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## NATIONAL ACADEMY OF·SOCIAL INSURANCE

The National Academy of Social Insurance is a nonprofit, nonpartisan organization made up of the nation's leading experts on social insurance. Its mission is to advance solutions to challenges facing the nation by increasing public understanding of how social insurance contributes to economic security. Social insurance encompasses broad-based systems for insuring workers and their families against economic insecurity caused by loss of income from work and the cost of health care. NASI's scope covers social insurance, such as Social Security, Medicare, workers' compensation, and unemployment insurance, related public assistance, and private employee benefits. The Academy convenes study panels that are charged with conducting research, issuing findings, and, in some cases, reaching recommendations based on their analysis. Members of these groups are selected for their recognized expertise and with due consideration for the balance of disciplines and perspectives appropriate to the project.

This research report presents new data and does not make recommendations. It was prepared with the guidance of the Study Panel on Workers' Compensation Data. In accordance with procedures of the Academy, it has been reviewed by a committee of the Board for completeness, accuracy, clarity, and objectivity. The Social Security Administration provides funding to collect, process, and validate the data that is used in the preparation of tables for their *Annual Statistical Supplement to the Social Security Bulletin*. The Centers for Medicare & Medicaid Services also provides funding to produce selected tables from this report for use in their own estimates. This project also received financial support from the Office of Workers' Compensation Programs of the U.S. Department of Labor. It also received in-kind support in data from the National Council on Compensation Insurance and the National Association of Insurance Commissioners.

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# Workers' Compensation:

Benefits, Coverage, and Costs, **2010** 

by

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with advice of the

Study Panel on Workers' Compensation Data

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NATIONAL ACADEMY OF·SOCIAL INSURANCE Washington, DC

### **Preface**

Workers' compensation provides medical care, rehabilitation, and cash benefits for workers who are injured on the job or who contract work-related illnesses. It also pays benefits to families of workers who die of work-related causes. Each state regulates its own workers' compensation program, with no standard reporting requirements. The lack of uniform reporting of states' experiences with workers' compensation makes it difficult to provide summary statistics on the program in terms of benefits paid, costs to employers, and the number of workers covered. It is necessary to piece together data from various sources to develop these estimates.

Before the Academy began the publication of this annual report, the U.S. Social Security
Administration (SSA) produced the only comprehensive national data on workers' compensation benefits and costs with annual estimates dating back to 1946. SSA discontinued the series in 1995 after publishing data for 1992–93. In February 1997, the Academy received start-up funding from The Robert Wood Johnson Foundation to launch a research initiative in workers' compensation. The first task was to develop methods to continue the national data series. In December 1997, the Academy published its first report extending the data series from 1993 through 1995.

This is the fifteenth report the National Academy of Social Insurance has issued on workers' compensation benefits, coverage, and costs. This report presents new data on developments in workers' compensation in 2010 and updates estimates of benefits, costs, and coverage for the years 2006–2009. The revised estimates in this report replace estimates in the Academy's prior reports.

Unlike other U.S. social insurance programs, state workers' compensation programs are not federally financed or administered. And, unlike private pensions or employer-sponsored health benefits that receive favorable federal tax treatment, no federal laws set standards for "tax-qualified" plans or require comprehensive reporting of workers' compensation coverage and benefits<sup>1</sup>. The general lack of federally mandated data means that states vary greatly in the data they have available to assess the performance of workers' compensation programs. The Academy and its expert advisors are continually seeking ways to improve the report and to adapt estimation methods to track new developments in the insurance industry and in workers' compensation programs.

The audience for the Academy's reports on workers' compensation includes journalists, business and labor leaders, insurers, employee benefit specialists, federal and state policymakers, and researchers in universities, government, and private consulting firms. The data are published in the Statistical Abstract of the United States by the U.S. Census Bureau, Injury Facts by the National Safety Council, Employee Benefit News, which tracks developments for human resource professionals, and Fundamentals of Employee Benefit Programs from the Employee Benefit Research Institute. The U.S. Social Security Administration publishes the data in its Annual Statistical Supplement to the Social Security Bulletin. The federal Centers for Medicare and Medicaid Services use the data in their estimates and projections of health care spending in the United States. The National Institute for Occupational Safety and Health uses the data to track the cost of workplace injuries in the United States. In addition, the International Association of Industrial Accident Boards and Commissions (the organization of state and provincial agencies that administer workers' compensation in the United States and Canada) uses the information to track and compare the performance of workers' compensation programs in the United States with similar systems in Canada.

<sup>1</sup> A reporting requirement enacted in 2007, Section 111 of S.2499 (now Public Law No. 110-173), requires workers' compensation claims administrators to report to the CMS (Centers for Medicare and Medicaid Services) information about workers' compensation recipients who are entitled to Medicare.

### **Acknowledgements**

The Academy relies on staff in 50 state workers' compensation offices and District of Columbia offices to provide individual state and jurisdiction data each year. Without support from these sources, continuing this vital data series would not be possible. The report is produced with the oversight of the members of the Academy's Study Panel on Workers' Compensation Data, who are listed on page iii of this report.

The Academy also acknowledges Social Security Administration, Centers for Medicare & Medicaid Services and the Office of Workers' Compensation Programs of the U.S. Department of Labor for their support.

This year we are pleased to add Marjorie Baldwin as a co-author. This report also benefited from the expertise of members of the Study Panel on Workers' Compensation Data, who give generously of their time and knowledge in advising on data sources and presentation, interpreting results, and reviewing the draft report. Members of the Panel are listed on page (iii) but I would like to especially acknowledge Barry

Llewellyn, National Council on Compensation Insurance, Eric Nordman, National Association of Insurance Commissioners, Alex Swedlow, California Workers' Compensation Institute, and Frank Neuhauser, University of California, Berkeley — all of whom provided the Academy with data and expert advice on particularly thorny data issues. Additionally, I am especially thankful to Allan Hunt, W.E. Upjohn Institute, Les Boden, Boston University, Doug Holmes, UWC, Greg Krohm, International Association of Industrial Accident Boards and Commissions, Mike Manley, Oregon Department of Consumer and Business Services, and William Wiatrowski, U.S. Bureau of Labor Statistics for their important suggestions.

Finally, this report benefited from helpful comments during Board review by Rene Parent, Mark Priven, and Glenn Shor. We appreciate the time and effort they devoted to reviewing the report.

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### **Highlights**

This report provides a benchmark of benefits, costs, and coverage of workers' compensation programs in 2010 to facilitate policymaking and comparisons with other social insurance and employee benefit programs. The report has been produced annually by the National Academy of Social Insurance since 1997. Key estimates from this year's report are summarized below.

#### **National Trends**

- In 2010 workers' compensation programs in the fifty states, the District of Columbia, and federal programs paid \$57.5 billion in benefits, a decrease of 0.7 percent from the \$57.9 billion in benefits paid in 2009 (Table 1).
- In 2010 medical payments decreased by 2.1 percent, to \$28.1 billion, but cash benefits to injured workers increased by 0.7 percent, to \$29.5 billion.
- Costs to employers fell by 2.7 percent in 2010 to \$71.3 billion. As a share of covered wages, employers' costs were lower than in any year since 1980.
- Measured as a percentage of the wages of covered workers, benefits paid to workers also fell in 2010 (Figure 1).
- In 2010 workers' compensation covered an estimated 124.5 million workers a decrease of 0.3 percent from the previous year. Aggregate wages of covered workers increased by 2.6 percent (Table 1).
- A total of 4,690 fatal work injuries occurred in 2010, a 3.1 percent increase from the number reported in 2009. (Table 15).

#### **State Trends**

Most individual states reported a decrease in numbers of workers covered and an increase in covered wages between 2009 and 2010 (Table 3).

- Between 2009 and 2010, the total amount of benefits paid to injured workers declined in 26 jurisdictions while the remaining 25 jurisdictions experienced an increase in benefit payments (Table 7).
- In 2010, the share of benefits paid for medical care exceeded 50 percent in 32 states.
- In recent years the importance of state funds as a source of workers' compensation benefits has been declining (Table 6).
- Between 2009 and 2010, the employers' costs of workers' compensation as a percent of payroll increased in 8 states and declined in 43 jurisdictions (Table 12).

# Overview of Workers' Compensation

"All U.S. states adopted workers' compensation laws independently in the first half of the 20th century."

### **History of Workers' Compensation**

Historically workers' compensation has been the first social insurance program adopted in developed countries. Germany enacted the first modern workers' compensation laws, known as Sickness and Accident Laws, in 1884, under Chancellor Otto von Bismarck (Clayton 2004). The next such laws were adopted by England in 1897.

In the U.S. most states adopted workers' compensation laws in a relatively short period between 1910 and 1920. The first workers' compensation law in the United States was enacted in 1908 to cover certain federal civilian workers. The first constitutional state laws were passed in 1911 by New Jersey and Wisconsin.<sup>2</sup> The last state to pass a workers' compensation law was Mississippi, in 1948.

The New Jersey law was enacted on April 3, 1911, signed by Governor Woodrow Wilson on April 4, and took effect on July 4, 1911 (Calderone 2011:169). The Wisconsin law was enacted and took effect on May 3, 1911 (Krohm 2011:187).

The adoption of state workers' compensation programs has been called a significant event in the nation's economic, legal, and political history because passage of the laws required great efforts on the part of business and labor leaders in each state to reach agreements on the specifics of the laws. Essentially, business and labor reached a grand compromise in which injured workers gave up the right to sue their employers in return for guaranteed benefits, and employers gave up their common law defenses in return for statutory limits on coverage.

Today, each of the 50 states, the District of Columbia, and U.S. territories has its own workers' compensation program. Separate federal programs cover federal civilian employees and specific at-risk workers including coal miners with black lung disease, longshoremen and harbor workers, employees of overseas contractors with the U.S. government, energy employees exposed to certain hazardous materials, workers engaged in the manufacturing of atomic bombs, and veterans injured while on active duty in the armed forces.

"The adoption of workers' compensation laws represented a grand compromise between business and labor leaders in each state."

Before workers' compensation laws were enacted, an injured worker's only legal remedy for a work-related injury was to bring a tort suit against the employer and prove that the employer's negligence caused the injury. Some injured workers might receive voluntary compensation from their employers or medical benefits paid through the employer's liability insurance, but many workers received no compensation at all. Employers could use three common-law defenses to avoid liability: assumption of risk (showing, for example, that the injury resulted from an ordinary hazard of employment);<sup>3</sup> the fellow worker rule

(showing that the injury was due to a fellow worker's negligence); or contributory negligence (showing that, regardless of any fault of the employer, the worker's own negligence contributed to the accident).

Under the tort system, employers generally prevailed in court. But they were at risk for substantial and unpredictable losses if the workers' suits were successful. Litigation created friction between employers and workers. Both sides became dissatisfied with the status quo, setting the stage for the grand compromise noted above. Initial reforms took the form of employer liability acts, which eliminated some of the employers' common-law defenses. Nonetheless, employees still had to prove negligence on the part of the employer, which remained a significant obstacle to recovery of damages (Burton and Mitchell 2003).4 Ultimately, both employers and employees favored workers' compensation legislation to ensure that workers who sustained occupational injuries or contracted recognized occupational diseases receive predictable and timely compensation. As a quid pro quo, workers' compensation becomes the 'exclusive remedy' for occupational injuries and the employer's liability is limited to the statutory benefits specified in the state workers' compensation act. Under the exclusive remedy concept, the worker accepts workers' compensation as payment in full and gives up the right to sue. (There are limited exceptions to the exclusive remedy concept in some states, such as when there is an intentional injury of the employee or when an employer violates a safety regulation).

Workers' compensation programs vary across states in terms of who is allowed to provide insurance, which injuries or illnesses are compensable, and the level of benefits provided. Workers' compensation is financed almost exclusively by employers, although economists argue that workers pay for a substantial portion of the costs of the program in the form of lower wages (Leigh et al. 2000).

A more complete definition is provided by Willborn et al. (2012, 863); "The assumption of risk doctrine barred recovery for the ordinary risks of employment; the extraordinary risks of employment, if the worker knew of them or might reasonably have been expected to know of them; and the risks arising from the carelessness, ignorance, or incompetency of fellow servants."

<sup>4</sup> As a result, the employers' liability approach was abandoned in all jurisdictions and industries except the railroads, where it still exists.

## Workers' Compensation Benefits and Costs

**Benefits paid in 2010.** Total cash benefits to injured workers and medical payments for their health care were \$57.5 billion in 2010, a 0.7 percent decrease from \$57.9 billion in 2009. Medical payments decreased by 2.1 percent to \$28.1 billion, but cash benefits to injured workers increased by 0.7 percent to \$29.5 billion (Table 1).

Employer costs in 2010. Workers' compensation costs to employers (premium costs and deductibles for insured employers plus benefits paid and administrative costs for self-insured employers) were \$71.3 billion in 2010, a decrease of 2.7 percent from 2009. This decrease in employer costs is a continuation of

"Total workers' compensation benefits (cash benefits plus payments for medical care) declined by 0.7% from 2009 to 2010. Cash benefits increased by 0.7% while medical payments decreased by 2.1%. percent in 2010 to \$71.8 billion."

the downward trend in employer costs we have observed since 2006. The decline in employer costs reflects the overall decline in employment in the recession. The number of workers covered by workers' compensation in 2010 was 0.3 percent smaller

**Table 1**Workers' Compensation Benefits\*, Coverage, and Costs\*\*, 2009–2010: Summary

Aggregate Amounts	2009	2010	Change in Percent
Covered workers (in thousands)	124,856	124,454	-0.3
Covered wages (in billions)	\$5,675	\$5,820	2.6
Workers' compensation benefits paid (in billions)	57.9	57.5	-0.7
Medical benefits	28.7	28.1	-2.1
Cash benefits	29.2	29.5	0.7
Employer costs for workers' compensation (in billions)	73.3	71.3	-2.7

Amount per \$100 of Covered Wages			Change in Amount <sup>#</sup>
Benefits paid	\$1.02	\$0.99	-\$0.03
Medical payments	0.51	0.48	-0.03
Cash payments to workers	0.52	0.51	-0.01
Employer costs	1.29	1.23	-0.06

<sup>#</sup> Figures may not add to total due to rounding.

Source: National Academy of Social Insurance estimates based on Tables 2, 8, 9, 11, 12 and D1.

<sup>\*</sup> Benefits are payments in the calendar year to injured workers and to providers of their medical care.

<sup>\*\*</sup> Costs are employer expenditures in the calendar year for workers' compensation benefits. Costs for self-insuring employers are benefits paid in the calendar year plus the administrative costs associated with providing those benefits. Costs for employers who purchase insurance include the insurance premiums paid during the calendar year plus the payments of benefits under large deductible plans during the year. The insurance premiums must pay for all of the compensable consequences of the injuries that occur during the year, including the benefits paid in the current as well as future years.

than in 2009 and 4.7 percent smaller than in 2008 (Table 2). Moreover, the sluggish economy of 2010 saw even sharper declines in the construction industry, a sector that has above average workers' compensation costs due to a higher frequency and severity of workplace injuries. Construction was the hardest hit industry in the recession with a decline in employment of 19 percent between 2008 and 2009 and a further decline of 8.3 percent between 2009 and 2010. (Goodman and Mance 2011; BLS 2012).

"Employer costs for workers' compensation declined by 2.7% from 2009 to 2010. This decrease in employer costs is a continuation of the downward trend in costs since 2006"

Note that employer costs are not expected to correspond to benefits paid in any calendar year. From an insurer's perspective, premiums received in a given year are expected to cover all future liabilities for injuries that occur in that year. Benefits paid in a given year are the current payments for insurance policies, some of which were purchased in the current year and some of which were purchased in previous years.

Also note that NASI measures of benefits and costs are designed to reflect the aggregate experience of two stakeholder groups – workers who rely on compensation for workplace injuries and employers who pay the bills. The NASI measures are not designed to assess the performance of the insurance industry or insurance markets. Other organizations analyze insurance trends.<sup>5</sup>

## Trends in Workers' Compensation Benefits and Costs

For long-term trends, it is useful to consider workers' compensation benefits and employer costs relative to aggregate wages of covered workers. In a steady state,

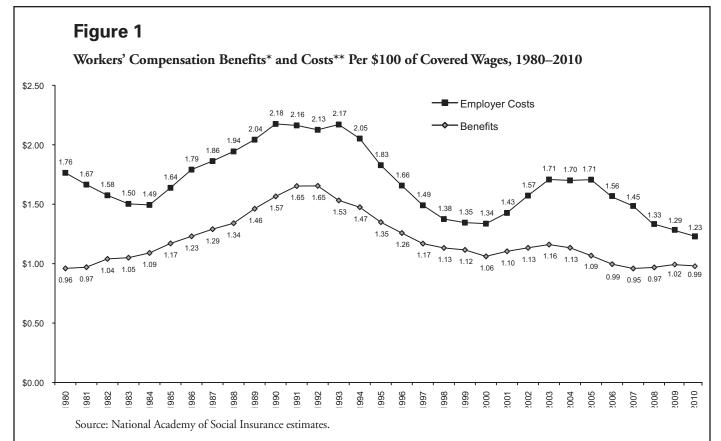
one might expect benefits to keep pace with covered wages. This would be the case if there were no changes in the frequency or severity of injuries and if the wages of covered workers and medical payments to providers tracked the growth of wages/prices in the aggregate economy. In reality, however, benefits and costs relative to wages vary significantly over time.

In 2010, aggregate wages of covered workers rose by 2.6 percent (Table 2). When measured relative to the wages of covered workers, both workers' compensation benefits and employer costs decreased in 2010 (Table 1). Total benefits fell by three cents to \$0.99 per \$100 of covered wages in 2010: medical payments fell by three cents to \$0.48 per \$100 of covered wages, while cash benefits fell by one cent to \$0.51 per \$100 of covered wages. Employer costs fell by six cents to \$1.23 per \$100 of covered wages in 2010.

Figure 1 shows the trends in employer costs and worker benefits (cash benefits plus payments for medical services) as a share of covered wages over the past 30 years. Relative benefits and costs peaked in the early 1990s, declined sharply to a low in 2000, rebounded somewhat after 2000, and then declined in recent years. As a share of covered wages, employers' costs were lower in 2010 (\$1.23 per \$100) than in any year since 1980 (\$1.76 per \$100). As a share of covered wages, worker benefits were only slightly higher in 2010 (\$0.99 per \$100) than the low in 2007 (\$0.95 per \$100).

Figure 2 focuses on trends in worker benefits over the past 30 years, showing the changes in medical payments and cash benefits separately. Historically, as a share of covered wages, cash benefits to workers have exceeded medical payments by considerable amounts. In the early 1990's, however, the trend lines began to converge so that medical payments and cash benefits have been almost identical over the last three reports (2008-2010). In 2010, cash benefits (\$0.51 per \$100 of covered wages) were about 50 percent lower than their 1991 peak (\$0.99 per \$100 of wages). Medical benefits (\$0.48 per \$100 of covered wages) were 30 percent lower than their 1992 peak (\$0.69 per \$100 of wages).

<sup>5</sup> The National Council on Compensation Insurance (NCCI) and state rating bureaus, for example, assess insurance developments in the states and advise regulators and insurers on proposed insurance rates.



- \* Benefits are payments in the calendar year to injured workers and to providers of their medical care.
- \*\* Costs are employer expenditures in the calendar year for workers' compensation benefits, administrative costs, and/or insurance premiums. Costs for self-insuring employers are benefits paid in the calendar year plus the administrative costs associated with providing those benefits. Costs for employers who purchase insurance include the insurance premiums paid during the calendar year plus the payments of benefits under large deductible plans during the year. The insurance premiums must pay for all of the compensable consequences of the injuries that occur during the year, including the benefits paid in the current as well as future years.

# **Covered Employment and Wages**

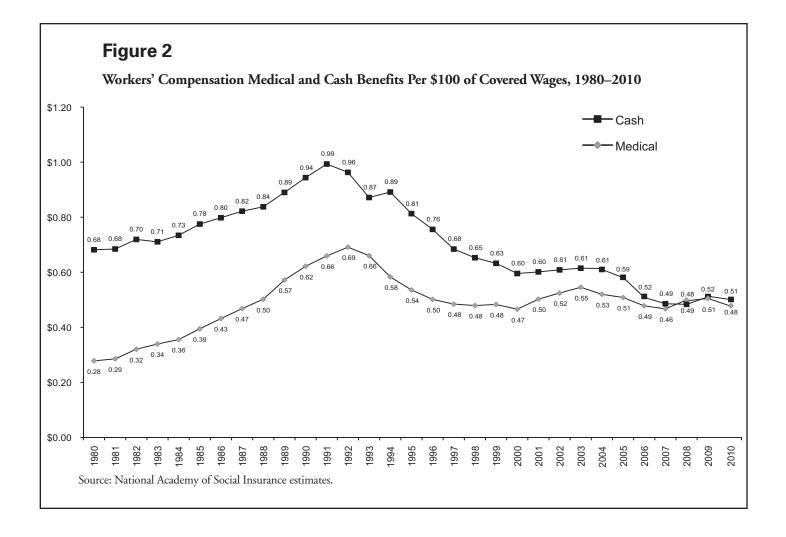
In 2010, workers' compensation covered an estimated 124.5 million workers, a small decrease of 0.3 percent from the 124.9 million workers covered in 2009 (Table 2). Total wages of covered workers were \$5.8 trillion in 2010, an increase of 2.6 percent from 2009.

### **State Coverage Rules**

Workers' compensation insurance coverage is mandatory in all states except Texas, and for all except the smallest employers in some states. The laws vary widely from state to state regarding the maximum number of employees allowed for exemption from the law. Employers with less than three workers are

exempt from mandatory workers' compensation coverage in Arkansas, Georgia, Michigan, New Mexico, North Carolina, Virginia, West Virginia and Wisconsin. Employers with fewer than four workers are exempt in Florida and South Carolina. Those with fewer than five employees are exempt in Alabama, Mississippi, Missouri, Oklahoma, and Tennessee. Some also states exempt other employers from mandatory coverage, such as certain agricultural employers, household employers, charitable or religious organizations, or some units of state and local government.

Employers purchase workers' compensation insurance from private insurers or a state insurance fund, or some large employers are permitted to self-insure. Employers who choose to self-insure must have



approval from the state regulatory authority after demonstrating financial ability to carry their own risk.

The cost of workers' compensation insurance varies across firms according to actuarial estimates of the risk of occupational injuries. For those employers who purchase insurance, premiums are based in part on their industry classification and the occupational

"Workers' compensation is financed almost exclusively by employers, although higher workers' compensation benefits are associated with lower wages for covered workers." classifications of their workers. Many employers are also experience-rated, which results in higher (or lower) premiums for employers whose past experience – as evaluated by actuarial formulas that consider injury frequency and aggregate benefit payments – is poorer (or better) than the experience of similar employers in the same insurance classification (Thomason, Schmidle, and Burton 2001).

In every state an employee who is not covered by workers' compensation insurance or an approved self-insurance plan is allowed to file suit claiming the employer is liable for his or her work-related injury or illness. In Texas, workers' compensation coverage is voluntary, but employers opting out of workers' compensation coverage are not protected from tort suits.

**Table 2**Number of Workers Covered under Workers' Compensation Programs and Total Covered Wages, 1989–2010

	Total V	Vorkers	Total Wages		
Year	(in thousands)	Percent Change	(in billions)	Percent Change	
1989	103,900	_	\$ 2,347	_	
1990	105,500	1.5	2,442	4.0	
1991	103,700	-1.7	2,553	4.5	
1992	104,300	0.6	2,700	5.7	
1993	106,200	1.8	2,802	3.8	
1994	109,400	3.0	2,949	5.2	
1995	112,800	3.1	3,123	5.9	
1996	114,773	1.7	3,337	6.9	
1997	118,145	2.9	3,591	7.6	
1998	121,485	2.8	3,885	8.2	
1999	124,349	2.4	4,151	6.8	
2000	127,141	2.2	4,495	8.3	
2001	126,972	-0.1	4,604	2.4	
2002	125,603	-1.1	4,615	0.2	
2003	124,685	-0.7	4,717	2.2	
2004	125,878	1.0	4,953	5.0	
2005	128,158	1.8	5,213	5.3	
2006	130,339	1.7	5,544	6.3	
2007	131,734	1.1	5,857	5.6	
2008	130,643	-0.8	5,954	1.7	
2009	124,856	-4.4	5,675	-4.7	
2010	124,454	-0.3	5,820	2.6	

Source: National Academy of Social Insurance estimates. See Appendix A.

## Methods for Estimating Coverage of Employment and Wages

Because no national system exists for counting workers covered by workers' compensation, the number of covered workers and their covered wages must be estimated. The Academy's methods for estimating coverage are described in Appendix A. In brief, we

start with the number of workers and total wages in each state that are covered by unemployment insurance (UI). Approximately 96% of U.S. wage and salary workers are covered by UI (NASI 2002). We subtract from the workers and wages covered by UI estimates of the workers and wages that are not required to be covered by workers' compensation

because of exemptions described above, such as for small firms, agricultural employers, and employers in Texas that opt out of workers' compensation. Self-employed persons are not typically covered by unemployment insurance or by workers' compensation.

Using these methods we estimate that in 2010, 97.3 percent of all UI–covered workers and wages were covered by workers' compensation.<sup>6</sup>

"...in 2010, 97.3 % of all workers and wages covered by unemployment insurance were also covered by workers' compensation."

NASI's coverage estimates seek to count the number of workers who are legally required to be covered under the state laws. The methodology may undercount the number of persons who are actually covered. For example, in some states, selfemployed persons may voluntarily elect to be covered, and in those states with exemptions for small firms, some small firms may voluntarily purchase workers' compensation insurance. The NASI methodology may also overestimate the number of workers actually covered by workers' compensation. Several recent studies have found that actual coverage is less than legally required coverage because of evasive strategies used by employers, such as not reporting employees or misclassifying them as independent contractors, or simply avoiding insurance illegally (Greenhouse 2008; FPI 2007). Every state has a program to detect and penalize illegally uninsured employers, but no state has tried to formally measure the total number of illegally uninsured employers. As a practical matter, NASI lacks the information needed to systematically estimate compliance or non-compliance with state laws.

### State Trends in Coverage

Most individual states followed the national trend, reporting a decrease in numbers of workers covered and an increase in covered wages between 2009 and 2010 (Table 3). All jurisdictions except Alaska, District of Columbia, Massachusetts, North Dakota and Texas recorded a fall in employment in 2010. In Texas, where workers' compensation is voluntary for employers, coverage increased from 79 percent of workers in 2009 to 83 percent in 2010, according to surveys of Texas employers (TDI, 2010). With regard to wages covered under workers' compensation, 45 jurisdictions reported increases between 2009 and 2010. Arizona, Hawaii, Kansas, Nevada, New Mexico, and Oklahoma are the only states that reported a decrease in covered wages. Because workers' compensation coverage rules did not change significantly between 2009 and 2010, differences in growth rates of covered employment and wages among states generally reflect changes in the states' overall employment and wages. All of the six states reporting a decrease in covered wages, for example, also reported above average declines in covered employment (-1.4% to -2.8%).

> "Most individual states followed the national trend, reporting a decrease in numbers of workers covered and an increase in covered wages between 2009 and 2010."

According to unpublished estimates provided by the Bureau of Labor Statistics, only 3 percent of all employees who worked for employers who participated in the BLS National Compensation Survey (NCS) were employed in establishments that reported zero workers' compensation costs. The 3 percent figure was for all employees covered by the survey, as well as for employees in the private sector and employees in the state and local government sector. The NASI estimate of legally required coverage has a national average (97.3 percent of all UI covered workers in 2010) that is virtually identical to the workers' compensation coverage shown by the NCS.

# **Workers' Compensation Benefits**

### **Types of Benefits**

Medical only. Workers' compensation pays 100 percent of medical costs for injured workers and pays cash benefits for lost work time after a threeto-seven-day waiting period. Most workers' compensation cases do not involve lost work time greater than the waiting period for cash benefits. In these cases, only medical costs are paid. "Medical only" cases are quite common in workers' compensation, but they represent only a small share of overall payments. According to the National Council on Compensation Insurance, medical-only cases accounted for 76 percent of workers' compensation cases, but only 7 percent of all payments of cash and medical benefits in the 37 NCCI covered states for policy years spanning 1998–2007 (NCCI 2011c). The remaining 24 percent of cases that exceeded the waiting period and involved cash benefits accounted for 93 percent of payments.

"The majority of workers' compensation cases are medical only claims. These cases account for 76% of claims but only 7% of overall benefits."

Temporary disability. Cash benefits differ according to the duration and severity of the worker's disability. Temporary total disability (TTD) benefits are paid when a work-related injury or illness temporarily prevents a worker from returning to the pre-injury job or another job for the same employer for which the worker is otherwise qualified. Most workers who receive TTD benefits fully recover and return to work, at which time benefits end. In some cases, however, injured workers return to work before they reach maximum medical improvement, often with

restricted duties and lower or differential pay. When injured workers return to work at less than the preinjury wage, they receive temporary partial disability (TPD) benefits in most states. Temporary disability benefits are the most common type of cash benefits. They account for 61 percent of cases involving cash benefits and 17 percent of total benefits (cash plus medical) in those cases (Figure 3).

Temporary disability benefits are the most common type of cash benefits, accounting for 61% of cases involving cash benefits and 17% of overall payments."

Most states pay weekly benefits for temporary total disability that replace two-thirds of the worker's preinjury wage (tax free), subject to a dollar maximum that varies from state to state. The maximum weekly TTD benefit as of January 2012 (the latest data available), ranged from \$437 in Mississippi to \$1,457 in Iowa. Eleven jurisdictions had a maximum TTD benefit of \$1,000 or more: Alaska, California, Connecticut, District of Columbia, Illinois, Iowa, Massachusetts, New Hampshire, Oregon, Vermont, and Washington. Six states had a maximum TTD benefit of \$600 or less: Arkansas, Georgia, Idaho, Kansas, Louisiana and Mississippi.<sup>7</sup>

Permanent disability. If an injured worker has severe impairments that are judged to be permanent after he or she reaches maximum medical improvement, permanent disability benefits may be paid. Permanent total disability (PTD) benefits are paid to workers who are unable to work because of a work-related injury or illness. Permanent partial disability (PPD) benefits are paid when the worker has physical impairments that, although permanent, do not completely limit his or her ability to work.

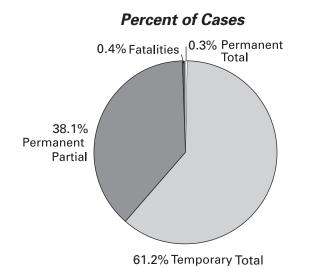
Details on benefit and coverage provisions of state laws are compiled in *Workers' Compensation Laws as of January 2012*, issued jointly by the IAIABC (International Association of Industrial Accident Board and Commissions) and the WCRI (Workers Compensation Research Institute) and are summarized in Appendix I. The IAIABC and WCRI did not publish a similar compilation for 2011. Information on workers' compensation laws as of January 1, 2010 is included in Appendix I of Sengupta, Reno, and Burton (2011).

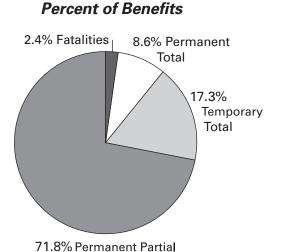
Number of Workers Covered by Workers' Compensation and Total Covered Wages, By State, 2006-2010 Table 3

								Ó	מיני אינים ו		6	
	2006	2007	2008	2009	2010	2009-2010 % Change	2006	2007	2008	2009	2010	2009-2010 2010 % Change
Alabama	1,797	1,823	1,808	1,702	1,679	-1.4	\$63,733	\$66,881	\$68,530	\$65,522	\$65,951	0.7
Alaska	291	294	298	297	299	8.0	11,829	12,576	13,344	13,664	14,062	2.9
Arizona	2,562	2,595	2,529	2,340	2,295	-1.9	101,587	106,805	106,477	99,095	98,288	-0.8
Arkansas	1,112	1,119	1,117	1,078	1,075	-0.3	35,512	37,684	38,472	37,932	38,156	9.0
California	15,256	15,395	15,248	14,377	14,171	-1.4	734,344	774,856	781,948	737,852	749,264	1.5
Colorado	2,190	2,241	2,247	2,137	2,110	-1.3	93,534	006'66	103,687	99,015	99,804	0.8
Connecticut	1,652	1,666	1,668	1,596	1,576	-1.2	90,531	96,705	97,322	92,085	93,616	1.7
Delaware	417	418	416	395	392	6.0-	19,259	19,727	19,720	18,811	19,023	1.1
District of Columbia 479	ımbia 479	487	491	482	483	0.2	31,082	33,345	34,822	34,195	35,214	3.0
Florida	7,498	7,504	7,177	6,689	6,612	-1.1	285,969	295,537	288,339	271,057	271,812	0.3
Georgia	3,838	3,891	3,831	3,592	3,543	-1.4	153,029	162,094	161,107	151,782	153,215	0.0
Hawaii	989	594	287	559	551	-1.4	21,527	22,751	23,213	22,355	22,130	-1.0
Idaho	631	648	640	009	592	-1.4	20,259	21,433	21,398	20,173	20,335	0.8
Illinois	5,733	5,782	5,741	5,452	5,397	-1.0	260,371	274,339	278,314	262,097	265,517	1.3
Indiana	2,845	2,858	2,823	2,655	2,655	0.0	103,263	106,460	107,620	100,758	103,299	2.5
Iowa	1,453	1,467	1,460	1,415	1,402	6.0-	49,539	52,115	53,625	52,217	53,097	1.7
Kansas	1,293	1,324	1,342	1,283	1,261	-1.7	45,708	48,589	50,775	48,760	48,552	-0.4
Kentucky	1,738	1,760	1,748	1,667	1,665	-0.1	60,527	63,553	64,742	62,585	63,736	1.8
Louisiana	1,776	1,837	1,853	1,813	1,796	6.0-	64,267	69,554	74,131	72,822	73,643	1.1
Maine	584	588	585	564	559	6.0-	19,387	20,272	20,854	20,270	20,502	1.1
Maryland	2,405	2,422	2,407	2,326	2,310	-0.7	107,102	112,688	114,895	112,865	114,291	1.3
Massachusetts	3,146	3,185	3,197	3,087	3,098	0.4	164,373	175,410	180,867	172,995	178,233	3.0
Michigan	4,085	4,031	3,904	3,608	3,596	-0.3	171,402	173,932	171,902	156,539	158,816	1.5
Minnesota	7637	259 6	2 631	2 521	705 C	90	707 011	117 268	120.038	112 650	116 707	0

Source: National Academy of Social Insurance estimates. See Appendix A.

Figure 3 Types of Disabilities in Workers' Compensation Cases with Cash Benefits, 2007





Cases classified as permanent partial include cases that are closed with lump sum settlements. Benefits paid in cases classified as permanent partial, permanent total and fatalites can include any temporary total disability benefits also paid in such cases. The data are from the first report from the NCCI Annual Statistical Bulletin.

Source: Annual Statistical Bulletin, NCCI 2009, Exhibits X and XII.

Permanent total disability cases are relatively rare. Permanent total disabilities, 8 account for less than one percent of all cases that involve cash benefits, and only 9 percent of total cash benefit payments (Figure 3). (Note that the base for these percentages does not include 'medical only' cases).

Permanent partial disability cases are much more common. PPD cases account for 38 percent of cases that involve any cash payments and for 72 percent of cash benefit payments.

States differ in their methods for determining whether a worker is entitled to permanent partial benefits, the degree of partial disability, and the amount of benefits to be paid (Barth and Niss 1999; Burton 2005). In some states, the permanent partial disability benefit begins when maximum medical improvement is achieved. In some states permanent disability benefits are simply the extension of temporary disability benefits until the disabled worker

returns to employment. Cash benefits for permanent partial disability are frequently limited to a specified duration or an aggregate dollar limit.

> "Permanent partial disabilities account for 38% of cases that involve any cash payments but 72% of all benefit payments."

### Methods Used by States to Calculate PPD Benefits

Methods for compensating permanent impairments fall into several broad categories (Barth 2004). About 44 jurisdictions use a schedule for at least some injury types—a list of body parts that are covered. Typically, a schedule appears in the underlying

Note that when WC claims are classified into discrete types, this is typically done by labeling the claim classification by the most severe type of disability benefit received. For example, a permanent partial disability beneficiary has typically also received temporary disability benefits, but the entire cost of cash benefits in the claim is ascribed to its permanent partial disability claim type.

statute and lists benefits to be paid for specific losses (e.g. the loss of a finger). These schedules include the upper and lower extremities and may also include one or both eyes. Most state schedules also include the loss of hearing in one or both ears. Injuries to the spine that are permanently disabling are typically not scheduled, nor are injuries to internal organs, head injuries, and occupational diseases.

For unscheduled conditions, the approaches used can be categorized into four methods:

- \*\*An impairment-based approach\*, used in 19 states, is most common. In approximately 14 of these states, a worker with an unscheduled permanent partial disability receives benefits based entirely on the degree of impairment with or without a formula that takes into account the personal characteristics of the injured worker. Any future earnings losses of the worker are not considered. States using the impairment-based approach are Alaska, Colorado, Connecticut, Delaware, Florida, Georgia, Hawaii, Indiana, Minnesota, Nevada, New Jersey, Oklahoma, South Dakota, Texas, Utah, Vermont, Virginia, Washington, and West Virginia.
- \*\*A loss-of-earning-capacity approach is used in 12 states. This approach links the benefit to the worker's ability to earn or to compete in the labor market and involves a forecast of the economic impact that the impairment will have on the worker's future earnings. States using the loss-of-earning-capacity approach are California, Idaho, Illinois, Iowa, Maryland, Mississippi, Missouri, Nebraska, New Mexico, New York, South Carolina, and Wyoming.
- A wage-loss approach, used in 10 states, pays benefits for the actual or ongoing earnings losses a worker incurs. States using the wage-loss approach are Arizona, Louisiana, Maine, Massachusetts, Michigan, New Hampshire, North Dakota, Ohio, Pennsylvania, and Rhode Island.
- A bifurcated approach, used in 10 jurisdictions, calculates benefits for permanent disability according to the injured worker's employment status at the time the condition has stabilized. If the worker has returned to employment with earnings at or near the pre-injury level, the

benefit is based on the degree of impairment. If the worker has not returned to employment, or has returned but at less than the pre-injury wage, the benefit maybe based on the degree of lost earning capacity. Jurisdictions using the *bifurcated approach* are Alabama, Arkansas, District of Columbia, Kansas, Kentucky, Montana, North Carolina, Oregon, Tennessee, and Wisconsin.

In Massachusetts, Montana, Rhode Island, and Oregon (since 2005), injured workers can qualify for two tracks of permanent partial disability benefits paid concurrently. One is designed to compensate for work disability and the other is designed to compensate for noneconomic loss (Burton 2008). The noneconomic loss benefits are known as impairment benefits in Oregon and as specific injuries in Massachusetts.

## Methods for Estimating Benefits Paid

Our estimates of workers' compensation benefits paid are based on three main sources: responses to the Academy's questionnaire from state agencies; paid benefits data from the National Association of Insurance Commissioners (NAIC) and data purchased from A.M. Best, a private company that specializes in collecting insurance data and rating insurance companies; and data from the National Council on Compensation Insurance. The estimates are complicated by the difficulty in obtaining accurate data on policies with deductibles and benefits paid by self-insured employers, and by the multiplicity of insurance arrangements covering workers' compensation across the states.

Data. The A.M. Best data used for this report show benefits paid in each state for 2006 through 2010. The data include information for all private carriers in every state and for eighteen of the twenty-five state funds, but do not include any information about the remaining state funds, self-insured employers, benefits paid under deductible plans, or benefits paid by special funds (discussed below).

The Academy's questionnaire on workers' compensation benefits and costs is distributed annually to state agencies overseeing the program. This year responses were received from 41 jurisdictions, for a response

rate of 80 percent. Appendix B shows the survey questionnaire and Appendix C summarizes the kinds of data each state reported. States had the most difficulty reporting amounts of benefits paid under deductible arrangements and benefits paid by self-insuring employers. The methods used by the NCCI to estimate benefits paid under deductible arrangements and by self-insuring employers are discussed in Appendices G and E. Medical benefits were estimated based on information from the National Council on Compensation Insurance (NCCI) for most states. Where NCCI data were not available, medical benefits were based on reports from the states like California, Delaware, Massachusetts, Michigan, Minnesota, North Dakota, Ohio, Pennsylvania, Washington, West-Virginia, Wisconsin, and Wyoming . Methods for estimating medical benefits are described in Appendix F.

State funds. Twenty-five states had state funds that paid workers' compensation benefits in 2010. These include the four exclusive state fund states (North Dakota, Ohio, Washington and Wyoming), West Virginia, where the former exclusive state fund continues to pay benefits, and 20 others in which the state funds compete with private carriers. In general, state funds are established by an act of the state legislature, have at least part of their board appointed by the governor, are exempt from federal taxes, and serve as an insurer of last resort. That is, the state funds provide workers' compensation insurance to employers who might have difficulty purchasing it privately. Not all state funds meet all these criteria, however. In some cases, it is not altogether clear whether an entity is a state fund, a private insurer, or a state entity that is self-insuring workers' compensation benefits for its own employees.

States were identified as having competitive state funds in previous editions of the NASI report if they were members of the American Association of State Compensation Insurance Funds (AASCIF 2010). Next year the Academy's Study Panel on Workers' Compensation Data plans to revisit the issue of identifying competitive state funds. For this report, we have generally identified competitive state funds in accordance to previous years with the exception of the State Fund Mutual of Minnesota, which is no longer considered a competitive state fund.

Self-insured employers. Employers are allowed to selfinsure for workers' compensation in all states except North Dakota and Wyoming, which require all employers to obtain insurance from their state funds. Ohio and Washington with exclusive state funds allow self-insurance in the state. In other states, employers may apply for permission from the regulatory authority to self-insure their risk for workers' compensation benefits if they prove they have the financial capacity to do so. Many large employers choose to self-insure. Some states permit groups of employers in the same industry or trade association to self-insure through group self-insurance. Benefits provided under group self-insurance are included with the self-insured benefits in this report. If states were unable to report benefits paid by self-insured employers, these amounts had to be estimated. The methods for estimating self-insured benefits are described in Appendix E.

Deductible policies. Under deductible policies written by private carriers or state funds, the insurer pays all of the workers' compensation benefits, but employers are responsible for reimbursing the insurer for those benefits up to a specified deductible amount. In return for accepting a policy with a deductible, the employer pays a lower premium. Deductibles may be written into an insurance policy on a per-injury basis, an aggregate basis, or a combination of a per-injury basis with an aggregate cap. States vary in the maximum deductibles they allow. The Academy's methods for estimating benefits paid under deductible plans are described in Appendix G.

"Second injury funds, which encourage the hiring of workers with disabilities, paid nearly \$1 billion in benefits each year from 2006 to 2010."

Second-injury funds. Second injury funds reimburse employers or insurance carriers for part of workers' compensation benefits in certain instances when an employee with a pre-existing impairment suffers a further work-related injury or illness. The employer is responsible for workers' compensation benefits only for the second injury or illness. The purpose of

second injury funds is to encourage employers to hire disabled workers. Second injury funds are financed through general state revenues or assessments on workers' compensation insurers and self-insuring employers. The data for second injury fund and special fund payments are included in Appendix Table J1 and nationally resulted in nearly \$1 billion of paid benefits in each year from 2006 to 2010.

For the last two years NASI has been reporting the second injury fund data, which in Table 4 are distributed across private carrier, state fund, and self-insurance benefits data according to the share of benefits paid by these three types of insurance arrangements in each state.

Guarantee funds. Many states also have one or more funds that guarantee payment of benefits in case private carriers or self-insured employers become insolvent. The guaranty funds are described in further detail in Appendix C. NASI has been including estimates of benefits paid by guaranty funds in the national estimates of total benefits since 2006. The data on benefits paid by guarantee funds from 2006 to 2010 are shown in Appendix Tables J2 and J3, and included in the national estimates reported in Table 4.

We have also revised our estimates of state benefit payments for 2006 to 2009 to include the payments from guarantee funds, as shown in Appendix Tables D1 to D4. The revised state data are incorporated into our estimates of state benefits payments in Table 7.

A detailed, state-by-state explanation of how the estimates in this report are produced is provided in *Sources and Methods: A Companion to Workers' Compensation: Benefits, Coverage, and Costs, 2010* on the Academy's website at www.nasi.org.

## National Trends in Cash and Medical Benefits

On the national level, total benefits (cash plus medical) were 0.7 percent lower in 2010 than in 2009. This decrease in total benefit payments was solely due to a decrease in medical benefits of 2.1 percent, because cash benefits increased by 0.7 percent (Table 1).

"During the current decade, medical benefits generally grew more rapidly than cash benefits, in 2010 medical benefits accounted for nearly 49% of all benefits paid during the year."

Trends in the share of total benefits attributed to medical benefits over the last 50 years are shown in Table 4 and Figure 4. Medical benefits accounted for approximately one-third of all benefit payments in the 1960s, dropped to around 30 percent during the 1970s until reaching a low of 29.0 percent of benefit payments in 1980. Since then, the share of benefit payments going to medical benefits has increased steadily: to 39.7 percent of all benefits in 1990, 43.9 percent in 2000 and 50.2 percent in 2008. In 2010 the share of medical benefits declined slightly to 48.8 percent of total benefits.

## National Trends in Benefits by Insurance Provider

Workers' compensation benefits are paid by private insurance carriers, by state or federal workers' compensation funds, or by self-insured employers. Table 4 provides data on workers' compensation benefits by type of insurer for 1960 through 2010.

"Private insurance carriers remained the largest source of workers' compensation benefits in 2010, accounting for 53% of benefits paid.

Other sources of benefits were self-insured employers (23.3%), state funds (17.3%) and federal funds (6.4%)."

Private insurance carriers remained the largest source of workers' compensation benefits in 2010, accounting for slightly more than half (53.0%) of all benefits paid. Private carriers currently are allowed to sell workers' compensation insurance in all but four states that have exclusive state funds—Ohio, North

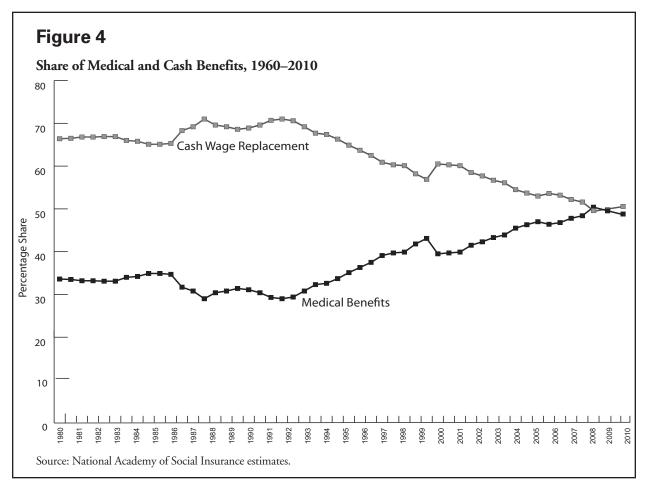
**Table 4**Workers' Compensation Benefits, by Type of Insurer and Share of Medical Benefits, 1960–2010 (in millions)

	Total	Benefits	Private C	Carriers(a)	State F		Fede	ral(b)	Self-In	sured	N	1edical
		Percent		Percent		Percent		Percent		Percent		Percent
Year	Total	Change	Total	Share	Total	Share	Total	Share	Total	Share	Total	Medical
1960	\$1,295	11.0	\$810	62.5	\$264	20.4	\$61	4.7	\$160	12.4	\$435	33.6
1961	1,374	6.1	851	61.9	284	20.7	63	4.6	176	12.8	460	33.5
1962	1,489	8.4	924	62.1	305	20.5	66	4.4	194	13.0	495	33.2
1963	1,583	6.3	988	62.4	318	20.1	70	4.4	207	13.1	525	33.2
1964	1,708	7.9	1,070	62.6	339	19.8	73	4.3	226	13.2	565	33.1
1965	1,813	6.1	1,124	62.0	371	20.5	74	4.1	244	13.5	600	33.1
1966	2,000	10.3	1,239	62.0	404	20.2	82	4.1	275	13.8	680	34.0
1967	2,190	9.5	1,363	62.2	430	19.6	94	4.3	303	13.8	750	34.2
1968	2,376	8.5	1,482	62.4	451	19.0	105	4.4	338	14.2	830	34.9
1969	2,634	10.9	1,641	62.3	486	18.5	121	4.6	386	14.7	920	34.9
1970	3,030	15.0	1,843	60.8	497	16.4	258	8.5	432	14.3	1,050	34.7
1971	3,563	17.6	2,005	56.3	549	15.4	549	15.4	460	12.9	1,130	31.7
1972	4,062	14.0	2,179	53.6	633	15.6	746	18.4	504	12.4	1,250	30.8
1973	5,104	25.7	2,514	49.3	720	14.1	1,278	25.0	592	11.6	1,480	29.0
1974	5,781	13.3	2,971	51.4	823	14.2	1,263	21.8	724	12.5	1,760	30.4
1975	6,598	14.1	3,422	51.9	957	14.5	1,367	20.7	852	12.9	2,030	30.8
1976	7,585	15.0	3,976	52.4	1,088	14.3	1,482	19.5	1,039	13.7	2,380	31.4
1977	8,629	13.8	4,629	53.6	1,209	14.0	1,541	17.9	1,250	14.5	2,680	31.1
1978	9,796	13.5	5,256	53.7	1,221	12.5	1,822	18.6	1,497	15.3	2,980	30.4
1979	12,027	22.8	6,157	51.2	1,709	14.2	2,313	19.2	1,848	15.4	3,520	29.3
1980	13,618	13.2	7,029	51.6	1,797	13.2	2,533	18.6	2,259	16.6	3,947	29.0
1981	15,054	10.5	7,876	52.3	2,017	13.4	2,578	17.1	2,583	17.2	4,431	29.4
1982	16,408	9.0	8,647	52.7	2,191	13.4	2,577	15.7	2,993	18.2	5,058	30.8
1983	17,575	7.1	9,265	52.7	2,443	13.9	2,618	14.9	3,249	18.5	5,681	32.3
1984	19,686	12.0	10,610	53.9	2,754	14.0	2,651	13.5	3,671	18.6	6,424	32.6
1985	22,217	12.9	12,341	55.5	3,059	13.8	2,685	12.1	4,132	18.6	7,498	33.7
1986	24,613	10.8	13,827	56.2	3,554	14.4	2,694	10.9	4,538	18.4	8,642	35.1
1987	27,317	11.0	15,453	56.6	4,084	15.0	2,698	9.9	5,082	18.6	9,912	36.3
1988	30,703	12.4	17,512	57.0	4,687	15.3	2,760	9.0	5,744	18.7	11,507	37.5
1989	34,316	11.8	19,918	58.0	5,205	15.2	2,760	8.0	6,433	18.7	13,424	39.1
1990	38,237	11.4	22,222	58.1	5,873	15.4	2,893	7.6	7,249	19.0	15,187	39.7
1991	42,187	10.3	24,515	58.1	6,713	15.9	2,998	7.1	7,962	18.9	16,832	39.9
1992	44,660	5.9	24,030	53.8	7,829	17.5	3,158	7.1	9,643	21.6	18,664	41.8
1993	42,925	-3.9	21,773	50.7	8,105	18.9	3,189	7.4	9,857	23.0	18,503	43.1
1994	43,482	1.3	21,391	49.2	7,398	17.0	3,166	7.3	11,527	26.5	17,194	39.5
1995	42,122	-3.1	20,106	47.7	7,681	18.2	3,103	7.4	11,232	26.7	16,733	<i>39.7</i>
1996	41,960	-0.4	21,024	50.1	8,042	19.2	3,066	7.3	9,828	23.4	16,739	39.9
1997	41,971	0.0	21,676	51.6	7,157	17.1	2,780	6.6	10,357	24.7	17,397	41.5
1998	43,987	4.8	23,579	53.6	7,187	16.3	2,868	6.5	10,354	23.5	18,622	42.3
1999	46,313	5.3	26,383	57.0	7,083	15.3	2,862	6.2	9,985	21.6	20,055	43.3
2000	47,699	3.0	26,874	56.3	7,388	15.5	2,957	6.2	10,481	22.0	20,933	43.9
2001	50,827	6.6	27,905	54.9	8,013	15.8	3,069	6.0	11,839	23.3	23,137	45.5
2002	52,297	2.9	28,085	53.7	9,139	17.5	3,154	6.0	11,920	22.8	24,203	46.3
2003	54,739	4.7	28,395	51.9	10,442	19.1	3,185	5.8	12,717	23.2	25,733	47.0
2004	56,149	2.6	28,632	51.0	11,146	19.9	3,256	5.8	13,115	23.4	26,079	46.4
2005	57,067	1.6	29,039	50.9	11,060	19.4	3,258	5.7	13,710	24.0	26,361	46.2
2006	54,896	-3.8	27,946	50.9	10,555	19.2	3,270	6.0	13,125	23.9	26,206	47.7
2007	55,660	1.4	28,658	51.5	10,317	18.5	3,340	6.0	13,344	24.0	26,627	47.8
2008	57,748	3.8	30,129	52.2	10,429	18.1	3,424	5.9	13,766	23.8	29,012	50.2
2009	57,946	0.3	30,384	52.4	10,080	17.4	3,543	6.1	13,940	24.1	28,706	49.5
2010	57,542	-0.7	30,524	53.0	9,953	17.3	3,672	6.4	13,393	23.3	28,091	48.8
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#### **Table 4 continued**

- (a) Estimated benefits paid under deductible provisions are included beginning in 1992. Benefits are payments in the calendar year to injured workers and to providers of their medical care.
- (b) In all years, federal benefits includes those paid under the Federal Employees' Compensation Act for civilian employees and the portion of the Black Lung benefit program that is financed by employers and paid through the federal Black Lung Disability Trust fund. In years before 1997, federal benefits also include the other part of the Black Lung program that is financed solely by federal funds. In 1997–2010, federal benefits also include a portion of employer-financed benefits under the Longshore and Harbor Workers' Compensation Act that are not reflected in state data—namely, benefits paid by self-insured employers and by special funds under the LHWCA. See Appendix H for more information about federal programs.

Source: National Academy of Social Insurance estimates. See Appendices B and H. SSA's Annual Statistical Supplement, 2011 and DOL, 2012



Dakota, Washington, and Wyoming. As shown in Table 4, the share of benefits paid by private carriers has varied between 47.7 and 62.6 percent since 1960.<sup>9</sup>

Self-insured employers were the second largest source of workers' compensation benefits, accounting for approximately one-fourth (23.3%) of all benefits paid in 2010. The share of benefits accounted for by self-insured employers has varied between 11.6 and

<sup>9</sup> The West Virginia exclusive state fund was no longer selling policies in 2010 but was still paying benefits in 2010 for policies sold in previous years.

26.7 percent since 1960. Since 2000, the share has been relatively stable, varying from 22 to 24 percent.

State funds accounted for 17.3 percent of workers' compensation benefits in 2010, a decrease of only 0.1 percentage points from 2009. The share of benefits paid by state funds has varied from 12.5 percent to 20.7 percent since 1960.

Federal funds accounted for 6.4 percent of all workers compensation payments in 2010, a slight increase from 6.1 percent in 2009. Payments of workers' compensation benefits by federal funds have varied between 4.1 and 25.0 percent of all benefit payments since 1960.

The benefits as of 2010 include payments under FECA for civilian employees, the portion of the Black Lung benefit program financed by employers and paid through the federal Black Lung Disability Trust Fund, benefits under the Longshore and Harbor Workers' Compensation Act paid by self-insured employers, and payments by special funds under that Act. More details about these federal programs are in Appendix H.

In the 1960s, the federal data included only payments under the Federal Employees Compensation Act (FECA). The Black Lung program started paying benefits in 1970, and by 1973 nearly doubled its payout to about \$1 billion, which was the sole cause of the large increase in federal share of benefits in the early 1970s. The federal share declined from 25.0 percent of all benefit payments in 1973 to 7.4 percent in 1995 to 6.4 percent in 2010.

## National Trends in Deductibles and Self Insurance

Under deductible policies written by private carriers or state funds employers are required to reimburse insurers for benefits up to a specified deductible amount, or pay claims themselves up to the deductible amount. Table 5 shows the estimated dollar amount of benefits that employers paid under

"In 2010, employer payments under deductibles totaled \$8.2 billion, or 14.2% of total benefits paid."

deductible provisions with private carriers or state funds.

In 2010, employer payments under deductibles totaled \$8.2 billion, or 14.2 percent of total benefits paid. Prior to the 1990s, policies with large deductibles were not in vogue, but their popularity grew in the mid-1990s. In 1992, benefits under deductible policies totaled \$1.3 billion, or about 2.8 percent of total benefits (Table 5). By 2000 they had risen to \$6.2 billion, or 13.0 percent of total benefits.

Employers who have policies with deductibles are, in effect, self-insuring up to the amount of the deductible. Adding deductibles to payments made by self-insured employers shows the share of the total workers' compensation market for which employers are assuming the primary financial risk (as shown in Column (9) of Table 6).

The share of total benefits paid by employers increased from 19.0 percent in 1990 to 37.9 percent in 2003, and has remained fairly stable since. In 2010 the employers' share of paid benefits was 37.5 percent. The increase in employers' share of workers' compensation payments over the last two decades is entirely offset by a decrease in the share of private carrier payments (net of deductibles) from 58.1 percent of total benefits in 1990 to 39.6 percent 2010 (column (3) of Table 6).

"The employers' share of workers' compensation benefits has increased by 18.5 percentage points since 1990, while the share paid by private insurance carriers has decreased by the same amount."

The growth in self-insurance and deductible policies in the early 1990s, as well as the downturn in self-insurance later in the 1990s, probably reflect dynamics of the insurance market that altered the relative cost to employers of purchasing private insurance vis-à-vis self-insuring as well as changes in underlying system costs. As medical costs increased rapidly in the 1990's more employers opted to self-insure to avoid cost-shifting from the residual

Table 5

Estimated Employer-Paid Benefits under Deductible Provisions for Workers' Compensation, 1992–2010 (in millions)

Year	Total	Private Carriers	State Funds	Deductibles as a % of Total Benefits
1992	\$1,250	\$1,250	*	2.8
1993	2,027	2,008	\$ 19	4.7
1994	2,834	2,645	189	6.5
1995	3,384	3,060	324	8.0
1996	3,716	3,470	246	8.9
1997	3,994	3,760	234	9.5
1998	4,644	4,399	245	10.6
1999	5,684	5,452	232	12.3
2000	6,201	5,931	270	13.0
2001	6,388	6,085	303	12.6
2002	6,922	6,511	411	13.2
2003	8,020	7,547	474	14.7
2004	7,645	7,134	510	13.6
2005	7,798	7,290	508	13.7
2006	7,575	7,052	524	13.8
2007	7,854	7,327	527	14.1
2008	7,959	7,447	512	13.8
2009	8,013	7,507	506	13.8
2010	8,197	7,716	481	14.2

<sup>\*</sup> Negligible

Note: Data on deductible benefits were available from seven states. Five states do not allow policies with deductibles. For twelve states data were computed by subtracting various components from total benefit figures provided. For the other twenty-six states and the District of Columbia, deductible benefits were calculated using a ratio of the manual equivalent premiums.

market. In response, insurers began offering largedeductible policies as a way to compete with self-insurance even though, in many cases, insurers were providing first dollar claims administration while receiving less than a first dollar premium.

There are several factors influencing employers' decisions to purchase insurance or to self-insure. One is that workers' compensation losses usually involve a high frequency of low-cost claims and a low frequency of high-cost claims. This characteristic of workers' compensation allows large employers to estimate the annual cost of smaller claims fairly accurately so their cost can be budgeted should the employer decide to self-insure, while the employer can protect itself from

the more unpredictable large claims through some form of "excess" insurance arrangement.

Residual markets, which in many states are the market of last resort for employers unable to secure workers' compensation coverage, can also influence decisions about whether to purchase insurance or self-insure. This is especially true in markets where the regulated price for such coverage is below market and employers in the private insurance market are subject to higher premiums in order to fund insurer assessments for residual market losses. In this case, employers may opt to self-insure to avoid cost shifting from the residual market. The same may be true in states where the state fund is the market of last resort.

**Table 6**Total Amount and Percentage Distribution of Workers' Compensation Benefit Payments by Type of Insurer, 1990–2010

					P	ercentage Dis	tribution				
Year	Total Benefits (in millions)	All	Private Carr Deductibles <sup>a</sup>	All without	All	State Fur Deductibles <sup>a</sup>	All without	Federal <sup>b</sup>	Self- Insured	Total Employer Paid (Self- Insured plus Deductibles)	- Total
		(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)=(2)+(5)+(8)	(10)= (1)+(4) +(7)+(8)
1990	\$38,237	58.1	*	58.1	15.4	*	15.4	7.6	19.0	19.0	100.0
1991	42,187	58.1	*	58.1	15.9	*	15.9	7.1	18.9	18.9	100.0
1992	44,660	53.8	2.8	51.0	17.5	*	17.5	7.1	21.6	24.4	100.0
1993	42,925	50.7	4.7	46.0	18.9	*	18.9	7.4	23.0	27.6	100.0
1994	43,482	49.2	6.1	43.1	17.0	0.4	16.6	7.3	26.5	33.0	100.0
1995	42,122	47.7	7.3	40.5	18.2	0.8	17.5	7.4	26.7	34.7	100.0
1996	41,960	50.1	8.3	41.8	19.2	0.6	18.6	7.3	23.4	32.3	100.0
1997	41,971	51.6	9.0	42.7	17.1	0.6	16.5	6.6	24.7	34.2	100.0
1998	43,987	53.6	10.0	43.6	16.3	0.6	15.8	6.5	23.5	34.1	100.0
1999	46,313	57.0	11.8	45.2	15.3	0.5	14.8	6.2	21.6	33.8	100.0
2000	47,699	56.3	12.4	43.9	15.5	0.6	14.9	6.2	22.0	35.0	100.0
2001	50,827	54.9	12.0	42.9	15.8	0.6	15.2	6.0	23.3	35.9	100.0
2002	52,297	53.7	12.4	41.3	17.5	0.8	16.7	6.0	22.8	36.0	100.0
2003	54,739	51.9	13.8	38.1	19.1	0.9	18.2	5.8	23.2	37.9	100.0
2004	56,149	51.0	12.7	38.3	19.9	0.9	18.9	5.8	23.4	37.0	100.0
2005	57,067	50.9	12.8	38.1	19.4	0.9	18.5	5.7	24.0	37.7	100.0
2006	54,896	50.9	12.8	38.1	19.2	1.0	18.3	6.0	23.9	37.7	100.0
2007	55,660	51.5	13.2	38.3	18.5	0.9	17.6	6.0	24.0	38.1	100.0
2008	57,748	52.2	12.9	39.3	18.1	0.9	17.2	5.9	23.8	37.6	100.0
2009	57,946	52.4	13.0	39.5	17.4	0.9	16.5	6.1	24.1	37.9	100.0
2010	57,542	53.0	13.4	39.6	17.3	0.8	16.5	6.4	23.3	37.5	100.0

<sup>\*</sup> Negligible

Source: National Academy of Social Insurance estimates based on Tables 4 and 6.

There are similar incentives for employers to purchase insurance policies with large deductibles, which typically involve initial payments of benefits up to a specified amount by the insurance carriers, and then the employer reimburses the carrier for all of those payments. As Burton (2004, 11-12) notes, "the amount reimbursed by the employer is not con-

sidered insurance for purposes of assessments for the residual market or other special funds in most states."

Other factors affecting an employer's decision to selfinsure include claims administration and tax considerations. An employer may decide to fully or

<sup>(</sup>a) The percentage of total benefits paid by employers under deductible provisions with this type of insurance.

<sup>(</sup>b) Reflects federal benefits included in Table 4.

partially self-insure to be able to administer its own claims or be free to select a claims administrator other than the insurer. On the other hand, the timing of tax advantages can make the purchase of insurance attractive. Employers can take an immediate tax deduction for premiums they pay for insurance, but when they self-insure, tax deductions accrue only later as they pay claims.

#### **State Trends in Benefits**

Table 7 shows annual changes in benefit payments by state between 2006 and 2010. Between 2009 and 2010 benefit payments declined in 26 jurisdictions and increased in 25. The largest decline occurred in Michigan, down 15.8 percent. Florida and Utah also experienced double-digit decreases in benefits paid. The largest increase occurred in Wyoming, where benefits were up by 21.3 percent. No other states came close to this increase, although New Mexico and New York both experienced more than 10 percent increases in benefits paid.

Benefits, and how they are recorded and reported, may vary within a state from year to year for many reasons, including:

- Changes in workers' compensation statutes, court rulings, or administrative procedures;
- Changes in the mix of occupations or industries:
- Changes in employment;
- Changes in wage rates to which benefit levels are linked;
- Changes in the costs of medical care;
- Changes in the number and severity of injuries and illnesses for other reasons (for example, a large industrial accident);
- Changes in reporting procedures, or the criteria for classifying lump-sum settlements as medical or indemnity payments; and
- Changes in numbers of workers misclassified as independent contractors.

## State Benefits by Insurance Providers

The shares of workers' compensation benefits paid by each type of insurer vary considerably among the states (Table 8). In the four states with exclusive state funds (excluding West Virginia), the shares accounted for by the state funds vary from nearly 100 percent in North Dakota and Wyoming (states that do not allow self-insurance) to approximately 80 percent in Ohio and Washington (states that allow qualifying employers to self-insure). Private carriers account for less than one percent of benefits paid in these states.<sup>10</sup>

"In the twenty states with competitive state funds in 2010, the percentage of benefits accounted for by the state funds varied from less than 6% to nearly 60%."

In the twenty states with competitive state funds in 2010, the percentage of benefits accounted for by the state funds varied from less than 6 percent in South Carolina to nearly 60 percent in Idaho. The share of self-insurance in states that allow self-insured employers in the state varies widely by state, ranging from highs of 51.3 percent in Alabama to lows of 3.9 percent in South Dakota. (North Dakota and Wyoming do not allow self-insurance.) This wide variation in the share of self-insurance reflects the complex nature of the workers' compensation insurance market including whether or not group self-insurance is permitted.

In 2009, West Virginia abolished its state fund and allowed both private insurance carriers and self-insurance to cover workers' compensation losses. During 2010, the state fund still accounted for 77.5 percent of all benefit payments, in large part because workers with injuries that occurred prior to 2009 were still receiving benefits from the state fund in that year.

<sup>10</sup> The payment of workers' compensation benefits by private carriers in states with exclusive state funds may be due to policies sold to employers in those states providing multi-state coverage and also because some exclusive state funds may be restricted to providing workers' compensation benefits for the state in which the exclusive state fund issues the policy and might not be permitted to offer employers liability coverage, federal Longshore and Harbor Workers' Compensation Act coverage, or excess coverage for authorized self-insurers.

			Total Benefits				Percent Change	Change	
State	2006	2007	2008	2009	2010	2006-2007	2007-2008	2008-2009	2009-2010
Alabama	\$624,685	\$635,315	\$656,607	\$625,755	\$629,069	1.7	3.4	-4.7	0.5
Alaska	197,580	201,477	219,163	221,021	221,327	2.0	8.8	0.8	0.1
Arizona	647,463	806,969	691,384	658,115	698,459	2.6	8.0-	-4.8	6.1
Arkansas	202,006	213,337	227,769	215,067	204,066	5.6	8.9	-5.6	-5.1
California	10,017,099	9,608,884	9,529,739	9,392,835	9,396,443	-4.1	8.0-	-1.4	0.0
Colorado	865,585	837,004	873,643	836,238	809,707	-3.3	4.4	-4.3	-3.2
Connecticut	719,758	734,425	785,133	842,840	788,701	2.0	6.9	7.3	-6.4
Delaware	238,638	212,805	218,665	206,145	211,921	-10.8	2.8	-5.7	2.8
District of Columbia	98,016	97,564	95,100	104,672	105,636	-0.5	-2.5	10.1	6.0
Florida	2,928,460	2,857,930	2,748,092	2,820,747	2,526,580	-2.4	-3.8	2.6	-10.4
Georgia	1,397,771	1,499,306	1,596,051	1,527,428	1,410,753	7.3	6.5	-4.3	-7.6
Hawaii	242,685	247,294	245,763	244,375	242,400	1.9	9.0-	9.0-	-0.8
Idaho	228,764	244,451	260,881	257,868	245,622	6.9	6.7	-1.2	7.4-7
Illinois	2,447,104	2,735,393	2,915,102	3,025,334	2,916,379	11.8	9.9	3.8	-3.6
Indiana	563,190	598,973	625,721	598,048	603,193	6.4	4.5	4.4	6.0
Iowa	487,985	493,953	552,913	548,605	554,973	1.2	11.9	-0.8	1.2
Kansas	391,381	395,836	416,157	416,157	407,776	1.1	5.1	0.0	-2.0
Kentucky	643,192	646,066	695,746	686,142	650,701	0.4	7.7	-1.4	-5.2
Louisiana	718,542	732,788	854,848	831,997	839,821	2.0	16.7	-2.7	6.0
Maine	289,994	276,880	339,959	260,526	253,872	-4.5	22.8	-23.4	-2.6
Maryland	788,874	829,914	935,948	895,905	953,533	5.2	12.8	-4.3	6.4
Massachusetts	831,373	829,449	854,351	952,081	1,013,343	-0.2	3.0	11.4	6.4
Michigan	1,470,574	1,511,282	1,407,282	1,509,881	1,271,892	2.8	6.9-	7.3	-15.8
Minnesota	944,448	958,984	1,025,671	1,072,122	1,038,272	1.5	7.0	4.5	-3.2
Mississippi	320,294	328,234	339,531	321,771	337,633	2.5	3.4	-5.2	4.9
Missouri	828,370	867,153	906,587	849,798	811,427	4.7	4.5	-6.3	-4.5
Montana	228,347	236,993	244,114	246,233	266,850	3.8	3.0	6.0	8.4
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Nevada	417,285	415,085	424,729	431,037	429,686	-0.5	2.3	1.5	-0.3
New Hampshire	225,161	208,437	242,567	238,998	237,168	-7.4	16.4	-1.5	-0.8
New Jersey	1,729,356	1,858,396	1,947,752	1,986,725	1,999,801	7.5	4.8	2.0	0.7
New Mexico	237,551	238,881	238,649	246,325	276,697	9.0	-0.1	3.2	12.3
New York	3,520,913	3,597,478	3,899,911	4,136,960	4,606,295	2.2	8.4	6.1	11.3
North Carolina	1,315,059	1,342,188	1,468,254	1,399,275	1,316,291	2.1	9.4	-4.7	-5.9
North Dakota	81,297	91,741	105,837	110,526	114,985	12.8	15.4	4.4	4.0
Ohio	2,383,544	2,478,080	2,490,080	2,353,384	2,268,515	4.0	0.5	-5.5	-3.6
Oklahoma	643,817	669,863	740,434	785,218	845,726	4.0	10.5	0.9	7.7
Oregon	576,778	593,872	605,897	616,869	633,054	3.0	2.0	1.8	2.6
Pennsylvania	2,758,784	2,803,819	2,902,243	2,901,339	2,909,341	1.6	3.5	0.0	0.3
Rhode Island	150,999	153,954	159,550	160,964	160,105	2.0	3.6	6.0	-0.5
South Carolina	918,650	895,503	917,419	891,830	891,283	-2.5	2.4	-2.8	-0.1
South Dakota	109,030	119,567	111,184	93,578	100,348	6.7	-7.0	-15.8	7.2
Tennessee	815,808	751,615	782,894	781,426	782,091	6.7-	4.2	-0.2	0.1
Texas	1,416,287	1,421,056	1,530,772	1,606,267	1,483,708	0.3	7.7	4.9	-7.6
Utah	261,896	286,757	303,223	289,952	257,522	9.5	5.7	4.4	-11.2
Vermont	126,287	120,382	128,305	144,565	138,370	-4.7	9.9	12.7	4.3
Virginia	782,062	886,657	932,492	858,665	790,025	13.4	5.2	6.7-	-8.0
Washington	1,927,431	1,995,744	2,192,885	2,312,186	2,308,748	3.5	6.6	5.4	-0.1
West Virginia	433,258	356,717	319,877	341,717	362,375	-17.7	-10.3	6.8	6.0
Wisconsin	1,043,244	1,094,685	1,156,519	1,114,089	1,070,534	4.9	5.6	-3.7	-3.9
Wyoming	117,324	126,996	137,133	134,835	163,497	8.2	8.0	-1.7	21.3
Non-federal total	51,626,040	52,319,690	54,324,252	54,403,728	53,869,581	1.3	3.8	0.1	-1.0
Federala	3,270,322	3,339,892	3,423,825	3,542,605	3,672,058	2.1	2.5	3.5	3.7
Federal employees <sup>b</sup>	2,454,861	2,586,700	2,676,370	2,763,885	2,889,321	5.4	3.5	3.3	4.5
TOTAL	\$54,896,361	\$55,659,582	\$57,748,078	\$57,946,333	\$57,541,639	1.4	3.8	0.3	-0.7

Benefits are payments in the calendar year to injured workers and to providers of their medical care

Note: Data source for each state is described in details in Appendix C.

Source: National Academy of Social Insurance estimates based on data from state agencies, A.M. Best, National Association of Insurance Commissioners (NAIC), the U.S. Department of Labor and the Social Security Administration.

Includes federal benefits as included in Table 8.

Included in the Federal benefits total.

Workers' Compensation Benefits\* by Type of Insurer and Medical Benefits, by State, 2010 (in thousands)

	Private	Private Carriers	State	State Funds	Self-]	Self-Insured <sup>b</sup>			Percent
State	Benefits P	Benefits Percent Share	Benefits P	Benefits Percent Share	Benefits	Benefits Percent Share	- Total <sup>h</sup>	Medical	Medical <sup>c</sup>
Alabama	\$306,069	48.7	€		\$323,000	51.3	\$629,069	\$434,057	69.0
Alaska	157,954	71.4			63,373	28.6	221,327	145,190	65.6
Arizona	270,785	38.8	289,294	41.4	138,379	19.8	698,459	437,235	62.6
Arkansas	144,530	70.8			59,536	29.2	204,066	131,418	64.4
California	4,969,994	52.9	1,559,424	16.6	2,867,026	30.5	9,396,443	5,147,490	54.8
Colorado	230,753	28.5	379,507	46.9	199,448	24.6	809,707	408,902	50.5
Connecticut	614,116	77.9			174,585	22.1	788,701	357,282	45.3
Delaware	176,335	83.2			35,586	16.8	211,921	122,914	58.0
District of Columbia	78,084	73.9			27,552	26.1	105,636	35,916	34.0
Florida	1,853,387	73.4			673,194	26.6	2,526,580	1,659,963	65.7
Georgia	1,066,794	75.6			343,959	24.4	1,410,753	708,198	50.2
Hawaii	128,738	53.1	30,678	12.7	82,983	34.2	242,400	105,444	43.5
Idaho	83,472	34.0	147,143	59.9	15,007	6.1	245,622	154,496	62.9
Illinois	2,236,795	7.97			679,584	23.3	2,916,379	1,385,280	47.5
Indiana	541,115	89.7			62,079	10.3	603,193	431,886	71.6
Iowa	443,137	79.8			111,836	20.2	554,973	301,905	54.4
Kansas	286,168	70.2			121,608	29.8	407,776	223,461	54.8
Kentucky	378,232	58.1	83,692	12.9	188,777	29.0	650,701	370,249	56.9
Louisiana	443,247	52.8	122,267	14.6	274,308	32.7	839,821	446,550	53.2
Maine	83,172	32.8	95,185	37.5	75,515	29.7	253,872	124,143	48.9
Maryland	518,960	54.4	174,238	18.3	260,335	27.3	953,533	435,765	45.7
Massachusetts	742,489	73.3			270,854	26.7	1,013,343	345,406	34.1
Michigan	857,877	67.4			414,014	32.6	1,271,892	508,456	40.0
Minnesota <sup>e</sup>	735,482	70.8	52,213	5.0	250,577	24.1	1,038,272	532,844	51.3
Mississippi	211,942	62.8			125,691	37.2	337,633	211,021	62.5
Missouri	520,758	64.2	83,274	10.3	207,396	25.6	811,427	451,153	55.6
Montana	82,520	30.9	141,102	52.9	43,229	16.2	266,850	160,377	60.1
Nebraska	250,734	80.1			62,332	19.9	313,066	191,283	61.1
Nevada	296,096	68.9			133,589	31.1	429,686	187,773	43.7
New Hampshire	188,435	79.5			48,733	20.5	237,168	145,147	61.2

Table 8

New Jersey	1,612,081	9.08			387,719	19.4	1,999,801	993,883	49.7
New Mexico	162,654	58.8	28,858	10.4	85,185	30.8	276,697	161,591	58.4
New York	2,008,174	43.6	1,186,354	25.8	1,411,767	30.6	4,606,295	1,714,649	37.2
North Carolina	1,018,912	77.4			297,379	22.6	1,316,291	581,800	44.2
North Dakota <sup>a</sup>	86	0.1	114,887	6.66			114,985	68,737	59.8
Ohio <sup>a</sup>	12,674	9.0	1,859,505	82.0	396,336	17.5	2,268,515	963,557	42.5
Oklahoma	437,041	51.7	252,036	29.8	156,649	18.5	845,726	373,811	44.2
Oregon	228,089	36.0	296,946	46.9	108,019	17.1	633,054	320,959	50.7
Pennsylvania	2,047,166	70.4	257,511	8.9	604,664	20.8	2,909,341	1,290,603	44.4
Rhode Island	59,605	37.2	76,345	47.7	24,155	15.1	160,105	53,155	33.2
South Carolina	664,303	74.5	52,928	5.9	174,052	19.5	891,283	385,034	43.2
South Dakota	96,450	96.1			3,898	3.9	100,348	61,915	61.7
Tennessee	619,133	79.2			162,958	20.8	782,091	444,228	56.8
Texas	846,957	57.1	345,078	23.3	291,673	19.7	1,483,708	881,323	59.4
Utah	90,06	35.0	124,522	48.4	42,924	16.7	257,522	176,660	9.89
Vermont	120,570	87.1			17,801	12.9	138,370	71,814	51.9
Virginia	611,732	77.4			178,294	22.6	790,025	472,435	59.8
Washington <sup>a</sup>	20,608	6.0	1,756,529	76.1	531,612	23.0	2,308,748	760,998	33.0
West Virginia <sup>d</sup>	39,603	10.9	280,937	77.5	41,835	11.5	362,375	89,994	24.8
Wisconsin	929,001	8.98			141,533	13.2	1,070,534	748,242	6.69
Wyominga	1,364	8.0	162,133	99.2			163,497	81,951	50.1
Non-federal total	\$30,524,460	26.7	\$9,952,585	18.5	\$13,392,536	24.9	\$53,869,581	\$26,998,546	50.1
Federal <sup>‡</sup>							3,672,058	1,092,904	29.8
Federal employees8	ρÿ						2,889,321	912,882	31.6
TOTAL							\$57,541,639	\$28,091,449	48.8

Benefits are payments in the calendar year to injured workers and to providers of their medical care.

some employers doing business in states with exclusive state funds may need to obtain coverage from private carriers under the USL &HW act or employers liability coverage which the States with exclusive funds (Ohio, North Dakota, Washington, and Wyoming) may have small amounts of benefits paid in the private carrier category. This results from the fact that state fund is not authorized to provide. In addition, private carriers may provide excess compensation coverage in some of these states. r,

Self-insurance includes individual self-insurers and group self-insurance. Ъ.

For further details see Appendix C1

West Virginia completed the transition from monopolistic state fund to competitive insurance status on July 1, 2008. . q

Minnesota's state fund is the Assigned Risk Plan and Uninsured Employer Fund. i. r.

Federal benefits include: those paid under the Federal Employees' Compensation Act for civilian employees; the portion of the Black Lung benefit program that is financed by employers; and a portion of benefits under the Longshore and Harbor Workers' Compensation Act that are not reflected in state data, namely, benefits paid by self-insured employers and by special funds under the LHWCA. See Appendix H for more information about federal programs.

Included in the Federal benefits total.

These data may not include second injury fund for all states and may be an understatement of total payments data. ᆄᇸ

Source: National Academy of Social Insurance estimates based on data received from state agencies, the U.S. Department of Labor, A.M. Best, and the National Council on Compensation Insurance.

Table 9

Medical, Cash and Total Benefits, by state,  $2009\text{-}2010^{\text{a}}$  (in thousands)

		2009			2010		2009-20	2009-2010 Percent Change	hange
State	Medical	Cash	Total	Medical	Cash	Total	Medical	Cash	Total
Alabama	\$423,010	\$202,744	\$625,755	\$434,057	\$195,011	\$629,069	2.6	-3.8	0.5
Alaska	146,758	74,263	221,021	145,190	76,136	221,327	-1.1	2.5	0.1
Arizona	408,690	249,426	658,115	437,235	261,224	698,459	7.0	4.7	6.1
Arkansas	141,514	73,553	215,067	131,418	72,647	204,066	-7.1	-1.2	-5.1
California	5,095,538	4,297,297	9,392,835	5,147,490	4,248,954	9,396,443	1.0	-1.1	0.0
Colorado	419,792	416,447	836,238	408,902	400,805	809,707	-2.6	-3.8	-3.2
Connecticut	366,635	476,205	842,840	357,282	431,420	788,701	-2.6	-9.4	-6.4
Delaware	113,586	92,559	206,145	122,914	89,007	211,921	8.2	-3.8	2.8
District of Columbia	39,252	65,420	104,672	35,916	69,720	105,636	-8.5	9.9	0.0
Florida	1,816,561	1,004,186	2,820,747	1,659,963	866,617	2,526,580	-8.6	-13.7	-10.4
Georgia	754,549	772,879	1,527,428	708,198	702,555	1,410,753	-6.1	-9.1	-7.6
Hawaii	105,081	139,294	244,375	105,444	136,956	242,400	0.3	-1.7	-0.8
Idaho	158,331	99,537	257,868	154,496	91,126	245,622	-2.4	-8.5	-4.7
Illinois	1,449,135	1,576,199	3,025,334	1,385,280	1,531,099	2,916,379	-4.4	-2.9	-3.6
Indiana	425,212	172,836	598,048	431,886	171,307	603,193	1.6	6.0-	6.0
Iowa	296,247	252,358	548,605	301,905	253,068	554,973	1.9	0.3	1.2
Kansas	246,365	169,792	416,157	223,461	184,315	407,776	-9.3	9.8	-2.0
Kentucky	391,787	294,355	686,142	370,249	280,452	650,701	-5.5	-4.7	-5.2
Louisiana	450,942	381,055	831,997	446,550	393,271	839,821	-1.0	3.2	6.0
Maine	120,363	140,163	260,526	124,143	129,729	253,872	3.1	-7.4	-2.6
Maryland	399,574	496,332	895,905	435,765	517,769	953,533	9.1	4.3	6.4
Massachusetts	325,947	626,135	952,081	345,406	667,938	1,013,343	0.9	6.7	6.4
Michigan	530,182	979,700	1,509,881	508,456	763,435	1,271,892	-4.1	-22.1	-15.8
Minnesota	553,565	518,558	1,072,122	532,844	505,428	1,038,272	-3.7	-2.5	-3.2

Mississippi	190,810	130,961	321,771	211,021	126,613	337,633	10.6	-3.3	4.9
Missouri	464,840	384,959	849,798	451,153	360,274	811,427	-2.9	-6.4	-4.5
Montana	139,860	106,373	246,233	160,377	106,473	266,850	14.7	0.1	8.4
Nebraska	181,071	118,220	299,292	191,283	121,783	313,066	5.6	3.0	4.6
Nevada	198,708	232,329	431,037	187,773	241,913	429,686	-5.5	4.1	-0.3
New Hampshire	146,506	92,492	238,998	145,147	92,021	237,168	-0.9	-0.5	-0.8
New Jersey	962,954	1,023,772	1,986,725	993,883	1,005,917	1,999,801	3.2	-1.7	0.7
New Mexico	147,549	98,776	246,325	161,591	115,106	276,697	9.5	16.5	12.3
New York	1,985,741	2,151,219	4,136,960	1,714,649	2,891,645	4,606,295	-13.7	34.4	11.3
North Carolina	625,476	773,799	1,399,275	581,800	734,490	1,316,291	-7.0	-5.1	-5.9
North Dakota	998'99	43,660	110,526	68,737	46,248	114,985	2.8	5.9	4.0
Ohio	998,833	1,354,550	2,353,384	963,557	1,304,958	2,268,515	-3.5	-3.7	-3.6
Oklahoma	339,214	446,004	785,218	373,811	471,915	845,726	10.2	5.8	7.7
Oregon	320,772	296,097	616,869	320,959	312,096	633,054	0.1	5.4	2.6
Pennsylvania	1,321,460	1,579,879	2,901,339	1,290,603	1,618,738	2,909,341	-2.3	2.5	0.3
Rhode Island	53,762	107,202	160,964	53,155	106,950	160,105	-1.1	-0.2	-0.5
South Carolina	368,326	523,504	891,830	385,034	506,249	891,283	4.5	-3.3	-0.1
South Dakota	61,200	32,378	93,578	61,915	38,433	100,348	1.2	18.7	7.2
Tennessee	421,188	360,237	781,426	444,228	337,863	782,091	5.5	-6.2	0.1
Texas	957,335	648,932	1,606,267	881,323	602,385	1,483,708	6.7-	-7.2	-7.6
Utah	200,357	89,595	289,952	176,660	80,862	257,522	-11.8	-9.7	-11.2
Vermont	71,415	73,150	144,565	71,814	96,556	138,370	9.0	-9.0	-4.3
Virginia	497,167	361,498	858,665	472,435	317,590	790,025	-5.0	-12.1	-8.0
Washington	808,271	1,503,915	2,312,186	760,998	1,547,750	2,308,748	-5.8	2.9	-0.1
West Virginia	123,707	218,010	341,717	89,994	272,381	362,375	-27.3	24.9	0.9
Wisconsin	766,438	347,651	1,114,089	748,242	322,292	1,070,534	-2.4	-7.3	-3.9
Wyoming	68,670	66,166	134,835	81,951	81,547	163,497	19.3	23.2	21.3
Non-federal total	\$27,667,111	\$26,736,617	\$54,403,728	\$26,998,546	\$26,871,035	\$53,869,581	-2.4	0.5	-1.0

For more detail on state by state methodologies, see, Sources and Methods: A Companion to Workers' Compensation: Benefits, Coverage, and Costs, 2010 section of the Academy's website at www.nasi.org.

Source: National Academy of Social Insurance estimates based on data from state agencies and A.M. Best.

#### **State Trends in Medical Benefits**

The share of benefits paid for medical care vs. cash benefits also varies among states for many reasons, including:

- Differences in waiting periods for cash benefits and levels of earnings replacement provided by cash benefits, such that, all else equal, states with more generous cash benefits have a lower share of benefits for medical care;
- Differences in medical costs, medical practices, and the role of workers' compensation programs in regulating allowable medical costs;
- Differences in prevalence of lump-sum settlements, which can obscure the allocation between medical and other benefits:
- Differences in the role of the state agency, statutes, and case law in defining the limits of medical care that must be provided to injured workers;
- Differences in the industry mix in each state, which influences the types and severity of illnesses and injuries that occur, and thus the level of medical costs; and
- Differences in fee schedule programs, access to medical hardware, pharmaceutical markup rates, etc.

In 2010, there were 32 states where more than half of total workers' compensation benefits were for medical care (Table 8). The share of benefits for medical care ranged from lows of less than 40 percent in seven jurisdictions (the District of Columbia, Massachusetts, Michigan, New York, Rhode Island, Washington and West Virginia) to highs of over 60 percent in 14 (Alabama, Alaska, Arizona, Arkansas, Florida, Idaho, Indiana, Mississippi, Montana, Nebraska, New Hampshire, South Dakota, Utah and Wisconsin).

"In 2010, the share of benefits paid for medical care exceeded 50% in 32 states."

While the long-term national trend has been for medical benefits to grow more rapidly than cash

benefits (as shown in Figure 4), experience varies greatly among states and from year to year. The large increases in total benefits observed in Wyoming and New Mexico from 2009 to 2010, for example, can be attributed to increases in both medical and cash benefits, whereas the 11 percent increase in total benefits in New York is entirely attributed to a 34.4 percent increase in cash benefits - medical payments actually declined by 13.7 percent in New York in 2010 (Table 9). In the three states where total benefits declined substantially between 2009 and 2010 (Michigan, Florida, Utah) both medical and cash benefit payments decreased. However, Michigan's large decrease in total benefits is primarily associated with a 22 percent decline in payments of cash benefits in the state. The change likely reflects the large losses of employment in the automobile industry during the recent recession. With fewer workers employed, there are fewer work-related injuries so payments of cash benefits in 2010 declined.

### State Trends in Benefits Relative to Wages

One way to standardize state benefit payments to changes in employment and wage rates is to divide each state's total benefits by total wages of covered workers, which takes account of the number of workers and prevailing wage levels in the state. The measure of benefits as a percentage of covered wages helps explain whether large growth in a state's benefits payments can be attributed to growth in the state's population of covered workers and covered payroll or to other factors.

However, benefits per \$100 of payroll should not be interpreted as either a measure of adequacy of benefits for workers or as a measure of costs to employers. Although benefit payments that are standardized relative to wages in a state provide a useful perspective for looking at changes within particular states over time, the data do not provide meaningful comparisons across states. Some reasons why it is inappropriate and misleading to use data on benefits per \$100 payroll to compare the adequacy of benefits for workers or the costs to employers across states are set out below.

Table 10 shows benefits per \$100 of covered payroll by state from 2006 through 2010. Trends in standardized benefits over time are somewhat different from trends in dollar measures of benefits. In 16

**Table 10**Workers' Compensation Benefits Per \$100 of Covered Wages, by State, 2006–2010

							unt Change
	2006	2007	2008	2009	2010	2009-2010	2006-2010
Alabama	\$0.98	\$0.95	\$0.96	\$0.96	\$0.95	\$0.00	-\$0.03
Alaska	1.67	1.60	1.64	1.62	1.57	-0.04	-0.10
Arizona	0.64	0.65	0.65	0.66	0.71	0.05	0.07
Arkansas	0.57	0.57	0.59	0.57	0.53	-0.03	-0.03
California	1.36	1.24	1.22	1.27	1.25	-0.02	-0.11
Colorado	0.93	0.84	0.84	0.84	0.81	-0.03	-0.11
Connecticut	0.80	0.76	0.81	0.92	0.84	-0.07	0.05
Delaware	1.24	1.08	1.11	1.10	1.11	0.02	-0.13
District of Columbia	0.32	0.29	0.27	0.31	0.30	-0.01	-0.02
Florida	1.02	0.97	0.95	1.04	0.93	-0.11	-0.09
Georgia	0.91	0.92	0.99	1.01	0.92	-0.09	0.01
Hawaii	1.13	1.09	1.06	1.09	1.10	0.00	-0.03
Idaho	1.13	1.14	1.22	1.28	1.21	-0.07	0.08
Illinois	0.94	1.00	1.05	1.15	1.10	-0.06	0.16
Indiana	0.55	0.56	0.58	0.59	0.58	-0.01	0.04
Iowa	0.99	0.95	1.03	1.05	1.05	-0.01	0.06
Kansas	0.86	0.81	0.82	0.85	0.84	-0.01	-0.02
Kentucky	1.06	1.02	1.07	1.10	1.02	-0.08	-0.04
Louisiana	1.12	1.05	1.15	1.14	1.14	0.00	0.02
Maine	1.50	1.37	1.63	1.29	1.24	-0.05	-0.26
Maryland	0.74	0.74	0.81	0.79	0.83	0.04	0.10
Massachusetts	0.51	0.47	0.47	0.55	0.57	0.02	0.06
Michigan	0.86	0.87	0.82	0.96	0.80	-0.16	-0.06
Minnesota	0.85	0.82	0.85	0.94	0.89	-0.05	0.04
Mississippi	1.00	0.98	0.98	0.97	1.01	0.04	0.00
Missouri	0.89	0.89	0.89	0.88	0.84	-0.04	-0.05
Montana	1.86	1.78	1.77	1.84	1.95	0.12	0.10
Nebraska	0.92	0.90	1.00	0.94	0.98	0.12	0.06
Nevada	0.92	0.78	0.81	0.91	0.94	0.03	0.10
New Hampshire	0.86	0.78	0.88	0.90	0.88	-0.02	0.10
New Jersey	0.86	0.89	0.91	0.97	0.97	-0.02	0.10
New Mexico	0.95	0.89	0.84	0.90	1.01	0.11	0.10
New York	0.77	0.72	0.76	0.88	0.93	0.06	0.17
North Carolina	0.93	0.72	0.76	0.88	0.90	-0.08	-0.03
North Dakota	0.93	0.86	0.91	0.92	0.90	-0.04	0.07
Ohio Oklahoma	1.19	1.20	1.19	1.19 1.49	1.14	-0.06 0.17	-0.05
Oklahoma Oznasa	1.32	1.29	1.35	_	1.66		0.34
Oregon	0.92	0.89	0.90	0.97	0.98	0.01	0.06
Pennsylvania	1.22	1.18	1.19	1.22	1.20	-0.02	-0.02
Rhode Island	0.80	0.80	0.82	0.86	0.84	-0.02	0.03
South Carolina	1.54	1.42	1.44	1.47	1.45	-0.02	-0.09
						cont	inued on p.30

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**Table 10 continued**Workers' Compensation Benefits Per \$100 of Covered Wages, by State, 2006–2010

						Dollar Amo	unt Change
	2006	2007	2008	2009	2010	2009-2010	2006-2010
South Dakota	0.99	1.01	0.90	0.76	0.80	0.03	-0.19
Tennessee	0.85	0.75	0.77	0.81	0.79	-0.02	-0.06
Texas	0.45	0.42	0.44	0.48	0.39	-0.09	-0.06
Utah	0.67	0.66	0.69	0.68	0.60	-0.08	-0.07
Vermont	1.21	1.11	1.15	1.33	1.25	-0.08	0.04
Virginia	0.54	0.58	0.60	0.56	0.50	-0.06	-0.03
Washington	1.63	1.57	1.69	1.82	1.80	-0.02	0.17
West Virginia	1.99	1.57	1.37	1.47	1.48	0.02	-0.51
Wisconsin	1.06	1.07	1.11	1.13	1.07	-0.06	0.00
Wyoming	1.25	1.21	1.20	1.25	1.50	0.24	0.25
Total non-federal	0.96	0.92	0.94	0.99	0.96	-0.03	0.00
Federal Employees <sup>(a)</sup>	1.45	1.46	1.46	1.44	1.39	-0.05	-0.05
Total	0.99	0.95	0.97	1.02	0.99	-0.03	0.00

(a) includes FECA only.

Source: National Academy of Social Insurance estimates based on Tables 3, 8, D1, D2, D3 and D4.

states benefits relative to covered payroll increased in 2010 even though the total dollar amount of benefits decreased. In Nevada, for example, there was a 0.3 percent decrease in total benefits but benefits per \$100 of covered wages increased by three cents.

"Trends in benefits standardized to covered payrolls differ from trends in benefits measured in dollars. Neither is a measure of adequacy of benefits for workers or costs for employers."

Caveats on comparing benefit adequacy across states. As discussed in the Academy's study panel report *Adequacy of Earnings Replacement in Workers' Compensation Programs* (Hunt 2004), a rigorous study of the adequacy of benefits would compare the benefits injured workers actually receive with the wages they lose because of their occupational injuries

or diseases. Such data are not available for most states. The standardized measure of benefits relative to covered wages could be high or low in a given state for a number of reasons completely unrelated to the adequacy of benefits injured workers receive.

First, states with more workers in high-risk industries— such as mining or construction—may pay more benefits relative to covered wages simply because they have a higher proportion of injured workers and a higher proportion of workers with serious, permanent disabilities resulting in lengthy work absences and high earnings losses.

Second, states differ considerably in the criteria they use for determining whether an injury is work-related and therefore will be compensated by the workers' compensation program. A state with a relatively lenient compensability threshold will pay benefits to a higher proportion of injured workers and therefore have higher aggregate benefits relative to the total number of workers in the state compared to a state with a stricter threshold. The state with lenient com-

pensability rules, however, might still pay below average (inadequate) benefits to workers with serious injuries.

Third, injured workers may have their actual benefits reduced by litigation costs for which they are responsible. The amount of these costs will vary from state to state depending on the state's level of litigation, the magnitude of litigation costs, and the proportion of legal fees for which the worker is responsible.

Fourth, in some states, features of the workers' compensation system, employer programs, or labor relations conditions may lead to higher probabilities of return to productive employment for injured workers. All else equal, a state with better return to work results will have more adequate benefits than another state that pays the same benefits per covered payroll, because re-employed workers experience lower losses of earnings due to their workplace injuries.

Finally, adequacy of benefits may differ across claimants within a state, i.e. some classes of injured workers may receive higher levels of wage replacement than others. In particular, groups that tend to receive less adequate benefits relative to their earnings losses are younger workers with permanent injuries (because earnings losses may continue over a lifetime) and highly paid workers (because they receive the maximum TTD weekly benefit which is less than 2/3 of their pre-injury wage). Even if average compensation levels for permanent injuries are relatively high within a state, inequities can be substantial because the same injury can have drastically different effects on the productivity (and wage losses) of different workers, e.g. a shoulder injury for a carpenter vs. a bookkeeper.

Caveats on using benefits data to compare employer costs across states. The data reported in Table 10 reflect benefits paid to workers, not employer costs. A study of employer costs across states should compare the insurance premiums comparable employers are charged in each state (Thomason, Schmidle, and Burton 2001). The premium amounts are affected by the employer's insurance classification and its experience rating (based on the frequency and severity of injuries experienced in the past). Data on benefits paid per worker or benefits paid relative to covered payrolls

do not provide information appropriate for determining employers' costs of workers' compensation for the following reasons.

First, a company in a high-risk industry would not necessarily experience lower costs if it moved to a state with predominantly low-risk industries and relatively low benefits paid, because the migrating company would still be in the high-risk insurance classification.

Second, changes in state statutes that affect employer costs are not fully reflected in our data on benefits relative to wages. Premiums charged to an employer in a given year are based on the expected costs of injuries occurring in that year, under the current policies in effect. If a state changes its statutes either to decrease future benefits or to make future benefits more adequate, those policy changes would not be fully reflected in benefits currently paid to workers in that state as shown in Table 10. For example, a state that tightened its rules would be expected to have lower future costs relative to other states, but the state would not immediately show lower benefits per worker because insurers would continue to pay workers who were permanently disabled in the past under the old rules.

Third, employers' costs for workers' compensation shown in subsequent tables exceed the benefits paid to workers because the employers' costs include administrative expenses and profits for private insurance carriers. Therefore, the relationship of employers' costs relative to workers' benefits varies among states because of various factors affecting the workers' compensation insurance market, such as: the extent of competition among private insurers; the administrative complexity of different state systems; the frequency and costs of litigation, and amounts assessed for state funds and agency operating costs.

In brief, state-level benefits paid per worker or relative to total wages in the state are a way to standardize aggregate benefit payments between large and small states. However, much more refined data and analyses are needed to assess the adequacy of benefits that individual workers receive or the costs that particular employers would incur in different states.

### **Employer Costs**

Employer costs for workers' compensation in 2010 were \$71.3 billion, a decrease of 2.7 percent from \$73.3 billion in 2009 (Table 11). Relative to total wages of covered workers, employer costs nationally decreased by seven cents, from \$1.26 per \$100 of covered wages in 2009 to \$1.19 per \$100 of covered wages in 2010 (Table 12).

"Employer costs for workers' compensation in 2010 were \$71.3 billion, a decrease of 2.7% from 2009."

For employers, who purchase insurance from private carriers and state funds, costs consist of premiums written in the calendar year plus benefit payments made under deductible provisions. The growing use of large deductible policies complicates the measurement of employer costs because our insurance industry data sources do not provide information on deductibles and many states lack data on deductible payments. Consequently, these costs had to be estimated for most states, as described in Appendix G.

For self-insured employers, costs include benefit payments made during the calendar year and administrative costs associated with providing those benefits. Because self-insured employers generally do not record administrative costs for workers' compensation separately from other administrative costs, the administrative costs for self-insured employers must be estimated. We assume the administrative costs for self-insuring employers are the same relative to benefits paid as are administrative costs reported by private insurers to the National Association of Insurance Commissioners. These administrative costs include the direct costs of managing claims as well as expenses for litigation and cost containment, taxes, licenses, and fees. For more information on estimating costs for self-insured employers, see Appendix C.

For the federal employee workers' compensation program, employer costs are benefits paid plus administrative costs as reported by the Department of Labor (U.S. DOL 2011b).

Using these estimates, costs for employers insuring through private carriers were \$41.3 billion in 2010 (approximately 58 percent of total costs). Costs for self-insured employers were \$15.6 billion, (22 percent of total costs). Costs for employers insured through state funds were \$10.2 billion (14 percent of the total), and costs to the federal government were \$4.2 billion (6 percent of the total) (Table 11).

### NASI measure of Employer Costs by State

In this report, for the first time, NASI is publishing estimates of employer costs per \$100 of covered payroll by state. Table 12 provides the data for employer costs, aggregated across all types of insurance arrangements, for each state for the five-year period from 2006 to 2011. Costs for employers insured through private carriers or state funds include the premiums written in a year and the deductible benefits paid by the employers. Costs for self-insured employers include the benefits paid by these employers plus the estimated administrative costs. (These are the same measures of costs used for the national estimates in earlier tables).

Employer costs declined in every state except North Dakota, Oregon and South Carolina between 2006 and 2010. Many states recorded decreases in employer costs of 30 percent or more, for example: Alaska, down 34 percent from \$3.62 to \$2.37 per \$100 covered payroll; Delaware, down 42 percent from \$2.01 to \$1.16; Hawaii, down 40 percent from \$2.31 to \$1.41; Texas, down 39 percent from \$1.08 to \$0.66; Utah, down 43 percent from \$1.44 to \$0.82; and West Virginia, down 52 percent from \$3.84 to \$1.83. Among the two states experiencing increases in employer costs over the period, North Dakota and Oklahoma recorded increases of no more than 10 percent.

"Employer costs for workers' compensation declined in almost every state between 2006 and 2010."

As with the comparison of benefits across states, extreme caution must be used in comparing employer costs across states for several reasons:

**Table 11**Employer Costs for Workers' Compensation by Type of Insurer, 1987–2010 (in millions)

		%	Priva	te Carriers	Sta	te Funds	F	ederal <sup>a</sup>	Self-	Insurance
Year	Total	Change	Total	% of total	Total	% of total	Total	% of total	Total	% of total
1987	\$38,095	*	\$25,448	66.8	\$5,515	14.5	\$1,728	4.5	\$5,404	14.2
1988	43,284	13.6	28,538	65.9	6,660	15.4	1,911	4.4	6,175	14.3
1989	47,955	10.8	31,853	66.4	7,231	15.1	1,956	4.1	6,915	14.4
1990	53,123	10.8	35,054	66.0	8,003	15.1	2,156	4.1	7,910	14.9
1991	55,216	3.9	35,713	64.7	8,698	15.8	2,128	3.9	8,677	15.7
1992	57,395	3.9	34,539	60.2	9,608	16.7	2,454	4.3	10,794	18.8
1993	60,819	6.0	35,596	58.5	10,902	17.9	2,530	4.2	11,791	19.4
1994	60,517	-0.5	33,997	56.2	11,235	18.6	2,490	4.1	12,795	21.1
1995	57,089	-5.7	31,554	55.3	10,512	18.4	2,556	4.5	12,467	21.8
1996	55,293	-3.1	30,453	55.1	10,190	18.4	2,601	4.7	12,049	21.8
1997	53,544	-3.2	29,862	55.8	8,021	15.0	3,358	6.3	12,303	23.0
1998	53,431	-0.2	30,377	56.9	7,926	14.8	3,471	6.5	11,657	21.8
1999	55,835	4.5	33,422	59.9	7,484	13.4	3,496	6.3	11,433	20.5
2000	60,065	7.6	35,673	59.4	8,823	14.7	3,620	6.0	11,949	19.9
2001	65,752	9.5	37,768	57.4	10,644	16.2	3,778	5.7	13,561	20.6
2002	72,574	10.4	41,295	56.9	13,695	18.9	3,898	5.4	13,686	18.9
2003	80,544	11.0	45,276	56.2	16,402	20.4	3,970	4.9	14,897	18.5
2004	84,232	4.6	47,411	56.3	17,510	20.8	4,073	4.8	15,237	18.1
2005	89,272	6.0	50,668	56.8	18,157	20.3	4,096	4.6	16,351	18.3
2006	86,733	-2.8	51,297	59.1	15,555	17.9	4,138	4.8	15,743	18.2
2007	84,765	-2.3	50,512	59.6	14,127	16.7	4,236	5.0	15,889	18.7
2008	79,135	-6.6	46,091	58.2	12,652	16.0	4,341	5.5	16,051	20.3
2009	73,260	-7.4	41,972	57.3	11,041	15.1	4,065	5.5	16,181	22.1
2010	71,302	-2.7	41,347	58.0	10,177	14.3	4,228	5.9	15,550	21.8

<sup>(</sup>a) In all years, federal costs include those paid under the Federal Employees' Compensation Act for civilian employees and the portion of the Black Lung benefit program that is financed by employers and are paid through the federal Black Lung Disability Trust Fund, including interest and bond payments on past Trust Fund advances from the U.S. Treasury. In years before 1997, federal costs also include the other part of the Black Lung program that is financed solely by federal funds. In 1997–2010, federal costs also include a portion of employer-financed benefits under the Longshore and Harbor Workers Compensation Act that are not reflected in state data—namely, costs paid by self-insured employers and by special funds under the LHWCA. See Appendix H for more information about federal programs.

Source: National Academy of Social Insurance estimates of costs for private carriers and state funds are based on information from A.M. Best and direct contact with state agencies. Costs for federal programs are from the Department of Labor and the Social Security Administration. Self-insured administrative costs are based on information from the National Association of Insurance Commissioners.

**Table 12**Workers' Compensation Employer Costs per \$100 of Payroll by State, 2006–2010

State	2006	2007	2008	2009	2010
Alabama	\$1.45	\$1.41	\$1.29	\$1.25	\$1.21
Alaska	3.62	3.41	2.90	2.60	2.37
Arizona	1.00	1.08	0.97	0.87	0.82
Arkansas	1.18	1.07	0.96	0.87	0.82
California	2.24	1.83	1.59	1.58	1.58
Colorado	1.45	1.33	1.19	1.05	0.95
Connecticut	1.17	1.09	1.08	1.04	0.98
Delaware	2.01	1.97	1.57	1.26	1.16
District of Columbia	0.68	0.61	0.52	0.51	0.50
Florida	1.82	1.56	1.30	1.23	1.08
Georgia	1.37	1.32	1.28	1.19	1.06
Hawaii	2.31	2.11	1.65	1.44	1.41
Idaho	2.04	1.91	1.76	1.63	1.52
Illinois	1.44	1.47	1.41	1.42	1.32
Indiana	0.97	0.92	0.84	0.79	0.77
Iowa	1.52	1.48	1.49	1.46	1.42
Kansas	1.39	1.33	1.29	1.25	1.22
Kentucky	1.66	1.51	1.44	1.38	1.21
Louisiana	1.99	2.00	1.77	1.61	1.54
Maine	1.94	1.86	1.68	1.57	1.49
Maryland	1.24	1.16	1.15	0.97	1.04
Massachusetts	0.86	0.80	0.64	0.69	0.73
Michigan	1.21	1.15	1.04	1.15	0.97
Minnesota	1.24	1.18	1.07	1.08	1.00
Mississippi	1.73	1.73	1.51	1.43	1.31
Missouri	1.54	1.47	1.28	1.17	1.08
Montana	3.38	3.36	3.10	2.95	2.73
Nebraska	1.61	1.50	1.47	1.38	1.31
Nevada	1.48	1.43	1.25	1.11	1.07
New Hampshire	1.53	1.32	1.26	1.20	1.16
New Jersey	1.34	1.33	1.31	1.30	1.20
New Mexico	1.75	1.59	1.40	1.34	1.35
New York	1.24	1.19	1.03	1.12	1.17
North Carolina	1.42	1.45	1.37	1.23	1.11
North Dakota	1.41	1.43	1.48	1.57	1.55
Ohio	1.38	1.33	1.37	1.50	1.33
Oklahoma	2.02	1.95	1.89	1.95	2.09
Oregon	1.46	1.68	1.29	1.15	1.11
Pennsylvania	1.40	1.63	1.57	1.50	1.11
Rhode Island	1.73	1.03	1.16	1.07	1.47
South Carolina	2.16	2.13	2.03	1.79	1.01
South Carolina South Dakota	1.64	1.62	1.39	1.79	1.//
Tennessee	1.64	1.30	1.23	1.14	1.28
Texas	1.08	0.99	0.92	0.85	0.66
Utah Vanna ant	1.44	1.38	1.20	1.01	0.82
Vermont	2.33	2.09	1.89	1.74	1.65
Virginia	0.93	0.89	0.82	0.77	0.72
Washington	1.63	1.34	1.58	1.49	1.51
West Virginia	3.84	3.42	2.31	2.07	1.83
Wisconsin	1.91	1.90	1.76	1.74	1.63
Wyoming	2.18	1.95	2.37	2.24	1.61
Total non-federal	1.54	1.42	1.30	1.26	1.19

Source: National Academy of Social Insurance Estimates.

First, the data on average employers' costs of workers' compensation by state do not mean that states with lower costs offer a more competitive environment for employers, because states differ in their mix of industries. Consider two industries: logging, for which the workers' compensation insurance rate is \$40 per \$100 of payroll, and banking, for which the insurance rate is \$1 per \$100 of payroll. Imagine two states: State A has 80 percent of its employees in logging and 20 percent in banking, so average employer costs for workers' compensation are \$32.20 per \$100 of payroll. State B has 20 percent of its employees in logging and 80 percent in banking, so average employer costs for workers' compensation are \$8.20 per \$100 of payroll. What would happen to the workers' compensation premium for logging firm Timber-R-Us if it moved from State A to State B to take advantage of the lower average costs of workers' compensation in State B? Timber-R-Us would continue to pay workers' compensation premiums of \$40 per \$100 of payroll. So a meaningful comparison of employer costs among states requires that insurance rates be compared for employers within the same insurance classifications.

Second, the data on employers' costs in Table 12 do not capture recent reforms that may change the workers' compensation market within a state. For example, a state which has recently changed its workers' compensation law to increase (or decrease) benefits for subsequent injuries will have a substantial portion of the costs shown in Table 12 based on benefits paid under the previous legislative regime. Thus, the data reported here may not fully reflect the current reality for workers' compensation in a state.

Third, states with higher workers' compensation costs are, in general, providing more generous benefits to injured workers. While other factors also contribute to interstate differences in employers' costs, several studies (e.g., Krueger and Burton 1990) demonstrate that the level of statutory benefits is a major determinant of the costs of workers' compensation in a state. In other words, efforts to reduce

costs for employers usually involve reductions in benefits for injured workers.<sup>11</sup>

Fourth, employers in states where workers' compensation costs are relatively low may be paying relatively higher wages. In the short run, lower benefits and costs can result in higher profits for employers. Research has shown that over time, however, there is a trade-off between benefits and wages (Leigh et al. 2000), which means that lower workers' compensation benefits are largely offset by higher wages.

For these reasons, and the previous warnings about using benefits data to compare states, the data on employers' costs should not be used to compare the adequacy of benefits or costs of workers' compensation programs in different states. We reiterate: state data on average employers' costs per \$100 of payroll and average benefits per \$100 of payroll are not informative for making plant-location decisions, for determining adequacy of benefits, or for formulating legislative reforms.

### Alternative Measures of Employers' Costs

Employer costs can also be measured as a percent of covered payroll to standardize the estimates over time. The National Academy of Social Insurance has produced national estimates of employers' costs for the period from 1980 to 2010 (Table 13). In 2010, employers' costs were of \$1.23 per \$100 covered payroll.

The Bureau of Labor Statistics (BLS) also publishes annual estimates of employers' costs for workers' compensation in *Employer Costs for Employee Compensation*, which contains information on the amounts employers pay for wages, salaries and employee benefits, including workers' compensation. Data on private sector employers are available since 1986 and data on all non-federal employees are available since 1991. Table 13 and Figure 5 compare the NASI and BLS estimates.

<sup>11</sup> As economists are wont to say, "There is no such thing as a free lunch."

<sup>12</sup> The BLS data are available on a quarterly basis. The most recent data used for Table 13 are based on a sample of 12,900 establishments in private industry and 1,800 establishments in state and local governments (U.S. Department of Labor 2012). The BLS data on employer costs in the private sector are available by industry, occupational group, establishment size, bargaining status, and for four census regions and nine census divisions, but are not available for individual states. The BLS methodology and the procedure used to calculate workers' compensation benefits per \$100 of payroll are discussed in Burton (2012: Appendix A).

**Table 13**Workers' Compensation Cost Ratio: Comparison of NASI and BLS Costs Estimates, 1980-2010

Year (1)	Employer Costs per \$100 of Payroll Wages (NASI) (2)	Costs for Employers in Private Sector per \$100 of Payroll (BLS) (3)	Costs for All Non-Federal Employees per \$100 of Payroll (BLS) (4)
1980	\$1.76	\$	\$
1981	1.67	_	_
1982	1.58	_	_
1983	1.50	-	_
1984	1.49	-	_
1985	1.64	-	_
1986	1.79	1.74	_
1987	1.86	1.90	_
1988	1.94	2.12	_
1989	2.04	2.30	_
1990	2.18	2.53	_
1991	2.16	2.63	2.41
1992	2.13	2.76	2.52
1993	2.17	2.90	2.66
1994	2.05	2.99	2.67
1995	1.83	2.82	2.60
1996	1.66	2.82	2.52
1997	1.49	2.65	2.44
1998	1.38	2.37	2.17
1999	1.35	2.30	2.11
2000	1.34	2.02	1.90
2001	1.43	1.92	1.87
2002	1.57	2.05	1.93
2003	1.71	2.05	1.93
2004	1.70	2.45	2.26
2005	1.71	2.47	2.31
2006	1.56	2.36	2.21
2007	1.45	2.28	2.15
2008	1.33	2.13	2.03
2009	1.29	2.03	1.92
2010	1.23	1.95	1.87

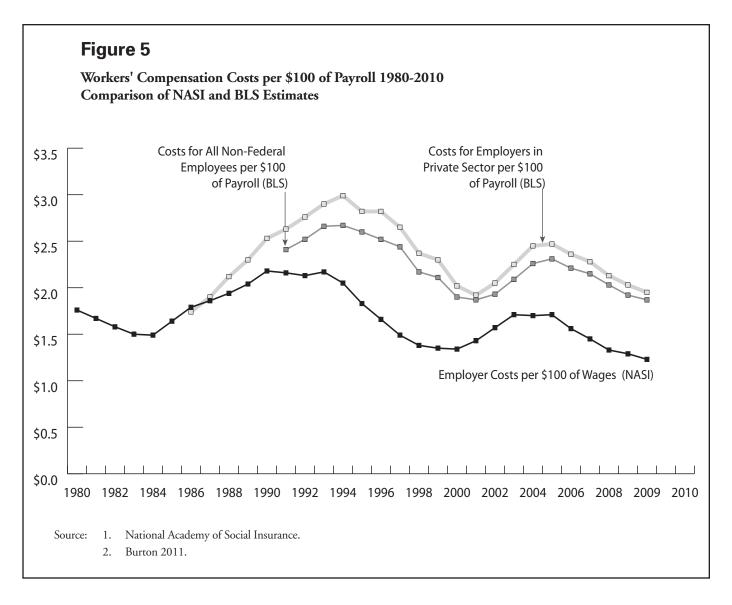


Figure 5 presents the national BLS data on employers' costs for the private sector and for all non-federal employees as well as the NASI data on employers' costs for all (private sector, non-federal, and federal) employees. Although there are differences in the BLS and NASI estimates the data series agree on the general patterns of employer costs over the last three decades: employers costs increased from the mid-1980s to the early 1990s, then declined rapidly until the late 1990s or early 2000s, then increased for a few years before dropping in every year since 2005. The main difference is that cost estimates are higher in the BLS data than in the NASI data in every year except 1986.

### Trends in Benefits and Employer Costs

Table 14 and Figure 1 show the trends in benefits paid and employer costs between 1980 and 2010. Since 2005, workers' compensation benefits and employers' cost relative to covered wages have been on the decline and continued to fall in 2010. Nationally, employer costs of \$1.23 per \$100 of covered wages in 2010 were at the lowest point since 1980, the earliest date when comparable data are available. Benefits per \$100 of payroll were \$0.99 in 2010, three cents less than \$1.02 in 2009.

Workers' benefits compared to employer cost have increased substantially over the last five years. Benefits paid in 2010 per \$1 of employer cost were \$0.81, an increase of \$0.18 since 2006 and higher

**Table 14**Workers' Compensation Benefit\* and Cost\*\* Ratios, 1980–2010

Year	Employer Costs per \$100 of Wages	Benefits per \$100 of Wages	Benefits per \$1 in Employer Cost	Medical Benefits per \$100 of Wages	Cash Benefits per \$100 of Wages
1980	\$1.76	\$0.96	\$0.54	\$0.28	\$0.68
1981	1.67	0.97	0.58	0.29	0.68
1982	1.58	1.04	0.66	0.34	0.70
1983	1.50	1.05	0.70	0.34	0.71
1984	1.49	1.09	0.73	0.36	0.73
1985	1.64	1.17	0.71	0.39	0.78
1986	1.79	1.23	0.69	0.43	0.80
1987	1.86	1.29	0.69	0.47	0.82
1988	1.94	1.34	0.69	0.50	0.84
1989	2.04	1.46	0.72	0.57	0.89
1990	2.18	1.57	0.72	0.62	0.94
1991	2.16	1.65	0.76	0.66	0.99
1992	2.13	1.65	0.78	0.69	0.96
1993	2.17	1.53	0.71	0.66	0.87
1994	2.05	1.47	0.72	0.58	0.89
1995	1.83	1.35	0.74	0.54	0.81
1996	1.66	1.26	0.76	0.50	0.76
1997	1.49	1.17	0.78	0.48	0.68
1998	1.38	1.13	0.82	0.48	0.65
1999	1.35	1.12	0.83	0.48	0.63
2000	1.34	1.06	0.79	0.47	0.60
2001	1.43	1.10	0.77	0.50	0.60
2002	1.57	1.13	0.72	0.52	0.61
2003	1.71	1.16	0.68	0.55	0.61
2004	1.70	1.13	0.67	0.53	0.61
2005	1.71	1.09	0.64	0.51	0.59
2006	1.56	0.99	0.63	0.47	0.52
2007	1.45	0.95	0.66	0.45	0.50
2008	1.33	0.97	0.73	0.49	0.48
2009	1.29	1.02	0.79	0.51	0.52
2010	1.23	0.99	0.81	0.48	0.51

<sup>\*</sup> Benefits are payments in the calendar year to injured workers and to providers of their medical care.

Source: National Academy of Social Insurance estimates based on Tables 2, 4, and 11.

<sup>\*\*</sup> Costs are employer expenditures in the calendar year for workers' compensation benefits, administrative costs, and/or insurance premiums. Costs for self-insuring employers are benefits paid in the calendar year plus the administrative costs associated with providing those benefits. Costs for employers who purchase insurance include the insurance premiums paid during the calendar year plus the payments of benefits under large deductible plans during the year. The insurance premiums must pay for all of the compensable consequences of the injuries that occur during the year, including the benefits paid in the current as well as future years.

than in most years since 1980. The increase in the benefit to cost ratio over the last five years likely reflects (1) the decline in insurance premiums, which are largely based on incurred benefits, which are in turn based on estimates of future benefits payments, and (2) the increase in benefit payments in recent years due to workers injured in previous years who are less likely to be reemployed because of the high unemployment rates.

The difference between benefits paid to workers and costs to employers reflects costs of administering the program and the time lag between premiums collected vs. benefits paid. For self-insured employers and the federal employee compensation program the difference between benefits and costs solely reflects administrative costs. For these employers, costs in a calendar year pertain to benefits paid in the same year.

For employers insured through the private market or state funds, employer costs are largely determined by premiums paid in the year. Premiums paid by employers do not necessarily match benefits received by workers in a given year for several reasons. Most importantly, premiums in a given calendar year must pay for all the compensable consequences of injuries that occur during the year, including benefits paid in future years. Thus, the premiums for 2010 include benefit payments in 2010 for 2010 injuries plus reserves for benefit payments that may occur in years after 2010 for 2010 injuries. In addition, there is a gap between benefits and costs because premiums must cover expenses such as administrative and loss adjustment costs, taxes, profits or losses of insurance carriers, and contributions for special funds, which can include the support of workers' compensation agencies.

From an insurer's perspective, premiums reflect all future costs the insurer expects to incur for injuries that occur in the policy year. Thus, an increase (decrease) in expected liabilities can lead to an increase (decrease) in premiums. Premiums can also be influenced by insurers' past and anticipated investment returns on reserves they set aside to cover future liabilities. Thus, a decrease (increase) in investment returns can lead to an increase (decrease) in premiums. Finally, premiums reflect insurers' profits (or losses), since profitability (or lack thereof) affects the extent of dividends, schedule ratings, and deviations offered by insurers. Burton (forthcoming)

indicates that "the underwriting results for the workers' compensation insurance industry declined slightly in 2010, but the industry remained profitable for the eighth year in a row according to data from A.M. Best."

### Work Injuries, Occupational Illness and Fatalities

National data are not available on the numbers of persons who file workers' compensation claims or receive benefits in a given year, but trends can be observed in two related data series: 1) The Bureau of Labor Statistics (BLS) collects information about work-related fatalities from the Census of Fatal Occupational Injuries and data on nonfatal work injuries or occupational illnesses from a sample survey of employers, and 2) The National Council on Compensation Insurance (NCCI) has information on the number of workers' compensation claims insured by private carriers and some competitive state funds in forty-one states (NCCI 2011b).

"The frequency (incidence) of reported non-fatal occupational injuries and illnesses has declined every year since 1992."

#### **Fatalities at Work**

According to the BLS data, a total of 4,690 fatal work injuries occurred in 2010 (Table 15), a 3.1 percent increase from the 4,551 fatalities reported in 2009. Occupational fatalities increased for the first time since 2006, although fatalities in 2009 were at their lowest point since the data series began in 1992. The lower counts in both 2009 and 2010 are likely related to the slower U.S. economy during those years. Transportation incidents continued to be the leading cause of on-the-job fatalities in 2010, accounting for 40 percent of the total. The other leading causes of death were assaults and violent acts (homicides and self-inflicted injuries), accounting for 18 percent of work-related fatalities; contact with objects and/or equipment (16%), and falls (14%) (U.S. DOL 2011c).

**Table 15**Number of Fatal Occupational Injuries, 1992–2010

Year Num	ber of Fatalities
1992	6,217
1993	6,331
1994	6,632
1995	6,275
1996	6,202
1997	6,238
1998	6,055
1999	6,054
2000	5,920
2001	8,801
September 11 events	2,886
Other	5,915
2002	5,534
2003	5,575
2004	5,764
2005	5,734
2006	5,840
2007	5,657
2008	5,214
2009	4,551
2010	4,690

### **Nonfatal Injuries and Illnesses**

The BLS reports a total of 3.1 million nonfatal workplace injuries and illnesses in private industry workplaces during 2010, a decrease of about 200,000 cases from 2009 (Table 16) (U.S. DOL, 2011d). Many of these cases involved relatively minor injuries that did not result in lost workdays. The frequency of reported non-fatal occupational injuries and illnesses (incidence rate) has declined

every year since 1992, and was 3.5 cases per 100 full-time equivalent workers (FTEs) in 2010.

A total of 0.9 million workplace injuries or illnesses that involved absence from work beyond the day of the incident were reported in private industry in 2010 (U.S. DOL, 2011d). The rate of work-loss injuries or illnesses per one hundred full-time workers declined from 3.0 in 1992 to 1.1 in 2010 (Table 16).

Some of the most common workplace injuries and illnesses reported in 2010 were: sprains and strains (42.7 percent of all cases); soreness or pain including back pain (11.7 percent); cuts and lacerations (9.1 percent); bruises and contusions (8.9 percent); fractures (8.0 percent); multiple traumatic injuries and disorders (4.8 percent); heat burns (1.7 percent); carpal tunnel syndrome (1.0 percent); and tendinitis, chemical burns and amputations (1.6 percent) (U.S. DOL, 2011e).

"The rate of work-loss injuries or illnesses declined from 3.0 per one hundred full-time workers in 1992 to 1.1 in 2010."

Figure 6 shows trends in private industry incidence rates (rates per 100 FTEs) for occupational injuries and illnesses involving (a) work absences or (b) job transfers or restrictions. The break in the trend lines in 2002 represents a change in OSHA record keeping requirements in that year, indicating that the data before and after 2002 may not be strictly comparable. The graph shows a declining trend in the incidence of injuries or illnesses involving days away from work since 1990. The incidence rate of injuries and illnesses resulting in job transfer or restrictions first increased after 1990 and then decreased somewhat after 2002. However, the share of occupational injuries and illnesses, resulting in job transfer or restriction represent close to one in four cases in 2010, up considerably from eight percent in 1990.

**Table 16**Private Industry Occupational Injuries and Illnesses: Total Non-fatal Cases and Incidence Rates, 1987–2010

	1	Number of Cases (in	millions)		Incidence Rat	eb
Year <sup>a</sup>	All Cases	Cases with Any Days Away from Work	Cases with Job Transfer or Restriction	All Cases	Cases with Any Days Away from Work	Cases with Job Transfer or Restriction
1987	6.0	2.5	n/a	8.3	3.4	0.4
1988	6.4	2.6	n/a	8.6	3.5	0.5
1989	6.6	2.6	n/a	8.6	3.4	0.6
1990	6.8	2.6	n/a	8.8	3.4	0.7
1991	6.3	2.6	n/a	8.4	3.2	0.7
1992	6.8	2.3	0.6	8.9	3.0	0.9
1993	6.7	2.3	0.7	8.5	2.9	0.9
1994	6.8	2.2	0.8	8.4	2.8	1.0
1995	6.6	2.0	0.9	8.1	2.5	1.1
1996	6.2	1.9	1.0	7.4	2.2	1.1
1997	6.1	1.8	1.0	7.1	2.1	1.2
1998	5.9	1.7	1.1	6.7	2.0	1.1
1999	5.7	1.7	1.0	6.3	1.9	1.1
2000	5.7	1.7	1.1	6.1	1.8	1.2
2001	5.2	1.5	1.0	5.7	1.7	1.1
2002 (c)	4.7	1.4	1.0	5.3	1.6	1.2
2003	4.4	1.3	1.0	5.0	1.5	1.1
2004	4.3	1.3	1.0	4.8	1.4	1.1
2005	4.2	1.2	1.0	4.6	1.4	1.0
2006	4.1	1.2	0.9	4.4	1.3	1.0
2007	4.0	1.2	0.9	4.2	1.2	0.9
2008	4.0	1.2	0.9	4.2	1.2	0.9
2009	3.3	1.0	0.7	3.6	1.1	0.8
2010	3.1	0.9	0.7	3.5	1.1	0.8

a Data after 1991 exclude fatal work-related injuries and illnesses.

Source: U.S. DOL 2011c.

b The incidence rate is the number of cases per one hundred full-time workers.

c Data for 2002 and beyond are not strictly comparable to prior year data due to changes in OSHA recordkeeping requirements.

Figure 6 Private Industry Occupational Injuries and Illnesses: Incidence Rates 1987-2010 4.0 Cases with days away from work\* 2.5 2.0 1.5 1.0 Cases with job transfer or restriction\* 0.5

Note: The break in the graph indicates that the data for 2002 and beyond are not strictly comparable to prior year data due to changes in OSHA recordkeeping requirements.

1992 1993 1994 1995 1996 1997 1998 1999 2000 2001 2002 2003 2004 2005 2006 2007 2008 2009

- Cases involving days away from work are cases requiring at least one day away from work with or without days of job transfer or restriction.
- Job transfer or restriction cases occur when, as a result of a work-related injury or illness, an employer or health care professional keeps, or recommends keeping an employee from doing the routine functions of his or her job or from working the full workday that the employee would have been scheduled to work before the injury or illness occurred.

Source: Bureau of Labor Statistics.

#### **Insured Workers' Compensation Claims**

NCCI reports the frequency of workers' compensation claims for privately insured employers and some state funds in 37 jurisdictions (Table 17). These data show declining trends similar to the national trends in workplace injuries reported by the BLS. Temporary total disability claims (claims in which days away from work exceeded the state waiting period) per 100,000 insured workers declined by 56.3 percent between 1992 and 2007. This decline is similar to the 60 percent decline in injuries involving days away from work reported by BLS (from 3.0 per one hundred fulltime workers in 1992 to 1.2 per one hundred fulltime workers in 2007) (Table 16). According to the NCCI data the frequency of all workers' compensation claims (including medicalonly cases that involve little or no lost work time) declined by 51.7 percent between 1992 and 2007. This rate is also similar to the 52.8 percent decline in the incidence rate for all injuries reported to the BLS in the same period (from 8.9 to 4.2 per one hundred full-time workers between 1992 and 2007).<sup>13</sup>

The similarity between the national rates of decline in the BLS injury rates and the NCCI claims rates may be misleading. Guo and

**Table 17**Number of Workers' Compensation Claims per 100,000 Insured Workers: Private Carriers in 37 Jurisdictions, 1992-2007

Policy Period	Temporary Total	Permanent Partial	Total (including medical only)
1992	1,358	694	8,504
1993	1,331	644	8,279
1994	1,300	565	7,875
1995	1,217	459	7,377
1996	1,124	419	6,837
1997	1,070	414	6,725
1998	977	452	6,474
1999	927	461	6,446
2000	870	437	6,003
2001	799	423	5,510
2002	770	422	5,239
2003	725	423	4,901
2004	685	403	4,773
2005	654	393	4,563
2006	633	385	4,384
2007	594	370	4,108
Percent decline, 1992–2	<b>2007</b> 56.3	-46.7	-51.7

Source: Exhibit XII, Annual Statistical Bulletin, NCCI 1996-2011.

## Reports of Underreported Injuries and Workers' Compensation Claims

Studies conducted over the past several decades have consistently concluded that various systems — including the BLS Survey of Occupational Injuries and Illnesses and state workers' compensation programs — undercount workplace injuries and illnesses. Hensler et al. (1991) report that only 60

percent of workers with occupational injuries involving medical care or lost work time received workers' compensation benefits. A study by Lakdawalla, Reville, and Seabury (2005) based on the National Longitudinal Survey of Youth indicates that only 55 percent of reported occupational injuries result in workers' compensation claims. Smith et al. (2005) used National Health Interview Survey (NHIS) data and derived injury rates for private industry that

Burton (2010) examined the determinants of the amounts of incurred cash benefits per 100,000 workers in 45 states plus the District of Columbia, which is a variable constructed from NCCI data. Between 1990 and 1999, the national average of incurred benefits per 100,000 workers declined by 41.6 percent in constant dollars. However, there were substantial variations among these 46 jurisdictions in the changes in incurred benefits during this period. The authors found that 21 percent of the drop in benefits during the 1990s could be explained by declines in the BLS injury rates in these jurisdictions, but that over 30 percent of the decline in benefits was due to the changes in many states in workers' compensation compensability rules and administrative practices.fits per 100,000 workers declined by 41.6 percent in constant dollars. However, there were substantial variations among these 46 jurisdictions in the changes in incurred benefits during this period. The authors found that 21 percent of the drop in benefits during the 1990s could be explained by declines in the BLS injury rates in these jurisdictions, but that over 30 percent of the decline in benefits was due to the changes in many states in workers' compensation compensability rules and administrative practices.

were 1.4 times the BLS estimates. Using data from the 2002 Washington State Behavioral Risk Factor Surveillance System survey, Fan et al. (2006) estimate that only 52 percent of injured workers filed a workers' compensation claim. In another study, Rosenman et al. (2006) conclude that BLS and workers' compensation data account respectively for 32 percent and 66 percent of workplace injuries and illnesses in Michigan. Boden and Ozonoff (2008) studied six other states. Their upper-bound estimates suggest the BLS captures 51 to 76 percent of losttime injuries in these states, while workers' compensation programs capture 65 to 93 percent. Less conservative estimates suggest ranges of 37 to 71 percent for BLS and 52 to 85 percent for workers' compensation.

Further studies are underway to assess the accuracy of BLS data and to help understand whether certain injuries or illnesses are more likely to be underreported. The BLS conducted a quality assurance study and verified that its Survey of Occupational Injuries and Illnesses accurately reflected the information reported by employers on logs required under federal Occupational Safety and Health Administration (OSHA) rules. But the survey can still be biased or incomplete if the employer reports are biased. For example, employers may not record cases that are in dispute. Also, long-latency occupational diseases and cases of unknown or disputed etiology may not find their way into OSHA logs.

There also are some conceptual differences between the numbers of cases involving work absences that appear in workers' compensation reports and those that appear on OSHA logs. Workers' compensation classifies cases which receive indemnity benefits as 'work absence,' whereas OSHA classifies cases with any days away from work as a 'days away from work' case. Generally a workers' compensation claim involves a waiting period of three or more days away from work before an injured worker receives indemnity benefits, hence appears in a workers' compensation claims database. However, if an employee has any days away from work following an injury, it is recorded as a 'days away from work' case in the OSHA log. At the same time, some workers' compensation claims involve only a day of partial disability when the incident occurs, after which the injured worker receives work restrictions with lower pay. The worker may receive indemnity benefits to compensate for lost wages, thus appearing in a workers' compensation database, but there are not enough days away from work to be classified as a 'days away from work' case in the OSHA log (Minnesota Department of Labor and Industry 2005).

Azaroff et al. (2002) and Spieler and Burton (2012) provide reviews of many studies of injury reporting and a discussion of reasons for underreporting. Workers may not report compensable injuries because, for example, they do not know that they are covered by workers' compensation, they believe that obtaining benefits can be difficult and stressful (Strunin and Boden 2004), they think that benefits are not worth the risks of filing (Fricker 1997), or they fear employer retaliation (Pransky et al. 1999). Low wage and temporary workers may be least likely to file for these reasons (Shannon and Lowe 2002).

"Many workers may not report compensable injuries. There are a variety of reasons for underreporting."

Workers normally cannot sue their employer for workplace injuries because of the exclusive remedy doctrine and, if discharged, normally cannot bring a tort suit against their employers because of the employment-at-will doctrine. However, a number of states have statutes protecting workers against retaliation for filing a workers' compensation claim, and courts in many states now allow tort suits for wrongful discharge in violation of public policy, such as exercising a statutory right, of which the classic example is filing a claim for workers' compensation benefits (Willborn et al. 2012, 120).

For injuries and illnesses that take time to develop, like carpal tunnel syndrome and silicosis, the worker may not be aware of the workplace connection, and therefore will not report that work was a cause of the condition. Studies have typically shown much less reporting of such conditions as work-related than is suggested in medical data (Stanbury et al. 1995; Biddle et al. 1998; Morse et al. 1998; Milton et al. 1998: U.S. DOL 2008).

The primary impact of workers' failure to report an occupational injury or illness is likely to be on workers' compensation claims data. However, fewer cases entered into the workers' compensation system could

also result in fewer injuries reported to the BLS. Boden and Ruser (2003) found that between 7.0 and 9.4 percent of the decline in injury rates measured by BLS between 1991 and 1997 is an indirect result of tighter eligibility standards and claims filing restrictions for workers' compensation benefits.<sup>14</sup>

# Comparing Workers' Compensation with Other Disability Benefit Programs

Aside from workers' compensation other sources of support for workers with disabilities include sick leave; short-term and long-term disability benefits; Social Security disability insurance; and Medicare. These programs are not limited to injuries or illnesses caused on the job. However, some of these programs are not available to workers receiving workers' compensation benefits and some programs reduce benefits for workers receiving workers' compensation. In addition, Supplemental Security Income and Medicaid provide cash and medical assistance to disabled individuals who have low incomes. These means-tested benefits are based on need rather than work experience and are not covered in this report.

### **Short- and Long-term Disability Benefits**

Three types of benefits for short-term disability are available to at least some workers: sick leave, state-mandated disability insurance, and employer-provided disability insurance.

Sick leave is a common form of wage replacement for short-term absences from work due to illness or injury (not necessarily related to work). About 63 percent of all private sector employees have some type of paid sick leave provided through their employer or a private insurance plan (U.S. DOL 2011b). Sick leave typically pays 100 percent of wages for a few weeks depending on the worker's job tenure and hours worked.

State laws require employers to provide short to medium-term disability insurance in five states: California, Hawaii, New Jersey, New York, and Rhode Island. Benefits typically replace about half of the worker's prior earnings. Most programs pay benefits for twenty-six weeks except California, which pays benefits up to fifty-two weeks. The methods used for providing coverage vary depending on the state. In California and Rhode Island, benefits are financed solely by employee contributions. In Hawaii, New Jersey, and New York, employers also contribute. A worker must have a specified amount of past employment or earnings to qualify for benefits. Weekly benefits are related to a claimant's earnings while in covered employment. There are typically other state and local short-term disability benefit programs for public employees, particularly police and firefighters.

Some private employers offer short-term disability insurance to their workers. Both employers and employees may be required to contribute to the cost of the short-term disability insurance (EBRI 2009). About 38 percent of private sector employees were covered by short-term disability insurance in 2010 (U.S. DOL 2011b).

In general, workers receiving workers' compensation benefits are not eligible for these other types of short-term disability benefits. However there are also other state and municipal disability benefit programs for public employees and particularly for uniformed employees that coordinate with workers' compensation programs or in some cases are an alternative to workers' compensation.

Long-term disability insurance that is financed, at least in part, by employers, covers about 32 percent of private sector employees. Such coverage is most common among relatively high-paying management, professional, and related occupations. About 58 percent of workers in management and professional-related occupations were covered by long-term disability plans as of March 2011, compared to 32 percent of workers in clerical and sales occupations, and 11 percent of workers in service occupations (U.S. DOL 2011b). Long-term disability insurance

<sup>14</sup> A recent report by the Government Accounting Office (2009) on underreporting of injuries recommended interviewing workers during audits, minimizing the time between the date of recording of injuries and the date they are audited, updating the list of hazardous industries regularly, and educating and training employers on recordkeeping requirements to reduce underreporting.

is also sold in individual policies, typically to highearning professionals. Such individual policies are not included in these coverage statistics.

Long-term disability benefits are usually paid after a waiting period of three to six months, or after short-term disability benefits end. Long-term disability insurance is generally designed to replace 60 percent of earnings, although replacement rates of 50 or 66 percent are also common. Almost all long-term disability insurance is coordinated with Social Security disability insurance benefits and workers' compensation benefits. That is, private long-term disability benefits are reduced dollar for dollar by the amount of social insurance benefits. If Social Security benefits replace 40 percent of a worker's prior earnings, for example, the long-term disability benefit would pay the balance to achieve a 60 percent wage replacement.

#### **Retirement Benefits**

Retirement benefits may also be available to workers who become disabled. Most defined benefit pension plans have some disability provision; benefits may be available at the time of disability or may continue to accrue until retirement age. Defined contribution pension plans will often make funds in an employee's account available without penalty if the worker becomes disabled, but these plans do not have the insurance features of defined benefit pensions or disability insurance.

### Social Security Disability Insurance and Medicare

Workers' compensation as a source of disability benefits is surpassed in size only by the federal Social Security Disability Insurance (SSDI) program and Medicare. These programs provide cash and medical benefits respectively to workers with disabilities who become unable to work prior to normal retirement age.

"Workers' compensation as a source of disability benefits is surpassed in size only by SSDI and Medicare."

While Social Security disability benefits and workers' compensation are the nation's two largest work-based

disability benefit programs, the two programs differ in many respects. Workers' compensation benefits cover only those disabilities arising out of and in the course of employment, whereas Social Security disability benefits are provided whether the disability arises on or off the job. Workers are eligible for workers' compensation benefits from their first day of employment, while eligibility for SSSDI requires workers to have a substantial work history. Workers' compensation provides benefits for both short-term and long-term disabilities, and for partial as well as total disabilities. Social Security disability benefits are paid only to workers who have long-term impairments that preclude any gainful work. Workers' compensation cash benefits begin after a few days' work absence, and medical benefits are available immediately. Social Security disability benefits begin after a five month waiting period.

Medicare coverage begins for those on SSSDI after a further 24 -month waiting period, or 29 months after the onset of disability. Medicare covers all medical conditions, not just work-related injuries or illnesses. As a result of the Medicare Secondary Payer Act when a worker receiving workers' compensation is a Medicare beneficiary, workers' compensation is the primary payer and Medicare is the secondary payer for care related to the occupational injury.

Many who receive Social Security disability benefits have impairments associated with aging. The share of insured workers who receive benefits rises sharply at older ages, from less than one percent of the youngest insured workers to about 15 percent of insured workers age 60–64 (Reno and Eichner 2000). Relatively few individuals who receive Social Security Disability Insurance benefits return to work. Typically, they leave the disability benefit rolls when they die or when they reach retirement age and shift to Social Security retirement benefits. Workers' compensation benefits are distributed more evenly across age groups, and typically end when the worker returns to work.

Workers' compensation paid \$29.5 billion in cash benefits and \$28.1 billion for medical care in 2010. In that year, Social Security paid \$124.2 billion in wage replacement benefits to disabled workers and their dependents and Medicare paid \$73.9 billion for medical and hospital care for disabled persons under age 65 (SSA 2011d; CMS 2011). Thus, aggregate workers' compensation cash benefits were about a

quarter of the total amount of Social Security disability benefits, and workers' compensation medical benefits were less than half of the total amount paid by Medicare.

### Coordination between Workers' Compensation and Social Security Disability Insurance Benefits

If a worker becomes eligible for both workers' compensation and Social Security disability insurance benefits, one or both of the programs will limit benefits to avoid making excessive payments relative to the worker's past earnings. The Social Security amendments of 1965 require that Social Security disability benefits be reduced<sup>15</sup> (or "offset") so that the combined totals of workers' compensation and Social Security disability benefits do not exceed 80 percent of the workers' prior earnings. <sup>16</sup> Some states, however, had established reverse offset laws prior to the 1965 legislation, whereby workers' compensation payments are reduced if the worker receives Social Security disability benefits. Legislation in 1981 eliminated the states' option to adopt reverse offset laws, but the 15 states that already had such laws in place were exempted. <sup>17</sup>

Table 18

Social Security Disability Insurance (DI) Beneficiaries with Workers' Compensation (WC) or Public Disability Benefit (PDB)<sup>1</sup>: Number and percentage of beneficiaries, by type of compensation and DI offset status, December 2011

	То	tal	Wor	kers	Depen	dents
Type of Case	Number	Percent	Number	Percent	Number	Percent
All disability insurance beneficiaries	10,613,334	100.0	8,575,544	100.0	2,037,790	100.0
Total with some connection to WC or PD	OB 1,414,691	13.3	1,114,985	13.0	299,706	14.7
Current connection to WC or PDB	727,045	6.9	573,681	6.7	153,364	7.5
DI reduced by cap	124,993	1.2	90,328	1.1	34,665	1.7
DI not reduced by cap	386,186	3.6	313,360	3.7	72,826	3.6
Reverse jurisdiction	56,909	0.5	45,069	0.5	11,840	0.6
Pending decision on WC or PDB	158,957	1.5	124,924	1.5	34,033	1.7
DI previously offset of WC or PDB	687,646	6.5	541,304	6.3	146,342	7.2

<sup>1</sup> Social Security disability benefits are offset against workers' compensation and certain other public disability benefits (PDB). In general, the PDB offset applies to disability benefits earned in state, local, or federal government employment that is not covered by Social Security.

SOURCE: Social Security Administration, Master Beneficiary Record, 100 percent data and Social Security Administration Workers' Compensation and Public Disability Benefit file, 100 percent data. (SSA 2011b).

<sup>15</sup> The portion of workers' compensation benefits that offset (reduce) SSDI benefits are subject to federal income tax (IRC section 86(d)(3)).

The cap remains at 80 percent of the worker's average earnings before disability, except that, in the relatively few cases when Social Security disability benefits for the worker and dependents exceed 80 percent of prior earnings, the benefits are not reduced below the Social Security amount. This cap also applies to coordination between Social Security disability insurance and other public disability benefits (PDB) derived from jobs not covered by Social Security, such as state or local government jobs where the governmental employer has chosen not to cover its employees under Social Security.

<sup>17</sup> States with reverse offset laws are: Colorado, Florida, Hawaii, Illinois, Louisiana, Minnesota, Montana, Nevada, New Jersey, New York, North Dakota, Ohio, Oregon, Washington, and Wisconsin.

As of December 2011, about 8.6 million disabled workers and 2.0 million of their dependents received Social Security disability benefits (Table 18). About 1.4 million of these individuals (or 13.3 percent) had some connection to workers' compensation or some other public disability benefits. Of these, 125 thousand persons (or 1.2 percent of the total) were currently receiving SSDI benefits that were reduced because of the offset and 688 thousands (or 6.5 percent of the total) had their Social Security benefits reduced in prior years because of the offset.

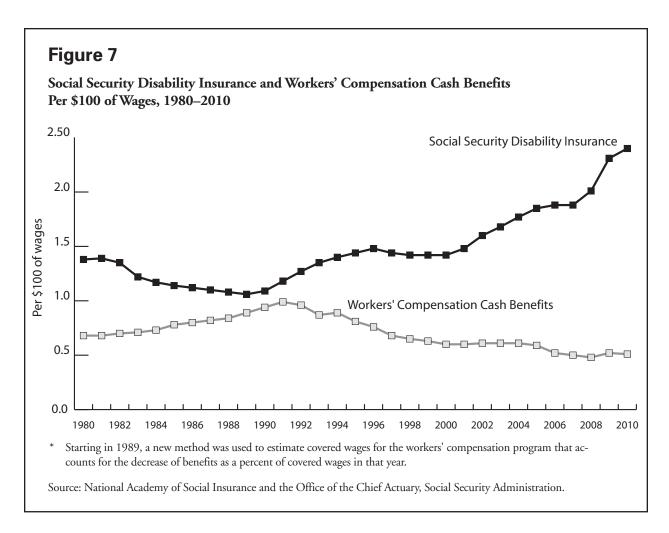
# Trends in Social Security Disability Benefits and Workers' Compensation

Figure 7 illustrates long-term trends in Social Security Disability Insurance and workers' compensation cash payments as a share of covered wages in each program. Since 1990 there has been a steady increase in Social Security disability benefits as a

share of covered wages, and the increase accelerated after 2007. In 1990 Social Security disability insurance paid \$1.09 in cash benefits per \$100 covered wages; by 2010 benefits had increased to \$2.40 per \$100 covered wages. The sharp increases in costs of the Social Security Disability Insurance program are a source of concern to policymakers as they confront the potential insolvency of the DI trust fund in 2016 (Reno, Walker, and Bethell 2012).

In contrast, the costs of workers' compensation cash benefits as a share of covered wages have declined over the last 20 years. When averaged across all states, workers' compensation disability insurance paid \$0.94 in cash payments per \$100 covered wages in 1990, compared to only \$0.51 per \$100 covered wages in 2010 (Table 14).

Some researchers attribute the decline in average costs of workers' compensation cash benefits to decreases in the incidence of work-related injuries since the 1990's (see Tables 16 and 17) and to



retrenchment in the generosity of some state workers' compensation programs over the same period (Guo and Burton 2010). Between 1990 and 2010, for example, a number of states reduced the maximum allowable disability payment per week, reduced the maximum allowable duration of permanent partial disability benefits, and/or applied more stringent eligibility criteria to qualify for disability benefits.

The differing trends in costs of Social Security Disability Insurance and workers' compensation cash benefits have caused some researchers to raise the question: To what extent have retrenchments in state workers' compensation programs contributed to the increasing costs of Social Security Disability Insurance since 1990? The populations served by the two programs overlap to some extent: working-age persons with disabilities arising from and in the course of employment may qualify for both programs if their health condition is so severe they are unable to work. As workers' compensation eligibility rules have been tightened in some jurisdictions, some workers who have been denied benefits may apply for Social Security Disability Insurance. Others whose benefits have been reduced may qualify for increases in the Social Security disability payments they already receive.

The question of whether there has been cost-shifting between Social Security Disability Insurance and state workers' compensation programs is the subject of debate. Some researchers find a statistically significant negative correlation between the generosity of a state's workers' compensation program and the applications for Social Security Disability Insurance in that state, but the magnitude of the effect is small (Guo and Burton 2012). Other researchers have found no significant correlation between the costs of the two programs (McInerney and Simon 2012).

Both sides agree that changes in workers' compensation cash benefits are not a major cause of the increasing costs of Social Security Disability Insurance since 1990. The aging of the U.S. population, the increasing share of females in the workforce, and, in recent years, the high unemploy-

ment rate are the primary factors explaining the rising costs of Social Security Disability Insurance.

# Incurred Benefits Compared with Paid Benefits

The National Academy's estimates of workers' compensation benefits in this report are the amounts paid to workers in a calendar year regardless of whether the injuries occurred in that calendar year or in a previous year. This measure, calendar year paid benefits, is commonly used in reporting data on social insurance programs, private employee benefits, and other income security programs. A different measure, accident year incurred losses, which is equivalent to accident year incurred benefits, is commonly used for workers' compensation insurance purchased from private carriers and some state funds. This statistic measures benefit liabilities incurred by the insurer for injuries that occur in a particular year, regardless of whether the benefits are paid in that year or future years. (The terms "losses" and "benefits" are used interchangeably because benefits to the worker are losses to the insurer.) Both measures, calendar year paid benefits and accident year incurred benefits, reveal important information. 18

"Incurred losses are liabilities incurred by an insurer for injuries that occur in a particular year, regardless of whether the benefits are paid in that year or future years. Incurred losses are the appropriate measure for setting insurance premiums."

For the purpose of setting insurance premiums, it is vital to estimate the incurred benefits that the premiums are required to cover. When an employer purchases workers' compensation insurance for a

particular policy period, the premiums cover current and future benefit liabilities for all injuries that occur during the policy period. State rating bureaus and the National Council on Compensation Insurance (which provides advisory rate-setting and statistical services in 37 jurisdictions) focus on accident year (or policy year) incurred benefits.

Accident year incurred benefits are more appropriate than calendar year paid benefits in estimating the ultimate amount of benefits that will be owed to newly injured workers in response to policy changes. For example, if a state lowers benefits or tightens compensability rules for new injuries as of a given date, future benefits would be expected to decline. Similarly, if a state raises benefits or expands the range of compensable injuries, future benefits would be expected to increase. The policy change would show up immediately in estimates of accident year incurred benefits, but would be observed more slowly in measures of calendar year paid benefits because the latter measure is affected by payments for past injuries not affected by the policy change.

A disadvantage of relying solely on accident year incurred benefits is that it takes many years before the losses from a particular year are actually known; in the meantime, estimates of the losses for that accident year are updated annually. The NCCI updates accident year incurred benefits for sixteen years

before the data for a particular year are considered final (or "developed to ultimate"). In contrast, calendar year paid benefits are final at the end of the calendar year.

An additional disadvantage of accident year incurred data is that the data are generally less complete than calendar year paid data. Accident year incurred benefits are estimated for insurance policies purchased from private carriers and from some state funds, but this information is not routinely available for other state funds and for self-insured employers. In addition, accident year incurred data exclude benefits that are the responsibility of employers under large deductible policies and all benefits of certain categories of insured employers (see footnote (a) of Table 19 for examples of insured employers).

Table 19 compares accident year incurred benefits reported by NCCI and calendar year paid benefits estimated by NASI for private carriers and state funds in the thirty-eight states included in the NCCI data for the years 1998 through 2010. The two measures of workers' compensation benefits have similar cumulative effects from 1998-2010, but there are non-trivial differences in individual years, such as 2010 when accident-year incurred benefits increased by 3.6 percent while calendar-year paid benefits decreased by one percent.

Table 19

Comparison of Accident-Year Incurred Benefits with Calendar-Year Benefits Paid by Private Carriers and State Funds in Thirty-eight<sup>a</sup> States, 1998–2010

	Accident Year Inci	urred Benefits <sup>a</sup>	Calendar Year	Benefits Paid <sup>b</sup>
Year	Billions of Dollars	Percent Change	Billions of Dollars	Percent Change
1998	\$10.8		\$11.6	
1999	11.8	9.6	11.5	-0.8
2000	12.0	1.6	12.5	8.3
2001	12.3	2.2	12.9	3.3
2002	12.5	1.3	12.9	0.2
2003	12.6	1.2	12.9	0.0
2004	13.0	3.4	13.3	2.9
2005	13.1	.5	14.1	5.7
2006	13.8	5.2	13.9	-1.4
2007	14.9	7.8	14.2	2.5
2008	15.2	2.4	14.8	4.3
2009	13.6	-10.9	14.8	0.1
2010	14.1	3.6	14.7	-1.0
Cumulative	% change from 1998-2010	30.2		26.2

a. These data are for the thirty-eight states reported in the *Calendar-Accident Year Underwriting Results* of the National Council on Compensation Insurance, page 17. They include private carrier and state fund (where relevant) losses incurred in Alabama, Alaska, Arizona, Arkansas, Colorado, Connecticut, the District of Columbia, Florida, Georgia, Hawaii, Idaho, Illinois, Indiana, Iowa, Kansas, Kentucky, Louisiana, Maine, Maryland, Mississippi, Missouri, Montana, Nebraska, Nevada, New Hampshire, New Mexico, North Carolina, Oklahoma, Oregon, Rhode Island, South Carolina, South Dakota, Tennessee, Texas, Utah, Vermont, Virginia and West-Virginia. The data for 1996-1999 include thirty-six states as Nevada is excluded. The 2010 data includes the losses in West-Virginia.

Accident year data exclude benefits paid under the following categories: underground coal mining, F-classification, national defense project, and excess business. The accident year data also exclude benefits paid under deductible policies.

Source: NCCI 2011 and calendar year benefits estimated by the National Academy of Social Insurance.

b. Based on National Academy of Social Insurance data in this report for the states listed in note (a). These data are for private carriers and states funds (where relevant) and excludes benefits paid under deductible policies

### **Glossary**

### General Terms for Workers' Compensation and Related Programs

**AASCIF**: The American Association of State Compensation Insurance Funds (AASCIF) is an association of workers' compensation insurance entities – referred to as state funds – that specialize in writing workers' compensation insurance in a U.S. state or Canadian province. For more information, visit www.aascif.org.

**BLS**: The Bureau of Labor Statistics (BLS) in the U.S. Department of Labor is a statistical agency that collects, processes, analyzes, and disseminates statistical data about the labor market. For more information, visit www.bls.gov.

**Black Lung Benefits**: See Coal Mine Health and Safety Act.

Coal Mine Health and Safety Act: The Coal Mine Health and Safety Act (Public Law 91-173) was enacted in 1969 and provides black lung benefits to coal miners disabled as a result of exposure to coal dust and to their survivors.

Compromise and Release Agreement: An agreement to settle a case that usually involves three elements: a compromise between the worker's claim and the employer's offer concerning the amount of cash and/or medical benefits to be paid; the payment of the compromised amount in a fixed amount (commonly called a "lump sum" but which may or may not be paid to the claimant at once); and the release of the employer from further liability.

**Covered Employment**: The NASI coverage data includes employees of those employers required to be covered by workers' compensation programs. A more inclusive measure of covered employment also includes employees of those employers that voluntarily elect coverage.

**Defense Base Act**: The Defense Base Act (DBA-42 U.S.C. §§ 1651-54) is a federal law extending the Longshore and Harbor Workers' Compensation Act (33 U.S.C. §§ 901-50.) to persons (1) employed by private employers at United States defense bases

overseas, or (2) employed under a public work contract with the United States performed outside the United States, or (3) employed under a contract with the United States performed outside United States under the Foreign Assistance Act, or (4) employed by an American contractor providing welfare or similar services outside the United States for the benefit of the Armed Services.

**Disability**: Loss of potential earning capacity as a consequence of an injury or disease (although there may not be an actual loss of earnings).

**DI**: Disability insurance from the Social Security program. See: SSDI.

**FECA**: The Federal Employees' Compensation Act (FECA-Public Law 103-3 or 5 U.S.C. §§ 8101-52) provides workers' compensation coverage to U.S. federal civilian and postal workers around the world for work-related injuries and occupational diseases.

**FELA**: The Federal Employers' Liability Act (FELA 45 U.S.C. § 51 et seq.) gives railroad workers engaged in interstate commerce an action in negligence against their employer in the event of work-related injuries or occupational diseases.

Guaranty Fund: A guaranty fund is a special state based fund that assumes all or part of the liability for workers' compensation benefits provided to a worker because the employer or insurance carrier legally responsible for the benefits is unable to make payments. Guaranty funds for private insurance carriers (all states with private carriers have these) and for self-insuring employers (less than half the states have these) are always separate funds.

**Group Self Insurance**: A special form of self insurance that is available to groups of employers; only available in a little over half the states.

**IAIABC**: The International Association of Industrial Accident Boards and Commissions (IAIABC) is the organization representing workers' compensation agencies in the United States, Canada, and other nations and territories. For more information, visit www.iaiabc.org.

**Jones Act**: The Jones Act is Section 27 of the Merchant Marine Act (P.L. 66-261) that extends the provision of the Federal Employers' Liability Act to seamen.

**LHWCA:** The Longshore and Harbor Workers' Compensation Act (LHWCA 33 U.S.C. §§ 901-50) requires employers to provide workers' compensation protection for longshore, harbor, and other maritime workers. See: Defense Base Act (DBA)

**NAIC**: The National Association of Insurance Commissioners (NAIC) is the national organization of the chief insurance regulators in each state, the District of Columbia, and five U.S. territories. It assists state insurance regulators, individually and collectively, to achieve insurance regulatory goals. For more information, visit www.naic.org.

**NCCI**: The National Council on Compensation Insurance, Inc. (NCCI) is a national organization that assists private carriers and insurance commissioners in collecting statistical information for pricing workers' compensation coverage in thirty seven states. For more information, visit www.ncci.com.

**OSHA:** The OSHAct created the Occupational Safety and Health Administration (OSHA) within the United States Department of Labor. OSHA is responsible for promulgating standards, inspecting workplaces for compliance, and prosecuting violations.

**OSHAct**: The Occupational Safety and Health Act (OSHAct Public Law 91-596) is a federal law enacted in 1970 that establishes and enforces workplace safety and health rules for nearly all private sector employers.

**Permanent Partial Disability (PPD)**: A disability that, although permanent, does not completely limit a person's ability to work. A statutory benefit award is paid for qualifying injuries.

**Permanent Total Disability (PTD):** A permanent disability that is deemed by law to preclude material levels of employment.

**Second Injury Fund**: A second injury fund is a special fund that assumes all or part of the liability for workers' compensation benefits provided to a worker

because of the combined effects of a work-related injury or disease with a preexisting medical condition

**Self-Insurance**: Self insurance is an arrangement in which the employer assumes responsibility for the payment of workers' compensation benefits to the firm's employees with workplace injuries or diseases. Most employers do not self-insure but instead purchase workers' compensation insurance from a private carrier or state fund.

**SSA**: The U.S. Social Security Administration (SSA) administers the Social Security program, which pays retirement, disability, and survivors' benefits to workers and their families, and the federal Supplemental Security Income program that provides income support benefits to low-income aged and disabled individuals. For more information, visit www.ssa.gov.

**SSDI**: Social Security Disability Insurance (SSDI) pays benefits to insured workers who sustain severe, long-term work disabilities due to any cause. See: DI.

**Temporary Partial Disability (TPD)**: A temporary disability that does not completely limit a person's ability to work.

**Temporary Total Disability (TTD):** A disability that temporarily precludes a person from performing the pre-injury job or another job at the employer that the worker could have performed prior to the injury.

**Unemployment Insurance (UI):** Federal/state program that provides cash benefits to workers who become unemployed through no fault of their own and who meet certain eligibility criteria set by the states.

**USDOL**: The U.S. Department of Labor administers a variety of federal labor laws including those that guarantee workers' rights to safe and healthful working conditions, a minimum hourly wage and overtime pay, freedom from employment discrimination, unemployment insurance, and other income support. For more information, visit www.dol.gov.

**WC**: Workers' compensation. A form of government insurance mandated for most employers that pro-

vides statutory benefits for covered work-related injuries.

Work-Related Injury/Illness: An injury or illness caused by activities related to the workplace. The usual legal test for "work-related" is "arising out of and in the course of employment." However, the definition of a work-related injury or disease that is

compensable under a state's workers' compensation program can be quite complex and varies across states.

**WCRI**: The Workers Compensation Research Institute (WCRI) is a research organization providing information about public policy issues involving workers' compensation systems. For more information, visit www.wcri.org

### **Terms for Workers' Compensation Insurance**

**Accident Year:** The year in which an injury occurred or the year of onset or manifestation of an illness.

Accident Year Incurred Benefits: Benefits associated with all injuries and illnesses occurring in the accident year, regardless of the years in which the benefits are paid. (Also known as calendar-accident year incurred benefits.)

**Calendar Year Paid Benefits**: Benefits paid during a calendar year regardless of when the injury or illness occurred.

Combined Ratio After Dividends: [(1) Losses + (2) Loss Adjustment Expenses + (3) Underwriting Expenses + (4) Dividends to Policyholders] / Net Premium. The Combined Ratio After Dividends is expressed as a percentage of net premiums. (See Overall Operating Ratio.)

**Deductibles**: Under deductible policies written by private carriers or state funds, the insurer is responsible for paying all of the workers' compensation benefits, but employers are responsible for reimbursing the insurer for those benefits up to a specified deductible amount. Deductibles may be written into an insurance policy on a per injury basis, or an aggregate basis, or a combination of a per injury basis with an aggregate cap.

**Dividends to Policyholders**: Both mutual and some stock insurance companies offer policies that pay dividends to policyholders after the policy period. Dividends are based on favorable loss experience by the insurer or the policyholder.

**Incurred Losses** (or Incurred Benefits): Benefits paid to the valuation date plus liabilities for future bene-

fits for injuries that occurred in a specified period, such as an accident year.

**Loss Adjustment Expenses**: Salaries and fees paid to insurance adjusters, as well as other expenses incurred from adjusting claims.

**Losses:** A flexible term that can be applied in several ways: Paid benefits, incurred benefits, fully developed, and possibly including incurred but not reported.

Overall Operating Ratio: The combined ratio after dividends minus net investment gain/loss and other income as a percent of net premium. (See Combined Ratio after Dividends.)

**Paid Losses** (or Paid Benefits): Benefits paid during a specified period, such as a calendar year, regardless of when the injury or disease occurred.

Residual Market: The mechanism used to provide insurance for employers who are unable to purchase insurance in the voluntary private market. In some jurisdictions the state fund is the "insurer of last resort" and serves the function of the residual market. In others, there is a separate pool financed by assessments of private insurers, which is also known as an assigned risk pool.

**Underwriting Expenses**: Commissions, brokerage expenses, general expenses, taxes, licenses, and fees.

**Underwriting Results**: The underwriting experience of private insurance carriers. (See Combined Ratio After Dividends and Overall Operating Ratio.)

**Valuation Date**: A specific time at which data are evaluated in order to determine the losses (or benefits) paid to that date plus reserves as of that date.

### **Appendix A: Coverage Estimates**

The National Academy of Social Insurance's estimates of workers' compensation coverage start with the number of workers in each state who are covered by Unemployment Insurance (UI) (U.S. DOL, 2011f). Those who are not required to be covered include: some farm and domestic workers who earn less than a threshold amount from one employer; some state and local employees, such as elected officials; employees of some non-profit entities, such as religious organizations, for whom coverage is optional in some states; unpaid family workers; and railroad employees who are covered under a separate unemployment insurance program. Railroad workers are also not covered by state workers' compensation because they have other arrangements (NASI 2002).

One category of workers who are not covered under either unemployment insurance or workers' compensation is self-employed individuals. All U.S. employers who are required to pay unemployment taxes must report quarterly to their state employment security agencies information about their employees and payroll covered by unemployment insurance. These employer reports are the basis for statistical reports prepared by the U.S. Bureau of Labor Statistics, known as the ES-202 data. These data are a census of the universe of U.S. workers who are covered by unemployment insurance.

Key assumptions underlying the NASI estimates of workers' compensation coverage, shown in Table A1, are:

- Workers whose employers do not report that they are covered by UI are not covered by workers' compensation.
- (2) Workers that are reported to be covered by UI are generally covered by workers' compensation as well, except in the following cases:
  - (a) Workers in small firms (which are required to provide UI coverage in every state) are not covered by workers' compensation if the state law exempts small firms from mandatory workers' compensation coverage.
  - (b) Employees in agricultural industries (who may be covered by UI) are not covered by workers' compensation if the state law

- exempts agricultural employers from mandatory workers' compensation coverage.
- (c) In Texas, where workers' compensation coverage is elective for almost all employers, estimates are based on periodic surveys conducted by the Texas Research and Oversight Council.

All federal employees are covered by workers' compensation, regardless of the state in which they work.

Small Firm Exemptions. NASI assumes that workers are not covered by workers' compensation if they work for small firms in the fifteen states that exempt small employers from mandatory coverage. Private firms with fewer than three employees are exempt from mandatory coverage in eight states: Arkansas, Georgia, Michigan, New Mexico, North Carolina, Virginia, West Virginia and Wisconsin. Those with fewer than four employees are exempt in two states: Florida, and South Carolina. Finally, firms with fewer than five employees are exempt from mandatory coverage in Alabama, Mississippi, Missouri, Oklahoma, and Tennessee (IAIABC-WCRI 2012).

The number of employees in small firms is estimated using data from the U.S. Small Business Administration for each state, which show the proportion of employees in all private firms who worked for firms with fewer than five employees in 2009, the latest year for which data are available. Those percentages for the fifteen states with numerical exemptions are: Alabama, 4.9 percent; Arkansas, 5.3 percent; Florida, 6.3 percent; Georgia, 5.0 percent; Michigan, 5.1 percent; Mississippi, 5.2 percent; Missouri, 5.0 percent; New Mexico, 5.7 percent; North Carolina, 5.1 percent; Oklahoma, 5.7 percent; South Carolina, 5.2 percent; Tennessee, 4.3 percent; Virginia, 4.9 percent; West Virginia, 5.2 percent; and Wisconsin, 4.5 percent (U.S. SBA 2010).

To estimate the proportion of workers in firms with fewer than three or four employees, we used national data on small firms from the U. S. Census Bureau (U.S. Census Bureau 2005).

Table A1

Documenting Workers' Compensation Coverage Estimates, 2010 Annual Averages

	UI Covered Jobs <sup>a</sup>		Workers	Workers' Compensation Exemptions	mptions		
	F.	Private, non-	Caroll Eimsh	V Since V		WC	WC as a
State	(1)	(2)	3) (3)	Agricuiture (4)	(6)	Covered Jobs (7)	(8)
Alabama	1,775,487	1,457,869	67,985	5,124	1	1,702,378	95.9
Alaska	296,747	234,494			1	296,747	100.0
Arizona	2,339,681	1,981,739			1	2,339,681	100.0
Arkansas	1,112,730	923,939	27,405	7,285	1	1,078,040	6.96
California	14,377,316	12,005,240			1	14,377,316	100.0
Colorado	2,147,956	1,817,784		11,171	1	2,136,785	5.66
Connecticut	1,596,091	1,364,688			1	1,596,091	100.0
Delaware	396,601	341,178		1,247	١	395,354	7.66
District of Columbia	481,695	446,481		1	1	481,695	100.0
Florida	7,049,650	6,061,367	305,023	55,606	1	6,689,021	94.9
Georgia	3,695,681	3,105,702	89,756	13,759	1	3,592,166	97.2
Hawaii	558,827	463,921			ı	558,827	100.0
Idaho	600,284	483,352			1	600,284	100.0
Illinois	5,464,705	4,717,264		12,772	1	5,451,933	8.66
Indiana	2,666,317	2,285,289		11,173	1	2,655,144	9.66
Iowa	1,427,103	1,195,791		12,547	1	1,414,556	99.1
Kansas	1,291,276	1,058,126		8,708	1	1,282,568	99.3
Kentucky	1,670,675	1,404,693		4,098	1	1,666,577	8.66
Louisiana	1,817,241	1,492,046		4,499	1	1,812,742	8.66
Maine	962,995	479,943		2,532	1	564,264	9.66
Maryland	2,329,265	1,979,922		3,598	1	2,325,667	8.66
Massachusetts	3,086,667	2,717,140			1	3,086,667	100.0
Michigan	3,721,368	3,152,236	90,654	22,527	1	3,608,187	97.0
Minnesota	2,535,812	2,180,844		15,122	1	2,520,690	99.4
Mississippi	1,054,444	830,602	43,067	7,632	1	1,003,745	95.2
Missouri	2,550,225	2,164,680	106,432	8,395	1	2,435,398	95.5

124,855,977	2,089,862	457,185	1,203,589	106,191,088	128,606,613	U.S. TOTAL
						100.0
2,82				1	2,826,653	Federal
122,029,324	2,089,862	457,185	1,203,589	106,191,088	125,779,960	U.S. non-federal
266,990	1			207,583	266,990	Wyoming
2,538,508	1	18,212	57,343	2,239,549	2,614,063	Wisconsin
649,888	1	006	17,625	551,316	668,413	West Virginia
2,697,008	1	66,511		2,244,855	2,763,519	Washington
3,289,994	1	8,485	80,941	2,854,296	3,379,420	Virginia
283,901	1	1,961		237,815	285,862	Vermont
1,117,501	1	3,864		951,332	1,121,365	Utah
7,818,102	2,089,862	43,759		8,322,615	9,951,723	Texas
2,421,919	1	5,683	87,569	2,143,465	2,515,171	Tennessee
374,352	ı	3,358		314,507	377,710	South Dakota
1,669,582	1	6,205	58,475	1,422,678	1,734,262	South Carolina
437,877	ı	708		387,482	438,585	Rhode Island
5,344,020	1	19,045		4,722,217	5,363,065	Pennsylvania
1,578,054	ı			1,299,749	1,578,054	Oregon
1,379,082	1	986'9	65,201	1,166,508	1,451,269	Oklahoma
4,865,684	l			4,187,232	4,865,684	Ohio
337,209	1	2,665		281,051	339,874	North Dakota
3,644,633	1	21,897	89,124	3,115,030	3,755,654	North Carolina
8,197,551		19,486		6,881,929	8,217,037	New York
734,396	ı	8,211	16,990	593,828	759,597	New Mexico
3,712,006	1			3,150,653	3,712,006	New Jersey
597,247	1			516,501	597,247	New Hampshire
1,118,337	1	2,042		983,569	1,120,379	Nevada
875,540	1	9,412		733,201	884,952	Nebraska
407,419	1			335,797	407,419	Montana
	407,419 100 875,540 98 1,118,337 99 597,247 100 3,712,006 100 734,396 99 8,197,551 99 3,644,633 99 4,865,684 100 1,379,082 99 4,865,684 100 1,379,082 99 4,37,877 99 1,578,054 100 5,344,020 99 4,37,877 99 1,669,582 99 437,877 99 2,421,919 96 7,818,102 78 1,117,501 99 2,421,919 96 7,818,102 78 1,117,501 99 2,421,919 99 2,421,919 99 2,421,919 99 2,421,919 99 2,421,919 99 2,421,919 99 2,421,919 99 2,538,508 997 2,697,008 997 2,697,008 997 2,697,008 997	407,419 875,540 1,118,337 597,247 3,712,006 734,396 8,197,551 3,644,633 337,209 4,865,684 1,379,082 1,578,054 5,344,020 437,877 1,669,582 374,352 2,421,919 7,818,102 1,117,501 283,901 3,289,994 2,697,008 649,888 2,538,508 2,697,008 649,888 2,697,008	- 407,419 - 875,540 - 1,118,337 - 597,247 - 3,712,006 - 734,396 8,197,551 - 3,644,633 - 337,209 - 4,865,684 - 1,379,082 - 1,578,054 - 5,344,020 - 437,877 - 1,669,582 - 374,352 - 2,421,919 - 2,089,862 - 2,697,008 - 2,697,008 - 2,699,008 - 2,689,862 - 2,689,888 - 2,689,324 - 2,089,862 - 2,689,888	- 407,419 2,042 - 875,540 2,042 - 1,118,337 - 597,247 - 597,247 - 3,712,006 8,211 - 597,247 - 3,712,006 8,211 - 734,396 19,486 - 1,379,082 2,665 - 337,209 - 4,865,684 6,986 - 1,379,082 - 1,578,054 19,045 - 3,44,623 2,683 - 1,669,582 3,358 - 1,669,582 5,683 - 2,089,862 1,117,501 1,961 - 2,83,901 8,485 - 2,089,862 11,105,008 900 - 649,888 18,212 - 2,697,008 900 - 2,538,508 18,212 - 2,697,008 457,185 2,089,862 112,029,324	- 407,419 9,412 875,540 1,042 1,118,337 2,042 1,118,337 2,042 1,118,337 2,042 3,712,006 19,486 8,211 3,712,006 19,486 8,197,551 89,124 21,897 3,44,633 2,665 1,578,054 19,045 1,578,054 1,58,475 6,205 1,578,054 1,58,475 6,205 1,578,054 1,58,475 6,205 1,669,582 87,569 5,683 1,669,582 87,569 5,683 1,117,501 1,961 8,485 2,697,008 17,625 900 2,538,508 57,343 18,212 2,538,508 1,203,589 457,185 2,089,862 122,029,324	335,797  733,201  9,412  - 407,419  83,569  8,2042  - 875,540  8,315,603  1,10,653  8,117,639  8,211  - 734,396  6,881,229  1,106,508  1,10,900  8,211  - 734,396  6,881,229  1,10,486  1,

UI-covered employment reported in the ETA-202 data produced by the United States Bureau of Labor Statistics (U.S. DOL, 2010f). Data not available for 2009, used the 2007 data. a b

Source: National Academy of Social Insurance estimates.

Of workers in firms with fewer than five employees, 81.4 percent worked in firms with fewer than four employees and 58.5 percent worked in firms with fewer than three employees. These ratios were applied to the percentage of workers in firms with fewer than five employees in the respective states. For example, the proportion of Arkansas private sector workers in firms with fewer than three employees is: (5.3 percent) x (58.5 percent) = 3.1 percent. These ratios are applied to the number of UI-covered workers in private, non-farm firms in each state. In the fifteen states together, we estimate that 1.2 million workers were excluded from workers' compensation coverage in 2010 because of the small employer exclusion from mandatory coverage.

**Agricultural Exemptions.** We estimate agricultural workers to be excluded from workers' compensation coverage if they work in any state where agricultural

employers are exempt from mandatory coverage. The following thirteen states have no exemptions for agricultural workers: Alaska, Arizona, California, Connecticut, Hawaii, Idaho, Massachusetts, Montana, New Hampshire, New Jersey, Ohio, Oregon, and Wyoming. In all the other jurisdictions we subtract from UI coverage those workers employed in agricultural industries.

**Texas.** In Texas, where workers' compensation coverage is elective for almost all employers, the NASI estimate of coverage is based on periodic surveys conducted by the Texas Department of Insurance and the Workers' Compensation Research and Evaluation Group, which found 83 percent of Texas employees were covered in 2010 (TDI et al. 2011). This ratio was applied to all UI-covered Texas employees other than federal government workers (who were not included in the Texas surveys).

### **Appendix B: 2010 Survey Questionnaire**

Table B
Annual Data Survey - Project on National Data for Workers' Compensation, 2010
National Academy of Social Insurance

Your Name:

State: Phone:

Agency/Organization:

and regardless of whether the case was closed or remains open. If you are unable to report calendar year data, please indicate the 12-month period of the data you are reporting. Please be sure to list benefits paid, not incurred. If your agency does not have the data to fill out this questionnaire, please send NASI the contact information for the entity or person in your state that may have the information. Calendar Year Paid Data - Please provide the information requested below for calendar years 2006-2010. Calendar year paid data refer to all payments made that year, regardless of accident year E-mail:

	CY 2010 Payments	CY 2009 Payments	CY 2008 Payments	CY 2007 Payments	CY 2006 Payments
1) INDIVIDUAL SELF-INSURERS					
Medical Payments	10.0				
Cash Payments					
Compromise lump sum settlements (if not included above)					
TOTAL	The second second	24 THE RESERVE		the the set of	20 10 10 10 mg
Is Group Self-Insurance allowed in your state?	yes no	yes no	yes no	yes no	yes no
Does the total above incude Group Self Insured?	yes no	yes no	yes no	yes no	yes no
If not, fill in 2)	The Spreadown States	ter angement from	The second that the second	THE PROPERTY SHARE	and the same of the same of
2) GROUP SELF-INSURERS					
Medical Payments					
Cash Payments					
Compromise lump sum settlements (if not included above)	g			9-1	
TOTAL	-4				
3) PRIVATE CARRIERS					
Medical Payments					
Cash Payments					
Compromise lump sum settlements (if not included above)					
TOTAL					
Are deductibles allowed for private carriers?	yes no	yes no	yes no	yes no	yes no
Does the amount above include deductible payments by employers?	yes no	yes no	yes no	yes no	yes no
How much was paid under the deductible amounts?					
4) STATE FUNDS (if state has competitive or exclusive fund)*					
Medical Payments					
Cash Payments					
Compromise lump sum settlements (if not included above)					
TOTAL	100 mm 10			100 mm 10	State 1
Are deductibles allowed for the state fund?	yes no	yes no	yes no	yes uo	yes no
Does the amount above include deductible payments by employers?	yes no	yes no	yes no	yes no	yes no
How much was paid under the deductible amounts?					

A company of the second company of the secon	CY 2010 Payments	CY 2009 Payments	CY 2008 Payments	CY 2007 Payments	CY 2006 Payments
5) SPECIAL FUNDS (including second injury, and other)	The second secon	The second secon	200000000000000000000000000000000000000	ARTHUR DE LA CONTRACTOR	The second secon
Medical Payments					
Cash Payments					
Compromise lump sum settlements (if not included above)					
TOTAL					
Is this amount included in items 3 and/or 4?	yes no	yes no	yes no	l ou l sek	yes no
Is so, which and how much?	a proposition and the	8 2000 N VAN	k and the state of	1000	
6) INSURANCE GUARANTY FUNDS					
Medical Payments					
Cash Payments					
Compromise "lump sum settlements" (if not included above)					
TOTAL					
7) SELF-INSURED GUARANTY FUNDS					
Medical Payments					
Cash Payments					
Compromise "lump sum settlements" (if not included above)					
TOTAL					4.6
8) CALENDAR YEAR TOTAL BENEFITS PAID (Should equal the sum of item	ems #1-7)				
Medical Payments					
Cash Payments					
Compromise lump sum settlements (if not included above)					
TOTAL					

\* Please state if it is a risk pool.

Are you attaching additional information?

Please e-mail your respose to NASI at isengupta@nasi.org or fax to 202-452-8111 by November 30, 2011 For more information contact Ishita Sengupta by e-mail at isengupta@nasi.org or by phone at 202-452-8097 ext. 1305

## **Appendix C: Data Sources for 2010**

Estimates of benefits paid and employer costs for workers' compensation by the National Academy of Social Insurance (NASI) rely on two main sources: responses to the NASI survey questionnaire from state agencies and data purchased from A.M. Best, a private company that specializes in collecting insurance data and rating insurance companies.

The A.M. Best data show the experience of private carriers in every state, but do not include any information about self-insured employers or about benefits paid under deductible arrangements. The A.M. Best data show total "direct losses" (that is, benefits) paid in each state in 2006–2009, by private carriers and by twenty-five entities that we classify as competitive state funds, based on their membership in the American Association of State Compensation Insurance Funds. A.M. Best did not provide information on the exclusive state funds in Ohio, North Dakota, Washington, and Wyoming. The 2010 NASI survey questionnaire for state agencies asked states to report data for five years, from 2006 through 2010. These historical data were used to revise and update estimates for these past years. Table C1 describes the sources of data available for each state used in the data report.

#### **Private Carrier Benefits**

Of the 51 jurisdictions, 47 allow private carriers to write workers' compensation policies. Of these, we used the agency data for 14 jurisdictions and rating bureau data for 4 states that were able to provide data on the amount of benefits paid by private carriers. In the other states, A.M. Best data were used to estimate private carrier benefits. An estimate of benefits paid under deductible policies was added to benefits paid reported by A.M. Best to estimate total private carrier benefits in these states. Methods for estimating deductible amounts are described in Appendix G.

#### **State Fund Benefits**

Twenty-five states had a competitive state fund that paid workers' compensation benefits in 2010. Of these, 11 were able to provide benefit data. A.M. Best data and NAIC (National Association of Insurance Commissioners) data were used to estimate state fund benefits in states unable to provide the data. An estimate of benefits paid under

deductible policies was added to benefits reported by A.M. Best to estimate total state fund benefits in these states.

#### **Self-Insured Benefits**

All jurisdictions except North Dakota and Wyoming allow employers to self-insure. Thirty-five of these jurisdictions were able to provide data on benefits paid by self-insurers. Prior years' self-insured benefit ratios to total benefits were used to estimate the self-insurance data for three states. Self-insurance benefits were imputed for the 11 states that were unable to provide data. The self-insurance imputation methods are described in Appendix E.

#### **Second Injury Funds**

Forty-one states have provided us with second injury fund and special fund data. There were 10 states for which data were not available. For states where the data were available for reporting purposes, they were distributed evenly across private carriers, state funds and self-insured employers according to their share in the total. Second-injury funds are financed through general state revenues or assessments on workers' compensation insurers and self-insuring employers. Second injury fund and special fund data are given in Table J1.

#### Insurance Guaranty Funds and Self-Insurance Guaranty Funds

Guaranty Funds cover the outstanding claims of insolvent insurance companies, the property and casualty guaranty fund system. Self-insurance guaranty funds ensure the payment of outstanding workers' compensation liabilities of self-insured employers that went insolvent. For states where data were available, the insurance guaranty fund data was included in the private carriers' benefits data and the self-insurance guaranty funds data were included in the self-insurance benefits data for that state.

#### **Benefits under Deductible Policies**

Forty-seven jurisdictions allow carriers to write deductible policies for workers compensation. Of these jurisdictions, six were able to provide the amount of benefits paid under deductible policies. Benefits under deductible arrangements were estimated for another 14 states by subtracting A.M. Best data on benefits paid (which do not include deductible benefits) from data reported by the state agency (which, in these cases, included deductible benefits). Deductible benefits in the remaining states were estimated using a ratio of Manual Equivalent Premiums, as described in Appendix G.

#### **Medical Benefits**

The state workers' compensation agency data and rating bureau data for medical share were used in thirteen states. The National Council on Compensation Insurance estimates of the medical share of the benefits were used in 37 jurisdictions. Other methods were used for one state for which no information was available from the state or NCCI. More detail on methods to estimate medical benefits is in Appendix F.

#### **Employer Costs**

NASI estimates of employer costs for benefits paid under private insurance and state funds are the sum of "direct premiums written" as reported by A.M. Best and the NAIC, plus our estimate of benefits paid under deductible arrangements (which are not reflected in premiums). In some cases, data provided by state agencies are used instead of A.M. Best data. State fund premium data for North Dakota, Ohio and Washington were provided by the state agencies. For self-insured employers, the costs include benefit payments and administrative costs. Because self-insured employers often do not separately record administrative costs for workers' compensation, their administrative costs must be estimated. The costs are assumed to be the same share of benefits as administrative costs reported by private insurers to the National Association of Insurance Commissioners (NAIC 1998-2010). These administrative costs include direct defense and cost containment expenses paid<sup>19</sup> and expenses for taxes, licenses, and fees.<sup>20</sup>

The ratios of these administrative costs to direct losses paid by private insurers were:

2006: 19.9 percent;

2007: 19.1 percent;

2008: 16.6 percent;

2009: 16.1 percent; and

2010: 16.1 percent.

<sup>19</sup> Direct Defense and Cost Containment Expense Paid: In 1999, as part of a clarification effort, this line was renamed from "Direct Allocated Loss Adjustment Expenses" to "Direct Defense and Cost Containment Expenses." It includes defense, litigation and medical cost containment expenses, whether internal or external. The fees charged for insurer employees should include overhead, just as an outside firm's charges would include. The expenses exclude expenses incurred in the determination of coverage.

<sup>20</sup> Taxes, Licenses, and Fees: State and local insurance taxes deducting guaranty association credits, insurance department licenses and fees, gross guaranty association assessments, and all other (excluding federal and foreign income and real estate).

**Table C1**Data Sources for 2010

State	Private Carrier	State Fund	Self- Insured	Second Injury Fund	Guaranty Fund	Self- Insurance Guaranty Funds		SF Deductible	Medical
Alabama	Agency	-	Agency	n.a	AL Insurance Guaranty Assn.	n.a	Subtraction	-	NCCI
Alaska	Agency	-	Agency	Agency	Agency	n.a	Subtraction	-	NCCI
Arizona	AMBest	AMBest	Agency	Agency	n.a	n.a	Manual Premium Method	Manual Premium Method	NCCI
Arkansas	AMBest	-	Agency	Agency	AS Property and Insurance GF	n.a	Manual Premium Method	-	NCCI
California	Rating Bureau	AMBest	Agency	Subsequent Injury Fund and Uninsured Employers Fund	CA Insurance Guaranty Assn.	California Self-Insurers Security Fun		Not Allowed	Rating Bureau
Colorado	AMBest	AMBest	Agency	Agency	Western GF Services	n.a	Manual Premium Method	Manual Premium Method	NCCI
Connecticut	AMBest	-	Agency	Agency	CT Insurance Guaranty Assn.	n.a	Manual Premium Method	-	NCCI
Delaware	AMBest	-	Agency	Agency	Delaware Insurance Guaranty Assn.	n.a	Agency given	-	Rating Bureau
D.C.	AMBest	-	Agency	Agency	n.a	n.a	Manual Premium Method	-	NCCI
Florida	AMBest	-	Agency	Agency	n.a	n.a	Manual Premium Method	-	NCCI
Georgia	AMBest	-	Imputation	Subsequent Injury Trust Fund	GA Insurers Insolvency Pool	Agency	Manual Premium Method	-	NCCI
Hawaii	Agency	Agency	Agency	Agency	n.a	n.a	Subtraction	Subtraction	NCCI
Idaho	Agency	AMBest	Agency	Agency	Western GF Services	n.a	Subtraction 1	Manual Premium Method	NCCI
Illinois	AMBest	-	Imputation	Agency	Agency	n.a	Manual Premium Method	-	NCCI
Indiana	AMBest	-	Agency	Workers Compensation Board	IN Insurance Guaranty Assn.	n.a	Manual Premium Method	-	NCCI
Iowa	AMBest	-	Imputation	Agency	n.a	n.a	Manual Premium Method	-	NCCI
Kansas	AMBest	-	Agency	Agency	Western GF Services	n.a	Manual Premium Method	-	NCCI
Kentucky	AMBest	AMBest	Imputation	Agency	KY Insurance Guaranty Assn.	n.a	Manual Premium Method	Manual Premium Method	NCCI
Louisiana	AMBest	AMBest	Imputation	Agency	LA Insurance Guaranty Assn.	n.a	Manual Premium Method	Manual Premium	NCCI
Maine	AMBest	AMBest	Agency	n.a	ME Insurance Guaranty Assn.	n.a	Manual Premium Method	Manual Premium Method	NCCI
Maryland	Agency	Agency	Agency	Agency	n.a	n.a	Subtraction	Subtraction	NCCI
Massachusetts	Rating Bureau	-	Agency	Agency	MA Insurers Insolvency Fund	n.a	Agency given	-	Rating Bureau
Michigan	Agency	-	Agency	Agency	MI Property & Casualty Guaranty Assn.	Agency	Subtraction	-	Agency
Minnesota	Agency	Agency	Agency	Agency	Agency	Agency	Agency given	Not Allowed	Agency
Mississippi	Agency	-	Agency	Agency	MS Insurance Guaranty Assn.	n.a	Subtraction	-	NCCI

### **Table C1 continued**

#### Data Sources for 2010

State	Private Carrier	State Fund	Self- Insured	Second Injury Fund	Guaranty Fund	Insurance Guaranty Funds	PC Deductible	SF Deductible	Medica
Missouri	A.M. Best	A.M. Best	Agency	Agency	n.a.	Agency	Manual Premium Method	Manual Premium	NCCI
Montana	Agency	AMBest	Agency	Agency	Western GF Services	n.a	Subtraction	Manual Premium Method	NCCI
Nebraska	AMBest	-	Imputation	WC Trust Fund	n.a	n.a	Manual Premium Method		NCCI
Nevada	Agency	-	Agency	Agency	Agency	n.a	Subtraction	-	NCCI
New Hampshire	e AMBest	-	Imputation	Agency	NH Insurance Guaranty Assn.	n.a	Manual Premium Method	ı -	NCCI
New Jersey R	Rating Bureau	-	Imputation	Agency	NJ Property and Life Insurance Guaranty Assn.	Agency	Subtraction	-	Rating Bureau
New Mexico	Agency	Agency	Agency	Agency	Agency	n.a	Subtraction	Subtraction	NCCI
New York R	Rating Bureau	AMBest	Agency	n.a	n.a	n.a	Subtraction	Not Allowed	Rating Bureau
North Carolina	AMBest	-	Imputation	n.a	n.a	n.a	Manual Premium Method		NCCI
North Dakota	AMBest	Agency	-	n.a	n.a	n.a	-	Imputation	Agency
Ohio	AMBest		Imputed from previous years data	n.a	n.a	n.a	Not Allowed	Not Allowed	Agency
Oklahoma	AMBest	AMBest	Agency	n.a	n.a	n.a	Manual Premium Method	Manual Premium Method	NCCI
Oregon	Agency	Agency	Agency	Agency	Agency	Agency	Agency given	Not Allowed	NCCI
Pennsylvania	Agency	Agency	Agency	Agency	Agency	Agency	Agency Given	Not allowed	Agency
Rhode Island	AMBest	AMBest	Agency p	Workers' Com- ensation Admini strative Fund	RI Insurers - Insolvency Fund	n.a	Manual Premium Method	Manual Premium Method	NCCI
South Carolina	Agency	Agency	Agency	Agency	SC Property and Casualty Insurance Guaranty Assn.	n.a	Agency given	Not Allowed	NCCI
South Dakota	Agency	-	Agency	n.a	n.a	n.a	Subtraction	-	NCCI
Tennessee	AMBest	-	Agency	Agency	n.a	n.a	Manual Premium Method	-	NCCI
Texas	AMBest		Imputed from previous years data	n.a	TX Guaranty Fund	n.a	Manual Premium Method	Manual Premium Method	NCCI
Utah	AMBest	AMBest	Imputation	Employers Reinsurance Fund	UT Property and Casualty Insurance Guaranty Assn.	n.a	Manual Premium Method	Manual Premium Method	NCCI
Vermont	AMBest		Imputed from evious years dat	n.a a	VT Property & Casualty Insurance Guaranty Assn.	n.a	Manual Premium Method		NCCI
Virginia	AMBest	-	Imputation	n.a	VA Property & Casualty Insurance Guaranty Assn.	n.a	Manual Premium Method	-	NCCI
Washington	AMBest	Agency	Agency	Agency	n.a	Agency	Not Allowed	Not Allowed	Agency
West Virginia	AMBest	Agency	Agency	Agency	n.a	Agency	Manual Premium Method	Manual Premium Method	Agency
Wisconsin	AMBest	-	Agency	Agency	n.a	n.a	Not Allowed	-	Agency
Wyoming	AMBest	NAIC data	-	n.a	Western GF Services	n.a	Not Allowed Average	Not Allowed	Nationa

## Appendix D: Revised Data for 2006–2009

In preparing the 2010 estimates for workers' compensation benefits, the National Academy of Social Insurance reviewed and revised all data for calendar years 2006-2009. These revised data are shown in Tables D1 to D4. The revision process began by requesting historical data from state workers' compensation agencies and from A.M. Best. The revised benefit estimates are reported in the following tables.

Revisions to the historical data increase consistency in historical methodology and enhance comparability between years. The following are key revisions made to the historical data:

- Revised data consistently use the same medical benefit estimation methodology described in Appendix F.
- 2. Revised data consistently use the same deductible estimation methodology described in Appendix G.
- Self-insurance benefit imputations were revised using historical data as reported in Appendix E.
- Changes in data reported by state agencies were captured by the revised data questionnaire and are reflected in the revised estimates.

 Administrative costs for self-insurance were reestimated based on updated information from the National Association of Insurance Commissioners as described in Appendix C.

The revised data in this appendix should be used in place of previously published data. Historical data displayed in the body of this report incorporate these revisions. In the last several years, we have also made significant changes in the procedures used to estimate benefit payments for some states. In California, for example, we have revised our estimates from 2001 onward to exclude medical cost containment expenses from medical benefits paid, consistent with our estimates for other states. In 2010 nearly 16 percent of total medical payments in California were for medical cost containment expenses, so this represents an important change. Because California is such a large state, any adjustment of the California data also affects estimates for the nation as a whole.

Table D5 is the corrected version of table 9.B1 of the *Annual Statistical Supplement to the Social Security Bulletin*, 2011.

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Workers' Compensation Benefits* by Type of Insurer and Medical Benefits, by State, 2009 (in thousands)	n Benefits* by Type o	f Insurer and Medical	Benefits, by State, 200	9 (in thousands)			
State	Private Carriers <sup>a</sup>	State Funds	Self-Insured <sup>b</sup>	Total	Percent Medical	Medical <sup>C</sup>	
Alabama	\$297,824	€\$	\$327,930	\$625,755	67.6	\$423,010	
Alaska	162,002		59,020	221,021	66.4	146,758	
Arizona	229,756	318,925	109,434	658,115	62.1	408,690	
Arkansas	150,118		64,949	215,067	65.8	141,514	
California	4,889,209	1,607,705	2,895,922	9,392,835	54.2	5,095,538	
Colorado	245,016	383,522	207,700	836,238	50.2	419,792	
Connecticut	629,594		213,246	842,840	43.5	366,635	
Delaware	161,479		44,666	206,145	55.1	113,586	
District of Columbia	80,073		24,599	104,672	37.5	39,252	
Florida	1,947,778		872,969	2,820,747	64.4	1,816,561	
Georgia	1,117,606		409,822	1,527,428	49.4	754,549	
Hawaii	131,796	30,557	82,022	244,375	43.0	105,081	
Idaho	90,872	149,868	17,129	257,868	61.4	158,331	
Illinois	2,262,797		762,537	3,025,334	47.9	1,449,135	
Indiana	538,470		59,577	598,048	71.1	425,212	
Iowa	430,964		117,641	548,605	54.0	296,247	
Kansas	303,924		112,233	416,157	59.2	246,365	
Kentucky	383,977	87,809	214,357	686,142	57.1	391,787	
Louisiana	428,765	133,165	270,067	831,997	54.2	450,942	
Maine	89,080	94,684	76,762	260,526	46.2	120,363	
Maryland	463,562	210,190	222,153	895,905	44.6	399,574	
Massachusetts	747,331		204,751	952,081	34.2	325,947	
Michigan	958,184		551,697	1,509,881	35.1	530,182	
Minnesota	760,568	54,077	257,477	1,072,122	51.6	553,565	
Mississippi	187,656		134,115	321,771	59.3	190,810	
Missouri	539,917	84,041	225,840	849,798	54.7	464,840	
Montana	80,081	128,298	37,854	246,233	56.8	139,860	
Nebraska	234,798		64,494	299,292	60.5	181,071	
Nevada	291,480		139,557	431,037	46.1	198,708	
New Hampshire	186,656		52,343	238,998	61.3	146,506	

New Jersey	1,560,013		426,712	1,986,725	48.5	962,954
New Mexico	130,230	28,539	87,555	246,325	59.9	147,549
New York	1,787,667	1,096,455	1,252,838	4,136,960	48.0	1,985,741
North Carolina	1,062,795		336,480	1,399,275	44.7	625,476
North Dakota <sup>a</sup>		110,526		110,526	60.5	998'99
Ohio <sup>a</sup>	20,968	1,925,330	407,086	2,353,384	42.4	998,833
Oklahoma	366,903	260,064	158,252	785,218	43.2	339,214
Oregon	237,628	278,635	100,606	616,869	52.0	320,772
Pennsylvania	1,975,878	310,215	615,246	2,901,339	45.5	1,321,460
Rhode Island	58,113	80,712	22,139	160,964	33.4	53,762
South Carolina	662,139	54,017	175,673	891,830	41.3	368,326
South Dakota	90,019		3,558	93,578	65.4	61,200
Tennessee	603,097		178,329	781,426	53.9	421,188
Texas	927,175	351,948	327,144	1,606,267	9.65	957,335
Utah	103,498	135,376	51,078	289,952	69.1	200,357
Vermont	125,297		19,268	144,565	49.4	71,415
Virginia	652,942		205,723	858,665	57.9	497,167
Washington <sup>a</sup>	19,007	1,756,175	537,003	2,312,186	35.0	808,271
West Virginia <sup>a</sup>	21,580	274,566	45,571	341,717	36.2	123,707
Wisconsin	957,461		156,628	1,114,089	8.89	766,438
Wyoming <sup>a</sup>	71	134,764		134,835	50.9	68,670
Non-federal total	\$30,383,816	\$10,080,163	\$13,939,749	\$54,403,728	50.9	\$27,667,111
Federald				3,542,605	29.3	1,039,167
Federal employees <sup>e</sup>				2,763,885	31.3	863,729
TOTAL				\$57,946,333	49.5	\$28,706,278

' Benefits are payments in the calendar year to injured workers and to providers of their medical care.

b. Self-insurance includes individual self-insurers and group self-insurance.

c. For further details see Appendix C1.

. Included in the Federal benefits total.

Source: National Academy of Social Insurance estimates based on data received from state agencies, the U.S. Department of Labor, A.M. Best, and the National Council on Compensation Insurance.

the fact that some employers doing business in states with exclusive state funds may need to obtain coverage from private carriers under the USL &HW act or employers liability cover-States with exclusive funds (Ohio, North Dakota, Washington, West Virginia, and Wyoming) may have small amounts of benefits paid in the private carrier category. This results from age which the state fund is not authorized to provide. In addition, private carriers may provide excess compensation coverage in some of these states. ą;

Federal benefits include: those paid under the Federal Employees' Compensation Act for civilian employees; the portion of the Black Lung benefit program that is financed by employers; and a portion of benefits under the Longshore and Harbor Workers' Compensation Act that are not reflected in state data, namely, benefits paid by self-insured employers and by special funds under the LHWCA. See Appendix H for more information about federal programs.

Table D2

Workers' Compensation Benefits\* by Type of Insurer and Medical Benefits, by State, 2008 (in thousands)

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State	Private Carriers <sup>a</sup>	State Funds	Self-Insured <sup>b</sup>	Total	Percent Medical	Medical <sup>C</sup>
Alabama	\$313,543	\$	\$343,065	\$656,607	68.8	\$451,746
Alaska	162,402		56,761	219,163	64.1	140,484
Arizona	220,369	356,388	114,627	691,384	68.1	470,832
Arkansas	162,363		65,406	227,769	65.1	148,277
California	4,767,978	1,843,737	2,918,024	9,529,739	54.5	5,189,827
Colorado	278,060	388,211	207,372	873,643	49.9	435,948
Connecticut	568,770		216,363	785,133	44.4	348,599
Delaware	158,303		60,362	218,665	0.09	131,199
District of Columbia	70,178		24,922	95,100	35.5	33,761
Florida	2,021,972		726,120	2,748,092	64.3	1,767,023
Georgia	1,150,763		445,288	1,596,051	48.4	772,489
Hawaii	131,404	28,577	85,782	245,763	43.2	106,170
Idaho	906,98	158,533	15,443	260,881	61.5	160,442
Illinois	2,158,314		756,787	2,915,102	48.4	1,410,909
Indiana	558,963		66,758	625,721	71.0	444,262
Iowa	430,030		122,883	552,913	54.1	299,126
Kansas	298,923		117,233	416,157	0.09	249,694
Kentucky	386,112	88,664	220,970	695,746	57.5	400,054
Louisiana	413,108	154,527	287,213	854,848	50.5	431,698
Maine	164,344	92,016	83,600	339,959	47.2	160,461
Maryland	507,856	228,217	199,875	935,948	44.9	420,241
Massachusetts	735,106		119,245	854,351	35.5	303,660
Michigan	853,905		553,377	1,407,282	35.9	505,331
Minnesota	712,040	56,199	257,433	1,025,671	51.1	524,183
Mississippi	202,269		137,262	339,531	59.3	201,342
Missouri	581,082	89,652	235,852	906,587	55.9	506,782
Montana	72,942	126,284	44,888	244,114	59.3	144,760
Nebraska	253,575		70,150	323,726	62.2	201,357
Nevada	290,355		134,374	424,729	46.3	196,649

New Hampshire	190,802		51,765	242,567	61.5	149,179
New Jersey	1,537,273		410,479	1,947,752	48.2	938,354
New Mexico	123,519	25,405	89,725	238,649	59.5	141,996
New York	1,711,623	1,032,617	1,155,671	3,899,911	51.0	1,988,954
North Carolina	1,082,596		385,658	1,468,254	45.6	669,524
North Dakota <sup>a</sup>	57	105,780		105,837	58.5	61,936
Ohio <sup>a</sup>	23,746	2,055,456	410,878	2,490,080	43.9	1,092,704
Oklahoma	319,337	275,833	145,264	740,434	43.8	324,310
Oregon	238,165	281,808	85,924	605,897	51.9	314,461
Pennsylvania	1,929,826	348,716	623,700	2,902,243	44.6	1,295,845
Rhode Island	48,236	90,519	20,795	159,550	32.1	51,216
South Carolina	671,781	55,853	189,785	917,419	41.0	376,142
South Dakota	106,068		5,116	111,184	67.0	74,493
Tennessee	617,657		165,237	782,894	52.9	414,151
Texas	891,054	335,938	303,780	1,530,772	61.2	936,833
Utah	104,084	144,108	55,031	303,223	71.6	217,108
Vermont	111,636		16,669	128,305	53.1	68,130
Virginia	706,231		226,261	932,492	58.0	540,845
Washington <sup>a</sup>	21,340	1,665,190	506,355	2,192,885	36.4	798,994
West Virginia <sup>a</sup>	5,720	266,203	47,954	319,877	37.4	119,763
Wisconsin	973,597		182,922	1,156,519	73.8	853,134
Wyoming <sup>a</sup>	2,369	134,764		137,133	51.6	70,824
Non-federal total	\$30,128,655	\$10,429,195	\$13,766,403	\$54,324,252	51.6	\$28,056,202
Federald				3,423,825	27.9	956,148
Federal employees <sup>e</sup>				2,676,370	29.8	798,039
TOTAL				\$57,748,078	50.2	\$29,012,350

- \* Benefits are payments in the calendar year to injured workers and to providers of their medical care.
- the fact that some employers doing business in states with exclusive state funds may need to obtain coverage from private carriers under the USL &HW act or employers liability cover-States with exclusive funds (Ohio, North Dakota, Washington, West Virginia, and Wyoming) may have small amounts of benefits paid in the private carrier category. This results from age which the state fund is not authorized to provide. In addition, private carriers may provide excess compensation coverage in some of these states.
- b. Self-insurance includes individual self-insurers and group self-insurance.
- c. For further details see Appendix C1.
- Federal benefits include: those paid under the Federal Employees' Compensation Act for civilian employees; the portion of the Black Lung benefit program that is financed by employers; and a portion of benefits under the Longshore and Harbor Workers' Compensation Act that are not reflected in state data, namely, benefits paid by self-insured employers and by special funds under the LHWCA. See Appendix H for more information about federal programs.
- .. Included in the Federal benefits total.

Source: National Academy of Social Insurance estimates based on data received from state agencies, the U.S. Department of Labor, A.M. Best, and the National Council on Compensation Insurance

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State	Private Carriers <sup>a</sup>	State Funds	Self-Insured <sup>b</sup>	Total	Percent Medical	Medical <sup>c</sup>
Alabama	\$310,809	₩	\$324,506	\$635,315	68.5	\$435,345
Alaska	147,189		54,289	201,477	62.5	126,004
Arizona	190,349	398,260	108,299	806,969	68.9	480,337
Arkansas	148,054		65,283	213,337	63.6	135,578
California	4,592,600	1,994,894	3,021,391	9,608,884	49.4	4,742,274
Colorado	235,511	409,757	191,736	837,004	47.5	397,474
Connecticut	546,902		187,523	734,425	43.7	321,016
<b>Delaware</b>	147,399		65,406	212,805	57.1	121,512
District of Columbia	74,807		22,756	97,564	36.6	35,730
Florida	2,131,692		726,238	2,857,930	62.3	1,779,359
Georgia	1,073,834		425,472	1,499,306	48.5	727,100
Hawaii	129,410	32,998	84,885	247,294	42.3	104,568
Idaho	80,186	150,283	13,981	244,451	6.09	148,896
Illinois	2,016,319		719,074	2,735,393	47.2	1,291,992
Indiana	536,906		62,067	598,973	70.2	420,609
Iowa	386,758		107,195	493,953	51.6	254,729
Kansas	275,485		120,351	395,836	61.3	242,461
Kentucky	358,540	85,747	201,779	646,066	58.0	374,918
Louisiana	309,882	156,967	265,940	732,788	52.6	385,687
Maine	99,921	91,422	85,537	276,880	43.3	119,964
Maryland	420,497	240,535	168,882	829,914	43.1	357,545
Massachusetts	708,326		121,123	829,449	34.7	288,155
Michigan	915,946		595,335	1,511,282	35.3	533,355
Minnesota	649,492	55,194	254,298	958,984	50.1	480,239
Mississippi	181,181		147,053	328,234	57.9	190,144
Missouri	525,980	83,989	257,184	867,153	54.6	473,089
Montana	74,900	118,065	44,028	236,993	56.7	134,487
Nebraska	219,921		63,699	283,619	62.8	178,086
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40,462 345,554 84,591
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441,131
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Benefits are payments in the calendar year to injured workers and to providers of their medical care.

b. Self-insurance includes individual self-insurers and group self-insurance.

c. For further details see Appendix C1.

e. Included in the Federal benefits total.

Source: National Academy of Social Insurance estimates based on data received from state agencies, the U.S. Department of Labor, A.M. Best, and the National Council on Compensation Insurance.

the fact that some employers doing business in states with exclusive state funds may need to obtain coverage from private carriers under the USL &HW act or employers liability cover-States with exclusive funds (Ohio, North Dakota, Washington, West Virginia, and Wyoming) may have small amounts of benefits paid in the private carrier category. This results from age which the state fund is not authorized to provide. In addition, private carriers may provide excess compensation coverage in some of these states. r,

Federal benefits include: those paid under the Federal Employees' Compensation Act for civilian employees; the portion of the Black Lung benefit program that is financed by employers; and a portion of benefits under the Longshore and Harbor Workers' Compensation Act that are not reflected in state data, namely, benefits paid by self-insured employers and by special funds under the LHWCA. See Appendix H for more information about federal programs. <del>j</del>

Table D4

State	Private Carriers <sup>a</sup>	State Funds	Self-Insured <sup>b</sup>	Total	Percent Medical	Medical <sup>C</sup>
Alabama	\$303,014	₩	\$321,671	\$624,685	9.99	\$416,040
Alaska	147,425		50,155	197,580	58.4	115,387
Arizona	164,639	380,318	102,507	647,463	69.3	448,692
Arkansas	137,022		64,985	202,006	64.2	129,688
California	4,747,563	2,233,872	3,035,664	10,017,099	47.4	4,749,938
Colorado	243,772	423,277	198,537	865,585	49.2	425,868
Connecticut	527,205		192,553	719,758	44.3	318,853
<b>Delaware</b>	153,106		85,532	238,638	58.2	138,887
District of Columbia	77,683		20,333	98,016	40.8	39,990
Florida	2,223,530		704,930	2,928,460	64.0	1,874,214
Georgia	986,235		411,536	1,397,771	50.4	704,477
Hawaii	134,638	28,644	79,403	242,685	40.7	98,773
Idaho	62,089	147,201	14,474	228,764	62.0	141,833
Illinois	1,854,079		593,025	2,447,104	48.2	1,179,504
Indiana	508,885		54,304	563,190	69.3	390,290
Iowa	384,506		103,479	487,985	52.6	256,680
Kansas	267,646		123,735	391,381	58.6	229,349
Kentucky	353,975	85,725	203,492	643,192	58.9	378,840
Louisiana	348,891	128,700	240,950	718,542	52.8	379,390
Maine	112,338	96,391	81,265	289,994	41.1	119,188
Maryland	390,488	246,337	152,050	788,874	43.2	340,794
Massachusetts	711,780		119,593	831,373	35.3	293,409
Michigan	852,208		618,366	1,470,574	37.0	543,569
Minnesota	635,694	62,759	245,995	944,448	49.1	463,300
Mississippi	172,626		147,668	320,294	58.2	186,411
Missouri	505,044	80,251	243,074	828,370	52.4	434,066
Montana	73,418	113,841	41,087	228,347	57.6	131,528
Nebraska	209,972		62,067	272,039	62.7	170,569
Nevada	820 060		127 008	417 285	151	199 196

179,488
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35,513
81,297
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268,993
267,991
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61,700
304,195
138,512
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376,668
116,528
0,555,015

Benefits are payments in the calendar year to injured workers and to providers of their medical care.

b. Self-insurance includes individual self-insurers and group self-insurance.

c. For further details see Appendix C1.

Included in the Federal benefits total.

Source: National Academy of Social Insurance estimates based on data received from state agencies, the U.S. Department of Labor, A.M. Best, and the National Council on Compensation Insurance.

the fact that some employers doing business in states with exclusive state funds may need to obtain coverage from private carriers under the USL &HW act or employers liability cover-States with exclusive funds (Ohio, North Dakota, Washington, West Virginia, and Wyoming) may have small amounts of benefits paid in the private carrier category. This results from age which the state fund is not authorized to provide. In addition, private carriers may provide excess compensation coverage in some of these states. r;

Federal benefits include: those paid under the Federal Employees' Compensation Act for civilian employees; the portion of the Black Lung benefit program that is financed by employers; and a portion of benefits under the Longshore and Harbor Workers' Compensation Act that are not reflected in state data, namely, benefits paid by self-insured employers and by special funds under the LHWCA. See Appendix H for more information about federal programs. 귱

Table D5

Corrected Version of Table 9.B1 of the Annual Statistical Supplement to the Social Security Bulletin Coverage, Benefits, and Costs, selected years 1980-2010

	Estimated number			Type of Insurance	trance		Type of Benefits	Benefits	Cost of program	Benefits as a
Year	of Workers covered per month (millions)	) Total	Private Carriers	State Funds	Federal Funds	Employers Self-Insurance	Medical and Hospitalization	Compensation payments	as a percentage of covered payroll	percentage of covered payroll
1980	87.6	\$13,618	\$7,029	\$1,797	\$2,533	\$2,259	\$3,947	\$9,671	1.76	0.96
1981	87.0	15,054	7,876	2,017	2,578	2,583	4,431	10,623	1.67	0.97
1982	85.6	16,408	8,647	2,191	2,577	2,993	5,058	11,350	1.58	1.04
1983	86.7	17,575	9,265	2,443	2,618	3,249	5,681	11,894	1.50	1.05
1984	91.0	19,686	10,610	2,754	2,651	3,671	6,424	13,262	1.49	1.09
1985	93.7	22,217	12,341	3,059	2,685	4,132	7,498	14,719	1.64	1.17
1986	95.6	24,613	13,827	3,554	2,694	4,538	8,642	15,971	1.79	1.23
1987	98.2	27,317	15,453	4,084	2,698	5,082	9,912	17,405	1.86	1.29
1988	101.4	30,703	17,512	4,687	2,760	5,744	11,507	19,196	1.94	1.34
1989	103.9	34,316	19,918	5,205	2,760	6,433	13,424	20,892	2.04	1.46
1990	105.5	38,237	22,222	5,873	2,893	7,249	15,187	23,050	2.18	1.57
1991	103.7	42,187	24,515	6,713	2,998	7,962	16,832	25,355	2.16	1.65
1992	104.3	44,660	24,030	7,829	3,158	9,643	18,664	25,996	2.13	1.65
1993	106.2	42,925	21,773	8,105	3,189	9,857	18,503	24,422	2.17	1.53

1994	109.4	43,482	21,391	7,398	3,166	11,527	17,194	26,288	2.05	1.47
1995	112.8	42,122	20,106	7,681	3,103	11,232	16,733	25,389	1.83	1.35
1996	114.8	41,960	21,024	8,042	3,066	9,828	16,739	25,221	1.66	1.26
1997	118.1	41,971	21,676	7,157	2,780	10,357	17,397	24,574	1.49	1.17
1998	121.5	43,987	23,579	7,187	2,868	10,354	18,622	25,365	1.38	1.13
1999	124.3	46,313	26,383	7,083	2,862	9,985	20,055	26,258	1.35	1.12
2000	127.1	47,699	26,874	7,388	2,957	10,481	20,933	26,766	1.34	1.06
2001	127.0	50,827	27,905	8,013	3,069	11,839	23,137	27,690	1.43	1.10
2002	125.6	52,297	28,085	9,139	3,154	11,920	24,203	28,094	1.57	1.13
2003	124.7	54,739	28,395	10,442	3,185	12,717	25,733	29,006	1.71	1.16
2004	125.9	56,149	28,632	11,146	3,256	13,115	26,079	30,070	1.70	1.13
2005	128.2	57,067	29,039	11,060	3,258	13,710	26,361	30,706	1.71	1.09
2006	130.3	54,896	27,946	10,555	3,270	13,125	26,206	28,690	1.56	0.99
2007	131.7	55,660	28,658	10,317	3,340	13,344	26,627	29,032	1.45	0.95
2008	130.6	57,748	30,129	10,429	3,424	13,766	29,012	28,736	1.33	0.97
2009	124.9	57,946	30,384	10,080	3,543	13,940	28,706	29,240	1.29	1.02
2010	124.5	57,542	30,524	9,953	3,672	13,393	28,091	29,450	1.23	0.99

Source: 1. 1980-1988 data -Sengupta, Reno & Burton (2007).

<sup>2. 1989-2010</sup> data - SSA, 2011a.

## **Appendix E: Self-Insured Benefit Estimates**

This report uses a methodology that incorporates historical data to estimate self-insurance benefits in states that were not able to provide recent information.

That methodology is as follows:

## Step A: Calculate the share of payroll that is self-insured (in states where we can).

- Use NASI estimates of total covered payroll for calendar year 2010. This procedure is outlined in Appendix A.
- 2) Obtain total payroll for workers insured by private carriers and competitive state funds for policy years from NCCI. This information is available for a subset of states (about 39 states), which we call "NCCI states." (If NCCI payroll for the current year is not available, we use the previous years' share of NCCI payroll to covered payroll to impute the current year NCCI payroll).
- 3) For each of the NCCI states, use [1] and [2] to estimate the payroll covered by self-insurers. This is given by [1]-[2].
- 4) For the NCCI states, use [1] and [2] to estimate the percent of payroll covered by self-insurers. The percentage of payroll covered by self-insurers is [3] / [1].
  - (A similar procedure is used for another nine states California, Delaware, Massachusetts, Michigan, Minnesota, New Jersey, New York, Pennsylvania, and Washington using payroll data from the Rating Bureaus and Agencies.)

#### Step B: Calculate the share of benefits that is selfinsured (in states where we can); and

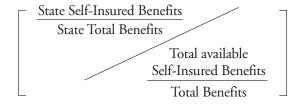
- 5) Compile state-reported data on self-insured benefits where we can.
- 6) Estimate total benefits in states that report self-insured benefits.
- 7) Calculate the share of total benefits that is self-insured in states where we can by dividing self-insured benefits by total benefits. [5]/ [6].

Step C: In states where we have both shares described above, calculate the average relationship between the two shares.

- 8) For each state where we have a self-insured share of payroll [4] and a self-insured share of benefits [7], calculate the ratio between the two shares. This ratio is [7] / [4].
- 9) Determine the number of states where we have both shares. There were 34 such states in 2010.
- 10) Calculate the average ratio between the two shares for the 34 states. The average ratio in 2010 is 68.6 percent (Table E1). That is, on average, the share of benefits that is self insured is about 68.6 percent of the share of payroll that is self-insured in states where we have both pieces of information.

Step D: For those states where we have prior years' data on self-insured benefits, use the latest available year's self-insured benefits to self-insured payroll ratio to estimate the self-insured benefits for 2010.

11) The self-insurance data has been imputed using previous years' data in four states where they were available. Use the ratio of self-insured benefit ratio of the state to the total self-insured benefit ratio



(in available years) to impute the ratio in the later years when data were not available.

Step E: Use the average relationship between the two shares to estimate the share of benefits that is self-insured in states where we lack that information but have an estimate of the share of payroll that is self insured.

- 12) For each of the 12 NCCI states and rating bureau states where we lack self-insured benefit data, multiply the percentage of payroll covered by self-insurers [4] by the average ratio in [10].
- 13) The ratio in [12] is used to estimate self-insured benefits in those 12 states. We get the self-insured benefits by multiplying

(Private Carrier + State Fund Benefits) \* 
$$\frac{Ratio \ in \ [12]}{(1-Ratio \ in \ [12])}$$

#### **Table E1**

## Self-Insurer Estimation Results, 2006–2010

Average Ratio of the percent of total benefits paid by self-insurers to the percent of payroll covered by self-insurers, (7)/(4)

Year	Ratio
2006	66.5%
2007	66.2%
2008	74.6%
2009	76.4%
2010	68.7%

# Step F: For states where we lack both ratios described in A and B (above), use the average share of total benefits that is self-insured in the rest of the states.

For 2010, 34 states reported self-insured benefits. For 12 other states, we imputed self-insured benefits using payroll data. For four states we used prior year's data to estimate self-insured benefit payments in 2010. Two exclusive state fund states – North Dakota and Wyoming – do not allow self insurance.

## **Appendix F: Medical Benefit Estimates**

Estimates by the National Academy of Social Insurance (NASI) of the percent of total benefits paid that were for medical care are based on reports from state agencies and from estimates provided by the National Council on Compensation Insurance (NCCI). For 2010, we used the NCCI data for the medical share for 37 states.

The National Council on Compensation Insurance (NCCI) is a private organization that assists private carriers, competitive state funds, and insurance commissioners in setting workers' compensation rates in selected states. NCCI provided NASI estimates of

the percent of private carrier benefits paid that were for medical care in 37 states. For eight states we used the agency information on medical share given to NASI by the state agencies. For California, Delaware, New Jersey, New York, and Pennsylvania, we used data on calendar year paid medical benefits data provided by rating bureaus. For Wyoming, neither state reports nor NCCI estimates of medical benefits were available. For that state, the weighted average of the share of total benefits that were for medical care in the other 50 jurisdictions was used.

## **Appendix G: Deductible Benefit Estimates**

NASI has five methods for estimating deductible benefits and total benefits, depending on what is reported by the state.

#### Method A:

State reports deductible amounts.

Method: Use deductible amount reported by state agencies or rating bureaus.

Six States: Delaware, Massachusetts, Minnesota, Oregon, Pennsylvania, and South Carolina.

#### Method B:

States say deductibles are included in their totals, but do not report amounts of deductibles.

Method: Estimate deductibles by subtracting Net Losses Paid as reported by A.M. Best from state report.

Fifteen states: Alabama, Alaska, California, Hawaii, Idaho, Maryland, Michigan, Mississippi, Missouri, Montana, Nevada, New Jersey, New Mexico, New York, North Dakota, and South Dakota. Note: Before using A.M. Best data, state fund and private carrier data are separated out from both data reported by A.M. Best and state agencies (where necessary, i.e., where A.M. Best or the state agency classify as a private carrier an entity that we classify as a state fund).

#### Method C:

Deductibles are not allowed in the state.

Method: Use state reports as totals. Deductibles equal zero.

Four states: Ohio, Washington, Wisconsin, and Wyoming.

#### Method D:

State does not report benefit amounts. Deductibles are allowed.

Method: Use Net Losses Paid as reported by A.M. Best and add estimated deductibles, based on the ratio of Manual Equivalent Premiums.

Twenty-six jurisdictions: Arizona, Arkansas, Colorado, Connecticut, the District of Columbia, Florida, Georgia, Illinois, Indiana, Iowa, Kansas, Kentucky, Louisiana, Maine, Missouri, Nebraska, New Hampshire, North Carolina, Oklahoma, Rhode Island, Tennessee, Texas, Utah, Vermont, Virginia and West Virginia.

#### Method E:

State does not report benefit amounts. Deductibles are allowed. Manual Equivalent Premiums are not available.

Method: Estimate the average ratio of Manual Equivalent Premiums from those states where it is available. Use this average with the Net Losses paid as reported by A.M. Best to impute deductibles.

No state.

## **Appendix H: Federal Programs**

Various federal programs compensate certain categories of workers for disabilities caused on the job and provide benefits to dependents of workers who die of work-related causes. Each program is described briefly below along with an explanation of whether and how it is included in our national totals of workers' compensation benefits. Our aim in this report is to include in national totals for workers' compensation those federally administered programs that are financed by employers and that are not otherwise included in workers' compensation benefits reported by states, such as the benefits paid under the Federal Employees' Compensation Act. Programs that cover private sector workers and are financed by federal general revenues, such as the Radiation Exposure Compensation Act, are not included in our national totals for workers' compensation benefits and employer costs. More detail on these programs is given below.

#### Federal Employees

The Federal Employees' Compensation Act of 1916 (FECA), which superseded previous workers' compensation laws for federal employees, provided the first comprehensive workers' compensation program for federal civilian employees. In 2010, total benefits were \$2,889 million, of which 32 percent were for medical care. The share of benefits for medical care is lower than in most state programs because federal cash benefits, particularly for higher-wage workers, replace a larger share of pre-injury wages than is the case in most state programs. Administrative costs of the program were \$157 million in calendar year 2010, or 5.4 percent of total benefits (U.S. DOL 2011). Table H1 reports benefits and administrative costs for federal civilian employees under the Federal Employees' Compensation Act from 2000-2010. These benefits to workers and costs to the federal government as employer are included in national totals in this report, and are classified with federal programs.

#### Longshore and Harbor Workers

The Longshore and Harbor Workers' Compensation Act (LHWCA) requires employers to provide workers' compensation protection for longshore, harbor, and other maritime workers. The original program, enacted in 1927, covered maritime employees injured while working over navigable waters because

the Supreme Court held that the Constitution prohibits states from extending coverage to such individuals. The Longshore and Harbor Workers' Compensation Act (LHWCA) is a federal workers' compensation program for maritime employees injured while working over navigable waters, excluding the master or crew of a vessel. It also covers other workers who fall outside the jurisdiction of state programs, such as employees on overseas military bases, those working overseas for private contractors of the United States, and private employees engaged in offshore drilling enterprises. Private employers cover longshore and harbor workers by purchasing private insurance or self-insuring. In fiscal year 2010, about 520 self-insured employers and insurance companies reported a total of 31,628 lost-time injuries to the federal Office of Workers' Compensation Programs. Total benefits paid under the Act in 2010 were \$1,135 million, which included \$589 million paid by private insurance carriers, \$409 million paid by self-insured employers, \$127 million paid from the federally administered special fund for second injuries and other purposes, and \$9.4 million for the District of Columbia Workers' Compensation Act (DCCA) Fund. Federal direct administrative costs were \$13.4 million or about 1.2 percent of benefits paid (Table H2).

The Academy's data series on benefits and costs of workers' compensation includes at least part of the benefits paid by private carriers under the LHWCA in the states where the companies operate. The benefits are not identified separately in the information provided by A.M. Best and state agencies. Benefits paid by private employers who self-insure under the Longshore and Harbor Workers' Compensation Act are not reported by states or A.M. Best. Consequently, these benefits and employer costs are included with federal programs in this report. Table H2 shows benefits reported to the U.S. Department of Labor by insurers and self-insured employers under the Longshore and Harbor Workers' Compensation Act from 2000-2010. Ideally, benefits and employer costs under the LHWCA would be counted in the states where the employee is located, because our estimates of covered employment and covered workers count these workers and wages in the states where they work. We believe that at least part of LHWCA benefits paid

2010 7,765 1,976,439 912,882 156,540 \$2,889,321 3,045,861 863,729 1,900,156 146,015 7,739 2009 \$2,763,885 2,909,900 1,878,331 2008 7,756 \$2,676,370 798,039 142,532 2,818,902 752,742 6,773 1,833,958 143,768 2,730,468 2007 \$2,586,700 2006 7,619 1,767,926 686,935 137,386 2,592,247 \$2,454,861 2005 5,494 \$2,462,059 1,791,003 671,056 128,536 2,590,595 Federal Employees' Compensation Act, Benefits and Costs, 2000–2010 (in thousands) 2004 1,749,397 4,587 \$2,445,077 695,680 131,920 2,576,997 2003 1,698,273 4,806 \$2,367,757 669,484 130,672 2,498,429 1,651,947 115,226 4,596 2002 \$2,317,325 665,378 2,432,551 623,057 5,056 109,326 \$2,223,088 1,600,031 2,332,414 2001 542,505 91,532 2000 1,576,354 6,197 \$2,118,859 2,210,391 Indirect Administrative Costs<sup>a</sup> Direct Administrative Costs Compensation Benefits Medical Benefits Table H1 Total Benefits % Medical Total Costs

Table H2

Longshore and Harbor Workers' Compensation Act, Benefits, Costs and Number of DBA Death Claims, 2000-2010 (dollar in thousands)

	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010
Total Benefits	\$671,991	\$689,149	\$700,563	\$716,218	\$747,321	\$795,466	\$879,508	\$923,045	\$983,050 \$ 504,348 340,336 128,372 9,994	\$983,050 \$1,081,266	\$1,134,759
Insurance Carriers	249,671	236,726	246,603	262,753	278,887	325,027	367,625	456,773		504,348 551,716	589,387
Self-Insurance Employer	278,952	307,708	310,940	309,843	322,520	325,694	368,744	325,544		340,336 388,088	408,534
LHWCA Special Fund	131,564	133,374	131,684	132,504	135,073	134,230	132,933	130,673		128,372 131,544	127,415
DCCA Special Fund	11,804	11,341	11,336	11,118	10,841	10,515	10,206	10,055		9,994 9,918	9,423
DBA benefits <sup>a</sup> Number of DBA Death Claimsd	8,583	9,411	7,582	11,338	30,079	59,797 284	115,758 338	170,231 426	199,837	242,530 341	311,643 585
Total Annual Assessments	145,700	145,000	136,000	135,800	148,500	146,500	135,500	135,000	132,500	136,500	131,500
LHWCA	133,000	133,000	125,000	125,000	137,000	135,000	125,000	125,000	124,000	125,000	124,000
DCCA	12,700	12,000	11,000	10,800	11,500	11,500	10,500	10,000	8,500	11,500	7,500
Administrative Expenses <sup>b</sup>	11,144	11,713	11,945	12,270	12,510	12,568	12,715	12,725	12,667	12,922	13,403
General Revenue	9,373	9,807	9,988	10,297	10,495	10,553	10,691	10,699	10,633	10,855	11,362
Trust Fund	1,771	1,906	1,957	1,973	2,015	2,015	2,024	2,026	2,034	2,067	2,041
Indirect Administrative Costs <sup>c</sup>	1,787	2,207	2,514	2,347	2,396	2,019	2,115	2,437	1,856	2,155	2,766

Included in Total Benefits. Defense Base Act benefits are paid for injuries or deaths of employees working overseas for companies under contract with the U.S. government. Ъ

Source: U.S. DOL 2012.

fiduciary responsibility for a Special Fund, which draws its revenue primarily from annual industry assessments based on anticipated benefit liabilities. This Fund makes direct benefit Longshore program administrative funding is divided between two sources. Industry oversight and claims activities are funded from general tax revenues. The program also exercises payments for certain categories of claims and provides funding for the program's rehabilitation staff and Special Fund oversight activities.

Includes legal and investigative support from the Office of the Solicitor and the Office of the Inspector General. These are not employer costs, but are provided for through general revenue appropriations.

Number of civilian overseas deaths.

through private insurance carriers are included in state data that are reported to us by A.M. Best or the states. At the same time, self-insured employers under the LHWCA are not included in A.M. Best data and are unlikely to be included in state reports; benefits paid from the LHWCA special funds are not included in state data. Thus, for 2000–2010 data, our estimates of total federal benefits include benefits paid by self-insured employers and the special funds under the LHWCA. Unless otherwise specified, we assume that privately insured benefits under the program are included in state reports. Whether and how LHWCA benefits can be reflected in state reports is a subject for analysis.

Total benefits under the Longshore and Harbor Workers' Compensation Act include benefits paid under the Defense Base Act (DBA). Under the DBA, benefits are paid for injuries or deaths of employees (of any nationality) working overseas for companies under contract with the United States government. These benefits are also shown separately in Table H2. Total payments rose from about \$7.6 million in 2002 to \$312 million in 2010. The number of DBA death claims per year rose from single digits prior to 2003, to 585 in 2010. The increase reflects, in large part, claims and deaths of employees of companies working under contract for the U.S. government in the war zones in Iraq and Afghanistan.

#### Coal Miners with Black Lung Disease

The Black Lung Benefits Act, enacted in 1969, provides compensation for coal miners with pneumoconiosis, or black lung disease, and their survivors. The program has two parts. Part B is financed by federal general revenues, and was administered by the Social Security Administration until 1997 when administration shifted to the U.S. Department of Labor. Part C is paid through the Black Lung Disability Trust Fund, which is financed by coal-mine operators through a federal excise tax on coal that is mined and sold in the United States. In this report, only the Part C benefits that are financed by employers are included in national totals of workers' compensation benefits and employer costs in 2000-2010. Total benefits in 2010 were \$445 million, of which \$208 million was paid under Part B and \$237 million was paid under Part C. Part C benefits include \$32 million for medical care. Medical benefits are available only to Part C beneficiaries and only for diagnosis and treatment of black

lung disease. Medical benefits are a small share of black lung benefits because many of the recipients of benefits are deceased coal miners' dependents, whose medical care is not covered by the program. Federal direct administrative costs were \$37.3 million or about 8.4 percent of benefit payments.

Table H3 shows benefits under the Black Lung Benefit program in 2000 through 2010 for both parts of the program. Its benefits are paid directly by the responsible mine operator or insurer, from the federal Black Lung Disability Trust Fund, or from federal general revenue funds. No data are available on the experience of employers who self-insure under the Black Lung program. Any such benefits and costs are not reflected in Table H3 and are not included in national estimates.

#### **Energy Employees**

The Energy Employees Occupational Illness Compensation Program Act (EEOICPA) provides lump-sum payments up to \$150,000 to civilian workers (and/or their survivors) who became ill as a result of exposure to radiation, beryllium, or silica in the production or testing of nuclear weapons and other materials. This is Part B of the program, which went into effect in July 2001. It provides smaller lump-sum payments to individuals previously found eligible for an award under the Radiation Exposure Compensation Act. Medical benefits are awarded for the treatment of covered conditions. Total benefits in 2010 were \$803 million, of which \$576 million were paid as compensation benefits (U.S. DOL 2011). The EEOICPA originally included a Part D program that required the Department of Energy (DOE) to establish a system for contractor employees and eligible survivors to seek DOE assistance in obtaining state workers' compensation benefits for work-related exposure to toxic substances at a DOE facility. In October 2004 Congress abolished Part D, creating a new Part E program to be administered by the Department of Labor. Part E provides benefit payments up to \$250,000 for DOE contractor employees, eligible survivors of such employees, and uranium miners, millers, and ore transporters. Wage loss, medical, and survivor benefits are also provided under certain conditions. Total Part E benefits in 2010 were \$384 million. Benefits under both Part B and Part E are financed by general revenues and are not included in our national totals. Table H4

Table H3

Black Lung Benefits Act, Benefits and Costs, 2000–2010 (in thousands)

	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010
Total Benefits Part C Compensation Part C Medical Benefits Part B Compensation	\$927,973 346,903 69,322 511,748	\$866,069 332,620 61,136 472,313	\$821,678 316,585 65,756 439,337	\$775,098 303,724 59,739 411,635	\$719,065 289,699 52,992 376,374	\$665,844 276,413 49,244 340,187	\$616,039 262,026 41,552 312,461	\$569,300 248,375 38,545 282,380	\$524,645 231,261 37,492 255,892	\$481,172 217,685 31,485 232,002	\$445,488 204,873 32,492 208,123
Total Direct Administrative Costs Part C (DOL) Part B (SSA)	32,866 28,591 4,275	34,657 29,897 4,760	36,123 31,488 4,635	37,393 31,991 5,402	38,057 32,157 5,900	37,917 32,724 5,193	38,453 33,182 5,271	38,749 33,374 5,375	38,009 32,648 5,361	37,502 32,411 5,091	37,317 32,363 4,954
Trust Fund Advances from U.S. Treasury <sup>a</sup> Interest Payments on Past Advances	490,000	505,000	465,000	525,000	497,000	446,000	445,000	426,000	426,000	341,939	60,000
and Bond Payments <sup>b</sup> Coal Tax Revenues Received by the Black Lung Trust Fund	512,799	511,520	588,000	480,080	577,575	620,420	598,520	650,432	646,800	652,935	588,743
mdirect Administrative Costs	040,17	777,77	050,67	47,473	23,714	1,1,1,1	7,7,7	70,070	67,47	7,370	616,67

\* information not available

Advance of funds required when Trust Fund expenses exeed tax revenues received in a given year. Under the Emergency Economic Stabilization Act of 2008 (EESA), total Trust Fund debt (cumulative advances) at the end of 2008 was converted to coupon bonds that are repayable to the U.S. Treasury on an annual basis.

1997-2008 are interest payments on Trust Fund borrowing from the U.S. Treasury. Starting in 2009, the amount shown is the repayment of bond principal and interest on principal debt as required by the Trust Fund debt restructuring portion of the EESA Includes legal and investigative support from the Office of the Office of the Inspector General, services provided by the Department of the Treasury, and costs for P

the Office of Administrative Law Judges (OALJ) and the Benefits Review Board (BRB). (Note: OALJ and BRB costs are not included for any other program, but cannot be separately identified for Coal Mine Workers' Compensation).

Source: U.S. DOL 2012.

provides information on both Part B and Part E of the EEOICPA, as amended.

#### Workers Exposed to Radiation

The Radiation Exposure Compensation Act of 1990 provides lump-sum compensation payments to individuals who contracted certain cancers and other serious diseases as a result of exposure to radiation released during above ground nuclear weapons tests or during employment in underground uranium mines. The lump-sum payments are specified in law and range from \$50,000 to \$100,000. From the beginning of the program through March 2012, 25,283 claims were paid for a total of \$1,674 million, or roughly \$66,198 a claim (U.S. DOJ 2011). The program is financed with federal general revenues and is not included in national totals in this report. Table H5 shows cumulative payments under

the Radiation Exposure Compensation Act since its enactment in 1990.

#### Veterans of Military Service

U.S. military personnel are covered by the federal veterans' compensation program of the Department of Veterans Affairs, which provides cash benefits to veterans who sustained total or partial disabilities while on active duty. In the fiscal year 2010, 3.2 million veterans were receiving monthly compensation payments for service-connected disabilities. Of these, 51 percent of the veterans had a disability rating of 30 percent or less, while the others had higher-rated disabilities. Total monthly payments for the disabled veterans and their dependents were \$3.0 billion in 2010, or about \$36.5 billion on an annual basis (U.S. Department of Veterans Affairs 2012). Veterans' compensation is not included in our national estimates of workers' compensation. Table

Table H4

Energy Employees Occupational Illness Compensation Program Act, Part B and Part E Benefits and Costs, 2001-2010 (in thousands)

	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010
Total Benefits Part B	\$67,341	\$369,173	\$303,981	\$275,727	\$392,503	\$502,636	\$561,824	\$605,338	\$471,639	\$803,456
Compensation Benefits	67,330	363,671	288,274	250,123	358,751	460,494	490,089	517,383	337,642	576,364
Medical Benefits <sup>a</sup>	11	5,502	15,707	25,604	33,752	42,142	71,735	87,955	133,997	227,092
Direct Administrative Costs <sup>b</sup>	30,189	69,020	65,941	94,158	106,818	104,872	107,417	92,075	51,377	53,102
Total Benefits Part E <sup>C</sup>	n/a	n/a	n/a	n/a	268,635	270,598	409,100	468,982	395,680	383,760
Compensation Benefits	n/a	n/a	n/a	n/a	268,586	269,558	407,277	465,742	390,077	370,351
Medical Benefits <sup>d</sup>	n/a	n/a	n/a	n/a	49	1,040	1,823	3,240	5,603	13,409
Direct Administrative Costs <sup>b</sup>	n/a	n/a	n/a	n/a	39,295	55,088	61,671	59,152	68,146	74,622

a Medical payments made for claimants eligible under Part B only and claimants eligible under both Part B and Part E.

Source: U.S. DOL 2012.

b Part B costs for 2002-08 include funding for the Department of Health and Human Services/National Institute for Occupational Safety and Health's (DHHS/NIOSH) conduct of dose reconstructions and Special Exposure Cohort determinations. For 2002, these costs were \$32.7 million; 2003, \$26.8 million; 2004, \$51.7 million; 2005, \$50.5 million; 2006, \$58.6 million; 2007, \$55.0 million, and 2008, \$41.5 million. Beginning in 2009, these costs are a direct appropriation to DHHS/NIOSH. Part B costs for 2009-10 include funding for an Ombudsman position. For 2009, these costs were \$0.1 million; and 2010, \$0.4 million. Part E costs for 2005-10 also include funding for an Ombudsman position. For 2005, these costs were \$0.3 million; 2006, \$0.6 million; 2007, \$0.8 million; 2008, \$0.8 million; 2009, \$0.7 million; and 2010, \$0.6 million.

c The Energy Part E benefit program was established in October 2004.

d Medical payments made for claimants eligible under Part E only.

#### Table H5

Radiation Exposure Compensation Act, Benefits Paid as of March 29, 2012 (benefits in thousands)

Claim Type	Claims	Benefits
Downwinder	16,062	\$803,070
Onsite Participant	1,816	130,836
Uranium Miner	5,649	564,175
Uranium Miller	1,460	146,000
Ore Transporter	296	29,600
TOTAL	25,283	\$1,673,681
Source: U.S. DOJ 2012.		

H6 provides information on the Veterans' Compensation program. This program is somewhat similar to workers' compensation in that it is financed by the employer (the federal government) and compensates for injuries or illness caused on the job (the armed forces). It is different from other workers' compensation programs in many respects.

With cash benefits of about \$36.5 billion in 2010, veterans' compensation is about 124 percent of the

size of total cash benefits in other workers' compensation programs, which were \$29.5 billion in 2010. Because it is large and qualitatively different from other programs, veterans' compensation benefits are not included in national totals to measure trends in regular workers' compensation programs.

## Railroad Employees and Merchant Seamen

Finally, federal laws specify employee benefits for railroad workers involved in interstate commerce and merchant seamen. The benefits are not workers' compensation benefits and are not included in our national totals. Instead, these programs provide health insurance and short-term and long-term cash benefits for ill or injured workers whether or not their conditions are work-related. Under federal laws, these workers also retain the right to bring tort suits against their employers for negligence in the case of work-related injuries or illness (Williams and Barth 1973).

This report includes in national totals for workers' compensation those federal programs that are financed by employers and that are not otherwise included in workers' compensation benefits reported by states in 2000 through 2010. The accompanying tables provide detailed information on federally administered programs, including some that are not included in national totals in this report. Data earlier than 2000 can be found in earlier reports.

#### Table H6

Federal Veterans' Compensation Program, Compensation Paid in Fiscal Year 2010 (benefits in thousands)

Class of Dependent	Number	Monthly Value (in thousands)
Veteran Recipients - total	3,210,261	\$3,040,497
Veterans less than 30 percent disabled (no dependency benefit)	1,630,618	366,700
Veterans 30 percent or more disabled	1,579,643	2,673,797
Source: U.S. Department of Veterans Affairs 2012.		

## **Appendix I: Workers' Compensation under State Laws**

Table I illustrates the benefit parameters which form the basis for the data estimated in this report. The table is taken from the IAIABC (International Association of Industrial Accident Board and Commissions) and WCRI (Workers Compensation Research Institute) joint publication of Workers' Compensation Laws (IAIABC-WCRI 2012). The state laws are as of January 2012.

The benefit parameters defined in this table portray the workers' compensation differences across states. The difference may lie in (a) when the first day of disability begins; (b) compensation that is included in determining the "wage"; (c) periods over which the average wage is calculated; (d) caps on wages earned by the injured worker; or in (e) differences in

calculation of compensation rate, etc. For each state the table describes:

- The waiting period before a worker receives benefits.
- The maximum benefit payments and length of benefit payments for Temporary Total Disability.
- The weekly payments and benefit limitations for Permanent Total Disability.
- The maximum weekly benefit and benefit limitations for Permanent Partial Disability.
- The maximum weekly benefit and benefit limitations for Death Benefits.

Table I

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41	or Maximum Statutory	\$755.00	\$1,085.00	\$1,085.00 \$1,085.00 \$625.05 \$584.00 R \$7584.00 R \$1,085.00	\$1,085.00
	Maximum PPD  Benefits for	00 No unscheduled PPD	I m		
+	Limit to Maximum	Up to the maximum TTD weekly rate. Benefits continue until no longer PTD or death	\$ s s miniming		
	Lim	o no be iy and abled			
		oon Y.Y.Y. ITD Idd Idd Idd Idd Idd Idd Idd Idd Idd Id			Depends upon year of injury. Maximum PTD benefit would be the maximum TTD benefit in the year of injury \$625.05
900% of the 9000		80% of the workers spendable after tax or NWW	80% of the workers spendable after tax or NWW	80% of the workers spendable after tax or NWW 66 2/3% AMW	80% of the workers spendable after tax or NWW  66 2/3% AMW  66 2/3% PIWW  2/3 of AWW, subject to minimum /maximum rates
TTD disability	Maximum Length	Continue until employee is medically stable or released to work	Continue until employee is medically stable or released to work  Duration of TTD disability	Continue until employee is medically stable or released to work  Duration of TTD  disability	Continue until employee is medically stable or released to work  Duration of TTD disability  450
\$1,005,00	Maximum	\$1,085.00	\$1,085.00	\$1,085.00	\$1,085.00
Monothan		More than 28 days	More than 28 days 14 days	More than 28 days 14 days 14 days	More than 28 days 14 days 14 days 21 days
7	Period before a worker	3 days	3 days	3 days 7 days 7 days	3 days 7 days 3 days
Aldska			Arizona	Arizona Arkansas	Arizona Arkansas California

None	When spouse remarries or if minor dependents reach 18 years of age or 25 if attending actending accredited higher learning institution	\$1,288.00	Maximum payable is \$150,000	\$150,000 for surviving spouse with no dependents	312 weeks	500 weeks for spouse
\$1,168.00	\$622.05		\$803.00	\$500.00	\$747.00	60% of current avg. state wage or \$396.60 wkly-2012
520	300	500 week limit for all disability and worker may petition for an additional 167 weeks	2 weeks for each % of impairment from 1-10%; 3 weeks from 11-15%; 4 weeks from 16-20%; and 6 weeks for each rating over 21%	300	312	500
\$996.00	\$622.05	\$1,288.00	\$803.00	\$500.00	\$747.00	55% of the AWSW at the time of injury
None	Š	The first \$75,000 in benefits for death or PTD shall be paid by the employer/ insurer.  Amounts over \$75,000 are paid from death and PTD Thust Fund	Ž	not applicable	No	Weekly rate may change after the first 52 weeks of TTD and each year thereafter on January 1 based on the increase in the ASWW
None	°Z	500 weeks for all disability benefits with ability to petition for an additional 167 weeks	Benefits are payable to age 75. If the injury occurred after age 70, benefits are payable during continuance of PTD not to exceed 5 years following determination of PTD	not applicable	No	Ŝ
\$1,168.00	\$622.05	\$1,288.00	\$803.00	not applicable	\$747.00	\$594.90
75% of spendable earnings	66 2/3% AWW up to the maximum at the date permanent impairment becomes fixed	66 2/3% PIWW	66 2/3% PIWW	not applicable	66 2/3% PIWW	67% of AWW
Duration of TTD disability	unlimited	500 weeks for all disability benefits with ability to petition for an additional 167 weeks	104	400 weeks unless catastrophic injury	Duration of TTD disability	None. TTD continues while in the period of recovery.
\$1,168.00	\$622.05	\$1,288.00	\$803.00	\$500.00	\$747.00	\$594.90
7 days	7 calendar days	14 days	22 days	21 days	None	TTD exceeds 2 weeks
3 days	3 days	3 days	7 days	7 days	3 days	5 days
Connecticut	Delaware	District of Columbia	Florida	Georgia	Hawaii	Idaho

Table I continued

Workers' Compensation State Laws as of January 2010

	Waiting Period, Jan 10	iod, Jan 10	Temporary T	Temporary Total Disability, Jan 10		Permanent Tota	Permanent Total Disability, Jan 10		Perman Disabil	Permanent Partial Disability, Jan 10	Death Benefits, Jan 10	its, Jan 10
State	Waiting Period before a worker can receive Indemnity benefits	Retroactive	Maximum Weekly TTD Benefits	Maximum Length of TTD Benefits (in weeks)	Basis of PTD Calculation	Maximum Weekly PTD Benefits	Maximum Length of PTD Benefits	Limit to Monetary PTD Benefits	Maximum Weekly PPD Disability Benefits	Maximum PPD Benefits for "Unscheduled Injuries" (weeks)	Maximum Weekly Dependency Benefits	Statutory Limit for Dependency Benefits
Illinois	3 days	14 calendar days	\$1,261.41	Duration of TTD disability	66 2/3% AWW	\$1,261.41	οN	No	82:569	005	\$1,261.41	\$500,000 or 25 years
Indiana	7 days	21 days	\$650.00	500	66 2/3% PIWW	\$650.00	500 weeks	Yes	not applicable	100% or 500	\$650.00	500 weeks
Iowa	3 days	14 days	\$1,457.00	Benefits are for length of disability and maybe paid for life	80% of the worker's spendable after tax or NWW	\$1,457.00	No	N <sub>o</sub>	\$1,340.00	200	\$1,457.00	None
Kansas	7 days	21 days	\$555.00	225 to 415 weeks depending on type of injury-also maybe a limitation of \$130,000 or \$155,000 for all indemnity benefits depending on types of benefit paid.	66 2/3% AWW	\$555.00	Benefits are for the length of disability and may be paid for life or until maximum of \$155,000 is reached.	Yes	\$555.00	415 weeks but the first 15 weeks does not count toward this maximum	\$555.00	\$300,000
Kentucky	7 days	14 calendar days	\$736.19	Duration of disability or until receipt of social Security old age and survivor benefits	66 2/3% PIWW	\$736.19	°Z	100% SAWW for injury year	\$552.13	425 weeks if rating is 50% or less; 520 wks if rating is over 50%	368.11 for spouse; 552.13 for spouse and child	18/22 if in school
Louisiana	7 days	6 weeks	\$577.00	Duration of TTD disability	66 2/3% PIWW	\$577.00	Benefits are for the length of disability and may be paid for life	None	\$577.00	520	\$577.00	Spouse plus 2 children or 3 children
Maine	7 days	14 calendar days	\$634.13	520	80% of the worker's spendable after tax or NWW	\$634.13	Benefits are for the length of disability and may be paid for life	ž	\$634.13	520 weeks for the duration of disability if Pl rating is greater than athreshold of approximately 13.4%	\$634.13	500 weeks or until age 18 for children

144 months or on the date of what would have been the 70th birthday of the deceased employee, provided that a minimum of 5 years of death benefits has been paid	None	500 weeks	Benefit ends after 10 years or 10 years after the last child is no longer dependent, minimum pay- able is \$60,000	450 weeks; remarriage for spouse; age 18- 23 for child	ш	Depends on extent of dependency at time of injury/death	None	For a child at 18 or 22 if a full-time student
\$965.00	\$1,000.00	\$746.00	\$850.00	\$436.68	\$811.73	\$649.00	\$710.00	\$789.74
None	not applicable	not applicable	°Z	450	400	400	300	PPD benefits paid for 5 years or to age 70, which- ever is later
\$724.00	\$1,135.82	not applicable	\$850.00	\$436.68 until total compensation paid equals \$196,506	\$425.19	\$324.50	\$710.00	\$789.74
\$45k except that benefit shall be paid for the period that the cover- ed employee is permanently totally disabled	No	None	Ž	\$196,506.00	None	None	None	Per maximum compensation limit and formula
°Z	No	800 weeks conclusive payment with factual determination therefater	Ŝ	450 weeks or	No	Payable until retirement	Payable for the length of disability and may be for life	Ŷ
\$965.00	\$1,135.82	\$746.00	850.00	\$436.68	\$811.73	\$649.00	\$710.00	\$789.74
66 2/3% PIWW	66 2/3% PIWW	80% of the worker's spendable after tax or NWW	66 2/3% PIWW	66 2/3% PIWW	66 2/3% PIWW	66 2/3% PIWW	66 2/3% PIWW	66 2/3% pre-injury AMW
Duration of TTD disability	156	Duration of TTD disability	130	450	400	Duration of TTD disability	Duration of TTD disability	Duration of TTD disability
\$965.00	\$1,135.82	\$742.00	\$850.00	\$436.68	\$811.73	\$649.00	\$710.00	\$789.74
14 days	21 days	14 calendar days	10 days	14 days	14 days	If disability is 21 days longer	6 weeks	5 consecutive days or 5 cumulative days within a 20 day period
3 days	5 days	7 days	3 days	5 days	3 days	32 hours or 4 days, whichever is less	7 days	5 days
Maryland	Massachu- setts	Michigan	Minnesota	Mississippi	Missouri	Montana	Nebraska	Nevada

Table I continued

Workers' Compensation State Laws as of January 2010

	Waiting Period, Jan 10	iod, Jan 10	Temporary T	Temporary Total Disability, Jan 10		Permanent Tota	Permanent Total Disability, Jan 10		Perman Disabil	Permanent Partial Disability, Jan 10	Death Benefits, Jan 10	its, Jan 10
State	Waiting Period before a worker can receive Indemnity benefits	Retroactive	Maximum Weekly TTD Benefits	Maximum Length of TTD Benefits (in weeks)	Basis of PTD Calculation	Maximum Weekly PTD Benefits	Maximum Length of PTD Benefits	Limit to Monetary PTD Benefits	Maximum Weekly PPD Disability Benefits	Maximum PPD Benefits for "Unscheduled Injuries" (weeks)	Maximum Weekly Dependency Benefits	Statutory Limit for Dependency Benefits
New Hampshire	3 days	14 days	\$1,317.00	Duration of Total disability	MMId % 09	\$1,317.00	Payable for the length of disability and may be for life	None	\$1,317.00	350 weeks for a whole person award	\$1,317.00	18 or 25 ifa full-time student
New Jersey	7 days	7 calendar days	\$810.00	400	70% of actual wage at the time of injury	\$810.00	Payable for the length of disability and may be for life	None	\$810.00	009	\$810.00	
New Mexico	7 days	4 weeks	\$733.16	700	66 2/3% PIWW length of disability	\$733.16	Payable for the rating is less than and may be for life	None	\$733.16	500 weeks if the 80%, 700 weeks if rating is greater	\$733.16	100% of the SAWW for 700 weeks
New York	7 days	More than 14 days	\$772.96	Duration of TTD disability	66 2/3% PIWW	\$772.96	No. Benefits are payable for the length of disability which is almost always for life of the claimant	The maximum the injured worker is 2/3 of the worker's AWW at the time of the injury up to he weekly maximum benefit in place at the time of injury	\$772.96	Not if date of accident or disability is before March 13, 2007; 525 weeks if date of accident or disability is on or after march 13, 2007	\$772.96	и
North Carolina	7 days	21 days	\$862.00	Benefit limits have been changed to 500 weeks and can be ex- tended by Commission if employee has sustain- ed a total loss of wage- earning capacity	66 2/3% PIWW	\$864.00	Benefit limits have been changed to 500 weeks and can be extended by Com- mission if employee has sustained a total loss of wage- earning capacity	\$862 for scheduled injuries	300	\$862.00	500 weeks <sup>o</sup>	
North Dakota	5 days	5 days	\$905.00	104	66 2/3% PIWW	\$905.00	Payable until retirement at which time benefits may switch to ABP <sup>r</sup> .	Ž	PPI rate multiplied by the maximum body impairment percentage of 100%. Paid as lump sum	100%	\$905.00 impairment based on lump sum payment	\$300,000 or death

None	when dependency ends	None	n/a	None	500 weeks	None	None	Minimum of 364 weeks	312 weeks of combined benefits ex- clucing PTD
\$809.00	\$735.00	\$1,123.33	\$858.00	\$972, as of 9/1/11	\$689.71	\$648.00	\$789.00	\$787.00	\$635.00
200	500	\$322,929.15	not applicable	500	340	312	400	300	312
\$269.97	\$323.00	not applicable	not applicable	\$180.00	Depends on scheduled body part	\$648.00	\$789.00	\$551.00	\$498.00
No.	N <sub>o</sub>	Maximum weekly \$842.52	not applicable	None	500 weeks	None	No.	No	ž
%	Payable for the length of disability and may be for life	Lifetime plus benefits to surviving spouse and children	not applicable	Payable for the length of disability and may be for life	500 weeks	For length of disability and can be for life	Until Social Security eligibility age or 260 weeks where the date of injury is on or after age 60	No	PTD benefits are awarded for life, but PTD status may be rexamined by submirting employee to reasonable medical evaluations; rehabilitation and retraining efforts; disclosure of Federal Income Tax returns
\$809.00	\$735.00	\$842.52	not applicable	\$972 as of 9/1/11	100% of SAWW	\$648.00	\$789.00	\$787.00	\$635.00
72% PIWWe	70% PIWW	66 2/3% PIWW	not applicable9	75%of worker's spendable or after tax or NWW	66 2/3% PIWW	66 2/3% PIWW <sup>f</sup>	66 2/3% PIWW	75% AWW	66 2/3% PIWW
as long as disability lasts	156	п/а	Duration of TITD disability subject to conversion to partial benefits at 104 weeks <sup>b</sup>	Duration of TTD disability	Duration of TTD disability with a maxi- mum of 500 weeks	Duration of TTD disability	Duration of TTD for physical injuries; 104 weeks for psychological injuries; 104 weeks after the commencement of pain management	105c	312
\$809.00	\$735.00	\$1,120.55	\$848.00	\$972 max as of 9/1/11	\$704.92	\$648.00	\$867.90	\$787.00	\$747.00
14 calendar days	Waiting period is not paid	14 days	14 calendar days	None	More than 14 days	7 calendar days	14 days	2 weeks	14 calendar days
7 days	3 days	3 days	7 days	3 days	7 days	7 days	7 days	7 days	3 days
Ohio	Oklahoma	Oregon	Pennsylvania	Rhode Island	South Carolina	South Dakota	Tennessee	Texas	Urah

Table I continued

Workers' Compensation State Laws as of January 2010

	Waiting Period, Jan 10	iod, Jan 10	Temporary To	Temporary Total Disability, Jan 10		Permanent Tota	Permanent Total Disability, Jan 10		Perman Disabili	Permanent Partial Disability, Jan 10	Death Benefits, Jan 10	its, Jan 10
State	Waiting Period before a worker can receive Indemnity benefits	Retroactive	Maximum Weekly TTD Benefits	Maximum Length of TTD Benefits (in weeks)	Basis of PTD Calculation	Maximum Weekly PTD Benefits	Maximum Length of PTD Benefits	Limit to Monetary PTD Benefits	Maximum Weekly PPD Disability Benefits	Maximum PPD Benefits for "Unscheduled Injuries" (weeks)	Maximum Weekdy Dependency Benefits	Statutory Limit for Dependency Benefits
Vermont	3 days	10 days	\$1,122.00	Duration of TTD disability; insurer must review after 2 years	66 2/3% PIWW	\$1,122.00	For duration of total disability-can be for life	No	\$1,122.00	405 weeks for non-spinal; 550 weeks spinal	\$1,122.00	Varies with dependent
Virginia	7 days	3 weeks	\$905.00	500	66 2/3% PIWW	\$905.00	Can be lifetime	Applicable comp. rate	\$905.00	None	\$905.00	500 weeks
Washington	3 days	14 calendar days	\$1100.26 for DOI prior to 7/1/11; \$1123.78 for DOI 7/1/11 - 6/30/12	Duration of TTD disability	Depends on the option chosen by employee	\$1100.26 for DOI prior to 7/1/11; \$1123.78 for DOI 7/1/11 - 6/30/12	For length of disability and can be for life	There is a maximum payment for lump sums only, up to \$8,500	\$1100.26 for DOI prior to 7/1/11; \$1123.78 for DOI 7/1/11 - 6/30/12	\$183,900.42	\$1,123.78	18th birthday or 23rd birthday when enrolled in in school, or disabled
West Virginia	3 days	7 consecutive days	For FY 2012, it is \$711.38 on a weekly basis	104	66 2/3% PIWW not to exceed 100% of the AWW in West-Virginia	\$676.61	Payable until age 70	N <sub>o</sub>	As of FY 2012, it is \$497.97 on a weekly basis	None	As of FY 2012, the maximum weekly benefit is \$711.38	Death or remarriage of widow, majority of children
Wisconsin	3 days	7 non- consecutive days	\$854.00	Duration of TTD disability	66 2/3% PIWW	\$854.00	For length of disability and can be for life	No	\$302.00	1,000	\$854.00	\$256,200
Wyoming	3 days	8 days	\$815.00	24 months	66 2/3% actual monthly wage unless they earn less than 73% of the SWAMW and then it is 92% of their actual monthly wages	\$543.33	Š	ž	None	None	Benefits paid monthly	None

- a There are some limited exceptions where benefits can be paid for 240 weeks.
- Disability under PA laws means loss of earning power. PA law allows employer/insurer to request "Impairment Rating Examination" after employee has received 104 weeks of full benefit payments. If IRE shows less than 50% impairment based on AMA Guides then benefits are reclassified as partial disability compensation and are subject to a 500-week cap.
- An exception to this amount could be made when an extension of MMI based on spinal surgery is approved by the Division.
- least as severe in nature as any condition provided in subparagraphs (A) through (E) of this paragraphs, (4) Second or third degree burns over 25 percent of the body as a whole or third degree burns to 5 percent or more of the face and hands; (5) Total or industrial blindness; (6) Any other injury of a nature and severity that prevents an employee from being able to perform his or her prior work and arm, a hand, a foot, or a leg involving the effective loss of use of that appendage; (3) Severe brain or closed head injury as evidenced by: (A) Severe sensory or motor disturbance; (B) Severe communication Disturbance; (C) Severe complex integrated disturbances of cerebral function; (D) Severe disturbances of consciousness; (E) Severe episodic neurological disorders; or (F) Other conditions at For purposes of this table, "catastrophic Injury" means any injury which is one of the following: (1) Spinal cord injury involving severe paralysis of an arm, a leg, or the trunk; (2) Amputation of an any work available in substantial numbers within the national economy for which such employee is otherwise qualified, provided, however, that the injury has not already been accepted as a catastrophic injury by the employer and the authorized treating physician has released the employee to return.
  - e 72% of the workers' pre-injury weekly wage for the first 12 weeks and then 66.67 % thereafter.
- f If the weekly wage is below 50% of the SAWW the calculation is wages, less income tax and social security.
- TTD ceases during the time period an employee refuses a suitable job offer.
- All earned income of the injured worker and all employment based retirement income is considered in the calculation of extended benefits.
- KS has a cap of \$125,000 for Permanent Total and that cap includes any TTD paid.
- Total TTD and PPD for scheduled and unscheduled cannot be greater than \$75,000 if the impairment rating is less than 25% and \$150,000 if more than 25%.
- Workers' Compensation benefit provisions apply to injury dates on and after July 1, 2008 to distinguish them from the benefit levels applicable to most of the calendar year payments shown through
- 1 If total amount of weekly compensation is less than \$7.00 per week.
- Dependency benefits end at various times depending on level of dependency. Spouse-lifetime or until remarriage. Children-until they meet the age threshold. For cases that fall in the Schoemehl window (Jan 9, 2007- Jun 26, 2008), surviving dependents can claim benefits from SIF instead of deceased employee. Ш
- end when the blindness or physical disability ends, after age 18 or 23 as appropriate. If benefits paid to dependent parents or grandparents, they end upon death. For brothers, sisters or grandchildren Benefits end for spouse on remarriage or upon death and end for children upon turning 18, or if still in school, 23, if not blind or physically disabled. If blind or physically disabled then the benefits at age 18, or, if in school, 23. п
- Widower may receive lifetime payments if she is totally disabled at the date of decedents's death and child will receive weekly payments for 400 weeks or until age 18, whichever is longer.
  - p Except for PTD which is payable for life
- q Wage Loss benefits may continue for life, however
- ABP benefits are additional benefits payable. ABP are payable for the length of the disability or until death. Benefit is based on the duration of disability prior to retirement.

PIWW Pre-injury Weekly wage

IWW Average weekly wage

NWW Net weekly wage

SAWW State-wide average weekly wage

AMW Average Monthly wage

Source: IAIABC-WCRI (2011).

## **Appendix J: Second Injury Funds, Special Funds and Guaranty Funds**

Second injury funds help reduce the financial impact of a workers' compensation claim in the event a worker with a disability is injured on the job, aggravating pre-existing impairment. Forty-one states provided the details of their second injury and special funds. Details are given in Table J1.

As stated by the annual report of the National Conference of Insurance Guaranty Funds, "The purpose of state guaranty associations is to provide a mechanism for the prompt payment of covered claims of an insolvent insurer, as those terms are defined and limited by guaranty association statutes, so that catastrophic financial loss to certain claimants and policyholders may be avoided." Guaranty Funds

cover the outstanding claims of insolvent insurance companies, the property and casualty guaranty fund system. It is a measure of protection to policyholders, beneficiaries and their families who otherwise would experience lengthy delays getting resolution of their claim, usually receiving only a fraction of the amount due from the insurer (NCIGF 2010). The self-insurance guaranty Funds help pay the covered workers' compensation claims of insolvent self-insurers.

There were 34 insurance guaranty funds and 14 self-insurance guaranty funds who responded to NASI's Annual Survey 2009. Table J2 and J3 show the totals of these guaranty funds.

**Table J1**Second Injury and Special Funds Paid Benefits for the Calendar Years 2006-2010

States	2006	2007	2008	2009	2010
Alabama	n.a.	n.a.	n.a.	n.a.	n.a.
Alaska	\$2,899,258	\$2,816,244	\$4,105,087	\$2,895,447	\$3,347,669
Arizona	12,930,595	14,767,509	16,471,784	14,722,208	12,232,074
Arkansas	4,506,424	6,633,942	5,645,690	6,426,588	4,602,907
California	45,349,992	48,231,184	43,767,260	50,385,638	60,079,465
Colorado	9,519,611	8,504,329	8,227,347	7,243,689	7,062,617
Connecticut	37,460,632	35,037,646	39,707,328	39,406,068	36,404,167
Delaware	5,735,647	5,886,482	5,789,453	6,586,590	5,860,424
D.C.	2,939,078	3,571,619	3,241,597	3,618,810	3,996,024
Florida	253,100,000	217,750,000	105,100,000	53,750,000	38,785,107
Georgia	147,754,925	146,886,928	148,437,248	154,605,143	127,172,141
Hawaii	18,805,177	18,243,489	15,820,705	14,429,936	11,280,234
Idaho	2,542,723	2,654,181	3,840,977	4,004,091	3,354,410
Illinois	1,321,625	1,155,116	1,127,565	1,544,570	1,795,112
Indiana	3,679,309	4,078,372	3,853,042	4,724,248	4,788,361
Iowa	1,862,078	3,049,366	2,464,791	2,781,612	3,776,132
Kansas	3,499,162	4,262,638	4,262,638	3,761,176	3,857,921
Kentucky	74,721,835	70,409,622	69,050,217	67,672,436	66,544,425
Louisiana	38,540,285	41,549,518	42,181,211	38,419,534	43,690,296
Maine	n.a.	n.a.	n.a.	n.a.	n.a.
Maryland	16,715,724	18,171,918	17,921,321	14,515,454	21,620,290
Massachusetts	26,575,339	20,725,671	24,078,327	26,575,359	22,588,821
Michigan	16,221,899	16,253,722	14,472,512	12,890,804	13,470,410
Minnesota	58,914,988	58,621,823	60,759,405	59,459,582	54,036,363
Mississippi	110,860	119,113	104,549	139,608	121,911
Missouri	60,960,007	63,806,940	69,641,680	53,958,704	35,635,613
Montana	1,252,927	1,300,698	2,027,188	1,687,730	971,366
Nebraska	1,716,525	1,668,203	1,608,600	1,587,537	1,562,695
Nevada	1,970,002	2,658,723	0	975,412	979,802
New Hampshire	8,602,597	7,429,544	15,297,755	12,939,306	13,767,394
New Jersey	150,700,000	163,700,000	164,300,000	170,800,000	176,300,000
New Mexico	2,248,676	1,917,052	1,673,734	1,436,868	2,070,187
New York	n.a.	n.a.	n.a.	n.a.	n.a.
North Carolina	n.a.	n.a.	n.a.	n.a.	n.a.
North Dakota	n.a.	n.a.	n.a.	n.a.	n.a.
Ohio	n.a.	n.a.	n.a.	n.a.	n.a.
Oklahoma	16,715,724	18,171,918	17,921,321	16,607,569	15,933,284
Oregon	692,761	677,858	366,617	1,280,332	608,345
Pennsylvania	246,000	264,001	686,663	3,331,704	3,624,316
Rhode Island	2,828,762	2,617,824	2,673,172	2,529,501	1,952,465
South Carolina	118,252,779	113,231,699	113,715,933	103,088,646	102,544,424
South Dakota	n.a.	n.a.	n.a.	n.a.	n.a.
Tennessee	9,920,262	10,465,012	9,073,098	7,280,862	6,087,834
Texas	437,223	508,015	687,863	671,557	600,304
Utah	21,167,000	20,567,500	19,822,500	20,125,540	20,820,644
Vermont	n.a.	n.a.	n.a.	n.a.	n.a.
Virginia	n.a.	n.a.	n.a.	n.a.	n.a.
Washington	129,000	68,000	129,000	148,000	69,000
West Virginia	10,733,505	11,703,611	12,029,809	11,302,657	11,097,983
Wisconsin	12,859,116	16,049,638	15,897,294	12,994,820	3,521,796
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'n.a.'- Data not Available.

Source: National Academy of Social Insurance.

Table J2 Guaranty Funds Paid Benefits for the Calendar Years 2006-2010

States	2006	2007	2008	2009	2010
Alabama	\$9,572,585	\$8,270,504	\$8,513,545	\$8,706,158	\$7,699,972
Alaska	4,901,874	4,507,514	4,246,369	4,093,339	3,932,553
Arizona	n.a.	n.a.	n.a.	n.a.	n.a.
Arkansas	1,531,295	652,295	1,097,658	454,130	1,187,585
California	386,523,939	256,250,525	219,909,626	224,895,828	187,732,446
Colorado	4,266,558	4,289,512	3,655,690	3,835,119	3,474,067
Connecticut	10,829,391	5,538,972	3,603,128	2,625,067	2,392,177
Delaware	1,685,729	1,332,112	1,274,199	1,068,010	859,456
D.C.	1,587,080	1,819,706	1,532,145	1,084,108	0
Florida	n.a.	n.a.	n.a.	n.a.	n.a.
Georgia	19,745,819	13,782,366	11,226,202	13,900,950	15,919,839
Hawaii	n.a.	n.a.	n.a.	n.a.	n.a.
Idaho	1,503,205	1,023,995	829,253	637,735	654,810
Illinois	n.a.	n.a.	n.a.	n.a.	n.a.
Indiana	603,295	482,427	165,210	168,307	367,762
Iowa	1,742,250	1,194,142	267,083	486,656	0
Kansas	7,006,992	2,909,332	1,799,003	2,628,770	1,860,436
Kentucky	5,078,454	5,445,483	5,303,338	4,429,557	4,256,739
Louisiana	10,330,558	7,555,638	8,227,881	8,198,745	8,041,616
Maine	5,402,822	4,191,887	1,666,328	1,503,977	1,090,117
Maryland	n.a.	n.a.	n.a.	n.a.	n.a.
Massachusetts	20,740,002	17,975,951	12,703,619	6,544,432	5,456,650
Michigan	3,804,561	3,313,650	2,305,280	1,866,002	3,105,869
Minnesota	11,360,818	11,631,274	10,883,162	11,021,858	10,369,569
Mississippi	9,552,064	5,359,294	3,427,316	3,328,384	3,664,532
Missouri	n.a.	n.a.	n.a.	n.a.	n.a.
Montana	2,369,318	2,088,921	2,011,940	2,210,287	3,147,745
Nebraska	n.a.	n.a.	n.a.	n.a.	n.a.
Nevada	n.a.	486,432	n.a.	n.a.	416,719
New Hampshire	4,106,471	3,401,269	1,582,303	2,058,087	1,360,025
New Jersey	20,581,708	19,599,965	19,228,173	15,376,575	15,410,764
New Mexico	n.a.	n.a.	n.a.	1,568,850	2,239,261
New York	n.a.	n.a.	n.a.	n.a.	n.a.
North Carolina	n.a.	n.a.	n.a.	n.a.	n.a.
North Dakota	n.a.	n.a.	n.a.	n.a.	n.a.
Ohio	n.a.	n.a.	n.a.	n.a.	n.a.
Oklahoma	n.a.	n.a.	n.a.	n.a.	n.a.
Oregon	2,021,477	1,488,741	1,212,721	1,888,961	1,827,724
Pennsylvania	66,296,225	49,748,320	43,321,285	30,175,472	25,224,208
Rhode Island	1,578,550	1,722,705	841,512	701,545	839,068
South Carolina	4,761,463	1,487,946	2,405,431	2,212,245	3,176,635
South Dakota	n.a.	n.a.	n.a.	n.a.	n.a.
Tennessee	n.a.	n.a.	n.a.	n.a.	n.a.
Texas	24,695,064	16,374,589	22,909,602	21,716,395	21,206,332
Utah	2,795,885	2,177,198	2,967,681	2,461,916	2,136,298
Vermont		1,455,444	860,893		
	1,933,239			1,672,416	1,023,143
Virginia Washinatan	4,033,094	7,385,538	7,800,597	6,208,041	4,033,094
Washington	n.a.	n.a.	n.a.	n.a.	n.a.
West Virginia	n.a.	n.a.	n.a.	n.a.	n.a.
Wisconsin	n.a.	n.a.	n.a.	n.a.	n.a.
Wyoming	12,916	13,862	143,795	70,956	17,301

<sup>&#</sup>x27;n.a.'- Data not Available.

Source: National Academy of Social Insurance.

**Table J3**Self-Insured Guaranty Funds Paid Benefits for the Calendar Years 2006-2010

States	2006	2007	2008	2009	2010
Alabama	n.a	n.a	n.a	n.a	n.a
Alaska	n.a	n.a	n.a	n.a	n.a
Arizona	n.a	n.a	n.a	n.a	n.a
Arkansas	\$21,741,454	\$21,908,430	\$23,652,461	\$23,030,910	\$23,986,413
California	6,161,362	6,273,986	6,812,932	10,430,029	18,619,421
Colorado	n.a	n.a	n.a	n.a	n.a
Connecticut	n.a	n.a	n.a	n.a	n.a
Delaware	0	0	0	0	0
D.C.	n.a	n.a	n.a	n.a	n.a
Florida	6,737,318	4,889,869	4,683,973	2,015,747	989,074
Georgia	361,796	273,285	186,321	1,278,953	708,265
Hawaii	n.a	n.a	n.a	n.a	n.a
Idaho	n.a	n.a	n.a	n.a	n.a
Illinois	284,961	437,150	655,065	1,780,848	2,429,290
Indiana	n.a	n.a	n.a	n.a	n.a
Iowa	n.a	n.a	n.a	n.a	n.a
Kansas	n.a	n.a	n.a	n.a	n.a
Kentucky	n.a	n.a	n.a	n.a	n.a
Louisiana	n.a	n.a	n.a	n.a	n.a
Maine	n.a	n.a	n.a	n.a	n.a
Maryland	n.a	n.a	n.a	n.a	n.a
Massachusetts	n.a	n.a	n.a	n.a	n.a
Michigan	6,370,513	6,429,764	4,994,060	5,110,379	10,064,914
Minnesota	4,762,500	4,132,056	3,927,142	3,860,600	3,421,098
Mississippi	n.a	n.a	n.a	n.a	n.a
Missouri	1,386,616	965,195	815,097	453,234	1,030,749
Montana	n.a	n.a	n.a	n.a	n.a
Nebraska	n.a	n.a	n.a	n.a	n.a
Nevada	n.a	163,816	478,442	n.a	n.a
New Hampshire	n.a	n.a	n.a	n.a	n.a
New Jersey	100,000	900,000	3,400,000	1,000,000	1,900,000
New Mexico	n.a	n.a	n.a	n.a	n.a
New York	n.a	n.a	n.a	n.a	n.a
North Carolina	n.a	n.a	n.a	n.a	n.a
North Dakota	n.a	n.a	n.a	n.a	n.a
Ohio	n.a	n.a	n.a	n.a	n.a
Oklahoma	n.a	n.a	n.a	n.a	n.a
Oregon	350,939	364,630	371,074	352,926	951,224
Pennsylvania	7,876,377	6,223,622	4,497,895	1,449,583	1,393,381
Rhode Island	n.a	n.a	n.a	n.a	n.a
South Carolina	n.a	n.a	n.a	n.a	n.a
South Dakota	n.a	n.a	n.a	n.a	n.a
Tennessee	n.a	n.a	n.a	n.a	n.a
Texas	n.a	n.a	n.a	n.a	n.a
Utah	n.a	n.a	n.a	n.a	n.a
Vermont	n.a	n.a	n.a	n.a	n.a
Virginia	n.a	n.a	n.a	n.a	n.a
Washington	787,000	1,078,000	977,000	1,675,000	1,336,000
West Virginia	77,683	77,321	54,573	74,598	66,764
Wisconsin					
Wyoming	n.a n.a	n.a n.a	n.a n.a	n.a n.a	n.a n.a

<sup>&#</sup>x27;n.a.'- Data not Available. North Dakota and Wyoming do not allow self-insurance in their state. Source: National Academy of Social Insurance.

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