$$\zeta(\mathbf{s}) = \sum_{\mathbf{n=1}}^{\infty} \frac{\mathbf{1}}{\mathbf{n}^{\mathrm{s}}} = \prod_{\mathbf{p}\ \text{prime}} (\mathbf{1} - \mathbf{1}/\mathbf{p}^{\mathrm{s}})^{-\mathbf{1}}$$