

**EQUAL PAY
FOR
WORKING
FAMILIES**

**NATIONAL AND STATE DATA
ON THE PAY GAP AND ITS COSTS**

**A Joint Research Project of the
AFL-CIO and the
Institute for Women's Policy Research**

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Executive Summary

Equal pay is a bread-and-butter issue for working families. More than two-thirds of all mothers in the United States work for pay. Two-earner families are today's norm among married couples, and a growing number of single women provide most or all of their families' support. Altogether, almost two-thirds of all working women and slightly more than half of married women responding to the AFL-CIO's 1997 *Ask A Working Woman* survey said they provide half or more of their families' incomes.

Little wonder, then, that 94 percent of working women in the *Ask A Working Woman* survey—almost every one—described equal pay as “very important;” that two of every five cited pay as the “biggest” problem women face at work; and that one-third of all women and half of African American women said that, despite its importance, they do not have equal pay in their jobs.

To better understand the wage gap for women and people of color in the United States and to better measure the price that wage inequality exacts from families and individual workers, the AFL-CIO and the Institute for Women's Policy Research (IWPR) jointly undertook a national study, including state-by-state breakouts, to analyze recent data from the Census Bureau and the Bureau of Labor Statistics.

The study confirms many recent analyses, finding that women who work full-time are paid only 74 cents for every dollar men earn—or \$148 less each week. Women of color who work full-time are paid only 64 cents for every dollar men overall earn—or \$210 less each week. Going further, the study uses more refined

techniques to explore the dimensions, and the full cost, of unequal pay.

Working Families Pay a Steep Price for Unequal Pay

America's working families lose a staggering \$200 billion of income annually to the wage gap—an average loss of more than \$4,000 each for working women's families every year because of unequal pay, even after accounting for differences in education, age, location and the number of hours worked.

- If married women were paid the same as comparable men, their family incomes would rise by nearly 6 percent, and their families' poverty rates would fall from 2.1 percent to 0.8 percent.
- If single working mothers earned as much as comparable men, their family incomes would increase by nearly 17 percent, and their poverty rates would be cut in half, from 25.3 percent to 12.6 percent
- If single women earned as much as comparable men, their incomes would rise by 13.4 percent, and their poverty rates would be reduced from 6.3 percent to 1 percent.
- Working families in Ohio, Michigan, Vermont, Indiana, Illinois, Montana, Wisconsin and Alabama pay the heaviest price for unequal pay to working women, losing an average of roughly \$5,000 in family income each year.
- Family income losses due to unequal pay for women range from \$326 million in Alaska to \$21.8 billion in California.

The Size of the Pay Gap Varies by State

While the wage gap is much smaller than the national average in some states, the numbers do not automatically signal improved economic status for women. The primary reason for women's relatively improved status in many states is that the wages of minority men are so low. This is particularly true for the District of Columbia, Arizona, California, New York, North Carolina, Texas and Virginia.

- **Women who work full-time** are paid the least, compared with men, in Indiana, Louisiana, Michigan, Montana, North Dakota, Wisconsin and Wyoming, where women earn less than 70 percent of men's weekly earnings.
- **Women of color** fare especially poorly in Louisiana, Montana, Nebraska, Oregon, Rhode Island, Utah, Wisconsin and Wyoming, earning less than 60 percent of what men earn.
- **Even where women fare best compared with men**—in Arizona, California, Florida, Hawaii, Massachusetts, New York and Rhode Island—women earn little more than 80 percent as much as men.
- Women earn the most in comparison to men—97 percent—in Washington, D.C., but the primary reason women appear to fare so well is the very low wages of minority men.

- For women of color, the gender pay gap is smallest in the District of Columbia, Hawaii, Florida, New York and Tennessee, where they earn more than 70 percent of what men overall in those states earn.

Unequal Pay Hurts Men, Too

As the percentage of women in an occupation rises, wages tend to fall. Workers who do what traditionally has been viewed as “women's work”—clerical workers, cashiers, librarians, child care workers and others in jobs in which 70 percent or more of the workers are women—typically earn less than workers in jobs that are predominately male or are integrated by gender.

- **Both women and men** pay a steep price for unequal pay when they do “women's work”: The 25.6 million women who work in these jobs lose an average of \$3,446 each per year; the 4 million men who work in predominately female occupations lose an average of \$6,259 each per year—for a whopping \$114 billion loss for men and women in predominately female jobs.
- At the state level, **women who work in female-dominated jobs** could increase their salaries from \$2,112 per year in Missouri to a high of \$4,707 in Delaware if they had equal pay. Annual wage gains for women in these jobs would exceed \$3,000 on average in 36 states. In 34 states, wages would increase by at least \$2,500 for women of color in female-dominated jobs.

- For men in female-dominated jobs, state average increases would range from \$3,533 annually in the District of Columbia to \$8,958 in Delaware if pay inequality was eliminated. Minority men would see increases ranging from \$1,918 in Colorado to \$7,996 in Alaska.
- Minority men who belong to unions bring home 44 percent more—\$177—each week than nonunion men of color.
- Unions also help close the wage gaps based on gender and minority status for their members. Women represented by unions earn almost 84 percent as much as union men, while unionized workers of color make about 81 percent as much as unionized white workers.

Unions Mean Big Pay Gains, Smaller Pay Gaps

Union representation is a proven and powerful tool for raising workers' wages, particularly for those most subject to labor market discrimination: women and minorities.

- The typical female union member earns 38 percent more per week—\$157—than a woman who does not belong to a union.
- Unionized women of color earn almost 39 percent more—\$135—than nonunion women of color. In fact, minority union women earn \$45 a week more than nonunion white women.

In the 35 years since the equal employment laws passed, women and people of color have made significant strides into the mainstream of the American workplace. But lingering unequal pay robs women and their families of economic security, doubling poverty rates for today's workers and threatening reduced retirement income and greater poverty tomorrow.

There are three clear routes to ensuring that women receive equal pay: vigorous enforcement of current equal pay laws, passage of stronger and better equal pay laws and greater protections for workers' right to organize together into unions.

Introduction

In the 1960s, Congress passed two landmark laws designed to remove discrimination from employment relations. The first, the Equal Pay Act of 1963, outlawed the long-established and standard business practice of paying women less than men even when they were doing exactly the same work. Its mandate was straightforward: equal pay for equal work. The next year, Congress enacted the Civil Rights Act of 1964, which included, among other things, a comprehensive fair employment section (Title VII) that banned discrimination against women and minorities in all terms and conditions of employment (hiring, promotions, terminations and the like), including pay. Read together, the Equal Pay Act and Title VII establish the principle that employers may not pay women and people of color less for the work they do because of their race, gender or ethnicity. Simply put, employers may not deny women and minorities equal pay because of sex or race discrimination.

In the 35 years since the equal employment laws passed, women and people of color have made significant strides into the mainstream of the American workplace. Nevertheless, despite undeniable gains, pay bias and other discriminatory practices continue to impede progress, all too often placing glass ceilings in the way of workers moving up and relegating too many others to second-class workplace status on the sticky floor. Consider, for example:

- In January 1999, the Department of Labor announced that Texaco had agreed to give 186 women more than \$3 million in back wages and pay adjustments to settle findings that the company consistently had paid women in professional and executive positions less than their male counterparts.
- In 1998, major corporations, including US Airways, the pharmaceutical division of Bayer Corp., publishing giant R.R. Donnelly, Pepsi-Cola, desktop computer manufacturer Gateway 2000, insurer Highmark, Inc. (formerly Blue Cross/Blue Shield of Western Pennsylvania), Allison Engine Company of Indianapolis and CoreStates Financial Institution, agreed to payments totaling about \$3.5 million altogether to resolve Labor Department findings of pay bias and other discrimination against women and minorities.
- In 1997, two major national chains—Home Depot and Publix Supermarkets—agreed to pay out more than \$80 million each to settle lawsuits charging them with sex discrimination, including discrimination in pay, against thousands of women workers.
- In recent months, Boeing, Pennzoil Company and United Parcel Service have agreed to employment discrimination settlements totaling more than \$30 million altogether and potentially benefiting thousands of African American workers and former employees.
- According to the 1998 *Catalyst Census of Women Corporate Officers and Top Earners*, less than 3 percent (or only 63 of 2,320 individuals) of the top-earning corporate officers in Fortune 500 companies are women, and their earnings (salaries and bonuses) are only two-thirds those of top-earning men.

¹Quan, Samantha. "A Profile of the Working Poor, 1996." U.S. Department of Labor: Bureau of Labor Statistics. Report No. 918. December 1997.

²Wage ratio and corresponding wage gap calculations compare average (mean) wages of one group with those of another or wages of the typical worker (the worker at the median) in each group. The median worker is the worker in the middle of the earnings range; there are just as many workers earning more than the median worker as are earning less. Median earnings (or earnings of the median worker) are often considered more accurate than mean earnings because the mean (or average) is often skewed upward by a few very high earners at the top of the earnings range. Wage gaps or ratios are usually calculated for full-time workers, all of whom by definition work 35 hours or more each week. The gender wage gap is even greater when total earnings for women and men are compared, because women average fewer hours than men.

³Of course, even differences in human capital may be affected by discrimination in the labor market or elsewhere, as well as by conditions, such as poverty, that disproportionately affect women and people of color. Discriminatory exclusion of women and people of color from training

- African American and Hispanic workers are more than twice as likely as white workers to be "working poor"—that is, to be employed but, nevertheless, to live in poverty. Minority women workers, who confront the dual problems of gender and race bias, have especially high poverty rates: One in seven African American and Hispanic women workers lives below the poverty line compared with one in 20 white working women and men.¹

Not surprisingly—considering these examples—wage gaps persist between women and men and between minority and nonminority workers as enduring reminders of gender and racial inequality in the workplace.

What Do Wage Gaps Tell Us?

"Wage gaps" are commonly cited measures of earnings inequality between different groups of workers. A "wage gap" is derived from a "wage ratio," the figure expressing the percentage of one group's earnings (for example, women or minorities) compared with another group's (men or nonminorities). As used in this study, "gender wage gaps" are percentage or actual dollar differences between the earnings of men and women, and "minority wage gaps" are differences between earnings of people of color and white workers.²

Since earnings are the main source of income for most American families, wage gaps are important indicators of differences in economic status among groups of working families. Economists disagree, however, about the extent to which wage gaps reflect

labor market discrimination or other considerations such as "human capital" differences among workers (that is, differences in education, training and experience). Higher earnings for white men, for example, do not necessarily reflect discrimination against women and minorities if white men, on average, have more human capital.³ Analyses attempting to tease out the reasons for wage differences between women and men typically separate the gender wage gap into a portion explained by human capital differences and a portion that remains unexplained even after taking such differences into account. Recent studies indicate that between one-quarter and one-half of the gender wage gap remains unexplained, and some economists attribute some or all of this unexplained portion to discrimination.⁴

Economists also differ as to whether and how to consider additional factors in explaining wage gaps. For example, pay differences associated with work in specific occupations and industries may simply reflect legitimate consumer and worker preferences or supply and demand for goods and services; or they may suggest something far more sinister—discriminatory barriers locking workers *in* some jobs and *out* of others, or bias in setting wages for jobs with heavy concentrations of women and minority workers. Marriage and the presence of children typically affect women's and men's wages differently: Is that because employers tend to discriminate *against* child-bearing women (and in favor of fathers)? Because women prefer to spend more time caring for children, hence accumulating less human capital? Or because the nation lacks infrastructure,

such as universally accessible and affordable child care, to make meeting both work and family needs easier?

Recognizing these differences among economists, this study employs three separate and increasingly refined approaches to measure and report on wage gaps: Section I describes results of the simplest and most straightforward analysis, a comparison of median weekly earnings of men and women and of minorities and nonminorities; Section II reports on an assessment that considers several factors, including workers' ages and education levels, to determine the effect that paying women as much as comparable men would have on women's earnings and their families' incomes and poverty rates; and Section III presents findings from an even more finely

honed test that controls for multiple individual and job characteristics to measure the wage penalty workers—men as well as women—suffer when they work in “female-dominated” jobs (those in which at least 70 percent of the workers are women). Section IV reviews the considerable advantage unionized workers enjoy, both in the form of higher wages and smaller wage gaps.

This research project was undertaken jointly by the AFL-CIO and the Institute for Women's Policy Research to better understand the wage gap in the United States, as well as each of the 50 states and the District of Columbia, and to better measure the costs of wage inequality for families and individuals.

programs, for example, will limit their acquisition of human capital and affect their ability to earn higher wages. In general, the opportunities and obstacles that individuals face (or believe they face) and forces such as culture, tradition, discrimination and poverty condition most choices—how much schooling to get, what fields to study, whether and when to have children. As a consequence, even though human capital is often thought to result from individuals' “choices” or “preferences,” it is important to remember that not every “choice” is freely made, nor every “preference” truly preferred.

⁴Altonji, Joseph G., and Rebecca M. Blank. “Race and Gender in the Labor Market.” Prepublication manuscript. Institute for Policy Research and Department of Economics, Northwestern University. June 1998; Blau, Francine D., and Lawrence M. Kahn. “Swimming Upstream: Trends in the Gender Wage Differential in the 1980s.” *Journal of Labor Economics*. Vol. 15:1, part 1, pp. 1-42. 1997; MacPherson, David A., and Barry T. Hirsch. “Wages and Gender Composition: Why Do Women's Jobs Pay Less?” *Journal of Labor Economics*. Vol. 13:3, pp. 426-71. Economists also attribute at least some of the unexplained portion to unobserved differences in productivity or other factors that are, nonetheless, legitimate considerations.

Large Wage Gaps Persist for Women and Minority Workers

This section evaluates the overall wage gap and the wage ratio between women and men of all races and between minorities and whites, as reflected by differences in *median weekly earnings of full-time workers* in each group.⁵ The analysis groups Hispanics, who may be

of any race, with racial minorities, which include African Americans, Asian Americans, Pacific Islanders, Native Americans, Aleut Eskimos and others. Tables 1 and 2 detail the relevant earnings for each group.⁶ As shown in these tables, gender-based earnings differences and corresponding gender

TABLE 1. THE GENDER WAGE GAP

Median Weekly Earnings by Gender and Minority Status for Full-Time Workers, 1997

	WOMEN	MEN	GENDER WAGE GAP	FEMALE/MALE WAGE RATIO
All Races ^a	\$431	\$579	\$148	74.4%
Whites (Non-Hispanic) ^b	\$462	\$631	\$169	73.2%
Minorities ^{*b}	\$369	\$415	\$ 46	88.9%

* Minority workers include those who are African American, Asian American, Pacific Islander, Native American, Aleut Eskimo or other race and Hispanics who may be of any race.

Source: *U.S. Department of Labor, Bureau of Labor Statistics, Employment and Earnings, January 1998, Table 39; ^bInstitute for Women's Policy Research calculations based on the Current Population Survey, Outgoing Rotation Group File, 1997.

TABLE 2. THE MINORITY WAGE GAP

Median Weekly Earnings by Minority Status for Full-Time Workers, 1997

	MINORITIES*	WHITES (NON-HISPANICS)	MINORITY WAGE GAP	MINORITY/WHITE WAGE RATIO
Both Sexes	\$400	\$554	\$154	72.2%
Women	\$369	\$462	\$ 93	79.9%
Men	\$415	\$631	\$216	65.8%

* Minority workers include those who are African American, Asian American, Pacific Islander, Native American, Aleut Eskimo or other race and Hispanics who may be of any race.

Source: Institute for Women's Policy Research calculations based on the Current Population Survey, Outgoing Rotation Group File, 1997.

⁵Wage gaps also can be expressed as differences in hourly earnings, in which case part-time workers would also be included in computing gender and minority differences. Federal data sources generally do not provide hourly earnings data, though hourly figures can be calculated either from data on hours worked per week and weekly earnings or from hours worked per year and annual earnings. This report uses both weekly and annual earnings data.

⁶These calculations use two sources. Where possible, they rely on 1997 year-end Current Population Survey data reported in the Department of Labor's January 1998 edition of *Employment and Earnings*. For figures not officially reported in *Employment and Earnings*, IWPR calculations from the raw Outgoing Rotation Group files of the 1997 Current Population Survey (CPS) are used.

wage gaps are large for all women compared with all men and especially large for minority women compared with all men.

- Overall, women earn just \$431 per week compared with men's \$579 weekly earnings, for a wage gap of \$148. White women do better than women overall, earning \$462 per week—but since white men's weekly earnings of \$631 are also greater than those for men overall, the \$169 wage gap between white women and white men is larger than for all women and all men.
- Minority women have lower earnings—just \$369 a week—but because minority men's \$415 weekly earnings are also lower than men's overall, the \$46 distance between minority women and men is the smallest gender gap. The low wages of both minority women and men and their smaller gender gap reflect systematic disadvantages that minorities face in and out of the workplace. When compared with all men rather than only with minority men, the wage gap for minority women—\$210—is almost five times greater.
- For all race groups, full-time women workers earn just 74.4 percent of what men earn on a weekly basis. White women earn 73.2 percent of what white men earn, while minority women earn 88.9 percent of what minority men earn. However, minority women earn just 63.7 percent of what all men earn.
- The ratio of women's wages to men's is lower, and hence the wage gap is greater than corresponding national rates, in half of the states. Overall gender gaps are worst in Indiana, Louisiana, Michigan, Montana, North Dakota, Wisconsin and Wyoming, where women's median weekly wages are less than 70 percent

those of men. At the other end of the spectrum, women fare best in Arizona, California, Florida, Hawaii, Massachusetts, New York, Rhode Island and the District of Columbia, where they earn at least 80 percent as much as men.

- More favorable gender wage gaps at the state level, however, do not automatically signal improved economic status for women. To the contrary, in the District of Columbia and six states where the gender wage gap is less than the national rate—Arizona, California, New York, North Carolina, Texas and Virginia—a primary reason for women's relatively improved status is that the wages of minority men are so low. (See the National Summary Table for state-by-state breakdowns.)

Wage gaps between men and women have declined steadily in recent decades, though progress has slowed in the 1990s, and gender-based wage differentials in the United States remain large relative to those in many other industrialized countries. Today's 26 percent gender wage gap is 11 percentage points lower than it was in 1979, when women earned only 63 cents for every dollar men earned, and the gender wage gap was 37 percent.⁷ Several factors contribute to the rise in women's wages, including increased educational attainment (today, women's college graduation rates are actually higher than men's, although they lagged behind for several decades), greater labor force attachment and work experience (more women are working, and women are working more), fairer treatment in the labor market (in large part because of laws such as Title VII) and movement into traditional men's jobs (for example, telecommunications specialists, mail carriers and professions such as lawyers and doctors).

⁷The wage gap is actually the difference between 100 percent (what the wage ratio would be if there were equality between women and men) and the wage ratio. The current wage gap is about 26 percent.

Nevertheless, the narrowing of the gender wage gap since 1979 connotes less progress than might appear. Over the past two decades, most of the reduction in the gender wage gap was because *men's real wages were falling*—not because women's were rising.⁸ An earlier IWPR study estimated that the growth in women's wages explained only about two-fifths of the decrease in the wage gap between 1979 and 1997; three-fifths of the narrowing of the gap resulted from the decline in men's real wages.⁹ Falling men's wages accounted for roughly half of the decline in the gender wage gap between 1979 and 1989 and for a stunning four-fifths of the decline between 1989 and 1997. Had men's real wages not fallen—in other words, had they remained at their 1979 inflation-adjusted level—women's earnings today would be only about 66 percent of men's, representing a remarkably small overall decline in the gender wage gap.

Like gender-based wage differentials, minority-based wage gaps are substantial. Minority men fare less well than minority women relative to their white counterparts, though this result, in part, reflects white women's low wages compared with those of white men.

- The minority wage gap for both sexes considered together is quite large (\$154) and especially large for minority men compared with white men (\$216). Indeed, the overall minority wage gap of \$154 is larger than the overall gender-based wage gap of \$148.
- Taking women and men together, minorities earn only 72.2 percent of what whites earn for full-time weekly work. Minority women earn 79.9 percent of what white women earn, while minority men earn only 65.8 percent of what

white men earn. At earnings of \$415 per week, minority men also earn \$47 less than white women.

- Minority women's median weekly earnings are greatest in relation to white women's in Alaska (95 percent), Tennessee (94 percent), Indiana (93 percent), Pennsylvania (89 percent) and South Dakota (89 percent). Women of color fare least well in relation to white women in Rhode Island (62 percent), the District of Columbia (65 percent), Texas (67 percent), California (69 percent) and New Mexico (70 percent). Minority men's earnings are highest in relation to white men's in Kentucky (90 percent), Montana (86 percent), Hawaii (84 percent) and Missouri and Ohio (83 percent for each); and lowest in relation to white men's in the District of Columbia (51 percent), California (52 percent), Rhode Island (57 percent) and Arizona, Idaho, Mississippi and Oregon (58 percent for each).

Unlike the gender wage gap, which has shown slight but steady improvement, the pattern of change in minority wage gaps has been uneven and generally negative. The wage gap between African American and white men narrowed until 1978 but then widened during the 1980s and has not moved in a clear direction in the 1990s. African American and white women achieved near-parity in wages by the mid-1970s, but since then the race-based wage gap between them has widened. Differences based on race in the earnings of college-educated workers have grown since 1978 for both women and men.¹⁰ Earnings data for Hispanic men and women also show growing earnings inequality between non-Hispanic whites and Hispanics for both genders.

⁸The concept of "real wages" reflects the actual value of wages once inflation is taken into account. Between 1979 and 1997, men's "real" hourly wages fell from \$14.39 to \$12.19, while women's rose slightly, from \$9.03 to \$9.63. Mishel, Lawrence, Jared Bernstein and John Schmitt. *The State of Working America, 1998-99*. Economic Policy Institute and Cornell University Press, January 1999.

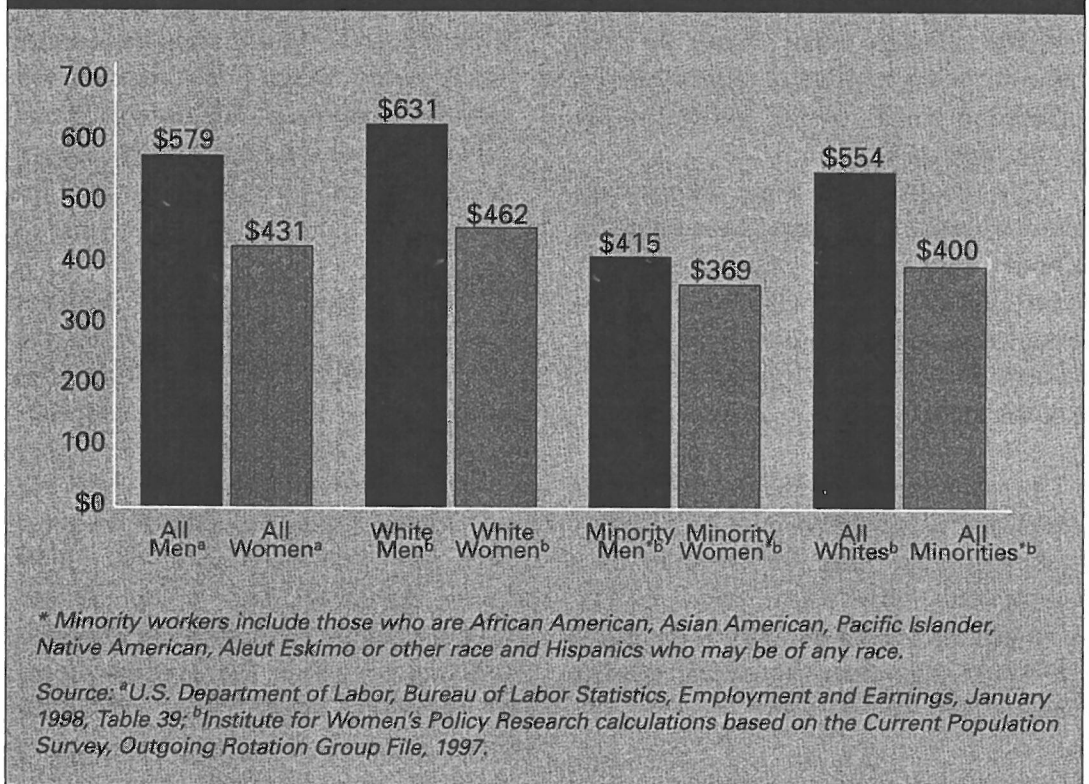
⁹Hartmann, Heidi, and Julie Whittaker. "Stall in Women's Real Wage Growth Slows Progress in Closing the Wage Gap." Briefing paper. Institute for Women's Policy Research, February 1998. See also Mishel, Bernstein and Schmitt at 134.

¹⁰Council of Economic Advisors for the President's Initiative on Race. *Changing America: Indicators of Social and Economic Well-Being by Race and Hispanic Origin*. September 1998.

Figure 1 depicts in graphic form the weekly wages of full-time workers for various demographic groups. Earnings disparities are large, with white men earning the most per week at \$631, while minority women earn the least at \$369. These gross wage differences, of course, in part reflect differences among demographic groups in average qualifications and tendencies to work in certain occupations and industries. But they also are meaningful indicators of inequality attributable, at least in part, to discrimination in the labor market or elsewhere, since wage gaps likely would

dwindle or disappear if everyone had true equal opportunity from birth. Average differences among groups in health, education and time spent on family care would not exist, since it is unlikely that preferences regarding these activities would differ substantially among groups if economic, discriminatory and other barriers fell and the forces of tradition dissolved. Workers from all demographic groups would have access to the same types of jobs and, having few differences among them (on average), would tend to earn equal wages.

FIGURE 1. MEDIAN WEEKLY EARNINGS FOR FULL-TIME WORKERS, 1997



Unequal Pay for Women Lowers Family Incomes and Increases Poverty

Because existing differences among groups of workers due to legitimate factors such as education and family status contribute to wage gaps, this study also makes use of two additional, more refined measures better able to isolate the effects of labor market discrimination on gender wage gaps. The first, described in this section, controls for certain human capital differences between male and female workers and for selected differences in labor markets. The objective is to estimate how much women and their families lose because women earn less than similarly qualified men or, correspondingly, how much women's earnings and family incomes would rise with equal pay.

Lower earnings for women are of no small consequence to working families. More than two-thirds of all mothers in the United States work for pay. Of these, about three-fourths are married and have access to men's incomes, but their earnings are nevertheless crucial to family support. One-fourth are single and often the sole support of their families. And many women without children, both single and married, work to support themselves and other family members.

Table 3 shows women's annual earnings, hours worked and annual family incomes in three different types of families with women workers: married working women, working single mothers and self-supporting single women. The table reflects gains to family incomes and reductions in poverty levels that would result from boosting women's pay.¹¹ Estimated added income for the average family of each type is calculated from the earnings gains working women would enjoy if they earned as much as men who work the same number of hours, are the same age, have the same educational attainment and urban/rural status and live

¹¹IWPR researchers used annual earnings and employment information reported in the CPS for the years 1995-1997 to estimate women's and men's earnings. Refer to the Data Description section of the Technical Appendix for more detailed information about the data set.

TABLE 3. MEAN ANNUAL EARNINGS, MEAN FAMILY INCOME AND POVERTY RATES IF WORKING WOMEN EARNED THE SAME AS MEN, 1994-1996 AVERAGE, IN 1997 DOLLARS

	SINGLE MOTHERS AGED 18+	OTHER SINGLE WOMEN AGED 25+	MARRIED WOMEN AGED 18+
Population Size	5,400,000	9,200,000	32,800,000
Women's Annual Earnings	\$19,573	\$27,703	\$23,144
Annual Hours Worked	1,775	1,975	1,761
Annual Family Income			
Current	\$26,372	\$30,849	\$69,676
After Pay Adjustment	\$30,831	\$35,000	\$73,881
Increase per Family	+\$4,459	+\$4,151	+\$4,205
Percent Increase	16.9%	13.4%	6.0%
Total Family Income Gains	\$24.1 billion	\$38.2 billion	\$137.9 billion
Poverty Rate			
Current	25.3%	6.3%	2.1%
After Pay Adjustment	12.6%	1.0%	0.8%

Note: Refers to families with employed women.

Source: Institute for Women's Policy Research calculations based on the Current Population Survey March Demographic Supplements, 1995-1997, for calendar years 1994-1996; all in 1997 dollars.

in the same region of the country.¹² As shown in the table, raising women's pay would have a dramatic impact on their families:

- Paying the 32.8 million married women the same as comparable men would boost their earnings by about one-fifth and raise family incomes for married couples by 6 percent. This translates into an average of \$4,205 more income per year for each married-couple family, or a total of \$137.9 billion nationwide. Poverty rates for married working women's families would fall by more than half, from 2.1 percent to 0.8 percent.
- If the 5.4 million working single mothers earned as much as comparable men, their annual family incomes would increase \$4,459 on average, or nearly 17 percent. Total income gains for this group of families would be \$24.1 billion, and the very high poverty rates for working single mothers would fall by half, from 25.3 percent to 12.6 percent.

- The 9.2 million working single women who live alone,¹³ including divorced, widowed, separated and never-married women, would earn a total of \$38.2 billion more if they were paid the same as comparable men. These single working women each would earn an average of \$4,151 more per year. Single working women also would experience a significant drop in poverty—in fact, the steepest drop—from 6.3 percent to 1.0 percent.
- Working women in every state would receive wage hikes if they earned as much as comparable men in their states. The potential wage hikes range from a low of \$2,815, on average, in Alaska to a high of \$5,160 in Ohio. Family income would grow, on average, by about \$326 million in Alaska up to roughly \$21.8 billion in California. Family income in half of the states would grow by more than \$2.5 billion. Poverty rates would fall dramatically in all states, and poverty rates for families headed by single mothers would drop to less than 10 percent in 14 states.

¹²For a more detailed discussion of the methodology used for this analysis, please see the Technical Appendix.

¹³The analysis of earnings gains is limited to single women older than 25 who live alone in order to include only those who are likely to be supporting themselves on their own and whose family income is relatively easy to identify. Many younger single women and single women living in other family configurations also are earning less because of discrimination, but the impact on their family earnings would be more difficult to identify. See the Technical Appendix for additional details.

Men and Women in Female-Dominated Jobs Suffer Wage Penalties

One phenomenon contributing to the gender wage gap is the tendency of wages to fall as the percentage of women in an occupation rises. In particular, workers in “female-dominated” or “predominately female” jobs—jobs such as clerical workers, cashiers, librarians and child care workers, for example, in which 70 percent or more of the workers are women¹⁴—typically earn less than workers in jobs that are predominately male or that are integrated by gender.¹⁵ This section

reports on findings of an analysis designed to capture the “pay inequity” effect of working in female-dominated jobs—that is, the wage penalty women and men incur for working in predominately female jobs.

To develop an estimate of the earnings costs for workers in female-dominated jobs, the analysis compares earnings of workers in these occupations with those of comparable workers who are not in predominately female jobs.¹⁶ In other words, workers (women and men) in female-

¹⁴Defining a female-dominated occupation as one in which women make up 70 percent or more of the workers is standard practice in this field. The 70 percent figure represents women’s share of the labor force plus 25 percent. A male-dominated occupation is generally held to be one in which 80 percent or more of the workers are men, since 80 percent represents men’s share of the labor force (55 percent) plus 25 percent.

¹⁵Treiman, Donald J., and Heidi I. Hartmann (eds.). *Women, Work and Wages: Equal Pay for Jobs of Equal Value*. National Research Council: Committee on Occupational Classification and Analysis, Assembly of Behavioral and Social Sciences. Washington, D.C.: National Academy Press, 1981.

¹⁶Occupations that are not female-dominated are those in which fewer than 70 percent of the workers are women. These include integrated occupations in which female and male workers are present in relatively equal proportions, as well as occupations that are disproportionately male.

TABLE 4. MEAN ANNUAL EARNINGS OF WOMEN AND MEN AGED 18 AND OLDER IN FEMALE-DOMINATED OCCUPATIONS*

If Pay Equity Prevailed, 1994-1996 Average, 1997 Dollars

	WOMEN			MEN		
	WHITE (NON-HISPANIC)	MINORITY	*ALL RACES	WHITE (NON-HISPANIC)	MINORITY*	ALL RACES
Population Size	18,690,000	6,910,000	25,600,000	2,667,000	1,346,000	4,013,000
Mean Annual Earnings						
Current	\$19,482	\$18,363	\$19,211	\$26,926	\$20,632	\$25,028
After Pay Adjustment	\$22,938	\$21,775	\$22,657	\$33,826	\$25,410	\$31,287
Increase per Worker	+\$3,456	+\$3,412	+\$3,446	+\$6,900	+\$4,778	+\$6,259
Average Annual Hours	1,670	1,730	1,685	1,845	1,834	1,841
Labor Force-Wide Pay Increase	\$65 billion	\$24 billion	\$89 billion	\$18 billion	\$6 billion	\$25 billion

*Female-dominated occupations are those in which 70 percent or more of the incumbents are women.

*Minority workers include those who are African American, Asian American, Pacific Islander, Native American, Aleut Eskimo or other race and Hispanics who may be of any race.

Source: Institute for Women’s Policy Research calculations based on the Current Population Survey March Demographic Supplements, 1995-1997, for calendar years 1994-1996; all in 1997 dollars.

¹⁷Please see the Technical Appendix for more detailed information about the methodology used for the statistical model. Since no data on the content of jobs (the skill, effort and responsibility required by workers who hold them nor the working conditions in which they work) are available in the CPS, “jobs of equal value” to the female-dominated jobs being studied are approximated by investigating what these same workers would earn in jobs that are not female-dominated.

¹⁸This strategy also has the effect of reducing some of the weaknesses in the data available. For example, the gender differences in the value of age as a proxy for work experience matter less if women are being compared to women and men are being compared to men. Other models were tested, but all resulted in the same magnitude and relative findings among women and men.

¹⁹Minority men would especially benefit from pay equity adjustments, since they are more likely to work in female-dominated occupations than white men are; minority men are 34 percent of the male workers in female-dominated jobs compared with 26 percent of male workers overall.

dominated jobs are compared with workers in nonfemale-dominated jobs who are otherwise of the same gender, age, race, educational level, marital and parental status, urban/rural status, who live in the same region of the country and who work the same number of hours per year in a firm of the same size in the same industry.¹⁷ This strategy, comparing women in female-dominated jobs with women in all other occupations and men in female-dominated occupations with men in all other occupations, has the effect of isolating pay differentials due to job class from all other gender-based discrimination. As a result, this approach may actually understate the extent to which pay equity would boost wages for women workers in female-dominated jobs.¹⁸ Yet even so, as reported in Table 4, the analysis finds very large earnings losses due to the lower pay associated with working in female-dominated jobs:

- Nearly 26 million women of all races who work in female-dominated occupations would earn about 18 percent more per year if they earned as much as comparable women in nonfemale-dominated jobs. For the number of hours these women worked, each would have earned an average of \$3,446 more per year, translating into \$89 billion in income gains for women in predominately female jobs throughout the United States.
- Among the nearly 7 million minority women working in female-dominated jobs, earnings would rise 18.6 percent, for average individual increases of \$3,412 per year. Altogether, pay equity adjustments based on job class would yield a total of \$24 billion in annual earnings for minority women.
- Likewise, the 18.7 million white women working in female-dominated occupations

would receive 17.7 percent more in earnings per year, or an average of \$3,456 each, for total earnings gains of \$65 billion per year.

- At the state level, increases for women of all races would range from a low of \$2,112 per year in Missouri to a high of \$4,707 in Delaware. Annual wage gains for women in predominately female jobs would exceed \$3,000, on average, in 36 of the states. In 34 states, wages would increase by at least \$2,500 for women of color in female-dominated jobs.

Men working in female-dominated occupations also would earn more if they did not suffer inequities based on job class. However, only 8.5 percent of men work in female-dominated occupations compared with more than 55 percent of women. Men in female-dominated jobs earn about 20 percent more per hour than women in these same jobs. Because they work more hours and have higher rates of pay than women in both the female-dominated occupations and nonfemale-dominated jobs, pay equity adjustments for men in female-dominated jobs would actually produce even larger individual gains than for women. Each of the 4 million men of all races working in predominately female occupations would receive an average of \$6,259 more per year. This represents \$25 billion in additional income for male workers throughout the United States. The 1.3 million minority men who work in female-dominated occupations would receive an average of \$4,778 more per year, bringing their annual earnings up from \$20,632 to \$25,410.¹⁹ For all men in female-dominated jobs, state-level increases would range from \$3,533 annually in the District of Columbia to \$8,958 in Delaware; and for minority men, from \$1,918 in Colorado to \$7,996 in Alaska.

Union Membership Means Big Pay Gains, Smaller Pay Gaps

As the preceding sections reflect, equal pay would boost workers' pay and working families' incomes. Union representation is another proven and powerful tool for raising workers' wages, particularly for those most subject to labor market discrimination: women and minorities. Unions spell higher pay and more equitable wages for women and workers of color for several reasons:

- Unions routinely bargain for wage increases and related benefits for workers they represent.
- Unions have played a central role in fighting for equal opportunity and combating discrimination. A number of public- and private-sector unions have led the campaign to bring pay equity to the workplace, combining organizing, bargaining, lobbying and lawsuits to win pay equity adjustments totaling hundreds of millions of dollars.
- Unions bring wage setting into the open, making it more difficult for employers to discriminate and helping ensure a stronger voice for all workers.

- Unionization also tends to compress wage differentials between jobs at the top and the bottom of pay scales, further mitigating the effects of race- or sex-based bias.

Table 5 reports median weekly earnings for workers represented by unions²⁰ and nonunion workers by gender and minority status. For every group represented, median weekly earnings are substantially higher for union workers than for their nonunion counterparts:

- Union women earn \$157 more per week than nonunion women (\$568, compared with \$411).

²⁰Union workers are defined as those who are members of a union or whose job is covered by a union or employee association collective bargaining agreement.

TABLE 5. THE UNION WAGE ADVANTAGE

Median Weekly Earnings for Union and Nonunion Workers by Gender and Minority Status for Full-Time Workers, 1997

	UNION	NONUNION	UNION WAGE ADVANTAGE	UNION/NON-UNION WAGE RATIO	UNION PERCENT INCREASE
Women ^a	\$568	\$411	\$157	138.2%	38.2%
White (Non-Hispanic) ^b	\$596	\$440	\$156	135.5%	35.5%
Minority ^{*b}	\$485	\$350	\$135	138.6%	38.6%
Men ^a	\$679	\$539	\$140	126.0%	26.0%
White (Non-Hispanic) ^b	\$715	\$600	\$115	119.2%	19.2%
Minority ^{*b}	\$577	\$400	\$177	144.3%	44.3%

* Minority workers include those who are African American, Asian American, Pacific Islander, Native American, Aleut Eskimo or other race and Hispanics who may be of any race.

Source: ^aU.S. Department of Labor, Bureau of Labor Statistics, Employment and Earnings, January 1998, Table 41; ^bInstitute for Women's Policy Research calculations based on the Current Population Survey, Outgoing Rotation Group File, 1997.

- Likewise, minority women represented by unions earn \$135 more than minority women who are not in unions (\$485 compared with \$350). Indeed, minority union women out-earn nonunion white women (\$485 compared with \$440).
- The union wage advantage is largest for minority men, at \$177, and smallest for white men, at \$115.

Table 5 also shows the percentage increase in the weekly wages for each group, comparing union workers with nonunion workers. These percentage increases are largest for minority workers, larger for women than for men overall and smallest but still substantial for white men.

Minority women who are represented by unions earn 38.6 percent more than minority women who are not represented by unions. Likewise, minority union men earn 44.3 percent more than those who are not in unions. White women also benefit substantially from union representation, earning 35.5 percent more than those who are not represented by a union. The gain for white men, 19.2 percent, is less, but still a substantial increase.

Union workers enjoy a wage advantage over nonunion workers in every state. Union women receive a wage premium of 30 percent or more relative to nonunion women in 34 states, and the union wage advantage for women is at least 20 percent in all but four states. Because of sample

TABLE 6. THE GENDER GAP FOR UNION AND NONUNION WORKERS

Median Weekly Earnings for Women and Men by Union Status for Full-Time Workers, 1997

	WOMEN	MEN	GENDER WAGE GAP	FEMALE/MALE WAGE RATIO
All Races				
Nonunion	\$411	\$539	\$128	76.3%
Union	\$568	\$679	\$111	83.7%

Source: U.S. Department of Labor, Bureau of Labor Statistics, Employment and Earnings, January 1998, Table 41.

constraints, union wage advantages can be computed for women of color in only 27 states (including the District of Columbia); the union wage advantage for minority women is 25 percent or more in 19 of these. Minority men represented by unions enjoy a union wage advantage of 35 percent or more in 25 of the 31 states for which computations are possible. Among men of all races, men represented by unions have a union wage advantage of 35 percent or more in eight states.

Wage gaps are also smaller among workers represented by unions than among their nonunion counterparts. As Table 6 shows, among workers represented by unions, women's wages relative to men's are more than 7 percentage points higher than among nonunion women and men (a

female/male wage ratio of 83.7 percent among union members compared with 76.3 percent among nonunion workers). In other words, the gender-based wage gap is *one-third smaller* among union workers than among nonunion workers. Table 7 shows that the minority wage gap is also smaller among union workers than their nonunion counterparts and especially so among men. The minority/white wage ratio for women is about 2 percentage points larger among union workers than among nonunion workers. Among men, the minority/white wage ratio is 14 percentage points larger. In other words, the minority/white wage gap for men is about two-fifths smaller among union workers relative to nonunion employees.

TABLE 7. THE MINORITY WAGE GAP FOR UNION/ NONUNION WORKERS

Median Weekly Earnings for Minorities and Whites by Gender and Union Status for Full-Time Workers, 1997

	MINORITIES*	WHITES	MINORITY WAGE GAP	MINORITY/WHITE WAGE RATIO
Women				
Nonunion	\$350	\$440	\$ 90	79.5%
Union	\$485	\$596	\$111	81.4%
Men				
Nonunion	\$400	\$600	\$200	66.7%
Union	\$577	\$715	\$138	80.7%

* Minority workers include those who are African American, Asian American, Pacific Islander, Native American, Aleut Eskimo or other race and Hispanics who may be of any race.

Source: Institute for Women's Policy Research calculations based on the Current Population Survey, Outgoing Rotation Group File, 1997.

Conclusion

Persistent wage gaps for working women and people of color and the earnings inequality these gaps connote translate into lower pay, less family income and more poverty for working families. The solution, long overdue, is equal pay for women and minority workers.

As the analyses reported above show, paying working women the wages of comparable men would increase family incomes substantially and cut family poverty rates markedly—at least by half for all family types in the study. Moreover, paying women *and* men in female-dominated jobs wages equal to those of comparable workers in other jobs would significantly boost these workers' incomes.

Unions are crucial weapons in the equal pay fight. Unions play an especially important role for workers most affected by

race- and gender-based wage discrimination—women and minorities—as well as for men who work in female-dominated jobs. Wages are higher for union-represented workers, and the gender- and minority-based wage gaps are smaller. Hence, strengthening labor laws and boosting support for workers' rights to organize and bargain would raise wages for women and people of color, helping to reduce inequality.

Equally important, steps to ensure greater compliance with existing equal pay and employment discrimination requirements, coupled with passage and enforcement of new and tougher laws, also would boost wages for women and minorities significantly. In short, tough enforcement of strong equal pay laws would go a long way toward erasing inequality and closing wage gaps that imperil economic security for millions of working families.

National Summary Table

STATE	MEDIAN WEEKLY EARNINGS		SHARE OF WEEKLY EARNINGS OF ALL MEN		EARNING AS MUCH AS COMPARABLE MEN WOULD			RAISE TOTAL FAMILY EARNINGS IN EACH STATE (IN MILLIONS)
	ALL MEN	ALL WOMEN	PERCENT ALL WOMEN	PERCENT MINORITY WOMEN	RAISE WOMEN'S ANNUAL WAGES ON AVERAGE	REDUCE POVERTY IN SINGLE-MOTHER HOUSEHOLDS	FROM	
U.S.	\$579	\$431	74.4%	63.7%	\$4,229	25.3%	12.6%	\$200,592
Alabama	493	362	73.4%	60.9%	\$4,829	33.0	16.3	\$3,718
Alaska	762	557	73.1%	69.8%	\$2,815	9.7	3.5	\$326
Arizona	487	399	81.9%	65.7%	\$4,437	37.9	24.7	\$3,256
Arkansas	439	329	74.9%	63.3%	\$3,602	35.8	17.5	\$1,585
California	589	497	84.4%	67.9%	\$4,129	19.2	9.2	\$21,829
Colorado	617	460	74.6%	64.8%	\$4,650	24.7	11.1	\$3,480
Connecticut	692	513	74.1%	61.1%	\$3,316	22.2	11.8	\$2,090
Delaware	598	443	74.1%	65.9%	\$4,415	19.7	8.4	\$616
Dist. of Col.	584	567	97.1%	82.4%	\$3,933	25.8	14.2	\$349
Florida	492	407	82.7%	70.3%	\$4,490	23.6	11.5	\$11,201
Georgia	567	427	75.3%	65.3%	\$3,665	24.4	12.5	\$5,121
Hawaii	562	463	82.4%	79.9%	\$4,692	21.1	4.1	\$969
Idaho	509	382	75.0%	66.8%	\$4,313	34.4	15.7	\$949
Illinois	639	460	72.0%	62.6%	\$4,913	25.4	9.9	\$10,306
Indiana	590	389	65.9%	62.7%	\$5,011	21.0	12.7	\$5,563
Iowa	538	398	74.0%	64.3%	\$3,647	16.7	11.5	\$2,127
Kansas	553	410	74.1%	60.8%	\$3,973	31.5	17.8	\$1,982
Kentucky	539	386	71.6%	61.2%	\$3,565	31.8	16.8	\$2,489
Louisiana	509	339	66.6%	55.0%	\$3,814	34.2	19.1	\$2,626
Maine	521	397	76.2%	N/A	\$4,616	23.3	16.0	\$1,128
Maryland	676	503	74.4%	63.9%	\$4,398	22.4	6.1	\$4,410
Mass.	640	512	80.0%	62.8%	\$4,097	20.3	8.6	\$4,851
Michigan	654	457	69.9%	61.2%	\$5,130	31.1	12.9	\$9,016

PAY EQUITY FOR FEMALE-DOMINATED JOBS WOULD RAISE ANNUAL WAGES, ON AVERAGE:				UNION WAGE ADVANTAGE			
ALL WOMEN	MINORITY WOMEN	ALL MEN	MINORITY MEN	ALL WOMEN	MINORITY WOMEN	ALL MEN	MINORITY MEN
\$3,446	\$3,412	\$6,259	\$4,778	138.2%	138.6%	126.0%	144.3%
\$3,177	\$2,459	\$5,323	\$5,139	148.9%	149.0%	137.5%	137.0%
\$3,320	\$1,872	\$8,318	\$7,996	136.8%	135.1%	135.9%	163.5%
\$3,169	\$3,309	\$5,655	\$4,033	123.0%	N/A	132.6%	153.8%
\$2,830	\$2,358	\$7,426	N/A	143.4%	N/A	115.4%	N/A
\$4,280	\$4,125	\$6,519	\$5,462	139.4%	160.3%	136.9%	159.7%
\$3,260	\$2,915	\$6,188	\$1,918	128.2%	153.1%	125.7%	136.4%
\$2,839	\$2,751	\$5,349	\$6,456	139.8%	150.0%	112.6%	145.9%
\$4,707	\$6,796	\$8,958	N/A	130.6%	120.0%	128.7%	166.7%
\$3,637	\$3,299	\$3,533	\$3,329	112.2%	122.5%	112.3%	140.8%
\$4,135	\$2,899	\$5,815	\$3,936	144.3%	141.5%	135.4%	150.0%
\$3,850	\$3,891	\$4,616	\$4,171	145.4%	138.9%	116.4%	133.5%
\$3,888	\$4,059	\$5,748	\$6,477	122.8%	128.0%	135.9%	144.2%
\$2,734	\$1,771	\$7,229	N/A	153.9%	N/A	129.6%	N/A
\$3,459	\$3,472	\$6,454	\$4,841	117.6%	120.0%	114.6%	151.8%
\$3,116	\$2,771	\$6,705	N/A	147.3%	N/A	120.2%	153.0%
\$2,318	N/A	\$5,940	N/A	129.5%	N/A	118.3%	N/A
\$3,242	\$2,417	\$5,731	\$4,057	146.7%	N/A	130.3%	N/A
\$2,716	\$2,673	\$4,116	N/A	128.0%	N/A	126.4%	N/A
\$2,707	\$2,820	\$6,459	\$4,103	125.1%	127.4%	121.2%	160.0%
\$2,957	N/A	\$7,695	N/A	140.8%	N/A	141.3%	N/A
\$3,743	\$2,993	\$7,790	\$6,450	146.3%	160.5%	*	120.0%
\$3,536	\$4,132	\$6,950	\$3,521	121.6%	104.0%	106.0%	125.0%
\$3,113	\$3,382	\$6,420	\$3,644	137.4%	146.6%	125.2%	146.7%

*No significant difference.

MEDIAN WEEKLY EARNINGS			SHARE OF WEEKLY EARNINGS OF ALL MEN		EARNING AS MUCH AS COMPARABLE MEN WOULD			
STATE	ALL MEN	ALL WOMEN	PERCENT ALL WOMEN	PERCENT MINORITY WOMEN	RAISE WOMEN'S ANNUAL WAGES ON AVERAGE	REDUCE POVERTY IN SINGLE-MOTHER HOUSEHOLDS		RAISE TOTAL FAMILY EARNINGS IN EACH STATE (IN MILLIONS)
						FROM	TO	
Minnesota	634	477	75.2%	65.9%	\$3,332	23.0	7.9	\$3,203
Mississippi	464	343	73.9%	64.7%	\$4,690	37.9	15.6	\$2,092
Missouri	568	419	73.8%	64.3%	\$2,977	21.8	10.9	\$3,148
Montana	497	344	69.2%	57.9%	\$4,955	31.5	16.5	\$834
Nebraska	533	386	72.4%	58.5%	\$4,436	30.1	19.1	\$1,465
Nevada	555	410	73.9%	62.0%	\$3,726	9.9	5.4	\$1,157
New Hamp.	603	459	76.1%	60.5%	\$4,803	12.5	6.4	\$1,167
New Jersey	667	503	75.4%	60.0%	\$3,770	18.6	6.5	\$5,277
New Mexico	508	391	77.0%	63.6%	\$4,760	28.0	16.1	\$1,353
New York	603	485	80.4%	70.1%	\$4,080	21.2	10.5	\$11,792
N. Carolina	507	394	77.7%	68.2%	\$3,618	35.3	22.3	\$5,063
N. Dakota	509	347	68.2%	N/A	\$4,217	27.5	16.1	\$546
Ohio	595	427	71.8%	64.7%	\$5,160	23.1	11.0	\$10,279
Oklahoma	493	362	73.4%	64.9%	\$4,481	28.9	17.3	\$2,599
Oregon	553	416	75.2%	57.9%	\$3,886	30.0	16.3	\$2,259
Penn.	609	437	71.8%	65.7%	\$4,623	19.4	9.1	\$9,559
Rhode Island	575	465	80.9%	51.5%	\$3,917	19.7	10.4	\$707
S. Carolina	499	379	76.0%	64.1%	\$3,998	35.2	16.4	\$2,713
S. Dakota	479	358	74.7%	66.8%	\$3,849	30.3	14.6	\$571
Tennessee	512	374	73.0%	70.3%	\$4,234	26.1	14.5	\$4,169
Texas	512	402	78.5%	62.5%	\$3,789	31.3	18.4	\$12,528
Utah	552	408	73.9%	58.0%	\$4,051	21.5	9.3	\$1,456
Vermont	531	419	78.9%	N/A	\$5,051	30.2	16.2	\$642
Virginia	586	461	78.7%	64.8%	\$4,212	22.6	12.5	\$5,218
Washington	643	491	76.4%	67.2%	\$3,821	25.7	6.7	\$3,950
W. Virginia	516	370	71.7%	N/A	\$4,033	34.1	16.3	\$1,122
Wisconsin	613	420	68.5%	55.8%	\$4,938	24.2	11.2	\$5,324
Wyoming	579	364	62.9%	51.8%	\$4,497	29.6	19.2	\$408

	PAY EQUITY FOR FEMALE-DOMINATED JOBS WOULD RAISE ANNUAL WAGES, ON AVERAGE:				UNION WAGE ADVANTAGE			
	ALL WOMEN	MINORITY WOMEN	ALL MEN	MINORITY MEN	ALL WOMEN	MINORITY WOMEN	ALL MEN	MINORITY MEN
	\$2,161	\$1,685	\$4,050	N/A	126.1%	N/A	115.3%	N/A
	\$3,625	\$4,179	\$6,671	\$4,643	137.2%	142.9%	127.8%	150.0%
	\$2,112	\$3,351	\$5,190	N/A	139.0%	0.0%	125.1%	150.0%
	\$2,595	\$3,380	\$5,794	N/A	162.5%	N/A	130.9%	N/A
	\$3,564	\$3,528	\$5,376	N/A	139.0%	N/A	128.0%	N/A
	\$2,522	\$2,565	\$4,920	\$4,133	120.3%	N/A	124.5%	133.3%
	\$4,252	N/A	\$5,397	N/A	130.7%	N/A	121.3%	N/A
	\$2,754	\$3,387	\$5,539	\$4,403	119.8%	105.0%	101.0%	N/A
	\$3,557	\$3,368	\$7,414	\$6,281	135.7%	146.2%	122.0%	144.3%
	\$3,506	\$3,930	\$6,457	\$5,590	113.9%	118.5%	115.1%	137.5%
	\$3,366	\$3,384	\$5,788	\$3,205	122.8%	135.9%	123.4%	166.7%
	\$3,157	\$2,205	\$4,360	N/A	151.5%	N/A	134.3%	N/A
	\$3,169	\$3,421	\$7,408	\$3,671	128.5%	137.1%	115.8%	139.1%
	\$3,094	\$3,210	\$5,757	\$5,401	152.3%	142.4%	127.5%	172.2%
	\$3,844	\$2,421	\$6,764	N/A	136.2%	N/A	134.6%	183.0%
	\$4,284	\$3,488	\$6,988	\$4,603	139.7%	118.7%	107.7%	101.9%
	\$3,195	\$1,535	\$6,954	\$4,683	132.6%	N/A	115.4%	N/A
	\$3,827	\$4,169	\$6,178	N/A	126.4%	N/A	136.0%	N/A
	\$2,892	\$745	\$3,608	N/A	166.8%	N/A	115.3%	N/A
	\$2,415	\$2,492	\$6,063	\$2,806	147.0%	115.6%	119.0%	107.1%
	\$3,109	\$2,741	\$5,921	\$4,016	146.1%	138.1%	123.0%	138.4%
	\$3,376	\$2,334	\$5,921	N/A	137.5%	N/A	133.3%	N/A
	\$4,468	N/A	\$7,518	N/A	153.8%	N/A	124.5%	N/A
	\$3,530	\$3,826	\$8,207	\$5,292	136.7%	137.0%	116.8%	136.4%
	\$4,247	\$2,669	\$6,553	N/A	127.4%	N/A	128.2%	N/A
	\$3,884	N/A	\$4,767	N/A	145.7%	N/A	136.0%	N/A
	\$3,615	\$2,814	\$7,967	N/A	138.8%	130.7%	116.6%	176.5%
	\$2,326	\$3,459	\$5,305	N/A	158.0%	N/A	132.9%	N/A

Technical Appendix

Data Description

The data used in the analysis are taken from the Current Population Survey (CPS), a nationally representative data set that provides current estimates of the economic status and employment activities of the population of the United States. The CPS is a monthly survey of about 60,000 households conducted by the Bureau of the Census for the Bureau of Labor Statistics. Respondents are interviewed for four consecutive months in one year and reinterviewed for another four months at the same time the following year. The CPS is an ongoing survey that provides the most extensive and reliable information about the U.S. labor market.

The Outgoing Rotation Group file consists of respondents who are in their last interview month in both interview years. The Outgoing Rotation Group respondents are asked more detailed earnings and employment questions than are asked in the monthly core survey. Since one-quarter of the sample of approximately 60,000 households is rotated out each month, a full 12 months of data are needed to produce reliable state-level estimates. In 1997, this sample consisted of approximately 230,000 households. The Outgoing Rotation Group file is chosen for the calculation of the gender wage gap, minority wage gap and union wage advantage since detailed questions about the union status of workers are asked only in these months.

The March Supplement of the Current Population Survey, also known as the Annual Demographic File, provides additional information about annual earnings and income data that are not available from the monthly core survey. Three years of the March CPS Supplements for the years

1995-1997 are combined to construct a sample size of approximately 175,000 households, a sample large enough to provide state-level estimates. This is the primary data set used in this study for the analysis of earnings losses due to lack of equal pay and earnings gains if equal pay existed. All employment and earnings data gathered in March refer to the previous calendar year. The means reported are, therefore, estimates over the combined three-year period and refer to the experience of respondents in years 1994-1996. All dollar values of income and earnings variables are converted to 1997 real dollars using the Consumer Price Index. The sample is weighted by the March supplement weight standardized for each year. To obtain population weights to make the data set representative of one annual national sample, we take the inverse of the normalized weights and divide by the average of the sample sizes of the three survey years.

The Wage Gap Analysis

The Outgoing Rotation Group file of the 1997 CPS is used to calculate the gender wage gap, the minority wage gap and the union wage advantage. The wage gaps are calculated using the median weekly wages of full-time workers. Full-time workers are defined as those who usually work 35 hours or more per week. Union status is defined as those who are members of a union or whose job is covered by a union or employee association collective bargaining agreement. The wage gap, as reported, is a gross wage gap that is not corrected for differences between women's and men's educational attainment, work experience or hours of work (while all work more than 35 hours per week, some work more than others).

Family Earnings Gains

The analysis of family earnings gains is based on a model that predicts women's earnings as if they were not subject to wage inequality. In this model, we control for many of the factors that contribute to wage differences and account for a portion of the wage gap and then correct women's earnings as if the unexplained portion of the wage gap in this analysis did not exist.

An ordinary least squares (OLS) model is employed that controls for the differences between men and women in age, education, annual hours of work, metropolitan residence and region of the country. The dependent variable is the natural log of annual earnings. The variables for age and age squared are included as proxies for work experience, since specific information about work experience is not available in the CPS. This is a more realistic assumption for men than for women because at any given age men typically have spent more years in the workforce and fewer years out of the workforce. Use of this experience variable (for lack of a better one in this data set) tends to overstate women's experience and overstate their earnings losses relative to comparable men (they may be less comparable than the data indicate). On the other hand, including variables such as education and hours of work, which may themselves be affected by labor market discrimination against women (causing them to invest less in human capital and work less than they otherwise would), tends to understate their true earnings losses relative to men.

In this model, men's earnings are predicted based on a sample of men aged 18 or older with positive earnings and positive hours of work during the year. Since a key component of the analysis is the contribution of women's earnings to family income and the resulting changes in family poverty rates if women's earnings were not subject

to discrimination, the sample of men is restricted to those who earn at or below the 90th percentile of men's annual earnings, or \$65,412 in 1997 dollars. This selection assures that the predicted earnings for those at middle and lower income levels are not upwardly biased by the few high earners in the sample. Poverty rates are calculated using the preliminary poverty thresholds for 1997 adjusted for family size provided by the U.S. Bureau of the Census.

Women's earnings are predicted using the coefficients from the men's earnings equation (this method assumes that women retain their own human capital but are rewarded at the same rates men would be) and calculated only for the actual hours that women worked during the year. The average earnings estimates include only those predicted to have positive earnings adjustments. Those with reduced predicted earnings are assigned their actual earnings during the year.

The model is used to estimate women's earnings in the absence of gender-based wage inequality. The control variables for marital status and the presence of children younger than 18 are explicitly excluded since these characteristics are often linked to gender-based discrimination. For instance, higher earnings are predicted for men who are married, but the opposite is true for women. Likewise, the presence of children often predicts lower earnings for women but does not have a significant effect for men.

Married women and single mothers include all those aged 18 and older. Single women (never married, divorced, separated and widowed) are limited to those 25 and older who live alone; these women are clearly dependent on their own earnings and for them it is easy to calculate household income. Many other single women, who live in a variety of household formations, also suffer from wage discrimination, but it is more difficult to determine the

relevant household income for complex households, whose members may or may not pool income with each other.

Discrimination Based on Job Class

To isolate the effect of gender composition of occupations on earnings, we estimate ordinary least squares (OLS) earnings equations following the methodology of Figart and Lapidus (1995).²¹ In an effort to isolate the effects of pay inequity only (pay differences due to the gender typing of jobs), this model includes additional variables that capture other sources of wage differences between women and men. The samples for both women and men include all those 18 and older with positive earnings and hours of work during the year. An occupation is defined as female-dominated if 70 percent or more of the workers in the occupation are women. A total of 500 different occupations are included in the analysis. Separate equations are estimated for women and men to measure reliably the effect on earnings from working in a female-dominated occupation. Using estimates from the regression model, the earnings of women in female-dominated occupations are predicted as if they were to receive the same earnings as women who are not in female-dominated occupations. Likewise, the earnings of men in female-dominated occupations are predicted as if

they were to earn the same as men who are not in female-dominated occupations.

The dependent variable in the model is the natural log of annual earnings. The independent variables include educational attainment, race, marital status, the presence of a child younger than 18, residence in a metropolitan area, region of the country, firm size, industry, yearly hours of work and percentage of workers in the occupation who are female. The variables for age and age squared are included as proxies for work experience because a specific experience variable is not available in the CPS.

In calculating the pay adjustments due to workers in female-dominated occupations, it is assumed that no worker would incur a loss as a result of the implementation of equal pay for work of equal value. If the model predicts reduced earnings, the actual earnings of the person are assigned. This method provides a reliable estimate for the average movement in earnings for the entire group of workers in female-dominated occupations.

National Summary Table

The state data reporting the raise in annual wages that women would receive if they earned the same as comparable men is a weighted average of what women in the three family types we studied would gain. The family types are married working women, working single mothers and self-supporting single women.

²¹Figart, Deborah M., and June Lapidus. "A Gender Analysis of U.S. Labor Market Policies for the Working Poor." *Feminist Economics*. Vol. 1:3, pp.60-81. Fall 1995.