Using AMS LaTeX 2_ε we can write myriad mathematical formulae and equations easily

$$z - x^{\int y\ dx} = \left(\frac{\lfloor x \rfloor + y}{x - \lceil y \rceil}\right) + \sum_{i=0}^{n} Flow_i \tag{1}$$

$$= \vartheta - \prod_{j=1}^{x} Trace_j \tag{2}$$

$$\sum_{\substack{0<i<n \\ 0<j<i}} P_{ij} = ?$$

The base of natural logarithm, $e = 2 + \cfrac{1}{1 + \cfrac{1}{2 + \cfrac{1}{1 + \ldots}}}$

$$\frac{d}{dx}(x \ln x - x) = \ln x$$

$$\int \ln x\, dx = x \ln x - x$$

$$\int_{-1}^{3} x^3\, dx = -20$$

We can also use geometric symbols. For example, in a rectangle ABCD,

$$\angle \mathrm{ABC} = \angle \mathrm{BCD} = \angle \mathrm{ADC} = \angle \mathrm{BAD} = 90^\circ$$

.

Moreover, the sides, AB||CD and AD||BC and AB$\perp$BC.