Too much of a good thing?

The dynamics of trust and loyalty

We consider a repeated game between a seller and a buyer, in which due to private information and lack of flexible transfers, cooperation cannot be sustained efficiently. At random times, the buyer has a need arising for a good. When it arises, the buyer buys either from the seller (at an exogenous price) or takes an outside option. The value of the outside option is i.i.d. over time.

We consider three informational structures, depending on whether the opportunity to trade and value of the outside option are public or private information. When the buyer goes to the seller, the seller chooses how much effort to exert.

We find that in order to incentivize effort from the seller, the buyer needs to cooperate more than he would like to, regardless of the informational structure. When the value of the outside option is private information, agents oscillate between "almost" autarky and the Pareto frontier infinitely often