

The Prevailing Wage in New Jersey

An Assessment of the Costs and Benefits

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Executive Summary

The New Jersey Prevailing Wage Act of 1964, often referred to as a "Mini Davis-Bacon Act" ascertains wage and benefit standards for public construction projects in New Jersey that are paid for using state and local taxpayer dollars. The policy is designed such that workers employed on public construction projects receive family-supporting compensation reflective of the local market rate. The main purpose of a prevailing wage law is to maintain local labor quality, training, and wage standards and to support the local economy in the competitive public bidding process. The law creates a level playing field for all contractors by ensuring that workers are paid an appropriate wage based on job classification and skill, incentivizing contractors to compete over factors other than labor costs, such as worker productivity, materials costs, technological proficiencies, management practices, and profit margins (Bruno and Manzo 2017; Duncan and Ormiston 2017).

This working paper assesses 10 key aspects of New Jersey's prevailing wage law: overall construction costs, wages and economic impacts, tax revenues, poverty and reliance on public assistance, healthcare and retirement, social mobility, fair and local contracting, human capital and skills, workplace safety, and quality of work and timeliness of completion. In sum, we offer the following key findings:

A survey of the peer-reviewed economic research on the impact of prevailing wage laws indicates that laws like New Jersey's protect wage standards, increase productivity, promote efficiency and afford greater safety with no, or at worst negligible, effect on total costs.

New Jersey's prevailing wage law also:

• has a positive impact on the wages of blue-collar construction workers, helping to make it the highest paying blue-collar occupation in the state and contributing an additional \$138-\$276 million to the state economy each year.

• generates between \$3million and \$6 million in additional tax revenue for the state of New Jersey each year.

• contributes to reduced poverty among construction workers and lower levels of reliance on state subsidies.

• helps to increase the percent of workers who are covered by employment-based health insurance as well the number of workers that have employment-based retirement benefits.

• ensures that workers with less than a college education have a career path which can provide living wages and a path into the middle class.

• ensures that law-abiding, local contractors have a fair shot in the bidding process for publicly-funded construction projects and that workers on these projects will be treated fairly.

• promotes the use of apprenticeship programs in the skilled trades that increase the skills of individual workers as well as the overall level of human capital in the workforce.

• mandates OSHA training for all workers on publicly financed construction projects which contributes to New Jersey's lower than average workplace injury and fatality rates.

• likely increases the quality and timeliness of completion of publicly-funded **construction** projects.

As these findings demonstrate, the repeal of the New Jersey Prevailing Wage Act would be ill advised. Repealing the law would have no discernible impact on construction costs but would reduce middle-class construction worker earnings, increase worker reliance on government assistance programs, negatively impact apprenticeship training, and hurt the market share of local contractors.

Moreover, inadequate enforcement of the law's provisions is equally ill-advised. Contractors who currently circumvent prevailing wage requirements undermine the economic benefits the law provides to the state economy (Adler 2007).

Introduction

Prevailing wage laws in the U.S. date back to the federal Davis-Bacon Act of 1931. Per Davis-Bacon, all contractors and subcontractors working on federally-funded projects valued at \$2,000 or more "must pay their laborers and mechanics employed under the contract no less than the locally prevailing wages and fringe benefits for corresponding work on similar projects in the area" (U.S. Department of Labor 2018).

The primary, long-standing goal of the Davis-Bacon Act has been to protect communities from the deterioration of local labor standards that may occur when large government projects attract contractors from other areas with significantly lower wages. Prevailing wage standards protect local contractors and their employees from under-bidding by these contractors and enable the former to compete successfully for local projects at the locally prevailing rates (U.S. Department of Labor 2015). Since its enactment, Davis-Bacon has provided critical wage protections for construction workers and has guaranteed a level playing field for construction contractors bidding on federal projects.

The New Jersey Prevailing Wage Act (N.J.S.A. 34:11-56.25 et seq.) establishes a prevailing wage level for workers engaged in public works to safeguard the workers efficiency and general wellbeing, as well as to protect them and their employers from the effects of unfair competition resulting from wage levels that are detrimental to the efficiency and well-being of all concerned. The Act requires the payment of livable wages to laborers, craftsmen and apprentices employed on public works projects. Covered workers must receive the appropriate craft prevailing wage rate as determined by the Commissioner of Labor and Workforce Development. The rates vary by county and by the type of work performed.

Public works projects subject to the Act are those funded in whole or in part with the funds of a public body. Contracts awarded directly by municipal government must be valued at \$15,444 or more to be covered by the Act. For all other public entities, including municipal utility authorities and boards of education, the threshold is \$2,000.

Assessment of New Jersey's Prevailing Wage Law

The following analysis of the costs and benefits of the prevailing wage will draw from two major sources of evidence:

- 1) A review of previous peer-reviewed, academic research on the economic impacts of prevailing wage laws on a variety of societal outcomes, and
- 2) A review of various sources of publicly available data for the state of New Jersey, which considers the relationship of the state's existing prevailing wage law to a variety of economic and social indicators, including state tax revenues, poverty rates, access to employment-based health insurance, and income inequality.

Over 30 economic studies of the costs and benefits of prevailing wage laws are surveyed, including peer-reviewed academic research; employment and wage data from the U.S. Census, *Current Population Survey*; and data on poverty, health insurance coverage, retirement security, and income inequality from a variety of public sources.

Following the work of Ormiston, Belman and Hinkel (2017), this assessment of New Jersey's prevailing wage law is parsed into the following categories: construction costs, wages and economy, tax revenues, poverty, healthcare and retirement, social mobility, fair and local contracting, skills, workplace safety, quality of product, and timeliness of completion.

The final section of the report provides an in-depth discussion about the relationship between the current prevailing wage law and the New Jersey economy.

Construction Costs

Question: What is the average impact of prevailing wage laws on overall construction costs?

The most common argument in favor of repealing prevailing wage laws is based on the assumption that legislatively-mandated wage floors artificially inflate labor costs and thus the total costs of construction projects. A number of non-peer-reviewed studies claim to prove this seemingly intuitive argument, but they rely upon an inherently fallacious method for estimating factor and project costs.¹ The very simple procedure common to all these studies is as follows. First, subjective, and often arbitrary, estimates are made of the percent difference between existing wage rates and those imagined to prevail in the absence of wage protections, and the percent of total construction costs accounted for by labor. Second, the two estimates from the first step are multiplied to determine the "cost" of a prevailing wage law.

For example, a recent study by Rosaen (2013) estimated the Michigan prevailing wage rate to be 25% higher than an imaginary non-prevailing wage rate; also that labor costs accounted for 30% of total construction costs in the state. The author then simply multiplied these two percentages (25% x 30%) by one another and concluded that Michigan's prevailing wage law increased total construction costs by 7.5%.

Rosaen's estimate of increased cost was both unusually high and arbitrary. A review of earlier studies using this "wage differential" method by Bilginsoy and Philips (2000) revealed that the reported cost impact of prevailing wage laws ranged between a 1.5% and 3% increase in total costs. And, as Duncan and Ormiston (2018) point out, the wage differential method suffers from several methodological shortcomings, which result in inflated prevailing wage cost estimates.

For example, many studies using the wage differential method compare prevailing wages from commercial construction projects to occupational wage data for construction workers from all sectors, including the residential construction. However, the skill set required for residential construction is significantly different from that for commercial projects. So, too, therefore, are the wages of the two branches of the occupation. It is no more possible to move costlessly from residential to commercial work, than it is to move from driving the family car to a 16-wheel commercial tractor trailer.

¹ Gardner and Ruffner 2008; Glassman et al. 2008; Kersey 2007; Rosaen 2013; Vedder 1999

Incorporating the lower wages of typically less-skilled residential construction workers into comparisons with the wages of commercial construction workers thus results in inflated and unsubstantiated estimates of the savings afforded by the repeal of prevailing wage laws.

Aside from these data selection issues, the wage differential method also suffers a critical flaw in its disregard for the relationship between wage rates, labor productivity, and capital utilization. Per hour labor costs alone do not determine the total cost of construction projects. They don't necessarily even account for total *labor* costs on construction projects. This is because contractors can typically minimize total labor costs in two ways: 1) by taking the "low road" and reducing the hourly rate of workers as much as possible, or 2) by taking the "high road" and reducing turnover and/or the total number of labor hours (Gordon 1996). Some employers do take the low road and minimize costs by offering substandard wages and employing relatively unskilled laborers—this is the Wal-Mart approach to competitiveness. It is also the only approach considered in the wage differential method.

Fortunately, many contractors take the high road and reduce costs by hiring and retaining highly productive workers at higher wages and providing them with the most advanced equipment and technology to perform their jobs efficiently—this is the Costco approach. This high road approach to minimizing cost is referred to as paying "efficiency wages," a well-established strategy that is discussed in most introductory economics courses (Weiss 2014). It is the presence of efficiency wages that allows high wage contractors in the construction industry to place bids on public construction projects that are competitive with—if not better than—those of low-wage contractors (Atalah 2013a, 2013b). While both approaches can minimize costs, the second creates better quality jobs for workers and typically higher quality output for consumers of the end product.

Moving beyond the studies which have utilized the flawed wage differential method, we find much more analytically rigorous econometric studies of the costs of prevailing wages, including many studies that have been published in peer-reviewed academic journals. Using multiple regression analyses, these studies of construction costs for public housing, schools, and highway projects estimate project-level costs by controlling for project size, complexity, location, stage of the business cycle, and a variety of other covariates, which effect total construction costs. After accounting for these co-determinants, these studies overwhelmingly find no impact of prevailing wage laws on total construction costs. Of the fifteen studies reviewed for this study, eleven (73%) find no consistent evidence that prevailing wage laws are associated with increased construction costs.² The most common explanation of this result is that the cost effect of prevailing wage rates is offset by the substitution of skilled for unskilled labor and the substitution of capital for all grades of labor. This explanation is supported by previous research on the elasticity of substitution between skilled and unskilled labor in construction (Blankenau and Cassou 2011; Balistreri, McDaniel and Wong 2003). In sum, these studies indicate that as construction wages increase, more productive workers and capital equipment replace lower skilled workers, making it possible to pay workers more while simultaneously reducing overall construction costs.

Conclusion: Prevailing wage laws like New Jersey's not only protect wage standards but also significantly increase the productivity of the construction workforce.

Wages and the Economy

Question: How is New Jersey's prevailing wage law related to blue-collar workers' salaries and the state's economy overall?

As summarized above, prior academic research on average finds no discernable impact of prevailing wage laws on overall construction costs, primarily attributable to the efficiency wage effect that results from high road contracting. However, prevailing wage laws do help to increase the hourly wages of construction workers. In fact, the authoritative study on the relationship between prevailing wage laws and construction labor markets, conducted by Kessler and Katz (2001), estimates that the repeal of state-level prevailing wage laws would result in a 2% to 4% decline in hourly wages for blue-collar construction workers, with only a negligible, or no effect at all, on total costs.

For the average construction worker in New Jersey, a 2% to 4% reduction in their income translates into an average loss of \$1,000 to \$2,000 a year—a significant amount, considering the stagnation of blue-collar wages in recent decades. In fact, despite some ups and downs, today's real average wage has about the same purchasing power it did in 1972 and since the 1980s almost all wage gains beyond the rate of inflation have gone to the top tier of salary earners (DeSilver 2018).

² Atalah 2013a, 2013b; Azari-Rad, Philips, and Prus, 2002, 2003; Bilginsoy and Philips 2000; Duncan 2015a, 2015b; Duncan, Philips, and Prus 2014; Duncan and Prus 2005; Dunn, Quigley, and Rosenthal 2005 Kaboub and Kelsay 2014; Kim, Chang, and Philips 2012; Palm and Niemeier 2018; Vincent and Monkkonen 2010; Vitaliano 2002

As presented in Table 1, New Jersey workers employed in blue-collar occupations have experienced wage stagnation since at least 1998 and many have not yet fully recovered from the trough of the Great Recession in 2008. New Jersey construction workers in particular are currently earning nearly 17% less on average in inflation-adjusted dollars than they were twenty years ago.

	•		•	
	1998	2008	2018	1998-2018
Construction and Extraction				
Median Wage	\$27.83	\$22.82	\$23.20	-16.6%
Employment	103,002	167,807	137,620	33.6%
Installation, Maintenance and Repair				
Median Wage	\$24.74	\$21.61	\$23.00	-7.0%
Employment	116,240	99,529	108,407	-6.7%
Production				
Median Wage	\$15.46	\$14.41	\$16.05	3.8%
Employment	281,560	157,276	148,531	-47.2%
Transportation				
Median Wage	\$17.78	\$14.41	\$14.00	-21.3%
Employment	138,843	192,604	228,781	64.8%

Table 1. Median Hourly Wage of Blue Collar Workers in New Jersey, by Occupation, 1998-2018 (in 2018 dollars)

Note: Wage estimates are adjusted for inflation using the Consumer Price Index and reflect the 2018 value of the dollar; 2018 data include the 12 months from 2017 and the first 6 monthes of 2018

Data Source: U.S. Census Bureau, Current Population Survey (CPS various years)

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Despite this level of wage stagnation, construction workers still earn the highest wage of all the blue-collar occupations in the state. Not only do these wages sustain working families, but when workers spend these earnings in their communities, they contribute significantly to economic growth throughout the state. Unlike the wealthiest Americans, who typically hoard their money as savings or invest it in stocks and bonds, working and middle-class families spend the majority of their income each year on commodities. Shopping for clothes and electronics, eating at restaurants, visiting the shore, purchasing a new home or renovating an existing one; these are the ways in which worker's wages help to support the broader economy by having what economists call a "multiplier effect."

As presented in Table 2, construction workers in New Jersey earned approximately \$6.9 billion dollars in 2018. Repeal of the prevailing wage would reduce that total income and in turn the multiplier effect it has for the rest of the state economy. Using Kessler and Katz's (2001) estimated decline in wages of 2%-4%, we estimate that the repeal of New Jersey's prevailing wage law would amount to a reduction of aggregate earnings of between \$138 and \$276 million dollars annually—money that would no longer be spent by workers around the state.

Table 2. Impact of Repealing New Jersey's Prevailing Wage Law onConstruction Workers and the Local Economy, 2018

Construction Occupations		
Total Employment	137,620	
Average Weekly Earnings	\$1,066.76	
Average Weeks Worked (U.S. average)	47	
Estimated Total Earnings (in billions)	\$6.899	
Estimated Changes if Prevailing Wage is Repealed		
Percent Change in Hourly Wage	-2%	-4%
Percent Change in Employment	0.28%	0.56%
Change in Annual Earnings, current workers (in millions)	-\$138.0	-\$276.0
Change in Annual Earnings, newly hired workers (in millions)	\$19.3	\$38.6
Net Change in Annual Earnings across Current and New Workers (in millions)	-\$118.7	-\$237.4
Note: Wage estimates are adjusted for inflation using the Consumer Price Index and 2018 value of the dollar; 2018 data include the 12 months from 2017 and the first 6 mo		
Data Sources: U.S. Census Bureau, Current Population Survey ; Flood et. al (2007); Ma	iti and Indra (20)16)
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We also determine that these earnings losses would only be minimally offset by new hiring of lower wage workers. Following Ormiston, Belman and Hinkel (2017) and Maiti and Indra (2016), who estimate the wage elasticity of labor demand in construction to be -0.14, we project the increase in employment in the wake of such a repeal would be between 0.28% and 0.56% and that this new hiring would contribute approximately \$19 to \$39 million in new earnings. Despite the addition of these new workers, the economy would still suffer the loss of \$119-\$237 million dollars in annual wages that would no longer be spent in the state economy.

Conclusion: New Jersey's prevailing wage law has a positive association with the wages of bluecollar construction workers, helping to make construction the highest paying blue-collar occupation in the state and contributing an additional \$138-\$276 million to the state economy each year.

Tax Revenues

Question: How does New Jersey's prevailing wage law affect levels of state tax revenue?

The earnings gains secured by New Jersey's prevailing wage law not only increase workers livelihoods and their contributions to the local economy, but also their contributions to state and local tax revenues. In an era of perpetual budget shortfalls resulting from previous tax cuts and economic slumps, the New Jersey government can ill afford to cut off a stable stream of tax revenue to support important social programs and infrastructure projects. Table 3 estimates the amount of state tax revenues generated by the additional earnings of blue-collar construction workers as a result of prevailing wages. These estimates are derived from the data in Table 2 and tax estimates from the New Jersey Department of the Treasury.

Table 3. Estimated Effect of Repealing New Jersey's Prevailing Wage Law on State Tax Revenues from Construction Workers, 2018

Assumptions and Estimates (from Table 2)		
Percent Change in Hourly Wage	-2%	-4%
Net Change in Annual Earnings across Current and New Workers (in millions)	-\$118.7	-\$237.4
Sales Tax		
Average Ratio of State Sales Tax to Aggregate Personal Income, 2008-2016	1.03%	1.03%
Estimated Change in State Sales Tax (in millions)	1.22	2.45
Income Tax		
Average Ratio of After-Credits State Tax Liability to Family Income, Construction Workers, 2008-2016	1.50%	1.50%
Estimated Change in State Income Tax (in millions)	1.78	3.56
Total Tax		
Estimated Change in State Sales and Income Tax (in millions)	3.00	6.01
lote: Wage estimates are adjusted for inflation using the Consumer Price Index and 018 value of the dollar; 2018 data include the 12 months from 2017 and the first 6 mo		
Data Sources: State of New Jersey, Department of the Treasury, Division of Taxation Economic Analysis; <i>Current Population Survey</i>	(2011-2015); Bı	ureau of

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For sales tax, the ratio of aggregate state sales tax revenue to aggregate income (1.03%) predicts a reduction in sales tax revenue of between \$1.22 and \$2.45 million should the prevailing wage law be repealed. For income tax, the ratio of state income tax revenue to family income (1.50%) predicts a reduction in income tax revenue of between \$1.78 and \$3.56 million.

Combined, a loss of total tax revenue of between \$3 and \$6 million could be expected should the state's prevailing wage law be repealed.

Conclusion: New Jersey's prevailing wage law is responsible for upward of \$3 million in additional tax revenue for the state of New Jersey each year; a repeal could cost the state as much as \$6 million in annual tax revenue from construction workers.

Healthcare and Retirement

Question: What is the relationship between New Jersey's prevailing wage law and access to employment-based health insurance and retirement benefits in the state?

In addition to setting hourly wages, New Jersey's prevailing wage law also requires contractors working on state-funded projects to compensate workers with the prevailing rate of fringe benefits in the area. As Table 5 indicates, blue-collar construction workers in states with strong prevailing wage laws are considerably more likely to have employment-based health insurance than similar workers in states with weak or no prevailing wage laws. In New Jersey, nearly 43% of construction workers have employment-based health insurance compared to just 30% in states with weaker prevailing wage laws. In a time of growing health costs, the leading cause of bankruptcy in the U.S. (Mangan 2013), and uncertainty over federal healthcare requirements, this mandate for contractors to insure their workers helps to keep New Jersey healthy and strong.

Jersey and in States with Strong and Weak Prevailing Wage Laws, 2000-2016			
		Prevailing Wage Law	
	New	Strong/ Average	Weak/ No Law
	Jersey		
Share with Employment-Based Health Insurance	42.86%	41.88%	30.41%
Share with Employment-Sponsored Pension Plan		35.69%	24.86%

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The prevailing fringe benefit package also requires contractors working on publicly-funded projects to contribute to employer-sponsored pension plans. As indicated in Table 5, nearly 36% of workers in states with strong or average prevailing wage laws have employment-sponsored pension plans whereas just 25% of workers in states with weak prevailing wage laws have the same benefits. The higher wage premium and the requirement of employers to submit

certified payrolls also means that workers' Social Security contributions are larger and that workers are less likely to be misclassified and denied the Social Security contributions they deserve from their employers. America is on the edge of a retirement crisis as only 54% of workers participate in any form of retirement savings plan and just 23% have the security of a pension plan (Bureau of Labor Statistics 2017). For construction workers in particular, retirement benefits are crucial as workers face physical limitations to continuing their work at advanced ages and are also more likely to suffer ill health conditions as a result of their career in construction.

Conclusion: New Jersey's prevailing wage law is associated with a higher percent of workers being covered by employment-based health insurance and employment-based retirement benefits.

Poverty and Reliance on Government Assistance

Question: What is the relationship between New Jersey's prevailing wage law and poverty in the state?

Unlike many other occupations, the construction trades routinely experience prolonged stints of unemployment between projects and are typically at the mercy of the market in real time. The economic hardships caused by chronic unemployment are exacerbated by substandard wages in some sectors of the industry where the low-road model of contracting is dominant. As indicated in Table 4, approximately 5.85% of construction workers reside below the poverty line in New Jersey. This is lower than the current statewide average of 10% and in fact helps to reduce the overall average. However, a repeal of the state's prevailing wage law which would result in earnings losses of 2%-4% for construction workers would push many who are just above the threshold to sink below the poverty line and increase the overall poverty rate within the state.

Table 4 also presents the percent of workers receiving the earned income tax credit between 2000 and 2016, 13.52%. This is on par with other states that have strong or average prevailing wage laws and considerably lower than the average of 17.52% of workers who are reliant on government subsidies in states with weak or no prevailing wage laws.³ The causes of poverty are myriad, and the prevailing wage is just one piece of the puzzle. But as these figures

³ We follow Ormiston, Belman, Hinkel (2017) in their use of Thieblot's (1995; 2016) classification of strang and weak prevailing wage laws.

demonstrate, the repeal of the state's prevailing wage law would surely exacerbate New Jersey's poverty problem.

Table 4. Poverty and Government Reliance in New Jersey and in States withStrong and Weak Prevailing Wage Laws, 2000-2016

		Prevailing Wage Law	
	New	Strong/	Weak/
	Jersey	Average	No Law
Share Below Poverty Line	5.85%	8.14%	10.68%
Share Receiving Earned Income Tax Credit (EITC)	13.52%	13.97%	17.52%

Data Source: U.S. Census Bureau, Current Population Survey (CPS 2000-2016); Ormiston, Belman and Hinkel (2017); Belman, Ormiston, and Petty (2017)

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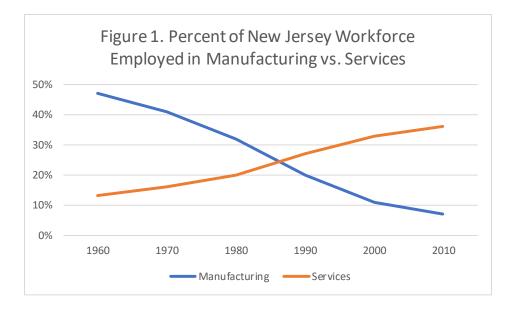
Conclusion: New Jersey's prevailing wage law is associated with reduced levels of poverty among construction workers and lower levels of reliance on state subsidies.

Social Mobility

Question: What is the relationship of New Jersey's prevailing wage law to social mobility in the state?

Skyrocketing income inequality is one of the greatest challenges of our time. While the causes are many, the shift from an industrial to a service-based economy has had tremendous consequences for the jobs and wages of blue-collar workers without a college degree. As presented in Figure 1, the rising percent of New Jersey workers employed in service occupations surpassed the declining percent of workers employed in manufacturing during the 1980s. This shift has contributed to rising inequality as workers without college degrees encounter fewer living wage job opportunities and instead are confronted with a service-sector labor market, which often lacks the wages, benefits, and employment security of the manufacturing jobs that have been lost in the era of globalization.

Bluestone and Harrison (1982) first used the term "deindustrialization" to characterize this systematic dismantling of the manufacturing base and the shift to a service-based economy. Deindustrialization can occur suddenly due to plant closings or over a long period of time as manufacturing jobs shift from one location to another (Wallace and Rothschild 1988). Although the brunt of manufacturing job loss occurred in the 1970s and 1980s, deindustrialization has continued at a steady pace in recent decades (Vachon and Wallace 2013). However, unlike the



manufacturing industry, domestic construction cannot be outsourced and thus remains one of the few remaining blue collar occupations that can generate a middle class living for noncollege-educated workers in New Jersey and the U.S. generally.

Table 6. Average Earnings in Fast-Growing Occupations for New Jersey Workers

		In New Jersey		
Occupational Group	U.S. Occupational Growth Rate, 2014-2024	Share of Workers with Less Than an Associates Degree, 2008-2018	Average Annual Earnings, 2018	
Health Care Support	23.0%	69.8%	\$26,686.13	
Personal Care and Services	13.2%	72.1%	\$25,587.74	
Construction	10.1%	83.7%	\$50,137.72	
Food Preparation and Serving	6.5%	80.1%	\$21,480.88	
Installation, Maintenance, Repair	6.4%	75.7%	\$48,345.14	
Building Grounds Cleaning/Maintenance	6.2%	84.2%	\$30,500.65	

Data Source: U.S. Census Bureau, *Current Population Survey* (CPS 2008-2018); Bureau of Labor Statistics, *Fastest Growing Occupations*, 2014-2024

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Table 6 presents the average earnings in the six fastest growing occupations for workers with less than an associate degree in New Jersey. Four of the occupations—health care support, personal care and services, food preparation, and building/grounds cleaning and maintenance—pay less than \$30,000 per year. This is not enough to support a family. The average salary in these positions is so low that it would qualify a family of three for food stamps in New Jersey. Only two of these fast-growing occupations—installation and maintenance (\$48, 345) and construction (\$50, 137)—can be classified as middle-class occupations that offer wages in the middle quintile of the income distribution (\$43,000-\$72,000) (U.S. Census Bureau 2015). Food preparation rests squarely in the lowest quintile of the income distribution. An individual food prep worker employed full time in New Jersey earns on average wages so low that they qualify for the federal food stamp program (benefits.gov).

With an average annual income of \$50, 137, construction is clearly the most lucrative of the fast-growing occupational categories and just one of two which provides a middle-class standard of living. The New Jersey prevailing wage law contributes to this distinction by ensuring that contractors provide workers with living wages, health insurance, and retirement benefits. Employment in these occupations is predicted to grow by 10% between 2014 and 2024, creating twenty thousand new middle-class jobs for New Jersey's blue-collar workforce.⁴

Conclusion: New Jersey's prevailing wage law ensures that workers with less than a college education have a career path which can provide living wages and a path into the middle class.

Fair and Local Contracting

Question: What is the relationship between prevailing wage laws, fair contracting practices, and the use of in-state contractors on publicly-funded construction projects?

As discussed earlier, contractors can take either the high road or the low road to reduce the costs of their bids to compete for publicly-funded construction projects. Even one unprincipled contractor who takes the low road and engages in such unethical practices as wage theft, worker misclassification (to avoid paying into Social Security or worker compensation funds), exploitation of undocumented workers, and lax enforcement of workplace safety regulations, undermines the conditions of all (see for example: Milkman, Gonzalez, and Ikeler 2012). Fortunately, there are many contractors who abide by the law, operate in a transparent manner, and genuinely do their best to ensure their workers and customers are treated fairly. Unfortunately, public bid selection processes can favor the most unscrupulous contractors, whose ability to cut costs through the less-than upright methods described above often gives them the upper hand.

The New Jersey prevailing wage law helps to counter this advantage by taking the cost of wages out of competition in the bidding process. From the very beginning, workers are sure to be

⁴ The New Jersey construction industry currently employs 202,400 workers (*Current Population Survey* 2018)

properly classified, paid a fair wage with benefits, and can be secure in knowing that their workplace will be OSHA compliant. Competing contractors must prove they are the best on a set of criteria that goes beyond their ability to squeeze workers and cut corners. This fosters innovation and efficiency and rewards ethical contractors who have been playing by the rules. Further, it upholds the local and state government's moral and legal obligation to uphold labor and employment law.

In addition to creating a level playing field for ethical contractors, the prevailing wage law also offers local contractors a fair shot at winning bids against out-of-state contractors, who often bring in out-of-state workers at lower wages to do work on public projects (Duncan and Ormiston 2018). The Davis-Bacon Act of 1931 was originally advanced as a policy designed to protect local contractors and workers from being undercut by low wage, outside competitors (Gujarati 1967). Some evidence supporting this claim comes from a study by Onsarigo, et al. (2017) who reviewed 110 Ohio construction projects open to bid between 2013 and 2016. Their findings revealed that out-of-state contractors won 21% of projects not covered by prevailing wage law, but just 3% of those that were covered.

Conclusion: New Jersey's prevailing wage law ensures that law-abiding, local contractors have a fair shot in the bidding process for publicly-funded construction projects and that workers on these projects will be treated fairly.

Quality of Work and Timeliness of Completion

Question: What is the relationship between New Jersey's prevailing wage law and the quality of work and timeliness of completion of construction projects?

A lack of publicly available data on the quality and timeliness of completion for construction projects has limited the ability of academic researchers to evaluate these outcomes empirically. However, Ormiston, Belman and Hinkel (2017), Philips (2014), and Kelsay (2016) infer that prevailing wage laws are likely to lead to better construction quality and greater on-time completion as result of their advantaging of high-road contractors employing highly skilled workers and the latest technologies.

Conclusion: New Jersey's prevailing wage law is likely to increase the quality of craftsmanship and the timeliness of completion for public construction projects.

Human Capital and Skills

Question: How does New Jersey's prevailing wage law affect the skills and human capital of the state's workforce?

In addition to the wages and benefits protected by prevailing wage laws, it is also important to consider how these laws affect the acquisition of construction-related skills and add to the aggregate level of the human capital of the state workforce. Prevailing wage laws create incentives for contractors to enroll unskilled new workers in registered apprenticeship programs, many of which only require a high school diploma for admission. This is the case under the New Jersey law, which also allows contractors to compensate apprentices at a rate below the required prevailing wage. This cost incentive motivates contractors to provide opportunities for inexperienced workers to acquire the on-the-job training as well as formal apprenticeship classes required to develop into the next generation of skilled tradespersons.

Previous research by Philips et al. (1995), Philips (1998) and Bilginsoy (2005) indicates that repealing or weakening a state's prevailing wage law reduces apprenticeship opportunities which in turn reduces the overall skill level of the state's blue-collar workforce. In a time of high and rising inequality and limited middle-class job opportunities for New Jersey workers with less than a college degree, a decrease in apprenticeships would only exacerbate the problem.

Conclusion: New Jersey's prevailing wage law promotes the use of apprenticeship programs in the skilled trades, which increase the skills of individual workers as well as the level of human capital in the workforce overall.

Workplace Safety

Question: What is the relationship between New Jersey's prevailing wage law and workplace safety in the state?

Previous research on workplace safety finds on average that states with strong prevailing wage laws have lower workplace injury and fatality rates. For example, Azari-Rad (2005) utilized multiple regression analysis to analyze nonfatal injury rates between 1976 and 1999 and found the rates to be 7%-10% lower in states with prevailing wage laws. Additional support comes from Dickson Quesada et al. (2013), who found that the average fatality rate in construction was 33% lower in states with prevailing wage laws compared to states that never had such a law. Philips (2014) also found that between 2009 and 2011, construction workers in states without prevailing wage laws reported 12% more disabilities, such as hearing and vision loss, than their peers in states with prevailing wage laws.

As presented in Table 7, New Jersey and states with strong prevailing wage laws have experienced on average about 3.5 non-fatal injuries per 100 workers between 2013 and 2015. The rate is over 7% higher in states with weak or no prevailing wage laws. For fatal injuries, strong prevailing wage states experience on average 31% fewer deaths on the job per year. It is important to note that the estimates for non-fatal injuries are likely conservative as non-unionized worksites, more common in states without prevailing wage laws, are more likely to have weaker reporting standards. For this reason, the fatal injury rate is typically considered the more reliable measure.

		Prevailing Wage Law	
	New Jersey	Strong/ Average	Weak/ No Law
Workplace Injury Rate (per 100 workers)	3.4	3.6	3.9
On-the-job Fatality Rate (per 100,000 workers)	7.8	7.3	10.7

Table 7. Annual Injury and Fatality Rate of Construction Workers in New Jerseyand in States with Strong and Weak Prevailing Wage Laws, 2013-2015

Twenty percent (20%) of job-related deaths in the U.S. occur in the construction industry. Given the inherent dangers associated with construction employment, it is of critical importance that policymakers do all that is within their power to protect workers on the job. Most current prevailing wage laws do not have explicit safety requirements. The increased likelihood of unionized contractors in prevailing wage states, however, increases the incidence of workplace safety monitoring, as well as apprenticeship programs and mandatory Occupational Health and Safety Act (OSHA) trainings, which prepare workers to identify risks and work in as safe a manner as possible. Section 12:66 of New Jersey's prevailing wage law mandates that publicly funded contractors may only employ workers who have successfully completed an OSHAcertified safety training.

Conclusion: New Jersey's prevailing wage law mandates OSHA training for all workers on publicly financed construction projects and, like other states with strong prevailing wage laws, New Jersey has lower than average workplace injury and fatality rates.

Discussion and Conclusion

In this working paper we have assessed 10 key aspects New Jersey's prevailing wage law: overall construction costs, wages and economic impacts, tax revenues, poverty and reliance on public assistance, healthcare and retirement, social mobility, fair and local contracting, human capital and skills, workplace safety, and quality of work and timeliness of completion. In sum, we find that the existing prevailing wage law has little or no impact on overall construction costs but is beneficial for blue-collar construction workers as well as for the state economy as a whole.

In particular, after reviewing the peer-reviewed economic research on prevailing wage laws, we find that state laws like New Jersey's do not increase the overall cost of construction projects in the state. We find that such laws do, however, have a positive effect on the wages of blue-collar construction workers, helping to make construction the highest paying blue-collar occupation in the state and contributing an additional \$138-\$276 million to the state economy each year. New Jersey's prevailing wage law also generates between \$3 million and \$6 million in additional personal tax revenue for the state each year, contributes to reduced poverty and lower levels of reliance on state subsidies, and helps to increase the percent of workers who are covered by employment-based health insurance and retirement plans.

In addition to these economic benefits, prevailing wage laws help to ensure that workers with less than a college education have a career path to the middle class. By promoting the use of apprenticeship programs in the skilled trades, the state prevailing wage law also increases the level of human capital in the workforce and likely reduces workplace injury and fatality rates.

Finally, the prevailing wage law is also a good deal for taxpayers. By ensuring that law-abiding, local contractors have a fair shot in the bidding process for publicly-funded construction projects, it increases the quality and timeliness of completion of publicly-funded projects.

To reap the economic and social benefits of the New Jersey Prevailing Wage Act in full, the law must be proactively enforced by relevant state agencies. As this study has shown, repealing the New Jersey Prevailing Wage Act would do more harm than good. It would have no discernible impact on construction costs but would reduce middle-class construction worker earnings, increase worker reliance on government assistance programs, negatively impact apprenticeship training, and hurt the market share of local contractors.

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