# Epidemic related

**Revolutionary ideas as a disease model**

* Look at how revolutionary ideas spread throughout populations and try to describe them using a disease model. Similar to **SIR model for Religion/Cult conversion.**

**The perfect disease**

* What should a disease prioritize to: A. Wipe out humanity, B. Reproduce as much as possible.
* Infectivity/lethality.
* “Plague Inc like”.
* *Issues*: Way too many variables for this to work, would probably have to generalize to an extent where it becomes information-less. Might be ethical troubles with this one.

**SIR model for Religion/Cult conversion**

* Use known models (for example [Rambo’s Integrative Model](https://en.wikipedia.org/wiki/Psychology_of_religious_conversion)) for the stages of religion/cult conversion and make comparison to SIR-like model.
  + **S** “Susceptible”: Person is in a crisis (stage 2).
  + **E** “Exposed”: Person starts to integrate with the religion/cult (stages 2-5) but is not an active member.
  + **I** “Infected”: Person is a core member of the religion/cult and actively converts other people (stages 6-7).
  + **R** “Recovered”: Person leaves the religion/cult (not covered by Integrative Model).
* This could probably also be done agent based.
* *Issue*: Do we just end up making the Voter model but with a different context?

# Other scientific problems

**Voter model with revolutions.**

* Two opposing opinions (e.g. American two-party system) with values from e.g. -10 to 10.
* Usual voter model behaviour.
* Additionally, high “friction” increases chance of revolution.
  + Friction: Difference between extremes? Anecdotal: Revolutions happen because disagreement between extremes.
* Extremists create opposing extremists. Add dynamic that the extreme on one end pushes people on the other end to their extreme (positive feedback).
* Add option for new ideas to emerge? Maybe works better if 2d opinion?

**Religion/Cult conversion as a network model.**

* Look at South Korea for real life mechanics.

**Something similar to** [**Global food insecurity and famine from […] nuclear war soot injection**](https://www.nature.com/articles/s43016-022-00573-0)

* A “what if X” scenario, where X will be something dramatic like nuclear war.

**Effect of A.I. creating a class of unemployable people.**

* Predicted that A.I. soon will outclass humans in many jobs, meaning a large fraction of the population will be unemployable.
* *Issue:* Might not be very physics related.

# Hobby related problems

**Networks and how TTRPG players spread.**

* Text

**\*Something tactical\***

* A