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Can RTA Labor Provisions Prevent the Deterioration of Domestic Labor Standards?: the Cases of Statutory Minimum Wages and Employment Protection Regulations

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April 2018

Abstract

This study investigates whether labor clauses in regional trade agreements (RTAs) are effective to maintain or improve the domestic labor standards in the signatory countries. The effects of RTA labor clauses on two measures of labor standards, statutory minimum wages and the strictness of employment protection, are empirically analyzed using a unique dataset that classifies the population of effective RTAs into those with and without labor clauses, together with multi-year data on minimum wages and the indicator of employment-protection strictness for a wide variety of countries. The result shows that having labor-clause-free RTAs with more or larger trading partners are associated with lower statutory minimum wages although this negative association is not found for labor-clause-inclusive RTAs. The separate estimation for countries in different income groups further demonstrates that this result is chiefly driven by middle-income countries that sign RTAs with high-income partners, implying that signing RTAs with more or larger high-income trading partners would create the government of a middle-income country, which has a comparative advantage over the high-income partners in labor-intensive sectors, a downward policy pressure on statutory minimum wages whereas labor clauses could alleviate such a negative policy effect of RTAs on minimum wages. This finding is also contrasted with the case of actual wages for which no evidence is found for the impact of RTAs with or without labor clauses to reaffirm that labor-clause-free RTAs could create downward policy pressure on statutory minimum wages but RTAs might not bring market pressure on actual wages regardless of whether or not the RTAs include labor clauses. Finally, unlike this case of statutory minimum wages, the empirical analysis finds no clear evidence for the potential impacts of RTAs either with or without labor clauses on the strictness of employment protection in the signatory countries.

Keywords: International trade, Regional trade agreements, Labor clauses, Minimum wages, Employment protection

JEL classification: F13, F14, F16, F66, J81, J88

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April 12, 2018

Abstract

This study investigates whether labor clauses in regional trade agreements (RTAs) are effective to maintain or improve the domestic labor standards in the signatory countries. The effects of RTA labor clauses on two measures of labor standards, statutory minimum wages and the strictness of employment protection, are empirically analyzed using a unique dataset that classifies the population of effective RTAs into those with and without labor clauses, together with multi-year data on minimum wages and the indicator of employment-protection strictness for a wide variety of countries. The result shows that having labor-clause-free RTAs with more or larger trading partners are associated with lower statutory minimum wages although this negative association is not found for labor-clause-inclusive RTAs. The separate estimation for countries in different income groups further demonstrates that this result is chiefly driven by middle-income countries that sign RTAs with high-income partners, implying that signing RTAs with more or larger high-income trading partners would create to the government of a middle-income country, which has a comparative advantage over the high-income partners in labor-intensive sectors, a downward policy pressure on statutory minimum wages whereas labor clauses could alleviate such a negative policy effect of RTAs on minimum wages. This finding is also contrasted with the case of *actual* wages for which no evidence is found for the impact of RTAs with or without labor clauses to reaffirm that labor-clause-free RTAs could create downward policy pressure on statutory minimum wages but RTAs might not bring market pressure on actual wages regardless of whether or not the RTAs include labor clauses. Finally, unlike this case of statutory minimum wages, the empirical analysis finds no clear evidence for the potential impacts of RTAs either with or without labor clauses on the strictness of employment protection in the signatory countries.

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1 Introduction

One of the remarkable aspects of development in the world trading system for the last 20 years is a rapid increase in the number of bilateral and plurilateral trade agreements such as free trade areas (FTAs) and customs unions. The rapid spread of these regional trade agreements or RTAs has presented a sharp contrast to the fact that multilateral trade negotiations under the World Trade Organization (WTO) system have long been deadlocked during the same 20-year period. This increase of RTAs should thus be, at least partly, because countries have found or tried to find in RTAs a way to promote their trade after being tired of inconclusive multilateral trade negotiations that have become (much) more difficult than were they under the former GATT system, due to various reasons.

Another notable phenomenon that should also characterize the last 20-year development in the international trade environment is growing concerns about possible negative impacts of globalization, particularly on social values such as workers' rights/conditions or the natural environment. These concerns are often expressed as fears of "races to the bottom" through which domestic labor or environment standards in countries will erode due to cost-saving pressures in keener global competition brought by growing international trade and investment. Also have there been persistent arguments against the possibility of "social dumping" through which some countries "unfairly" lower labor or environment standards and conditions to create or maintain a cost advantage over other producers in the international markets. Some governments have found a way to respond to these public, commercial or political concerns by providing in trade agreements "social clauses" that are provisions requiring, urging, or requesting the signatories of the trade agreements to maintain a certain level or degree of their domestic labor or environment standards. (In what follows, I will focus on the issues in labor standards or labor clauses.) Having these two notable features in recent development in the world trading system, the total number of RTAs as well as the number of RTAs with labor clauses have been rapidly growing since the late 1990s, as shown in Figure 1.

To discuss the labor clauses in trade agreements and their relevance, it is important to examine the following two questions: (i) Does globalization really deteriorate domestic labor standards or working conditions in countries in the world—i.e., have either races to the bottom or "dumping" practices in labor standards really been the case?; and (ii) Are labor clauses in trade agreements—or is ruling or

handling domestic labor issues in trade agreements—effective for a case in which domestic labor standards and conditions erode in relation with globalization? On the first of these two questions, there is a large volume of research. The theoretical studies are overall skeptical about the view in which low or weak labor standards create or improve export competitiveness of a country. Empirical studies have failed to find evidence supporting the race-to-the-bottom hypothesis that low or weak labor standards are brought by export-competition pressure. Some pieces of literature have rather found evidence supporting an opposite possibility, that is, better or stricter labor standards will be linked to a larger volume of exports or the attraction of inward foreign direct investment (FDI). Further review of the literature is left to Brown et al. (2011) and Kamata (2014) that offer a more comprehensive and detailed literature review on the issues in trade and labor standards.

However, some pieces of more recent literature have indeed found evidence for the race-to-the-bottom hypothesis in relation with growth in international trade or FDI, particularly in the labor rights of freedom of association and collective bargaining, or the FACB rights. Mosley and Uno (2007) use a unique cross-country and time-series dataset of the indicator of collective labor rights constructed based on Kucera's (2002) approach. They find that the flows and stock of inward FDI (as the shares in a country's GDP) improves the FACB rights in the country, while more openness to trade (measured as trade ratio to GDP) deteriorates the rights. Davies and Vadlamannati (2013) also use this FACB-right data by Mosley and Uno and find that the FACB rights in a country are correlated with the rights in its neighboring countries, which they interpret as an indication of a downward pressure on the FACB rights due to international competition.¹ In addition to these studies focusing on the FACB rights, the study by Olney (2013) uses the OECD's indicator of the strictness of employment protection and finds evidence for a possibility that countries are competing in relaxing employment-protection regulation to attract inward FDI.

In contrasts, the literature is slim on the second of the two questions presented above. There are a small number of theoretical pieces that present skepticism about the effectiveness or appropriateness of trade sanctions against possible deterioration in domestic labor standards or non-compliance practices. The empirical literature has been even thinner, and I was not able to find other empirical than my own earlier work

¹ Davies and Vadlamannati conjecture that this intra-regional correlation in the FACB rights may be due to “races to the bottom” in labor standards (they indeed use this phrase in the title of the paper), but they do not test the conjecture at all.

(Kamata, 2014) until recently. (See Brown et al., 2011, and Kamata, 2014 for a more detailed review of the literature up to the earlier 2010s.) However, more recently have arisen some empirical studies that examine the effects of labor provisions in trade agreements on domestic labor standards, mainly by researchers affiliated with the International Labour Organization (ILO) such as ILO (2016, 2017) and Sari et al. (2016). Sari et al. (2016) should be especially noted since they investigate what types of labor provisions are effective to maintain or improve the FACB rights in signatory countries using a very careful and detailed classification of RTAs.²

The purpose of the current study is to address the second question of the two mentioned above: that is, whether labor clauses in RTAs are effective to prevent the domestic labor standards in RTA signatory countries from deterioration. For my macro-level empirical analysis, it is important to find a labor-standard measure for which data are available for a wide variety of countries for multiple years. I thus employ the following two measures of domestic labor standards: statutory minimum wages and the strictness indicator of employment protection, since these should be, at least to date, only labor-standard measures for which international data are readily available in a comparable form in both cross-country and time-series dimensions. The impacts of RTA with and without labor clauses as well as the trade presence of the RTA partners for a signatory are estimated using the RTA classification proposed in my own previous study (Kamata, 2016) together with data on minimum wages and the indicator of the strictness of employment protection for a wide variety of countries for multiple years. The results show that having labor-clause-*non*-inclusive RTAs with more or larger trading partners are associated with lower statutory minimum wages although that negative association is not found for labor-clause-inclusive RTAs. The separate estimation for countries in different income groups further demonstrates that the above-mentioned results are chiefly driven by middle-income countries that sign RTAs with high-income partners. This should imply that signing RTAs with more or larger high-income trading partners would create to the government of a middle-income country, which has a comparative advantage over the high-income partners in labor-intensive sectors, a downward policy pressure on statutory minimum wages, while labor clauses could alleviate such a negative policy effect of RTAs on minimum wages in the middle-income country. This finding also exhibits an interesting contrast with the empirical finding of my preceding study in which no systematic relationship has been found between RTA-partner trade

² It is unfortunate that they do not present the catalogue of their RTA labor-clause classification, which should be worth comparing with the catalogue that I have proposed (Kamata, 2016).

concentration and *actual* labor earnings regardless of whether or not RTAs include labor provisions. This potentially asymmetric effects of RTA labor clauses on statutory minimum wages and actually-paid wages are confirmed through the estimation with a “common” sample, which should suggest that although signing RTAs with more or larger partners would not bring a market pressure on wages regardless of whether or not the RTAs have labor clauses, signing RTAs with more or larger partners could create some policy pressure onto the signatory government to maintain statutory minimum wages being low, unless the RTAs include labor clauses. Unlike this case of statutory minimum wages, however, the empirical analysis finds no evidence for positive impacts of labor-clause-inclusive RTAs or negative impacts of labor-clause-free RTAs on the strictness of employment-protection regulations in the signatory countries.

The rest of this paper is structured as follows: the next section 2 describes the empirical approach and data used for the analysis, followed by section 3 that presents the results of the empirical analysis. The final section 4 concludes the paper with discussion of possible extension of the current study.

2 Empirical Approach and Data for the Analysis of the Impacts of RTA Labor Clauses on Labor Standards

To empirically analyze the effects of RTA labor provisions on the domestic labor standards in the RTA member countries, I employ two types of empirical specification, or models, following my own previous work (Kamata, 2016). The first “benchmark” empirical model is to investigate whether and to what degree signing labor-clause-inclusive RTAs with a country’s trading partners affects the country’s domestic labor standards, compared to the case of signing RTAs without labor provisions. The second and alternative model focuses on the potential impacts of the first RTA with labor clauses for a country on its domestic labor standards.

2.1 Empirical Models

2.1.1 Benchmark Model for Impacts of RTAs with vs. without Labor Clauses

The benchmark empirical model is constructed under the assumption that a country’s domestic labor standards will be higher or stricter as the country signs a labor-clause-inclusive RTA(s) with more trading partners or with a larger and thus more

commercially important trading partner(s) for the country, or that although signing a labor-clause-*non*-inclusive RTA(s) with more and/or larger trading partners will deteriorate the country's domestic labor standards, such negative impacts of RTAs will be alleviated when the RTAs include labor clauses. The benchmark model is expressed as the following equation:

$$LS_{it} = \alpha + \beta_1 TC_{i,t-a}^{LC} + \beta_2 TC_{i,t-a}^{NL} + \mathbf{X}_{it}\gamma + u_i + T_t\delta + \varepsilon_{it} \quad (1)$$

LS_{it} on the left side of this Equation (1) expresses the domestic labor standards in country i at time (year) t . As described in the later subsection 2.2.1, two measures for LS_{it} are employed in the current study: statutory minimum wages and the strictness of employment protection.

Among the variables on the right side of Equation (1), the first two variables TC_{it}^{LC} and TC_{it}^{NL} are the key variables: TC_{it}^{LC} is an indicator of country i 's trade concentration with partner countries with which the country i signs a RTA(s) with labor clauses; and TC_{it}^{NL} is the trade-concentration indicator with the partners of a RTA(s) *without* labor clauses. The construction of these indicators will be described in the subsection 2.2.2 below. The two TC indicators are lagged by a years, varying lag-year a from one through four, to capture a potential time lag in the impacts of signing RTA labor clauses on the country's domestic labor clauses.

The vector \mathbf{X}_{it} on the right side of Equation (1) contains other control variables for country i at time t that are potentially influential on the domestic labor standards in the country. In the current study, the vector contains the following variables: the natural log of real GDP per capita and its square, assuming that a country's income level will push up the country's statutory minimum wage but its marginal effect is diminishing; employment in the industry sector as the share in the country's total employment; manufacturing value added as the share in the country's GDP; and indexes indicating overall political-right and civil-liberty conditions in the country. In addition, u_i indicates country dummies representing country-specific and time-invariant factors, and T_t indicates time (year) dummies representing time-specific factors that are common across countries, to capture potential factors that affect country i 's labor conditions but are not observable for researchers. Finally, ε_{it} represents the idiosyncratic error term.

2.1.2 Alternative Specification for Impacts of the First RTA with Labor Clauses

The second model is to particularly analyze the impacts of the first labor-clause-inclusive RTA for a country on the country's domestic labor standards. It

could be the very first RTA with labor clauses for a country that is really influential on the country's domestic labor standards, and signing more labor-clause-inclusive RTAs with other partners might not give or add to the signatory country crucial incentive to adjust its domestic labor standards after being pressured by the first labor-clause-inclusive RTA to comply. To capture this potential impact of the first RTA with labor clauses, the alternative empirical model is constructed as expressed as Equation (2) below:

$$LS_{it} = \alpha + \sum_{s \in \{1,2,3,4+\}} \{\beta_{1,s} D_{i,t-s} + \beta_{2,s} (D_{i,t-s} \cdot xshare_i)\} + \mathbf{X}_{it}\gamma + u_i + T_t\delta + \varepsilon_{it} \quad (2)$$

As in the preceding Equation (1), the left-side variable LS_{it} is a measure of country i 's domestic labor standards. $D_{i,t-s}$ on the right-side of the equation is indicator variables expressing when country i signed the first labor-clause-inclusive RTA for the country, in terms of how many years ($s = 1, 2, 3$, or 4^+) prior to the current data year t . That is, $D_{i,t-1} = 1$ if country i signed its first labor-clause-inclusive RTA one year before t (and $= 0$ otherwise); $D_{i,t-2} = 1$ if the country signed in two previous years, $D_{i,t-3} = 1$ if in three previous years, and $D_{i,t-4+} = 1$ if the country signed its first labor-clause-inclusive RTA four or more years earlier. The variable $xshare_i$ indicates the share of the partner(s) of that first labor-clause-inclusive RTA for country i in the country's total manufacturing exports as of the initial year of that RTA into force.³ Therefore, the product term of D_{it} and $xshare_i$ is to capture the potential impact of the size of the first labor-clause-inclusive RTA partner: the compliance pressure on the signatory country to adjust to the domestic labor standards would be greater as the partner of the first RTA is larger and thus more important as an export market for the signatory country.

2.2 Data

2.2.1 Labor-standard Measures: Statutory Minimum Wages and the Strictness of Employment Protection

The key variable for the empirical analysis in the current study is the domestic labor standards (LS_{it}) as the dependent variable in both empirical models Equations (1) and (2). For the purpose of the current study, it is important to find and employ the measures of labor standards for which time-series data for as a wide variety of countries as

³ The export share of the RTA partner(s) as of the year 1995 is applied when the first labor-clause-inclusive RTA became into force in 1994 or earlier, since trade data are available only for 1995 or later years.

possible. Although such multi-country and multi-period data on labor standards are not very widely and readily available, I employ the following two measures for which time-series information for multiple countries are available: statutory minimum wages and the indicator of the strictness of employment protection.

Data on statutory minimum wages are obtained from *ILOSTAT*, an on-line database provided by the ILO.⁴ The *ILOSTAT* reports data on statutory nominal gross monthly minimum wage effective as of December 31 of each data period for 139 countries and for the years 1995 through 2013 (data are not available for every year for all countries, however). From this *ILOSTAT* information, I employ and compute three versions of statutory monthly minimum wage measures. The first is the nominal minimum wage in local currency, which is identical to the data provided in the *ILOSTAT*. This is the primary measure of minimum wages in the current study, as the governments set statutory minimum wages basically as nominal values in their local currencies. The second measure is the *real* minimum wage in local currency, which is converted from the ILO-reported nominal value using the GDP deflator of each country obtained from the World Bank's *World Development Indicators*.⁵ This measure is to see changes in inflation-adjusted minimum wages since governments may have been adjusting the statutory minimum wages to inflation. The third measure is statutory monthly minimum wage in the constant 2005 US dollar (i.e., real dollar-denominated minimum wage), which is converted from the ILO's original nominal local-currency value using the current market exchange rate and US GDP deflator (base year 2005) that are also obtained from the *World Development Indicators*.

For the strictness of employment protection, I employ data from the OECD's Employment Protection Database.⁶ The OECD database provides summary indicators of employment protection that are constructed from the quantitative and qualitative evaluations of the employment protection regulations for the strictness of regulation on dismissals and use of temporary contracts. The regulations of each country are assessed from a variety of aspects to construct the summary indicators. The data are primarily for OECD members but also cover some non-OECD countries. The virtue of this data is that they cover long time periods from the years 1985 through 2015. From this OECD data I particularly employ their "version 1" summary indicator that measures the strictness of regulations of individual dismissal of employees on regular or indefinite

⁴ <http://www.ilo.org/ilostat/>

⁵ <http://data.worldbank.org/data-catalog/world-development-indicators>

⁶ <http://www.oecd.org/els/emp/oecdindicatorsofemploymentprotection.htm>

contracts (EPR_V1).

2.2.2 RTAs with vs. without Labor Clauses and the Construction of RTA-partner Trade-concentration Indexes

The two trade-concentration indexes in the benchmark model Equation (1), TC_{it}^{LC} and TC_{it}^{NL} , are constructed as follows:

$$TC_{it}^{LC} = \sum_j^N (RTA_{ijt}^{LC} \times TradeShare_{ij,1995}) \quad \text{for } i \neq j$$

$$TC_{it}^{NL} = \sum_j^N (RTA_{ijt}^{NL} \times TradeShare_{ij,1995}) \quad \text{for } i \neq j$$

RTA_{ijt}^{LC} and RTA_{ijt}^{NL} are dummy variables that take the value one if countries i and j are both members of a common RTA(s) with and without labor clauses as of year t , respectively; and $TradeShare_{ij}$ is the volume of manufacturing trade (imports plus exports) between countries i and j as the share in country i 's total manufacturing trade with all other countries in the world. Thus, TC_{it}^{LC} (TC_{it}^{NL}) takes a larger value as country i signs more RTAs with (without) labor clauses, or signs a labor-clause-(non-)inclusive RTA(s) with a larger trading partner(s). On constructing these indexes, I use the fixed share of RTA partner(s) in each country's total manufacturing trade as of the year 1995 ($TradeShare_{ij,1995}$), which is the earliest period in the data used for the current study. This is to address an issue of possible endogeneity between signing an RTA and trade share of the RTA partner(s) (for instance, TC_{it}^{LC} could take a larger value when country i 's trade with the partner of a previously-signed labor-clause-inclusive RTA increased, even though country i did not sign an additional labor-clause-inclusive RTA with other partner), and to examine the impact of the size of RTA partners at or prior to the signing of the RTA. However, I also construct and use for estimation the trade-concentration indexes based on the current-year RTA-partner trade share to see whether any difference appears in the result. Data on bilateral manufacturing trade flows that are used to compute the trade share of RTA partners for each country are obtained from the *UNCTADstat*, an on-line database provided by the UNCTAD.⁷

To construct these RTA trade-concentration indexes, also is needed the information on bilateral (and plurilateral) RTAs and whether those RTAs do or do not include labor provisions. I use the catalogue and classification of RTAs that have been made through my other studies (Kamata, 2014 and 2016). The catalogue covers 223 bilateral or plurilateral RTAs (excluding the Generalized System of Preferences of

⁷ <http://unctadstat.unctad.org/>

GSPs) that have been in force and notified to the WTO as of the end of June 2013.⁸ These RTAs varies in terms of whether the RTAs include any provision mentioning labor standards or worker rights as well as to what degree those standards and/or rights are ruled or mentioned. I thus selected RTAs that satisfy the following two conditions and defined them as “RTAs with labor clauses” (or labor-clause-inclusive RTAs) and all else as “RTAs without labor clauses” (or labor-clause-non-inclusive RTAs): (i) the RTA has provisions that demand, urge, or at least expect the signatory countries to harmonize their domestic labor conditions and regulations with the internationally recognized standards such as the ILO’s “core” standards or an equivalent set of labor standards, and (ii) the RTA has an extensive set(s) of articles that stipulates the items/issues for which the signatory countries shall cooperate and the procedures for consultations and/or dispute settlement on issues concerning labor conditions, as a part (chapter(s) or title(s)) of the main body of the RTA or a separate side agreement or MOU. For robustness-check purposes, I also consider the condition (ii) only as another definition of “RTAs with labor clauses” and call it the ‘liberal’ definition/classification of labor-clause-inclusive RTAs. In contrast, I call the benchmark definition with the two conditions (i) and (ii) the ‘conservative’ definition/classification. There are 22 labor-clause-inclusive RTAs under the conservative classification, while 31 are defined as labor-clause-inclusive RTAs under the liberal classification, as listed in Table 1.

2.2.3 Data for Other Control Variables

Data for other control variables contained in vector \mathbf{X}_{it} in both Equations (1) and (2) are obtained as follows. For the linear and square terms of the (log-scaled) real income, GDP per capita in constant 2005 US dollars from the *World Development Indicators* is employed. Data for both employment in the industry sector as the share in the total employment and manufacturing value-added as the share in GDP are also taken from the *World Development Indicators* and computed as the percent values. The indexes of political rights and civil liberties are sourced from the Freedom House’s *Freedom in the World*. The indexes are scaled from 1 through 7, and a smaller number indicates a higher degree of freedom. The data for the current paper are obtained from an on-line database provided by the International Institute for Democracy and Electoral Assistance

⁸ There are 259 RTAs that have been in force and notified to the WTO as of the end of June 2013, but I have been able to find the texts of only 223 of those RTAs to examine the existence and contents of their labor provisions or worker-right-related provisions.

(International IDEA).⁹

2.2.4 Constructed Dataset for Empirical Analysis

The dataset for the empirical analysis is constructed by combining the various data from different sources that have been described above. The constructed dataset covers 106 countries for the years 1995 through 2011 (but the observation periods are from only 1996 through 2011, since the earliest-period data for 1995 are used as lagged variables for the period of year 1996 or later). Table 2 lists the countries covered by the dataset, and Table 3 presents the summary statistics of the dependent variables (labor-standard measures) of the two empirical models, RTA trade-concentration indexes in the benchmark model, and other control variables in both models, contained in the dataset.

3 Estimation Results

3.1 Effects of RTA Trade on Labor Standards: Results of Estimation of Benchmark Model

3.1.1 Estimation with the Whole Sample

First, the benchmark empirical model Equation (1) is estimated using the fixed-effect regression. The results of the estimation are presented in Table 4. Numbers in parentheses are robust (clustered) standard errors of the coefficient estimates.

Statutory Minimum Wages

The second through thirteenth columns show the results of estimation for the three measures of statutory minimum wages. The first four of these 12 columns are for the local-currency nominal, the next four are for the local-currency real, and the last four are for the constant US-dollar versions of the minimum wages. In each group of four columns, the first column shows the result of the estimation with one-year-lagged

⁹ <http://www.idea.int/>. The Freedom House conducts the evaluation and rating for a country with an interval of a few to several years, and thus for each country there exist “non-surveyed years” for which updated indexes are not available. For these non-surveyed years, I have filled in the data in the following manner: the non-surveyed years are basically filled in with the indexes for the previous survey year; but the data in non-surveyed years are kept unfilled/missing when (i) the survey interval is significantly long, (ii) the scores/ratings are very different between the two survey years, or (iii) it is somewhat obvious that human-right condition of a country was affected by a significant political event that occurred in that country during a survey-interval period .

RTA trade-concentration indexes (TCs), the second shows the estimation with two-year-lagged TCs , the third is with three-year-lagged TCs , and the fourth is the estimation result with four-year-lagged TCs . The table shows a clear picture in the estimation result for any of the three minimum-wage measures: basically for any of the one- through four-year-lagged variables, the coefficient estimate $\hat{\beta}_2$ on the trade-concentration index for RTAs *without* labor clauses (TC^{NL}) is negative and statistically significant.¹⁰ This could be interpreted as that a country tends to lower its statutory minimum wage as the country has signed a labor-clause-*non*-inclusive RTA(s) with more and/or larger trading partners. The coefficient estimates indicate that, on average, as a country's trade concentration with a partner(s) of labor-clause-free RTA increases by 1% (by signing a RTA with a new partner(s) or with a larger partner), the statutory minimum wage in that country will fall by about 0.8% in the nominal value or 0.5% in the real term. In contrast, the coefficient estimate $\hat{\beta}_1$ on the trade-concentration index for RTAs *with* labor clauses (TC^{LC}) is neither significantly positive nor negative in most of the cases, except for the cases of the real minimum wages in local currency (the 9th column) and US dollar (the 13th column) where the 4-year-lagged TC^{LC} indicates a positive and significant effect on the minimum wage. These results should suggest that labor clauses could at least null/cancel the potential negative impact of labor-clause-free RTAs on statutory minimum wages.

Statutory Minimum Wages vs. Actual Wages

The estimation result provided above demonstrates an interesting contrast with the empirical finding in my own other work (Kamata, 2016) in which no evidence have been found for positive or negative impacts of RTAs with or without labor clauses on *actual* wages (labor earnings). To confirm this potential asymmetric impacts of RTAs with and without labor clauses, I estimate the benchmark model for actual wages, and also (re-)estimate Equation (1) for the three measures of statutory minimum wages (measured in local currency nominal, local currency real, and US dollar real), using a “common” sample comprising observations for which data for both actual wages and statutory minimum wages are available. The data for (the log of) actual wages are sourced from *LABORSTA*,¹¹ another on-line database by the ILO, and I take the reported values of the mean monthly earnings of manufacturing workers in the nominal

¹⁰ The only exception is the 4-year-lagged TC^{NL} for the local-currency nominal value of the minimum wage. Although the sign of the coefficient estimate is negative as in all other estimation, it is not statistically significant.

¹¹ <http://laborsta.ilo.org/>

local currency unit and convert them to the real values in constant 2005 US dollars using the current market exchange rates (annual average) and the US GDP deflator reported in the *World Development Indicators*. As Table A1 presents, the findings are indeed (re-)confirmed through the estimation with the common sample. As shown in the last twelve columns of the table, the coefficient estimate on the trade-concentration index for labor-clause-free RTAs (TC^{NL}) is negative and statistically significant for virtually all cases, and that on the index for labor-clause-inclusive RTAs (TC^{LC}) is insignificant for any case. The sizes of these coefficient estimates are also very similar to those in Table 4. In contrast, the estimation for the actual wage gives no positive or negative significant coefficient estimates as shown in the second through fifth column of Table A1, implying that signing RTAs with more and/or larger partners would not have significant impacts on actually-paid wages. These empirical results overall may imply that (i) signing RTAs with more or larger partners would not bring a market pressure on wages regardless of whether or not the RTAs have labor clauses; but that (ii) signing labor-clause-free RTAs with more/larger partners might create some policy pressure onto the signatory government to maintain statutory minimum wages being low; while (iii) labor clauses in RTAs could alleviate such downward policy pressure on minimum wages created by RTAs.

Strictness of Employment Protection

The last four columns of Table 4 present the result of estimation of the benchmark Equation (1) for the OECD indicator of the strictness of employment protection. Unlike the case of the statutory minimum wages, the estimation shows no evidence for the positive or negative impacts of RTA trade on employment protection in terms of dismissal regulations, regardless of whether the RTA has labor clauses or not: the coefficient estimate on neither TC^{LC} nor TC^{NL} is statistically significant with any lag. A possible reason for the suggested no impacts of RTA labor clauses on the strictness of employment protection might be due to the fact that most labor clauses deal with the core labor standards such as child-labor prohibition and the FACB rights of workers or “decent work” in terms of wages and work hours, but do not directly deal with the employment protection regulations. Alternatively, it might be merely due to technical issues in estimation such as that the sample for employment-protection estimation concentrates on the OECD members and includes few non-OECD countries.

Notes on Other Control Variables

Finally, I put some comments on the estimation results on other control

variables. First, although the estimation shows that a country's income level is associated with the country's statutory minimum wage in the nominal local-currency value, this positive association is not significant when the minimum wage is measured in real values.

Secondly, the estimation for the employment-protection index gives a negative and significant coefficient on the civil-liberty index, which should understandably indicate that more civil freedom is associated with stricter labor protection. However, the estimated coefficient on the political-right index is *positive* and significant, which should counter-intuitively indicate that a *lower* degree of political rights is associated with stricter employment protection.¹² Although a possible reason for this puzzle should be worth examining, I leave it to future investigation to focus on the main theme of the current study: the impacts of RTA labor clauses.

3.1.2 Estimation with Samples Separated in terms of Country Income Groups

The policy effects of RTA labor clauses on the domestic labor standards can be different for countries in different income levels. For instance, labor clauses might not be so important when an RTA is signed between high-income countries that both have high labor standards, but labor clauses might be effective when an RTA is signed between a high-income country with high labor standards and a lower-income country with weaker labor standards. The estimation with the whole sample presented above can hardly capture such difference.

To analyze the potential difference in the impacts of RTA labor clauses for countries in different income levels, I extend the benchmark model and estimate it with separated samples for countries in different income groups. More specifically, the original Equation (1) is modified to the following Equation (1e):

$$LS_{it} = \alpha + \sum_{g \in \{H, M, L\}} (\beta_{1,g} TC^{LC,g}_{i,t-a} + \beta_{2,g} TC^{NL,g}_{i,t-a}) + \mathbf{X}_{it}\gamma + u_i + T_t\delta + \varepsilon_{it} \quad (1e)$$

The partner-income-separated TC indexes are constructed as follows:

$$TC^{LC,g}_{it} = \sum_j^N (RTA^{LC}_{ijt} \times TradeShare_{ij,1995} \times I^g_j) \quad \text{for } i \neq j$$

$$TC^{NL,g}_{it} = \sum_j^N (RTA^{NL}_{ijt} \times TradeShare_{ij,1995} \times I^g_j) \quad \text{for } i \neq j$$

Index $g = \{H, I, L\}$ indicates the income group of each country: H represents high-income, M represents middle-income, and L represents low-income country groups,

¹² As mentioned earlier, the Freedom House's political-right and civil-liberty indexes are scaled in a way that a smaller score means greater freedom.

respectively. The country income groups are classified according to the World Bank's classification based on gross national income (GNI) per capita as of the year 1995: the country is high-income if its 1995 GNI per capita is \$9,386 or above, middle-income if between \$766 and \$9,385, or low-income if \$765 or below. The indexes I_j^g indicate the income categories of the RTA partners for each country i : $I_j^H = 1$ when the country's RTA partner j is high-income (and = 0 otherwise), $I_j^M = 1$ when the RTA partner j is middle-income, and $I_j^L = 1$ when the RTA partner j is low-income. Equation (1e) thus includes six trade-concentration (TC) indexes: a pair of TC^{LC} and TC^{NL} for three income groups (high, middle, and low) of the RTA partners of each country i . This extended empirical model is separately estimated for three subgroups of the sample countries separated in terms of the income groups (high, middle, and low).

The estimation results of the extended model are presented in Tables 5 through 7: Table 5 shows the results for high-income countries, Table 6 shows the results for middle-income countries, and Table 7 shows the results for low-income countries. These results suggest an overall finding that the negative and significant impact of signing labor-clause-*non-inclusive* RTAs with more and/or larger trading partners on statutory minimum wages as well as labor clauses' "nulling" or canceling effect against this negative RTA impact, which have been found through the whole-sample estimation, should mainly be driven by middle-income countries that sign RTAs with high-income partners (see Table 6, the first 8 rows for "High-income RTA partners"). For other cases such as high-middle or middle-middle country pairs, the estimated coefficients on the two RTA-trade-concentration indexes are mostly statistically insignificant or not consistent across the measurement units of the minimum wages. However, it should be noted that the estimation also gives a negative and significant coefficient on the TC index for labor-clause-*inclusive* RTAs consistently for high income countries with high-income partners (and for some cases with middle-income partners) for the *real* minimum wages (see the 6th through 13th columns of Table 5). Observing that many of the RTA with labor clauses are between high-income countries, this result might imply the possibility that in high-income countries, signing RTAs with more and/or larger trading partners creates a negative pressure on statutory minimum wages in the real term despite labor clauses in the RTAs, perhaps in a "passive" manner that the minimum wages are nominally maintained unrisen.¹³

¹³ The estimation also gives some significant coefficients on the TC indexes estimates for low-income countries, while the reliability of these estimates should be skeptical due to a limited-sample issue: among the RTAs dealt with in the current study, only one

From this set of the results of the pairwise-income-separated estimation, we might be able to derive a finer picture about what the set of empirical findings based on the benchmark model imply: Signing RTAs with more and/or larger high-income trading partners would create to the governments of middle-income countries, which have a comparative advantage over the high-income partners in labor-intensive sectors, a downward policy pressure on statutory minimum wages, while labor clauses could alleviate such a negative policy effect of RTAs on minimum wages in middle-income countries.

In terms of the impacts on the strictness of employment protection, the results presented in Tables 5 and 6 indicate that the result of no evidence for positive or negative effects of RTAs on employment-protection strictness in the whole-sample estimation may be common for countries in different income groups.¹⁴ It should however be noted that, for the case of RTAs between high-income countries, the estimated coefficient on the TC index for labor-clause-*inclusive* RTAs is negative and significant (while the coefficient on the index for labor-clause-free RTAs is insignificant), as shown in the last four columns of Table 5. This is similar to the above-mentioned finding for real minim wages, and a similar possibility might thus be implied: i.e., in high-income countries, signing RTAs with more and/or larger trading partners creates a negative pressure, despite labor clauses in the RTAs, on employment-protection regulations perhaps in a passive manner that the regulations are maintained untighten. At the same time, the estimation also shows that the coefficient on the TC^{LC} index is less negative and less significant with a longer lag, and this might imply that RTA labor clauses could have an improving effect on the strictness of employment protection slowly, reflecting time required for the governments to adjust the regulations to comply with the signed RTA labor clauses.

3.1.3 Estimation with Alternative Measures for RTA Trade-concentration Indexes

Finally, I estimate the benchmark model with the whole sample but using two different measures of the RTA trade-concentration indexes (TC^{LC} and TC^{NL}) to examine whether

labor-clause-inclusive RTA (CAFTA-DR) involves low-income countries (or, if following the ‘liberal’ RTA classification, four more labor-clause-inclusive RTAs involve low-income countries: CARICOM (2002 revised), EU-CARIFORUM States, New Zealand-China, and Nicaragua-Taiwan).

¹⁴ As indicated in the last four columns of Table 7, the sample for the current study includes no low-income-country observations valid for the estimation for the strictness of employment protection.

the construction of the TC indexes affects the estimation results.

First, I re-construct the TC indexes based on the ‘liberal’ definition of RTAs with labor clauses instead of the ‘conservative’ definition that has been employed originally, in order to see whether the definition of a labor-clause-inclusive RTA matters to the results of estimation. As described in a previous subsection 2.2.2 and shown in Table 1, the ‘conservative’ definition classifies 22 RTAs as labor-clause-inclusive RTAs while the ‘liberal’ definition adds nine other RTAs and classifies 31 as RTAs with labor clauses. The two RTA-trade-concentration indexes are re-computed accordingly and used to re-estimate Equation (1). The results are as presented in Table A2, and these results are almost exactly identical to the results of the original estimation presented in Table 4. The estimation results are not sensitive to the definition of labor-clause-inclusive RTAs, and thus the empirical findings presented earlier in subsection 3.1.1 should be robust to the classification of RTAs with labor clauses.

Secondly, I re-construct the TC indexes using the *current-year* share of RTA partners in a country’s total manufacturing trade, instead of the fixed share as of the year 1995 originally employed. The TC indexes are thus re-computed in the following manner (notice that the time script on *TradeShare* is now t , instead of the original “1995”):

$$TC_{it}^{LC} = \sum_j^N (RTA_{ijt}^{LC} \times TradeShare_{ijt}) \quad \text{for } i \neq j$$

$$TC_{it}^{NL} = \sum_j^N (RTA_{ijt}^{NL} \times TradeShare_{ijt}) \quad \text{for } i \neq j$$

The benchmark model Equation (1) is re-estimated using this alternative version of TC indexes, and the results are presented in Table A3. The results are not qualitatively different from those of the original estimation shown in Table 4, the statistical significance of the negative coefficient estimate on the index for labor-clause-*non*-inclusive RTAs (TC_{it}^{NL}) is now weaker, particularly for the real values of statutory minimum wages. As mentioned earlier in subsection 2.2.2, this alternative version of the TC indexes can pick up the effect of post-RTA growth in trade with the RTA partners. Thus, the results of the original estimation (Table 4) and this re-estimation with the alternative TC measures (Table A3) together imply that what is crucial for the potential negative impact of labor-clause-free RTAs on a signatory’s minimum wages is may be the *pre-signing* size or importance of the RTA partners (as well as the number of signed RTAs and partners), and the negative policy pressure on minimum wages may not be intensified even though the significance of the partners of the already-signed RTAs increases. The results might rather suggest a possibility that

post-RTA growth in trade with the RTA partners could improve the minimum wages in the real term, which could mitigate the initial negative impact of signing a labor-clause-free RTA on the nominal (and real) minimum wages.

3.2 Results of the Estimation of the Second Model

The estimation is also performed for the second empirical model expressed as Equation (2) that focuses on the importance of the first labor-clause-inclusive RTA for a country. Table 8 presents the results of the estimation through the fixed-effect regression. As in the previous tables, numbers in parentheses indicate the robust (clustered) standard errors of corresponding coefficient estimates.

The results of estimation for statutory minimum wages are shown in the second through fourth columns of the table. The estimated coefficient on the dummies indicating the timing of signing the first labor-clause-inclusive RTA (D_{t-1} through D_{t-4+}) are statistically insignificant for any measure of minimum wage or for any year dummy. On the other hand, the estimated coefficient on the product term of the first-RTA dummy and the size of the first-RTA partner(s) as the share in the country's total manufacturing export is positive and significant consistently in almost all cases. This result might suggest that the first labor-clause-inclusive RTA for a country could have a positive effect on the country's minimum wages only when that first RTA is signed with a large-market trading partner. In other words, the first labor-clause-inclusive RTA would not be very influential on the country's minimum wages when the RTA is signed with a small partner or minor export market for the country. Finally, the result of the estimation for the strictness of employment protection that is shown in the last column of the table provides no evidence for the impacts of the first labor-clause-inclusive RTA on the signatory's employment-protection regulations, which is consistent with the estimation result of the benchmark model that has found no evidence for the effects of RTAs with (and without) labor clauses on the employment protection strictness.

The impacts of the first labor-clause-inclusive RTA on a country's domestic labor standards can differ across countries with different income levels. To analyze this potential difference, the second empirical model is also estimated with subsamples for high-income countries and middle-income countries.^{15,16} The estimation results for

¹⁵ The estimation results are not presented for low-income countries, as the current dataset contains no low-income-country observations valid for the estimation of the second model.

¹⁶ For this second model, the sample is separated only in terms of the country's income levels

high-income countries are presented in Table 9 and those for middle-income countries are shown in Table 10. These two tables show that the above-mentioned results of the estimation with the whole sample for statutory minimum wages (i.e., insignificant coefficients on the timing dummies and positive and significant coefficients on the product terms of the dummies and the size of the RTA partner) should be driven by the high-income countries in the sample as shown in Table 9,¹⁷ and Table 10 indicates that virtually none of the coefficient estimates is significant for the middle-income countries. At the same time, these results might indicate other possibility on the interpretation of the empirical findings through the second model, which might be due to reversed causality: i.e., a high-income country whose statutory minimum wage is originally high(er) is less hesitant or more willing to sign a labor-clause-inclusive RTA even with a partner with large(r) market.¹⁸

As an overall message from these results of the estimation of the second empirical model, it should be fair to conservatively conclude that having one labor-clause-inclusive RTA by itself may not have significant impacts on the signatory's statutory minimum wages or employment-protection regulations, and that it is not necessarily the first RTA with labor clauses that could influence on these labor standards in the signatory country.

4 Conclusion and Discussion

The current study has addressed the question of whether labor clauses in regional trade agreements or RTAs are effective to maintain or improve the domestic labor standards in the signatory countries. This study has empirically analyzed the effects of RTA labor clauses on two measures of the signatories' domestic labor standards: statutory minimum wages and the strictness of employment protection. The impacts of RTA with

but not for the partners', unlike the case for the benchmark model.

¹⁷ For the minimum wage in the real US-dollar value, however, no significant coefficients are found even in the estimation for high-income countries (see the fourth column of Table 9) although the coefficients on the product terms of the first-RTA dummies and the partner size are positive and significant in the estimation with the whole sample. This might be due to the small sample size ($N = 85$) in the high-income subsamples for the estimation.

¹⁸ For the employment-protection strictness, unlike the estimation with the whole sample or high-income subsample, the estimation with the middle-income subsample gives significant coefficient estimates on the first-RTA dummies (positive) and the product term of the dummies and the size of the first-RTA partners (negative). However, this may also be due to the small sample size ($N = 106$).

and without labor clauses as well as the trade presence of the RTA partners for a signatory have been estimated using the RTA classification proposed in my own previous study (Kamata, 2016) together with data on minimum wages and the indicator of the strictness of employment protection for a wide variety of countries for multiple years. The results show that having labor-clause-*non*-inclusive RTAs with more or larger trading partners are associated with lower statutory minimum wages although that negative association is not found for labor-clause-inclusive RTAs. The separate estimation for countries in different income groups further demonstrates that the above-mentioned results are chiefly driven by middle-income countries that sign RTAs with high-income partners. This should imply that signing RTAs with more or larger high-income trading partners would create to the government of a middle-income country, which has a comparative advantage over the high-income partners in labor-intensive sectors, a downward policy pressure on statutory minimum wages, while labor clauses could alleviate such a negative policy effect of RTAs on minimum wages in the middle-income country. This finding also exhibits an interesting contrast with the empirical finding of my preceding study in which no systematic relationship has been found between RTA-partner trade concentration and *actual* labor earnings regardless of whether or not RTAs include labor provisions. This potentially asymmetric effects of RTA labor clauses on statutory minimum wages and actually-paid wages have been reaffirmed through the estimation with a “common” sample, which should suggest that although signing RTAs with more or larger partners would not bring a market pressure on wages regardless of whether or not the RTAs have labor clauses, signing RTAs with more or larger partners could create some policy pressure onto the signatory government to maintain statutory minimum wages being low, unless the RTAs include labor clauses. Unlike this case of statutory minimum wages, however, the empirical analysis has found no evidence for positive impacts of labor-clause-inclusive RTAs or negative impacts of labor-clause-free RTAs on the strictness of employment-protection regulations in the signatory countries. It should also be noted that the empirical analysis has found some evidence for potential negative effects of RTAs between high-income countries on their domestic labor standards even in the case of RTAs with labor clauses.

To conclude the current paper, I discuss what could be done for further investigation of the current research question. One is to estimate the impacts of RTA labor clauses on the FACB rights of workers. As mentioned in the introductory section of this paper, some recent studies have pointed out a possibility of “races to the bottom” in the FACB rights of workers due to globalization, or a possible negative impact of

growing international trade or foreign direct investment on workers' FACB rights. It should thus be valuable to extend the current empirical approach to investigate whether RTA labor clauses could prevent the possible deterioration of the FACB rights, which are included in the internationally recognized core labor standards to which a number of RTAs refer in their labor provisions. Another is to perform more detailed investigation of the function of RTA labor provisions in affecting the domestic labor standards in the signatory countries. This might be an important theme to explore, as Sari et al. (2016) points out that the effectiveness of RTA labor clauses could be different by the types of the provision. Considering restriction and difficulty in obtaining macro-level data for this theme, however, one feasible and hopefully promising approach could be a case study of a particular RTA with labor clauses that has relatively a long history, such as the NAFTA.

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Table 1. List of Regional Trade Agreements with Labor Clauses

(RTAs with * are included only according to the *liberal* classification.)

USA-Australia	* EFTA-Hong Kong
USA-Bahrain	* EFTA-Montenegro
USA-Chile	* EU-CARIFORUM States
USA-Colombia	* Caribbean Community and Common Market (CARICOM, 2002 revised)
USA-Jordan	
USA- Korea (South)	* Chile-China
USA-Morocco	* Chile-Colombia
USA-Oman	* New Zealand-China
USA-Panama	* New Zealand-Malaysia
USA-Peru	* Nicaragua-Taiwan
USA-Singapore	
North American Free Trade Agreement (NAFTA)	
USA-CAFTA-Dominican Republic (CAFTA-DR)	
Canada-Chile	
Canada-Colombia	
Canada-Costa Rica	
Canada-Jordan	
Canada-Peru	
European Economic Area (EEA)	
EU- Korea (South)	<u>No. of RTAs with labor clauses:</u>
Chile-Turkey	22 according to the <i>conservative</i> classification
Trans-Pacific Strategic Economic Partnership (TPSEP or P4)	31 according to the <i>liberal</i> classification

Notes:

- RTAs with labor clauses are defined as RTAs, according to the *conservative* classification, that satisfy both of the following two criteria:
 - The RTA has provisions that demand, urge, or at least expect the signatory countries to harmonize their domestic labor conditions and regulations with the internationally recognized standards such as the ILO's "core" standards or an equivalent set of labor standards,
 - the RTA has an extensive set(s) of articles that stipulates the items/issues for which the signatory countries shall cooperate and the procedures for consultations and/or dispute settlement on issues concerning labor conditions, as a part (chapter(s) or title(s)) of the main body of the RTA or a separate side agreement or MOU.

RTAs with labor clauses under the *liberal* classification are those that satisfy the criterion (ii). (This classification includes the RTA with * in the list above, which satisfy (ii) but not (i).)
- The labor-clause-inclusive RTAs listed above are classified from the population of 223 RTAs that had entered in force and are notified to the WTO as of July 2013. The Generalized System of Preferences (GSP) are not included in the RTA populations.

Table 2. Countries in the Data for Empirical Analysis
(106 countries)

High-income Countries (24 countries)	Middle-income Countries (52 countries)		Low-income Countries (29 countries)
Australia*	Algeria	Mauritius	Albania
Austria*	Argentina	Mexico*	Armenia
Bahamas	Bolivia	Moldova	Azerbaijan
Belgium*	Botswana	Morocco	Benin
Canada*	Brazil*	Panama	Bhutan
Cyprus	Bulgaria	Paraguay	Burkina Faso
Denmark*	Chile*	Peru	Cambodia
Finland*	Colombia	Philippines	Cameroon
France*	Costa Rica	Poland*	Ethiopia
Germany*	Croatia	Romania	Georgia
Iceland*	Cuba	Russia*	Ghana
Ireland*	Czech Republic*	Slovakia*	Honduras
Italy*	Dominican Republic	Slovenia*	India*
Japan*	Ecuador	South Africa*	Kenya
Korea (South)*	Egypt	Syria	Kyrgyzstan
Luxemburg*	El Salvador	Thailand	Mali
Netherlands*	Estonia*	Trinidad & Tobago	Mongolia
New Zealand*	Gabon	Tunisia	Nicaragua
Norway*	Guatemala	Turkey*	Nigeria
Portugal*	Hungary*	Ukraine	Pakistan
Spain*	Indonesia*	Uruguay	Rwanda
Sweden*	Jamaica	Uzbekistan	Senegal
United Kingdom*	Jordan	Venezuela	Sri Lanka
United States*	Kazakhstan		Tajikistan
	Latvia	(Income group N.A.) (1 country)	Tanzania
	Lesotho	Serbia	Togo
	Lithuania		Uganda
	Macedonia		Vietnam
	Malta		Zambia

Notes:

1. The numbers of data years are different for different countries, ranging from 1 to 16 of the entire 16 time points (between years 1996 and 2011, with lagged variables).
2. Countries with asterisks (*) are those included in the data for estimation for the strictness of employment protection (36 countries).
3. Income groups are based on the World Bank's income classification as based on the country's gross national income (GNI) per capita as of 1995, defined as follows:

High income:	\$9,386 or more
Middle income:	\$ 766 to \$9,385
Low income:	\$ 765 or less

Table 3. Summary Statistics for Variables in Benchmark Model;
for observations valid for the estimation

	Obs.	Mean	Std. Dev.	Min	Max
ln(monthly minimum wage in LCU, nominal)	910	7.49	2.71	0.095	14.32
ln(monthly minimum wage in LCU, real)	910	7.56	2.81	0.095	13.80
ln(monthly minimum wage in constant 2005 USD)	820	4.54	1.88	-5.25	9.83
Strictness of Employment Protection (OECD Indicator)	430	2.25	0.814	0.26	4.58
trade-concentration with LC-incl. RTA partners (TC^{LC}_{it})	1051	0.246	0.336	0	0.854
trade-concentration with LC-nonincl. RTA partners (TC^{NL}_{it})	1051	0.155	0.203	0	0.892
ln(GDP/cap)	1,072	8.73	1.40	5.00	11.38
industry employment (%)	1,072	23.41	6.73	2.6	41.8
manufacturing v.a. (%)	1,072	17.60	5.64	0	35.63
political rights index	1,072	2.38	1.73	1	7
civil liberties index	1,072	2.61	1.47	1	7

Table 4. Impacts of RTA with Labor Clauses vs. RTA without Labor Clauses on Minimum Wages and Employment Protection
(RTAs with labor clauses defined by the conservative classification; and RTA trade concentrations are based on the RTA partners' manufacturing trade share as of 1995.)

Dependent variable:	Statutory Minimum Wages (log-scaled)												Strictness of Employment Protection			
	in Local Currency, Nominal				in Local Currency, Real				in Constant US Dollar							
	Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4
RTA Concentration with Labor Clauses $t-1$	-.039 (.122)				.016 (.096)				.053 (.129)				-.088 (.065)			
RTA Concentration w/o Labor Clauses $t-1$	-.804*** (.263)				-.363** (.181)				-.458** (.213)				.070 (.147)			
RTA Concentration with Labor Clauses $t-2$		-.038 (.121)				.055 (.091)				.101 (.123)				-.135 (.080)		
RTA Concentration w/o Labor Clauses $t-2$		-.839*** (.283)				-.469** (.188)				-.533** (.219)				.142 (.125)		
RTA Concentration with Labor Clauses $t-3$			-.034 (.133)				.094 (.096)				.183 (.134)				-.119 (.089)	
RTA Concentration w/o Labor Clauses $t-3$			-.802** (.325)				-.474** (.216)				-.546** (.265)				.008 (.146)	
RTA Concentration with Labor Clauses $t-4$				-.029 (.118)				.140* (.081)				.249** (.125)				-.071 (.065)
RTA Concentration w/o Labor Clauses $t-4$				-.478 (.297)				-.343* (.177)				-.434** (.219)				-.118 (.136)
ln(GDP per capita)	5.08** (2.18)	5.05** (2.28)	4.62** (2.31)	4.20* (2.28)	2.66 (1.93)	2.74 (2.06)	2.47 (2.12)	2.23 (2.09)	1.62 (2.21)	1.66 (2.24)	1.51 (2.22)	1.50 (2.15)	.040 (2.14)	-.100 (1.83)	-.348 (1.80)	-.823 (1.83)
ln(GDP per capita) ²	-.228* (.124)	-.221* (.129)	-.193 (.128)	-.167 (.127)	-.070 (.102)	-.076 (.108)	-.065 (.110)	-.055 (.110)	.041 (.127)	.038 (.128)	.044 (.127)	.042 (.124)	-.005 (.114)	.011 (.098)	.023 (.097)	.041 (.100)
Industry employment (% in total employ.)	-.002 (.012)	-.007 (.012)	-.005 (.013)	.001 (.012)	-.016 (.011)	-.017 (.012)	-.014 (.012)	-.011 (.010)	-.000 (.011)	-.002 (.012)	.001 (.012)	.005 (.011)	.009 (.006)	.005 (.007)	.002 (.008)	.004 (.009)
Manufacturing VA (% of GDP)	-.016 (.013)	-.011 (.013)	-.004 (.011)	-.000 (.011)	-.009 (.009)	-.003 (.008)	.001 (.007)	.002 (.007)	-.019** (.009)	-.013 (.008)	-.008 (.007)	-.008 (.008)	-.010 (.010)	-.006 (.009)	-.002 (.009)	-.001 (.008)
Political rights index	.039 (.054)	.031 (.051)	.031 (.049)	.029 (.047)	-.009 (.024)	-.016 (.022)	-.025 (.021)	-.016 (.023)	-.017 (.033)	-.022 (.032)	-.032 (.034)	-.014 (.025)	.081** (.030)	.090*** (.033)	.057 (.044)	.033 (.046)
Civil liberty index	-.111 (.079)	-.118* (.066)	-.124** (.057)	-.129** (.055)	-.016 (.039)	-.014 (.037)	-.006 (.035)	-.003 (.034)	-.012 (.054)	-.021 (.048)	-.022 (.044)	-.040 (.044)	-.056** (.026)	-.065** (.025)	-.056** (.024)	-.050* (.025)
No. of observations	859	829	795	757	859	829	795	757	769	739	705	667	402	378	354	329
Adjusted R ²	.988	.990	.991	.991	.994	.994	.995	.995	.983	.984	.985	.986	.987	.988	.989	.989

Notes: Fixed-effect regressions for countries. Time (year) dummies are also included. Clustered standard errors are reported in parentheses. *, **, and *** indicate the significance at the 10%, 5%, and 1%, respectively.

Table 5. Impacts of RTAs with vs. without Labor Clauses on Minimum Wages and Employment Protection, for High-income Countries
(Labor clauses defined by the conservative classification; TC indicators based on the fixed 1995 trade shares)

Dependent variable:		Statutory Minimum Wages							
		in Local Currency, Nominal				in Local Currency, Real			
		Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4
High-income RTA partners	RTA Concentration with Labor Clauses $t-1$	.193 (.251)				-.500** (.214)			
	RTA Concentration w/o Labor Clauses $t-1$	-.399 (1.26)				2.00** (.778)			
	RTA Concentration with Labor Clauses $t-2$		.075 (.261)				-.677*** (.228)		
	RTA Concentration w/o Labor Clauses $t-2$		-.772 (1.23)				1.56** (.715)		
	RTA Concentration with Labor Clauses $t-3$			.231 (.262)				-.771*** (.192)	
	RTA Concentration w/o Labor Clauses $t-3$			-1.22 (1.05)				.785 (.966)	
	RTA Concentration with Labor Clauses $t-4$				.055 (.337)				-.805*** (.223)
	RTA Concentration w/o Labor Clauses $t-4$				-1.57* (.736)				.337 (.964)
Middle-income RTA partners	RTA Concentration with Labor Clauses $t-1$	-.101 (2.34)				-.984 (2.36)			
	RTA Concentration w/o Labor Clauses $t-1$	1.01 (1.14)				1.33 (.920)			
	RTA Concentration with Labor Clauses $t-2$		-1.61 (1.53)				-2.51 (1.75)		
	RTA Concentration w/o Labor Clauses $t-2$		2.74 (3.40)				2.88 (3.27)		
	RTA Concentration with Labor Clauses $t-3$			-2.53* (1.41)				-4.12** (1.59)	
	RTA Concentration w/o Labor Clauses $t-3$			1.13 (2.60)				2.84 (2.78)	
	RTA Concentration with Labor Clauses $t-4$				-3.83** (1.40)				-5.13** (1.60)
	RTA Concentration w/o Labor Clauses $t-4$				0.167 (1.95)				1.18 (2.13)
Low-income RTA partners	RTA Concentration with Labor Clauses $t-1$	45.6*** (13.1)				61.7*** (9.48)			
	RTA Concentration w/o Labor Clauses $t-1$	-49.6 (32.0)				6.35 (17.6)			
	RTA Concentration with Labor Clauses $t-2$		66.2*** (14.8)				82.8*** (14.9)		
	RTA Concentration w/o Labor Clauses $t-2$		-33.7** (15.3)				32.0** (14.2)		
	RTA Concentration with Labor Clauses $t-3$			67.4*** (19.2)				84.9*** (15.5)	
	RTA Concentration w/o Labor Clauses $t-3$			50.1 (99.6)				-86.5 (101.8)	
	RTA Concentration with Labor Clauses $t-4$				54.1*** (17.3)				72.2*** (13.5)
	RTA Concentration w/o Labor Clauses $t-4$				-25.0 (88.9)				-79.8 (92.1)
ln(GDP per capita)		11.5*** (2.70)	10.9*** (2.71)	9.35*** (2.57)	9.92*** (2.53)	8.17*** (2.20)	8.55*** (2.17)	7.71*** (2.14)	8.73*** (2.58)
ln(GDP per capita) ²		-.502*** (.136)	-.471*** (.136)	-.394*** (.132)	-.417*** (.126)	-.362*** (.110)	-.377*** (.109)	-.331*** (.107)	-.377*** (.128)
Industry employment (% in total employment)		-.014** (.006)	-.013** (.005)	-.015** (.007)	-.009* (.005)	-.018** (.007)	-.015** (.006)	-.010 (.007)	-.010 (.007)
Manufacturing VA (% of GDP)		-.023*** (.006)	-.019*** (.005)	-.018*** (.005)	-.017*** (.006)	-.020*** (.006)	-.017** (.006)	-.011 (.007)	-.012 (.007)
Political rights index		-.155*** (.052)	-.135*** (.046)	-.134*** (.037)	-.116** (.042)	-.204*** (.046)	-.192*** (.040)	-.169*** (.038)	-.151*** (.038)
Civil liberty index		-.004 (.033)	.004 (.042)	-.007 (.036)	-.013 (.035)	-.028 (.024)	-.015 (.032)	-.012 (.035)	-.017 (.034)
No. of observations		174	169	163	155	174	169	163	155
Adjusted R ²		.999	.999	.999	.999	.999	.999	.999	.999

(Table 5, *continued*)

Dependent variable: Labor Condition Measures		Statutory Minimum Wages				Strictness of Employment Protection			
		in Constant US Dollar							
		Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4
High-income RTA partners	RTA Concentration with Labor Clauses $t-1$	.258 (.429)				-1.00** (.366)			
	RTA Concentration w/o Labor Clauses $t-1$	2.25* (1.97)				1.88 (1.61)			
	RTA Concentration with Labor Clauses $t-2$		.074 (.420)				-1.26** (.456)		
	RTA Concentration w/o Labor Clauses $t-2$		1.53 (2.22)				.737 (1.55)		
	RTA Concentration with Labor Clauses $t-3$			-.955** (.375)				-.772* (.440)	
	RTA Concentration w/o Labor Clauses $t-3$			.889 (2.74)				-.834 (1.49)	
	RTA Concentration with Labor Clauses $t-4$				-1.43 (.902)				-.511 (.358)
	RTA Concentration w/o Labor Clauses $t-4$				-.397 (1.84)				-3.10** (1.38)
Middle-income RTA partners	RTA Concentration with Labor Clauses $t-1$	-11.0 (9.29)				-1.35 (.933)			
	RTA Concentration w/o Labor Clauses $t-1$	1.52 (1.23)				.135 (1.55)			
	RTA Concentration with Labor Clauses $t-2$		-5.13 (4.14)				-1.05 (.976)		
	RTA Concentration w/o Labor Clauses $t-2$		5.42 (4.91)				.088 (3.30)		
	RTA Concentration with Labor Clauses $t-3$			-9.54** (3.67)				-.569 (1.10)	
	RTA Concentration w/o Labor Clauses $t-3$			9.61* (4.42)				-.674 (2.53)	
	RTA Concentration with Labor Clauses $t-4$				-14.7** (4.97)				-.653 (.923)
	RTA Concentration w/o Labor Clauses $t-4$				1.36 (8.75)				-.072 (2.28)
Low-income RTA partners	RTA Concentration with Labor Clauses $t-1$	101.6** (32.6)				63.8*** (19.0)			
	RTA Concentration w/o Labor Clauses $t-1$	12.3 (43.2)				-95.6*** (30.1)			
	RTA Concentration with Labor Clauses $t-2$		91.6** (33.9)				68.7*** (21.6)		
	RTA Concentration w/o Labor Clauses $t-2$		53.6 (38.0)				-68.0*** (20.2)		
	RTA Concentration with Labor Clauses $t-3$			132.0** (48.7)				65.8** (29.2)	
	RTA Concentration w/o Labor Clauses $t-3$			-537.1*** (150.8)				314.3 (249.1)	
	RTA Concentration with Labor Clauses $t-4$				98.3 (53.4)				52.5 (40.7)
	RTA Concentration w/o Labor Clauses $t-4$				-297.9** (96.8)				307.7 (329.6)
ln(GDP per capita)		16.8** (6.80)	19.3** (8.15)	16.0 (9.26)	12.4 (17.1)	-7.68 (4.68)	-4.86 (4.62)	.267 (4.73)	3.31 (5.74)
ln(GDP per capita) ²		-.749* (.344)	-.871* (.414)	-.695 (.469)	-.478 (.860)	.375 (.235)	.249 (.231)	.005 (.234)	-.142 (.280)
Industry employment (% in total employment)		.011 (.010)	.014 (.013)	.041* (.021)	.045** (.016)	.018* (.009)	.016** (.007)	.007 (.012)	.010 (.011)
Manufacturing VA (% of GDP)		-.062** (.024)	-.054* (.026)	-.033 (.021)	-.038 (.025)	-.008 (.012)	-.005 (.011)	-.002 (.011)	.003 (.009)
Political rights index		-.167 (.154)	-.128 (.150)	-.070 (.137)	-.018 (.192)	-.048 (.111)	-.038 (.102)	-.026 (.098)	.027 (.104)
Civil liberty index		-.163 (.111)	-.052 (.056)	-.039 (.087)	-.036 (.112)	-.127*** (.038)	-.113** (.041)	-.096** (.035)	-.085** (.034)
No. of observations		104	99	93	85	289	271	253	234
Adjusted R ²		.994	.992	.988	.941	.990	.991	.993	.994

Notes: Fixed-effect regressions for countries. Time (year) dummies are also included. Clustered standard errors are reported in parentheses. *, **, and *** indicate the significance at the 10%, 5%, and 1%, respectively.

Table 6. Impacts of RTAs with vs. without Labor Clauses on Minimum Wages and Employment Protection, for Middle-income Countries

(Labor clauses defined by the conservative classification; TC indicators based on the fixed 1995 trade shares)

Dependent variable:		Statutory Minimum Wages							
		in Local Currency, Nominal				in Local Currency, Real			
		Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4
High-income RTA partners	RTA Concentration with Labor Clauses $t-1$	-.115 (.186)				.002 (.139)			
	RTA Concentration w/o Labor Clauses $t-1$	-.804*** (.241)				-.448*** (.140)			
	RTA Concentration with Labor Clauses $t-2$		-.122 (.173)				.037 (.129)		
	RTA Concentration w/o Labor Clauses $t-2$		-.647*** (.189)				-.345*** (.116)		
	RTA Concentration with Labor Clauses $t-3$			-.123 (.159)				.066 (.109)	
	RTA Concentration w/o Labor Clauses $t-3$			-.513*** (.166)				-.229** (.114)	
	RTA Concentration with Labor Clauses $t-4$				-.095 (.144)				.142 (.096)
	RTA Concentration w/o Labor Clauses $t-4$				-.177 (.277)				-.067 (.131)
Middle-income RTA partners	RTA Concentration with Labor Clauses $t-1$	-.039 (.415)				.410 (.330)			
	RTA Concentration w/o Labor Clauses $t-1$	-.818 (.972)				.243 (.260)			
	RTA Concentration with Labor Clauses $t-2$		-.199 (.372)				.281 (.268)		
	RTA Concentration w/o Labor Clauses $t-2$		-.623 (.817)				.207 (.211)		
	RTA Concentration with Labor Clauses $t-3$			-.214 (.329)				.239 (.221)	
	RTA Concentration w/o Labor Clauses $t-3$			-.300 (.547)				.261 (.232)	
	RTA Concentration with Labor Clauses $t-4$				-.239 (.297)				.173 (.193)
	RTA Concentration w/o Labor Clauses $t-4$				-.856 (.660)				-.288 (.337)
Low-income RTA partners	RTA Concentration with Labor Clauses $t-1$	-12.3 (7.61)				-4.64 (3.07)			
	RTA Concentration w/o Labor Clauses $t-1$	-2.74 (5.40)				-1.67 (1.77)			
	RTA Concentration with Labor Clauses $t-2$		-8.50 (6.23)				-2.92 (2.25)		
	RTA Concentration w/o Labor Clauses $t-2$		-1.85 (4.88)				-1.49 (1.68)		
	RTA Concentration with Labor Clauses $t-3$			-7.92* (4.53)				-3.50 (2.34)	
	RTA Concentration w/o Labor Clauses $t-3$			-2.34 (4.61)				-2.72 (2.01)	
	RTA Concentration with Labor Clauses $t-4$				-8.16 (5.14)				-4.86 (3.82)
	RTA Concentration w/o Labor Clauses $t-4$				-1.73 (3.39)				-1.83 (1.98)
ln(GDP per capita)		3.76 (4.04)	3.31 (3.72)	2.79 (2.98)	2.46 (2.50)	1.76 (2.49)	1.23 (2.26)	.470 (1.55)	.098 (1.25)
ln(GDP per capita) ²		-.192 (.236)	-.158 (.217)	-.128 (.173)	-.107 (.143)	-.056 (.143)	-.025 (.130)	.015 (.092)	.037 (.075)
Industry employment (% in total employment)		.014 (.015)	.006 (.015)	.010 (.015)	.017 (.015)	-.003 (.010)	-.003 (.011)	.001 (.011)	.003 (.011)
Manufacturing VA (% of GDP)		-.028* (.016)	-.018 (.018)	-.003 (.016)	.004 (.015)	-.005 (.012)	.002 (.011)	.009 (.008)	.011 (.007)
Political rights index		.060 (.061)	.049 (.058)	.050 (.058)	.049 (.053)	.020 (.021)	.012 (.019)	-.000 (.020)	.007 (.021)
Civil liberty index		-.116 (.094)	-.133 (.080)	-.150** (.067)	-.172*** (.061)	-.062* (.031)	-.060* (.031)	-.058** (.027)	-.058** (.026)
No. of observations		537	518	496	473	537	518	496	473
Adjusted R ²		.989	.990	.992	.992	.996	.996	.996	.996

(Table 6, *continued*)

Dependent variable: Labor Condition Measures		Statutory Minimum Wages				Strictness of Employment Protection			
		in Constant US Dollar							
		Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4
High-income RTA partners	RTA Concentration with Labor Clauses $t-1$	.003 (.213)				.151 (.131)			
	RTA Concentration w/o Labor Clauses $t-1$	-.526** (.242)				.051 (.094)			
	RTA Concentration with Labor Clauses $t-2$		.048 (.183)				.085 (.132)		
	RTA Concentration w/o Labor Clauses $t-2$		-.384* (.199)				.273 (.221)		
	RTA Concentration with Labor Clauses $t-3$			.113 (.165)				.030 (.171)	
	RTA Concentration w/o Labor Clauses $t-3$			-.251 (.161)				.153 (.196)	
	RTA Concentration with Labor Clauses $t-4$				.229 (.169)				.040 (.174)
	RTA Concentration w/o Labor Clauses $t-4$				-.155 (.167)				-.088 (.220)
Middle-income RTA partners	RTA Concentration with Labor Clauses $t-1$	.896 (.565)				-.296* (.153)			
	RTA Concentration w/o Labor Clauses $t-1$	-.574 (.483)				-1.16 (1.41)			
	RTA Concentration with Labor Clauses $t-2$		.614 (.513)				-.315 (.210)		
	RTA Concentration w/o Labor Clauses $t-2$		-.528 (.491)				-3.03 (2.54)		
	RTA Concentration with Labor Clauses $t-3$			.477 (.493)				-.193 (.349)	
	RTA Concentration w/o Labor Clauses $t-3$			-.354 (.371)				-1.64 (2.44)	
	RTA Concentration with Labor Clauses $t-4$				.291 (.495)				-.110 (.308)
	RTA Concentration w/o Labor Clauses $t-4$				-1.12 (.873)				-.506 (2.23)
Low-income RTA partners	RTA Concentration with Labor Clauses $t-1$	-8.39* (4.39)				N.A. (--)			
	RTA Concentration w/o Labor Clauses $t-1$	1.24 (2.66)				-7.31 (10.4)			
	RTA Concentration with Labor Clauses $t-2$		-4.64 (4.17)				N.A. (--)		
	RTA Concentration w/o Labor Clauses $t-2$		2.58 (2.60)				30.6 (36.5)		
	RTA Concentration with Labor Clauses $t-3$			-4.00 (4.14)				N.A. (--)	
	RTA Concentration w/o Labor Clauses $t-3$			1.91 (2.95)				1.48 (1.88)	
	RTA Concentration with Labor Clauses $t-4$				-8.87* (5.22)				N.A. (--)
	RTA Concentration w/o Labor Clauses $t-4$				.547 (2.31)				2.61 (2.81)
ln(GDP per capita)		1.58 (3.22)	1.00 (3.01)	.646 (2.55)	.762 (2.18)	5.18 (3.98)	4.15 (3.78)	5.01 (4.63)	4.52 (6.35)
ln(GDP per capita) ²		.007 (.191)	.045 (.180)	.064 (.156)	.062 (.133)	-.295 (.220)	-.230 (.208)	-.281 (.247)	-.263 (.335)
Industry employment (% in total employment)		.006 (.012)	.004 (.013)	.009 (.014)	.009 (.014)	.024 (.026)	.022 (.026)	.020 (.033)	.023 (.038)
Manufacturing VA (% of GDP)		-.016* (.009)	-.009 (.009)	.000 (.009)	.001 (.009)	-.015 (.022)	-.017 (.024)	-.010 (.029)	-.011 (.036)
Political rights index		-.002 (.030)	-.009 (.032)	-.018 (.038)	-.003 (.028)	.069 (.042)	.107 (.061)	.121 (.070)	.127 (.075)
Civil liberty index		-.038 (.061)	-.049 (.056)	-.061 (.052)	-.082 (.052)	.008 (.028)	-.015 (.029)	-.018 (.027)	-.005 (.031)
No. of observations		517	498	476	453	112	106	100	94
Adjusted R ²		.978	.979	.981	.982	.967	.966	.963	.961

Notes: Fixed-effect regressions for countries. Time (year) dummies are also included. Clustered standard errors are reported in parentheses. *, **, and *** indicate the significance at the 10%, 5%, and 1%, respectively.

Table 7. Impacts of RTAs with vs. without Labor Clauses on Minimum Wages and Employment Protection, for Low-income Countries

(Labor clauses defined by the conservative classification; TC indicators based on the fixed 1995 trade shares)

Dependent variable:		Statutory Minimum Wages							
		in Local Currency, Nominal				in Local Currency, Real			
		Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4
High-income RTA partners	RTA Concentration with Labor Clauses $t-1$	.329 (.415)				.520 (.370)			
	RTA Concentration w/o Labor Clauses $t-1$	-2.81 (2.26)				-1.17 (1.48)			
	RTA Concentration with Labor Clauses $t-2$		-66.1*** (13.5)				-65.4*** (10.8)		
	RTA Concentration w/o Labor Clauses $t-2$		-5.55*** (2.01)				-3.36** (1.39)		
	RTA Concentration with Labor Clauses $t-3$			2.71 (12.1)				.717 (10.6)	
	RTA Concentration w/o Labor Clauses $t-3$			-4.53 (2.71)				-3.05* (1.73)	
	RTA Concentration with Labor Clauses $t-4$				.806** (.357)				1.07*** (.371)
	RTA Concentration w/o Labor Clauses $t-4$				-13.7*** (2.80)				-9.25** (3.47)
Middle-income RTA partners	RTA Concentration with Labor Clauses $t-1$	5.01 (4.19)				6.03* (3.47)			
	RTA Concentration w/o Labor Clauses $t-1$	1.38 (2.16)				1.21 (1.28)			
	RTA Concentration with Labor Clauses $t-2$		890.1*** (182.2)				884.7*** (146.6)		
	RTA Concentration w/o Labor Clauses $t-2$		2.51 (1.79)				1.84 (1.19)		
	RTA Concentration with Labor Clauses $t-3$			-18.6 (162.9)				11.6 (142.1)	
	RTA Concentration w/o Labor Clauses $t-3$			1.30 (2.35)				1.20 (1.29)	
	RTA Concentration with Labor Clauses $t-4$				4.65** (2.14)				2.92 (2.00)
	RTA Concentration w/o Labor Clauses $t-4$				4.52*** (1.08)				3.36** (1.35)
Low-income RTA partners	RTA Concentration with Labor Clauses $t-1$	-19.9 (27.7)				-22.4 (21.5)			
	RTA Concentration w/o Labor Clauses $t-1$	-7.60 (8.03)				-5.24 (7.80)			
	RTA Concentration with Labor Clauses $t-2$		-3771.1*** (774.9)				-3753.3*** (623.5)		
	RTA Concentration w/o Labor Clauses $t-2$		-7.91 (5.21)				-7.99 (4.89)		
	RTA Concentration with Labor Clauses $t-3$			86.3 (691.0)				-44.5 (603.4)	
	RTA Concentration w/o Labor Clauses $t-3$			-5.04 (3.44)				-5.49* (3.09)	
	RTA Concentration with Labor Clauses $t-4$				N.A. (--)				N.A. (--)
	RTA Concentration w/o Labor Clauses $t-4$				-5.35* (2.66)				-5.12** (1.89)
ln(GDP per capita)		-3.25 (5.89)	-3.18 (5.90)	-1.85 (5.70)	5.24 (7.70)	-2.94 (5.59)	-2.25 (5.43)	-2.08 (5.08)	1.56 (7.37)
ln(GDP per capita) ²		.362 (.366)	.363 (.366)	.271 (.349)	-.217 (.492)	.360 (.347)	.315 (.336)	.296 (.311)	.030 (.468)
Industry employment (% in total employment)		-.020 (.027)	-.009 (.025)	-.011 (.027)	-.006 (.030)	-.007 (.025)	.004 (.024)	.008 (.025)	.009 (.026)
Manufacturing VA (% of GDP)		-.011 (.035)	-.006 (.030)	-.020 (.026)	-.028 (.026)	-.025 (.029)	-.010 (.028)	-.018 (.025)	-.027 (.025)
Political rights index		.112 (.119)	.124 (.108)	.092 (.109)	.042 (.118)	.066 (.117)	.075 (.101)	.057 (.105)	.043 (.106)
Civil liberty index		-.265 (.202)	-.332* (.194)	-.287 (.197)	-.162 (.171)	-.176 (.208)	-.251 (.204)	-.180 (.193)	-.038 (.136)
No. of observations		148	142	136	129	148	142	136	129
Adjusted R ²		.984	.986	.985	.987	.988	.989	.989	.990

(Table 7, *continued*)

Dependent variable: Labor Condition Measures		Statutory Minimum Wages				Strictness of Employment Protection			
		in Constant US Dollar							
		Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4
High-income RTA partners	RTA Concentration with Labor Clauses $t-1$	.348 (.401)				N.A. (--)			
	RTA Concentration w/o Labor Clauses $t-1$	-1.66 (1.73)				N.A. (--)			
	RTA Concentration with Labor Clauses $t-2$		-78.2*** (12.5)				N.A. (--)		
	RTA Concentration w/o Labor Clauses $t-2$		-4.36** (1.63)				N.A. (--)		
	RTA Concentration with Labor Clauses $t-3$			-2.09 (9.09)				N.A. (--)	
	RTA Concentration w/o Labor Clauses $t-3$			-3.78* (2.15)				N.A. (--)	
	RTA Concentration with Labor Clauses $t-4$				1.24*** (.301)				N.A. (--)
	RTA Concentration w/o Labor Clauses $t-4$				-11.8*** (2.77)				N.A. (--)
Middle-income RTA partners	RTA Concentration with Labor Clauses $t-1$	6.50 (4.10)				N.A. (--)			
	RTA Concentration w/o Labor Clauses $t-1$	1.81 (1.41)				N.A. (--)			
	RTA Concentration with Labor Clauses $t-2$		1053.8*** (169.1)				N.A. (--)		
	RTA Concentration w/o Labor Clauses $t-2$		2.52* (1.35)				N.A. (--)		
	RTA Concentration with Labor Clauses $t-3$			50.1 (121.9)				N.A. (--)	
	RTA Concentration w/o Labor Clauses $t-3$			1.42 (1.76)				N.A. (--)	
	RTA Concentration with Labor Clauses $t-4$				2.80* (1.64)				N.A. (--)
	RTA Concentration w/o Labor Clauses $t-4$				3.97*** (.977)				N.A. (--)
Low-income RTA partners	RTA Concentration with Labor Clauses $t-1$	-38.7 (25.0)				N.A. (--)			
	RTA Concentration w/o Labor Clauses $t-1$	-9.20 (8.04)				N.A. (--)			
	RTA Concentration with Labor Clauses $t-2$		-4480.2*** (719.3)				N.A. (--)		
	RTA Concentration w/o Labor Clauses $t-2$		-10.7* (5.60)				N.A. (--)		
	RTA Concentration with Labor Clauses $t-3$			-213.0 (517.0)				N.A. (--)	
	RTA Concentration w/o Labor Clauses $t-3$			-6.49* (3.65)				N.A. (--)	
	RTA Concentration with Labor Clauses $t-4$				N.A. (--)				N.A. (--)
	RTA Concentration w/o Labor Clauses $t-4$				-5.65*** (1.94)				N.A. (--)
ln(GDP per capita)		-5.33 (5.68)	-4.79 (5.30)	-3.71 (4.87)	2.31 (6.49)	N.A. (--)	N.A. (--)	N.A. (--)	N.A. (--)
ln(GDP per capita) ²		.533 (.353)	.505 (.334)	.431 (.304)	.011 (.418)	N.A. (--)	N.A. (--)	N.A. (--)	N.A. (--)
Industry employment (% in total employment)		-.010 (.026)	.010 (.022)	.017 (.023)	.023 (.023)	N.A. (--)	N.A. (--)	N.A. (--)	N.A. (--)
Manufacturing VA (% of GDP)		-.033 (.028)	-.016 (.026)	-.025 (.023)	-.035 (.023)	N.A. (--)	N.A. (--)	N.A. (--)	N.A. (--)
Political rights index		.050 (.120)	.083 (.094)	.068 (.100)	.048 (.095)	N.A. (--)	N.A. (--)	N.A. (--)	N.A. (--)
Civil liberty index		-.201 (.207)	-.296 (.195)	-.220 (.190)	-.072 (.118)	N.A. (--)	N.A. (--)	N.A. (--)	N.A. (--)
No. of observations		148	142	136	129	0	0	0	0
Adjusted R ²		.973	.979	.979	.981	--	--	--	--

Notes: Fixed-effect regressions for countries. Time (year) dummies are also included. Clustered standard errors are reported in parentheses. *, **, and *** indicate the significance at the 10%, 5%, and 1%, respectively.

Table 8. Impacts of the First RTA with Labor Clauses on Minimum Wages and Employment Protection

(RTAs with labor clauses defined by the conservative classification)

Dependent variable:	Statutory Minimum Wages			Strictness of Employment Protection
	in Local Currency, Nominal	in Local Currency, Real	in Constant US Dollar	
1 st LC-RTA dummy $t-1$ (D_{t-1})	-.107 (.099)	-.051 (.033)	-.034 (.046)	-.010 (.034)
D_{t-1} * Initial EX Share of the RTA partner	.335* (.183)	.218** (.084)	.260** (.111)	-.009 (.069)
1 st LC-RTA dummy $t-2$ (D_{t-2})	-.116 (.107)	-.045 (.046)	-.072 (.072)	-.070 (.076)
D_{t-2} * Initial EX Share of the RTA partner	.332* (.187)	.222** (.094)	.316* (.128)	.007 (.099)
1 st LC-RTA dummy $t-3$ (D_{t-3})	-.145 (.142)	-.092 (.058)	-.144 (.092)	-.034 (.101)
D_{t-3} * Initial EX Share of the RTA partner	.434 (.284)	.324* (.169)	.557** (.231)	-.056 (.104)
1 st LC-RTA dummy $t-4+$ (D_{t-4+})	-.119 (.146)	-.075 (.055)	-.125 (.088)	.010 (.109)
D_{t-4+} * Initial EX Share of the RTA partner	.277 (.200)	.284*** (.101)	.556*** (.152)	-.160* (.091)
ln(GDP per capita)	4.31** (1.82)	-.151 (1.34)	-1.60 (1.91)	.237 (2.22)
ln(GDP per capita) ²	-.238** (.110)	.033 (.079)	.139 (.109)	-.019 (.118)
Industry employment (% in total employment)	.004 (.011)	-.001 (.009)	.008 (.009)	.016* (.008)
Manufacturing VA (% of GDP)	-.004 (.012)	.007 (.007)	.008 (.007)	-.008 (.009)
Political rights index	.081 (.059)	-.020 (.034)	.015 (.033)	.076 (.046)
Civil liberty index	-.227* (.128)	.002 (.040)	-.069 (.059)	-.037 (.033)
No. of observations	491	491	412	397
Adjusted R ²	.991	.998	.988	.986

Notes: Fixed-effect regressions for countries. Time (year) dummies are also included.

Clustered standard errors are reported in parentheses. *, **, and *** indicate the significance at the 10%, 5%, and 1%, respectively.

Table 9. Impacts of the First RTA with Labor Clauses on Minimum Wages and Employment Protection, for High-income Countries

(RTAs with labor clauses defined by the conservative classification)

Dependent variable:	Statutory Minimum Wages			Strictness of Employment Protection
	in Local Currency, Nominal	in Local Currency, Real	in Constant US Dollar	
1 st LC-RTA dummy $t-1$ (D_{t-1})	.007 (.028)	-.040 (.035)	.107 (.131)	-.074** (.027)
D_{t-1} * Initial EX Share of the RTA partner	.312*** (.051)	.284*** (.087)	-.286 (.344)	.014 (.085)
1 st LC-RTA dummy $t-2$ (D_{t-2})	-.013 (.035)	-.061 (.040)	.104 (.097)	-.148* (.076)
D_{t-2} * Initial EX Share of the RTA partner	.405*** (.039)	.364*** (.049)	-.105 (.217)	-.038 (.115)
1 st LC-RTA dummy $t-3$ (D_{t-3})	-.063 (.065)	-.125** (.042)	.136* (.064)	-.087 (.160)
D_{t-3} * Initial EX Share of the RTA partner	.416*** (.088)	.400*** (.089)	-.047 (.193)	-.123 (.139)
1 st LC-RTA dummy $t-4+$ (D_{t-4+})	.084 (.050)	-.023 (.056)	.036 (.189)	-.079 (.187)
D_{t-4+} * Initial EX Share of the RTA partner	.077*** (.021)	.100*** (.037)	.075 (.110)	-.290*** (.082)
ln(GDP per capita)	12.3*** (.999)	9.69*** (1.18)	17.8* (8.06)	-10.3*** (3.55)
ln(GDP per capita) ²	-.552*** (.050)	-.421*** (.058)	-.789 (.424)	.503** (.184)
Industry employment (% in total employment)	-.015** (.005)	-.014** (.006)	.010 (.019)	.018** (.008)
Manufacturing VA (% of GDP)	-.018** (.007)	-.014* (.007)	-.025 (.034)	-.007 (.013)
Political rights index	-.127*** (.041)	-.156*** (.042)	.008 (.173)	-.081 (.106)
Civil liberty index	.005 (.031)	-.014 (.027)	.005 (.022)	-.066* (.033)
No. of observations	155	155	85	291
Adjusted R ²	.999	.999	.996	.990

Notes: Fixed-effect regressions for countries. Time (year) dummies are also included.

Clustered standard errors are reported in parentheses. *, **, and *** indicate the significance at the 10%, 5%, and 1%, respectively.

Table 10. Impacts of the First RTA with Labor Clauses on Minimum Wages and Employment Protection, for Middle-income Countries

(RTAs with labor clauses defined by the conservative classification)

Dependent variable:	Statutory Minimum Wages			Strictness of Employment Protection
	in Local Currency, Nominal	in Local Currency, Real	in Constant US Dollar	
1 st LC-RTA dummy $t-1$ (D_{t-1})	-.164 (.130)	-.014 (.039)	-.047 (.060)	2.16** (.785)
D_{t-1} * Initial EX Share of the RTA partner	.295 (.241)	.137 (.094)	.201 (.159)	-2.63*** (.952)
1 st LC-RTA dummy $t-2$ (D_{t-2})	-.088 (.147)	.030 (.060)	-.012 (.090)	2.45** (.844)
D_{t-2} * Initial EX Share of the RTA partner	.123 (.249)	.082 (.118)	.126 (.183)	-2.97 (.991)
1 st LC-RTA dummy $t-3$ (D_{t-3})	-.061 (.178)	.010 (.060)	-.048 (.093)	2.07* (.992)
D_{t-3} * Initial EX Share of the RTA partner	.091 (.289)	.067 (.106)	.203 (.190)	-2.52* (1.21)
1 st LC-RTA dummy $t-4+$ (D_{t-4+})	-.093 (.190)	.006 (.059)	-.091 (.108)	2.51 (1.62)
D_{t-4+} * Initial EX Share of the RTA partner	.023 (.272)	.153 (.127)	.404** (.168)	-3.05 (1.94)
ln(GDP per capita)	-1.74 (3.61)	-2.66 (2.29)	-5.61 (3.93)	4.80 (3.21)
ln(GDP per capita) ²	.110 (.218)	.186 (.133)	.389* (.226)	-.276 (.172)
Industry employment (% in total employment)	.007 (.011)	.000 (.009)	.002 (.010)	.025 (.029)
Manufacturing VA (% of GDP)	-.015 (.011)	.005 (.005)	.007 (.008)	-.012 (.023)
Political rights index	.155* (.081)	-.002 (.044)	.023 (.045)	.062 (.044)
Civil liberty index	-.333** (.158)	-.041 (.041)	-.105 (.068)	.021 (.031)
No. of observations	308	308	299	106
Adjusted R ²	.992	.998	.985	.941

Notes: Fixed-effect regressions for countries. Time (year) dummies are also included.

Clustered standard errors are reported in parentheses. *, **, and *** indicate the significance at the 10%, 5%, and 1%, respectively.

Table A1. Impacts of RTA with and without Labor Clauses: Actual Wages vs. Statutory Minimum Wages

(RTAs with labor clauses defined by the conservative classification; and RTA trade concentrations are based on the RTA partners' manufacturing trade share as of 1995.)

Dependent variable:	Mean Monthly Earnings, in Constant US Dollars (log-scaled)				Statutory Minimum Wages (log-scaled)											
					in Local Currency, Nominal				in Local Currency, Real				in Constant US Dollar			
	Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4
RTA Concentration with Labor Clauses $t-1$	.183 (.727)				-.030 (.119)				-.007 (.117)				.049 (.141)			
RTA Concentration w/o Labor Clauses $t-1$	1.20 (1.45)				-.935*** (.331)				-.436* (.250)				-.645** (.313)			
RTA Concentration with Labor Clauses $t-2$		.119 (.817)				-.027 (.119)				.051 (.118)				.096 (.133)		
RTA Concentration w/o Labor Clauses $t-2$		1.10 (1.53)				-.993*** (.336)				-.488** (.236)				-.670** (.303)		
RTA Concentration with Labor Clauses $t-3$			.074 (.650)				-.010 (.132)				.086 (.114)				.171 (.126)	
RTA Concentration w/o Labor Clauses $t-3$			.272 (1.39)				-.730*** (.244)				-.430** (.201)				-.520** (.232)	
RTA Concentration with Labor Clauses $t-4$				-.741 (.647)				.019 (.176)				.182 (.129)				.288* (.151)
RTA Concentration w/o Labor Clauses $t-4$				1.13 (1.92)				-.130 (.539)				-.422*** (.148)				-.540*** (.149)
ln(GDP per capita)	-21.6** (10.5)	-23.8* (12.5)	-25.0* (13.2)	-28.0** (13.9)	6.84*** (2.22)	7.16*** (2.56)	7.17*** (2.69)	6.86** (2.75)	4.12 (2.51)	4.57 (2.82)	4.39 (3.05)	4.23 (3.04)	2.95 (2.36)	3.13 (2.58)	3.13 (2.69)	3.26 (2.63)
ln(GDP per capita) ²	1.35** (.578)	1.49** (.696)	1.54** (.717)	1.74** (.753)	-.325** (.136)	-.345** (.154)	-.338** (.159)	-.320* (.161)	-.150 (.145)	-.181 (.163)	-.174 (.174)	-.170 (.174)	-.031 (.141)	-.044 (.155)	-.045 (.160)	-.056 (.159)
Industry employment (% in total employ.)	-.056 (.096)	-.055 (.108)	-.060 (.115)	-.069 (.116)	-.011 (.013)	-.011 (.013)	-.013 (.012)	-.009 (.013)	-.023* (.014)	-.022 (.014)	-.019 (.014)	-.018 (.013)	-.001 (.014)	-.000 (.013)	.000 (.013)	.002 (.012)
Manufacturing VA (% of GDP)	.088 (.059)	.079 (.060)	.073 (.057)	.078 (.056)	-.026* (.015)	-.013 (.016)	.002 (.015)	.003 (.017)	-.013 (.012)	-.006 (.012)	.001 (.011)	.001 (.011)	-.031*** (.010)	-.022** (.010)	-.013 (.010)	-.014 (.011)
Political rights index	-.022 (.285)	.021 (.309)	.120 (.316)	.057 (.302)	.075 (.078)	.034 (.071)	-.014 (.062)	-.023 (.059)	-.002 (.058)	-.026 (.055)	-.041 (.052)	-.019 (.050)	-.002 (.057)	-.020 (.054)	-.037 (.048)	-.017 (.046)
Civil liberty index	-.522 (.324)	-.554 (.352)	-.466 (.336)	-.419 (.330)	-.156 (.094)	-.141* (.084)	-.156** (.071)	-.157** (.062)	-.038 (.055)	-.034 (.053)	-.027 (.054)	-.036 (.053)	-.055 (.057)	-.047 (.053)	-.053 (.050)	-.074 (.050)
No. of observations	512	489	463	432	512	489	463	432	512	489	463	432	512	489	463	432
Adjusted R ²	.795	.787	.779	.774	.991	.992	.993	.994	.994	.994	.995	.995	.983	.984	.986	.987

Notes: Fixed-effect regressions for countries. Time (year) dummies are also included. Only the “common” country-year observations for which the data on both actual wages/earnings and statutory minimum wages are available are used for all the estimation. Clustered standard errors are reported in parentheses. *, **, and *** indicate the significance at the 10%, 5%, and 1%, respectively.

Table A2. Impacts of RTA with Labor Clauses vs. RTA without Labor Clauses on Minimum Wages and Employment Protection
(RTAs with labor clauses defined by the *liberal* classification; and RTA trade concentrations are based on the RTA partners' manufacturing trade share as of 1995.)

Dependent variable:	Statutory Minimum Wages												Strictness of Employment Protection			
	in Local Currency, Nominal				in Local Currency, Real				in Constant US Dollar							
	Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4
RTA Concentration with Labor Clauses $t-1$	-.040 (.122)				.015 (.096)				.053 (.129)				-.088 (.065)			
RTA Concentration w/o Labor Clauses $t-1$	-.810*** (.266)				-.365** (.183)				-.461** (.215)				.068 (.148)			
RTA Concentration with Labor Clauses $t-2$		-.038 (.121)				.055 (.090)				.100 (.123)				-.135 (.080)		
RTA Concentration w/o Labor Clauses $t-2$		-.845*** (.285)				-.472** (.189)				-.535** (.221)				.141 (.125)		
RTA Concentration with Labor Clauses $t-3$			-.034 (.133)				.094 (.096)				.182 (.134)				-.118 (.089)	
RTA Concentration w/o Labor Clauses $t-3$			-.805** (.327)				-.475** (.217)				-.548** (.267)				.005 (.148)	
RTA Concentration with Labor Clauses $t-4$				-.029 (.118)				.139* (.081)				.248* (.125)				-.070 (.065)
RTA Concentration w/o Labor Clauses $t-4$				-.478 (.298)				-.343* (.178)				-.434* (.220)				-.122 (.137)
ln(GDP per capita)	5.08** (2.18)	5.05** (2.27)	4.62** (2.31)	4.20* (2.28)	2.67 (1.94)	2.74 (2.06)	2.48 (2.12)	2.23 (2.09)	1.62 (2.21)	1.66 (2.24)	1.52 (2.22)	1.50 (2.15)	.039 (2.14)	-.099 (1.83)	-.352 (1.80)	-.821 (1.83)
ln(GDP per capita) ²	-.228* (.124)	-.222* (.128)	-.193 (.128)	-.167 (.127)	-.070 (.102)	-.076 (.108)	-.065 (.110)	-.055 (.110)	.040 (.127)	.038 (.128)	.043 (.127)	.042 (.124)	-.005 (.114)	.011 (.098)	.024 (.097)	.041 (.100)
Industry employment (% in total employ.)	-.002 (.012)	-.007 (.012)	-.005 (.013)	.001 (.012)	-.016 (.011)	-.017 (.012)	-.014 (.012)	-.011 (.010)	-.000 (.011)	-.002 (.012)	.001 (.012)	.005 (.011)	.009 (.006)	.005 (.007)	.002 (.008)	.004 (.009)
Manufacturing VA (% of GDP)	-.016 (.013)	-.011 (.013)	-.004 (.011)	-.000 (.011)	-.009 (.009)	-.003 (.008)	.001 (.007)	.002 (.007)	-.019** (.009)	-.013 (.008)	-.008 (.007)	-.008 (.008)	-.010 (.010)	-.006 (.009)	-.002 (.009)	-.001 (.008)
Political rights index	.039 (.054)	.031 (.051)	.031 (.049)	.029 (.047)	-.009 (.024)	-.016 (.022)	-.025 (.021)	-.016 (.023)	-.017 (.033)	-.022 (.032)	-.032 (.034)	-.014 (.025)	.081** (.030)	.090*** (.033)	.057 (.044)	.033 (.046)
Civil liberty index	-.111 (.079)	-.118* (.066)	-.124** (.057)	-.129** (.055)	-.016 (.039)	-.014 (.037)	-.006 (.035)	-.003 (.034)	-.012 (.054)	-.021 (.048)	-.022 (.044)	-.040 (.044)	-.056** (.026)	-.065** (.025)	-.056** (.024)	-.050* (.025)
No. of observations	859	829	795	757	859	829	795	757	769	739	705	667	402	378	354	329
Adjusted R ²	.988	.990	.991	.991	.994	.994	.995	.995	.983	.984	.985	.985	.987	.988	.989	.989

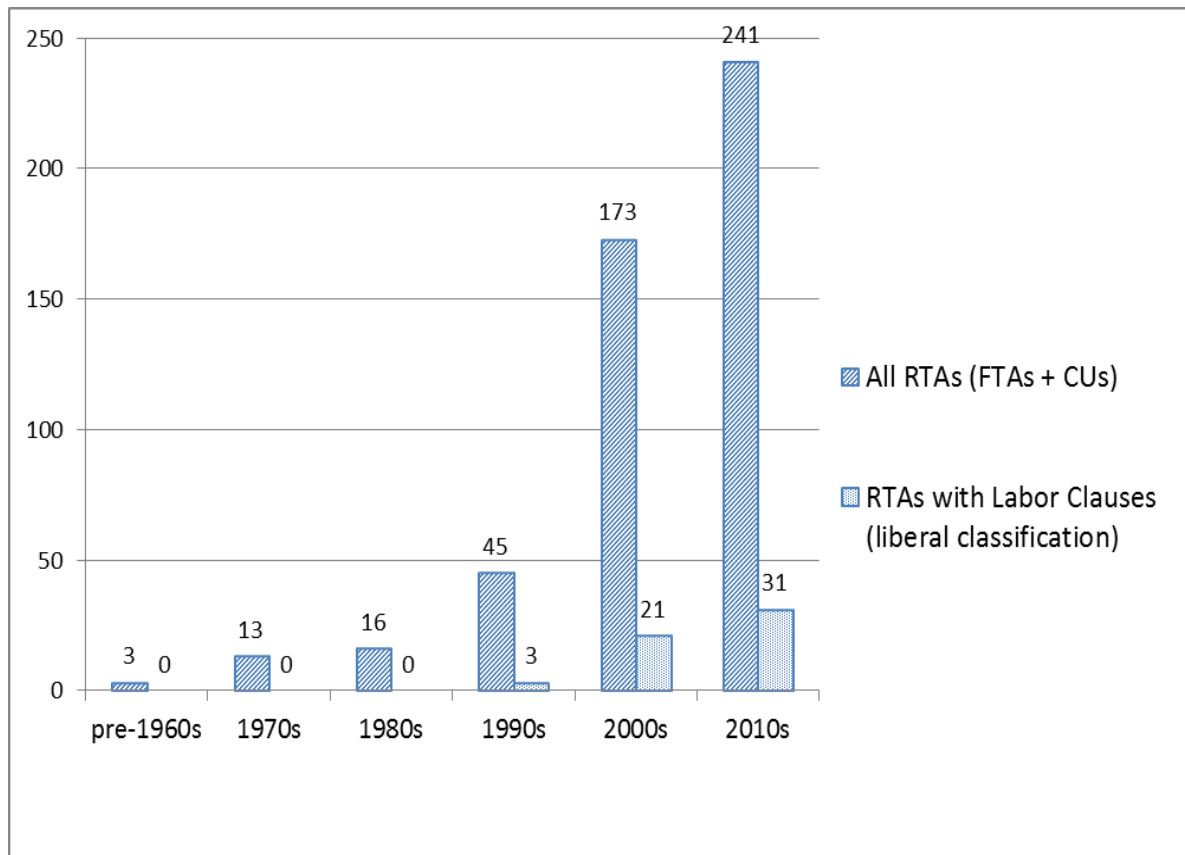
Notes: Fixed-effect regressions for countries. Time (year) dummies are also included. Clustered standard errors are reported in parentheses. *, **, and *** indicate the significance at the 10%, 5%, and 1%, respectively.

Table A3. Impacts of RTA with Labor Clauses vs. RTA without Labor Clauses on Minimum Wages and Employment Protection (RTAs with labor clauses defined by the conservative classification; and RTA trade concentrations are based on the RTA partners' manufacturing trade share in the *current year*.)

Dependent variable:	Statutory Minimum Wages												Strictness of Employment Protection			
	in Local Currency, Nominal				in Local Currency, Real				in Constant US Dollar							
	Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4	Lag 1	Lag 2	Lag 3	Lag 4
RTA Concentration with Labor Clauses $t-1$	-.027 (.132)				.030 (.100)				.077 (.129)				-.088 (.064)			
RTA Concentration w/o Labor Clauses $t-1$	-.677** (.267)				-.320 (.233)				-.310 (.253)				.061 (.136)			
RTA Concentration with Labor Clauses $t-2$		-.030 (.130)				.066 (.093)				.117 (.124)				-.138* (.082)		
RTA Concentration w/o Labor Clauses $t-2$		-.677** (.261)				-.403* (.234)				-.370 (.238)				.137 (.118)		
RTA Concentration with Labor Clauses $t-3$			-.017 (.142)				.106 (.099)				.196 (.134)				-.124 (.093)	
RTA Concentration w/o Labor Clauses $t-3$			-.579** (.259)				-.337 (.217)				-.322 (.211)				.044 (.119)	
RTA Concentration with Labor Clauses $t-4$				-.012 (.126)				.148* (.083)				.251** (.122)				-.077 (.069)
RTA Concentration w/o Labor Clauses $t-4$				-.315 (.262)				-.270 (.173)				-.297* (.172)				-.040 (.095)
ln(GDP per capita)	4.94** (2.23)	4.71* (2.44)	4.07 (2.60)	3.87 (2.44)	2.63 (1.91)	2.57 (2.09)	2.16 (2.20)	2.01 (2.13)	1.56 (2.23)	1.43 (2.35)	1.08 (2.42)	1.16 (2.28)	.015 (2.10)	-.126 (1.80)	-.360 (1.79)	-.859 (1.83)
ln(GDP per capita) ²	-.223* (.128)	-.205 (.140)	-.164 (.148)	-.150 (.138)	-.069 (.101)	-.069 (.112)	-.048 (.117)	-.044 (.114)	.042 (.129)	.049 (.136)	.067 (.140)	.060 (.133)	-.003 (.113)	.012 (.097)	.025 (.096)	.044 (.099)
Industry employment (% in total employ.)	-.002 (.012)	-.005 (.012)	-.003 (.012)	.002 (.012)	-.016 (.011)	-.017 (.011)	-.013 (.011)	-.010 (.010)	-.001 (.011)	-.001 (.012)	.003 (.012)	.006 (.010)	.009 (.006)	.005 (.006)	.001 (.008)	.003 (.009)
Manufacturing VA (% of GDP)	-.015 (.012)	-.010 (.013)	-.004 (.011)	-.000 (.012)	-.008 (.009)	-.002 (.008)	.001 (.007)	.002 (.007)	-.018** (.009)	-.013 (.008)	-.008 (.008)	-.009 (.008)	-.010 (.010)	-.007 (.009)	-.002 (.009)	-.001 (.008)
Political rights index	.031 (.058)	.023 (.055)	.024 (.051)	.027 (.048)	-.013 (.024)	-.021 (.022)	-.030 (.022)	-.019 (.023)	-.021 (.035)	-.027 (.035)	-.036 (.037)	-.017 (.026)	.080*** (.028)	.089*** (.031)	.060 (.044)	.037 (.047)
Civil liberty index	-.109 (.078)	-.113* (.066)	-.116** (.058)	-.125** (.056)	-.014 (.038)	-.011 (.036)	-.001 (.035)	.000 (.034)	-.010 (.054)	-.016 (.048)	-.015 (.045)	-.035 (.045)	-.057** (.026)	-.066** (.025)	-.057** (.024)	-.050** (.024)
No. of observations	861	830	795	757	861	830	795	757	771	740	705	667	402	378	354	329
Adjusted R ²	.988	.990	.990	.991	.994	.994	.994	.995	.982	.984	.985	.985	.987	.988	.989	.989

Notes: Fixed-effect regressions for countries. Time (year) dummies are also included. Clustered standard errors are reported in parentheses. *, **, and *** indicate the significance at the 10%, 5%, and 1%, respectively.

Figure 1. Shifts in the Numbers of All RTAs and RTAs with Labor Clauses



Notes:

1. The numbers count RTAs that became into force (and were notified to the World Trade Organization) in each period.
2. The generalized system of preferences (GSPs) are excluded from the numbers.
3. RTAs with labor clauses are defined by the 'liberal' classification that satisfy (only) the condition that the agreement has an extensive set(s) of articles that stipulates the items/issues for which the signatory countries shall cooperate and the procedures for consultations and/or dispute settlement on issues concerning labor conditions, as a part (chapter(s) or title(s)) of the main body of the RTA or a separate side agreement or MOU.