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**Macroeconomic Implications of Partial Cryptoization:
Evidence From El Salvador**

by

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EVIDENCE FROM EL SALVADOR**

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Macroeconomic Implications of Partial Cryptoization Evidence from El Salvador *

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May 11, 2023

Abstract

El Salvador's monetary regime change in September of 2021 made bitcoin a legal tender alongside the U.S. Dollar. I evaluate the effects of this partial cryptoization on El Salvador's sovereign credit default swap (CDS) spreads using difference-in-differences (DiD) estimation. My methodology indicates that the regime change caused an increase in El Salvador's CDS spreads and in the variance of those spreads. These increases are indicative of a 16% increase in country risk. I calibrate a Dynamic Stochastic General Equilibrium (DSGE) model using the results of my DiD analysis to simulate how this increase in the variance of CDS spreads may impact macroeconomic behavior. My results suggest that El Salvador's GDP will experience three times greater fluctuation as a result of bitcoin adoption. This paper also examines the causal impact of the monetary regime change on remittance inflows to El Salvador. Using the synthetic control method (SCM) and DiD estimation, I do not consistently find a causal effect on remittances.

1 Introduction

On September 7th, 2021, El Salvador adopted bitcoin as legal tender when its Legislative Assembly passed the Bitcoin Law with a 90 percent supermajority (Lopez and Livni, 2021) This law has 16 articles, including stipulations that all taxes may be paid in bitcoin (Art. 4), there will be no capital gain taxes for bitcoin exchanges (Art. 5), and bitcoin should be accepted as a means of payment for all transactions (Art. 7). The Salvadoran government committed to promoting the

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“training and mechanisms” necessary for the population of its country to access bitcoin transactions and instant convertibility between the U.S. Dollar and bitcoin (Art. 8). A trust was created in the Salvadoran Development Bank to support this effort (Art. 14), and the national government is paying for the instillation of 1,500 Bitcoin ATMs throughout the country. The company installing the Bitcoin ATMs, Athena Bitcoin, reports over a million dollars of daily bitcoin remittances on its website. Furthermore, the government offered 30 dollars in bitcoin to each Salvadoran who downloads the government-sponsored app (Chivo) that facilitates bitcoin transactions. According to a tweet from Nayib Bukele (El Salvador’s 40-year-old President), Chivo gained 4 million users out of a total Salvadoran population of 6.5 million within two months of its launch (a Salvadoran ID number is required to use the app). On October 26th, 2021, Bukele tweeted that “we received 24,076 remittances, adding up to 3,069,761.05 dollars (in one day).”

Paying less commission on such remittances was one of the motivations behind making bitcoin a legal tender. In 2020, remittances made up 24 percent of El Salvador’s GDP, according to the World Bank. Bukele stated on Twitter that the people of El Salvador pay 400 million dollars each year in commission for remittances. Despite Bukele’s claims, many are skeptical of bitcoin transfers lowering this cost. An analysis of fees published by John Hopkins Institute for Applied Economics (before Chivo was rolled out) concluded that using bitcoin would exceed fees from traditional transfer methods ([Hanke et al., 2021](#)). Since its release, however, Chivo has supported zero fees for users. This feeless structure is only possible due to the use of the lightning network and the government’s investment of 150 million dollars to guarantee bitcoin convertibility ([Lopez and Livni, 2021](#)).

Bukele also utilized Twitter to communicate three other motivations for introducing bitcoin as a legal currency. This includes increasing tourism, redefining the country through a Digital Agenda, and potentially benefiting from bitcoin's appreciation. Since adopting bitcoin as legal tender, El Salvador hosted The Latin America Bitcoin & Blockchain Conference, announced the construction of a new Bitcoin City that will be funded by bitcoin-backed bonds, and offered permanent residence to anybody who spends three bitcoins.

It is possible that another factor behind this decision was to decrease the negative effects of U.S. monetary policy on El Salvador. The monetary policy determined in the U.S. does not consider the needs of the Salvadoran economy and therefore is frequently not aligned with optimal policy for the Salvadoran economy.

The International Monetary Fund (IMF) had expressed concerns about El Salvador's adoption of bitcoin as a legal currency on multiple occasions. During a press brief on December 16th, 2021, the IMF's Director of Communications said that "given bitcoin's high price volatility, its use as legal tender entails significant risks to consumer protection, financial integrity, and financial stability." El Salvador has not been receptive to feedback from the IMF. The country's Treasury Minister stated that "no international organization is going to make us do anything, anything at all."

Although this policy has been called "unprecedented," it was preceded by centuries of struggle against currency instability in Latin America: an issue entangled with broader economic and political problems. Latin American countries have implemented myriad policies to counter their volatile and often inflationary domestic currencies, but this experience is not confined to Latin America, as

adopting the Euro addressed similar historical issues in Greece and Italy. Studying these examples among others led to the existing literature on monetary policy including inflation targeting, pegged exchange rates, and dollarization.

El Salvador's adoption of bitcoin as a legal currency alongside the U.S. Dollar, which I am calling partial cryptoization, is novel in this literature. Adopting a currency that the government has no control over and is also more volatile than the current currency does not follow the reasoning associated with other monetary regime changes. I use DiD estimation and the synthetic control method to quantify the causal effect this new monetary regime had on El Salvador's credit default swaps and remittance inflows. The change in variance of sovereign credit default swaps is used to calibrate a Dynamic Stochastic General Equilibrium model in order to simulate how El Salvador's change in country risk may affect future macroeconomic behavior. This model indicates that El Salvador will experience almost three times more fluctuation in GDP as a result of partial cryptoization.

2 Theoretical Background

This research intersects multiple literatures. In this section, I provide a brief background of two of those literatures: dollarization and the functions of money. Partial cryptoization breaks many common trends for emerging economies in the dollarization literature. Most notably, the convention to seek greater stability. When examined in the context of the literature around the functions of money, it is unclear if bitcoin can serve the three functions of money.

2.1 Dollarization

Dollarization is the general term used to describe the adoption or partial adoption of a foreign currency in a domestic economy. The foreign currency is typically the U.S. Dollar, and the domestic economy is typically an emerging economy. Dollarization offers both costs and potential benefits to the host country, and the appropriateness of the policy depends upon their relative magnitudes. Two benefits in particular are worth highlighting. First, an economy where the host government has low trust can effectively outsource trust by using dollarization as a commitment device for government officials to promise their people low inflation (Kyland and Prescott, 1977; Barro and Gordon, 1983; Mendoza, 2001). The outsourcing of trust to quell inflation is enticing to some countries because a stable currency is a necessary condition for broader economic stability and efficiency. In this way, dollarization is similar to a country giving up its own monetary policy by joining a monetary union, although it goes a step further because the country will have no say in the conduct of its monetary policy (France or Italy can influence monetary policy in the Eurozone, while El Salvador has no impact on monetary policy in the United States).

Second, a country may dollarize in order to tighten links to the U.S. economy and spur foreign investment, trade, and economic growth (Hinds, 1999; Hinds and for US Senate Banking Committee, 2002; Swiston et al., 2011). This usually occurs because the country's currency is perceived as risky prior to dollarization. As a result, businesses and government agencies face higher interest rates when issuing debt. Additionally, debt issued to foreign investors often needs to be denominated in U.S. dollars, which exposes the debtors to exchange rate risk (for example, needing to pay debt off in USD while earning income in pesos). Dollarization allows local businesses to borrow at lower

rates and eliminates the exchange rate risk (Heathcote and Arellano, 2004).

The specific benefits and costs associated with dollarization depend on the exact type of dollarization that occurs. Dollarization can be categorized based on a few characteristics: state endorsement, the number of competing currencies, and which fundamental function of money is being assumed.

State-endorsed dollarization, called official dollarization, is when the government of a country decides to adopt a foreign currency as their official currency. An example of this type of dollarization is when El Salvador declared the dollar as its official currency in 2001. Unofficial dollarization, often referred to as spontaneous dollarization, is when individuals within an economy start to use another currency out of necessity. Zimbabwe spontaneously dollarized in response to an excessively high annual inflation rate (reported to be 1,730% in 2007 by the IMF). Some governments make a concerted effort to limit spontaneous dollarization, because it decreases the effectiveness of domestic monetary policy and diminishes the legitimacy of their government. Dollarization is just one way that a government may choose to manage its currency. Governments may also elect to use a floating exchange rate, a pegged exchange rate, or a currency union.

Due to the fact that a country has zero control over its monetary policy under full dollarization, an important cost may be incurred. When the U.S. is experiencing high inflation, the FED is likely to reduce the supply of dollars, which will lead to an increase in interest rates on U.S.-denominated assets. This will expose the dollarized country to higher interest rates, which in turn leads to higher costs of debt servicing, slowing economic growth, and potentially leading to a recession. Hence, while the country benefits from the trust that financial markets have in the dollar and eliminates

exchange rate risk, it exposes itself to another risk associated with the fluctuations in U.S. interest rates (Mendoza, 2001).

This strong link to the U.S. economy and resulting vulnerability of El Salvador to events in the United States are often mentioned as another reason behind the decision to adopt bitcoin as an official currency. While the effects of that policy are yet to be seen and are the focus of this project, most economists are skeptical and believe that bitcoin is not well suited to be an official currency of any country (Frankel, 2021).

2.2 Bitcoin as money

There are three main functions that money plays in an economy: medium of exchange, unit of account, and store of value. As a medium of exchange, people can use money widely across an economy as way to pay for a good or service. For example, in the United States, we can use dollars to buy anything from food to a house all across the country. As a unit of account, people use their money to compare the relative value of goods and services, even when they are very different from each other. For example, a buyer can see that one meal at a fast food restaurant is worth less than one haircut in a particular economy by comparing their prices. As a store of value, money earned today will retain purchasing power in the future. For example, if I have earn enough money to buy a meal today, I will still be able to afford a meal in six months.

Bitcoin is often criticized as a medium of exchange due to a transaction cost that is unrelated to the size of the transaction. Therefore, transferring a million dollars or one dollar could both cost \$30. Moreover, transactions tend to be slow - the average transaction time is 10 minutes (see bitcoin.org

for more information on these figures). Both of these characteristics make it less likely to be used as a means of payment for small, everyday transactions. Technological innovation may reduce this problem. With the advent of the Lightning Network, a way of transferring Bitcoin between individuals without adding an official transaction to the ledger, this problem has diminished. In fact, apps such as Strike now offer Bitcoin transactions for just a few cents. Strike was already popular in El Salvador before the government released Chivo to facilitate transactions.

As a unit of account, people want to be able to use money to compare the price of goods. This makes price stability essential. Bitcoin is known for its volatility, almost doubling in value compared to the U.S. Dollar in 2021, then crashing in 2022. This was due in part to speculation, but high price volatility is a fundamental trait of a currency with fixed supply. Bitcoin's protocols limit the supply of Bitcoin to a fixed 21 million coins in the long run. Given that $Price = (moneysupply)/(moneydemand)$, a fixed supply causes every change in demand to be reflected in price. Therefore, Bitcoin is currently seen as a poor unit of account in developed countries. However, examples such as the Turkish Lira or Argentine Peso demonstrate that bitcoin may be less volatile than some domestic currencies. Especially in Latin America, poor monetary policy has resulted in currency volatility much greater than bitcoin. Therefore, some countries can still reasonably see the fixed supply as a source of stability relative to their domestic currency, but it is still a source of instability relative to the dollar. In El Salvador, which was fully dollarized before introducing Bitcoin, it cannot be viewed as a source of price stability.

As a store of value, the future of Bitcoin is uncertain. Holding or growing in value over time is determined by many factors such as maintained public trust that are hard to predict (Kiyotaki and Wright, 1993). Only time will tell if it maintains value in the long term. Since the passing of the Bitcoin Law, bitcoin has depreciated more than 60% against the U.S. Dollar, which has led some to question Bitcoin's feasibility as a store of value.

3 Data

My analysis relies on data for both credit default swaps and remittances. The credit default swap data was from Bloomberg, and the remittance data was from each countries central bank. I downloaded the data using Cbonds.com. I will describe this data and elaborate on some of its background. The bitcoin price data I reference later in this section was downloaded from Yahoo Finance.

3.1 Credit Default Swaps

Credit default swaps are a security that act as a hedge against the risk of default of a reference entity. It is an unfunded contract and the most commonly traded type of credit derivative. Consider the basic setup where a protection buyer pays an annual premium to a protection seller. In return, the protection seller will pay the protection buyer the face value of the debt obligations minus its recovery value should the reference entity default (typically this is for a bond default). The recovery value is the amount of money the protection buyer will get paid from the reference entity despite the default (for example through the liquidation of assets). Calculations with recovery value usually use 40% as a baseline. The premium is the periodic amount the protection buyer

pays to the protection seller, typically expressed as a proportion of the notional value of the CDS in basis points. When discussed on an annualized basis, the premium is the same as the CDS spread. The time period for which a CDS is in effect is referred to as the term or maturity. The five-year maturity is the most common ([Bomfim, 2022](#)).

Consider a 5-year credit default swap contract for \$10 million of protection. The premium is agreed to be 1%, or 100 basis points paid annually for the life of the security. This is the same as a 100 bp spread, and the protection buyer will pay \$100,000 each year. In reality, contract size may be as high as a billion dollars or as low as a million dollars. Credit default swaps can be used for other credit events and have more layers of complexity that I will not elaborate on here, as these aspects are not relevant to understanding my research

Sovereign credit default swaps are those that have a government as the reference entity. Sovereign credit default swaps can be used to quantify country risk. For the purpose of the paper, country risk is riskiness of investing capital in a country as perceived by international financial markets. Country risk has important effects on an economy. For example, it increases government borrowing costs which spill over into corporate borrowing costs ([Haerri et al., 2014](#)). Recent work has found that credit default swap spreads are significantly negatively related to a country's performance on the UN Sustainable Development Goals ([Ten Bosch et al., 2022](#)). CDSs are also favorable for this analysis because they are a standard asset between countries that trade at a high frequency. Given that the monetary regime in El Salvador changed less than two years ago, high frequency data has clear advantages for finding statistical significance.

I used daily Bloomberg data for 3-year, 5-year, and 10-year credit default swaps for Panama, Brazil, Costa Rica, El Salvador, Mexico, Colombia, and Nicaragua. The full data set is an unbalanced panel from October 21st, 2001 to November 1st, 2022. This is 26,311 observations with 6,301 unique days. The strongly balanced version of the panel is from May 14th, 2019 to August 31st, 2022. This is a total of 6,027 observations with 861 unique days. The summary statistics for each country and maturity can be seen in Table 3 in the appendix. The most liquid and most often referenced credit default swap maturation is 5 years. The two most recent years of this data can be seen in Figure 1, and all of the data can be seen in Figure 2. While the 5-year CDS is the most common, I use the 3-year and 10-year maturities as which I use as robustness checks. In this case, the graphs do not significantly vary from the 5-year maturity. This can be seen in Figure 7 and Figure 8 in the appendix.

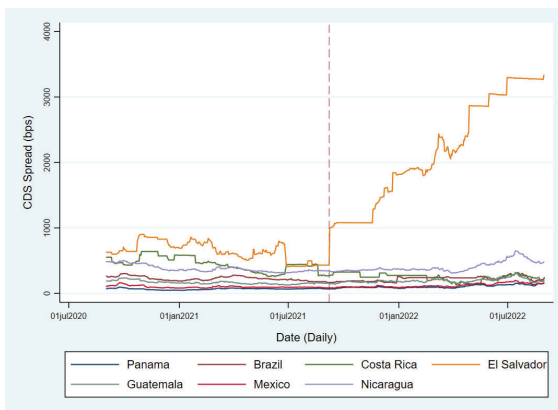


Figure 1: Latin American 5-Year CDS Spreads from 31Aug20 to 31Aug22

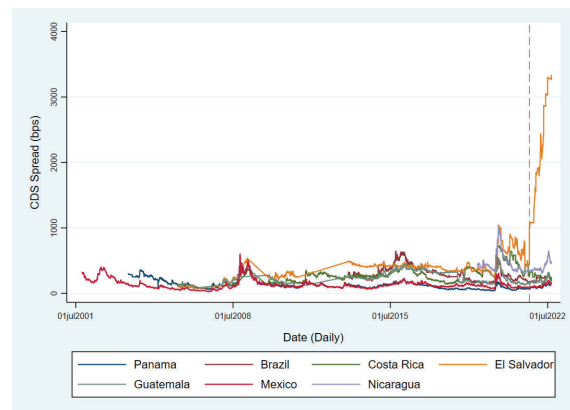


Figure 2: Latin American 5-Year CDS Spreads from 12Oct01 to 31Aug22

3.2 Remittances

As mentioned in the introduction, increasing remittances was one of President Bukele's cited motivations for making Bitcoin legal tender. By decreasing fees and increasing the convenience of transfers, he hoped to increase the amount of remittances sent to El Salvador. I use Cbonds data to look for a potential causal link. Cbonds was chosen because it reliably compiles remittance data monthly for 22 countries, whereas other sources only report annually, which inhibits potential statistical significance. I omit Kenya from my panel due to a difference in its reporting methodology, which leaves a total of 21 countries. The full unbalanced panel is from November, 2012 through October 2021. This is 120 distinct dates and 2,429 total observations. A summary of the remittance data from these 22 countries can be seen in Table 4 in the appendix. A table of correlations can also be found in the appendix (Table 5). Most of the remittance data was already reported in USD. Bulgaria, France, Greece, Kosovo, and Portugal were reported in EUR, while Cape Verde (CVE), Comoros (KMF), and Thailand (THB) were reported in the local currency.

3.3 Bitcoin

Shortly after the adoption of Bitcoin in El Salvador, Bitcoin precipitously lost value compared to the U.S. Dollar. There is no reason to believe that this is causal, as El Salvador is a small economy that has little effect on global market forces. Nevertheless, it is notable that the correlation between Bitcoin and El Salvador's CDS spreads changed drastically following the intervention (see Figure ??). Between the 7th of September 2018 and the 7th of September 2021, the correlation between Bitcoin and the U.S. Dollar was -0.2432. Between the 7th of September 2021 and the 31st of August 2022, the correlation was -0.9154.

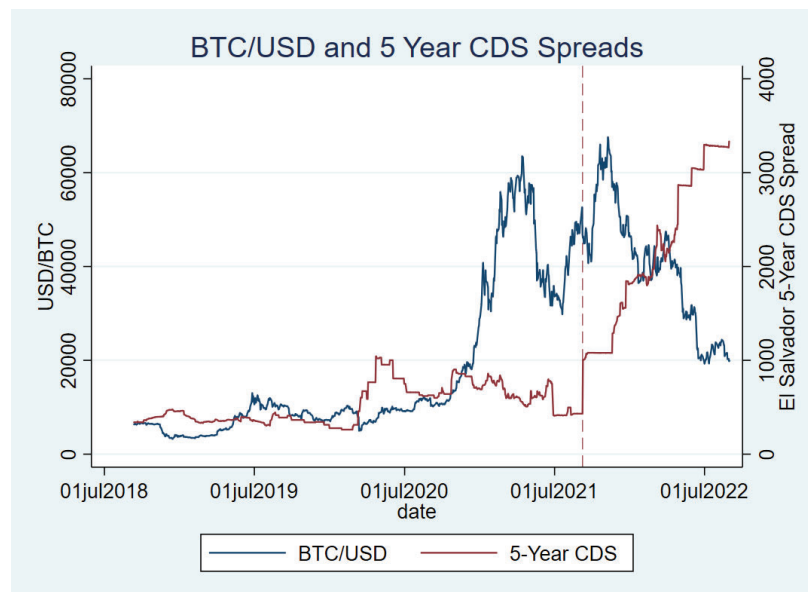


Figure 3: BTC/USD

4 Estimating the causal impact of bitcoin adoption

This section reviews the methodology I use to estimate the causal impact of bitcoin adoption on CDS spreads and remittances. Then, it provides a summary of the results of my analysis.

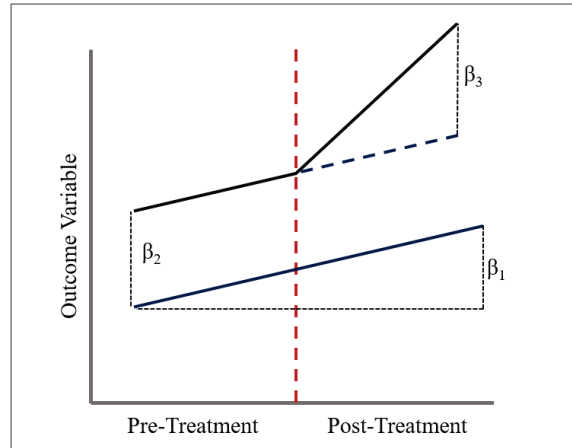


Figure 4

4.1 Methodology

In this section, I will describe the methodology I use to estimate the causal effect of bitcoin adoption in El Salvador on sovereign credit default swaps (CDSs) and remittance inflows. First, I will describe difference-in-differences (DiD) estimation, which I used for CDSs and remittances. Second, I explain the synthetic control method (SCM), which I used to remittances.

4.1.1 Difference-in-differences

Difference-in-differences estimation is very well established in economic literature as a way to estimate causal effects from non-experimental treatments. Recent work including Roth et al. (2022) reviews this methodology in detail. It relies on establishing a parallel trend between a non-treated group and the treated group before the intervention in order to estimate (1) a baseline average and (2) the change in outcomes for the untreated groups in order to determine the causal element, β_3 . This is the treatment effect, which can be seen in the image below.

A basis DiD regression model is governed according to the equation below. I use this as my starting point before running a variety of regression models to improve the specifications and test for robustness.

$$Y_{it} = \beta_0 + \beta_1 Post_t + \beta_2 Treat_i + \beta_3 [Post_t \times Treat_i] + \varepsilon_{it} \quad (4.1)$$

Y_{it} : outcome variable, CDS spread

$post_t$: dummy variable that equals 1 after the intervention

$treat_i$: dummy variable that equals 1 for treated units indexed by i in a panel

β_0 : baseline average

β_1 : time trend for control countries

β_2 : difference between El Salvador and control counties pre-treatment

β_3 : treatment effect (causal element)

ε_{it} : unobservables

We can see in the graph below that Latin American CDS spreads form a strong parallel trend with El Salvador before a decisive change in trend after the Bitcoin Law took effect (indicated by the dashed vertical line).

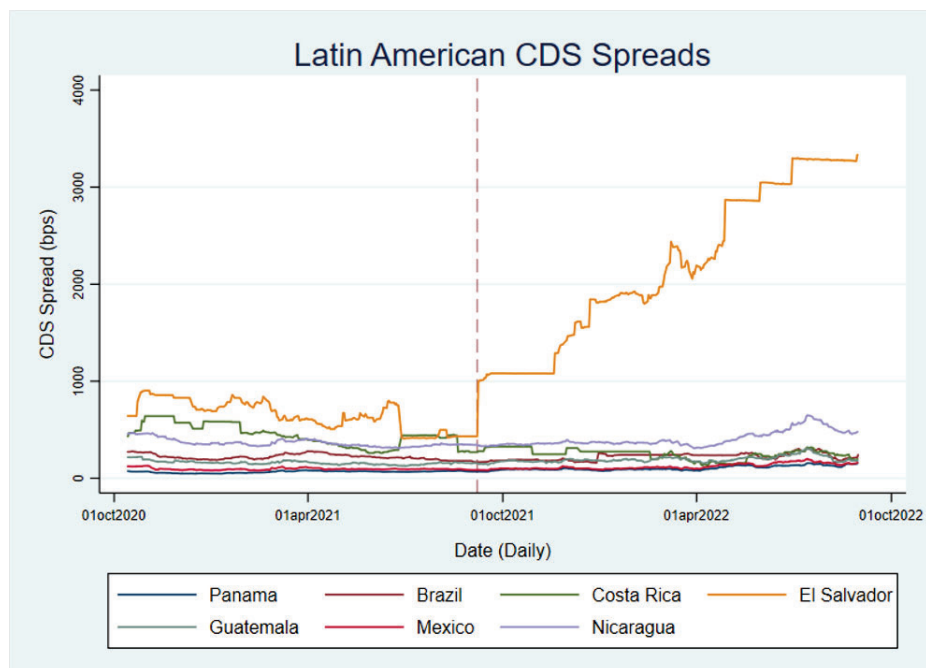


Figure 5

4.1.2 Synthetic control method

Another technique for estimating causality under non-experimental design in recent economic literature is the synthetic control method. This technique attempts to predict how the treated country would have behaved if there had not been an intervention by creating an artificial country. This is done through creating a synthetic country that is a weighted average of other countries with similar pre-treatment behavior and characteristics. The composition of this synthetic control

Country	Weight
Bangladesh	0.064
Brazil	0.062
Bulgaria	0.062
Colombia	0.063
Dominican Republic	0.063
France	0.062
Greece	0.062
Honduras	0.062
Kosovo	0.062
Kyrgyzstan	0.062
Liberia	0.062
Nicaragua	0.062
Philippines	0.066
Portugal	0.062
Sri Lanka	0.063
Turkey	0.062

can balance pre-intervention outcomes with covariates to create a more plausible counterfactual

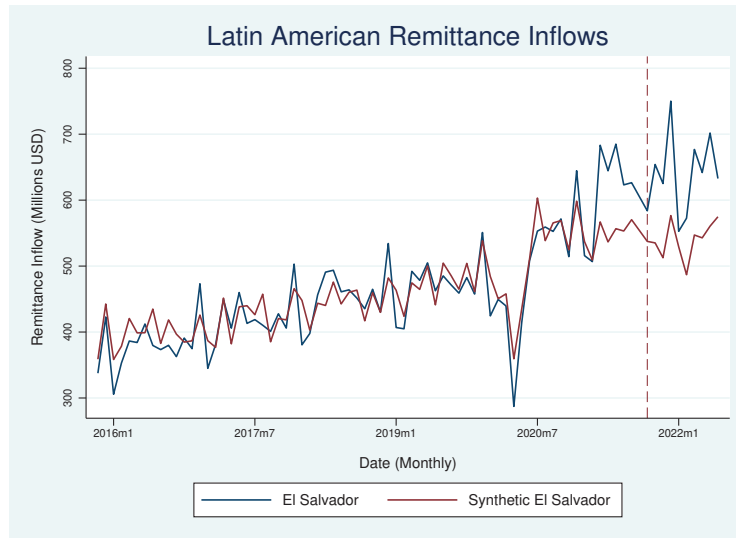


Figure 6

(Gilchrist et al., 2023). Using the synth package in Stata, I generate a synthetic control for El Salvador with country weights based on pre-intervention covariance with El Salvador (Abadie et al., 2011). The synthetic control versus El Salvador’s actual behavior can be seen above.

4.2 Results

This section describes the results of my causal analysis conducted according to the previously described methodology.

By regressing this data using the variations of the base model described above, I estimate that 5-year CDS spreads in El Salvador were causally increased by at least 1,625 basis points (bps) due to the treatment effect associated with the Bitcoin Law taking effect. This includes models with day fixed effects, day trends, an unbalanced panel, a strongly balanced panel, robust standard

errors, and clustered errors. This result stands true when considered in light of robustness checks for 3-year and 10-year credit default swaps. This suggests a general change in the country risk of El Salvador that is not specific to a 3-year, 5-year, or 10-year time horizon. The Bitcoin Law was announced six months before it took effect. Accounting for this with an anticipation variable, which is a dummy variable that turns to one between the day the law was announced and when it took effect, the result remains statistically significant and above 1,625 bps. A table with a few of the DiD regression models I ran can be seen below, and there are myriad regression models included in the appendix.

Table 1: Select CDS Spread Regression Models

	5-Year	5-Year	5-Year	3-Year	10-Year
Treatment Effect	1915.7*** (38.40)	1708.2*** (34.10)	1738.6*** (38.20)	1647.9*** (36.55)	1600.2*** (40.50)
Country FEs	No	Yes	Yes	Yes	Yes
Num of Obs	10227	10227	10227	10224	10225
R ²	0.677	0.801	0.858	0.850	0.871

Source: Bloomberg

Notes: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Although El Salvador's final quantity of remittance inflows is slightly higher than the synthetic control, it is not consistently statistically significant under the models I ran. A few of these models are included below, and the rest are in the appendix.

Table 2: Select CDS Spread SD Regression Models

	5-Year	5-Year	3-Year	10-Year
Treatment Effect	462.5*** (27.02)	549.4*** (32.27)	521.2*** (30.93)	510.9*** (34.46)
Country FEs	No	Yes	Yes	Yes
Num of Obs	10227	10227	10227	10227
R ²	0.0893	0.121	0.118	0.126

Source: Bloomberg

Notes: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

5 Simulated impact on macro volatility using a DSGE model

In this section, I describe the model I use to simulate El Salvador’s future macroeconomic behavior. It is based on the model of a small open economy in [Neumeyer and Perri \(2004\)](#). I calibrate a shock to the country risk parameter using the results of my DiD analysis of CDS spreads. I then simulate the effect that a shock to country risk has on the economy under the old and new monetary regime. I find that GDP fluctuates about 3 times more under partial cryptoization than full dollarization.

5.1 The model economy

The section describes the economic environment of an economy subject to shocks to the country-specific interest rate (modeled as country spread, or cs) and total factor productivity (TFP). The model I use is that of a standard one-good neoclassical small open economy where the only asset traded in international financial markets is a noncontingent real bond. My model differs from the standard setup by following [Neumeyer and Perri \(2004\)](#) in including a working capital constraint, where firms trade bonds in addition to households because of their need to pay (a fraction of) the

wage bill before final output is available. Given that capital stock is relatively stable at business cycle frequencies, I do not include it in the model for the sake of simplicity.

5.1.1 Timing

In my model, time is discrete. The beginning of each time period, t , is denoted by t^- and the end of each time period is denoted by t^+ . Times t^+ and $(t+1)^-$ are arbitrarily close. Shocks are revealed at time t^- .

5.1.2 Firms

At time t^- , firms hire labor (n), to produce a final good (y) that will become available at time t^+ . The firm's problem is to choose labor to maximize profit.

5.1.3 Households

At time t^- households supply labor in a competitive labor market. At time t^+ , they receive labor payments, make a consumption decision, and make an investment decision. In every period, households enjoy utility from consumption c_t and suffer disutility from hours worked n_t . A typical household seeks to maximize the expected present discounted value of lifetime utility, given by:

$$\sum_{t=0}^{\infty} \beta^t [u(c_t) - v(n_t)] \quad (5.1)$$

where $u(c_t) = \frac{c_t^{1-\sigma}}{1-\sigma}$ is the strictly concave utility from consumption, $v(n_t) = \psi \frac{n_t^{1+\gamma}}{1+\gamma}$ is the strictly convex disutility from hours worked, $\beta < 1$ is the discount factor which captures how much the typical household cares about the future utility (higher β means more patience), The household faces the budget constraint:

$$c_t + b_t \leq w_t \cdot n_t + (1 + r_{t-1})b_{t-1} \quad (5.2)$$

where b_t is the bonds purchased in period t , r_{t-1} is the interest rate (determined in the previous period), b_{t-1} is the bond purchases from the previous period that yield a gross payment of $(1 + r_{t-1})b_{t-1}$, and w_t is the real wage (the price of consumption is normalized to one).

5.1.4 Interest rates

The interest rate faced by households and firms is set according to the country in where they are located. This country-specific interest rate is determined by a global interest rate r^* , an additional interest rate based on the risk of investing in that country (modeled as cs), and an adjustment to that interest rate determined by the spread between current period interest rate and the global interest rate. This adjustment is scaled in accordance with the parameter ω , which represents the debt elasticity of the interest rate. This construction is reflected in the function governing the interest rate in period t :

$$r_t = r^* + cs_t \tag{5.3}$$

5.1.5 Country risk and total factor productivity

The country risk spread and total factor productivity both follow a stochastic process of endowment. Current period country risk, cs_t is modeled by

$$cs_t = (1 - \rho_{cs})\bar{cs} + \rho_{cs}cs_{t-1} + \omega \cdot (\bar{b} - b_t) + e_{cs} \tag{5.4}$$

where ρ_{cs} is the persistence of the country spread, \bar{cs} is the long-run country spread of the country, cs_{t-1} is the country spread from the last period, and e_{cs} is an exogenous shock to the country spread. Total factor productivity, z_t follows a similar function

$$z_t = \rho_z z_{t-1} + e_z \quad (5.5)$$

where ρ_z is the persistence of productivity, z_{t-1} is the total factor productivity from the last period, and e_z is an exogenous shock productivity.

where z_t is the current

5.2 Calibration

I used the same parameter values as [Neumeyer and Perri \(2004\)](#), except for country risk, which is calibrated according to my DiD analysis. A table of the original parameter values from [Neumeyer and Perri \(2004\)](#) can be found in the appendix.

5.3 Impact of BTC adoption via an increase in country risk shocks

Using this model economy, I model a shock to country spread. Based on the variance of the credit default swaps before the intervention, I calibrate the variance of this shock to 0.03. I find that the standard deviation of GDP under this calibration is 0.0053. With the rest of the parameters the same, I adjust this shock variance to 0.09 and find that the standard deviation of GDP increases to 0.0162. The graphical representations of this shock over time, as outputted by Dynare, can be seen in the appendix.

6 Conclusion

Through difference-in-differences estimation, I find that the regime change causally increased El Salvador's sovereign credit default swap spreads. This increase suggests at least a 16 percent increase in country risk. Using the change in variance of the CDS spreads, I calibrate a DSGE model

and find that GDP will fluctuate almost three times more with this additional variance in country risk. Furthermore, I do preliminary causal analysis to estimate the effect the monetary regime change had on remittances using the synthetic control method. Although some model suggest a small causal increase in remittances, I do not consistently find statistical significance.

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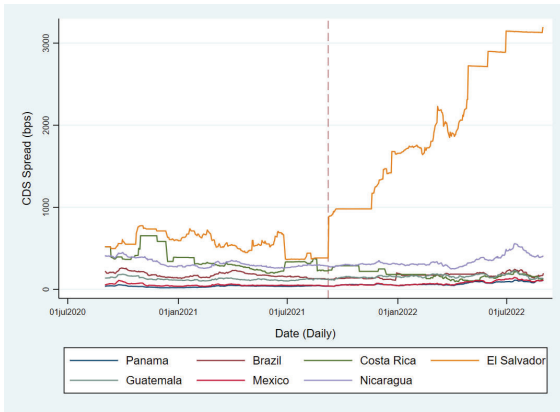


Figure 7: 3-Year CDSs

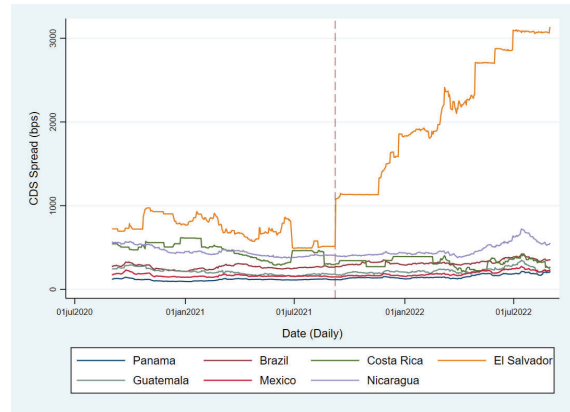


Figure 8: 10-Year CDSs

Table 3: CDS Summary Statistics

Country		3-Year Spread		5-Year Spread		10-Year Spread	
		Pre	Post	Pre	Post	Pre	Post
<i>→ Panama</i>	Mean	91.83	68.93	133.54	104.03	174.22	155.33
	SD	64.81	19.33	72.77	22.62	69.69	25.60
	Min	16.40	38.07	39.96	67.65	81.86	115.38
	Max	530.04	112.26	586.86	156.10	622.78	214.44
Brazil	Mean	227.34	168.31	302.11	222.00	267.93	324.93
	SD	102.16	30.67	110.14	35.57	126.30	31.99
	Min	80.13	110.95	134.43	158.59	94.53	268.64
	Max	615.70	245.43	680.63	311.11	978.92	422.67
Costa Rica	Mean	235.96	182.98	282.98	250.04	323.31	328.23
	SD	117.50	53.72	116.64	53.13	107.54	54.78
	Min	51.00	95.52	85.00	133.94	135.00	211.19
	Max	718.02	288.35	732.96	325.73	687.09	416.90
El Salvador	Mean	341.40	2017.65	391.61	2167.53	444.70	2116.55
	SD	140.49	792.36	160.54	805.15	168.73	706.88
	Min	40.00	382.90	72.75	431.76	128.00	513.37
	Max	862.79	3189.86	1042.40	3332.91	1124.41	3127.58
Guatemala	Mean	209.27	159.46	245.63	193.53	283.32	222.98
	SD	90.96	21.29	89.51	30.79	91.67	35.14
	Min	45.00	110.72	76.50	138.07	111.76	164.44
	Max	420.27	232.98	525.61	309.76	555.29	349.95
Mexico	Mean	91.79	76.55	130.62	122.11	168.86	191.04
	SD	62.36	26.84	67.21	28.45	62.41	31.01
	Min	20.82	37.86	28.17	81.94	42.72	146.28
	Max	562.33	147.16	601.21	199.80	609.68	275.22
Nicaragua	Mean	382.85	340.92	456.82	404.40	529.82	471.60
	SD	149.85	68.36	149.20	79.14	130.61	82.71
	Min	254.53	248.47	307.55	307.68	372.73	378.78
	Max	958.22	557.53	1018.96	649.79	989.89	723.16

Table 4: Remittances Summary Statistics

Country	Mean		SD		Min		Max		N	
	Pre	Post	Pre	Post	Pre	Post	Pre	Post	Pre	Post
Bangladesh	1361	1757	322	196	857	1494	2598	2096	105	15
Brazil	216	378	46	40	148	320	363	454	105	14
Bulgaria	87	104	18	15	57	82	124	131	105	13
Cape Verde	1509	2433	343	269	924	2067	2524	2831	105	11
Colombia	465	758	115	75	298	647	789	890	105	14
Comoros	3504	8247	2111	930	1602	7162	9886	10143	105	12
Dominican Republic	510	825	157	50	262	749	995	941	105	15
El Salvador	418	637	91	51	279	553	685	750	105	14
France	35	19	10	0	19	19	45	19	105	13
Greece	98	135	40	65	50	92	304	338	105	13
Honduras	375	693	103	78	224	585	671	836	105	13
Kosovo	70	101	23	16	42	71	154	132	96	14
Liberia	37	30	20	9	23	23	175	53	69	11
Mongolia	8	12	5	1	-6	11	17	13	105	2
Nicaragua	119	224	27	41	81	175	191	300	105	13
Philippines	2276	2677	273	180	1699	2395	2902	2987	105	14
Portugal	284	314	40	23	202	285	396	377	105	14
Sri Lanka	576	297	67	46	375	205	813	359	105	13
Tailand	9948	19624	2827	1205	6318	17911	18817	21027	105	14
Turkey	42	18	25	7	8	10	110	36	105	14

Notes: remittances reported in the currencies previously mentioned

Table 5: Correlation Matrix for Remittances

	Ba.	Br.	Bu.	Ca.	Col.	Com.	Dom.	El...	Fr.	Gr.	Ho.	Ko.	Ky.	Li.	Mo.	Ni.	Ph.	Po.	SrL.	Th.	Tu.		
Bangl.	1.00																						
Brazil	0.82	1.00																					
Bulg.	0.51	0.49	1.00																				
Cape V.	0.58	0.55	0.14	1.00																			
Colom.	0.72	0.82	0.52	0.61	1.00																		
Comoros	0.85	0.87	0.51	0.51	0.67	1.00																	
Dom Rep	0.86	0.88	0.54	0.68	0.83	0.87	1.00																
El Salv.	0.78	0.80	0.51	0.67	0.89	0.74	0.93	1.00															
France	-0.76	-0.79	-0.56	-0.45	-0.70	-0.75	-0.74	-0.63	1.00														
Greece	0.39	0.46	0.33	0.29	0.48	0.33	0.34	0.29	-0.52	1.00													
Hond.	0.84	0.85	0.55	0.69	0.89	0.81	0.93	0.94	-0.74	0.32	1.00												
Kosovo	0.78	0.81	0.54	0.60	0.77	0.81	0.86	0.85	-0.64	0.22	0.90	1.00											
Kyrgy.	0.37	0.34	0.38	0.44	0.52	0.31	0.45	0.55	-0.20	-0.04	0.57	0.59	1.00										
Liberia	-0.38	-0.31	-0.12	-0.23	-0.34	-0.31	-0.25	-0.20	0.50	-0.29	-0.29	-0.27	-0.09	1.00									
Mongolia	0.15	-0.01	0.19	0.15	0.01	0.09	0.01	0.05	-0.06	0.09	0.11	0.16	0.34	-0.09	1.00								
Nicar.	0.82	0.87	0.57	0.68	0.88	0.85	0.93	0.91	-0.80	0.45	0.93	0.87	0.41	-0.37	0.06	1.00							
Phil.	0.59	0.56	0.35	0.66	0.69	0.41	0.62	0.70	-0.46	0.40	0.65	0.54	0.47	-0.13	0.14	0.68	1.00						
Port.	0.27	0.12	0.14	0.46	0.28	0.10	0.26	0.30	-0.11	0.07	0.27	0.23	0.32	-0.22	0.02	0.29	0.52	1.00					
Sri L.	0.11	-0.08	-0.09	0.08	-0.07	-0.08	0.01	0.05	0.23	0.11	-0.10	-0.16	-0.01	0.15	0.14	-0.06	0.29	0.20	1.00				
Thailand	0.65	0.73	0.42	0.53	0.76	0.69	0.82	0.81	-0.60	0.33	0.81	0.72	0.52	-0.19	0.15	0.75	0.57	0.17	-0.05	1.00			
Turkey	-0.60	-0.59	-0.69	-0.31	-0.57	-0.59	-0.61	-0.50	0.76	-0.53	-0.60	-0.50	-0.12	0.36	-0.12	-0.69	-0.39	-0.11	0.18	-0.40	1.00		

Table 6: Regression Models of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
Treatment Effect	1.8e+03*** (36.98)	1.6e+03*** (32.86)	1.6e+03*** (32.71)	1.6e+03*** (32.70)	1.6e+03*** (32.68)	1.6e+03*** (36.55)
Country FEs						
Brazil		1.4e+02*** (76.89)	1.4e+02*** (75.80)	1.4e+02*** (78.30)	1.4e+02*** (79.23)	1.4e+02*** (57.67)
Costa Rica		2.1e+02*** (59.82)	2.1e+02*** (60.22)	2.1e+02*** (58.89)	2.1e+02*** (59.89)	2.1e+02*** (56.98)
El Salvador		3.6e+02*** (90.80)	3.6e+02*** (89.68)	3.6e+02*** (91.15)	3.6e+02*** (92.73)	3.5e+02*** (101.13)
Guatemala		1.5e+02*** (64.98)	1.5e+02*** (63.18)	1.5e+02*** (65.49)	1.5e+02*** (65.39)	1.5e+02*** (47.65)
Mexico		27*** (27.77)	27*** (27.43)	27*** (28.90)	27*** (28.62)	27*** (10.78)
Nicaragua		3.2e+02*** (70.91)	3.2e+02*** (68.03)	3.2e+02*** (67.71)	3.2e+02*** (67.80)	3.2e+02*** (86.42)
Time Trends						
Linear			6.6e-03*** (4.59)	-4.6e-02*** (-6.15)	-.12*** (-5.59)	
Quadratic				2.4e-05*** (6.97)	1.1e-04*** (3.91)	
Cubic					-2.5e-08** (-2.76)	
Constant	2.1e+02*** (133.21)	48*** (81.93)	41*** (24.55)	60*** (20.09)	73*** (19.68)	49*** (26.06)
Num of Obs	1.0e+04	1.0e+04	1.0e+04	1.0e+04	1.0e+04	1.0e+04
R ²	.67	.79	.79	.79	.79	.85

Source: Bloomberg

Notes: Panama is the comparison country for country fixed effects

Model 6 has suppressed daily fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 7: Regression Models of Monthly SDs of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	4.4e+02*** (5.79)	5.3e+02*** (6.91)	2.7e+02*** (3.64)	80 (1.37)	8.5 (0.25)
Country FEs					
Brazil		-7.1e-13 (-0.00)	-2.8e-12 (-0.00)	1.9e-10 (0.00)	-8.6e-09 (-0.00)
Costa Rica		-7.1e-13 (-0.00)	-2.8e-12 (-0.00)	1.9e-10 (0.00)	-8.6e-09 (-0.00)
El Salvador		-86** (-3.16)	-44 (-1.92)	-13 (-0.74)	-1.4 (-0.11)
Guatemala		-7.0e-13 (-0.00)	-2.8e-12 (-0.00)	1.9e-10 (0.00)	-8.7e-09 (-0.00)
Mexico		-7.0e-13 (-0.00)	-2.8e-12 (-0.00)	1.9e-10 (0.00)	-8.6e-09 (-0.00)
Nicaragua		88 (1.73)	-25 (-0.60)	-12 (-0.44)	10 (0.54)
Time Trends					
Linear			7*** (12.75)	-4.5e+02*** (-17.10)	1.8e+04*** (20.13)
Quadratic				.32*** (17.22)	-26*** (-20.31)
Cubic					1.2e-02*** (20.49)
Constant	2.2e+02*** (21.47)	2.2e+02*** (8.35)	-4.8e+03*** (-12.38)	1.6e+05*** (16.99)	-4.3e+06*** (-19.96)
Num of Obs	4.7e+02	4.7e+02	4.7e+02	4.7e+02	4.7e+02
R ²	8.9e-02	.12	.47	.75	.88

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 8: Regression Models of Quarterly SDs of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	4.8e+02*** (3.81)	5.8e+02*** (4.52)	2.9e+02* (2.32)	78 (0.85)	6.3 (0.13)
Country FEs					
Brazil		-2.3e-13 (-0.00)	-3.5e-13 (-0.00)	5.3e-11 (0.00)	-4.1e-09 (-0.00)
Costa Rica		-2.3e-13 (-0.00)	-3.5e-13 (-0.00)	5.3e-11 (0.00)	-4.1e-09 (-0.00)
El Salvador		-99 (-1.97)	-49 (-1.17)	-13 (-0.44)	-1.1 (-0.05)
Guatemala		-2.3e-13 (-0.00)	-3.5e-13 (-0.00)	5.3e-11 (0.00)	-4.1e-09 (-0.00)
Mexico		-2.3e-13 (-0.00)	-3.5e-13 (-0.00)	5.2e-11 (0.00)	-4.1e-09 (-0.00)
Nicaragua		95 (1.03)	-27 (-0.37)	-13 (-0.27)	10 (0.33)
Time Trends					
Linear			22*** (7.87)	-1.3e+03*** (-11.28)	5.0e+04*** (13.66)
Quadratic				2.8*** (11.37)	-2.1e+02*** (-13.81)
Cubic					.3*** (13.96)
Constant	2.3e+02*** (12.40)	2.3e+02*** (4.78)	-5.0e+03*** (-7.65)	1.6e+05*** (11.19)	-3.9e+06*** (-13.52)
Num of Obs	1.6e+02	1.6e+02	1.6e+02	1.6e+02	1.6e+02
R ²	9.3e-02	.13	.5	.78	.91

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 9: Regression Models of Weekly SDs of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	4.5e+02*** (11.74)	5.4e+02*** (14.01)	2.8e+02*** (7.51)	81** (2.85)	9.8 (0.58)
Country FEs					
Brazil		3.4e-12 (0.00)	1.2e-12 (0.00)	2.7e-10 (0.00)	-2.4e-08 (-0.00)
Costa Rica		3.4e-12 (0.00)	1.2e-12 (0.00)	2.7e-10 (0.00)	-2.4e-08 (-0.00)
El Salvador		-88*** (-6.58)	-45*** (-3.98)	-13 (-1.53)	-1.6 (-0.25)
Guatemala		3.4e-12 (0.00)	1.2e-12 (0.00)	2.7e-10 (0.00)	-2.4e-08 (-0.00)
Mexico		3.4e-12 (0.00)	1.2e-12 (0.00)	2.7e-10 (0.00)	-2.4e-08 (-0.00)
Nicaragua		91*** (3.64)	-25 (-1.25)	-13 (-0.97)	10 (1.12)
Time Trends					
Linear			1.7*** (26.57)	-1.1e+02*** (-36.27)	4.3e+03*** (43.17)
Quadratic				1.8e-02*** (36.53)	-1.4*** (-43.56)
Cubic					1.5e-04*** (43.95)
Constant	2.2e+02*** (44.17)	2.3e+02*** (17.27)	-4.9e+03*** (-25.81)	1.6e+05*** (36.05)	-4.4e+06*** (-42.80)
Num of Obs	2.0e+03	2.0e+03	2.0e+03	2.0e+03	2.0e+03
R ²	8.9e-02	.12	.47	.74	.88

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 10: Regression Models of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
Treatment Effect	1.9e+03*** (38.40)	1.7e+03*** (34.10)	1.7e+03*** (33.90)	1.7e+03*** (33.84)	1.7e+03*** (33.70)	1.7e+03*** (38.20)
Country FEs						
Brazil		1.7e+02*** (82.37)	1.7e+02*** (79.92)	1.7e+02*** (84.12)	1.7e+02*** (85.65)	1.7e+02*** (61.55)
Costa Rica		2.3e+02*** (65.18)	2.3e+02*** (65.85)	2.3e+02*** (64.38)	2.3e+02*** (66.56)	2.3e+02*** (61.93)
El Salvador		3.8e+02*** (80.96)	3.8e+02*** (80.16)	3.9e+02*** (81.39)	3.8e+02*** (83.65)	3.8e+02*** (93.01)
Guatemala		1.5e+02*** (65.76)	1.5e+02*** (63.54)	1.5e+02*** (66.24)	1.5e+02*** (66.35)	1.5e+02*** (50.52)
Mexico		39*** (33.84)	39*** (32.91)	39*** (35.28)	39*** (34.62)	39*** (14.87)
Nicaragua		3.6e+02*** (77.08)	3.5e+02*** (73.83)	3.5e+02*** (73.05)	3.5e+02*** (72.77)	3.5e+02*** (92.35)
Time Trends						
Linear			8.1e-03*** (5.14)	-5.4e-02*** (-6.90)	-.19*** (-8.67)	
Quadratic				2.9e-05*** (8.01)	1.8e-04*** (6.58)	
Cubic					-4.7e-08*** (-5.10)	
Constant	2.6e+02*** (155.67)	84*** (114.01)	75*** (39.40)	98*** (29.73)	1.2e+02*** (30.33)	85*** (43.26)
Num of Obs	1.0e+04	1.0e+04	1.0e+04	1.0e+04	1.0e+04	1.0e+04
R ²	.68	.8	.8	.8	.8	.86

Source: Bloomberg

Notes: Panama is the comparison country for country fixed effects

Model 6 has suppressed daily fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 11: Regression Models of Monthly SDs of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	4.7e+02*** (6.05)	5.6e+02*** (7.23)	2.8e+02*** (3.74)	82 (1.42)	12 (0.35)
Country FEs					
Brazil		-1.6e-13 (-0.00)	-2.4e-12 (-0.00)	2.0e-10 (0.00)	-8.5e-09 (-0.00)
Costa Rica		-1.6e-13 (-0.00)	-2.4e-12 (-0.00)	2.0e-10 (0.00)	-8.5e-09 (-0.00)
El Salvador		-91** (-3.16)	-46 (-1.93)	-13 (-0.75)	-2 (-0.14)
Guatemala		-1.6e-13 (-0.00)	-2.4e-12 (-0.00)	2.0e-10 (0.00)	-8.5e-09 (-0.00)
Mexico		-1.6e-13 (-0.00)	-2.4e-12 (-0.00)	2.0e-10 (0.00)	-8.4e-09 (-0.00)
Nicaragua		99 (1.88)	-23 (-0.56)	-10 (-0.37)	12 (0.59)
Time Trends					
Linear			7.6*** (13.55)	-4.6e+02*** (-17.84)	1.8e+04*** (19.65)
Quadratic				.33*** (17.98)	-25*** (-19.84)
Cubic					1.2e-02*** (20.04)
Constant	2.3e+02*** (21.64)	2.3e+02*** (8.39)	-5.2e+03*** (-13.17)	1.6e+05*** (17.72)	-4.2e+06*** (-19.47)
Num of Obs	4.7e+02	4.7e+02	4.7e+02	4.7e+02	4.7e+02
R ²	9.1e-02	.12	.5	.76	.88

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 12: Regression Models of Quarterly SDs of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	5.0e+02*** (3.99)	6.1e+02*** (4.74)	2.9e+02* (2.39)	80 (0.88)	9.8 (0.20)
Country FEs					
Brazil		-1.4e-13 (-0.00)	-2.6e-13 (-0.00)	5.4e-11 (0.00)	-4.0e-09 (-0.00)
Costa Rica		-1.4e-13 (-0.00)	-2.6e-13 (-0.00)	5.4e-11 (0.00)	-4.0e-09 (-0.00)
El Salvador		-1.0e+02 (-1.97)	-50 (-1.17)	-14 (-0.45)	-1.7 (-0.08)
Guatemala		-1.4e-13 (-0.00)	-2.6e-13 (-0.00)	5.4e-11 (0.00)	-4.0e-09 (-0.00)
Mexico		-1.4e-13 (-0.00)	-2.5e-13 (-0.00)	5.4e-11 (0.00)	-4.0e-09 (-0.00)
Nicaragua		1.1e+02 (1.11)	-26 (-0.35)	-11 (-0.24)	11 (0.36)
Time Trends					
Linear			24*** (8.31)	-1.4e+03*** (-11.78)	4.9e+04*** (13.17)
Quadratic				2.9*** (11.89)	-2.1e+02*** (-13.32)
Cubic					.3*** (13.47)
Constant	2.4e+02*** (12.50)	2.5e+02*** (4.81)	-5.4e+03*** (-8.08)	1.6e+05*** (11.69)	-3.8e+06*** (-13.02)
Num of Obs	1.6e+02	1.6e+02	1.6e+02	1.6e+02	1.6e+02
R ²	9.4e-02	.13	.53	.8	.91

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 13: Regression Models of Weekly SDs of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	4.7e+02*** (12.27)	5.6e+02*** (14.65)	2.8e+02*** (7.70)	84** (2.97)	14 (0.80)
Country FEs					
Brazil		2.1e-12 (0.00)	-2.7e-13 (-0.00)	2.8e-10 (0.00)	-2.3e-08 (-0.00)
Costa Rica		2.2e-12 (0.00)	-2.7e-13 (-0.00)	2.8e-10 (0.00)	-2.3e-08 (-0.00)
El Salvador		-93*** (-6.60)	-47*** (-4.01)	-14 (-1.56)	-2.3 (-0.33)
Guatemala		2.2e-12 (0.00)	-2.7e-13 (-0.00)	2.8e-10 (0.00)	-2.3e-08 (-0.00)
Mexico		2.2e-12 (0.00)	-2.7e-13 (-0.00)	2.8e-10 (0.00)	-2.3e-08 (-0.00)
Nicaragua		1.0e+02*** (3.94)	-24 (-1.16)	-11 (-0.83)	12 (1.22)
Time Trends					
Linear			1.8*** (28.23)	-1.1e+02*** (-37.86)	4.2e+03*** (42.12)
Quadratic				1.8e-02*** (38.16)	-1.4*** (-42.53)
Cubic					1.5e-04*** (42.96)
Constant	2.3e+02*** (44.55)	2.4e+02*** (17.37)	-5.3e+03*** (-27.45)	1.7e+05*** (37.60)	-4.3e+06*** (-41.72)
Num of Obs	2.0e+03	2.0e+03	2.0e+03	2.0e+03	2.0e+03
R ²	9.0e-02	.12	.5	.76	.88

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 14: Regression Models of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
Treatment Effect	1.8e+03*** (41.36)	1.6e+03*** (36.05)	1.6e+03*** (35.68)	1.6e+03*** (35.61)	1.6e+03*** (35.51)	1.6e+03*** (40.50)
Country FEs						
Brazil		1.5e+02*** (95.15)	1.5e+02*** (90.55)	1.5e+02*** (99.86)	1.5e+02*** (99.10)	1.5e+02*** (58.85)
Costa Rica		2.2e+02*** (71.37)	2.2e+02*** (72.75)	2.2e+02*** (71.62)	2.2e+02*** (72.91)	2.2e+02*** (67.69)
El Salvador		4.0e+02*** (81.73)	4.0e+02*** (81.92)	4.0e+02*** (83.03)	4.0e+02*** (84.38)	3.9e+02*** (93.30)
Guatemala		1.4e+02*** (60.15)	1.4e+02*** (56.14)	1.4e+02*** (57.95)	1.4e+02*** (58.12)	1.4e+02*** (49.09)
Mexico		56*** (45.05)	56*** (41.27)	56*** (43.93)	56*** (43.57)	56*** (23.51)
Nicaragua		3.7e+02*** (88.56)	3.7e+02*** (83.73)	3.7e+02*** (82.49)	3.7e+02*** (82.21)	3.6e+02*** (106.16)
Time Trends						
Linear			1.4e-02*** (9.52)	-4.2e-02*** (-5.96)	-.11*** (-5.41)	
Quadratic				2.6e-05*** (8.12)	1.0e-04*** (4.00)	
Cubic					-2.2e-08** (-2.74)	
Constant	3.1e+02*** (190.73)	1.4e+02*** (162.32)	1.2e+02*** (63.62)	1.4e+02*** (46.32)	1.6e+02*** (40.97)	1.4e+02*** (78.39)
Num of Obs	1.0e+04	1.0e+04	1.0e+04	1.0e+04	1.0e+04	1.0e+04
R ²	.68	.82	.82	.82	.82	.87

Source: Bloomberg

Notes: Panama is the comparison country for country fixed effects

Model 6 has suppressed daily fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 15: Regression Models of Monthly SDs of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	4.4e+02*** (6.48)	5.2e+02*** (7.76)	2.5e+02*** (3.86)	78 (1.55)	16 (0.54)
Country FEs					
Brazil		1.2e-12 (0.00)	-9.7e-13 (-0.00)	1.7e-10 (0.00)	-7.4e-09 (-0.00)
Costa Rica		1.2e-12 (0.00)	-9.7e-13 (-0.00)	1.7e-10 (0.00)	-7.4e-09 (-0.00)
El Salvador		-85** (-3.16)	-40 (-1.95)	-13 (-0.79)	-2.7 (-0.21)
Guatemala		1.2e-12 (0.00)	-9.7e-13 (-0.00)	1.7e-10 (0.00)	-7.4e-09 (-0.00)
Mexico		1.2e-12 (0.00)	-9.7e-13 (-0.00)	1.7e-10 (0.00)	-7.4e-09 (-0.00)
Nicaragua		99* (2.09)	-19 (-0.53)	-8 (-0.32)	11 (0.63)
Time Trends					
Linear			7.4*** (15.07)	-4.0e+02*** (-17.88)	1.6e+04*** (19.50)
Quadratic				.28*** (18.06)	-22*** (-19.69)
Cubic					1.0e-02*** (19.90)
Constant	2.2e+02*** (22.72)	2.3e+02*** (8.77)	-5.1e+03*** (-14.66)	1.4e+05*** (17.72)	-3.7e+06*** (-19.31)
Num of Obs	4.7e+02	4.7e+02	4.7e+02	4.7e+02	4.7e+02
R ²	9.2e-02	.13	.55	.78	.89

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 16: Regression Models of Quarterly SDs of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	4.7e+02*** (4.29)	5.6e+02*** (5.10)	2.6e+02* (2.48)	74 (0.97)	13 (0.32)
Country FEs					
Brazil		-3.4e-14 (-0.00)	-1.5e-13 (-0.00)	4.6e-11 (0.00)	-3.5e-09 (-0.00)
Costa Rica		-3.3e-14 (-0.00)	-1.5e-13 (-0.00)	4.7e-11 (0.00)	-3.5e-09 (-0.00)
El Salvador		-96 (-1.97)	-44 (-1.18)	-13 (-0.47)	-2.3 (-0.11)
Guatemala		-3.4e-14 (-0.00)	-1.5e-13 (-0.00)	4.7e-11 (0.00)	-3.5e-09 (-0.00)
Mexico		-4.4e-14 (-0.00)	-1.5e-13 (-0.00)	4.6e-11 (0.00)	-3.5e-09 (-0.00)
Nicaragua		1.1e+02 (1.23)	-21 (-0.33)	-8.5 (-0.21)	11 (0.38)
Time Trends					
Linear			23*** (9.23)	-1.2e+03*** (-11.85)	4.3e+04*** (12.96)
Quadratic				2.5*** (11.98)	-1.8e+02*** (-13.11)
Cubic					.26*** (13.27)
Constant	2.3e+02*** (13.07)	2.4e+02*** (5.01)	-5.2e+03*** (-8.98)	1.4e+05*** (11.73)	-3.3e+06*** (-12.81)
Num of Obs	1.6e+02	1.6e+02	1.6e+02	1.6e+02	1.6e+02
R ²	9.6e-02	.13	.57	.81	.91

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 17: Regression Models of Weekly SDs of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	4.4e+02*** (13.12)	5.2e+02*** (15.69)	2.5e+02*** (7.96)	79** (3.25)	18 (1.22)
Country FEs					
Brazil		2.6e-12 (0.00)	2.1e-13 (0.00)	2.4e-10 (0.00)	-2.0e-08 (-0.00)
Costa Rica		2.6e-12 (0.00)	2.1e-13 (0.00)	2.4e-10 (0.00)	-2.0e-08 (-0.00)
El Salvador		-86*** (-6.59)	-41*** (-4.04)	-13 (-1.64)	-2.9 (-0.47)
Guatemala		2.6e-12 (0.00)	2.2e-13 (0.00)	2.4e-10 (0.00)	-2.0e-08 (-0.00)
Mexico		2.6e-12 (0.00)	2.2e-13 (0.00)	2.4e-10 (0.00)	-2.0e-08 (-0.00)
Nicaragua		1.0e+02*** (4.38)	-20 (-1.09)	-9 (-0.73)	11 (1.29)
Time Trends					
Linear			1.7*** (31.40)	-95*** (-37.96)	3.7e+03*** (41.67)
Quadratic				1.6e-02*** (38.32)	-1.2*** (-42.09)
Cubic					1.3e-04*** (42.53)
Constant	2.3e+02*** (46.83)	2.3e+02*** (18.18)	-5.2e+03*** (-30.55)	1.4e+05*** (37.63)	-3.8e+06*** (-41.26)
Num of Obs	2.0e+03	2.0e+03	2.0e+03	2.0e+03	2.0e+03
R ²	9.1e-02	.13	.54	.78	.88

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 18: Regression Models of First Difference of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
Treatment Effect	13** (3.08)	13** (2.97)	13** (2.95)	13** (2.94)	13** (2.92)	12** (3.11)
Country FEs						
Brazil		-.18 (-0.56)	-.18 (-0.56)	-.18 (-0.56)	-.18 (-0.56)	-.16 (-0.46)
Costa Rica		-.13 (-0.38)	-.13 (-0.38)	-.13 (-0.38)	-.13 (-0.38)	-.12 (-0.31)
El Salvador		.31 (0.65)	.31 (0.64)	.3 (0.62)	.3 (0.63)	.38 (0.81)
Guatemala		-.19 (-0.96)	-.19 (-0.96)	-.19 (-0.96)	-.19 (-0.96)	-.17 (-0.64)
Mexico		-7.0e-02 (-0.52)	-7.0e-02 (-0.52)	-7.0e-02 (-0.52)	-7.0e-02 (-0.52)	-5.1e-02 (-0.21)
Nicaragua		-.26 (-0.65)	-.26 (-0.63)	-.27 (-0.64)	-.27 (-0.64)	-.28 (-0.64)
Time Trends						
Linear			-4.8e-07 (-0.00)	2.2e-04 (0.30)	1.0e-04 (0.06)	
Quadratic				-9.9e-08 (-0.30)	2.8e-08 (0.01)	
Cubic					-3.9e-11 (-0.05)	
Constant	-7.5e-02 (-0.69)	-2.5e-03 (-0.04)	-2.0e-03 (-0.01)	-8.1e-02 (-0.26)	-6.0e-02 (-0.19)	-1.6e-02 (-0.09)
Num of Obs	8.2e+03	8.2e+03	8.2e+03	8.2e+03	8.2e+03	8.2e+03
R ²	2.2e-02	2.2e-02	2.2e-02	2.2e-02	2.2e-02	.23

Source: Bloomberg

Notes: Panama is the comparison country for country fixed effects

Model 6 has suppressed daily fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 19: Regression Models of Percent Change in Monthly SDs of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	63*** (3.68)	75*** (4.30)	47* (2.57)	26 (1.36)	20 (1.02)
Country FEs					
Brazil		-3.8e-14 (-0.00)	1.1e-13 (0.00)	2.7e-12 (0.00)	-5.6e-10 (-0.00)
Costa Rica		-3.8e-14 (-0.00)	1.1e-13 (0.00)	2.7e-12 (0.00)	-5.6e-10 (-0.00)
El Salvador		-12* (-2.07)	-7.7 (-1.31)	-4.3 (-0.75)	-3.3 (-0.61)
Guatemala		-3.8e-14 (-0.00)	1.1e-13 (0.00)	2.7e-12 (0.00)	-5.6e-10 (-0.00)
Mexico		-3.8e-14 (-0.00)	1.1e-13 (0.00)	2.6e-12 (0.00)	-5.6e-10 (-0.00)
Nicaragua		11 (1.05)	-1.9 (-0.20)	-0.72 (-0.08)	1.2 (0.13)
Time Trends					
Linear			.79*** (7.23)	-51*** (-7.07)	1.6e+03*** (3.68)
Quadratic				3.6e-02*** (7.12)	-2.2*** (-3.72)
Cubic					1.0e-03*** (3.75)
Constant	13*** (6.26)	13* (2.58)	-5.5e+02*** (-7.21)	1.8e+04*** (7.03)	-3.6e+05*** (-3.65)
Num of Obs	4.7e+02	4.7e+02	4.7e+02	4.7e+02	4.7e+02
R ²	5.0e-02	6.5e-02	.18	.27	.3

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 20: Regression Models of Percent Change in Quarterly SDs of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	1.7e+02*** (8.97)	2.1e+02*** (10.49)	1.2e+02*** (4.60)	59 (1.97)	42 (1.17)
Country FEs					
Brazil		-1.1e-13 (-0.00)	2.4e-14 (0.00)	-2.3e-11 (-0.00)	9.6e-10 (0.00)
Costa Rica		-1.1e-13 (-0.00)	2.4e-14 (0.00)	-2.3e-11 (-0.00)	9.6e-10 (0.00)
El Salvador		-37 (-1.87)	-21 (-1.14)	-10 (-0.63)	-7.5 (-0.51)
Guatemala		-1.1e-13 (-0.00)	2.3e-14 (0.00)	-2.3e-11 (-0.00)	9.6e-10 (0.00)
Mexico		-1.1e-13 (-0.00)	2.4e-14 (0.00)	-2.3e-11 (-0.00)	9.6e-10 (0.00)
Nicaragua		33 (0.93)	-5.6 (-0.19)	-2.8 (-0.11)	3.5 (0.15)
Time Trends					
Linear			6.9*** (7.11)	-4.4e+02*** (-9.69)	1.4e+04*** (4.98)
Quadratic				.94*** (9.80)	-61*** (-5.03)
Cubic					8.6e-02*** (5.08)
Constant	37*** (5.38)	39* (2.17)	-1.6e+03*** (-7.07)	5.2e+04*** (9.59)	-1.1e+06*** (-4.94)
Num of Obs	1.6e+02	1.6e+02	1.6e+02	1.6e+02	1.6e+02
R ²	9.7e-02	.13	.39	.59	.65

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 21: Regression Models of Percent Change in Weekly SDs of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	15** (3.23)	17*** (3.81)	11* (2.30)	6.1 (1.25)	4.9 (0.99)
Country FEs					
Brazil		1.1e-13 (0.00)	1.9e-13 (0.00)	-1.9e-12 (-0.00)	-3.0e-10 (-0.00)
Costa Rica		1.1e-13 (0.00)	1.9e-13 (0.00)	-1.9e-12 (-0.00)	-3.0e-10 (-0.00)
El Salvador		-2.9* (-2.35)	-1.8 (-1.49)	-1 (-0.85)	-.81 (-0.69)
Guatemala		1.1e-13 (0.00)	1.9e-13 (0.00)	-1.9e-12 (-0.00)	-3.0e-10 (-0.00)
Mexico		1.1e-13 (0.00)	1.9e-13 (0.00)	-1.9e-12 (-0.00)	-3.0e-10 (-0.00)
Nicaragua		2.5 (1.20)	-.48 (-0.23)	-.2 (-0.10)	.19 (0.09)
Time Trends					
Linear			4.3e-02*** (7.67)	-2.6*** (-7.05)	71*** (3.77)
Quadratic				4.3e-04*** (7.08)	-2.3e-02*** (-3.81)
Cubic					2.6e-06*** (3.85)
Constant	3*** (7.37)	3.1** (3.05)	-1.3e+02*** (-7.65)	4.0e+03*** (7.01)	-7.2e+04*** (-3.73)
Num of Obs	2.0e+03	2.0e+03	2.0e+03	2.0e+03	2.0e+03
R ²	1.5e-02	2.0e-02	5.7e-02	8.4e-02	9.0e-02

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 22: Regression Models of First Difference of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
Treatment Effect	14** (3.10)	13** (2.96)	14** (2.94)	14** (2.92)	14** (2.90)	13** (3.08)
Country FEs						
Brazil		-.18 (-0.49)	-.18 (-0.49)	-.18 (-0.49)	-.18 (-0.49)	-.19 (-0.47)
Costa Rica		-.2 (-0.53)	-.2 (-0.53)	-.2 (-0.53)	-.2 (-0.53)	-.2 (-0.50)
El Salvador		.5 (0.89)	.5 (0.86)	.49 (0.86)	.49 (0.86)	.57 (1.03)
Guatemala		-.14 (-0.68)	-.14 (-0.68)	-.14 (-0.68)	-.14 (-0.68)	-.15 (-0.51)
Mexico		-6.6e-02 (-0.36)	-6.6e-02 (-0.36)	-6.6e-02 (-0.36)	-6.6e-02 (-0.36)	-6.8e-02 (-0.25)
Nicaragua		-.19 (-0.46)	-.17 (-0.41)	-.18 (-0.42)	-.18 (-0.42)	-.2 (-0.45)
Time Trends						
Linear			-2.7e-05 (-0.15)	1.2e-04 (0.15)	3.0e-05 (0.02)	
Quadratic				-6.9e-08 (-0.18)	3.8e-08 (0.02)	
Cubic					-3.2e-11 (-0.04)	
Constant	-7.0e-02 (-0.58)	-2.8e-02 (-0.36)	1.2e-03 (0.01)	-5.3e-02 (-0.15)	-3.6e-02 (-0.10)	-2.5e-02 (-0.13)
Num of Obs	8.2e+03	8.2e+03	8.2e+03	8.2e+03	8.2e+03	8.2e+03
R ²	2.1e-02	2.2e-02	2.2e-02	2.2e-02	2.2e-02	.23

Source: Bloomberg

Notes: Panama is the comparison country for country fixed effects

Model 6 has suppressed daily fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 23: Regression Models of Percent Change in Monthly SDs of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	65*** (3.92)	77*** (4.57)	48** (2.73)	27 (1.49)	22 (1.15)
Country FEs					
Brazil		1.4e-13 (0.00)	2.8e-13 (0.00)	2.8e-12 (0.00)	-5.4e-10 (-0.00)
Costa Rica		1.4e-13 (0.00)	2.8e-13 (0.00)	2.8e-12 (0.00)	-5.4e-10 (-0.00)
El Salvador		-13* (-2.12)	-7.9 (-1.34)	-4.5 (-0.80)	-3.6 (-0.66)
Guatemala		1.4e-13 (0.00)	2.9e-13 (0.00)	2.8e-12 (0.00)	-5.4e-10 (-0.00)
Mexico		1.4e-13 (0.00)	2.8e-13 (0.00)	2.8e-12 (0.00)	-5.4e-10 (-0.00)
Nicaragua		11 (1.05)	-2.1 (-0.21)	-.92 (-0.10)	.91 (0.10)
Time Trends					
Linear			.8*** (7.52)	-49*** (-7.40)	1.5e+03*** (3.76)
Quadratic				3.5e-02*** (7.45)	-2.1*** (-3.80)
Cubic					1.0e-03*** (3.84)
Constant	13*** (6.47)	14** (2.67)	-5.6e+02*** (-7.50)	1.7e+04*** (7.35)	-3.5e+05*** (-3.73)
Num of Obs	4.7e+02	4.7e+02	4.7e+02	4.7e+02	4.7e+02
R ²	5.2e-02	6.8e-02	.19	.28	.3

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 24: Regression Models of Percent Change in Quarterly SDs of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	1.7e+02*** (8.89)	2.1e+02*** (10.38)	1.2e+02*** (4.45)	63 (1.92)	47 (1.19)
Country FEs					
Brazil		-7.8e-14 (-0.00)	5.4e-14 (0.00)	-2.2e-11 (-0.00)	9.2e-10 (0.00)
Costa Rica		-7.8e-14 (-0.00)	5.4e-14 (0.00)	-2.2e-11 (-0.00)	9.2e-10 (0.00)
El Salvador		-38 (-1.87)	-22 (-1.14)	-11 (-0.65)	-8.3 (-0.54)
Guatemala		-7.8e-14 (-0.00)	5.4e-14 (0.00)	-2.2e-11 (-0.00)	9.1e-10 (0.00)
Mexico		-7.8e-14 (-0.00)	5.5e-14 (0.00)	-2.2e-11 (-0.00)	9.1e-10 (0.00)
Nicaragua		33 (0.92)	-5.9 (-0.19)	-3.2 (-0.12)	2.8 (0.12)
Time Trends					
Linear			7*** (7.10)	-4.2e+02*** (-9.11)	1.4e+04*** (4.49)
Quadratic				.9*** (9.22)	-58*** (-4.53)
Cubic					8.2e-02*** (4.58)
Constant	38*** (5.45)	40* (2.20)	-1.6e+03*** (-7.07)	5.0e+04*** (9.02)	-1.1e+06*** (-4.45)
Num of Obs	1.6e+02	1.6e+02	1.6e+02	1.6e+02	1.6e+02
R ²	9.7e-02	.13	.39	.57	.62

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 25: Regression Models of Percent Change in Weekly SDs of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	15*** (3.34)	18*** (3.94)	11* (2.38)	6.5 (1.35)	5.4 (1.10)
Country FEs					
Brazil		-4.2e-14 (-0.00)	4.5e-14 (0.00)	-2.0e-12 (-0.00)	-2.9e-10 (-0.00)
Costa Rica		-4.2e-14 (-0.00)	4.5e-14 (0.00)	-2.0e-12 (-0.00)	-2.9e-10 (-0.00)
El Salvador		-2.9* (-2.34)	-1.8 (-1.48)	-1.1 (-0.88)	-.88 (-0.73)
Guatemala		-4.2e-14 (-0.00)	4.5e-14 (0.00)	-2.0e-12 (-0.00)	-2.9e-10 (-0.00)
Mexico		-4.2e-14 (-0.00)	4.5e-14 (0.00)	-2.0e-12 (-0.00)	-2.9e-10 (-0.00)
Nicaragua		2.5 (1.17)	-.54 (-0.25)	-.27 (-0.13)	.11 (0.05)
Time Trends					
Linear			4.3e-02*** (7.83)	-2.5*** (-7.01)	68*** (3.62)
Quadratic				4.2e-04*** (7.05)	-2.2e-02*** (-3.66)
Cubic					2.5e-06*** (3.70)
Constant	3*** (7.47)	3.2** (3.10)	-1.3e+02*** (-7.81)	3.9e+03*** (6.97)	-6.9e+04*** (-3.58)
Num of Obs	2.0e+03	2.0e+03	2.0e+03	2.0e+03	2.0e+03
R ²	1.6e-02	2.0e-02	5.7e-02	8.2e-02	8.7e-02

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 26: Regression Models of First Difference of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
Treatment Effect	13** (3.05)	13** (2.91)	13** (2.91)	13** (2.90)	13** (2.88)	12** (3.06)
Country FEs						
Brazil		-2.4e-02 (-0.10)	-2.4e-02 (-0.10)	-2.4e-02 (-0.10)	-2.3e-02 (-0.10)	-2.7e-03 (-0.01)
Costa Rica		-.26 (-0.73)	-.26 (-0.73)	-.26 (-0.73)	-.26 (-0.73)	-.24 (-0.64)
El Salvador		.48 (0.85)	.47 (0.80)	.45 (0.78)	.44 (0.77)	.54 (1.00)
Guatemala		-.17 (-0.77)	-.16 (-0.77)	-.16 (-0.77)	-.16 (-0.76)	-.14 (-0.52)
Mexico		-8.8e-02 (-0.49)	-8.8e-02 (-0.49)	-8.8e-02 (-0.48)	-8.8e-02 (-0.48)	-6.7e-02 (-0.27)
Nicaragua		-.17 (-0.44)	-.13 (-0.32)	-.13 (-0.33)	-.15 (-0.37)	-.13 (-0.30)
Time Trends						
Linear			-8.9e-05 (-0.51)	2.5e-04 (0.32)	-7.7e-04 (-0.41)	
Quadratic				-1.6e-07 (-0.44)	1.0e-06 (0.43)	
Cubic					-3.5e-10 (-0.46)	
Constant	-2.3e-02 (-0.20)	1.3e-02 (0.15)	.11 (0.53)	-1.4e-02 (-0.04)	.18 (0.44)	-6.9e-03 (-0.04)
Num of Obs	8.2e+03	8.2e+03	8.2e+03	8.2e+03	8.2e+03	8.2e+03
R ²	2.2e-02	2.2e-02	2.2e-02	2.2e-02	2.2e-02	.24

Source: Bloomberg

Notes: Panama is the comparison country for country fixed effects

Model 6 has suppressed daily fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 27: Regression Models of Percent Change in Monthly SDs of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	57*** (3.78)	68*** (4.42)	43** (2.67)	26 (1.53)	21 (1.20)
Country FEs					
Brazil		-8.1e-14 (-0.00)	4.7e-14 (0.00)	2.1e-12 (0.00)	-4.6e-10 (-0.00)
Costa Rica		-8.1e-14 (-0.00)	4.7e-14 (0.00)	2.1e-12 (0.00)	-4.6e-10 (-0.00)
El Salvador		-11* (-2.03)	-7.1 (-1.31)	-4.3 (-0.81)	-3.5 (-0.68)
Guatemala		-8.1e-14 (-0.00)	4.7e-14 (0.00)	2.1e-12 (0.00)	-4.6e-10 (-0.00)
Mexico		-8.1e-14 (-0.00)	4.7e-14 (0.00)	2.1e-12 (0.00)	-4.5e-10 (-0.00)
Nicaragua		9 (0.96)	-2.1 (-0.23)	-1.1 (-0.12)	.48 (0.06)
Time Trends					
Linear			.69*** (7.17)	-41*** (-7.06)	1.3e+03*** (3.60)
Quadratic				2.9e-02*** (7.12)	-1.8*** (-3.64)
Cubic					8.5e-04*** (3.68)
Constant	12*** (6.49)	13** (2.68)	-4.8e+02*** (-7.14)	1.5e+04*** (7.01)	-3.0e+05*** (-3.56)
Num of Obs	4.7e+02	4.7e+02	4.7e+02	4.7e+02	4.7e+02
R ²	4.9e-02	6.3e-02	.17	.24	.26

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 28: Regression Models of Percent Change in Quarterly SDs of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	1.5e+02*** (8.79)	1.9e+02*** (10.16)	1.1e+02*** (4.31)	59 (1.88)	45 (1.21)
Country FEs					
Brazil		-1.3e-14 (-0.00)	1.0e-13 (0.00)	-1.9e-11 (-0.00)	7.7e-10 (0.00)
Costa Rica		-1.4e-14 (-0.00)	1.0e-13 (0.00)	-1.9e-11 (-0.00)	7.7e-10 (0.00)
El Salvador		-33 (-1.83)	-19 (-1.12)	-10 (-0.66)	-8.1 (-0.57)
Guatemala		-1.4e-14 (-0.00)	1.0e-13 (0.00)	-1.9e-11 (-0.00)	7.7e-10 (0.00)
Mexico		-1.5e-14 (-0.00)	1.0e-13 (0.00)	-1.9e-11 (-0.00)	7.7e-10 (0.00)
Nicaragua		27 (0.87)	-5.8 (-0.21)	-3.4 (-0.15)	1.6 (0.07)
Time Trends					
Linear			6*** (6.96)	-3.6e+02*** (-8.61)	1.1e+04*** (4.17)
Quadratic				.76*** (8.71)	-49*** (-4.22)
Cubic					6.9e-02*** (4.26)
Constant	35*** (5.64)	37* (2.29)	-1.4e+03*** (-6.92)	4.2e+04*** (8.51)	-8.9e+05*** (-4.13)
Num of Obs	1.6e+02	1.6e+02	1.6e+02	1.6e+02	1.6e+02
R ²	9.5e-02	.13	.37	.53	.58

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 29: Regression Models of Percent Change in Weekly SDs of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	13** (3.27)	16*** (3.85)	9.8* (2.34)	5.9 (1.37)	4.9 (1.13)
Country FEs					
Brazil		8.1e-14 (0.00)	1.6e-13 (0.00)	-1.5e-12 (-0.00)	-2.5e-10 (-0.00)
Costa Rica		8.1e-14 (0.00)	1.6e-13 (0.00)	-1.5e-12 (-0.00)	-2.5e-10 (-0.00)
El Salvador		-2.6* (-2.22)	-1.6 (-1.41)	-.98 (-0.87)	-.82 (-0.73)
Guatemala		8.1e-14 (0.00)	1.6e-13 (0.00)	-1.5e-12 (-0.00)	-2.5e-10 (-0.00)
Mexico		8.1e-14 (0.00)	1.6e-13 (0.00)	-1.5e-12 (-0.00)	-2.5e-10 (-0.00)
Nicaragua		2.1 (1.07)	-.54 (-0.28)	-.32 (-0.16)	1.4e-02 (0.01)
Time Trends					
Linear			3.8e-02*** (7.54)	-2.1*** (-6.71)	60*** (3.53)
Quadratic				3.5e-04*** (6.75)	-2.0e-02*** (-3.57)
Cubic					2.1e-06*** (3.62)
Constant	2.8*** (7.45)	2.9** (3.10)	-1.1e+02*** (-7.51)	3.3e+03*** (6.66)	-6.1e+04*** (-3.49)
Num of Obs	2.0e+03	2.0e+03	2.0e+03	2.0e+03	2.0e+03
R ²	1.4e-02	1.8e-02	5.2e-02	7.2e-02	7.7e-02

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 30: Regression Models of First Difference of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
Treatment Effect	1.0e-02* (2.28)	9.2e-03* (2.03)	9.5e-03* (2.03)	9.4e-03 (1.95)	9.2e-03 (1.87)	7.9e-03 (1.71)
Country FEs						
Brazil		-6.6e-04 (-0.43)	-6.6e-04 (-0.43)	-6.6e-04 (-0.43)	-6.6e-04 (-0.43)	-6.3e-04 (-0.48)
Costa Rica		-5.5e-04 (-0.35)	-5.5e-04 (-0.35)	-5.5e-04 (-0.35)	-5.5e-04 (-0.35)	-5.2e-04 (-0.38)
El Salvador		4.5e-04 (0.32)	4.1e-04 (0.29)	4.2e-04 (0.29)	4.5e-04 (0.31)	7.0e-04 (0.54)
Guatemala		-9.9e-04 (-0.70)	-9.9e-04 (-0.70)	-9.9e-04 (-0.70)	-9.9e-04 (-0.70)	-9.6e-04 (-0.80)
Mexico		-9.6e-04 (-0.60)	-9.6e-04 (-0.60)	-9.6e-04 (-0.60)	-9.6e-04 (-0.60)	-9.3e-04 (-0.74)
Nicaragua		-6.6e-04 (-0.48)	-5.4e-04 (-0.38)	-5.4e-04 (-0.38)	-4.7e-04 (-0.33)	-5.0e-04 (-0.42)
Time Trends						
Linear			-2.5e-07 (-0.38)	-3.8e-07 (-0.14)	3.4e-06 (0.54)	
Quadratic				5.8e-11 (0.05)	-4.2e-09 (-0.60)	
Cubic					1.3e-12 (0.58)	
Constant	-4.3e-04 (-1.04)	6.7e-05 (0.06)	3.4e-04 (0.26)	3.9e-04 (0.26)	-3.1e-04 (-0.18)	2.7e-05 (0.03)
Num of Obs	8.2e+03	8.2e+03	8.2e+03	8.2e+03	8.2e+03	8.2e+03
R ²	1.8e-03	1.9e-03	2.0e-03	2.0e-03	2.0e-03	.32

Source: Bloomberg

Notes: Panama is the comparison country for country fixed effects

Model 6 has suppressed daily fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 31: Regression Models of Percent Change in Monthly SDs of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	.13** (2.65)	.16** (3.02)	.11 (1.92)	8.0e-02 (1.39)	8.0e-02 (1.37)
Country FEs					
Brazil		-5.9e-17 (-0.00)	2.1e-16 (0.00)	3.5e-15 (0.00)	-3.0e-14 (-0.00)
Costa Rica		-5.8e-17 (-0.00)	2.1e-16 (0.00)	3.5e-15 (0.00)	-3.0e-14 (-0.00)
El Salvador		-2.6e-02 (-0.95)	-1.8e-02 (-0.63)	-1.3e-02 (-0.48)	-1.3e-02 (-0.47)
Guatemala		-5.8e-17 (-0.00)	2.1e-16 (0.00)	3.5e-15 (0.00)	-3.0e-14 (-0.00)
Mexico		-5.8e-17 (-0.00)	2.1e-16 (0.00)	3.5e-15 (0.00)	-3.0e-14 (-0.00)
Nicaragua		2.6e-02 (0.65)	2.6e-03 (0.06)	4.1e-03 (0.10)	4.2e-03 (0.10)
Time Trends					
Linear			1.4e-03*** (4.18)	-6.5e-02** (-2.70)	3.0e-02 (0.02)
Quadratic				4.6e-05** (2.76)	-8.6e-05 (-0.04)
Cubic					6.2e-08 (0.07)
Constant	3.1e-02*** (3.91)	3.2e-02 (1.62)	-1*** (-4.14)	23** (2.65)	-2.4e-02 (-0.00)
Num of Obs	4.7e+02	4.7e+02	4.7e+02	4.7e+02	4.7e+02
R ²	1.5e-02	2.0e-02	4.6e-02	5.5e-02	5.5e-02

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 32: Regression Models of Percent Change in Quarterly SDs of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	.33*** (3.44)	.4*** (3.75)	.24 (1.97)	.17 (1.23)	.16 (1.17)
Country FEs					
Brazil		-1.3e-16 (-0.00)	1.1e-16 (0.00)	-2.8e-14 (-0.00)	2.7e-13 (0.00)
Costa Rica		-1.3e-16 (-0.00)	1.1e-16 (0.00)	-2.8e-14 (-0.00)	2.7e-13 (0.00)
El Salvador		-7.2e-02 (-1.06)	-4.3e-02 (-0.64)	-3.0e-02 (-0.45)	-2.9e-02 (-0.44)
Guatemala		-1.3e-16 (-0.00)	1.1e-16 (0.00)	-2.8e-14 (-0.00)	2.7e-13 (0.00)
Mexico		-1.3e-16 (-0.00)	1.1e-16 (0.00)	-2.8e-14 (-0.00)	2.7e-13 (0.00)
Nicaragua		7.7e-02 (0.80)	7.2e-03 (0.08)	1.1e-02 (0.11)	1.3e-02 (0.13)
Time Trends					
Linear			1.3e-02*** (5.13)	-.53** (-3.21)	3.9 (0.36)
Quadratic				1.1e-03** (3.28)	-1.7e-02 (-0.38)
Cubic					2.6e-05 (0.41)
Constant	9.3e-02*** (4.68)	9.5e-02 (1.88)	-2.9*** (-5.07)	61** (3.14)	-2.9e+02 (-0.34)
Num of Obs	1.6e+02	1.6e+02	1.6e+02	1.6e+02	1.6e+02
R ²	4.5e-02	6.4e-02	.17	.21	.21

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 33: Regression Models of Percent Change in Weekly SDs of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	2.9e-02** (2.84)	3.5e-02** (3.27)	2.3e-02* (2.02)	1.7e-02 (1.45)	1.7e-02 (1.47)
Country FEs					
Brazil		-1.5e-16 (-0.00)	4.7e-18 (0.00)	-2.6e-15 (-0.00)	4.9e-14 (0.00)
Costa Rica		-1.5e-16 (-0.00)	4.7e-18 (0.00)	-2.6e-15 (-0.00)	4.9e-14 (0.00)
El Salvador		-5.8e-03 (-1.01)	-3.8e-03 (-0.66)	-2.8e-03 (-0.49)	-2.8e-03 (-0.49)
Guatemala		-1.5e-16 (-0.00)	4.7e-18 (0.00)	-2.6e-15 (-0.00)	4.8e-14 (0.00)
Mexico		-1.5e-16 (-0.00)	4.8e-18 (0.00)	-2.6e-15 (-0.00)	4.9e-14 (0.00)
Nicaragua		5.7e-03 (0.71)	2.2e-04 (0.03)	5.7e-04 (0.07)	5.0e-04 (0.06)
Time Trends					
Linear			7.8e-05*** (4.51)	-3.2e-03** (-3.04)	-1.6e-02 (-0.24)
Quadratic				5.3e-07** (3.10)	4.6e-06 (0.21)
Cubic					-4.4e-10 (-0.19)
Constant	7.2e-03*** (4.44)	7.5e-03 (1.85)	-.23*** (-4.46)	4.9** (2.98)	18 (0.26)
Num of Obs	2.0e+03	2.0e+03	2.0e+03	2.0e+03	2.0e+03
R ²	4.0e-03	5.3e-03	1.3e-02	1.6e-02	1.6e-02

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 34: Regression Models of First Difference of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
Treatment Effect	1.0e-02* (2.27)	8.9e-03* (1.97)	9.0e-03 (1.95)	8.9e-03 (1.85)	8.7e-03 (1.77)	7.2e-03 (1.60)
Country FEs						
Brazil		-1.8e-04 (-0.14)	-1.8e-04 (-0.14)	-1.8e-04 (-0.14)	-1.8e-04 (-0.14)	-1.9e-04 (-0.17)
Costa Rica		-1.1e-04 (-0.08)	-1.1e-04 (-0.08)	-1.1e-04 (-0.08)	-1.1e-04 (-0.08)	-1.2e-04 (-0.10)
El Salvador		1.2e-03 (0.99)	1.2e-03 (0.96)	1.2e-03 (0.97)	1.2e-03 (1.00)	1.5e-03 (1.28)
Guatemala		-2.8e-04 (-0.24)	-2.8e-04 (-0.24)	-2.8e-04 (-0.24)	-2.8e-04 (-0.24)	-2.9e-04 (-0.30)
Mexico		-2.8e-04 (-0.23)	-2.8e-04 (-0.23)	-2.8e-04 (-0.23)	-2.9e-04 (-0.23)	-3.0e-04 (-0.31)
Nicaragua		-1.4e-05 (-0.01)	3.9e-05 (0.03)	4.8e-05 (0.04)	1.1e-04 (0.09)	5.3e-05 (0.05)
Time Trends						
Linear			-1.1e-07 (-0.19)	-7.0e-07 (-0.30)	2.5e-06 (0.48)	
Quadratic				2.7e-10 (0.24)	-3.4e-09 (-0.56)	
Cubic					1.1e-12 (0.57)	
Constant	-3.5e-04 (-0.97)	-3.7e-04 (-0.47)	-2.5e-04 (-0.25)	-3.6e-05 (-0.03)	-6.4e-04 (-0.45)	-3.7e-04 (-0.61)
Num of Obs	8.2e+03	8.2e+03	8.2e+03	8.2e+03	8.2e+03	8.2e+03
R ²	2.2e-03	2.4e-03	2.4e-03	2.4e-03	2.5e-03	.31

Source: Bloomberg

Notes: Panama is the comparison country for country fixed effects

Model 6 has suppressed daily fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 35: Regression Models of Percent Change in Monthly SDs of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	.13** (2.60)	.15** (2.99)	.1 (1.91)	8.2e-02 (1.45)	8.1e-02 (1.42)
Country FEs					
Brazil		-3.8e-17 (-0.00)	2.2e-16 (0.00)	2.9e-15 (0.00)	-8.6e-14 (-0.00)
Costa Rica		-3.7e-17 (-0.00)	2.2e-16 (0.00)	2.9e-15 (0.00)	-8.6e-14 (-0.00)
El Salvador		-2.6e-02 (-1.00)	-1.7e-02 (-0.67)	-1.4e-02 (-0.53)	-1.3e-02 (-0.52)
Guatemala		-3.7e-17 (-0.00)	2.2e-16 (0.00)	2.9e-15 (0.00)	-8.6e-14 (-0.00)
Mexico		-3.7e-17 (-0.00)	2.2e-16 (0.00)	2.9e-15 (0.00)	-8.6e-14 (-0.00)
Nicaragua		2.3e-02 (0.61)	4.6e-04 (0.01)	1.7e-03 (0.05)	2.0e-03 (0.05)
Time Trends					
Linear			1.4e-03*** (4.23)	-5.3e-02* (-2.42)	.2 (0.15)
Quadratic				3.8e-05* (2.47)	-3.2e-04 (-0.17)
Cubic					1.6e-07 (0.19)
Constant	3.1e-02*** (4.22)	3.3e-02 (1.76)	-.97*** (-4.18)	18* (2.36)	-42 (-0.13)
Num of Obs	4.7e+02	4.7e+02	4.7e+02	4.7e+02	4.7e+02
R ²	1.6e-02	2.1e-02	4.9e-02	5.6e-02	5.6e-02

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 36: Regression Models of Percent Change in Quarterly SDs of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	.32** (3.25)	.39*** (3.60)	.23 (1.88)	.17 (1.27)	.16 (1.20)
Country FEs					
Brazil		-1.8e-16 (-0.00)	5.7e-17 (0.00)	-2.2e-14 (-0.00)	3.3e-13 (0.00)
Costa Rica		-1.8e-16 (-0.00)	5.6e-17 (0.00)	-2.2e-14 (-0.00)	3.3e-13 (0.00)
El Salvador		-6.9e-02 (-1.10)	-4.1e-02 (-0.66)	-3.0e-02 (-0.49)	-2.9e-02 (-0.48)
Guatemala		-1.8e-16 (-0.00)	5.4e-17 (0.00)	-2.2e-14 (-0.00)	3.3e-13 (0.00)
Mexico		-1.8e-16 (-0.00)	5.6e-17 (0.00)	-2.2e-14 (-0.00)	3.3e-13 (0.00)
Nicaragua		7.0e-02 (0.75)	2.2e-03 (0.02)	5.0e-03 (0.06)	7.3e-03 (0.08)
Time Trends					
Linear			1.2e-02*** (5.11)	-.42** (-2.76)	4.9 (0.48)
Quadratic				9.1e-04** (2.83)	-2.1e-02 (-0.50)
Cubic					3.1e-05 (0.52)
Constant	9.3e-02*** (4.98)	9.6e-02* (2.01)	-2.9*** (-5.06)	49** (2.69)	-3.7e+02 (-0.47)
Num of Obs	1.6e+02	1.6e+02	1.6e+02	1.6e+02	1.6e+02
R ²	4.7e-02	6.5e-02	.18	.21	.21

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 37: Regression Models of Percent Change in Weekly SDs of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	2.9e-02** (2.78)	3.4e-02** (3.24)	2.2e-02* (2.00)	1.7e-02 (1.53)	1.7e-02 (1.52)
Country FEs					
Brazil		1.0e-16 (0.00)	2.6e-16 (0.00)	-1.8e-15 (-0.00)	2.3e-15 (0.00)
Costa Rica		1.0e-16 (0.00)	2.6e-16 (0.00)	-1.8e-15 (-0.00)	2.3e-15 (0.00)
El Salvador		-5.6e-03 (-1.03)	-3.7e-03 (-0.67)	-2.9e-03 (-0.53)	-2.9e-03 (-0.53)
Guatemala		1.0e-16 (0.00)	2.6e-16 (0.00)	-1.8e-15 (-0.00)	2.3e-15 (0.00)
Mexico		1.0e-16 (0.00)	2.6e-16 (0.00)	-1.8e-15 (-0.00)	2.3e-15 (0.00)
Nicaragua		4.9e-03 (0.63)	-3.9e-04 (-0.05)	-1.1e-04 (-0.01)	-1.1e-04 (-0.01)
Time Trends					
Linear			7.6e-05*** (4.46)	-2.6e-03* (-2.56)	-3.6e-03 (-0.06)
Quadratic				4.3e-07** (2.62)	7.6e-07 (0.04)
Cubic					-3.6e-11 (-0.02)
Constant	7.2e-03*** (4.60)	7.5e-03 (1.93)	-.23*** (-4.40)	3.9* (2.50)	4.9 (0.08)
Num of Obs	2.0e+03	2.0e+03	2.0e+03	2.0e+03	2.0e+03
R ²	4.1e-03	5.3e-03	1.4e-02	1.5e-02	1.5e-02

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 38: Regression Models of First Difference of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
Treatment Effect	9.0e-03*	8.1e-03*	8.5e-03*	8.5e-03*	8.5e-03	7.3e-03
	(2.29)	(2.02)	(2.06)	(1.99)	(1.94)	(1.84)
Country FEs						
Brazil		-5.5e-05	-5.4e-05	-5.4e-05	-5.4e-05	-2.3e-05
		(-0.06)	(-0.06)	(-0.06)	(-0.06)	(-0.03)
Costa Rica		-5.6e-04	-5.6e-04	-5.6e-04	-5.6e-04	-5.3e-04
		(-0.52)	(-0.52)	(-0.52)	(-0.52)	(-0.54)
El Salvador		7.2e-04	6.6e-04	6.6e-04	6.6e-04	8.9e-04
		(0.72)	(0.65)	(0.65)	(0.65)	(0.95)
Guatemala		-5.7e-04	-5.7e-04	-5.7e-04	-5.7e-04	-5.4e-04
		(-0.64)	(-0.64)	(-0.64)	(-0.64)	(-0.69)
Mexico		-3.6e-04	-3.6e-04	-3.6e-04	-3.6e-04	-3.3e-04
		(-0.41)	(-0.41)	(-0.41)	(-0.41)	(-0.49)
Nicaragua		-3.0e-04	-1.3e-04	-1.3e-04	-1.3e-04	-9.1e-05
		(-0.35)	(-0.15)	(-0.15)	(-0.15)	(-0.12)
Time Trends						
Linear			-3.3e-07	-3.6e-07	-1.3e-07	
			(-0.71)	(-0.19)	(-0.03)	
Quadratic				1.1e-11	-2.5e-10	
				(0.01)	(-0.05)	
Cubic					7.9e-14	
					(0.05)	
Constant	-1.3e-04	4.2e-05	4.0e-04	4.1e-04	3.7e-04	2.4e-07
	(-0.47)	(0.08)	(0.55)	(0.44)	(0.32)	(0.00)
Num of Obs	8.2e+03	8.2e+03	8.2e+03	8.2e+03	8.2e+03	8.2e+03
R ²	2.8e-03	3.1e-03	3.1e-03	3.1e-03	3.1e-03	.33

Source: Bloomberg

Notes: Panama is the comparison country for country fixed effects

Model 6 has suppressed daily fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 39: Regression Models of Percent Change in Monthly SDs of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	.12* (2.43)	.14** (2.81)	9.8e-02 (1.88)	8.0e-02 (1.47)	7.7e-02 (1.39)
Country FEs					
Brazil		-1.1e-16 (-0.00)	1.1e-16 (0.00)	2.4e-15 (0.00)	-2.9e-13 (-0.00)
Costa Rica		-1.1e-16 (-0.00)	1.1e-16 (0.00)	2.4e-15 (0.00)	-2.9e-13 (-0.00)
El Salvador		-2.3e-02 (-1.00)	-1.6e-02 (-0.70)	-1.3e-02 (-0.56)	-1.3e-02 (-0.54)
Guatemala		-1.1e-16 (-0.00)	1.1e-16 (0.00)	2.4e-15 (0.00)	-2.9e-13 (-0.00)
Mexico		-1.1e-16 (-0.00)	1.1e-16 (0.00)	2.3e-15 (0.00)	-2.9e-13 (-0.00)
Nicaragua		1.6e-02 (0.47)	-2.3e-03 (-0.07)	-1.3e-03 (-0.04)	-2.6e-04 (-0.01)
Time Trends					
Linear			1.2e-03*** (3.68)	-4.4e-02* (-2.27)	.8 (0.64)
Quadratic				3.2e-05* (2.32)	-1.1e-03 (-0.66)
Cubic					5.5e-07 (0.68)
Constant	3.2e-02*** (4.64)	3.4e-02 (1.94)	-.8*** (-3.61)	16* (2.22)	-1.8e+02 (-0.63)
Num of Obs	4.7e+02	4.7e+02	4.7e+02	4.7e+02	4.7e+02
R ²	1.5e-02	1.9e-02	4.2e-02	4.8e-02	4.9e-02

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 40: Regression Models of Percent Change in Quarterly SDs of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	.29** (2.99)	.35** (3.32)	.22 (1.84)	.17 (1.29)	.16 (1.16)
Country FEs					
Brazil		-8.3e-17 (-0.00)	1.1e-16 (0.00)	-2.0e-14 (-0.00)	5.6e-13 (0.00)
Costa Rica		-8.5e-17 (-0.00)	1.1e-16 (0.00)	-2.0e-14 (-0.00)	5.6e-13 (0.00)
El Salvador		-6.2e-02 (-1.06)	-3.9e-02 (-0.67)	-2.9e-02 (-0.51)	-2.8e-02 (-0.48)
Guatemala		-8.3e-17 (-0.00)	1.1e-16 (0.00)	-2.0e-14 (-0.00)	5.6e-13 (0.00)
Mexico		-8.4e-17 (-0.00)	1.1e-16 (0.00)	-2.0e-14 (-0.00)	5.6e-13 (0.00)
Nicaragua		5.1e-02 (0.58)	-5.6e-03 (-0.06)	-3.2e-03 (-0.04)	4.8e-04 (0.01)
Time Trends					
Linear			1.0e-02*** (4.51)	-.37* (-2.57)	8.2 (0.88)
Quadratic				8.0e-04** (2.64)	-3.5e-02 (-0.90)
Cubic					5.0e-05 (0.91)
Constant	9.6e-02*** (5.55)	1.0e-01* (2.26)	-2.3*** (-4.43)	43* (2.51)	-6.4e+02 (-0.86)
Num of Obs	1.6e+02	1.6e+02	1.6e+02	1.6e+02	1.6e+02
R ²	4.4e-02	5.9e-02	.15	.18	.18

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 41: Regression Models of Percent Change in Weekly SDs of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	2.6e-02** (2.63)	3.1e-02** (3.06)	2.0e-02 (1.94)	1.7e-02 (1.52)	1.6e-02 (1.45)
Country FEs					
Brazil		4.1e-17 (0.00)	1.7e-16 (0.00)	-1.5e-15 (-0.00)	-1.7e-13 (-0.00)
Costa Rica		4.1e-17 (0.00)	1.7e-16 (0.00)	-1.5e-15 (-0.00)	-1.7e-13 (-0.00)
El Salvador		-5.0e-03 (-1.00)	-3.4e-03 (-0.66)	-2.7e-03 (-0.54)	-2.6e-03 (-0.52)
Guatemala		4.2e-17 (0.00)	1.7e-16 (0.00)	-1.5e-15 (-0.00)	-1.7e-13 (-0.00)
Mexico		4.1e-17 (0.00)	1.7e-16 (0.00)	-1.5e-15 (-0.00)	-1.7e-13 (-0.00)
Nicaragua		3.5e-03 (0.49)	-1.0e-03 (-0.14)	-8.2e-04 (-0.11)	-6.0e-04 (-0.08)
Time Trends					
Linear			6.5e-05*** (4.00)	-2.1e-03* (-2.18)	3.9e-02 (0.65)
Quadratic				3.4e-07* (2.24)	-1.3e-05 (-0.66)
Cubic					1.4e-09 (0.68)
Constant	7.3e-03*** (5.05)	7.6e-03* (2.12)	-.19*** (-3.92)	3.1* (2.12)	-39 (-0.63)
Num of Obs	2.0e+03	2.0e+03	2.0e+03	2.0e+03	2.0e+03
R ²	3.9e-03	4.8e-03	1.2e-02	1.3e-02	1.3e-02

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 42: Regression Models of Log of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
Treatment Effect	2.5*** (90.55)	1.6*** (56.91)	1.6*** (55.35)	1.5*** (54.65)	1.6*** (50.50)	1.6*** (69.99)
Country FEs						
Brazil		1.4*** (99.39)	1.4*** (99.66)	1.4*** (108.45)	1.4*** (109.63)	1.4*** (148.22)
Costa Rica		1.7*** (100.34)	1.7*** (99.20)	1.7*** (99.83)	1.7*** (104.20)	1.7*** (115.24)
El Salvador		2.2*** (151.51)	2.2*** (147.38)	2.2*** (157.16)	2.2*** (163.77)	2.2*** (198.82)
Guatemala		1.4*** (90.07)	1.4*** (91.38)	1.4*** (99.10)	1.4*** (98.53)	1.4*** (115.36)
Mexico		.49*** (33.67)	.49*** (33.65)	.49*** (35.97)	.49*** (35.60)	.49*** (49.87)
Nicaragua		2.1*** (139.62)	2.1*** (135.85)	2.1*** (140.86)	2.1*** (138.90)	2.1*** (205.86)
Time Trends						
Linear			-4.4e-05*** (-7.01)	-4.8e-04*** (-19.64)	-1.4e-03*** (-27.52)	
Quadratic				2.0e-07*** (18.50)	1.3e-06*** (21.10)	
Cubic					-3.3e-10*** (-16.89)	
Constant	5*** (596.95)	3.8*** (324.42)	3.8*** (292.94)	4*** (271.45)	4.1*** (278.48)	3.8*** (463.36)
Num of Obs	1.0e+04	1.0e+04	1.0e+04	1.0e+04	1.0e+04	1.0e+04
R ²	.18	.82	.82	.82	.83	.9

Source: Bloomberg

Notes: Panama is the comparison country for country fixed effects

Model 6 has suppressed daily fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 43: Regression Models of Log of Monthly SDs of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	1.3*** (10.13)	1.5*** (11.93)	.68*** (5.59)	.21* (2.43)	9.9e-02 (1.65)
Country FEs					
Brazil		-4.1e-16 (-0.00)	-7.4e-15 (-0.00)	4.8e-13 (0.00)	-1.3e-11 (-0.00)
Costa Rica		-4.2e-16 (-0.00)	-7.4e-15 (-0.00)	4.8e-13 (0.00)	-1.3e-11 (-0.00)
El Salvador		-.25** (-2.95)	-.11 (-1.76)	-3.4e-02 (-0.70)	-1.6e-02 (-0.36)
Guatemala		-4.1e-16 (-0.00)	-7.4e-15 (-0.00)	4.8e-13 (0.00)	-1.3e-11 (-0.00)
Mexico		-4.2e-16 (-0.00)	-7.4e-15 (-0.00)	4.8e-13 (0.00)	-1.3e-11 (-0.00)
Nicaragua		.32* (2.37)	-5.2e-02 (-0.54)	-2.2e-02 (-0.32)	1.2e-02 (0.21)
Time Trends					
Linear			2.4e-02*** (19.57)	-1.1*** (-23.95)	27*** (12.41)
Quadratic				7.8e-04*** (24.34)	-3.9e-02*** (-12.62)
Cubic					1.8e-05*** (12.83)
Constant	5.1*** (173.74)	5.1*** (66.82)	-12*** (-13.79)	3.9e+02*** (23.86)	-6.3e+03*** (-12.21)
Num of Obs	4.7e+02	4.7e+02	4.7e+02	4.7e+02	4.7e+02
R ²	9.2e-02	.13	.62	.82	.86

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 44: Regression Models of Log of Quarterly SDs of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	1.3*** (6.78)	1.6*** (7.92)	.66*** (3.59)	.17 (1.53)	7.2e-02 (0.95)
Country FEs					
Brazil		2.1e-16 (0.00)	-1.6e-16 (-0.00)	1.2e-13 (0.00)	-5.7e-12 (-0.00)
Costa Rica		2.1e-16 (0.00)	-1.7e-16 (-0.00)	1.2e-13 (0.00)	-5.7e-12 (-0.00)
El Salvador		-.28 (-1.85)	-.11 (-1.10)	-2.9e-02 (-0.42)	-1.2e-02 (-0.20)
Guatemala		2.2e-16 (0.00)	-1.7e-16 (-0.00)	1.2e-13 (0.00)	-5.7e-12 (-0.00)
Mexico		2.0e-16 (0.00)	-1.6e-16 (-0.00)	1.2e-13 (0.00)	-5.7e-12 (-0.00)
Nicaragua		.35 (1.46)	-5.5e-02 (-0.35)	-2.2e-02 (-0.23)	9.8e-03 (0.11)
Time Trends					
Linear			7.3e-02*** (12.68)	-3.1*** (-16.79)	69*** (8.04)
Quadratic				6.6e-03*** (17.11)	-.3*** (-8.19)
Cubic					4.2e-04*** (8.34)
Constant	5.2*** (100.42)	5.2*** (38.12)	-12*** (-9.02)	3.6e+02*** (16.70)	-5.3e+03*** (-7.89)
Num of Obs	1.6e+02	1.6e+02	1.6e+02	1.6e+02	1.6e+02
R ²	9.6e-02	.14	.67	.87	.91

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 45: Regression Models of Log of Weekly SDs of 3-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	1.3*** (20.15)	1.5*** (23.69)	.69*** (11.52)	.21*** (5.18)	.11*** (3.59)
Country FEs					
Brazil		-7.9e-15 (-0.00)	-1.5e-14 (-0.00)	6.4e-13 (0.00)	-3.6e-11 (-0.00)
Costa Rica		-7.9e-15 (-0.00)	-1.5e-14 (-0.00)	6.4e-13 (0.00)	-3.6e-11 (-0.00)
El Salvador		-.25*** (-6.17)	-.11*** (-3.67)	-3.5e-02 (-1.48)	-1.7e-02 (-0.79)
Guatemala		-7.9e-15 (-0.00)	-1.5e-14 (-0.00)	6.5e-13 (0.00)	-3.6e-11 (-0.00)
Mexico		-7.9e-15 (-0.00)	-1.5e-14 (-0.00)	6.5e-13 (0.00)	-3.6e-11 (-0.00)
Nicaragua		.33*** (4.93)	-5.2e-02 (-1.09)	-2.3e-02 (-0.70)	1.3e-02 (0.45)
Time Trends					
Linear			5.4e-03*** (40.10)	-.26*** (-50.15)	6.5*** (26.38)
Quadratic				4.3e-05*** (50.95)	-2.1e-03*** (-26.82)
Cubic					2.3e-07*** (27.27)
Constant	5.1*** (358.99)	5.1*** (138.85)	-12*** (-28.24)	4.0e+02*** (49.97)	-6.6e+03*** (-25.95)
Num of Obs	2.0e+03	2.0e+03	2.0e+03	2.0e+03	2.0e+03
R ²	9.2e-02	.13	.6	.81	.85

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 46: Regression Models of Log of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
Treatment Effect	2.3*** (86.97)	1.5*** (57.13)	1.6*** (55.87)	1.5*** (55.66)	1.5*** (51.48)	1.6*** (74.34)
Country FEs						
Brazil		1.1*** (102.16)	1.1*** (103.93)	1.1*** (113.87)	1.1*** (114.85)	1.1*** (149.99)
Costa Rica		1.3*** (96.93)	1.3*** (95.55)	1.3*** (96.00)	1.3*** (101.10)	1.3*** (110.52)
El Salvador		1.7*** (142.70)	1.7*** (137.39)	1.7*** (144.19)	1.7*** (152.41)	1.7*** (186.73)
Guatemala		1*** (84.47)	1*** (86.51)	1*** (93.45)	1*** (92.69)	1*** (114.35)
Mexico		.4*** (38.64)	.4*** (38.88)	.4*** (42.00)	.4*** (41.35)	.4*** (59.74)
Nicaragua		1.7*** (140.43)	1.7*** (138.98)	1.7*** (141.72)	1.7*** (137.52)	1.7*** (209.77)
Time Trends						
Linear			-4.2e-05*** (-8.18)	-3.8e-04*** (-18.77)	-1.3e-03*** (-30.48)	
Quadratic				1.5e-07*** (17.83)	1.2e-06*** (24.63)	
Cubic					-3.3e-10*** (-20.71)	
Constant	5.3*** (806.18)	4.4*** (522.69)	4.4*** (446.43)	4.5*** (390.37)	4.7*** (389.38)	4.4*** (766.66)
Num of Obs	1.0e+04	1.0e+04	1.0e+04	1.0e+04	1.0e+04	1.0e+04
R ²	.22	.81	.81	.82	.82	.9

Source: Bloomberg

Notes: Panama is the comparison country for country fixed effects

Model 6 has suppressed daily fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 47: Regression Models of Log of Monthly SDs of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	1.3*** (10.53)	1.6*** (12.35)	.63*** (5.51)	.19* (2.33)	.11 (1.70)
Country FEs					
Brazil		-6.6e-15 (-0.00)	-1.4e-14 (-0.00)	4.4e-13 (0.00)	-9.9e-12 (-0.00)
Costa Rica		-6.6e-15 (-0.00)	-1.4e-14 (-0.00)	4.4e-13 (0.00)	-9.9e-12 (-0.00)
El Salvador		-.25** (-2.89)	-.1 (-1.74)	-3.1e-02 (-0.69)	-1.7e-02 (-0.40)
Guatemala		-6.6e-15 (-0.00)	-1.4e-14 (-0.00)	4.4e-13 (0.00)	-9.9e-12 (-0.00)
Mexico		-6.6e-15 (-0.00)	-1.4e-14 (-0.00)	4.4e-13 (0.00)	-9.9e-12 (-0.00)
Nicaragua		.37** (2.76)	-3.3e-02 (-0.37)	-3.9e-03 (-0.06)	2.2e-02 (0.38)
Time Trends					
Linear			2.5e-02*** (21.81)	-1*** (-25.49)	21*** (9.71)
Quadratic				7.4e-04*** (25.96)	-3.0e-02*** (-9.91)
Cubic					1.4e-05*** (10.13)
Constant	5.2*** (172.24)	5.2*** (66.08)	-13*** (-15.74)	3.7e+02*** (25.38)	-4.9e+03*** (-9.50)
Num of Obs	4.7e+02	4.7e+02	4.7e+02	4.7e+02	4.7e+02
R ²	9.0e-02	.13	.67	.85	.87

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 48: Regression Models of Log of Quarterly SDs of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	1.3*** (7.11)	1.6*** (8.22)	.62*** (3.60)	.15 (1.48)	7.8e-02 (1.02)
Country FEs					
Brazil		1.8e-15 (0.00)	1.4e-15 (0.00)	1.2e-13 (0.00)	-4.3e-12 (-0.00)
Costa Rica		1.8e-15 (0.00)	1.4e-15 (0.00)	1.2e-13 (0.00)	-4.3e-12 (-0.00)
El Salvador		-.28 (-1.81)	-.11 (-1.09)	-2.6e-02 (-0.41)	-1.3e-02 (-0.22)
Guatemala		1.8e-15 (0.00)	1.4e-15 (0.00)	1.2e-13 (0.00)	-4.3e-12 (-0.00)
Mexico		1.8e-15 (0.00)	1.4e-15 (0.00)	1.2e-13 (0.00)	-4.4e-12 (-0.00)
Nicaragua		.39 (1.67)	-3.6e-02 (-0.25)	-4.7e-03 (-0.05)	1.9e-02 (0.23)
Time Trends					
Linear			7.7e-02*** (13.94)	-2.9*** (-18.51)	52*** (6.10)
Quadratic				6.3e-03*** (18.89)	-.22*** (-6.25)
Cubic					3.2e-04*** (6.41)
Constant	5.2*** (99.28)	5.2*** (37.61)	-13*** (-10.11)	3.5e+02*** (18.39)	-4.0e+03*** (-5.95)
Num of Obs	1.6e+02	1.6e+02	1.6e+02	1.6e+02	1.6e+02
R ²	9.4e-02	.14	.72	.9	.91

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 49: Regression Models of Log of Weekly SDs of 5-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	1.3*** (20.93)	1.6*** (24.52)	.64*** (11.39)	.2*** (4.99)	.11*** (3.72)
Country FEs					
Brazil		6.3e-15 (0.00)	-1.5e-15 (-0.00)	6.2e-13 (0.00)	-2.8e-11 (-0.00)
Costa Rica		6.3e-15 (0.00)	-1.5e-15 (-0.00)	6.2e-13 (0.00)	-2.8e-11 (-0.00)
El Salvador		-.26*** (-6.05)	-.11*** (-3.65)	-3.2e-02 (-1.46)	-1.8e-02 (-0.87)
Guatemala		6.3e-15 (0.00)	-1.5e-15 (-0.00)	6.2e-13 (0.00)	-2.8e-11 (-0.00)
Mexico		6.3e-15 (0.00)	-1.5e-15 (-0.00)	6.2e-13 (0.00)	-2.8e-11 (-0.00)
Nicaragua		.37*** (5.73)	-3.3e-02 (-0.74)	-5.2e-03 (-0.17)	2.3e-02 (0.80)
Time Trends					
Linear			5.8e-03*** (44.66)	-.24*** (-53.25)	5*** (20.91)
Quadratic				4.0e-05*** (54.19)	-1.7e-03*** (-21.34)
Cubic					1.8e-07*** (21.80)
Constant	5.2*** (356.39)	5.2*** (137.50)	-13*** (-32.21)	3.8e+02*** (53.01)	-5.1e+03*** (-20.48)
Num of Obs	2.0e+03	2.0e+03	2.0e+03	2.0e+03	2.0e+03
R ²	9.0e-02	.13	.66	.84	.86

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 50: Regression Models of Log of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5	Model 6
Treatment Effect	2*** (85.98)	1.4*** (57.10)	1.4*** (55.71)	1.3*** (55.56)	1.3*** (53.11)	1.4*** (74.31)
Country FEs						
Brazil		.75*** (97.48)	.75*** (98.36)	.75*** (109.54)	.75*** (107.40)	.75*** (127.26)
Costa Rica		.92*** (91.74)	.92*** (91.05)	.92*** (91.81)	.92*** (94.78)	.92*** (102.65)
El Salvador		1.3*** (136.79)	1.3*** (132.55)	1.3*** (137.28)	1.3*** (142.43)	1.3*** (166.14)
Guatemala		.69*** (71.20)	.69*** (72.71)	.69*** (76.88)	.69*** (76.56)	.68*** (90.47)
Mexico		.35*** (47.76)	.35*** (48.44)	.35*** (52.25)	.35*** (51.08)	.35*** (67.98)
Nicaragua		1.3*** (140.84)	1.3*** (140.71)	1.3*** (141.27)	1.3*** (137.66)	1.3*** (206.06)
Time Trends						
Linear			-2.0e-05*** (-4.92)	-2.5e-04*** (-16.30)	-7.5e-04*** (-20.98)	
Quadratic				1.1e-07*** (16.21)	6.7e-07*** (16.47)	
Cubic					-1.7e-10*** (-13.46)	
Constant	5.6*** (1117.93)	4.9*** (819.17)	4.9*** (656.97)	5*** (555.30)	5.1*** (512.54)	4.9*** (1122.85)
Num of Obs	1.0e+04	1.0e+04	1.0e+04	1.0e+04	1.0e+04	1.0e+04
R ²	.28	.81	.81	.82	.82	.89

Source: Bloomberg

Notes: Panama is the comparison country for country fixed effects

Model 6 has suppressed daily fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 51: Regression Models of Log of Monthly SDs of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	1.3*** (11.18)	1.5*** (12.91)	.54*** (5.27)	.19* (2.44)	.11 (1.88)
Country FEs					
Brazil		-3.8e-16 (-0.00)	-8.4e-15 (-0.00)	3.5e-13 (0.00)	-9.3e-12 (-0.00)
Costa Rica		-3.8e-16 (-0.00)	-8.4e-15 (-0.00)	3.5e-13 (0.00)	-9.3e-12 (-0.00)
El Salvador		-.25** (-2.76)	-8.8e-02 (-1.73)	-3.1e-02 (-0.74)	-1.8e-02 (-0.45)
Guatemala		-3.7e-16 (-0.00)	-8.4e-15 (-0.00)	3.5e-13 (0.00)	-9.3e-12 (-0.00)
Mexico		-3.9e-16 (-0.00)	-8.4e-15 (-0.00)	3.5e-13 (0.00)	-9.3e-12 (-0.00)
Nicaragua		.42** (3.26)	-1.9e-02 (-0.24)	3.7e-03 (0.06)	2.8e-02 (0.51)
Time Trends					
Linear			2.7e-02*** (27.19)	-.8*** (-21.48)	20*** (9.62)
Quadratic				5.8e-04*** (22.03)	-2.8e-02*** (-9.78)
Cubic					1.3e-05*** (9.97)
Constant	5.1*** (170.40)	5.1*** (65.22)	-14*** (-20.28)	2.8e+02*** (21.30)	-4.6e+03*** (-9.45)
Num of Obs	4.7e+02	4.7e+02	4.7e+02	4.7e+02	4.7e+02
R ²	8.7e-02	.14	.76	.87	.88

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 52: Regression Models of Log of Quarterly SDs of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	1.3*** (7.58)	1.6*** (8.55)	.52*** (3.50)	.15 (1.56)	8.4e-02 (1.13)
Country FEs					
Brazil		-2.5e-15 (-0.00)	-3.0e-15 (-0.00)	9.0e-14 (0.00)	-4.1e-12 (-0.00)
Costa Rica		-2.5e-15 (-0.00)	-3.0e-15 (-0.00)	9.1e-14 (0.00)	-4.1e-12 (-0.00)
El Salvador		-.28 (-1.71)	-8.9e-02 (-1.09)	-2.6e-02 (-0.44)	-1.4e-02 (-0.25)
Guatemala		-2.5e-15 (-0.00)	-3.0e-15 (-0.00)	9.1e-14 (0.00)	-4.1e-12 (-0.00)
Mexico		-2.5e-15 (-0.00)	-2.9e-15 (-0.00)	9.1e-14 (0.00)	-4.1e-12 (-0.00)
Nicaragua		.44 (1.95)	-2.2e-02 (-0.18)	3.2e-03 (0.04)	2.6e-02 (0.33)
Time Trends					
Linear			8.3e-02*** (17.55)	-2.3*** (-15.70)	49*** (6.10)
Quadratic				5.0e-03*** (16.15)	-.21*** (-6.23)
Cubic					3.0e-04*** (6.36)
Constant	5.2*** (97.45)	5.2*** (36.84)	-15*** (-13.14)	2.7e+02*** (15.53)	-3.8e+03*** (-5.98)
Num of Obs	1.6e+02	1.6e+02	1.6e+02	1.6e+02	1.6e+02
R ²	8.9e-02	.14	.8	.91	.92

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 53: Regression Models of Log of Weekly SDs of 10-Year CDS Spreads

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	1.3*** (22.18)	1.5*** (25.65)	.55*** (10.92)	.2*** (5.22)	.12*** (4.08)
Country FEs					
Brazil		-1.8e-14 (-0.00)	-2.7e-14 (-0.00)	4.6e-13 (0.00)	-2.6e-11 (-0.00)
Costa Rica		-1.8e-14 (-0.00)	-2.7e-14 (-0.00)	4.6e-13 (0.00)	-2.6e-11 (-0.00)
El Salvador		-.25*** (-5.79)	-9.0e-02*** (-3.61)	-3.3e-02 (-1.57)	-1.9e-02 (-0.98)
Guatemala		-1.8e-14 (-0.00)	-2.7e-14 (-0.00)	4.6e-13 (0.00)	-2.6e-11 (-0.00)
Mexico		-1.8e-14 (-0.00)	-2.7e-14 (-0.00)	4.6e-13 (0.00)	-2.6e-11 (-0.00)
Nicaragua		.42*** (6.78)	-2.0e-02 (-0.51)	1.8e-03 (0.06)	2.8e-02 (1.03)
Time Trends					
Linear			6.3e-03*** (55.71)	-.19*** (-44.93)	4.7*** (20.65)
Quadratic				3.1e-05*** (46.06)	-1.6e-03*** (-21.01)
Cubic					1.7e-07*** (21.39)
Constant	5.2*** (353.32)	5.2*** (135.99)	-14*** (-41.54)	2.9e+02*** (44.56)	-4.8e+03*** (-20.30)
Num of Obs	2.0e+03	2.0e+03	2.0e+03	2.0e+03	2.0e+03
R ²	8.7e-02	.14	.75	.86	.88

Source: Bloomberg

Note: Panama is the comparison country for country fixed effects

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 54: LATAM Synthetic Control of Remittances

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	219.7*** (12.37)	219.7*** (12.37)	70.96** (3.30)	13.50 (0.47)	-17.84 (-0.51)
Time Trends					
Linear			2.521*** (12.75)	-28.46*** (-3.92)	404.6 (1.71)
Quadratic				0.0226*** (4.22)	-0.608 (-1.76)
Cubic					0.000306 (1.82)
Constant	420.2*** (46.62)	420.2*** (46.62)	-1310.5*** (-9.86)	9305.4*** (3.78)	-89643.0 (-1.66)
Country FEs	No	Yes	Yes	Yes	Yes
Num of Obs	118	118	118	118	118
R ²	0.359	0.359	0.794	0.821	0.825

Source: Bloomberg

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 55: LATAM Synthetic Control of First Difference of Remittances

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	-0.283 (-0.01)	-0.283 (-0.01)	-2.421 (-0.08)	-6.020 (-0.16)	-3.021 (-0.06)
Time Trends					
Linear			0.0365 (0.18)	-1.938 (-0.20)	-44.49 (-0.13)
Quadratic				0.00144 (0.20)	0.0634 (0.13)
Cubic					-0.0000300 (-0.13)
Constant	3.089 (0.53)	3.089 (0.53)	-22.01 (-0.16)	654.9 (0.20)	10385.7 (0.14)
Country FEs	No	Yes	Yes	Yes	Yes
Num of Obs	117	117	117	117	117
R ²	0.00000195	0.00000195	0.000292	0.000631	0.000754

Source: Bloomberg

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 56: LATAM Synthetic Control of Log of Remittances

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	0.440*** (13.99)	0.440*** (13.99)	0.0974* (2.54)	0.0182 (0.34)	-0.0236 (-0.38)
Time Trends					
Linear			0.00580*** (14.16)	-0.0369* (-2.33)	0.541 (1.00)
Quadratic				0.0000311** (2.68)	-0.000811 (-1.03)
Cubic					0.000000409 (1.07)
Constant	6.018*** (293.97)	6.018*** (293.97)	2.036*** (7.35)	16.67** (3.08)	-115.5 (-0.93)
Country FEs	No	Yes	Yes	Yes	Yes
Num of Obs	118	118	118	118	118
R ²	0.307	0.307	0.799	0.810	0.811

Source: Bloomberg

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

SHOCKS

Name	Process	Parameter Values	
Productivity	$\hat{A}(s^t) = \rho_A \hat{A}(s^{t-1}) + \varepsilon_A(s^t)$	$\rho_A = 0.95$	$\sigma(\varepsilon_A) = \text{Varies}^*$
Intenational rate	$\hat{R}^*(s^t) = \rho_1 \hat{R}^*(s^{t-1}) + \varepsilon_R(s^t)$	$\rho_1 = 0.81$	$\sigma(\varepsilon_R) = 0.63\%$
Country risk (independent)	$\hat{D}(s^t) = \rho_2 \hat{D}(s^{t-1}) + \varepsilon_D(s^t)$	$\rho_2 = 0.78$	$\sigma(\varepsilon_D) = 2.59\%$
Country risk (induced)	$\hat{D}(s^t) = -\bar{\eta} E_t(\hat{A}(s^{t+1})) + \varepsilon_I(s^t)$	$\bar{\eta} = 1.04$	$\sigma(\varepsilon_I) = 1.7\%$

PREFERENCE PARAMETERS

Name	Symbol	GHH	Cobb Douglas
Discount factor	β	0.93	0.98
Utility curvature	σ	5	5
Labor curvature	v	1.6	-
Labor weight	ψ	2.48	-
Consumption share	μ	-	0.24

TECHNOLOGY PARAMETERS

Name	Symbol	Value
Technological progress growth	γ	0.62%
Capital exponent (production)	α	0.38
Depreciation rate	δ	4.4%
% labor income paid in advance	θ	1
Bond holding cost	κ	10^{-5}
Capital adjustment costs	ϕ	Varies*

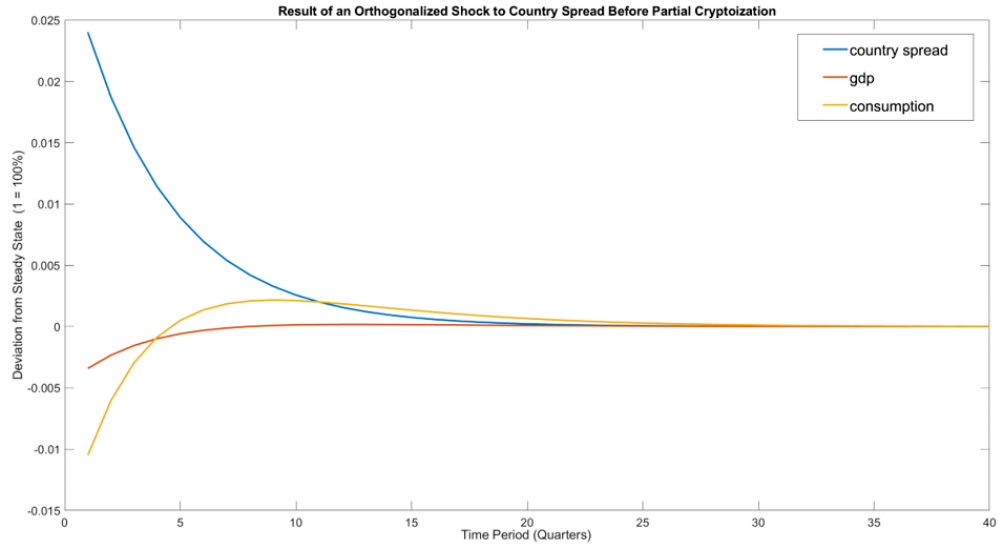


Figure 9

	Before		After	
	Mean	σ	Mean	σ
Consumption	-0.3605	0.0203	-0.3605	0.0625
Country spread	0	0.0384	0	0.1183
GDP	-0.3335	0.0053	-0.3335	0.0162

Table 57

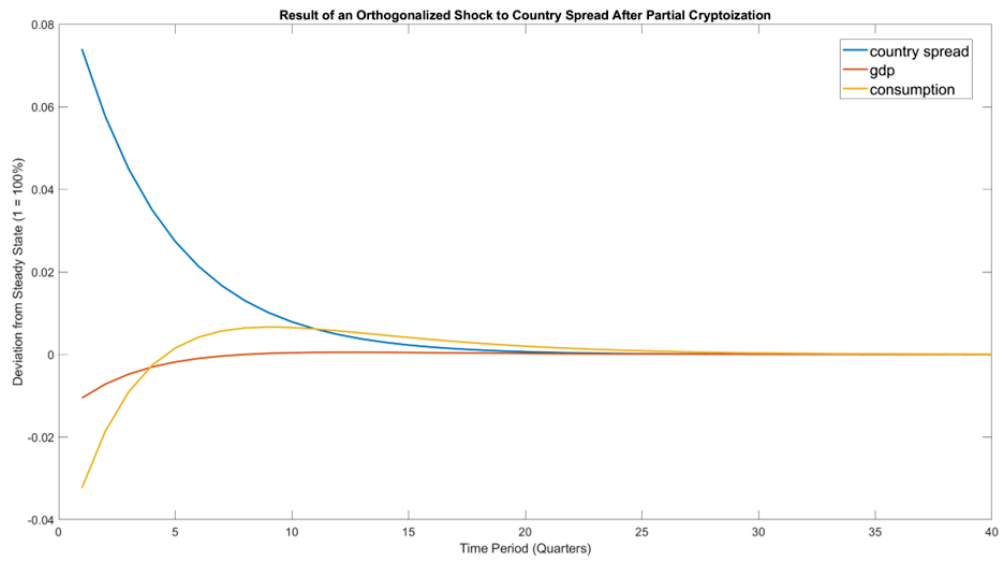


Figure 10

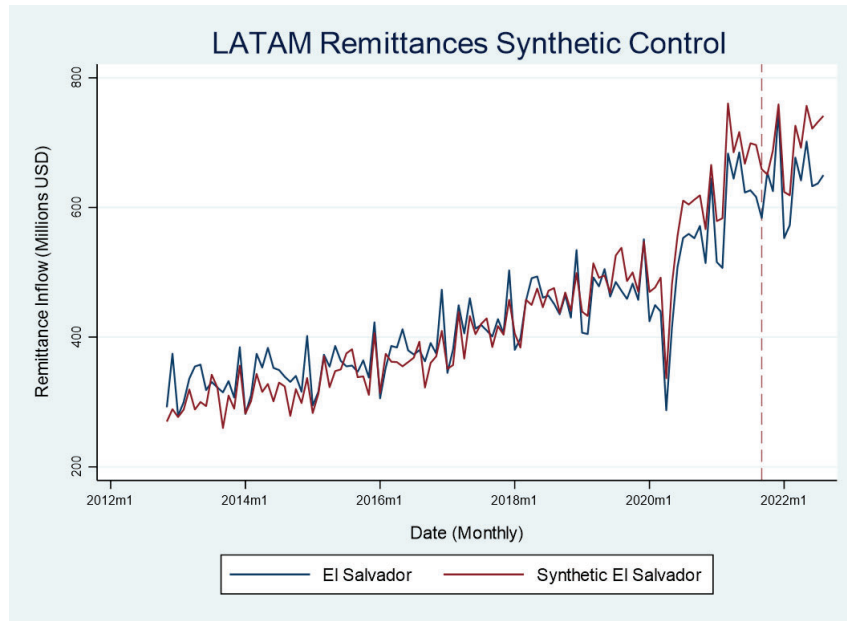


Figure 11

Table 58: LATAM Synthetic Control of First Difference of Remittances

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	-0.283 (-0.01)	-0.283 (-0.01)	-2.421 (-0.08)	-6.020 (-0.16)	-3.021 (-0.06)
Time Trends					
Linear			0.0365 (0.18)	-1.938 (-0.20)	-44.49 (-0.13)
Quadratic				0.00144 (0.20)	0.0634 (0.13)
Cubic					-0.0000300 (-0.13)
Constant	3.089 (0.53)	3.089 (0.53)	-22.01 (-0.16)	654.9 (0.20)	10385.7 (0.14)
Country FEs	No	Yes	Yes	Yes	Yes
Num of Obs	117	117	117	117	117
R ²	0.00000195	0.00000195	0.000292	0.000631	0.000754

Source: Bloomberg

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 59: LATAM Synthetic Control of First Difference of Remittances

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	-0.00268 (-0.07)	-0.00268 (-0.07)	-0.00468 (-0.09)	-0.0134 (-0.20)	-0.00611 (-0.07)
Time Trends					
Linear			0.0000342 (0.07)	-0.00473 (-0.21)	-0.108 (-0.13)
Quadratic				0.00000347 (0.21)	0.000154 (0.13)
Cubic					-7.28e-08 (-0.13)
Constant	0.00712 (0.51)	0.00712 (0.51)	-0.0164 (-0.05)	1.618 (0.20)	25.20 (0.14)
Country FEs	No	Yes	Yes	Yes	Yes
Num of Obs	117	117	117	117	117
R ²	0.0000339	0.0000339	0.0000832	0.000466	0.000606

Source: Bloomberg

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 60: LATAM Synthetic Control of Log of Remittances

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	0.440*** (13.99)	0.440*** (13.99)	0.0974* (2.54)	0.0182 (0.34)	-0.0236 (-0.38)
Time Trends					
Linear			0.00580*** (14.16)	-0.0369* (-2.33)	0.541 (1.00)
Quadratic				0.0000311** (2.68)	-0.000811 (-1.03)
Cubic					0.000000409 (1.07)
Constant	6.018*** (293.97)	6.018*** (293.97)	2.036*** (7.35)	16.67** (3.08)	-115.5 (-0.93)
Country FEs	No	Yes	Yes	Yes	Yes
Num of Obs	118	118	118	118	118
R ²	0.307	0.307	0.799	0.810	0.811

Source: Bloomberg

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$

Table 61: LATAM Synthetic Control of Remittances

	Model 1	Model 2	Model 3	Model 4	Model 5
Treatment Effect	219.7*** (12.37)	219.7*** (12.37)	70.96** (3.30)	13.50 (0.47)	-17.84 (-0.51)
Time Trends					
Linear			2.521*** (12.75)	-28.46*** (-3.92)	404.6 (1.71)
Quadratic				0.0226*** (4.22)	-0.608 (-1.76)
Cubic					0.000306 (1.82)
Constant	420.2*** (46.62)	420.2*** (46.62)	-1310.5*** (-9.86)	9305.4*** (3.78)	-89643.0 (-1.66)
Country FEs	No	Yes	Yes	Yes	Yes
Num of Obs	118	118	118	118	118
R ²	0.359	0.359	0.794	0.821	0.825

Source: Bloomberg

* $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$