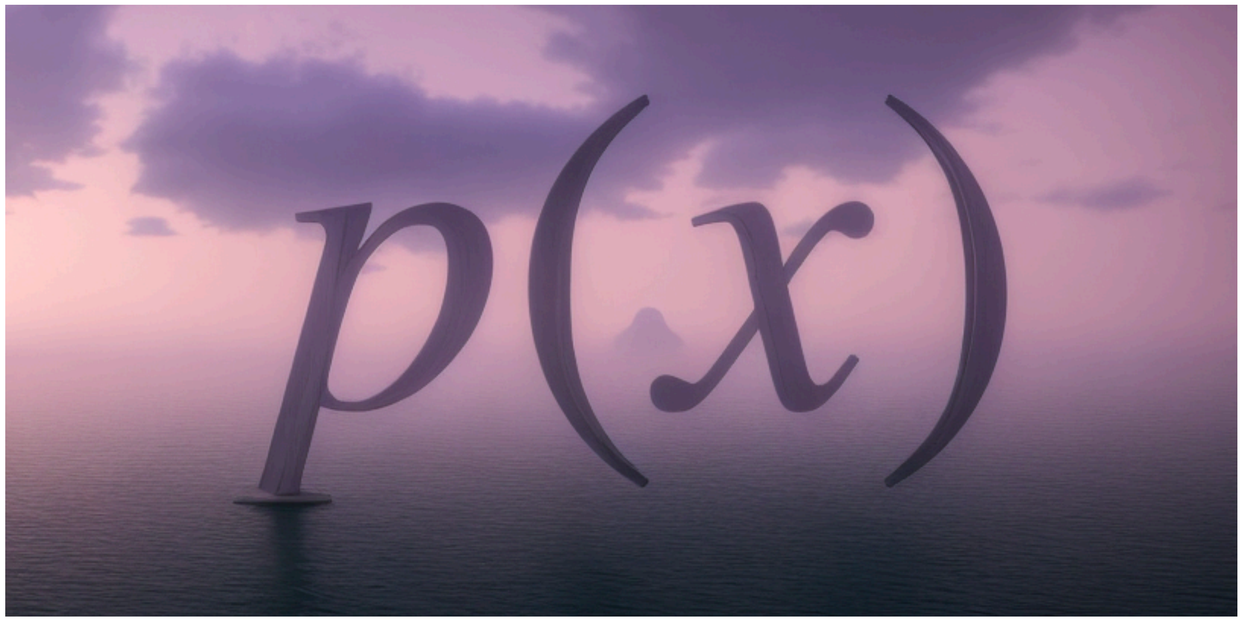
The *data distribution*



We often work with data distributions in physics

(modeled or empirical)

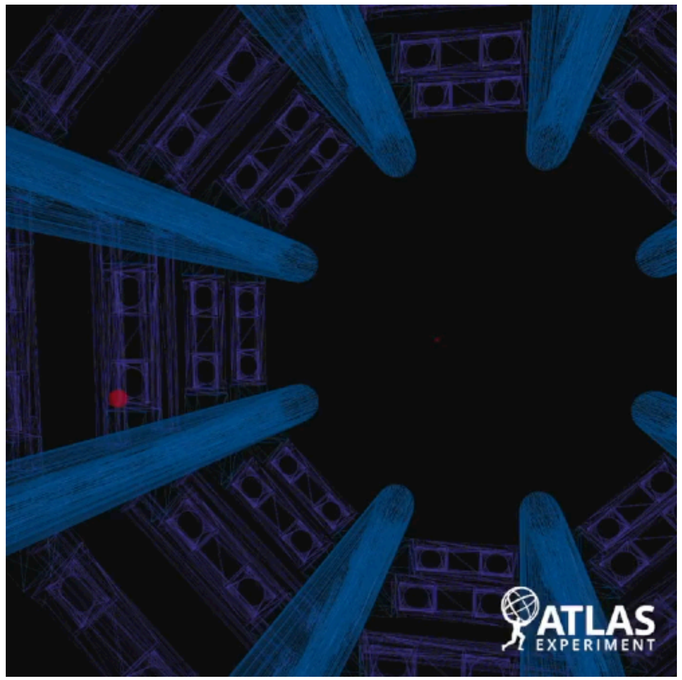
Simulators

$$x \sim p(x)$$

Simulators are ubiquitous: *they prescribe a way to sample from the data distribution*

Collider data

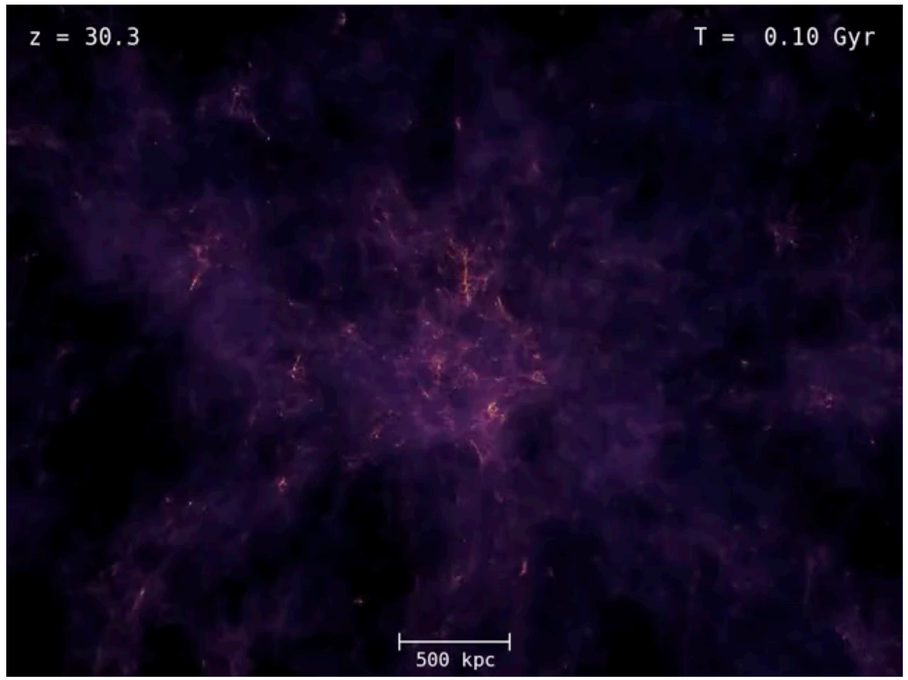
particles $\sim p$(particles)



[C. Cesarotti with ATLAS]

Cosmology data

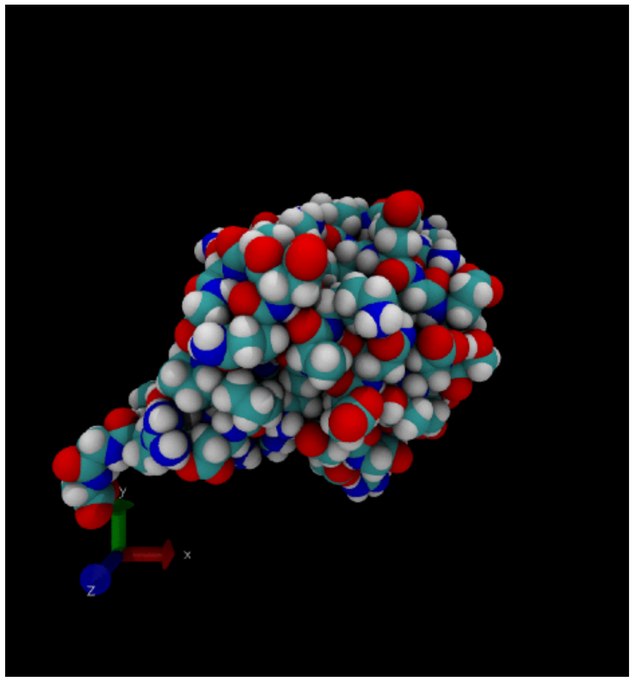
particles $\sim p$(particles)



[Aquarius simulation]

Molecular dynamics

configurations $\sim p$(configurations)



[E. Cances et al]