

# Reform

## Political Economics: Week 10

Giacomo A. M. Ponzetto

CREI – UPF – Barcelona GSE

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# The Agenda for Institutional Reform

- Priority for emerging economies: market reforms fostering entrepreneurship and the entry of new firms (De Soto 1999, Rajan and Zingales 2003).
  - ▶ Increase competition, allocative efficiency, and possibly innovation.
- Little consensus on which specific reforms should be undertaken with greater priority (IMF 2003, WB 2005).
  - ▶ What is the political feasibility of different reform paths?
- Caselli and Gennaioli (2008) focus on the role of political constraints in transition economies and developing countries.
- Key problem: compensating or weakening powerful insiders who stand to lose from more entry and competition and can hinder reform.

# Deregulation, Financial Reform, and Entry

- Deregulation facilitates entry in product markets by reducing bureaucratic setup costs.
  - ▶ Lower setup costs and fewer opportunities for corruption foster entry (Djankov et al. 2002).
- Financial reform improves the ability of agents to borrow and lend.
  - ▶ Improvements in the protection of creditors and minority shareholders (La Porta et al. 1998).
  - ▶ Changes in the regulation of intermediaries and in the quality of enforcement (Glaeser, Johnson and Shleifer 2001).
  - ⇒ Better regulation of financial markets fosters entry by allowing potential entrepreneurs to raise the funds required to start a new business (Banerjee and Duflo 2005).
- These reforms have been thought to yield similar economic and political consequences (Perotti and Volpin 2007).

# Economics and Politics of Liberalization

- Market-opening reform cannot be assessed by looking only at the partial-equilibrium incentive for entry.
- Crucial general-equilibrium implications work through the *market for control* where *incumbent firms* are traded.
- The market for control determines the distributional effects of different reforms:
  - ① *Entrepreneurship* effect on the number of entrants.
  - ② *Meritocracy* effect on the quality of management.
- The similarity between deregulation and financial reform breaks down:
  - ① Deregulation only increases entrepreneurship.
  - ② Financial reform also increases meritocracy, which may lead to a net decrease in entrepreneurship.
- Financial reform is more politically viable because it endogenously compensates incumbents.

## Economic Environment

- A static economy with measure one of wealthless agents who supply inelastically one unit of labour.
- A fraction  $\lambda < 1$  have managerial talent 1 and the rest  $g^\alpha < 1$ .
- A firm with managerial talent  $\theta_i$  and workforce  $L_i$  produces

$$Y_i = \theta_i L_i^{1-\alpha} \text{ with } \alpha \in (0, 1).$$

- Managers are counted in the workforce of their firm.
- Each agent has a project to create a firm. To implement the project and create the firm, a government-issued licence is required.
- A fraction  $\eta$  of agents are *incumbents* and own a licence.
- Incumbency and managerial talent are uncorrelated.
  - ▶  $\lambda\eta$  incumbents are talented managers,  $(1 - \lambda)\eta$  are untalented.
  - ▶ Inheritors of family firms or former bureaucrats.

# The Selection of Managers

- Outsiders can start a new firm in the *entry market* at a cost  $\varepsilon = k + r$ .
  - ① An exogenous real investment  $k$  must be sunk.
  - ② The government demands a licensing fee  $r$ , which provides a measure of competition policy.
- Outsiders can buy a firm from an incumbent in the *market for control*
  - ▶ Existing firms are traded at an endogenous price  $p$ .
  - ▶ In equilibrium, untalented incumbents sell to talented outsiders.
  - ▶ The separation of ownership and control would be analogous.
- Potential entrants can borrow from foreign lenders.
  - ▶ Perfectly elastic supply of funds.
  - ▶ Interest rate normalized to zero.
- Firms pay competitive wages  $w$  and earn profits  $\pi$
- Financial frictions imply that only a fraction  $\phi$  of profits can be repaid to creditors.

## Labour-Market Equilibrium

- Entrepreneurship is measured by the number of firms  $f \in [0, 1]$ .
- Meritocracy is measured by the share of firms  $s \in [0, 1]$  run by talented managers.
- Each firm creates labour demand

$$L_i(w, \theta_i) = \arg \max_L \{ \theta_i L_i^{1-\alpha} - wL_i \} = \left[ \frac{(1-\alpha)\theta_i}{w} \right]^{\frac{1}{\alpha}}.$$

- Aggregate labour demand is

$$L^D = \left( \frac{1-\alpha}{w} \right)^{\frac{1}{\alpha}} f [s + (1-s)g].$$

- The market-clearing wage is

$$w(f, s) = (1-\alpha) f^\alpha [s + (1-s)g]^\alpha.$$

# The Division of Revenue

- Aggregate output is

$$Y(f, s) = f^\alpha [s + (1 - s)g]^\alpha.$$

- ▶ The wage bill is a constant share  $(1 - \alpha)$  of output.

- Firms run by talented managers earn profits

$$\pi^H(f, s) = \alpha f^{\alpha-1} [s + (1 - s)g]^{\alpha-1}.$$

- Firms run by untalented managers earn profits

$$\pi^L(f, s) = g\pi^H(f, s).$$

- Increases in  $f$  and  $s$  increase output and wages but reduce profits.



# The First Best and Initial Conditions

- Efficiency is measured by net output  $Y(f, s) - (f - \eta)k$ .
  - ▶  $r$  is a distributive transfer to bureaucrats and politicians.
- The first best is reached in the absence of frictions.
  - ▶ No financial frictions:  $\phi = 1$ .
  - ▶ No barriers to entry:  $\varepsilon = k$ .

A.1. Firms need to be created:  $\eta < \lambda < 1$ .

- ▶ Talent is abundant relative to the number of firms.

A.2. All and only the talented should manage firms:  $k = \alpha\lambda^{\alpha-1}$ .

- ▶ The market for control matters for  $k > g\alpha[\lambda + (1 - \lambda)\eta g]^{\alpha-1}$ .

⇒ In the first best  $f^* = \lambda$  and  $s^* = 1$ .

⇒ Initial inefficiencies  $f_0 = \eta < \lambda$  and  $s_0 = \lambda < 1$ .

## The Entry Market

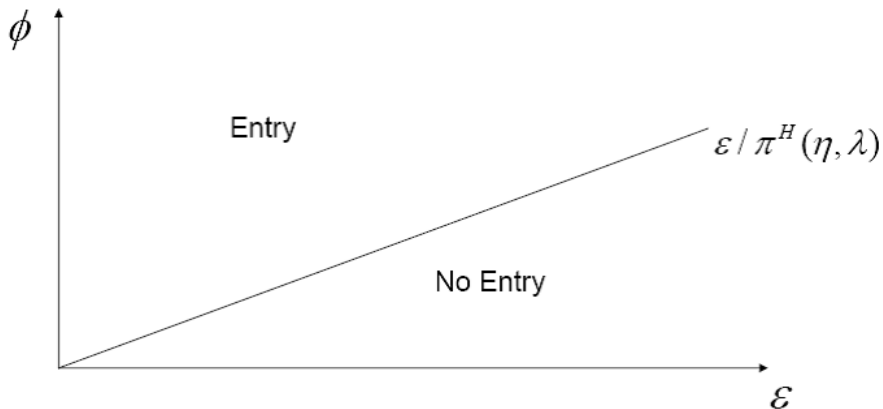
- Talented outsiders can set up new firms if they can promise repayment to foreign lenders:  $\pi^H(f, s) \geq \varepsilon/\phi$ .
- When talented outsiders can start new firms, they want to.
- Untalented outsiders never want to start firms thanks to A.2.
- On the entry market, barriers to entry  $\varepsilon$  and financial frictions  $1/\phi$  affect entrepreneurship identically.

### Theorem

*When there is no market for control, for every  $(\phi, \varepsilon)$  there is a unique equilibrium  $(f, s)$ . The equilibrium involves no entry if and only if  $\varepsilon/\phi > \pi^H(\eta, \lambda)$ .*

- Meritocracy and entrepreneurship are (weakly) decreasing in  $\varepsilon/\phi$ .
- Deregulation and financial reform increase social welfare but cannot attain the first best.

# Equilibrium with an Entry Market Only



# The Market for Control

- A sale from an untalented incumbent to a talented outsider generates surplus  $\pi^H - \pi^L > 0$ .
- Trade is possible if there is a price that the untalented incumbent is willing to sell and that the talented outsider can finance by borrowing from foreigners  $p \in [\pi^L, \phi\pi^H]$ .
- Since  $\pi^L = g\pi^H$ , a feasible price exists if and only if  $\phi \geq g$ .
- An active market for control requires sufficient creditor rights.
- When the market for control is open, untalented incumbents are always willing to sell at  $p = \varepsilon$ , because  $\pi^L = g\pi^H < \phi\pi^H \leq \varepsilon$ .
  - ▶ The last inequality follow from A.2.

## The Interaction between the Two Markets

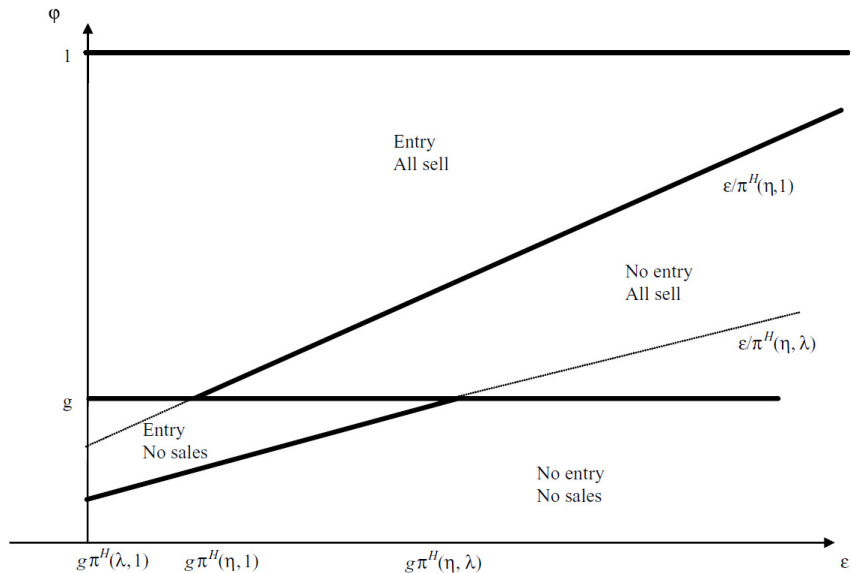
- Two-fold distinction: Entry or No Entry; All Sell or No Sales.

### Theorem

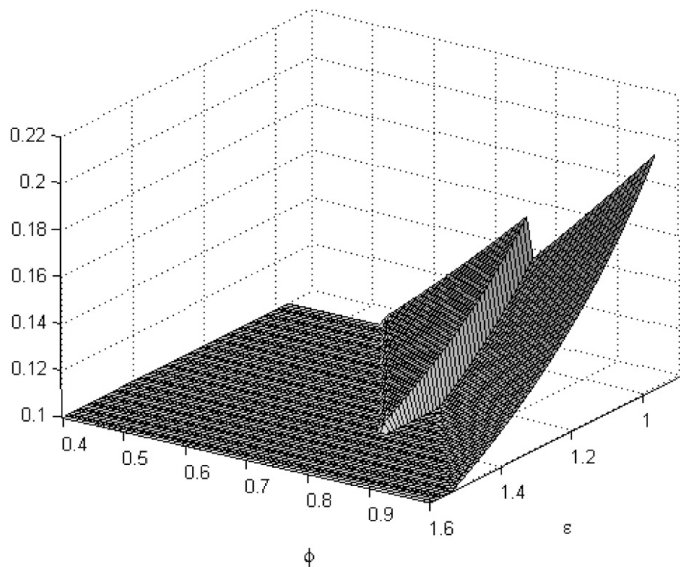
*For every  $(\phi, \varepsilon)$  there is a unique equilibrium  $(f, s)$ . If  $\phi < g$  the equilibrium involves no sales, and entry if and only if  $\varepsilon/\phi \leq \pi^H(\eta, \lambda)$ . If instead  $\phi \geq g$  all untalented incumbents sell their licences, and there is additional entry if and only if  $\varepsilon/\phi \leq \pi^H(\eta, 1)$ .*

- Deregulation of entry increases entrepreneurship and meritocracy.
- Financial reform can trigger a discrete jump in meritocracy to the first-best level  $s^* = 1$ .
  - 1 For high values of  $\varepsilon$ ,  $\phi > g$  allows firms to change hands without changing their number.
  - 2 For low values of  $\varepsilon$ ,  $\phi > g$  reduces the number of firms, because talented purchasers crowd out talented entrepreneurs.

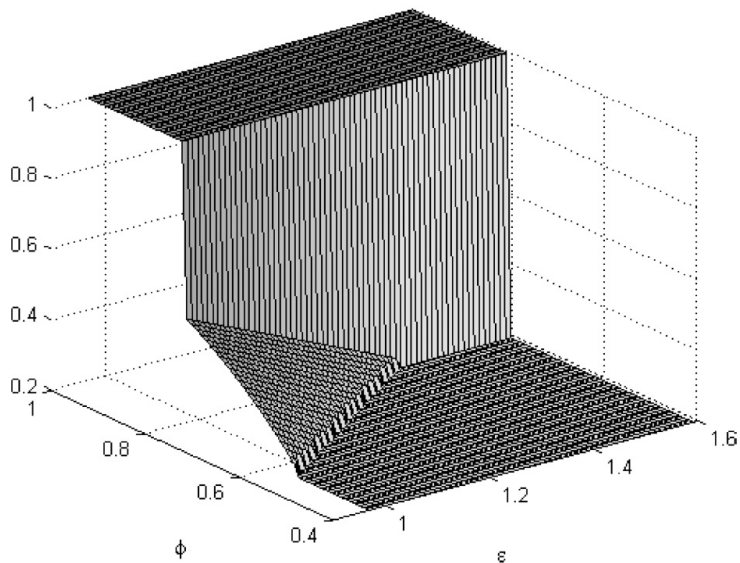
# Equilibrium with a Market for Control



# Institutions and Entrepreneurship



# Institutions and Meritocracy





## Political Economy of Reform

- The first best is attained only for  $\varepsilon = k$  and  $\phi = 1$ .

A.3. The economy starts from a status quo with neither entry nor sales.

- Without political frictions, the optimal reform strategy follows a big-bang approach.
- Which sequence of reforms faces the least political opposition?

### Theorem

*When there is no market for control any pro-market reform (weakly) benefits outsiders and hurts talented incumbents. Untalented incumbents are (weakly) hurt unless  $\lambda > g$  and  $\eta \geq \eta^*$ .*

- Without a market for control, both reforms merely increase entry.
- Untalented incumbents may prefer higher wages and lower profits if the incumbency rents are very low.

# Compensation of Incumbents

A.4. The price in the market for control maximizes sellers' payoffs.

## Theorem

*Any pro-market reform (weakly) benefits outsiders and hurts talented incumbents. Any deregulation (weakly) hurts untalented incumbents. There exists  $\tilde{\varepsilon}_1 \in [k, \pi^H(\eta, 1)]$  such that for  $\varepsilon \leq \tilde{\varepsilon}_1$  any financial reform (weakly) hurts untalented incumbents, and for  $\varepsilon > \tilde{\varepsilon}_1$  full financial reform ( $\phi = 1$ ) benefits them.*

- Deregulation of entry reduces the profits of all incumbent firms.
  - Financial reform also does, but additionally it lets untalented incumbents internalize some of the efficiency increase.
    - ▶ The latter effect may dominate for all  $\varepsilon > k$ .
- ⇒ A “swing” constituency for reform: financial reform is more feasibly than deregulation.
- ▶ Its feasibility is increasing in  $\varepsilon_0$ .

## Direct Democracy

- The political feasibility of a reform is increasing in the number of agents who benefit from it.

### Corollary

*When there is no market for control, financial reform and deregulation have the same political feasibility. When the market for control exists:*

- 1 *financial reform is always at least as politically feasible as deregulation, and strictly more feasible for at least some parameter values.*
  - 2 *The political feasibility of financial reform is increasing in  $\varepsilon_0$ .*
- “Coasian” reforms that foster private contracting are more likely to be politically viable than purely rent-dissipating reforms.
  - The winners may be able to compensate the losers through the market, rather than through (rarely feasible) political buy-outs.

## The Sequencing of Reforms

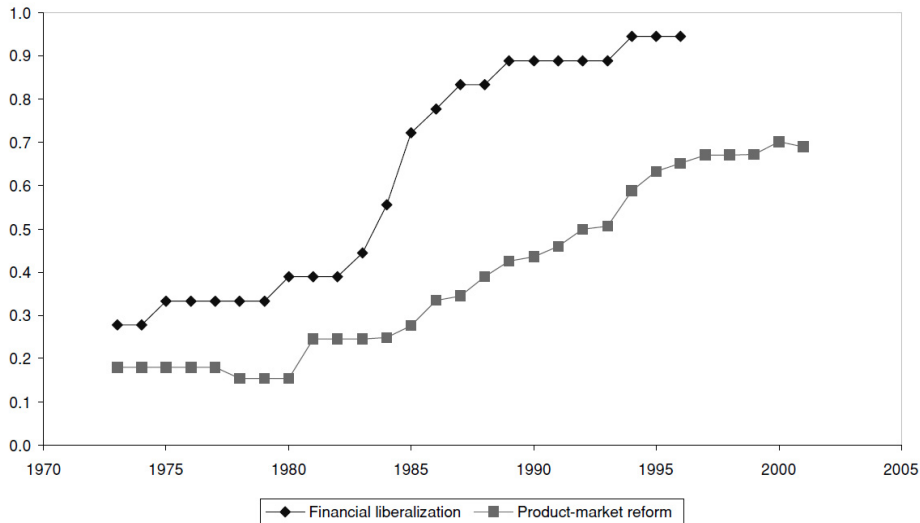
- The feasibility of financial reform can be increased by a simultaneous increase in entry barriers.
- A gradual reform path involves immediate and complete financial reform ( $\phi = 1$ ) but full deregulation ( $\varepsilon = k$ ) at a future date  $t^*$ .

### Theorem

*There exists  $\tilde{t} > 0$  such that the political feasibility of the dynamic reform path is nondecreasing in  $t^*$  for  $t^* \leq \tilde{t}$ , and strictly increasing for at least some parameter values.*

- Untalented incumbents oppose big-bang reforms which reduce their rent to  $k$
- If deregulation is delayed, its negative impact on the value of a licence is reduced.
- Untalented incumbents support a package of gradual reforms that lets them sell their firm while it is still valuable.

# Financial Reform and Deregulation in OECD Countries



## Delayed Stabilization

- Countries often follow policies that are recognized to be unsustainable in the long run.
- *Stabilization* refers to a major fiscal adjustment that significantly reduces budget deficits and/or stops high and variable inflation.
- Alesina and Drazen (1991) explain the timing of macroeconomic reform with political stalemate over its distributional consequences.
  - ▶ Who bears the burden of necessary tax increases and expenditure cuts?
- Stabilization coincides with political consolidation: one side becomes politically dominant.
  - ▶ The allocation of the burden is often quite regressive.
- Successful reforms are usually preceded by several failed attempts.

# War of Attrition

- Runaway growth of government debt (relative to GDP) must be stopped. No disagreement on the need for reform.
- Different social groups fight over the allocation of the costs of stabilization through a reform package.
- Uncertainty about which group is stronger.
  - ▶ Strength is the ability to withstand the costs of waiting.
  - ▶ Economic costs: inflation, macroeconomic instability
  - ▶ Political costs: lobbying, strikes, etc.
- Each group tries to wait out the others before conceding.
- The passage of time reveals which group is the strongest and can impose its preferred stabilization package.
- Delay causes aggregate inefficiency, but results from individually rational strategies.

# Comparative Statics

- 1 The passage of time alone increases the probability of stabilization.
  - ▶ Reforms may become feasible although nothing observable happens.
- 2 Crises induce reform (Drazen and Grilli 1993).
  - ▶ Negative shocks can be welfare improving.
  - ▶ Asymmetric shocks that weaken one group in particular are more likely to make it concede quickly.
- 3 Political institutions that grant more veto powers delay stabilization.
  - ▶ An unconstrained executive reforms at the opposition's expense.
- 4 Political consolidation facilitates stabilization.
  - ▶ Reform is more likely at the beginning of the electoral cycle.
- 5 External inducement can cut both ways
  - ▶ IMF conditionality or EU requirements increase the cost of delay.
  - ▶ Foreign aid can harm by reducing the pressure to reform.



## Crisis and Stabilization

- Empirically, it is difficult to disentangle causality from tautology: reform is needed when current policy fails, i.e., in a crisis.
- The best evidence concerns inflation and hyperinflation (Drazen and Easterly 2001).
- Ranking reversal: the countries in the lowest decile of performance move up in the ranking when they stabilize.
- Episodes of extremely high inflation are followed by periods of better performance than that following episodes of moderately high inflation.
  - ▶ The same result holds for the black market premium.
  - ▶ It does not hold for the current account deficit, the budget deficit, or a negative growth rate of GDP per capita.
- Deficit reduction policies in OECD countries are less contractionary when public debt is high and growing (Perotti 1999).
  - ▶ Stabilization of hyperinflation can be expansionary (Easterly 1996).

# Institutions and Stabilization

- Parliamentary systems and proportional representation are associated with larger deficits.
  - ▶ Coalition governments in OECD countries had larger deficits in the '70s and '80s and were slower to respond to negative shocks.
  - ▶ Institutional constraints on the executive are associated with more delayed and less successful stabilizations (Hamann and Prati 2002).
- Political budget cycles: deficits rise close to elections.
  - ▶ More common in democracies that are less established and have less freedom of the press.
  - ▶ Pre-electoral deficits do not seem to help the incumbent.
- Little solid evidence on external inducements.
  - ▶ The criteria for entry joining the Euro seemed to work—or did they?
  - ▶ The effects of aid are a controversial and hugely political topic.
  - ▶ The same goes for IMF conditionality.
  - ▶ On the whole, there does not seem to be a robust effect.

## Who Adjusts and When?

- Alesina, Ardagna, and Trebbi (2006) focus on the interaction between indicators of crisis and institutional variables.
  - ▶ Crisis means being in the worst quartile for the deficit-GDP ratio ( $> 4.75\%$ ) or inflation ( $> 14.05\%$ ).
- ① Stronger governments stabilize more in time of crisis.
  - ▶ Presidential systems, and among parliamentary systems those in which the majority is larger and not fragmented in several coalition parties.
- ② Electoral cycle: crisis generate more response after an election and far from the next one.
- ③ The presence of an IMF program in a crisis does not seem to generate a stronger response.
  - ▶ Substantial problem of reverse causation.