



The Benefits of State Prevailing Wage Laws

Better Jobs and More Productive Competition in the Construction Industry

By Mark Price and Stephen Herzenberg • October 3, 2011

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Overview

Construction industry prevailing wage laws have long operated nationally and in states as a check against the tendency of the construction industry to degenerate into destructive wage and price competition. Such competition can drive skilled and experienced workers from the industry, reduce productivity and quality, and lead to poverty-level jobs, all without saving construction customers any money.

Construction workers on projects covered by Pennsylvania's prevailing wage law must be paid minimum "prevailing" wage and benefit levels which vary by occupation and geographical area within the state. This year, about 20 different proposals to weaken prevailing wage laws have been introduced into the Pennsylvania Legislature. This briefing paper reviews the economic research on prevailing wage laws so that legislators and members of the public can determine their position on these laws based on evidence rather than ideology.

Consistent with the original rationale for establishing prevailing laws, a rigorous body of economic research shows that efforts to repeal these laws lead to:

- less workforce training;
- a younger, less educated and less experienced workforce;
- higher injury rates;
- lower wages; and
- lower health and pension coverage.

Research also reveals that prevailing wage laws do not raise costs, suggesting that the positive effect of higher wages on productivity compensates for higher labor costs:

- Comparing school construction costs before and after Michigan's suspension of its prevailing wage law revealed no difference in costs.
- National analysis of data on school construction costs reveals that prevailing wage laws do not have a statistically significant impact on cost. By far, the biggest impact on school construction costs is whether that construction takes place at times of low unemployment, when construction demand and prices are high, or at times of higher unemployment. Schools built at times of higher unemployment, when construction bids are much lower, can cost more than 20% less per square foot than schools built during times of high demand. Consistent with this estimate, in and immediately after the recent "Great Recession," Pennsylvania was able to finance 28% more projects with American Recovery and Reinvestment Act dollars than initially estimated.¹

Claims by opponents that prevailing wage laws raise costs by 30%² ignore research based on real-world experience and "natural experiments" in states that have repealed prevailing wage laws. These claims

are based not on actual experience but on hypothetical calculations that assume, implausibly, when wages and benefits go up, worker skill levels, productivity and other factors remain unchanged. In the construction industry, as in the professions and other skilled occupations, “you get what you pay for”—lower wages and benefits mean a less qualified workforce. Since labor compensation in Pennsylvania accounts for only 24% of total costs (less on many capital-intensive public projects), the claim that prevailing wage laws raise costs by 30% is completely implausible.³ To generate savings of 30 percent would require employees to work for free in the absence of a prevailing wage law, while also achieving the same level of productivity.

Beyond any direct impacts on public construction, repealing the state’s prevailing wage law could also increase public-sector costs for health care and social services. It could:

- lower the share of construction workers with employer-based health insurance, while increasing the share who rely on Medicaid and uncompensated care,
- increase the numbers of construction workers who in their old age will not have adequate retirement income, and,
- by lowering wages, increase the chance that construction workers will need public assistance to provide food, clothing, shelter and education for their families.

Pennsylvania’s prevailing wage statute has made it more likely that construction contractors compete based on skill, productivity and experience. This law is more important than ever today because of the temptation and competitive pressure some contractors face to exploit a vulnerable immigrant workforce.

If Pennsylvania policymakers want to save money on public construction, the research evidence shows that the best route would be to shift construction to periods of higher unemployment—such as right now. Based on the research and the pressing need for more jobs today, the Keystone Research Center has recommended launching the “Buy Low” Rebuild PA Initiative by increasing the state’s bond-financed investments in schools, transportation, and infrastructure. By ramping up construction projects now, the state would create additional jobs as well as get much better value for money. Longer-term, more counter-cyclical public construction would have the added advantage of making employment less volatile in the industry, enabling the industry to retain experienced workers because their annual incomes fluctuates less.

The rest of this policy brief considers in more detail the impact of state prevailing wage laws on different construction industry outcomes, such as project cost, training, health and safety, health and pension benefits, and the extent to which the construction sector shifts costs to other industries and the public sector by paying workers’ poorly or failing to provide them with health care. In all these areas, research shows that prevailing wage laws contribute to more “constructive competition” in the construction sector—competition based on skills, productivity, and quality rather than paying low wages to inexperienced workers in unsafe conditions. There’s never a good time to enact a policy that saves the state and its localities no money while lowering wages and destroying good middle-class jobs. But it is hard to think of a worse time than now.

Prevailing Wage Laws and Project Cost⁴

Research on prevailing wage laws takes advantage of the fact that some states have such laws while other states do not and that some states that once had such laws have repealed them. This variation across states and time makes it possible to use statistical techniques to separate the impact of prevailing

wage laws on costs (and on other variables of interest) from the impact of other important factors. Using this variation, a substantial research literature consistently shows that prevailing wage laws do not raise the cost of public construction.

For example, an article published in the *Journal of Education Finance* in spring 2002 explored the dependence of school construction costs across the United States from mid-1991 to mid-1999 on factors such as the state of the economy (measured by the level of unemployment), the size of the school, the season, and the existence of a prevailing wage law.⁵ The analysis found that public school construction costs:

- rose 22% when the unemployment rate declined by half;
- fell 2.5% for bids accepted in the spring compared to bids accepted in the fall;
- fell by 4.7% with a doubling of the school size, indicative of modest “economies of scale”; and
- **did not go up or down a statistically significant amount based on the presence of a prevailing wage law.**

Another article from the *Journal of Education Finance* explored the impact of the establishment of prevailing wages in British Columbia (B.C.) at about 90% of the collectively bargained wage. This analysis again took into account a wide range of variables that potentially impact school construction costs. It found that there was no statistically significant change in construction costs following establishment of the B.C. prevailing wage.⁶

In Michigan in the 1990s, school construction costs did not differ significantly during a period when the prevailing wage law was suspended compared to the period before and after this with the law in effect.⁷

In 1999, the Keystone Research Center (KRC) examined changes in public school construction bids during a period in which Pennsylvania’s prevailing wages were lowered substantially in rural areas.⁸ KRC found no association between the number of occupations in which the prevailing wage was lowered and the price per square foot of school of construction bids. If anything, construction bids appeared to go up *more* in areas where prevailing wages were lowered more.

The reason researchers don’t observe differences in cost associated with prevailing wage laws is that higher wages in construction tend to reflect higher productivity. Family-sustaining wages, health coverage and good pensions attract and retain workers, leading to an accumulation of what economists call “human capital”—know-how that allows a skilled trades worker with years of experience to problem solve and do the job more quickly and right the first time. This know-how also translates into lower costs due to less need for supervisors and the higher retention of experienced workers which lowers recruitment and screening costs. Higher wages also promote the use of labor-saving technology and management practices that keep per-square-foot costs low.⁹

While research finds that state prevailing wage laws do not significantly raise construction costs, the next several sections show that these laws do lead to more investment in workforce training, lower injury rates, and higher wages and benefits. Thus, prevailing wage laws tend, over time, to lead to a more skilled and experienced workforce that is less likely to leave the industry, compensating for higher per-hour wage and benefit costs.

Training

Construction workers have portable skills and often move from employer to employer as they finish up one project and begin work on another. Worker mobility and skill portability pose a dilemma for

construction employers: while they need skilled workers, it is difficult to justify training someone who may walk out the door to work for the competition. If many employers are reluctant to train their workers because they might leave, the end result may be a low overall investment in training. Economists call this outcome a “market failure.”

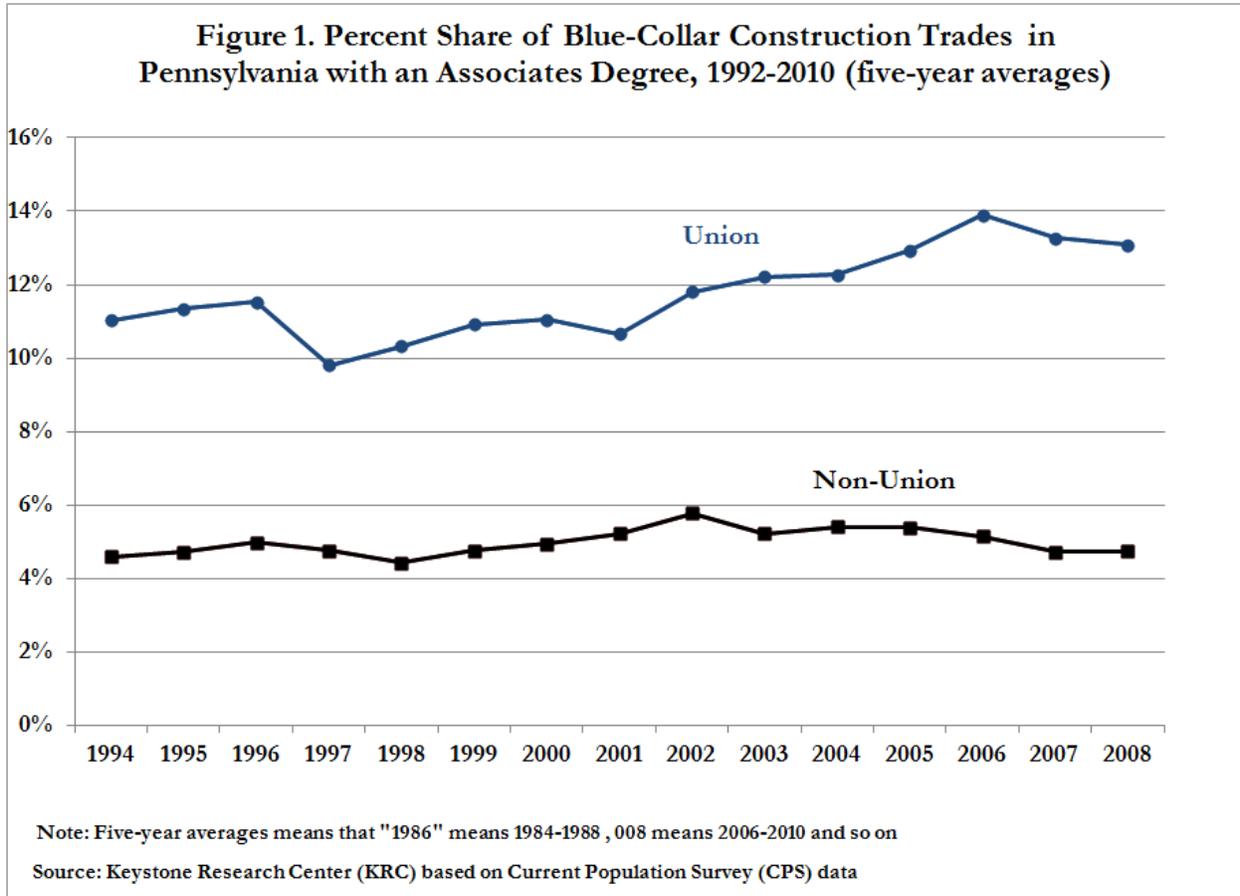
Prevailing wage laws can help reduce the tendency to underinvest in training through several mechanisms. Most important, these laws reduce the potential for small, low-wage firms that invest little in training to outbid larger and often unionized firms that research shows invest most heavily in apprenticeship training. Second, since starting apprentices typically earn only 50% to 60% of the prevailing rate for experienced workers, firms have an incentive to include some apprentices in crews on public jobs, as long as it lowers productivity less than it lowers compensation. Third, in Pennsylvania and some other jurisdictions, prevailing wage laws allow employers to use a portion of mandated prevailing fringe benefits to pay for apprenticeship training.

Consistent with the importance of these mechanisms, Cihan Bilginsoy found more investment in apprenticeship in states with a prevailing wage law when he analyzed data from the U.S. Bureau of Apprenticeship and Training.¹⁰

A 2002 study by the Keystone Research Center (KRC) shows that, in Pennsylvania, unionized contractors account for more than four out of every five of the state’s apprentices than non-union contractors.¹¹ The KRC study found:

- A greater share of minority and female apprentices participate in union apprenticeship programs.
- Union apprenticeship programs have higher graduation rates than non-union both overall and for minorities and women.¹²

While more recent data on investment in apprenticeship among union and non-union firms are not available, indirect evidence on the continuing union advantage when it comes to skills training is available from the Current Population Survey (CPS), a household survey. This source asks about workers’ union status and also about their demographics, including education and race. Figure 1 shows that 13% to 14% of blue-collar construction trades in Pennsylvania now have an Associate’s Degree, compared with only 5% in the non-union sector. Some of this difference reflects the concentration of non-union workers in the residential housing sector. Nonetheless, another part of this difference reflects the growing articulation of unionized construction apprenticeship programs with college credit. In some apprenticeships, such as the Western Pennsylvania electricians program, workers completing apprenticeships are immediately awarded an Associate Degree. In other apprenticeship programs, workers earn a portion of the credit needed for an Associate Degree by the time they become journey workers. These workers may then acquire a degree through additional education after they complete their apprenticeship.



Worker Safety

“In April 2000, 16 year-old Antonio Garcia Reyes was framing the roof of a new college dormitory in Alabama when he plunged three stories. He had no harness or other protection against a fall, accident investigators found. A year ago [2003] in South Carolina, brother Rigouerto and Moses Xaca Sandoval died building a suburban high school that, at 15 and 16, they might have attended. They were buried in a trench when the walls of sandy soil collapsed.”¹³

While construction workers represent just over one in 20 of all workers, they account for about one in five workplace fatalities and one in 10 workplace injuries.¹⁴ In analysis of the U.S. Bureau of Labor Statistics Survey of Occupational Injuries and Illnesses, Hamid Aazari-Rad found that the existence of state prevailing wage regulations was associated with fewer injuries and reduced worker compensation costs.¹⁵ Aazari-Rad concludes that construction is safer in prevailing wage states because these laws encourage training, promote the retention of experienced workers and create an environment of increased compliance with workplace safety and workers’ compensation rules and regulations. Absent prevailing wage regulations, a corrosive competitive environment can develop where contractors seek a competitive advantage by using young, inexperienced and sometimes desperate workers—a deadly mix in a dangerous industry.

Health and Pension Benefits

State prevailing wage laws also encourage the provision of health and pension benefits by establishing, as Pennsylvania's law does, a minimum contribution towards fringe benefits. By setting a minimum contribution, these provisions prevent bidders from gaining a cost advantage by not providing benefits. Given this, it is not surprising that the statistical research finds that construction workers in states with a prevailing wage law are more likely to have both a pension plan and health insurance than workers in states that do not.¹⁶

Cost Shifting

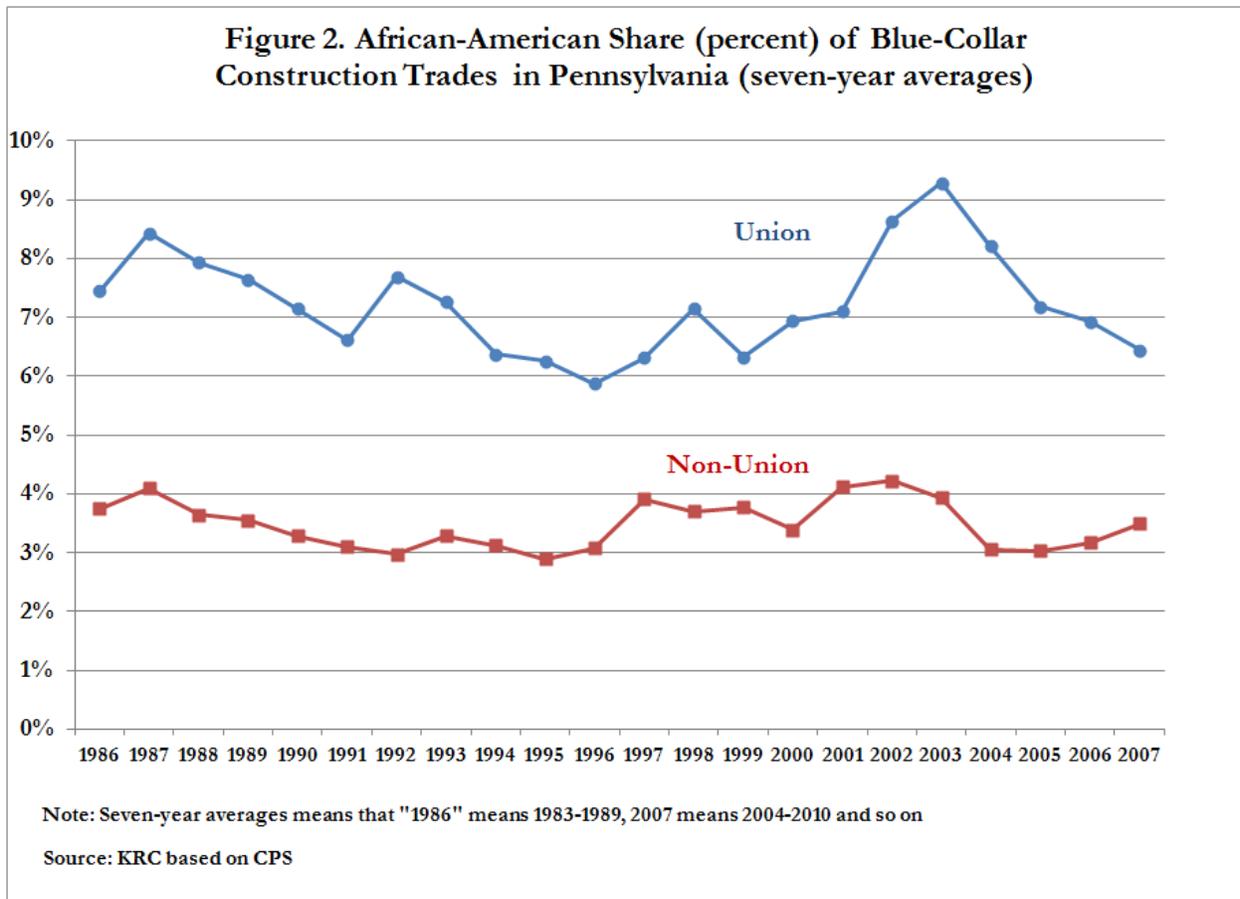
"A Tualatin onion processor and two contractors have agreed to pay \$1.1 million to settle a lawsuit brought by a Kansas man injured when he fell 13 feet through an unmarked access hole at the processor's plant in Hermiston...On March 28, 2003, workers for Inline Steel, a subcontractor at the site, cut an access hole on the building's second level. The following day, [Joseph] McKinley, a refrigerator technician working for another subcontractor, fell through the hole. He suffered a fractured skull, brain swelling and a dislocated shoulder..."¹⁷

Construction worksites can be very dangerous places because as the story above illustrates, the actions of one contractor can have serious consequences for other workers on the job site. Workers' compensation is designed to make the workplace safer by charging higher rates to contractors that have a higher-than-average incidence of on the job injuries. By inducing the use of better equipment, more efficient management strategies and better trained workers, higher wages can also make a job site less chaotic and safer. In the absence of prevailing wage laws, the competitive bidding process may also drive some low-wage contractors to encourage their workers not to report on-the-job injuries in order to gain a further advantage. Not only does this shift the cost of workplace related injuries to the public but can also raises costs for contractors that don't attempt to evade the workers' compensation system.

Given the high cost of health care, people without health insurance typically delay getting medical attention as long as they can before eventually seeking care in a hospital emergency room. With no health plan, a sick construction worker, particularly one with very low wages, is more likely to turn to Medicaid and other forms of public assistance, like safety-net hospitals and clinics. The cost of providing medical care for the uninsured is born both by the taxpayer and through higher insurance premiums by employers that do provide health care to their workers. In a study of the people seeking care in safety-net hospitals and clinics in Las Vegas, Jeffrey Waddoups found a disproportionately large share of construction workers unable to pay for urgent medical care.¹⁸

Race

Another issue raised in some debates about prevailing wage laws relates to their role in expanding opportunities or in discriminating against minorities. One simple way to gauge their indirect impact on racial composition in Pennsylvania is by examining the African-American share of the union vs. non-union blue-collar construction workforce. As Figure 2 shows, the African-American share of the unionized trades workforce is about twice as high as that of the non-union workforce. This gap has closed somewhat in recent years because the African-American share of the unionized workforce has declined. One reason for this may be that construction employment in Philadelphia has fallen more than in other parts of the state and Philadelphia has the highest African-American share.



To the extent that prevailing wage laws help protect unionized companies from being undercut by smaller non-union ones, they help expand opportunities for African Americans (even with some shrinkage in the union/non-union African-American share).

Conclusion

In the highly competitive construction industry, contractors are often under intense short-run competitive pressure to undercut worker salaries. This can be good for society by keeping prices low in the short-term, but there is also a danger that contractor will fail to embed in the cost of their bids the long-run costs of developing and maintain human capital -- a skilled and experienced workforce.

Without family supporting wages, health and old-age insurance, and training, Pennsylvania's construction industry will not attract and retain in the long run a qualified workforce. Contractors who risk losing a job by investing in workers cannot solve this problem alone. Prevailing wage laws operate as a break on destructive competition and refocus the forces of competition upon efforts to raise productivity and quality. This will benefit construction customers in the private as well as public sector over the long term, while also benefiting workers, families, and communities.

The Keystone Research Center is a nonprofit, nonpartisan research organization that promotes a more prosperous and equitable Pennsylvania economy. Learn more: www.keystoneresearch.org.

Endnotes

- ¹ Commonwealth of Pennsylvania, Office of the Budget, *Budget Sense*, January 2011.
- ² Joe Grata, "Wage Ruling May Raise Road Costs," *Pittsburgh Post-Gazette*, April 8th 2006.
- ³ U.S. Department of Commerce, Economic Census of Construction, 2002.
- ⁴ Portions of this section were adapted from Stephen Herzenberg and Mark Price, *End Not Justified By Means: An Analysis of the R.S. Means New Castle County Assessment of the Economic Impact of Adopting Prevailing Wage Laws on New Castle County Government Construction Projects* (Harrisburg: Keystone Research Center, September 2003). For another review of the literature on prevailing wage laws and their impact on costs, see Nooshin Mahalia, *Prevailing Wages and Government Contracting Costs: A Review of the Research* (Washington, DC: Economic Policy Institute, 2008), EPI Briefing Paper 215; online at <http://www.epi.org/publications/entry/bp215/>.
- ⁵ Hamid Azari-Rad, Peter Philips, and Mark Prus, "Making Hay When It Rains: The Effect Prevailing Wage Regulations, Scale Economies, Seasonal, Cyclical and Local Business Patterns Have on School Construction Costs," *Journal of Education Finance* 27 (Spring 2002): 997-1012.
- ⁶ Cihan Bilginsoy and Peter Philips, "Prevailing Wage Regulations and School Construction Costs: Evidence from British Columbia," *Journal of Education Finance* 25(3) (Winter 2000): 415-31.
- ⁷ Peter Philips *A Comparison of Public School Construction Costs In Three Midwestern States that Have Changed Their Prevailing Wage Laws in the 1990s: Kentucky, Ohio and Michigan* (Utah: University of Utah, 2001).
- ⁸ Howard Wial, *Do Lower Prevailing Wages Reduce Public Construction Costs?* (Harrisburg: Keystone Research Center, 1999); online at <http://keystoneresearch.org/publications/research/do-lower-prevailing-wages-reduce-public-construction-costs>.
- ⁹ Steven G. Allen, "Unionized Construction Workers are More Productive," *Quarterly Journal of Economics*, 99(2) (May 1984):251-274; Kevin Duncan and Mark J. Prus, "Prevailing Wage Laws and Construction Costs: Evidence from British Columbia's Skills Development and Fair Wage Policy, in Hamid Azari-Rad, Peter Philips, and Mark J. Prus (eds), *The Economics of Prevailing Wage Laws* (London: Ashgate Publishing Limited, 2005); Dale Belman and Paula B. Voos, "Prevailing Wage Laws in Construction: The Costs of Repeal to Wisconsin" (Milwaukee: The Institute for Wisconsin's Future, 1995.)
- ¹⁰ Cihan Bilginsoy, "Wage Regulation and Training: The Impact of State Prevailing Wage Laws on Apprenticeship," in Azari-Rad et al., *The Economics of Prevailing Wage Laws*.
- ¹¹ David H. Bradley and Stephen A. Herzenberg, *Construction Apprenticeship and Training in Pennsylvania* (Harrisburg: Keystone Research Center, 2002).
- ¹² Günseli Berik and Cihan Bilginsoy, *Still a Wedge in the Door: Women Training for the Construction Trades in the U.S.* University of Utah, Department of Economics, Working Paper Series, 2005.
- ¹³ Justin Pritchard, "AP Investigation: Mexican Worker Deaths Rise Sharply Even as Overall U.S. Job Safety Improves," Associated Press, March 13, 2004.
- ¹⁴ In recent years, the construction industry's share of fatalities and of employment share have fallen somewhat. In 2009, there were 816 fatalities in construction out of 4340 in all industries; see <http://www.bls.gov/news.release/cfoi.t02.htm>.
- ¹⁵ Hamid Azari-Rad, "Prevailing Wage Laws and Injury Rates in Construction," in Azari-Rad et al., *The Economics of Prevailing Wage Laws*.
- ¹⁶ Jeffrey S. Peterson, "Health Care and Pension Benefits for Construction Workers: The Role of Prevailing Wage Laws," *Industrial Relations* 39(2): 246-264, April 2000.; Mark A. Price, "Pension and Health Insurance Coverage in Construction Labor Markets," Azari-Rad et al., *The Economics of Prevailing Wage Laws*.; Mark A. Price "State Prevailing Wage Laws and Construction Labor Markets", Dissertation: University of Utah, December 2005.
- ¹⁷ Brent Hunsberger, "Hurt Worker Settles for \$1.1 million," *The Oregonian*, January 28, 2006.
- ¹⁸ C. Jeffrey Waddoups, "Health Care Subsidies in Construction: Does the Public Sector Subsidize Low Wage Contractors?" in Azari-Rad et al., *The Economics of Prevailing Wage Laws*.