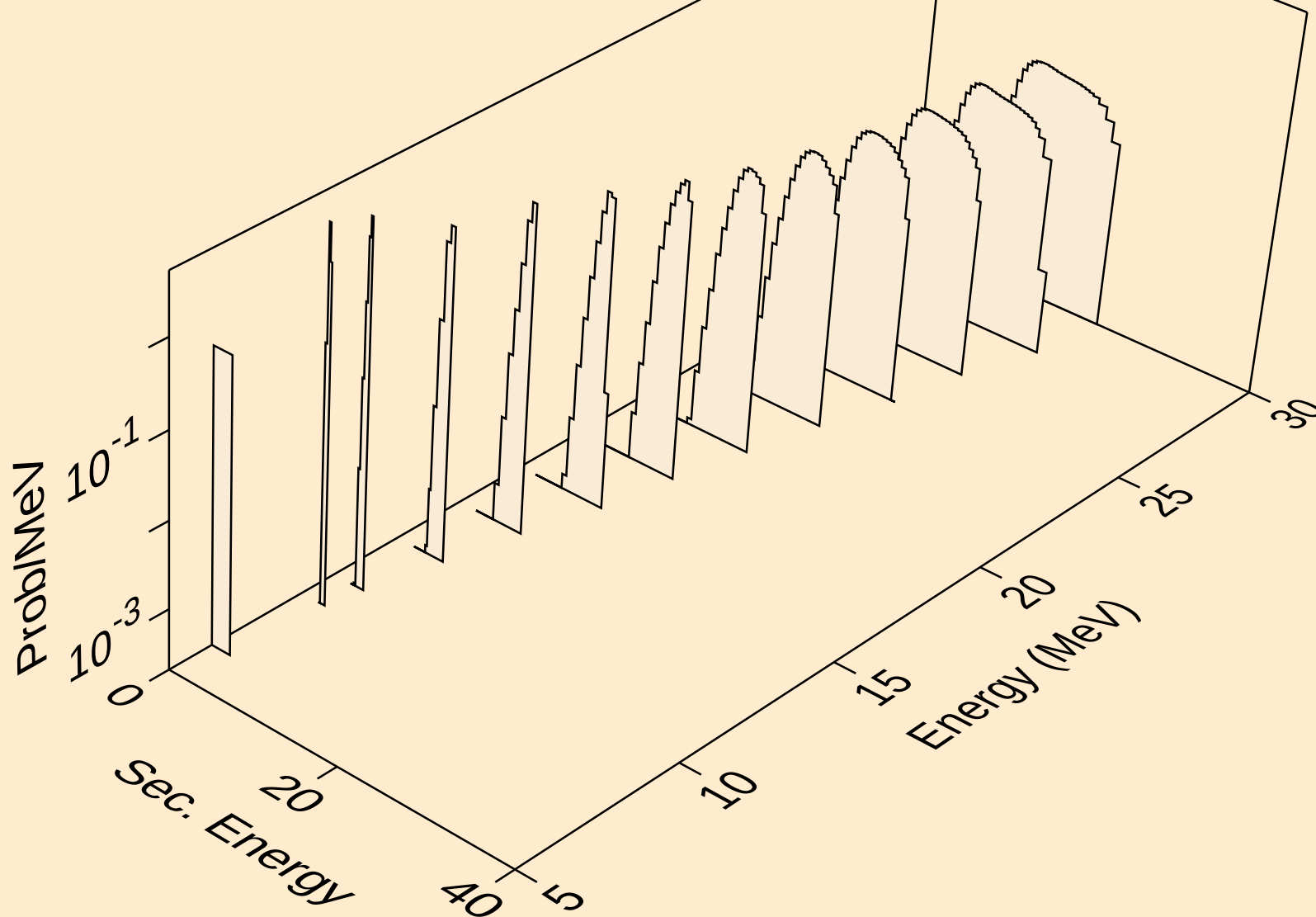
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
he3s from (n,he3)



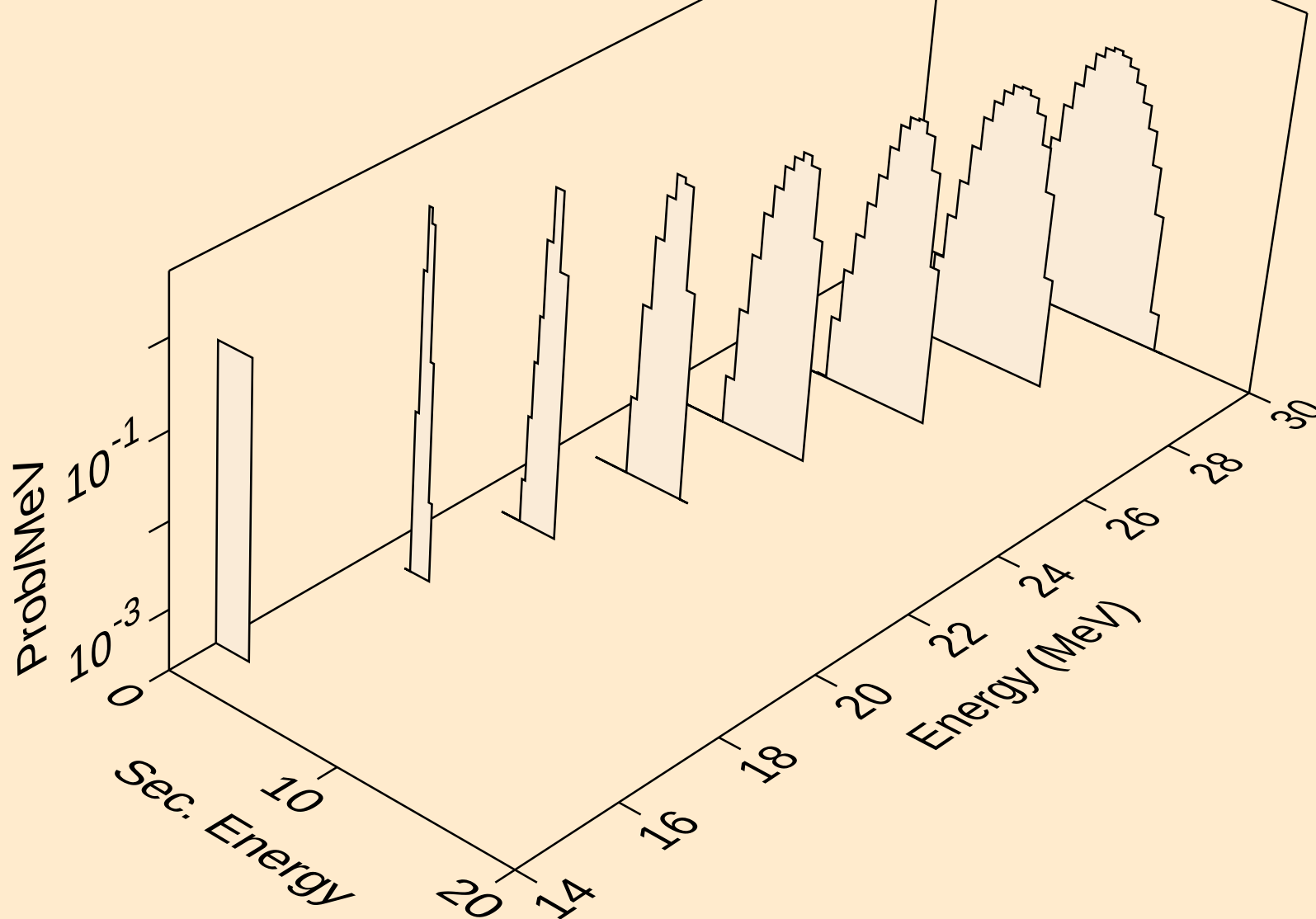
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
alphas from (n,x)



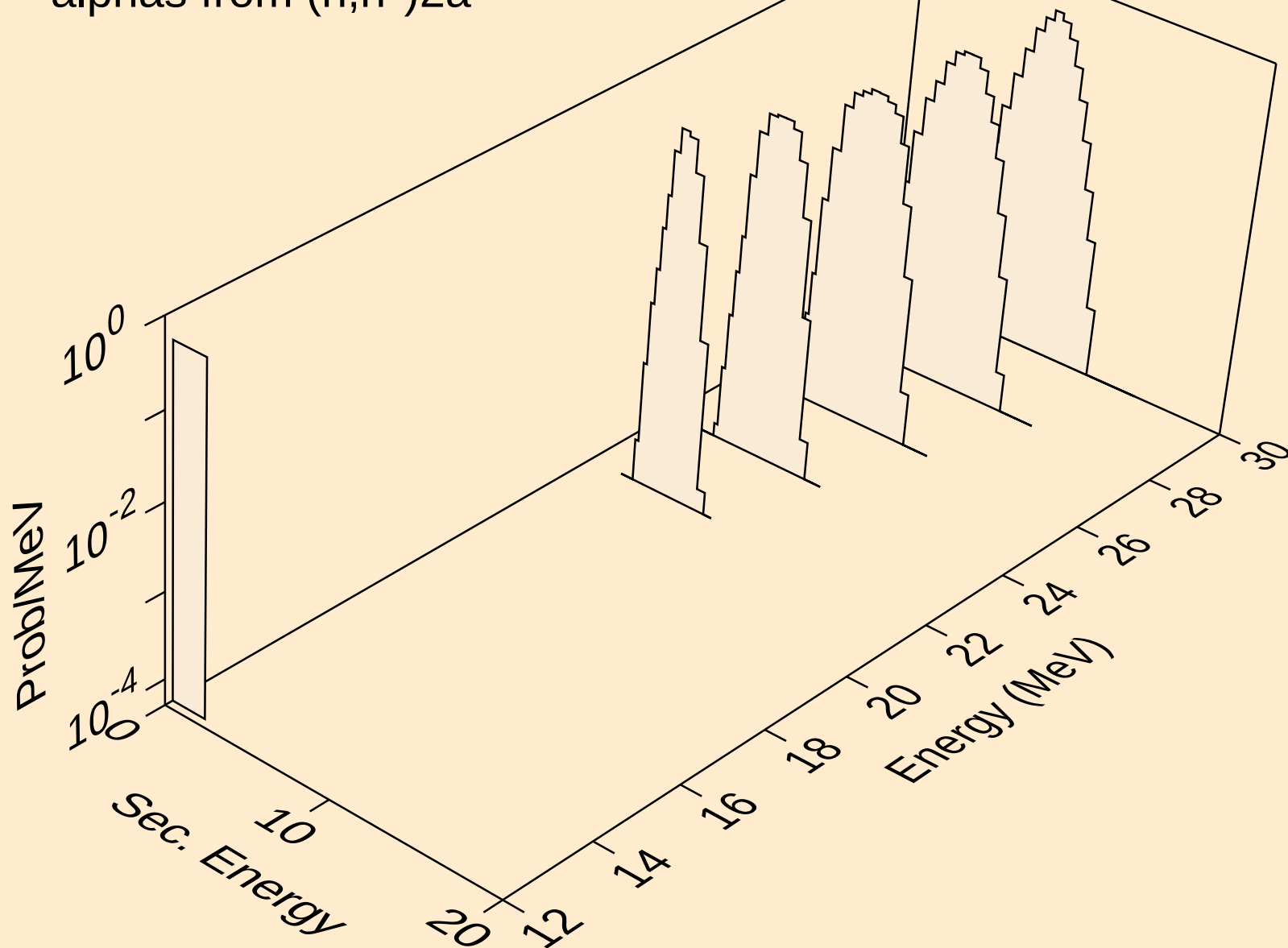
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
alphas from (n,n*)a



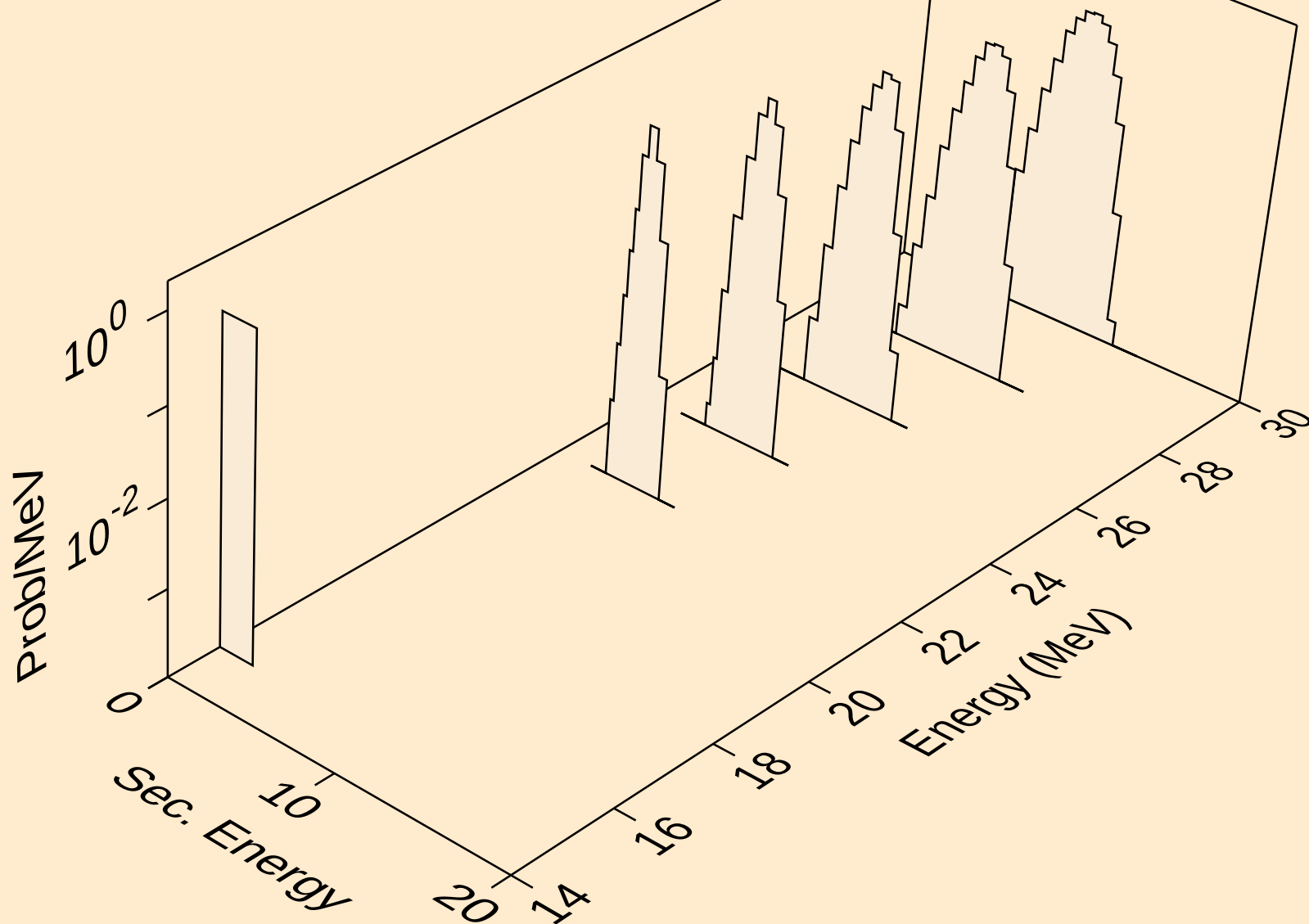
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
alphas from (n,2n)a



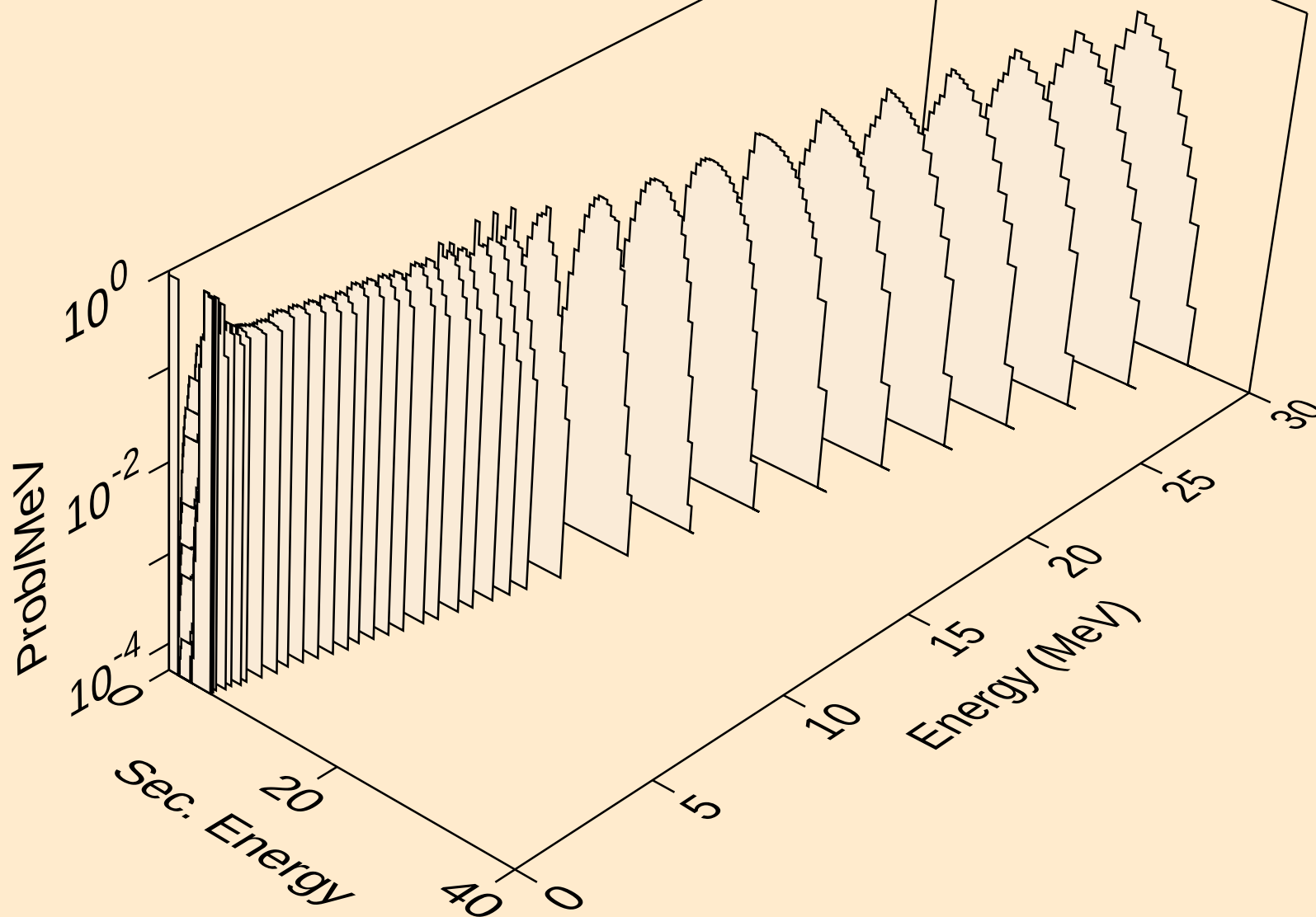
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
alphas from (n,n*)2a



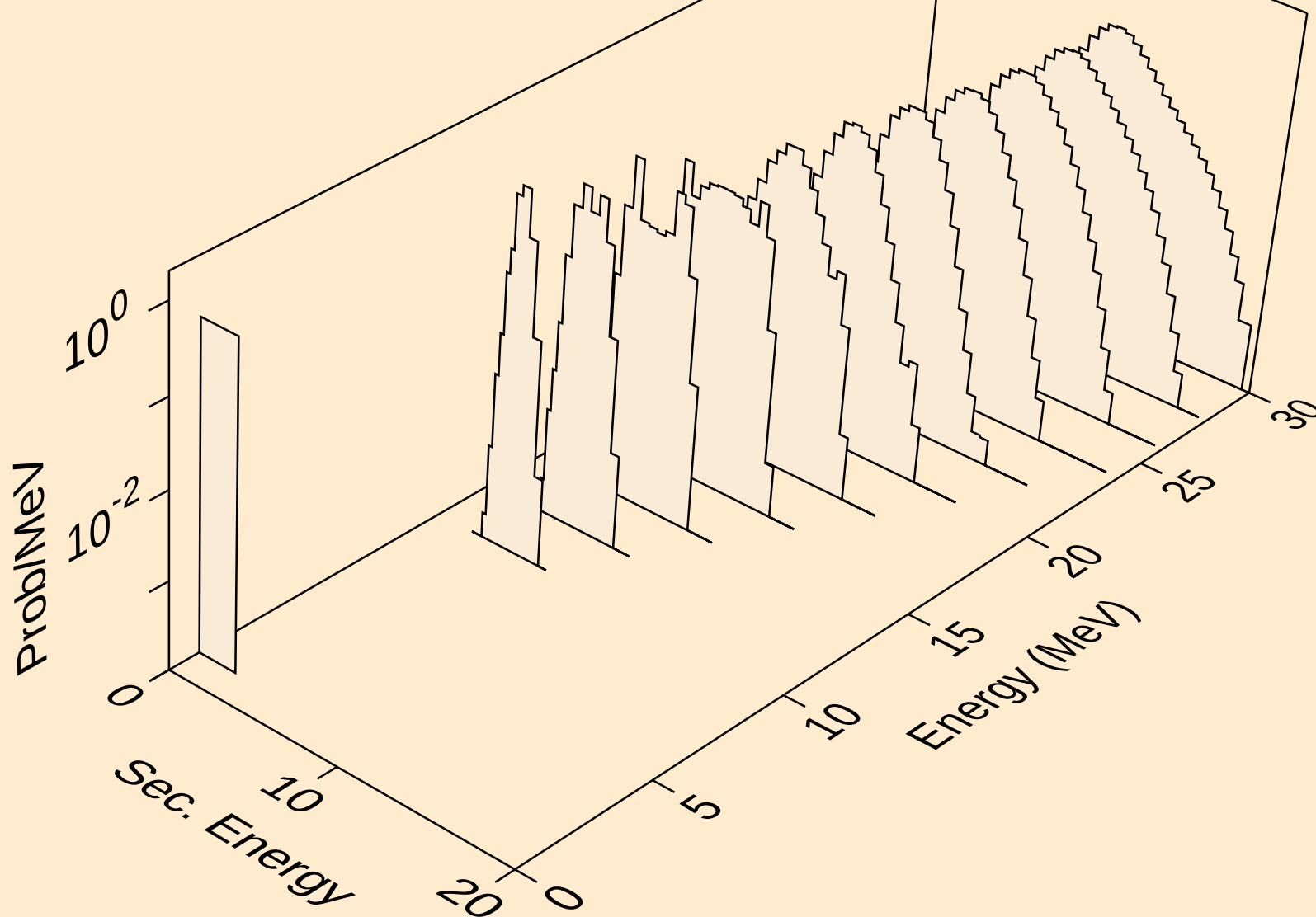
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
alphas from (n,npa)



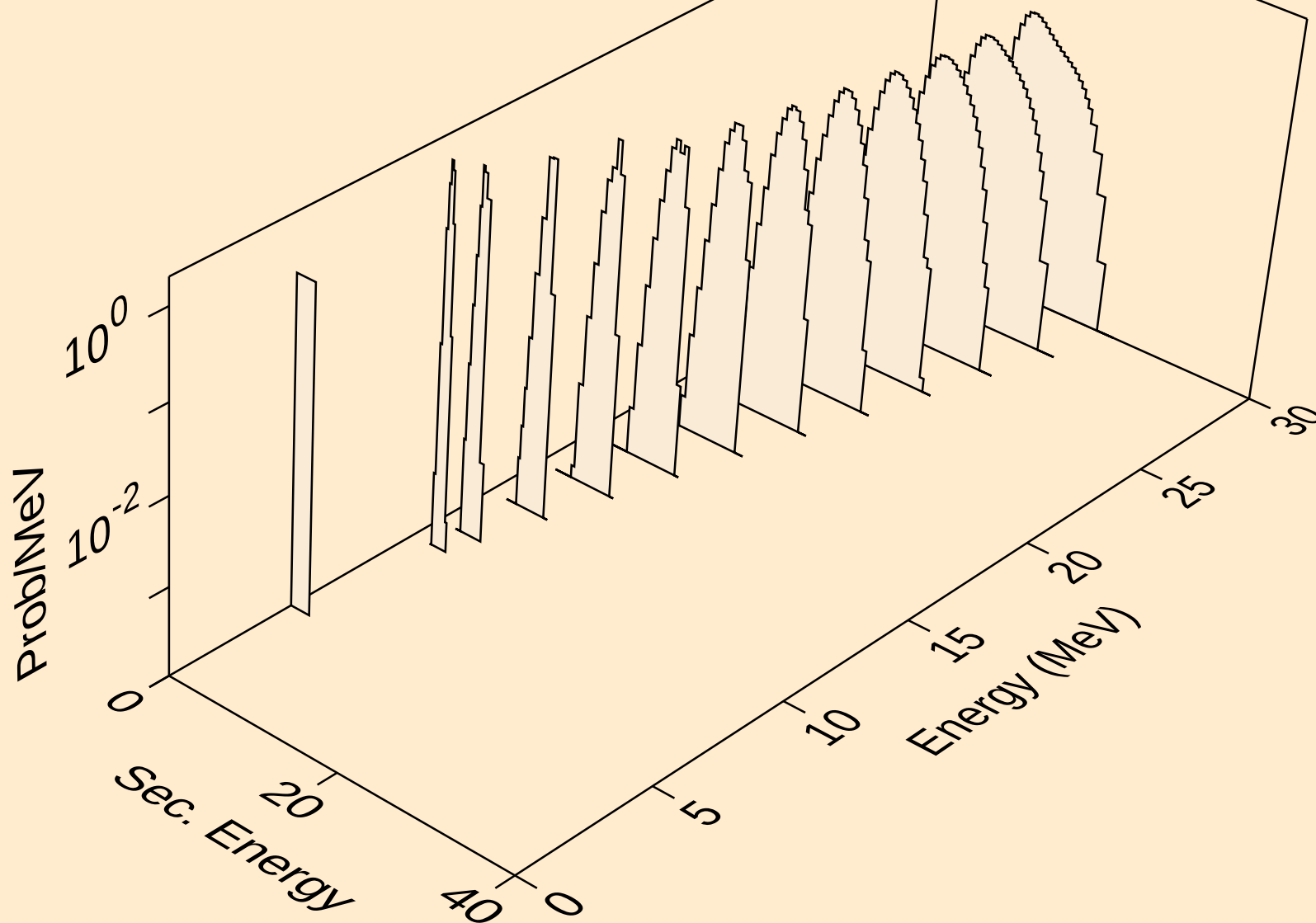
ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
alphas from (n,a)



ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
alphas from (n,2a)



ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
alphas from (n,pa)



ZR089 NEUTRON ACER TENDL-2024 LIBRARY; T=293.6K
alphas from (n,da)

