Discretionary Policy under Fiscal Decentralization: A Cross-Country Analysis

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Abstract

This paper examines the impact of fiscal decentralization on discretionary fiscal policies, focusing on how central and subnational entities respond to negative output gap shocks and their effectiveness. Through a cross-country analysis from 1990 to 2021 across 37 countries, two key findings have been generated. First, countries with greater decentralization experience reduced fluctuations in discretionary expenditures, supporting the claim that highly decentralized nations impose budgetary constraints on central governments. Second, there is a correlation between decentralization and fluctuations in subnational discretionary spending, with increased autonomy leading to more spending changes. However, these increased expenditures have limited or even adverse effects on the output gap, possibly due to the lack of coordination among subnational governments. These findings provide empirical evidence of negative externalities associated with fiscal decentralization.

Theoretical Context

- Can there be too much decentralization of fiscal authority?
 - Focus: fiscal decentralization with transfer dependence
- Theory claims subnational governments do not stabilize (Prud'Homme) (1995)):
 - Balanced budget rule
 - Subnational agency
- Two potential channels through which decentralization affect discretionary policie of the central government:
 - Central budget constraint
 - (Partial) offset of central policy

Literature and Contribution

1. Macroeconomic impact of fiscal federalism: Oates (1972), Broadway et. al. (2009), Martinez-Vazqzez et al. (2017)

Identification and Empirical Model

- Two seperate measures for fiscal decentralization:
 - Expenditure ratio (for instance in Martinez-Vazquez et al. (2010))
 - **Regional Authority Index** by *Hooghe et al. (2010)*
- Identification of discretionary spendings:
 - Following Alesina and Ardagna (1998) and Carnazza et al. (2020)
 - Define $G_{i,t}$ as gov. spending and $U_{i,t}$ as level of unemployment

 $G_{i,t} = \rho_0 + \rho_1 U_{i,t} + \rho_2 t + \nu_{i,t}$ $\widehat{G}_{i,t}(U_{i,t-1}) = \widehat{\rho}_0 + \widehat{\rho}_1 U_{i,t-1} + \widehat{\rho}_2 t \quad \text{s.t.}$ $\mathcal{G}_{i,t} := (\widehat{G}_{i,t}(U_{i,t-1}) - G_{i,t-1})/Y_{i,t-1}$

where $Y_{i,t-1}$ defines lagged GDP

Impulse responses:

- Gov. Spending: $\Delta_h \mathcal{G}_{i,t+h} = \beta_{1,1}^{(h)} \mathcal{Y}_{i,t-1} \times \text{Dec}_{i,t-1} + \beta_{2,1}^{(h)} \mathcal{Y}_{i,t-1} + \beta_{3,1}^{(h)} \text{Dec}_{i,t-1}$
- Fiscal federalism and central budget constraints: *Prud'Homme* (1995), Tanzi (1995), Qian & Roland (1998)

Empirical study of effects on discretionary fiscal policy

2. Measurement of fiscal federalims: Blume & Voigt (2011), Baskaran et al. (2016), Martinez-Vazqzez et al. (2017)

Novel methods to identify fiscal decentralization

3. Subnational discretionary spending: Chodorow-Reich (2019), Pappa et al. (2021)

Identification of discretionary multi-level government spending

 $+ \delta_{i}^{(h)} + \rho t + \text{Controls} + \varepsilon_{i,t+h}$ **Output Gap:** $\Delta_h \mathcal{Y}_{i,t+h} = \eta_{1,1}^{(h)} \mathcal{G}_{i,t} \times \text{Dec}_{i,t} + \eta_{2,1}^{(h)} \mathcal{G}_{i,t} + \eta_{3,1}^{(h)} \text{Dec}_{i,t}$ $+ \delta_{i}^{(h)} + \rho t + \text{Controls} + \varepsilon_{i,t+h}.$ where $\Delta_h \mathcal{G}_{i,t+h} = \Delta \mathcal{G}_{i,t+h} - \Delta \mathcal{G}_{i,t+1}$ and $\Delta_h \mathcal{Y}_{i,t+h} = \Delta \mathcal{Y}_{i,t+h} - \Delta \mathcal{Y}_{i,t+1}$

Selected Results

Figure 2: Cummulative responses for central discretionary spending and output gap

Reported results for expenditure ratio $\alpha_{i,t} := \text{Dec}_{i,t}$

