Optimal priority pricing of durable goods

Joao Correia-da-Silva, University of Porto

Abstract

A durable goods monopolist proposes selling mechanisms to buyers with privately observed valuations in two periods, being unable to commit in the first period on the selling mechanism to propose in the second period. The monopolist is, however, able to commit not to discriminate buyers in the second period based on their first-period behavior (for example, by preserving buyer anonymity). Moreover, the monopolist is able to prevent resale.

It is shown that, although buyers have a continuum of possible valuations, the optimal first-period selling mechanism is a menu with at most two possibilities: a high price guaranteeing delivery; and a low price subject to rationing. This characterization is robust to the arrival of additional buyers in the second period. The optimal selling mechanism is fully characterized in the case of linear demand, with priority pricing being optimal if agents are sufficiently patient.