# 8.10 8.11 Social Unrest - Elements of the Model ~ alpha is 0

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- Everyone prefers unidirectional reform
- $i \in [0,1]$ index propensity to protest
  - expressing voice
  - maybe not peacefully
  uniformly distributed
- Payoffs $\alpha_i$ if protest, $\alpha > 0$
  - let $x$ = fraction that protests
  - $\mu = E(x)$, beliefs
  - everyone gains $\beta(x-\lambda)$
  - Protesters gain $\delta(x-\lambda)$
  - non Protestors gain $\gamma(\lambda - x)$

$u_i(P,x) = \alpha_i + \beta(x-\lambda) + \delta(x-\lambda) \rightarrow$ Pro-est
$u_i(H,x) = \gamma(\lambda - x) + \beta(x-\lambda) \longrightarrow$ stay home

$u_i(P,\mu) > u_i(H,\mu)$

$\alpha_i + \delta(\mu - \lambda) > \gamma(\lambda - \mu)$
$\alpha_i > (\gamma + \delta)(\lambda - \mu)$

$i > (\gamma+\delta)/\alpha \cdot (\lambda - \mu)$

↳ $\alpha = 0$
$0 > (\gamma+\delta)(\lambda-\mu)$
suppose $\lambda > 1 \Rightarrow \mu = 0$

now $\lambda \downarrow$ $\lambda < 1$

History + Current events coordinate

$i$ protests if $i > (\delta+\gamma)/\alpha \cdot (\lambda - \mu)$

$a = (\delta+\gamma)/\alpha$