

Elections and the Response to Crises: Evidence from the COVID-19 Pandemic

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Abstract

How do elections shape policy making during a crisis? The Covid crisis offers a unique opportunity to examine this issue in the context of a homogeneous and contemporaneous shock. We find that closer elections predict more generous fiscal packages and less restrictive containment measures. Exploring the heterogeneity in containment measures, we find that elections reduce restrictions that impact economic activity the most.

Keywords: Crises, Elections, Fiscal, Pandemic.

JEL: D78, H12, H15.

1. Introduction

The Covid-19 crisis offers an unfortunate but unique opportunity to compare policy making in the face of a homogeneous and contemporary shock. A longstanding literature has studied the impact that elections have on the response to crises (e.g. Alesina and Drazen, 1991; Grilli et al., 1991; Satyanath, 2005; Lipsky, 2020; Flores and Smith, 2013). Empirical investigations of such questions usually face challenges due to the heterogeneity in the nature and timing of crises across countries. We explore this question in the context of countries' economic and social response to the first Covid-19 wave, during which countries had to make comparable choices between limited tools.

We find that closer elections predict significantly larger fiscal stimulus. We also find that closer elections consistently predict weaker containment measures. The magnitude of the election effect is significantly larger for measures that reduce economic activity the most.

While the literature on political budget cycles find that such cycles have moderated over the decades (Drazen, 2000), we find that electoral incentives have a predictive power on policy response in the face of a major crisis. Arguably, in the face of an unprecedented level of uncertainty posed by the pandemic, the electorate is less likely to be able to distinguish policy needs from politically motivated policies (Stiglitz, 2020). Further, transfers, which constituted a substantial share of the fiscal stimulus, are known to have a more consistent political payoff (e.g. Manacorda et al., 2009). The welfare effect of closer elections is however uncertain. It is possible that governments facing elections moved policy making along the indifference curve. It is also plausible that elections improved lockdown at the intensive margin.

2. Data

We explore the containment response to the crisis, using data made available by Hale et al. (2020). We use data on fiscal measures passed as of September 2020 published by the IMF. We also hand-collected such data, as of three months (June 15) after the official start of the pandemic.

We collect data on election dates in each country. We focus on the election of the executive branch. Therefore, we use parliamentary elections for parliamentary and semi-presidential systems, and presidential election for presidential systems. Based on this information, we create a measure called “Time to Election” (TTE) that indicates the number of years to the next election.

3. Empirical Methodology

Let Y_i denote the policy measure in country i , our baseline regression takes the following form:

$$Y_i = \alpha + \mu_j + \beta \vec{X}_i + \theta_1 Polity_i + \theta_2 TTE_i + \theta_3 Polity_i \times TTE_i + \epsilon_i \quad (1)$$

where μ_j is a dummy for each region and X is a vector of controls that are relevant to the policy measures in question. Infections per capita (per 10,000), GDP per capita, Polity, TTE and a dummy for parliamentary systems are control variables common to both regressions.

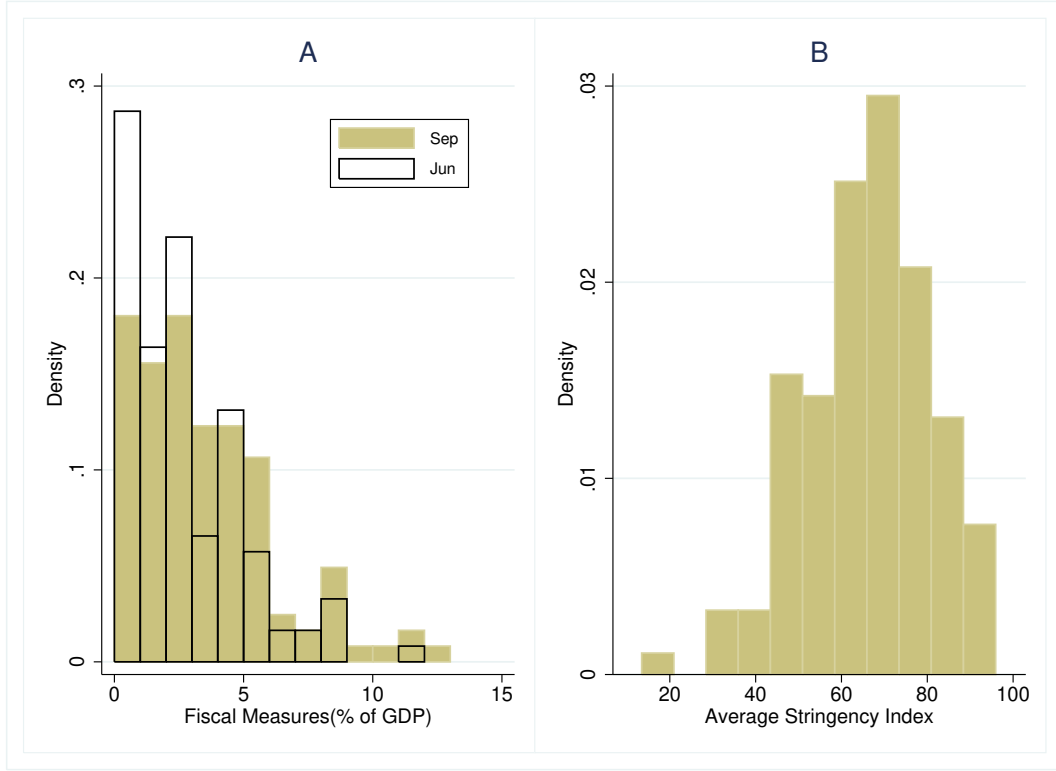


Figure 1: **The distribution of fiscal and containment measures across countries.**

The regression exploits the exogenous heterogeneity in TTE to explore the role of elections. As is common in the literature (e.g. Brender and Drazen, 2005), our coefficient of interest is the one on the interaction between TTE with Polity. Theoretically, elections only matter to the extent that the country has a reasonably high level of democracy (captured by Polity). Note that TTE is pre-determined prior to our period of study and is not correlated with other explanatory variables in these regressions. For $\theta_3 \neq 0$ to be due to a confounding factor, unrelated to the above interpretation, one of these two have to happen: (i) an unobservable factor unrelated but correlated to democracy has to affect policy making through election timing or alternatively (ii) an unobservable factor unrelated but correlated to TTE has to affect policy decision depending on democracy level. Our identifying assumption in estimating θ_3 is therefore that neither of these are true (e.g. Brender and Drazen, 2005).

In the case of containment measures we explore this relation in a panel data using a hybrid model (e.g. Allison, 2009) since Polity is time-invariant over our time horizon, and TTE has no meaningful time variation over such a short horizon. The hybrid model consists of differencing out country averages for the only time-varying independent variable (infection rates in our case) as *within* variables, and including as well the averages as *between* variables. Then the panel regression is estimated with random effects. Note that even in the presence of endogeneity between fiscal and containment measures, which we do not observe, our estimates of the coefficients of interest in our reduced form setting are consistent (e.g. Wooldridge, 2010).

4. Findings

Table 1 presents the benchmark results for fiscal measures. The first column presents the results from the June data. We find that the coefficient on the interaction variable to be negative and significant at the 5 percent significance threshold. The coefficients show that democracy is associated with an increase in fiscal stimulus when elections are close (TTE is small). In the second column we use the data on fiscal measures as of mid-September taken from the IMF dataset. We obtain similar results. In terms of magnitude, the results imply that a one standard deviation increase in TTE leads to a decrease of 0.33% percent of GDP in fiscal stimulus evaluated at mean polity.

In the third column we run a falsification test where we change the dependant variable to the fiscal balance of 2019 in column 5 and find that our earlier findings no longer hold.

4.1. Containment measures

We create a dataset with weekly observations of the dependent variable, Stringency Index (SI), from March 25th to September 9th. Figure 1 shows the distribution of SI, which ranges from 0 to 100.

Table 2 presents results from the hybrid model. In the interest of space we only show the coefficients on the key political economy variables. The dependent variable in the first column is the aggregate measure. We find that the coefficient on the interaction of interest is positive and

Table 1: Fiscal measures

	(1) Stimulus (June)	(2) Stimulus (September)	(3) Fiscal Balance (2019)
Infection rate	0.0217 (1.31)	0.0316* (1.72)	-0.00713 (-0.37)
GDP per capita	-0.103 (-0.21)	-0.161 (-0.28)	0.322 (0.47)
Credit rating	0.0465** (2.08)	0.0762*** (2.96)	0.0371 (1.25)
Debt to GDP	0.0218*** (2.64)	0.0210** (2.27)	-0.00132 (-0.13)
Polity	0.237* (1.99)	0.232* (1.70)	-0.0545 (-0.44)
TTE	0.242 (0.79)	0.264 (0.78)	0.165 (0.51)
Polity \times TTE	-0.0763** (-2.07)	-0.0825** (-2.02)	-0.0210 (-0.53)
Parliamentary	-0.359 (-0.50)	0.526 (0.66)	-2.407** (-2.56)
Constant	-0.547 (-0.16)	-1.202 (-0.30)	-5.200 (-1.09)
Observations	95	92	76
R^2	0.446	0.514	0.409

Notes: This table presents results regression (1) in columns 1 and column 2. All regressions control for regional fixed effects. Column 3 is from a falsification test where the dependent variable is 2019 fiscal balance . t statistics in parentheses. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$

Table 2: Containment measures, sub-index level.

	(1) Stringency Index	(2) School closing	(3) Workplace closing	(4) Cancel public events	(5) Restrictions on gatherings	(6) Close public transport	(7) Stay at home	(8) Work-school difference
Polity	-1.744*** (-3.59)	-1.092 (-1.43)	-3.452*** (-4.49)	-2.533*** (-2.98)	-1.386 (-1.45)	-2.407** (-2.36)	-2.064*** (-2.75)	-2.588*** (-3.07)
TTE	-2.398** (-2.21)	-0.524 (-0.31)	-5.093*** (-3.01)	-4.029** (-2.16)	-4.803** (-2.26)	-2.960 (-1.31)	-2.599 (-1.57)	-4.977*** (-2.69)
Polity \times TTE	0.533*** (4.01)	0.444** (2.09)	0.876*** (4.07)	0.609** (2.55)	0.569** (2.16)	0.698** (2.48)	0.723*** (3.47)	0.513** (2.16)
civil	-6.536** (-2.50)	-6.372 (-1.59)	-0.907 (-0.23)	-2.558 (-0.59)	-9.013* (-1.77)	-7.361 (-1.36)	-10.93*** (-2.79)	5.641 (1.31)
Constant	118.8*** (10.92)	181.7*** (10.82)	85.82*** (5.14)	147.7*** (8.08)	110.1*** (5.17)	116.8*** (5.17)	100.0*** (6.10)	-94.46*** (-5.22)
Observations	3025	3025	3025	3025	3025	3025	3024	3025
Overall R2	.48	.41	.32	.26	.21	.27	.37	.22

Notes: This table presents results from a hybrid panel regression. Observations are at a weekly frequency between March 25 and September 9. The dependent variables are measures of lockdown stringency. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$

significant at the 1 percent confidence level. Evaluated at average polity, a one standard deviation increase in TTE leads to an increase in SI by 1.37 points. That is, when elections are further out the stringency index tend to be larger in democratic countries.

We next explore sub-indices in the dataset and find that the interaction variable is positive and significant for the sub-indices. The coefficient is larger for more economically costly measure such as workplace closing and stay-at-home orders in comparison to less economically costly measures such as school closing. In the last column of Table 2 we regress the difference between the index on work closing and that on school closing. The results confirm that elections have a significantly higher impact on the more economically costly measure.

5. Discussion

One reasonable explanation for our results, is that, in the face of an uncertainty about voter preferences, politicians are more likely to opt for a time-tested approach, which is to preserve and grow the economy (e.g. Stiglitz, 2020).

Our results should not be interpreted as implying welfare costs from elections. We also cannot also rule out the possibility that elections led politicians to implement more efficient lockdowns.

References

- Alesina, A. and Drazen, A. (1991). Why are stabilizations delayed? *The American Economic Review*, 81:1170.
- Allison, P. D. (2009). *Fixed effects regression models*. SAGE.
- Brender, A. and Drazen, A. (2005). Political budget cycles in new versus established democracies. *Journal of Monetary Economics*, 52(7):1271.
- Drazen, A. (2000). The political business cycle after 25 years. *NBER Macroeconomics Annual*, 15:75.
- Flores, A. Q. and Smith, A. (2013). Leader survival and natural disasters. *British Journal of Political Science*, page 821.
- Grilli, V., Masciandaro, D., and Tabellini, G. (1991). Political and monetary institutions and public financial policies in the industrial countries. *Economic Policy*, 6(13):341.
- Hale, T., Petherick, A., Phillips, T., and Webster, S. (2020). Variation in government responses to covid-19. *Blavatnik School of Government Working Paper*, 31:2020.
- Lipsy, P. Y. (2020). Covid-19 and the politics of crisis. *International Organization*, 74(S1):E98.

- Manacorda, M., Miguel, E., and Vigorito, A. (2009). Government transfers and political support. (14702).
- Satyanath, S. (2005). *Globalization, politics, and financial turmoil: Asia's banking crisis*. Cambridge University Press.
- Stiglitz, J. E. (2020). The pandemic economic crisis, precautionary behavior, and mobility constraints: an application of the dynamic disequilibrium model with randomness.
- Wooldridge, J. M. (2010). *Econometric analysis of cross section and panel data*. MIT press, Cambridge.