

## Gasto fijo e impuestos al ingreso:

- Gasto  $G$  es fijo y exógeno,  $\Omega = 0$
- Gobierno grava el ingreso a una tasa  $\tau$ :

$$G = \tau y^*$$

restricción presup. gobierno

$\tau$  es endógena y depende de la actividad económica.

- Problema del planificador central modificado:

$$\max_{c, l} \ln c + \delta \ln(H-l) + \gamma \ln G \quad \text{s.a.} \quad c = (1-\tau)f(l)$$

En eq:  $G = \tau y^* = \tau f(l^*)$

$$\mathcal{L} = \ln c + \delta \ln(H-l) + \gamma \ln G + \lambda \left( (1-\tau)f(l) - c \right) \quad \left\{ \begin{array}{l} \text{cond.} \\ \text{eficiencia} \end{array} \right.$$

$$[c]: \frac{1}{c} = \lambda$$

$$[l]: \frac{\delta}{H-l} = \lambda(1-\tau)(1-\alpha)Al^{-\alpha}$$

$$[\lambda]: c = (1-\tau)Al^{1-\alpha}$$

$$c = Al^{1-\alpha} - \tau Al^{1-\alpha} = G$$

$$\Rightarrow c = Al^{1-\alpha} - G \quad \left\{ \begin{array}{l} \text{cond. de} \\ \text{factibilidad} \end{array} \right.$$

$$\frac{\partial c}{\partial (H-l)} = (1-\tau)(1-\alpha)Al^{-\alpha}$$

$$\frac{\partial (y-G)}{\partial (H-l)} = (1-\tau)(1-\alpha)Al^{-\alpha} \cdot \frac{\partial l}{\partial (H-l)}$$

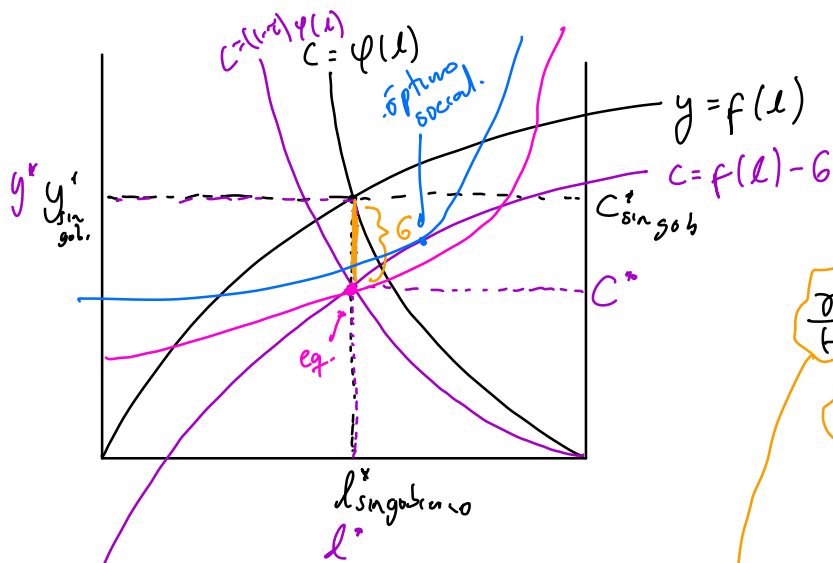
$$y-G = y - \tau y = (1-\tau)y$$

$$\frac{\tau(1-\tau)y}{H-l} = (1-\tau)(1-\alpha) \cdot \frac{y}{l}$$

$$\frac{\delta}{H-l} = \frac{(1-\alpha)}{l} \quad \Leftrightarrow \quad \delta l = (1-\alpha)(H-l)$$

⋮

$$l^* = \frac{(1-\alpha)H}{1-\alpha + \delta}$$



$$c = f(l) - G$$

$$\frac{\partial c}{\partial l} = (1-\tau)(1-\alpha)A l^{-\alpha}$$

$$c = (1-\tau) \frac{H-l}{\delta} (1-\alpha)A l^{-\alpha}$$

$$c = (1-\tau) \varphi(l)$$

$$TMS = (1-\tau) f'(l)$$

El pendiente de restricción de factibilidad  $f'(l)$