Sequential Investment Game

Game rules:

Invest a certain amount of money, you either win double your investment or lose it completely. How much of your money pool do you want to invest in order to maximize your expected win?

Research Question:

What investment policy maximizes the decision maker’s expectations for a given p for a finite number of players.

Reference:

„A Sequential Investment Game“ by Ryan Murphy (2011)

„A New Interpretation of Information Rate“ by J. L. Kelly, Jr (1956)

Research Methods:

We don’t know exactly how to model our simulation yet. In order to gather more coverage about this topic, we’re meeting up with Prof. Ryan Murphy this week. We’re trying to define exact rules for the investment game with N players, find initial conditions for the model and look for similar approaches/models already done.