MAY 2025

SHIFTING STANDARDS, RISING RISKS: STATE LABOR LAWS AND THE RESURGENCE OF CHILD LABOR IN THE U.S.

COMMUNITY AND LABOR CENTER

Shifting Standards, Rising Risks: State Labor Laws and the Resurgence of Child Labor in the U.S.

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Child labor violations in the United States surged by 69% between 2018 and 2023 (U.S. Department of Labor, 2023a). In fiscal years 2021–2022 alone, the number of minors employed in violation of federal child labor standards increased by 37%, and those employed in hazardous occupations rose by 26% (U.S. Department of Labor, 2024a). At the same time, industry groups across various states have been actively lobbying to weaken child labor protections through state legislation (Sherer & Mast, 2023). Between 2021 and 2023, ten states-Arkansas, Iowa, Minnesota, Missouri, Nebraska, New Hampshire, New Jersey, Ohio, South Dakota, and Wisconsin—introduced or passed legislation that weakened child labor protections, often in direct conflict with the federal standards set by the 1938 Fair Labor Standards Act (FLSA). The FLSA establishes minimum wage, work hours, and conditions of employment, including prohibitions against hiring minors for hazardous occupations. Despite federal law superseding state regulations, the concurrent rise in child labor and the relaxation of state-level protections raises important questions about the impact of local regulations on the rising trend in federal child labor violations. Our analysis examines the period from 2008 to 2021 to assess how weakened state regulations may have contributed to recent trends in child labor violations.

Understanding the effectiveness of child labor policies in preventing violations is crucial. Previous research has explored the prevalence and characteristics of children involved in illegal work (*e.g.*, Kruse & Mahony, 2000) and highlighted the adverse impacts of child labor on health

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Acknowledgements: Catalina Amuedo-Dorantes is grateful to the University of California Merced Labor Center for their research support.

and development (*e.g.*, Beegle *et al.*, 2009; Monahan *et al.*, 2011), noting particularly the heightened vulnerability of minors to workplace injuries (National Institute for Occupational Safety and Health, 2024). However, there is a significant gap in research focused on the impact of legislation on child labor violations. Much of the existing literature has examined the effects of cash transfer programs (*e.g.*, Edmonds & Schady, 2012) and international labor standards (Doepke & Zilibotti, 2010). Still, the role of local child labor legislation has been largely overlooked. This gap in the literature persists despite external lobbying efforts that emphasize child and parental agency alongside labor shortages and inflationary pressures to justify legislative changes.

I. Data

We primarily use data from the U.S. Department of Labor's Wage and Hour Division (WHD). Our main source on child labor violations of federal standards is the Wage and Hour Compliance Action dataset (U.S. Department of Labor, 2023b), which provides detailed information on all WHD compliance actions at the establishment level. This dataset contains the number of labor violations—including those related to child labor—and the number of affected workers, particularly minors employed in violation of federal standards. We complement these data with another WHD dataset that details state-level child labor standards, capturing changes across 12 dimensions, such as age restrictions, protections, and age certification requirements for minors in both farm and non-farm employment (U.S. Department of Labor, 2024b).

The study period, spanning from 2008 to 2021, captures substantial fluctuations in child labor violations and state-level regulatory responses, with violations tripling between 2014 and the end of the sample period (see Figure 1). These increases were notably concentrated in particular regions such as the Southwest, Northeast, Florida, and the Pacific Northwest (see Figure 2). This geographic variation underscores the localized nature of child labor issues and provides a robust framework for analysis.

To systematically examine the role of state regulations, we define a dichotomous variable, Lenient Regulation_{st}, which equals 1 when state regulations in state s and year t become more lenient than in the previous year. Similarly, we define a Strict Regulation_{st} dummy variable that equals 1 when the state enforces stricter child labor standards than in year t - 1. These two indices are central to our analysis, allowing us to measure and compare the impacts of a lenient versus strict regulatory environment for child labor. Figure 3 illustrates the states that relaxed, maintained, or strengthened their child labor standards over the period under consideration. States like Iowa, Maine, North Dakota, Wisconsin, and Wyoming reduced the number of state-level standards regarding child employment. In contrast, states such as Massachusetts, Michigan, Oklahoma, Vermont, and Virginia increased their state-level standards.

A comparison of Figures 2 and 3 sheds some light on the correlation between shifts in regulatory leniency and changes in child labor violation rates. Notably, we observe a higher concentration of child labor violations along the Northeast Coast and in several Mountain states that have relaxed their child labor standards, suggesting a potential link between these local policy shifts and increased violations.

II. Methodology

To gauge the role of changes in state-level child labor regulations on the number of minors employed in violation of the FLSA, we use a balanced panel of all U.S. counties between 2008 and 2021 to estimate the following event study model:

$$\log(Minors_{ct}) = \beta_0 + \sum_{k \neq -1} \beta_k Regulation_{st}^k + \theta_c + \theta_t + \theta_c t + \varepsilon_{ct}.$$
 (1)

Counties with nonrecorded minors employed in violation of the FLSA are set to zero. Our outcome, $Minors_{ct}$, represents the number of children employed in violation of federal standards in county *c* during year *t*.¹ Our main regressor, *Regulations_{st}*, is a dichotomous indicator of the year in which the state *s*, where the county is located, first relaxed its child labor standards. Following the recommendation of Caetano *et al.* (2022), we do not include time-varying controls that may be endogenous to the treatment. Instead, we incorporate fixed effects to account for time-invariant county-level traits (θ_c) and macroeconomic shocks (θ_t). Additionally, county-specific temporal trends ($\theta_c t$) are included to capture the role that unaccounted-for changes in the counties' demographic, economic, or regulatory environment may have had on child labor violations. Equation (1) is estimated using the difference-in-differences estimator developed by de Chaisemartin and D'Haultfœuille (2024) to account for the staggered nature of state-level relaxation of child labor standards.²

III. Assessing the Relationship between State Standards and Child Labor

Figure 4 presents the event study results from estimating equation (1) to examine the impact of adopting more lenient child labor standards on the number of children employed in violation of these standards. In Panel A, the control group encompasses all counties in states that did not lower the child labor standards, including jurisdictions that toughened their regulations. The results reveal that the relaxation of state standards had an immediate effect that intensified over time. In particular, five years after the standards became more lenient, there was a 20%

¹ For simplicity, we first estimate the models using the log (*minors_{ct}* + 1). Nevertheless, the results prove robust to using minors per 100,000 people as the dependent variable, as recommended in Chen and Roth (2024).

 $^{^{2}}$ We use the normalized option to facilitate the interpretation of the estimates by centering the pre-treatment effect before the treatment starts. This allows for clearer visualization and understanding of the changes in the outcome variable relative to the pre-treatment baseline.

increase in the number of minors employed in violation, indicating a sustained and growing impact.

A potential source of concern is that the estimated effects in Panel A may result from comparing states that adopted stricter standards to those that relaxed them. In that case, a decrease in child labor in states that adopted more protective standards could be misinterpreted as an increase in child labor in states that relaxed their standards. To address this concern, we re-estimate the model, excluding counties in states that implemented stricter child employment standards. The results, shown in Panel B of Figure 4, closely mirror those in Panel A. This similarity suggests that the effect is primarily driven by "clean comparisons" between counties that relaxed their standards and those that did not experience policy changes during the study period. This finding reinforces the robustness of our results and indicates that the impact is not confounded by contrasting stricter and more lenient states.

In unreported results, we also test the robustness of our results to the measurement of our outcome variable as a rate per 100,000 county population instead of a log-transformed variable. The findings from this exercise show that the number of minors employed in violation per capita rose immediately following the relaxation of state employment standards.

Finally, based on the legislative changes depicted in Figure 3, one might wonder if the impact of relaxing employment standards is symmetric to the effect of making those standards more stringent. To address this inquiry, we replicate the analysis using a dummy variable indicating whether the state tightened its child labor standards in a given year. Panels A and B in Figure 5 show symmetric responses to the ones observed in the corresponding panels in Figure 4, with the number of children employed in violation now decreasing by 20% five years after the state implemented stricter employment standards.

IV. Summary and Conclusions

Between 2018 and 2023, child labor violations in the United States surged by 69%, with a 37% increase in minors employed in violation of federal standards during fiscal years 2021–2022 alone (U.S. Department of Labor, 2023a; 2024a). This rise coincides with lobbying efforts to weaken child labor protections, often conflicting with federal regulations, raising questions about the impact of local regulatory environments on the prevalence of child labor violations.

Despite research on child labor's health and developmental impacts (*e.g.*, Beegle *et al.*, 2009; Monahan *et al.*, 2011), the effect of state-level legislation on these violations remains underexplored. We address this gap using data from the U.S. Department of Labor from 2008 to 2021. Our findings show that relaxing child labor standards led to a sustained 20% increase in violations within five years. Conversely, adopting stricter standards reduced the number of minors employed in violation by 20% over the same period—a symmetry in impacts that is not the simple byproduct of comparing stricter and more lenient states.

In sum, relaxing state child labor standards contributes to a significant and sustained rise in violations, whereas adopting stricter standards has the opposite impact. The findings highlight the critical role of policy in preventing illegal child labor and in safeguarding child welfare.

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Note: The figure shows the number of minors found employed in violation of the Fair Labor Standards Act (FLSA) according to the date when the U.S. Department of Labor Wage and Hour Division determined that the violations first occurred.



Figure 2 Minors Found Employed in Violation of FLSA by County (2008-2021)

Note: The figure shows the number of minors found employed in violation of the Fair Labor Standards Act (FLSA) according to the date when the Wage and Hour Division—within the U.S. Department of Labor—determined that the violations first occurred.

Changes in State-Level Child Labor Standards above the FLSA (2008–2021)

Figure 3

Note: The figure displays the states, along with their respective counties, that modified their child labor standards during the study period as well as the direction of the change.

Figure 4 Event Studies: Impact of State-Level Relaxation of Child Labor Regulations on the Number of Children Employed in Violation of Federal Standards



Notes: The estimates for the effect of the local relaxation of child labor regulation on the log number of children employed in violation of federal standards were obtained with the event study estimators developed in de Chaisemartin & D'Haultfœuille (2024). The event study is estimated relative to the last period before the state, in which the county is located, relaxed its child labor regulations. The treatment variable equals one in the period when the state standards were relaxed; all other periods equal zero. In Panel A, we use all counties that did not experience a relaxation in their child labor standards as a control group, including those that increased their child labor restrictions at any point during the study period. In Panel B, we restrict the control group to those counties that did not experience any changes in their child labor standards throughout the study period.

Figure 5 Event Studies: Impact of Adopting Stricter State-Level Child Labor Regulations on the Number of Children Employed in Violation of Federal Standards



Panel A: Full sample

Panel B: Clean comparisons

Notes: The estimates for the effect of the increasing state-level child labor regulations on the log number of children employed in violation of federal standards were obtained with the event study estimators developed in de Chaisemartin & D'Haultfœuille (2024). The event study is estimated relative to the last period before the state, in which the county is located, increased its child labor regulations. The treatment variable equals one in the period when the state standards were increased; all other periods equal zero. In Panel A, we use all counties that did not experience an intensification in their child labor standards as a control group, including those that relaxed their child labor restrictions at any point during the study period. In Panel B, we restrict the control group to those counties that did not experience any changes in their child labor standards throughout the study period.

Mission Statement

The UC Merced Community and Labor Center conducts research and education on issues of community, labor and the environment, in the San Joaquin Valley and beyond.