

South-South Monetary Regionalism: A case of Productive Incoherence

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Abstract

In assessing the large variety of recent initiatives and institutions in the field of monetary and regional cooperation, Grabel (2018) characterizes this landscape as uneven, partial and fragmented. However, contrary to the common narrative, she argues that the experimental nature of recent innovations may be considered a ‘productive incoherence’. This paper presents a case study of such productive incoherence using the Local Currency Payments System (SML). The results confirm and further refine the ‘Hirschmanian mindset’ utilized by Grabel that assessing incremental changes in terms of specific, sometimes messy, and contingent policies is key to understanding the role institutions play in development.

Keywords: Global financial architecture; regional monetary cooperation; Mercosur; Hirschman; productive incoherence

Área temática: Relações Econômicas Internacionais

Financiamento/Apoio: Universidade de Leeds; Freie Universität Berlin.

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1. Introduction

Economic globalization is under pressure not only since the COVID-19 related crisis. Especially large emerging market economies (EMEs) have been questioning the global liberal order, based on their increasing weight in the global economy. Many of them perceived that their interests are out of sync with the logic of liberalization. Especially the deleterious effects of financial crises in a series of EMEs during the 1990s, and more recently the repercussions of the 2008 global financial crisis and the Covid pandemic – both originating outside EMES but creating disturbing effects also on global finance, showed that the global monetary order and financial architecture is exposing these countries to significant risks, without providing adequate institutions to tackle them.

In this context of shifting power asymmetries, the need for further monetary and financial cooperation among EME has gained new relevance. Empirical evidence reveals the dominant role of the US dollar, followed by a few other central currencies such as the Euro and the Yen in the global monetary system (Armijo et al. 2014). The high degree of dependence of EMEs on these central currencies makes these economies particularly vulnerable to the volatility of international capital flows and these currencies. A stronger South-South financial and monetary cooperation could potentially increase the use of local currencies and, thus, reduce the spillover effects from financial markets in the core to EMEs’.

There is a small, but growing body of literature on south-south monetary and financial regionalism (Ocampo 2018; Grabel 2018; Fritz & Mühlich 2015, 2018; Eichengreen 2018) Recently, Grabel (2019) has analysed the increasing complexity of the landscape of South-South monetary and financial multilateral institutions, especially at the regional level. Drawing on key concepts from Albert O. Hirschman, she argues that the unfolding of institutional innovations that appear to be incoherent and contested (?) may increase the scope for institutional experimentation and, thus, may give rise to alternative forms of economic and social development. Grabel (2018) analyses this development as ‘productive incoherence’. There is a small, but growing body of literature on south-south monetary and financial regionalism (Ocampo 2018; Grabel 2018; Fritz & Mühlich 2015, 2018). However, so far, this literature fails to address sufficiently the issues of intra-regional asymmetries, rivalry and hierarchy that fundamentally shape, and indeed might “productively” enable South-South cooperation (for an exception focusing on regional liquidity pools see Mühlich & Fritz 2021).

In order to address this gap in the literature, this paper presents a case study of the Payment System in Local Currency (*Sistema de Pagos en Moneda Local*, SML) as a mechanism of regional monetary cooperation between the key Mercosur countries Argentina, Brazil, Uruguay and Paraguay. This initiative can be understood part of a broader wave of institution building and innovation in the field of regional monetary and financial South-South cooperation (Grabel, 2018). Especially in Latin America, it brought forward an immensely broad variety of even competing regional cooperation mechanisms (see also Armijo 2012), but more often than not Latin American pursue for regionalism has been perceived as a failure, i.e. Pastrana (2013). To effectively present our case study of Latin American regionalism, in section 2, we first introduce a systematisation of common aspects and differences between regional payments systems by presenting a typology of such mechanisms. Section 3 presents a brief overview of the technical

features of the SML whereas section 4 introduces the concept of productive incoherence. In section 5 then, we discuss the oftentimes contested and conflictive, yet strangely productive, creation of the SML using official documents and the scarce literature on the mechanism, and triangulate these with interviews at the central banks of Argentina, Brazil and Uruguay. Section 6 concludes.

2. Regional payment systems: Definitions, a typology and a comparison

Regional payment systems are international mechanisms designed to facilitate payments between residents of the participating countries. The advantage of this kind of mechanism is not difficult to understand: if a resident of a country, say Bolivia, wishes to buy a good produced in another country, say Nicaragua, the Bolivian resident has to find a way to pay for this good with a currency that is accepted by the Nicaraguan resident. This may be the Nicaraguan córdoba, or a major international reserve currency like the US dollar. In either case, the Bolivian importer has to assume the cost of obtaining a currency different from his/her own currency in order to pay for the Nicaraguan good. While costs for the individual importer may be small (especially for large enterprises), they increase at the aggregate level, depending on the specific funding conditions for the respective country at a certain moment. Aiming at reducing transaction costs at the level of individual transactions, a regional payment system by definition allows firms in each of the participating countries to settle their transactions with firms in other member countries in their domestic currency.¹ The term ‘regional payment system’ is also frequently used to refer to another and more simple approach, especially applied in cases of low harmonization and integration of national payment systems. Such regional payment systems include clearing operations among central banks to simplify and make more transparent and secure intra-regional payments among importers and exporters of the member countries. Initiatives focusing exclusively on technical harmonization of payment systems in a region are not covered.²

According to Chang (2000: 3 p.), a reduction of foreign currency flows and associated transactions costs can be obtained mainly in two ways. First, the number of transactions is reduced to net final settlement at the end of the period, while transactions of equal value cancel

¹ The transaction is realized as follows: when there is agreement between the central bank or the exporter in country A and the central bank or the importer in country B to channel a trade transaction through a payment system, the importer in country B will pay in currency B to central bank B while the exporter in country A will be paid in currency A by central bank A. These payments are frequently made through commercial banks, at the time of the goods’ boarding, and the buyer and producer pay and are paid, respectively, in their own currencies, using their own domestic banking systems.

² The character of technical harmonization without central bank cooperation in the sense of clearing operations at this level applies for example to the plans for monetary union among the Partner States of the East African Community (ECB 2010, p. 126), or the case of the West African Monetary Union (WAMZ), where payment system harmonization of the member systems will be required if finally, one single regional currency is to be established (Itsede 2002, p. 50). The same holds true for the Payment System Project of the South African Development Community (SADC) (see Bassey 2008, p. 14, SADC. 2012 and Ziqubu 2007).

out. Second, temporary liquidity is provided to the deficit countries' central banks by the surplus countries' counterparts, as they allow each other to cancel mutual obligations not immediately, but only at the end of a clearing period. In effect, an efficiently run regional payment system in this simple version may slightly improve the terms of trade for intra-regional trade transactions.

A closer look at past and present regional payment systems shows that a variety of arrangements exist which address the problem of transaction costs in regional trade with a range of different instruments. Since economic literature so far lacks a systematic definition and discussion of regional payment systems, in the following we propose a typology of such systems and give examples. Particular emphasis is placed on the workings of the SML and its nature with regards to our typology

As indicated in Chang (2003)'s discussion, the primary function of reducing transaction costs in intra-regional trade transactions requires the establishment of a clearing mechanism among the central banks of the participating countries, where trade-related payments are registered. Therefore, at the core of a regional trade-related payment system is the agreement between the member countries' central banks to temporarily extend credit to each other by settling the accumulated net differences periodically.

The degree to which regional payments systems can contribute to reducing transaction costs of intra-regional trade transactions at the aggregate level thus depends on three main criteria and the institutionalised mechanisms established between the involved central banks:

(a) *The difference between the gross and net values of trade transactions, and the length of the clearance period:* As a rule, the greater the difference between the number and volume of gross and net transactions, and the longer the clearance period for net surpluses and deficits, the more effective a regional payment system can be in terms of reducing transactions costs in intra-regional trade (Chang, 2000). Additionally, temporary liquidity may rise through the provision of credit by central banks throughout the agreed clearance period.

(b) *The currency denomination of the operation and final clearance, and settlement of surpluses and deficits between the central banks:* When the operation and final clearance and settlement between the central banks are conducted not only in international currencies but also (at least partially) in national currencies of the member countries, transaction costs diminish, because central banks do not need to obtain the equivalent volume of foreign currencies for this purpose.

(c) *Provision of credit beyond the clearance period:* Additional credit can be provided to deficit member countries through credit lines or swap arrangements on terms agreed between the member countries' central banks. Depending on the interest rate charged for these mutual credit lines, this can be more advantageous than financing conditions in financial markets.

Beyond the specific features of clearance, regional payment systems may also incorporate mechanisms for adjustment among deficit and surplus countries at the regional level. Strongly unbalanced intra-regional trade within a regional payment system rewards debtor countries with greater gains in terms of reduced transaction costs, especially when final net clearance in domestic currencies is allowed and/or the provision of credit beyond the clearance period is provided. The higher the intra-regional cumulative deficits, the smaller are the incentives for surplus countries to continue trading within the system. The main benefit expected from such

regional adjustment mechanisms is the prevention of beggar-thy-neighbour policies, especially in periods of balance-of-payments stress of individual member countries. Further to this, deeper macroeconomic cooperation is required to effectively prevent unsustainable imbalances at the regional level, as the ongoing crisis of an even deeper monetary regional integration arrangement - the euro zone - shows.

Regional payment systems can additionally introduce a unit of account, which has two main functions:

(a) *A unit of account reduces transactions costs in multilateral clearing at the macroeconomic level*, as it reduces the number of intra-regional exchange rates to the bilateral exchange rates of each of the currencies towards the regional unit of account. The unit of account is usually fixed to an external key or reference currency. Nominal changes in the exchange rate of individual members' currencies need to be reflected precisely in the adjustment towards the unit of account in order to prevent misalignments against market-based intra-regional exchange rates and avoid trade distortion.

(b) *In a more sophisticated arrangement, the unit of account may emerge as an instrument for intra-regional exchange rate cooperation*, as it may provide a point of reference for regional coordination of exchange rates. It already delivers a common denominator against external currencies that can be used as a target for increasing harmonisation of real exchange rate fluctuations against an external currency or currency basket. Here, more significant gains in terms of increased intra-regional trade may be expected as a result of shielding intra-regional exchange rates from global currency instability through coordinated adjustment. Moreover, it may thus prepare grounds for deeper regional monetary cooperation (see also UNCTAD 2011, chapter II).

Table 1 summarises the variety of different objectives and tools associated with regional payment systems, which often go above and beyond the basic goal of reducing transaction costs. As table 1 shows, these include, in particular, temporary liquidity provision, final settlement in national currency, credit lines beyond the clearance period (all aiming at saving foreign reserves). Moreover, Table 1 presents examples of different payment systems and their varying configurations.

Table 1: Comparison of selected regional payment systems and the Keynes Plan

Initiatives* Objectives	Instruments	Keynes Plan	EPU	CPCR- LAIA	SML	Sucre
1. Reduction of transaction costs	a) Interlinking of payment systems for direct crossborder transfers	X	X	X	X	X
	b) International trade settling in local currency at firm level	X	X	X	X	-
2. Saving of foreign reserves	a) Temporary liquidity (clearance period)	X	X	X	-	X
	b) Final settlement in national currencies	X	partiall y	-	-	option al
	c) Credit lines beyond clearance	X	X	-	-	intende d
3. Coordinated adjustment among deficit and surplus countries		X	X	-	-	intende d
4. Unit of account		X	X	-	-	X

Source: Fritz et al. 2014 .

* EPU: European Payments Union; CPCR-LAIA/ALADI: Agreement on Reciprocal Payments and Credits of the Latin American Integration Association; SML: System of Payment in Local Currency (SML) between Argentina and Brazil; SUCRE: Sistema Unitario de Compensación Regional.

The biggest mechanism was the European Payments System (EPU), which was in place from 1950 to 1958, to be replaced by the European Monetary Agreement. It is regarded as a role model for fostering regional trade. The EPU's objectives were to develop convertibility of the European currencies at the regional level, liberalize intra-European trade, and multi-lateralize existing bilateral trade arrangements. The EPU performed a wide full range of functions of regional payments systems. This included (1) a reduction of transaction costs in regional trade by enabling trade payments to be settled in domestic currency, (2) a short-term liquidity provision during the settlement period of one month, and (3) an additional longer-term credit provision exceeding the payment system's internal clearance periods. In addition, it had strong trade adjustment incentives through gold quotas and a regional unit of account that was used for accounting purposes only. Though explicitly not designed to provide a common European currency, this unit of account can be regarded as the first stage of what became the European Currency Unit (ECU) in 1981. According to De Macedo and Eichengreen (1995: 172), "although both intra-European trade and trade with the rest of the world expanded more quickly

than European production in the EPU years, the spurt in European trade was coincident with the inauguration of the EPU”.

Since then, regional payments system proliferated especially in Latin America, leaving aside the Asian Clearing Union and some eminent mechanisms in Africa. It is important to note that all of these South-South mechanisms are significantly smaller than their European predecessor. In Latin America, two institutions have been relevant references in terms of institutional learning for the building up of the SML (see also Pérez Caldentey et al. 2013). One is the Latin American Agreement on Reciprocal Payments and Credits (CPCR-LAIA by ALADI), founded in the 1982 in its current form, and joining a large number of member countries of the sub-continent. The CPCR-LAIA had its heydays during the 1980s debt crisis, where, as an obligatory mechanism, it allowed the maintenance of intra-regional trade despite repeated and severe dollar shortage in the region. It went almost out of use since the 1990s, mainly because regional free trade agreements such as the Mercosur did not longer foresee the channeling of intra-regional trade through the mechanism, and because it still contains a guarantee clause. Its use engenders significant risk for the central banks involved, as the risk for uncovered debt settled through CPCR is shifted to the central banks of the member countries. Consequently, in the years after its foundation the bulk of the operations were Venezuelan imports and Brazilian exports of engineering services associated with large infrastructure projects, thus involving only a small number of transactions, with the Brazilian central bank covering the payment risk.

The other is the SUCRE (*Sistema Unitario de Compensación Regional de Pagos*; Unified System for Regional Compensation) that was approved in 2009 by the member countries of the Bolivarian Alliance for the Peoples of Our America (ALBA), and the current members are the Bolivarian Republic of Venezuela, Bolivia, Cuba, Ecuador, Honduras and Nicaragua. The SUCRE initiative aims not only at reducing transaction costs in intra-regional trade through the use of domestic currencies, but also is linked to the saving of foreign exchange by allowing delayed settlement of trade transactions. The mechanism offers the option of settling final net payments of net trade surpluses and deficits in a domestic or international currency (for the case of Ecuador as a dollarized economy, it would be only the US dollar). The establishment of a regional credit fund and adjustment mechanisms to balance intra-regional trade channeled through the system were envisaged, but did not become operational yet. Most prominently, the SUCRE proposes the creation of a regional unit of account, the *sucre*, to take over the role played currently by the US dollar not only as invoicing regional transactions, but also as a means of payment and store of value, in the medium or longer-term. Up to today, the system seems to remain in its initial steps, having conducted over the years a small number of bilateral operations involving food trade between Cuba, Ecuador and Venezuela. This is due, in part, to the adjustment mechanisms for bilateral exchange rates, which are not designed in a way to reflect market rates, and also to the multiple exchange rate regime in Venezuela, which seems to create obstacles for the other members (for a more detailed analysis see Fritz et al 2014).

3. The Local Currency Payment System (SML)

Above section has discussed the different objectives and tools of selected regional payment systems and briefly discussed their functioning. This section discusses in more detail the technical features of the SML in light of these different objectives and tools. The Local Currency Payment System, in Portuguese *Sistema de Pagamentos em Moeda Local* or in Spanish *Sistema de Pagos en Moneda Local* was an initiative of the Brazilian and the Argentinean Central Banks within Mercosur. Its primary purpose is to ease bilateral trade by reducing transaction costs, to be achieved by allowing exporters and importers to use their respective currencies in international operations; later Uruguay and then Paraguay joined the mechanism. The SML aims at reducing the dependence of international operations on the US Dollar as the dominant currency generally used for invoice, vehicle and trade settlement purposes. Its negotiation has started within the Mercosur working group “Grupo de Monitoreo Macroeconómico”. Its legislation and execution, however, is based on bilateral agreements and legislation between the Mercosur member countries. Use of SML for regional trade is voluntary.

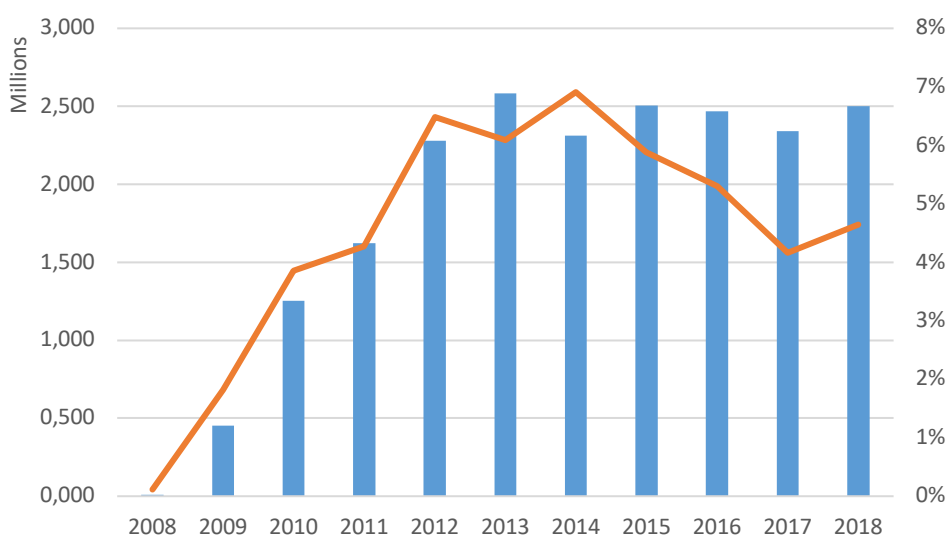
The SML between Argentina and Brazil started its operations in October 2008, though the negotiations of this system had started back in the beginning of 2006. In September of that year, during a Mercosur meeting of ministers of economic affairs and central bank presidents, the central banks of Argentina and Brazil had laid out its constituting elements. In 2007, the Mercosur members formally created the mechanism, pending on bilateral agreements between the member countries. Argentina and Brazil realized this agreement in September 2008, to start operations one month later. The agreements with the smaller core Mercosur countries took longer: Uruguay and Brazil were negotiating the mechanism since 2009, but they took until October 2014 to start operations. Uruguay and Argentina agreed in 2012, and started effectively in June 2015 (*INTAL 2015*). Lastly, Paraguay established an agreement with all other three countries, but operations only started with Brazil in August 2018.

The SML is a simple payments system that allows the use of the national currency for trade factorizing and clearing of bilateral trade operations between an importer, an exporter and commercial banks. Consequently, there is no need to exchange Real for US dollar and then to Argentinian Peso (or vice versa), but the net settlement of all operations is cleared (in US dollar) directly between the two regional central banks involved in this operation. Its use is expected to be favorable to private agents, particularly to small and medium enterprises (SMEs). First, the interbank exchange rate is used for the bilateral exchange in the SML, which, outside the SML, usually is only used for voluminous transactions. Second, administrative procedures are designed in a simpler way than those for the foreign exchange market in US dollar, thereby reducing transaction costs and the exposure to exchange rate volatility. Thus, it should lower both financial and transaction costs for importers and exporters. Finally, as one of the objectives of the SML, it increases access for SME to regional trade (BCB, n. d.). For these companies, access to the foreign exchange market is especially costly due to high transactions costs relative to their small size. Unlike the larger companies in both countries, for these smaller firms the option to pay and receive payments in local currency should represent significant cost reduction.

Payments are made like in other international transactions, through local banks previously authorized to transfer the operations from private agents to the central banks and vice versa. The central banks involved net their mutual obligations in domestic currencies and finally clear them, usually in US dollar, through the international banking system in New York. The maximum period for this clearing is three days, but it usually takes just 24 hours.

The mechanism started operating with a limited number of operations and trade volume, but especially bilateral trade between Argentina and Brazil increased rather steadily. The trade volume operated via SML since 2012 is over 2 billion BRL (see Figure 1). More impressive is the total number of operations channeled through the SML which grew up from roughly 1,200 operations in 2008 to around 9,000 to 11,000 operations per year since 2012 (see table 2 below). Measured in terms of intra-regional trade share, it has aggregated since 2012 between five and seven percent of Brazil’s exports to neighboring Argentina. This is a small share of Brazilian overall exports, bearing in mind that Argentina accounts for roughly seven to eight percent of total trade; for Argentina, Brazil is a bigger commercial partner, with relative shares of 20 to 25% of imports, and 15 to 20% of exports during this time.

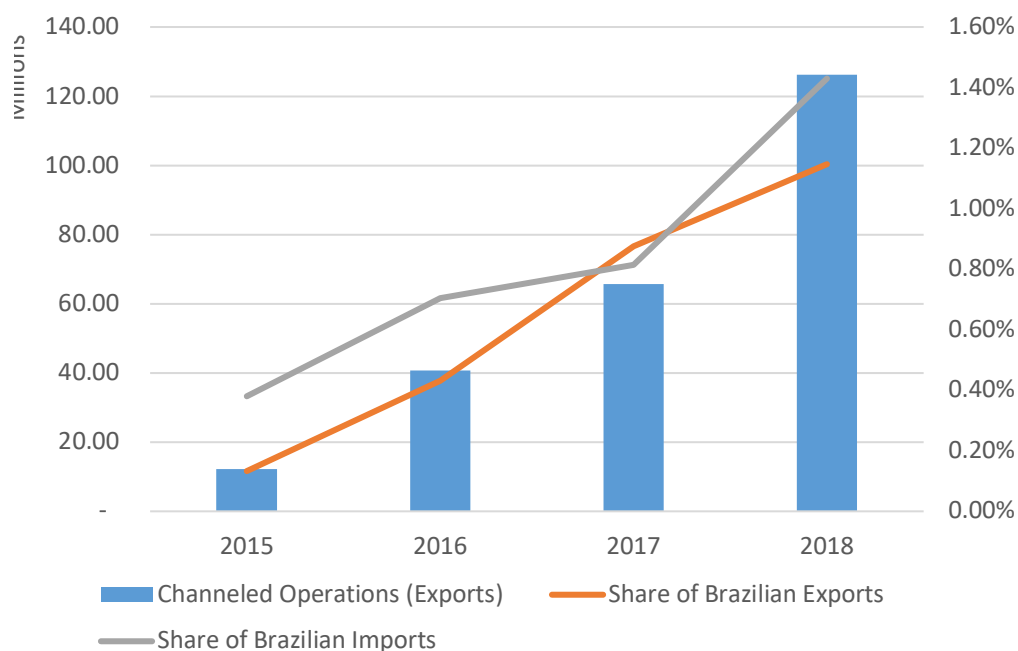
**Figure 1: Payments System in Local Currencies, Brazil-Argentina:
Evolution of use and shares of bilateral trade (exports) channeled through SML
(in %, left scale; and trade volume in BRL, right scale)**



Source: Own elaboration based on data from Central Bank of Brazil (<https://www.bcb.gov.br/estabilidadefinanceira/sml>); on Time Series Management System of Central Bank of Brazil for exchange rates of US\$ to BRL; and on bilateral trade volumes from MDIC (<http://www.mdic.gov.br/>).

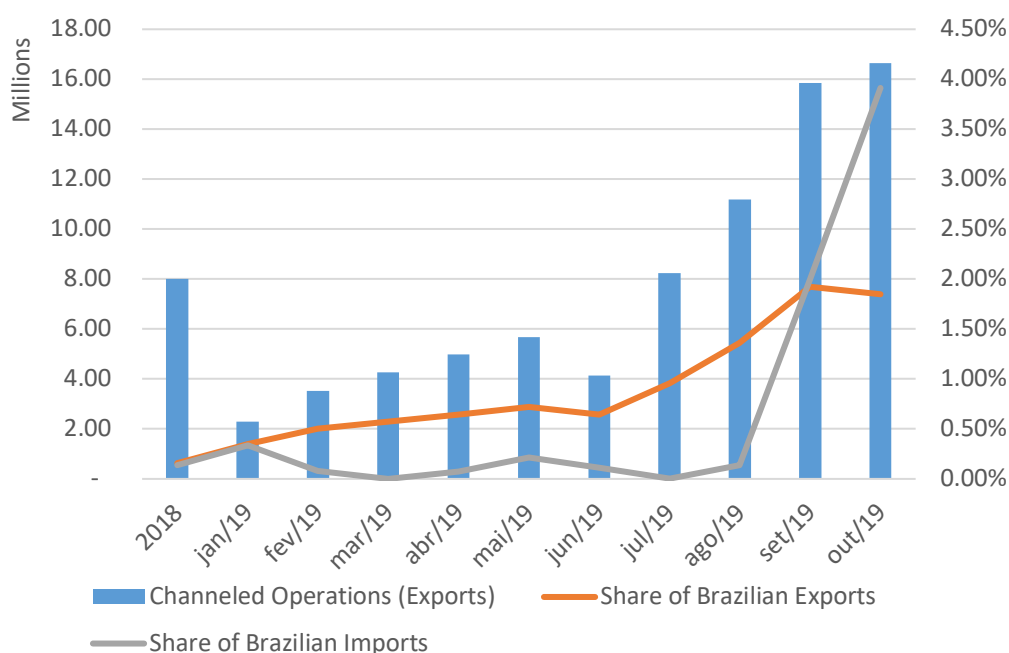
For bilateral trade between Brazil and Uruguay, we also can see a steady increase of operations via SML, yet at an even lower relative level, compared to trade between Argentina and Brazil (see Figure 2, and table 3 below).

**Figure 2: Payments System in Local Currencies, Brazil-Uruguay:
Evolution of use and shares of bilateral trade channeled through SML
(in %, left scale; and trade volume in BRL, right scale)**



Own elaboration, based on data from the Brazilian Central Bank for SML trade data, http://www.bcb.gov.br/rex/sml/UYU_estatisticas.asp; trade shares

**Figure 3: Payments System in Local Currencies, Brazil-Paraguay:
Evolution of use and shares of bilateral trade channeled through SML
(in %, left scale; and trade volume in BRL, right scale)**



In sum, above section has shown the key features of the SML as simple payment mechanism and its initial success though recent stagnation and overall small size. Despite its limited nature, and central tensions, conflicts, and contradictions in this implementation and operation, we argue the SML is a good example of what Grabel denominated “productive incoherence”. It’s a short description of this concept and its Hirschmanian roots which we turn to next.

4. ‘Productive incoherence’: Bringing Hirschman to the global financial architecture

As discussed in the introduction, the repeated waves of financial crises and episodes of externally induced financial instability have given rise to a series of financial and monetary institutional innovations and adaptations, in particular on the regional level. Grabel (2018), at assessing this large variety of institutions in the field of regional financial and monetary cooperation, characterizes this landscape not only as incomplete to overhaul the existing global financial governance, but also as uneven, partial, fragmented, and partially contested. At the same time, she appreciates the highly experimental nature especially of recent innovations, which are producing a complex, dense, and pluripolar new order which she terms ‘productive incoherence’. She argues that, contrary to the common narrative, this emergent incoherence is productive rather than debilitating. “In the absence of an over-arching, coherent model of financial governance EMDEs today are experiencing a dramatic expansion in policy space and room for institutional experimentation” (Grabel, 2017: p. 1).

To come to this conclusion, she applies a series of ideas and concepts from Albert O. Hirschman. Among others, she draws on the widely known idea of forward and backward linkages, where existing production patterns and actor constellations determine a rather unbalanced growth path. In her view, certain institutions, even unintendedly, may lead to the

creation of other institutions. Second, she also embraces Hirschman's emphasis on the failure of uniform solutions. The argument is that only at understanding the multiplicity of development paths, instead of single-shaped and uniform policy blueprints, social change may be identified as a result of the complexity, specificity, messiness and contingency of institutions and policies. A third Hirschmanian concept is the centrality of the diminutive, the seemingly not relevant or superficial change.

These three Hirschmanian figures, applied by Grabel for assessing the landscape of South-South development finance, justify the analysis of even very small-scale initiatives, as they might be the building block of path defending reform and change, or the prism for such change at a wider scope. It also may reveal which reforms may be available in a small-scale experimentation and what could be possible consequences of these policies. The next section shows that the SML is indeed such an example of productive incoherence, which despite its limited size, seeming limitations, and conflicts has the potential to create long-lasting institutional change and increased regional cooperation in the Mercosur. To develop our argument, we will first explain the emergence and the limitations of the SML and then elaborate on arguments which justify the evaluation of the mechanism as a case of productive incoherence.

5. The emergence and limitations of the SML as an example of productive incoherence

Emergence

This section shows how the emergence of the SML can be seen as a small success story in terms of building financial cooperation in a complex context for multilateral collaboration. In fact, the SML represents the first step of monetary cooperation ever taken within the Mercosur. At the same time, the SML has been gradually established and expanded within the context of an agonizing Mercosur, in its general terms of regional economic integration and harmonization of trade rules. This, we argue, has been possible not despite but exactly because of the SML's simple and limited ambitions. To understand this point, one needs to understand the context and history within which the SML was implemented. In particular, after some initial declarations and successes, Mercosur integration was lastingly interrupted by Brazil's unilateral maxi-devaluation of its currency in the beginning of 1999. Brazil, which was suffering from an acute foreign exchange liquidity shortage, let its currency float freely, without informing Argentinean or any other neighboring central bank, as the Central Bank of Argentina (BCRA) representative confirmed. This was not only fatal to all efforts of deepening Mercosur, which since then never came back to the same level of intra-regional trade and pace of further integration steps, but also showed the total lack of commitment for collaboration in the key field of exchange rate coordination, despite its decisive effects on bilateral trade at least until the end of the 1990s.

In this sense, the SML represented a first step of mutual confidence building since the unilateral Brazilian devaluation. As discussed above, the main objective of the SML is to support and further promote regional trade integration between countries in the Mercosur. However, the SML is not just a technical project. Although SML was an initiative of analysts and technicians from the Argentinean and Brazilian central banks, its implementation had great support from

the former presidents of Brazil and Argentina, Luiz Inácio Lula da Silva and Nestor Kirchner, respectively. Thus, one may understand that behind all these rationales for the SML creation was a greater political objective of promoting cooperation between Mercosur members. Indeed, as our interviews show, the implementation of the SML contributed significantly to increasing mutual knowledge on institutions, regulations and processes, up to details such as the timing of payments system processing. It created sound mutual confidence building at the technical level of central bank cooperation, and a process described by the BCRA representative as first experience of central bank cooperation without competition. It thus confirms the idea brought forward in the literature that such small-scale regional cooperation arrangements provide important learning ground for regional policy co-ordination beyond intra-regional trade (Birdsall & Rojas Suarez, 2004).

Moreover, against this background of generally increasing conflicts and diminishing cooperation within the Mercosur, and the until then non-existing cooperation between the major Mercosur central banks in their key areas such as monetary and exchange rate policies or financial sector regulation and supervision, it certainly helped that cooperation started with such a “diminutive” mechanism, to use one of the Hirschmanian terms introduced above. Interviews with representatives from the Argentinean, the Brazilian and the Uruguayan central banks involved in the setting up of the SML confirm the idea that the simplicity of the mechanism was a necessary condition for institution building. A key guiding principle on both sides was that it should create no costs and no risks for the central banks involved. This was crucial to secure the buy-in from all regional central banks involved, in particular the Brazilian one which was loath to take on any credit risk for its trading partners. The mechanism thus was just designed to overcome transactions costs of trading firms involved in intra-regional trade. No additional element was introduced, such as central bank guarantees for bilateral payments, or credit provision through longer clearance periods.

Due to its institutional setting, both sides estimate the potential use at a maximum use of 10% of bilateral trade. In this sense, the use of SML by more than six percent of bilateral trade volume between 2012 and 2016 is not so far away from this maximum potential use, when following these estimates.

One of the explanations for the small scale in terms of use of the mechanism is related to the fact that the SML has targeted small and medium sized firms, whose share of intraregional trade between Argentina and Brazil is around 10%. From this perspective, a level of use of around six to seven percent, after launching and at least until 2016, in terms of Brazilian exports, as shown in figure 1, is not so far from this target. In fact, according to BCRA (2013), 72% of the operations had a volume smaller than 500.000 US\$. In terms of sectoral distribution, there is a concentration on the car and car parts sector, textiles and leather, household appliances, and food products. A second explanation is that this mechanism is attractive mostly for trade operations which are not credit funded, which applies to less than 30% of intraregional trade. Credit financed trade gives firms more time to pay their obligations. Yet, due to the significant interest rate differential between the US dollar and local currencies, credit denominated in US\$ is significantly more advantageous for firms than in domestic currency. Once the operation is financed in US\$, debtor firms would face an exchange rate risk using the SML, where the operation is settled in domestic currency.

Last, we find small, but continuous building up of the institutional mechanism over time. As the representative of the Uruguayan central bank states, his country, as much as Paraguay, were interested in participating from the beginning. A key motive has been to reduce transaction costs for domestic firms trading with Mercosur partners; but also, for the smaller Mercosur member countries, it is always relevant to not be excluded from Mercosur arrangements for whatever reasons. Following the Argentinean and the Uruguayan central bank representatives, the main reason for the delayed adherence of Uruguay and Paraguay where technical standards set up by the Brazilian central bank for the use of the common electronic platform which at that time could not be fulfilled by the smaller Mercosur members, so that the adherence process took several years. While operations between Argentina and Brazil started already in 2008, shortly after having reached an agreement, the adherence of Uruguay took from 2009 to 2014: In October 2009, Uruguay and Brazil signed a bilateral letter of intent; Argentina did follow in August 2012; in 2013 the Brazilian Central Bank allowed Uruguay to use the mechanism, and in 2014 the Uruguayan central bank regulated the agreement, so that operations could start in December 2014. The same is announced for the case of Paraguay, which at the moment of writing has agreements with all other three members, but operations only with Brazil.

This sequenced integration of member countries allowed for the adjustment of the bilateral agreements over time. For instance, the first SML agreement between Argentina and Brazil states that the trade operation must be denominated in the currency of the exporting country. In Uruguay and Paraguay, these arrangements are more flexible, as the invoice currency can be either the currency of the importer or the exporter. Additionally, whilst the SML with Argentina only allows users to send and receive trade-related transactions and pensions, the more recent agreements involving Uruguay and Paraguay allow users also to send and receive unilateral transfers, i.e. remittances.

In sum, above discussion discussed the emergence of the SML in the context of fraught regional relations after Brazil’s unilateral and uncooperative exchange rate devaluation at the end of 2000s. In this context, we show that rather than limiting its importance, the careful, simple, and sequential nature of the SML were crucial to ensure buy-in from regional central banks, enable mutual learning and confidence building, and create the possibility for adaptive learning especially for smaller member countries. The next section discusses in more detail the systems’ limitations.

Limitations One peculiar aspect of the SML is its highly asymmetric use. When we look at the operations channelled through the SML between Argentina and Brazil, surprisingly more than 98% of all operations are Brazilian exports over the complete period of existence (see table 2).

Table 2: Payments System in Local Currencies, Argentina – Brazil: Numbers of operations and volume (in BRL) channelled through SML

Argentina		Imports*	
Exports			Imports*
Year/Month	Value (R\$)		Value (R\$)

	Quantity of operations		Quantity of operations	
2008	31	9,882,612.65	10	1,313,842.06
2009	1163	451,061,104.78	72	4,296,941.53
2010	3353	1,252,700,553.25	40	8,998,129.07
2011	487	1,623,201,038.91	50	8,736,895.69
2012	7431	2,277,897,217.86	83	17,245,299.73
2013	9041	2,581,447,704.82	47	10,525,643.55
2014	919	2,313,261,335.97	38	5,033,622.97
2015	10788	2,504,490,534.16	38	37,573,226.81
2016	8264	2,469,907,531.59	34	21,772,789.50
2017	7619	2,341,900,041.18	22	4,092,223.25
2018	7454	2,499,328,889.38	33	3,260,353.58
Jan-19	426	169,538,022.21	4	1,144,686.17
Feb-19	378	104,114,856.76	1	82,814.65
Mar-19	525	194,503,389.27	0	
Apr-19	522	162,892,437.46	0	
May-19	688	196,520,130.04	4	45,507.58
Jun-19	542	171,265,403.48	1	38,589.72
Jul-19	613	207,192,872.79	1	548,315.13
Aug-19	591	157,351,342.19	3	299,418.33
Sep-19	421	130,211,331.93	1	1,962,427.68
Oct-19	579	196,145,487.98	1	4,044,140.56

Source: Central Bank of Brazil, <http://www.bcb.gov.br/rex/sml/5-smlestat.asp>

Why is the mechanism so much more attractive for Brazilian exporters and Argentinian importers, than vice versa? While we found no literature on this asymmetry, answers were given in the interviews. And it is intrinsically linked to structural differences of the financial market in both countries, especially the use of the dollar at the domestic level.

Dollarization of the domestic banking and financial market in Brazil is strictly banned, as a legacy from the 1980s. Back in that time, it served to defend the survival and acceptance of the domestic currency while running three to four-digit inflation rates. This banning left strong administrative traces until today, basic regulations for the domestic financial sector not being changed despite international financial liberalization. For all operations involving foreign exchange at the domestic level, residents in Brazil have to do a foreign exchange contract (*contrato de câmbio*). This involves a series of highly specific procedures and thus creates high transaction costs especially for agents which do not frequently enter the foreign exchange market. Following the BCB representative, the maintenance of this costly regulation in terms of transaction costs is due to the fact that these contracts produce high quality data in terms of close to complete and just in time information on the level of foreign exchange liquidity and net positions. This gives central bankers a powerful instrument for monetary and exchange rate policy, and creates strong resistance against dismantling this regulation. Yet, firms operating not very frequently with exports and imports, they are confronted with high entrance costs in terms of access to foreign exchange denominated transactions. Additionally, as it is not possible to hold foreign exchange accounts in the Brazilian the banking sector, except for embassies and commercial banks operationalising import and export transactions, banks do charge high fees for foreign exchange.

Thus, for the Brazilian side, the main incentives for creating the SML was to reduce both financial and transaction costs especially for smaller firms. Interestingly enough, in terms of domestic coalition building, trade-related administration supported this mechanism, and rather quickly achieved changing the respective legislation, while the financial sector in Brazil was not supportive, as this would favour bank clients, but not financial institutions which might risk losing significant fees related to foreign exchange operations. Interview partners indicated that transaction fees could be up to 50% less in SML in comparison to normal Forex operations. The focus on SME, however, would leave the trade share channeled through SME rather small.

Another factor limiting the use of SML, according to BCB representatives, is the operational bureaucracy. In Brazil, financial institutions are responsible for identifying illegal operations carried out by their clients in the Forex market. Though financial institutions operating with SML are not involved in a Forex operation, their precautionary measures remain the same. The BCB has been pursuing the disassociation of the SML operations from Forex operations, but it has not been successful. Financial institutions still ask their clients extensive documentation for each operation, which results in excessive bureaucracy in the SML. The regulation in the Forex market does not apply to the SML, which operates with local currency, but it still has an indirect effect on it. Central bankers suggest that financial institutions should follow the 'know your customer' strategy, in which they collect information on how much their clients normally

transfer, their type of business and with whom they negotiate. Thus, rather than requiring extensive documentation for every single operation, they could just identify operations which are out of the ordinary without excessive bureaucracy.

For Argentina, in contrast to Brazil, financial and banking sector regulators since the 1980s have widely liberalized the use of the US dollar for all purposes at the domestic level, including US\$ accounts and credits within the domestic financial sector, thus representing a strikingly different response to very high and persistent inflation. Consequently, the reduction of transaction costs would be smaller for most users, contrary to the Brazilian users, but still they were considered to be relevant for enhancing intra-regional trade and thus limiting access of Argentinean firms to neighbouring markets.

So, even if cooperation and collaboration for building this first bilateral and then multilateral mechanism within Mercosur was characterised by no competition and equal treatment between the member countries and central bank actors, as the BCRA representative supports, potential gains for the leading regional economy certainly played a role.

The Argentinean side made sure, at the moment of building up the system at the technical level, to include also operations in US\$ as a technical option, which would provide then respective gains for smaller sized firms in Argentina in terms of reduction of bank fees. However, for the Brazilian side, this is no priority, as this might open an unwanted door for domestic financial sector dollarization. As a result, the mechanism remains rather irrelevant for Argentinian exporters with their strong preferences to receive in US\$ instead of domestic currency.

In the case of the bilateral trade channel between Brazil and Uruguay, opened in 2014, use of the SML mechanism is much more balanced: almost 40% of the operations are realised by Uruguayan exporters (see table 3). This demonstrates that the mechanism is much less adequate for the Argentina institutional setting of a dollarized financial sector than for less or non-dollarized economies such as Brazil and Uruguay.

Table 3a: Payments System in Local Currencies, Brazil - Uruguay: Numbers of operations and volume (in BRL) channelled through SML

Year/Month	Uruguay			
	Exports		Imports	
	Quantity of operations	Value (R\$)	Quantity of operations	Value (R\$)
2015	115	12,144,617.55	22	15,355,759.34
2016	278	40,705,346.15	105	31,088,250.92
2017	424	65,689,341.03	247	34,448,782.49
2018	787	126,195,036.87	174	60,692,573.43
Jan-19	80	19,513,009.70	15	15,479,006.31
Feb-19	55	11,824,088.55	10	9,028,856.62
Mar-19	54	9,460,347.26	9	10,918,187.20

Apr-19	67	12,566,746.32	10	15,879,392.12
May-19	70	16,721,476.26	9	11,819,179.49
Jun-19	65	15,654,952.49	5	6,207,506.80
Jul-19	68	13,807,443.86	7	15,784,079.88
Aug-19	70	8,263,749.18	9	15,961,390.75
Sep-19	80	13,143,334.76	11	6,644,971.66
Oct-19	91	11,298,645.19	8	11,512,368.86

Table 3b: Payments System in Local Currencies, Brazil - Paraguay:
Numbers of operations and volume (in BRL) channelled through SML

Year/Month	Exports		Imports	
	Quantity of operations	Value (R\$)	Quantity of operations	Value (R\$)
Ano/Mês	Exportações		Importações*	
	Quantidade de Operações	Valor(R\$)	Quantidade de Operações	Valor(R\$)
2018	72	8,016,158.66	15	2,736,294.72
Jan-19	19	2,291,974.76	5	1,054,291.90
Feb-19	33	3,512,547.87	2	276,998.46
Mar-19	38	4,253,970.33	0	
Apr-19	34	4,972,589.39	3	304,993.25
May-19	40	5,676,592.88	2	923,171.62
Jun-19	39	4,144,195.29	2	402,483.67
Jul-19	59	8,247,119.76	3	6,306.12
Aug-19	101	11,190,697.92	6	747,736.06
Sep-19	102	15,849,069.39	11	9,912,999.68
Oct-19	119	16,645,122.19	10	21,390,430.67

Source: Central Bank of Brazil, http://www.bcb.gov.br/rex/sml/UYU_estatisticas.asp

From the Argentinean side, after launching, the mechanism received no relevant institutional improvements, nor was it evaluated, as foreseen in the beginning. It seems that within the BCRA, attention shifted to other, more macroeconomic frontiers.

There were negotiations after the global financial crisis in 2009 and again in 2014, to establish a bilateral swap arrangement between Argentina and Brazil, yet, this did not materialize. This swap line did foresee highly specific drawing rights attached to the aim of maintaining bilateral economic ties in periods of foreign exchange shortage, and was thought to be built up in a

similar manner to the Chiang Mai Initiative Multilateralization mechanism, that is, with the aim to multilateralize a network of swap arrangements in the Mercosur region. However, with negotiations almost concluded, Brazil withdrew. Instead, both Argentina and Brazil agreed on a bilateral swap arrangement with China, which for the case of Argentina was renewed in 2014 (INTAL 2014; Nación 2014).

Another issue repeatedly mentioned throughout the interviews was the issue of differentiation against other Latin American schemes of regional payment systems. Both the ALADI and the SUCRE mechanism are well-known in the international departments of the Brazilian and Argentinian Central Bank; UNASUR being the relevant arena for mutual exchange of experiences during the last decade. And it seems it was important for both central banks to avoid the problems related to these other mechanisms.

In that vein, it was a strong guiding principle for the two major central banks that no guarantees, or contingent liabilities for the central banks, should be involved in the SML as was the case in the CPR; or in other words, the principle of “no costs, no risks” was given high priority, as a BCRA representative expressed. Furthermore, the SML was never thought as a long-term institution to substitute the US dollar in the region like the SUCRE is.

In order to distance itself from competing ideas of financial regionalism within the Western hemisphere, as Armijo (2012) expressed it, SML remained restricted to a pure and simple clearing mechanism at the short-term period, without providing credit for the intra-regional debtor country through longer clearance periods, and without establishing a unit of account as a potential starting point for a regional currency.

One of the greatest limiting factors recognized by almost all interviewees is the lack of low-cost credit. The basic interest rate in Brazil, the Selic rate³, implies one of the highest real interest rates in the world⁴, though it has been recently decreasing. Hence, export companies in Brazil have difficulty to finance the production of goods or services. In contrast, the lack of low-cost credit is not an issue for importing companies that use SML, as the volume of importing operations is significantly smaller than exporting operations in SML. The rationale for this asymmetry lies in the fact that most exporters in Argentina, which is the larger trading partner of Brazil in SML, are not interested in receiving payments in local currency.

In Brazil, exporting companies circumvent this limitation through accessing subsidised credit programs or credit denominated in dollar through instruments such as Advances on Export Exchange Contracts (ACC) or Advance on Export Shipment Documents (ACE)⁵. The ACC

³ Selic is the Special System for Settlement and Custody (*Sistema Especial de Liquidação e de Custódia*, in Portuguese), where the BCB executes open market operations for monetary policy purposes. The Selic rate is the overnight interest rate in the interbank lending market.

⁴ According to data from BIS on central bank policy rates in 2018, Selic has been amongst the top five highest interest rates in the world.

⁵ *Adiantamento sobre Contrato de Câmbio* (ACC): “Pre-shipment financing that provides exporters of goods and services with the working capital required to produce the goods to be exported”. *Adiantamento sobre Cambiais*

and ACE offer lower interest rates that are obtained by Brazilian banks in the international market. A currency mismatch problem arises when agents that have their claims denominated in local currency create liabilities denominated in a foreign currency, e.g. US dollar. Thus, the fact that many Brazilian exporters have their liabilities denominated in US dollar using such credit instruments is a factor that limits the use of SML. In contrast, exporting companies that use the US dollar as invoice and trade settlement currency may instead access credit in the international market at lower interest rates and without exchange rate risk. As a result, the users of SML in Brazil are mostly companies that have their liabilities denominated in Brazilian real.

Some interviewees stressed that without a credit line associated with SML, the local currency payment system is limited to a small number of users. A few other interviewees however state that an accompanying credit line would not increase the number of SML users, as the costs structure of the companies plays a more important role in determining whether they use the SML. They argue that the decision to use SML depends on whether production costs, such as wages and other inputs, are denominated in the domestic or foreign currency. Participants also argue that there is a significant amount of subsidized credit in Brazil directed to micro and small enterprises from government institutions, such as BNDES. Indeed, these programs offer much lower interest rates, but there is no information regarding the funding structure of the firms to support this hypothesis, which is left for future research.

It seems that this was also a reputational issue for both central banks involved: that this mechanism would work smoothly, would be accepted by the market, and would not be linked to any macroeconomic “adventure”, in terms of unconventional policies. The BCRA member reported that this kind of further aims and institution building repeatedly was brought up when meetings were opened to other state agents such as representatives of the Ministry of Economics, but was fiercely refused by central bank members, as they saw themselves rather as technocrats who had the task to defend sound monetary and financial policies and regulation.

Market participants seem to welcome this position. Even if there was no survey realized among users, they seem to be satisfied with the mechanism: 65% of companies have used it more than once, and the number of complaints seems to be low (Pérez Caldentey et al., 2013, p. 35). Yet, on the downside, the mechanism remained rather diminutive, and with macroeconomic effects very close to zero.

Entregues (ACE): “Post-shipment financing that enables the exporter of goods and services to offer better terms to customers abroad”. Source: China Construction Bank (CBB).

6. Conclusion

The understanding of the newly emerging and incrementally changing landscape of regional monetary and financial cooperation schemes between developing countries and emerging market economies as ‘productively incoherent’ opens a fertile field for examining the mechanism of the regional payments system between Argentina and Brazil and other Mercosur members. The concept of ‘productive incoherence’ of ‘southern’ regional monetary and financial cooperation allows examining the emergence as well as the diminutive design and hence the shortcomings of the SML (*Sistema de Pagos en Moneda Local*) in the Mercosur region in South America.

First, comparing the SML with other similar mechanisms has showed that its institution building and technicalities, which differ from others in significant manner, is a direct response to highly context specific factors. Especially Brazil’s legacy of banning the use of the US dollar in the domestic economy, which was successful even in periods of very high inflation, is a key driver. The elimination of the US dollar from the Brazilian domestic economy created an administrative legacy in terms of formal registers and requirements for firms to gain access to foreign exchange denominated operations, upheld until today, which makes it especially costly for SME to access the foreign exchange market. Also, for all SML member countries, trade channeled through SML has a higher technology share than in global trade due to its higher diversification in terms of products, so that this kind of firms may profit in all SML member countries. Our analysis shows that the SML is a typical case of a seemingly ‘unproductive’ and ‘incoherent’ (following Grabel 2018) institutional development as it appears to be a small mechanism of limited stretch and usability but at the same time is an important ingredient of SME development in the Mercosur region. Analyzing it through an Hirschmanian sense as suggested by Grabel (2018) allows understanding of this fuzzy landscape of newly emerging mechanisms and institutions for development finance. Not the search for uniform solutions and big changes, but rather the identification of minor changes with rather specific, messy and contingent policies may allow a deeper understanding of undergoing changes in ‘southern’ development finance.

Second, even if the SML is a rather diminutive mechanism, covering a small share of bilateral trade between Argentina, Brazil and more recently Uruguay and Paraguay, it represents significant change as the first successful case of financial and monetary cooperation within Mercosur, and between the regional central banks as highly specific state actors. This is especially relevant as, for a long time up until the creation of the SML after the global financial crisis, unilateral exchange rate policies represented one of the major stumbling stones for regional monetary and financial cooperation in Mercosur.

Third, the understanding of the SML’s specific process of institution building, and especially the absence of institutional linkages created beyond the SML, also requires a broader view on competing ideas shaping concepts of regionalism and regional leadership of emerging powers in Latin America and beyond. The SML was built up by its most relevant actors, central bankers in Argentina and Brazil which have a self-perception as technocrats. Its mechanism, strictly limited to the use of local currencies for intra-regional trade on a voluntary basis, also reflects a distancing both from the inward-oriented regionalism of the 1980s, represented by the almost

out of use CPR-LAIA mechanism, and the new type of inward-oriented regionalism, driven especially by the ALBA member countries and their creation of the Sucre mechanism as an institution to substitute the US dollar in the long term within the region.

The SML, until today, may have served as ideal, de-politicised learning ground for confidence building and cooperation between the central banks in the region (Birdsall & Rojas Suarez, 2004). But it has not, at least until now, led to institutional spill-overs in the form of further monetary or financial cooperation schemes within the Mercosur, despite of its creation in a period fertile for institutional innovation at the global level in this field, as remarked by Grabel (2018). It has to be seen if coinciding concepts and ideas of regionalism by future Mercosur member governments with more aligned ideas in terms of political and economic regionalism will make further use of this small, but extraordinary mechanism.

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