2-01_chapter2

2021 年 10 月 3 日

1 Introduction

2 CLASSICAL MONETARY MODEL (古典モデル)

Hypotheses:

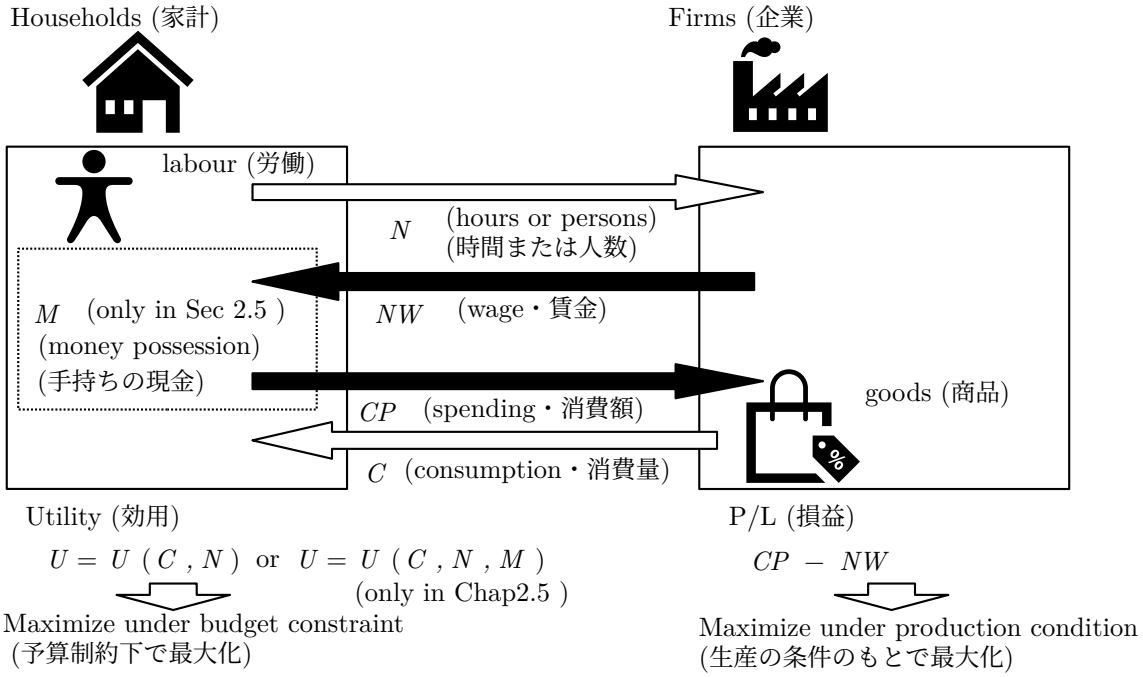
- Perfect competition in goods & labour markets (商品・労働市場共に完全競争)
- Fully flexible prices in goods & labou (商品・労働市場共に完全な伸縮性価格)

additionally

- unique goods and investment instrument (単一の商品、単一の投資対象)

Role of money:

- ~Sec 2.4: just a unit of account (お金の単位に過ぎない)
- Sec 2.5~: affects a utility of household (家計の効用に影響)



Schematic representation of Classical Monetary Model

2.1 Households (家計)

Identical and many (同一の世帯が多数ある)

Utility function at t=0 (t=0 での効用関数、家計はこの最大化を目指して行動する)

$$\Upsilon_0 = \mathbb{E}_0 \left[\sum_{t=0}^{\infty} \beta^t U(C_t, N_t; Z_t) \right] \tag{1}$$

where Υ is upsilon (ウプシロン、U に対応するギリシア文字)
- C_t: consumption of goods, all goods are identical (商品の消費数、全ての商品は同一とする)
- N_t: amount of work (working hours or the number of working persons) (労働の量、つまり労働時間または労働者の人数)
- Z_t: degree of preference of consumption and leisure(whole time-working hours) (消費と休暇 (= 全時間-労働時間) の選好度)
  - $Z_t = 0$ →no desire of consumption or leisure(消費欲も休暇欲も無し)
  - $Z_t = \infty$ →unlimited desire of consumption and leisure(消費欲も休暇欲も無限大)
- β (= $\exp(-\rho)$): discount factor (割引率)
- ρ: constant risk-free rate (無リスク金利)

Remark: Discount factor (割引率)
Suppose you have \$1 now. If you invest the \$1 to a risk-free bond, you will have $\$1 \times (1+\rho)$. Therefore,

$$[\$1@(t=0)] = [\$(1+\rho)@(t=1)] \tag{2}$$