Bureaucracy

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Economic Theory of Bureaucracy

- Bureaucracies: Organizations of civil servants, such as the Swiss department of defense or a states civil engineering office, carrying out the services of government.
- Bureaucrats hold the monopoly over the production of public goods
- Production function is unobservable to the parliament/voter
- Only the service level (C) is observable
Modeling Bureaucracy decisions

- Monopoly + Private information => usually large inefficiencies
- But bureaucrats cannot maximize profits
  - Each bureau is conceded a budget to produce the required services
- What is the then the optimization decision of a bureaucrat?
  - Budget maximization B(C) (Niskanen (1971))
  - Maximization of organisational slack (X-inefficiency) (e.g. Wyckoff (1990))
Offered levels of $Q$

- Depending on whether the constraint is binding, choice of $Q$ is determined by one of the two FOCs:

\[
B'(Q) = \frac{\lambda}{1+\lambda} C'(Q) \quad \text{(Demand-constrained bureau)}
\]
\[
B(Q) = C(Q) \quad \text{(Budget-constrained bureau)}
\]

- The first implicit solution applies if demand in $Q$ is restricted.
- The second implicit solution applies if Budget $B$ is restricted.
The economic theory of the bureaucracy

- Bureaucrat receives budget $B$ in depending on service level $Q$
- $B = B(Q)$ with $B' > 0$, $B'' < 0$
- Costs of service provision: $C(q)$, with $C'(Q) > 0$, $C''(Q) > 0$
- Funder observes only total output $Q$ and its budget, information over $C(q)$ is not revealed. Optimization of the bureaucrat is hence:

$$\max_{Q} B(Q) + \lambda (B(Q) - C(Q))$$
Budget-constrained Choice

Demand-constrained Choice

Value ($)

Quantity (Q)

C(Q)

B_Q

B_b(Q)