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Finance-neutral output gaps: global vs. domestic cycles

The decomposition of GDP into a long-run trend and a short-run cyclical component has a long tradition in the empirical macroeconomic literature. A commonly used approach is to combine output with information contained in the rate of inflation via a Phillips curve. The resulting trend is then defined as the inflation-neutral level of output, typically referred to as *potential output*. The deviation of actual output from its potential is an important variable for the conduct of economic policy as it provides an estimate of the cyclical position of the economy. A positive output gap goes hand in hand with inflationary pressure signaling that demand exceeds supply.

Since the onset of the 2007-2008 financial crisis and the ensuing Great Recession, the traditional approach of identifying potential output via a Phillips curve has been challenged, though. As inflation remained surprisingly low and stable during the past decade and a half, there was no signal that pointed either to a positive pre-crisis output gap or to a negative post-crisis gap. Still, GDP in countries such as the U.S. and Spain had been growing on an unsustainable path prior to the financial crisis, boosted by the buildup of financial imbalances in credit and property markets, and subsequently output decreased sharply as the financial bubble burst.

Several channels may have contributed to the transmission of the buildup and bust of financial imbalances to GDP. Notably, according to the 'financial accelerator' mechanism, an increased amount of lending during a financial boom can fuel demand for housing and other assets, driving up their prices and increasing both households' and firms' collateral, encouraging banks to extend further credit for the financing of additional housing and non-housing consumption and investment (Aoki et al., 2004; Bernanke et al., 1999; Iacoviello, 2005). In turn, the corresponding debt becomes a forcing variable when high imbalances build up and the bubble bursts, as households and firms cut their expenditures in order to repair their balance sheets (Borio, 2014).

Initiated by Borio (2014), the academic literature has started to augment the traditional approach to estimate potential output and the corresponding output gap by adding financial variables. The resulting trend measure is referred to as finance-neutral or *sustainable output* and goes beyond the idea of an inflation-neutral level of output. By removing the unsustainable part of GDP that is driven by financial imbalances, the sustainable output measure evolves more steadily during financial crisis periods compared to traditional potential output measures. Therefore, the corresponding sustainable output gaps tend to suggest more severe overheating (i.e., a larger positive output gap) before the crisis and more excess capacity afterwards (a more negative gap) compared to traditional output gap measures (Berger et al., 2015). Moreover, the real-time sustainable output gap estimates are expected to be less prone to ex-post revisions, compared to the traditional output gap estimates, which would enable policymakers to better assess the structural balance in real time.

The global character of the 2007-2008 crisis has also uncovered the strong connection of financial markets across countries. While the empirical literature has well documented commonalities of business cycles across countries (Kose et al., 2003, 2012; Berger and Richter, 2017), intensive research on the synchronization of financial cycles has increased only in recent years (Breitung and Eickmeier, 2014; Rey, 2015; Claessens et al., 2017).

The distinction between domestic versus international drivers of business cycle dynamics is important to inform policymakers in order to choose the right tools for stabilizing the economy. We therefore provide an empirical framework which allows us to separate the cyclical component in GDP for a large number of countries according to different sources. First of all, by including financial variables into the output gap estimation, we acknowledge the fact that financial markets affect the business cycle, potentially creating large imbalances and putting the overall macroeconomic stability at risk. Second, we are able to separate a country's output gap into (i) global cycles and (ii) country-specific cycles and calculate their relative importance with respect to the size of the overall output gap.

In sum, we provide a precise measure of the output gap and hence the cyclical position of the economy, by considering that financial imbalances can threaten macroeconomic stability, and quantify the relative importance of global vs. domestic dynamics.

Tino Berger and Julia Richter

Do Trade Agreements help reduce Environmental Pollution?

Environmental objectives are being increasingly incorporated into Regional Trade Agreements (RTAs) to promote environmental quality, to prevent market failures and externalities related to increasing levels of pollution and ultimately to ensure the mutual supportiveness of trade and environmental policies.

Some RTAs include a full chapter dedicated to the environment, while others, such as NAFTA, incorporate a side agreement. In some cases, specific references to environmental issues are made in different chapters of the RTA legal text. Independent of the way in which they are included in RTAs, environmental provisions (EPs) contribute to the overarching goal of sustainable development, ensure a level playing field among the parties in the agreement, enhance environmental cooperation based on shared interests and pursue international environmental objectives.

The number of RTAs that include EPs, with an explicit reference to environmental objectives in the preamble of the agreement, has been increasing since the mid-1990s reaching 121 enforced RTAs in 2016. These provisions vary in content and by the degree of enforcement and have been mainly proposed by developed countries to strengthen the stringency of domestic environmental policies of potential RTA members. In particular, upholding environmental law between trading partners is one of the main principles of these provisions to avoid the relocation of pollution intensive industries to potential destinations with lax environmental standards, the so called 'pollution havens'.

EPs in RTAs can contribute to the strengthening of domestic environmental regulations (such as on air quality), introducing new institutional arrangements (such as the creation of a Ministry of Environment), establishing co-operation mechanisms on improving environmental law and enforcement and improving environmental awareness and public participation.

Until recently, empirical evidence on the effects of EPs in RTAs on environmental outcomes was very limited with only a single study, Baghdadi et al. (2013), examining the case of CO2 emissions. Building on this, we analysed (in Martínez-Zarzoso (2017) and Martínez-Zarzoso and Oueslati (2016)) not only whether the inclusion of environ-mental provisions in RTAs, could have contributed to improved environmental quality among RTA members, but also the depth and breadth of the provisions.

Methodologically, we contribute to the existing literature by categorizing RTAs according to the breadth and the depth of the EPs included in the RTAs or in the corresponding side agreements. Next, we use these commitment indices in an empirical model to test whether concentrations of suspended particulate matter less than 2.5 microns (PM2.5) are lower in countries that ratify RTAs with more comprehensive Ps, than in countries members of RTAs with less or no EPs.

Other pollutants are also considered as proxies of environmental quality, namely sulphur dioxide (SO2) and nitrogen oxide (NOx), both related to domestic air quality. Empirical models are estimated to investigate whether the level of the given indicators over time (1999 2011 for PM2.5 and 1970-2008 for SO2 and NOx) for a global cross section of countries indicate an improvement in environmental quality after an agreement came into force.

Our main results for OECD and BRIC countries indicate that countries that have ratified RTAs with more inclusive EPs show lower levels of PM2.5 concentrations when controlling for scale, composition and technique effects and for national environmental regulations. The results also hold for a longer period of time (1990-2011) and a broader sample of 173 countries as well as for other pollutants. Moreover, a statistically significant negative relationship is found between membership in RTAs and emissions of SO2 and NOx.

The practice of including provisions that refer to the environment in trade agreements is a complementary way to address climate change, environmental degradation and related issues that should be discussed at the international level in multilateral negotiations. In particular, joint international action is needed to place a cap on GHG emissions and the recent outcome of the CAP21 meeting in Paris is an excellent starting point. In fact, our results point towards a certain complementary relation-ship between domestic environmental policy and trade policy. This means that in addition to stringent environ-mental regulation, the use of environmental provisions in trade agreements can improve environmental out-comes.

Some limitations of these studies are that measuring the environmental endpoints in a given country is not easy. Air emissions do not respect national borders, hence measuring emission concentrations and linking this to domestic policy conditions may be problematic. Moreover, separating the impact of RTAs from other factors influencing country-level emissions is also a challenging task. Trade agreements can also have economy-wide effects, which even spill over to other countries via price and income effects, and subsequently may have an indirect impact on environmental quality.

Inma Martínez-Zarzoso

Der Einfluss unbezahlter Arbeit auf das Anstellungsverhältnis von Frauen in Mexiko

In allen Ländern der Welt verbringen Frauen mindestens doppelt so viel Zeit mit unbezahlter Pflegearbeit wie Männer. Bereits im Paragraph 68b der vierten UN-Weltfrauenkonferenz 1996 wurde konstatiert, dass der Zusammenhang zwischen unbezahlter Arbeit und Armutsgefährdung von Frauen genauer untersucht werden sollte. Die Relevanz dieses Themas wurde durch die Ratifizierung der Sustainable Development Goals bekräftigt. Unter Ziel fünf, Geschlechtergleichheit, wird explizit die Anerkennung und Wertschätzung von unbezahlter Arbeit festgeschrieben. Die neue globale Agenda ist universell und alle Ziele sind miteinander verknüpft. Daher ist die Geschlechtergleichstellung unter anderem dafür entscheidend, das achte Ziel, menschenwürdige Arbeit, zu erreichen und das erste Ziel, keine Armut, zu realisieren.

Aufgrund geringer institutioneller sozialer Absicherung in Mexiko müssen Menschen oft jegliche Art von Arbeit annehmen, um ihr Leben zu sichern. Hinzu kommt ein beständiges konservatives Bild von Arbeitsteilung in der Familie. Dies bedeutet, dass vor allem Frauen unbezahlte Arbeit übernehmen, während Männer für die monetäre Absicherung der Familie zuständig sind. Im Gegensatz zur neoklassischen Ökonomik, die diese Arbeitsteilung anhand von komparativen Vorteilen erklärt, führen feministische Ökonom*Innen diese Arbeitsteilung auf soziale Normen zurück.

Die beschriebenen Erkenntnisse und Problematiken motivieren die Forschungsfrage, ob unbezahlte Arbeit einen Einfluss auf das Anstellungsverhältnis von Frauen in Mexiko hat. In unserer Studie beziehen wir uns auf die nationale Erhebung zu Beruf und Beschäftigung (Ecuensta National de Occupacion y Empleo) des vierten Quartals 2014. Diese Erhebung bietet Informationen zum wöchentlichen Zeitaufwand für unbezahlte Arbeit. Unbezahlte Arbeit umfasst Aktivitäten, die anhand von Margaret Reids „Third Party Criterion“ definiert werden. Dies besagt, dass Aktivitäten als produktiv gelten, wenn sie durch eine*n bezahlte*n Arbeiter*in durchgeführt werden können. Unbezahlte Arbeit ist damit die Summe der Stunden von nicht marktbestimmten Tätigkeiten, die für Pflege, das Erledigen von Besorgungen, Bauarbeiten, Reparaturen, Hausarbeit und gemeinnützige Arbeit aufgewendet werden. Das Anstellungsverhältnis ist in die Kategorien Arbeitslosigkeit, informelle und formelle Anstellung aufgeteilt.

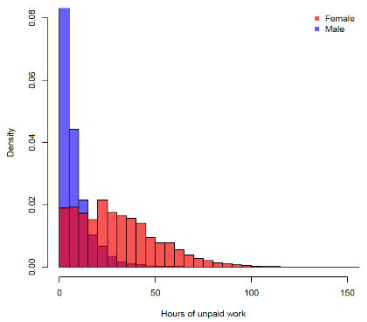

Abb. 1: Unbezahlte Arbeit in Stunden pro Woche nach Geschlecht

Basierend auf den Daten leisten Frauen je nach Anstellungsverhältnis durchschnittlich zwischen 23 und 33 Stunden pro Woche an unbezahlter Arbeit. Dagegen leisten Männer durchschnittlich zwischen 7 und 9 Stunden an unbezahlter Arbeit pro Woche. Die meisten Stunden unbezahlter Arbeit widmen Frauen der Hausarbeit und der Pflege. Arbeit die in der Zeit unflexibel ist.

Damit Frauen unbezahlte Arbeit und bezahlte Arbeit vereinen können, sind sie auf flexible Arbeitsverhältnisse angewiesen, die es ihnen ermöglichen, ihren täglichen Verantwortungen nach zu kommen. Während in industrialisierten Ländern dies meist zu Teilzeitanstellung oder einer geringen Erwerbsbeteiligungsquote führt, ist aufgrund mangelnder sozialer Absicherung davon auszugehen, dass in Entwicklungsländern dies vor allem zu Anstellungen in der informellen Wirtschaft führt. Diese Anstellungen sind oft flexibler, gehen aber mit geringeren Verdiensten und höheren Risiken einher, die meist nicht dazu führen, den/die Angestellte*n vor der Armut zu bewahren.

Da die abhängige Variable „Anstellungsverhältnis“ eine hierarchische Struktur aufweist, wurde für die Analyse dieses Zusammenhangs ein sequentielles Logit-Modell, mit zwei Stufen in der hierarchischen Ordnung, angewendet.

Die Ergebnisse zeigen, dass unbezahlte Arbeit bei Frauen einen statistisch wie auch ökonomisch signifikanten Zusammenhang mit dem Anstellungsverhältnis aufweist, vor allem in Bezug auf die informelle Beschäftigung. Die Wahrscheinlichkeit in der informellen Wirtschaft tätig zu sein, steigt bei Frauen im Schnitt um 0.47 Prozentpunkte pro aufgewendeter Stunden für unbezahlte Arbeit. Die Wahrscheinlichkeiten für die Beschäftigungsverhältnisse variieren über den Bereich der unabhängigen Variablen. Jüngere verheiratete Frauen in der Stadt mit Median-Bildung sind am wahrscheinlichsten informell Beschäftigte. Frauen mittleren Alters sind, bei sonst gleichen Charakteristika, am wahrscheinlichsten formell beschäftigt, wenn sie weniger als 17 Stunden unbezahlte Arbeit leisten. Hingegen ist bei Männern weder ein statistisch noch ökonomisch signifikanter Zusammenhang zwischen unbezahlter Arbeit und informellem Anstellungsverhältnis nachweisbar.

Diese Ergebnisse zeigen auf, dass Ungleichheiten beim Leisten von unbezahlter Arbeit, die von sozialen Normen geprägt scheinen, die Anstellungsverhältnisse von Frauen in Mexiko beeinflussen. Somit ist die Analyse des Zusammenhangs zwischen unbezahlter Arbeit und Anstellungsverhältnis bedeutend für die Förderung von Frauen und damit für die Armutsbekämpfung.

Franziska Dorn

F. Dorn & A. Sohn (2017): The Impact of Unpaid Work on the Employment Status in Mexico. cege Discussion Paper, Number 325.

The Common Agricultural Policy – European Albatross

The European Union (EU) is reeling. The Euro crisis, Brexit, and refugee policy have exposed major rifts between the member states and halted, if not reversed the process of European integration. With the future of the EU at stake, each of the policy portfolios in Brussels must be evaluated to determine how it can contribute to overcoming the current crisis and provide fresh impetus to the European project.

Agriculture is one of the EU's key policy portfolios. In the 1970s and 80s, the EU spent over 70% of its budget on the Common Agricultural Policy (CAP). This proportion has fallen, but in 2015 the CAP still accounted for 40% of EU spending or roughly€ 57 bn. Advocates of the CAP claim that in return agricultural policy has been a driving force behind European integration. They argue that the CAP has served as a testing ground on which the member states have progressively ramped up supra-national policy coordination and gradually accustomed themselves to the loss of national sovereignty over a politically sensitive area. They also point to the CAP's market organisations for agricultural products such as cereals and milk as early, concrete examples of joint policy making and implementation in the EU.

While the CAP has undoubtedly played a pioneering role over the last 60 years, it has not always fostered integration. The 'empty chair crisis' of 1965 was precipitated by France's refusal to surrender sovereignty over farm policy. This crisis led to the 'Luxembourg Compromise', which entrenched national veto power in EU decision making for the next two decades. Moreover, EU agricultural policy was often much less common than the acronym CAP suggests. From the late 1960s to the early 1990s, member states insisted on the use of parallel 'green' exchange rates to protect their farmers from the effects of exchange rate fluctuations on agricultural prices. The resulting differences in agricultural price levels within the EU necessitated a complex system of taxes and subsidies on intra-EU agricultural trade. As a result, EU agricultural markets remained segmented, lofty rhetoric about 'market unity' notwithstanding.

So much for the past: Is the CAP contributing to European integration today? The CAP has changed dramatically since 1993, when a path-breaking reform proposed by Agricultural Commissioner Ray MacSharry began to scale back farm price support and compensate farmers with direct payments. These payments were initially tied to a farmer's production, but after 2003 a reform proposed by Commissioner Franz Fischler largely decoupled them. Farmers receive decoupled direct payments (about € 290/ha in Germany) regardless of whether they produce on their land, as long as they maintain it in 'good agricultural condition'. In 2015, these payments (€41 bn) accounted for 70% of CAP spending and almost 30% of all EU spending.

The introduction of decoupled direct payments has made the CAP much less distortionary today than it was in the days of price support, surpluses ('mountains' of grain and 'lakes' of milk) and export dumping. Reducing price support was a worthy goal, and compensating farmers with direct payments was a price worth paying. But for how long do farmers deserve compensation for price reductions that took place as many as 25 years ago? As compensation has become an increasingly weak excuse for direct payments, agricultural policy makers and farm lobbyists have devised two new justifications: income support and payment for environmental services provided by farmers (so-called 'greening').

The first of these justifications is feeble. Direct payments are made per hectare – the larger the farm, the larger its payments. Hence, direct payments support incomes, but mainly on farms that need no support. According to Matthews (2016), the roughly 750,000 EU farms in the highest income decile receive 55% of all direct payments, or 15% of the entire EU budget. It is difficult to conceive of a more poorly targeted and wasteful income support policy than the EU's direct payments.

The second justification is 'greening'. Since 2015, 30% of a farmer's direct payments are tied to criteria such as the preservation of permanent pasture and the maintenance of so-called ecological focus areas. The EU Commission had originally proposed more stringent criteria, but negotiations with the member states and EU Parliament diluted them. Most experts agree that the result, often dismissed as 'greenwashing', is bloating bureaucracy but producing few substantial increases in the provision of environmental services by farmers.

In summary, the EU is spending a big share of its budget on CAP payments that generate little European value added. Money spent on direct payments to farmers is unavailable for alternative uses in areas such as infrastructure, education, and security that could generate higher returns. For example, Heinemann (2016) points out that 40% of the annual CAP budget could have financed the full reception costs including asylum processes for all of the refugees who entered the EU in 2015. Hence, the CAP binds financial resources and political capital that could be better invested in solutions to pressing problems. As the debate over the EU's next multi-annual financial framework heats up, reform of the CAP should not be left up to agricultural policy makers and their clientele, but placed at the focus of deliberations about European priorities and the future of the EU.

Stephan von Cramon-Taubadel

Impressum
Herausgeber: Centrum für Europa-, Governance- und Entwicklungsforschung (*cege*), Georg-August-Universität Göttingen, Platz der Göttinger Sieben 3, 37073 Göttingen, **E-Mail:** cege@uni-goettingen.de, **Tel.** 0551 / 39 46 02, **Fax** 0551 / 39 19 55 8, **Internet:** http://www.cege.uni-goettingen.de, **Geschäftsführender Direktor:** Prof. Dr. Kilian Bizer, **Redaktion / Layout:** Prof. Dr. Kilian Bizer, Laura Birg.