

# Cells as active particles

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# Project description

- Python
- 2D system of  $N$  particles
- Self-propelled particles
- Force between particles



# Physical Model

$$\dot{\mathbf{r}} = \mathbf{v} - \mu_t \nabla V(r)$$

$$\dot{\theta}_i = \sqrt{2D_r} \eta(t) + \frac{\gamma}{N_0} \sum_{j=1}^{N_0} \sin(\theta_j - \theta_i).$$

# Results

