

SCUDEM VIII 2023

Problem B: Punishing Infants

Researchers recently sought to examine the origins of the tendency to punish anti-social behaviors [1]. They found that infants as young as 19 months old have the capacity to want to punish others for how they interact with a third-party. The researchers claim that some infants have a propensity to try to discipline those who they believe are hurting others, and evidence is provided that this can occur even before language skills develop.

If we assume this is true, what does this imply about interactions in the broader society? Suppose that some proportion of people have an innate desire to react to third party transgressions by punishing those they perceive as acting out against others. What does that imply about interactions between people and what are the long-term dynamics for different proportions of people who desire different levels of punishment?

To examine this question, develop a model that includes different populations with different propensities to act out against those who interact aggressively towards others. How do the relative populations within the groups change over time? What factors impact the long-term stability of a society? Also, if other groups arise that have differing propensities to offer different kinds of corrective actions, what factors are important and how do they compare to situations where punishment is the dominant reaction? Incorporate various behaviours, especially options other than retribution, in your model and discuss the results in changes in these behaviours. If other options result in more favourable outcomes, provide a discussion on how your model may be adapted to demonstrate the efficacy of societal change and attitudes toward punishment.

Bibliography

[1] Kanakogi, Y., Miyazaki, M., Takahashi, H. *et al.* 2022. Third-party punishment by preverbal infants. *Nat Hum Behav* 6, 1234–1242. <https://doi.org/10.1038/s41562-022-01354-2> Last accessed 4 August 2023.