

Francois Salanie (Toulouse School of Economics)

“Water Allocation, Crop Choice, and Priority Services”

Rome, May 19th 2015

14,30—15,30

School of Economics— Building B, Room B, II floor

Abstract: We study the allocation of irrigation water under uncertainty. We compare uniform rationing, market pricing, and priority services. We show that uniform rationing is not only inefficient ex-post, but also ex-ante, as it drives farmers into choosing over-optimal exposure to the risk of drought. By contrast, we show that priority services (as in Wilson, ECMA 1989) may perform as well as a complete set of markets, while being a much simpler system.

“Stabilization and the control of catastrophes”

Rome, May 22nd 2015

10,30—11,30

School of Economics— Building B, Room B, II floor

Abstract: We set up a simple but general model in which a decision-maker controls a state variable at some cost. When the state variable passes a tipping point, a catastrophe occurs, and the game ends. The tipping point may be known, or uncertain. In each case, we characterize optimal paths, and we show that they are monotonic. Stabilization occurs when the state variable becomes a constant. We fully characterize solutions, and we discuss the role of uncertainty. We also extend our setting to take into account delays in the arrival of catastrophes.
