Why epidemics come in bursts
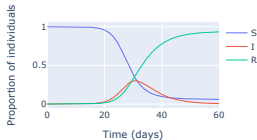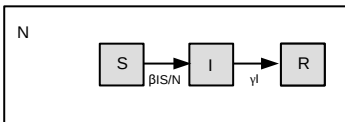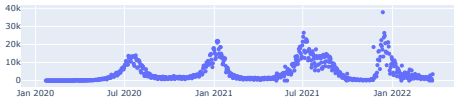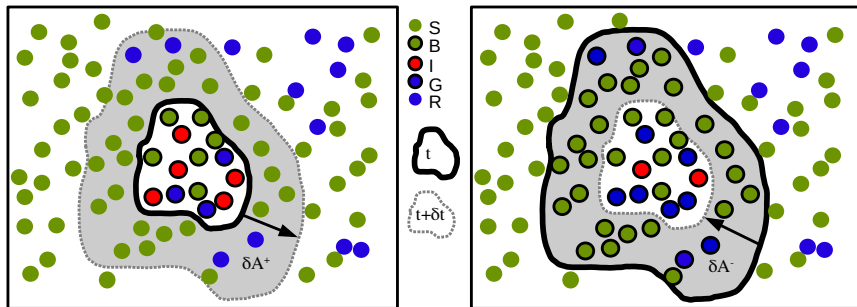
Wouter Bos, Louis Gostiaux, Jean-Pierre Bertoglio

$$\frac{dS}{dt} = -\beta \frac{SI}{N}$$

$$\frac{dI}{dt} = \beta \frac{SI}{N} - \gamma I$$

$$\frac{dR}{dt} = \gamma I$$

Can we improve the SIR Model in order to understand
the cyclic behavior of epidemics ?

Beware, you might be in the blob...

Blob-dynamics is key to understand periodic bursts.