

After some algebra, this reduces to:

$$\zeta = 1 - \frac{(A-1)^2}{2A} \log_e \frac{A+1}{A-1}$$

For  $A \gg 1$ , this can be reduced to  $\zeta \sim (2A - \frac{4}{3})/A^2$  or  $\zeta \sim 2/(A + \frac{2}{3})$ .

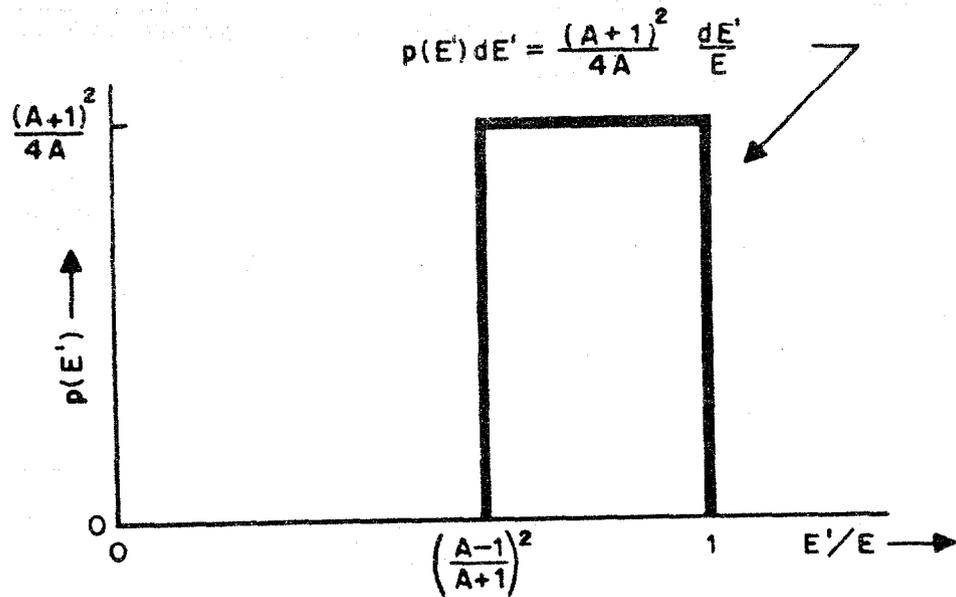


Figure 30. Neutron energy distribution after single elastic scattering.

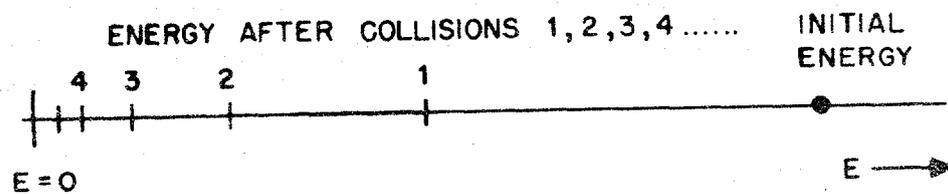


Figure 31. Neutron energy after successive collisions.