Title: A Dynamic Model of Crowdfunding

Abstract: Crowdfunding is quickly emerging as an alternative to traditional methods of funding new products. In a crowdfunding campaign, a seller solicits financial contributions from a crowd, mostly in the form of pre-buying a still-unrealized product, and commits to producing the product if the total amount pledged is above a certain threshold. We provide a model of crowdfunding in which consumers arrive sequentially and make decisions about whether to pledge or not. Pledging is not costless, and hence consumers would prefer not to pledge if they think the campaign will not succeed. This can lead to cascades where a campaign fails to raise the required amount even though there are enough consumers who want the product. The analysis of this collective action problem helps explain why some campaigns fail and some do not, and provides guidelines about how sellers should design their campaigns in order to maximize their chances of success.