

# MAKING THE RIGHT CALL:

## Jobs and Diversity in the Communications and Media Sector

Institute for Women's Policy Research

## ABOUT THIS REPORT

*Making the Right Call: Jobs and Diversity in the Communications and Media Sector* is part of a larger, ongoing IWPR project that examines worker well-being in a number of industries and occupations. Funding for this analysis was provided by BellSouth.

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# MAKING THE RIGHT CALL:

## JOBS AND DIVERSITY IN THE COMMUNICATIONS AND MEDIA SECTOR

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# Overview

The Communications and Media Sector is at the forefront of the 21<sup>st</sup> century economy. Employing more than 3 million Americans, activity in this sector fuels cultural, economic, social, and political evolution. New technologies, corporate restructuring, and regulatory change precipitated by the Telecommunications Act of 1996 are driving rapid change in these industries, causing major shifts in employment patterns.

How do these changes affect women and workers of color, who have historically found good jobs and a path to the middle-class in Communications and Media? This report aims to shed light on this question by analyzing employment in the seven largest Communications and Media industries:

- Wired Telecommunications
- Radio/TV/Cable Broadcasting
- Wireless Telecommunications
- Newspaper Publishing
- Motion Pictures/Video Production
- Internet Service Providers (ISP)
- Other Information Services

The report examines recent changes in overall employment levels in these industries, and then details earnings, unionization, and employment, for all workers and for women and people of color in particular. Because employment in these industries, like employment in the U.S. economy as a whole, is characterized by high levels of occupational segregation by gender and race/ethnicity, the report also examines earnings, unionization, and job access for women and minorities for occupational groupings and key individual occupations.

Among the Communications and Media Industries, Wired Telecommunications has historically employed the largest number of workers. Women and workers of color found good, stable, well-paid jobs with the telephone companies. A strong union presence set the standard for good wages throughout the industry. Now, new technologies such as Wireless, Cable, and Internet Communications are competing with Wired Telecommunications. While the expansion of these industries is creating new jobs, compensation in some lags far behind that of the more highly unionized Wired Telecommunications industry. This raises significant questions for policy makers as the sector continues to restructure.

Over the years, public policy promoted the equitable employment of women and minorities in the Cable and Broadcasting industries, to ensure the diversity in communications that is essential to our democracy. The civil rights movement of the 1960s and the riots and protests of the 1970s created pressure on the Federal Communications Commission to apply equal employment opportunity measures to the broadcast and cable industries. New EEO measures included reporting to the FCC the numbers and positions held by women and racial and ethnic minorities, and reporting on outreach efforts to groups such as the National Urban League about employment

opportunities. These policies were weakened, however, with the recent rhetorical and legal assault on affirmative action. A campaign to confuse the term “affirmative action” with preferential treatment undercut important employment practices, while judicial activism typified in *Lutheran Church-Missouri Synod v. FCC* contributed to the FCC’s regulatory backpedaling. As a result, there is good reason to be concerned about how women and workers of color currently fare in the Communications and Media Sector.

This report draws on data collected by the U.S. Bureau of Labor Statistics, the U.S. Census Bureau, and the U.S. Equal Employment Opportunity Commission to examine employment of non-supervisory line workers in the Communications and Media Sector, with particular attention paid to the quality of employment outcomes for women and workers of color.

## KEY FINDINGS

### Job Growth and Decline<sup>1</sup>

- Despite the explosion in new information technologies, job growth in the Communications and Media Sector has been a mere 14 percent over the past 15 years, compared to a 22 percent growth rate in the entire U.S. economy.
- Lower-paying industries in this sector have grown more quickly than the traditionally higher-paying ones.
- Wired Telecommunications remains the largest segment of the network access industry, employing 514,000 workers, compared to Cable with 134,000 workers and Wireless with 192,000. Yet, jobs in Wireless and Cable Distribution grew by 433 and 91 percent, respectively, over the past 15 years, while jobs in Wired Telecommunications declined by 24 percent. Employment in Internet Access and Web Portals surged 179 percent over the same period, to 114,000 jobs in 2005.
- Among media employers, Newspapers and Motion Pictures and Video are the largest employers, employing 369,000 and 359,000 respectively. Over the past 15 years, employment declined by 19 percent in Newspapers and 6 percent in Radio Broadcasting. Job growth over this period was 69 percent in Cable Programming (to 88,000), 55 percent in Motion Pictures, and 13 percent in Television.

### Employment of Women and Minorities

- The Communications and Media Sector is just under half female, similar to the rest of the U.S. economy. Women hold the highest share of jobs in Wireless Telecommunications, where 54 percent of workers are women.<sup>2</sup>
- About one-third of nonsupervisory workers in this sector are minority, similar to the rest of U.S. economy. The Wireless and Radio/TV/Cable industries have the highest percentage of minority employees, and Newspaper Publishing and Internet Service Providers have the lowest.<sup>3</sup>

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<sup>1</sup> Institute for Women’s Policy Research analysis of the 1990 and 2005 Current Employment Statistics surveys.

<sup>2</sup> Institute for Women’s Policy Research analysis of the 2003-2005 ORG files of the Current Population Survey.

<sup>3</sup> Ibid.

- Minority employment grew in Wired and Wireless Telephone and in Motion Pictures from 1990 to 2002 as a share of all employment. Workers of color are now better represented in these industries, and in Cable Broadcasting, than in the overall workforce. They have not been successfully integrated into Radio/TV Broadcasting or Newspapers, however.<sup>4</sup>
- Women continue to fill the majority of jobs in Telephone Communications. Through their historically central role, especially in office jobs such as customer service representatives and operators, and when unionized, women have access to high-quality jobs in this industry. However, women's relative employment in the telephone industry is falling.<sup>5</sup>

### Earnings<sup>6</sup>

- Wired Telecommunications provides the highest median weekly earnings for nonsupervisory workers among all the industries examined in this report, at \$750 per week for full-time workers, or \$39,000 per year—almost 50 percent higher than median earnings for all other U.S. industries (\$520 a week, or \$27,040 annually). In contrast, average weekly earnings in the Wireless industry are \$638. Workers in Radio/TV/Cable earn less, with median weekly earnings of \$598. Pay in Motion Pictures and Newspapers is lower, and closer to the average for all workers outside the Communications and Media Sector (\$542 and \$505, respectively).
- Women's median weekly earnings exceed the U.S. average for women working full-time in nonsupervisory jobs in all other industries, in all the Communications and Media industries included in this study except Newspaper Publishing. Of the dominant Communications and Media industries, Wired Telecommunications offers by far the highest earnings to women (\$623), compared to Wireless (\$573), Radio/TV/Cable (\$559), ISPs (\$540), Motion Pictures and Video (\$502), and Newspapers (\$464). (Women's median weekly earnings outside the Communications and Media Sector are \$462.)
- Similarly, median weekly earnings for workers of color in nonsupervisory jobs are higher than the average for all U.S. industries, in all the Communications and Media industries included in this study except Newspaper Publishing. Minorities' median weekly earnings for full-time workers are highest in Wired Telecommunications (\$624), followed by Wireless (\$582), Radio/TV/Cable (\$557), Motion Pictures and Video (\$483), and Newspapers (\$450). (Median weekly earnings for all workers of color outside the Communications and Media Sector are \$451.)

### Access to Equal Pay<sup>7</sup>

- Pay inequities associated with race and gender persist in all the industries included in this study.

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<sup>4</sup> Institute for Women's Policy Research analysis of data from the Equal Employment Opportunities Commission.

<sup>5</sup> Ibid.

<sup>6</sup> Institute for Women's Policy Research analysis of the 2003-2005 ORG files of the Current Population Survey.

<sup>7</sup> Institute for Women's Policy Research analysis of the 2003-2005 ORG files of the Current Population Survey.

- The female/male pay gap is widest in those industries with the highest overall pay rates for both women and men. In Wired and Wireless Telecommunications, which are the highest paying in this sector, women earn 71 cents and 72 cents, respectively, for every dollar earned by a man. In industries with lower earnings, the female/male pay gap is narrower. Women earn 90 cents for every dollar men earn in Radio/TV/Cable, 84 cents in Motion Pictures, and 82 cents in Newspapers.
- The same pattern prevails in regard to the pay gap between minorities and whites: It is widest in those industries with the highest pay rates for whites and minorities. People of color in Wired Telecommunications and Wireless, respectively, earn 76 cents and 79 cents for every dollar earned by whites. The minority/white pay gap is narrower in those industries with lower pay rates for both groups, with minorities in Radio/TV/Cable earning 90 cents for every dollar of whites' earnings, minorities in Newspaper earning 87 cents, and minorities in Motion Pictures/video earnings 84 cents.

### **The Impact of Unions on Earnings<sup>8</sup>**

- High rates of unionization are associated with much higher median earnings, both within industries and in specific occupations.
- Wired Telecommunications has the highest unionization rates and is the highest-paying industry in the Communications and Media Sector. Unions represent two of every five Wired Telecommunications workers and add 50 percent to their earnings.
- Unionization is much lower outside Wired Telecommunications. Of Wireless Carriers, only Cingular is unionized. Among the industries included in this study, the union presence is lowest in Radio/TV/Cable; unionization there is barely higher than in the private-sector workforce as a whole.
- The union earnings premium is significant in each Communications and Media industry studied. Union workers earn \$17,600 a year more than non-union workers in Wireless Telecommunications, \$15,600 more in Wired Telecommunications, \$16,000 more in Motion Pictures and Video, \$15,100 more in Newspaper Publishing, and \$5,700 more in Radio/TV/Cable.
- The union earnings differential is also significant within occupational groups. Unions turn otherwise low-paid jobs such as customer service representative into high-quality ones, adding 75 cents to every dollar of earnings, or an extra \$19,500 annually, in Wired Telecommunications. Radio/TV/Cable Technicians who join unions enjoy 59 percent higher pay, taking home an additional \$21,900 a year. Among Newspaper Journalists, unions boost earnings 56 percent, or \$20,700 annually.

Women and minorities have benefited from good employment opportunities in the Communications and Media Sector for decades. Wired Telephone Communications have played a central role in this, and unions are one key reason. With employment now expanding in some Com-

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<sup>8</sup> Ibid.

munications and Media industries and contracting in others, this access to high-quality jobs is jeopardized. Women are seeing their share of employment fall, and all workers face the prospect of lower earnings in some of the rapidly expanding industries.

Uneven regulation and inconsistent equal employment opportunity efforts in Communications and Media have weakened what has been a strong employment sector for women and minorities. These issues merit attention and action from policy makers as rapid change and evolution continue in these vital industries.



# Introduction

For years, women and workers of color have found good, stable, well-paid jobs with the telephone companies (Spalter-Roth and Yoon 1995). A strong union presence set the standard for good wages throughout the Wired Telecom industry. Now, new technologies such as Wireless, Cable, and Internet Communications are competing with Wired Telecommunications. While the expansion of these industries is creating new jobs, compensation in some lags far behind that of the more highly unionized Wired Telecommunications industry. This raises significant questions for policy makers as the sector continues to restructure.

Over the years, public policy promoted the equitable employment of women and minorities in the Cable and Broadcasting industries. Diversity in Communications was viewed as essential to encourage all to participate in our democratic institutions. The civil rights movement of the 1960s and the riots and protests of the 1970s created pressure on the Federal Communications Commission (FCC) to apply equal employment opportunity measures to the broadcast and cable industries. New EEO measures included reporting to the FCC the numbers employed and positions held by women and racial and ethnic minorities, and reporting on outreach efforts to groups such as the National Urban League about employment opportunities. These policies were weakened, however, with the recent rhetorical and legal assault on affirmative action. A campaign to confuse the term “affirmative action” with preferential treatment undercut important employment practices, while judicial activism typified in *Lutheran Church-Missouri Synod v. FCC* contributed to the FCC’s regulatory backpedaling. As a result, there is good reason to be concerned about how women and workers of color currently fare in the Communications and Media Sector.

This report draws on data collected by the U.S. Bureau of Labor Statistics, the U.S. Census Bureau, and the U.S. Equal Employment Opportunity Commission to examine employment in the Communications and Media Sector. It focuses on levels of employment, earnings, unionization, and work hours of non-supervisory line workers in selected industries in this sector, as well as in the Communications and Media Sector as a whole, in relation to the entire workforce. Special attention is paid to employment opportunities and outcomes for women and minorities.

## INFORMATION ABOUT THE COMMUNICATIONS AND MEDIA SECTOR

This report uses data from several government surveys. Each is somewhat limited, providing only a partial view of the Communications and Media Sector. Taken together, a comprehensive picture of trends and current employment in this sector comes into focus.

In the U.S. Bureau of Labor Statistics' Current Employment Statistics survey (CES), employers report the number of workers on their payrolls, how many of them are women, and wages of hourly non-supervisory workers (combining women and men), among other things. Employers are classified into a detailed set of industries, allowing Radio, Television, and Cable to be distinguished from one another, for instance. These data are considered to be the most accurate employment counts, since they come directly from employers. However, this survey does not collect information about workers' race and ethnicity, or wages for women and men separately, so it cannot be used to analyze minority workers' share of industry employment or earnings of women or minorities. (Used in Table 1 and Figures 1 and 2 of this report.)

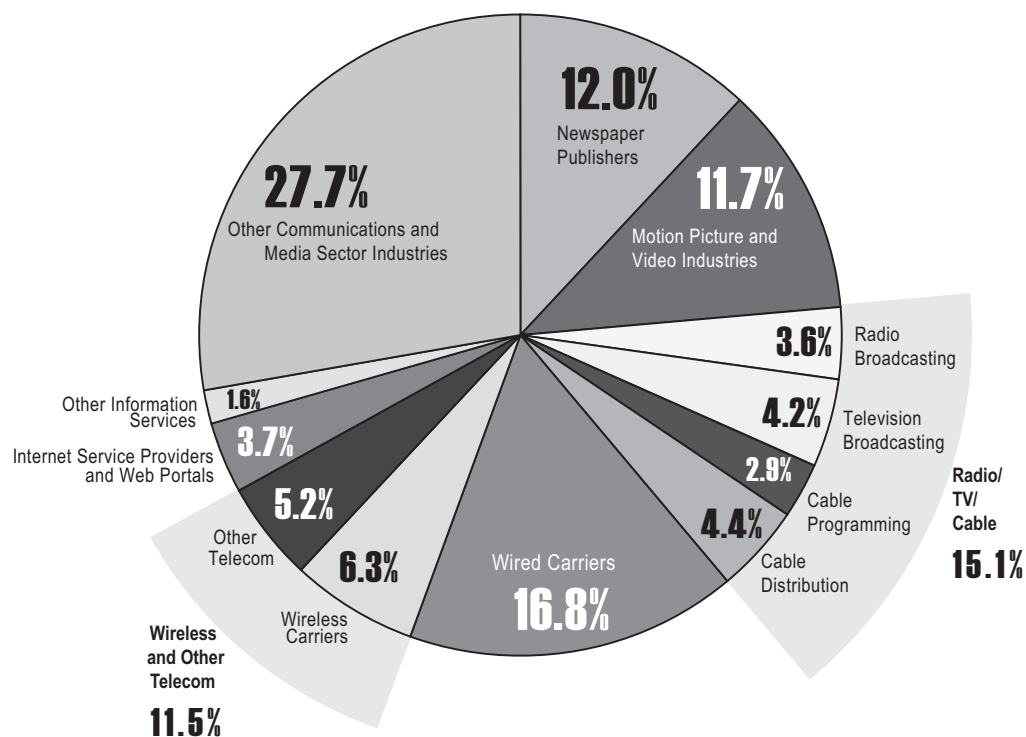
The U.S. Bureau of Labor Statistics' Current Population Survey (CPS) is fielded by the U.S. Census Bureau, gathering detailed demographic and employment data directly from individuals, including information about workers' wages, work hours, gender, race, and ethnicity. Because of errors in interpreting and answering questions, the employment data from the CPS do not always exactly match employers' reports. In addition, the CPS classifies industries differently than the CES. The most recent version of this survey combines important industries of the Communications and Media Sector together, so that employment in Radio Broadcasting cannot be separated from Television Broadcasting or Cable Programming. Because a different industry classification scheme was used in the CPS up to 1997, this survey cannot show employment trends over the long term. (Tables 2 through 18 and Figures 3 through 8.)

Private-sector firms with 100 or more workers, and federal contractors employing 50 or more, file annual reports describing their workforces. Employment numbers are provided to the U.S. Equal Employment Opportunity Commission on these EEO-1 forms by sex as well as by several race/ethnic identities, in very broad job categories. Industry classification was constant on these reports over the period 1990 through 2002, although a different system was used than those of both the CES and the CPS. These data show how women's and minority workers' employment is changing. (Figures 9 through 15.)

# The Communications & Media Sector

The Communications and Media Sector includes 13 industries that “1) produce and distribute information and cultural products, 2) provide the means to transmit these products, as well as general communications, and 3) process data and information” (Bowler et al. 2003, 20).<sup>9</sup> This report focuses on seven of the 13 Communications and Media Sector industries, whose major activities relate to communication through radio, television (including cable), movies, newspapers, the internet, and wired and wireless voice communications.<sup>10</sup> The **seven target industries** are: *Radio/TV/Cable Broadcasting, Wired Telecommunications Carriers, Wireless and other Telecommunications Services, Newspaper Publishers, Motion Pictures and Video Industries, Internet Service Providers, and Other Information Services.*<sup>11</sup>

**FIGURE 1.**  
Share of Communications and Media Sector Employment by Industry, 2005



Note: “Other Telecom” includes Telecommunications resellers, Satellite Telecommunications, and Other Telecommunications. “Other Information Services” consists mainly of news syndicates, libraries, and archives. “Other Communications and Media Sector industries” includes Publishing (except Newspaper Publishers), Sound Recording, and Internet Publishing and Broadcasting.

Source: Institute for Women’s Policy Research analysis of CES data.

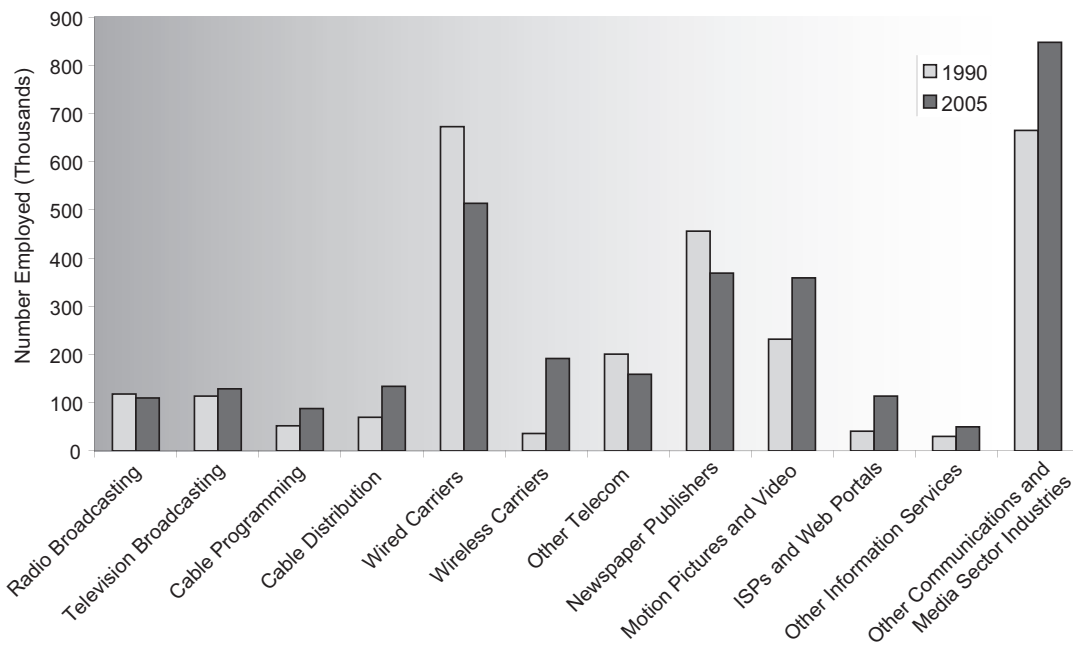
<sup>9</sup>The U.S. Census Bureau and Bureau of Labor Statistics defined the term “Information industry” under the 1997 North American Industry Classification System (NAICS) industry classification system (modified in 2002). (This report refers to this group of industries as the Communications and Media Sector, to reflect contemporary usage.) The new Information Industry classification groups industries from a variety of different sectors of the 1990 Census classification, which was based on the 1987 Standard Industrial Classification (SIC). It includes industries involved in publishing, broadcasting, telecommunications, motion picture and video recording, and Other Information Services (Bowler et al. 2003).

## KEY INDUSTRIES FOR THIS ANALYSIS

The seven target industries, some of which are disaggregated into their subcomponents in the pie chart (Figure 1), together constitute nearly three-fourths (72.3 percent) of total employment in the Communications and Media Sector, according to data from the Current Employment Statistics survey (Figure 1 and Table 1). Wired Telecom is by far the largest industry, with over half a million workers (514,000) and 16.8 percent of total Communications and Media Sector employment. Radio, TV, and Cable Programming and Distribution combined make up 15.1 percent of the sector, with 461,000 workers. Wireless Telecom is next largest, with 192,000 workers and 11.5 percent of Communications and Media Sector employment.

Data from the Current Population Survey indicate that these seven target industries employ 84.8 percent of non-supervisory line workers in the Communications and Media Sector (data presented in Table 3).

**FIGURE 2.**  
**Communications and Media Sector Employment, 1990 and 2005**



Source: Institute for Women's Policy Research analysis of CES data.

Some individual Communications and Media Sector industries are experiencing extremely robust growth, while others are seeing their relative importance decline (Figure 2). Employment growth has been strongest, in percent terms, in Wireless Carriers: More than five times as many workers are employed in that industry now than in 1990 (Table 1). Although Wired Carriers continues to be the largest single industry, it has lost nearly 160,000 workers since 1990, a 23.6 percent drop. Cable Distribution, Internet Publishing and Broadcasting (not shown separately in

<sup>10</sup>The omitted industries are: Publishing, except newspapers and software; Software Publishing; Sound Recording industries; Internet Publishing and Broadcasting; Data Processing, Hosting, and Related Services; and Libraries and Archives.

<sup>11</sup>“Other Information Services” is comprised mostly of News Clipping and other Information Access Services.

Table 1), and Cable Programming all experienced healthy growth over the period 1990 to 2005 (91.4 percent, 76.5 percent, and 69.2 percent, respectively). Employment in Other Telecom and Newspaper Publishers showed significant declines, shrinking by 42,000 and 87,000 workers, respectively (20.9 and 19.1 percent of 1990 employment, respectively).

Overall, employment in the Communications and Media Sector grew 14.1 percent from 1990 to 2005. The U.S. economy as a whole expanded more robustly, with 21.9 percent more jobs in 2005 than in 1990.

**TABLE 1.**

**Number Employed and Share of Communications and Media Sector Employment, by Industry, 1990 and 2005, and Percent Change in Employment, 1990 to 2005 - CES Data**

Industry	1990		2005		Percent Change in Number Employed, 1990-2005
	Number Employed (Thousands)	Percent Share of Sector	Number Employed (Thousands)	Percent Share of Sector	
<b>Radio/TV/Cable<sup>a</sup></b>					
<i>Radio Broadcasting</i>	118	4.4	110	3.6	-6.8
<i>Television Broadcasting</i>	114	4.2	129	4.2	13.2
<i>Cable Programming</i>	52	1.9	88	2.9	69.2
<i>Cable Distribution</i>	70	2.6	134	4.4	91.4
<b>Wired Telecom</b>	673	25.0	514	16.8	-23.6
<b>Wireless and Other Telecom</b>					
<i>Wireless Carriers</i>	36	1.3	192	6.3	433.3
<i>Other Telecom<sup>b</sup></i>	201	7.5	159	5.2	-20.9
<b>Newspaper Publishers</b>	456	17.0	369	12.0	-19.1
<b>Motion Pictures and Video</b>	232	8.6	359	11.7	54.7
<b>ISPs and Web Portals</b>	41	1.5	114	3.7	178.9
<b>Other Information Services<sup>c</sup></b>	30	1.1	50	1.6	66.7
<b>Other Communications and Media Sector Industries<sup>d</sup></b>	665	24.8	848	27.7	27.5
All Communications and Media Sector Industries	2,688	100.0	3,066	100.0	14.1
All Industries <sup>e</sup>	109,487		133,463		21.9

<sup>a</sup> The CES uses the NAICS industry classification scheme, which is more detailed than the Census Codes employed in the CPS. Thus, Radio, TV, and Cable Broadcasting can be separated in this table. In addition, Cable can be disaggregated into two components: Programming (studios that produce and broadcast) and Distribution (delivery of programming to consumers). The CPS, which is used for the bulk of the following analysis, does not separate either Cable Programming and Distribution or Radio, TV, and Cable Broadcasting. Thus, for most of the industry and occupational analyses in this report, Radio Broadcasting, TV Broadcasting, and Cable Programming and Distribution are grouped together.

<sup>b</sup> Other Telecom includes Telecommunications Resellers, Satellite Telecommunications, and Other Telecommunications.

<sup>c</sup> Other Information Services consists mainly of news syndicates, libraries, and archives.

<sup>d</sup> The Communications and Media Sector industries not shown individually in this table are Publishing (except Newspaper Publishers), Sound Recording, Internet Publishing and Broadcasting, and Data Processing, Hosting, and related services.

<sup>e</sup> Total nonfarm employment.

Source: Institute for Women's Policy Research analysis of CES data.



# Earnings in the Communications & Media Sector

## “Old” vs. “New” Telecom

Despite shifts in the relative importance of its industries, the Communications and Media Sector as a whole remains well-paying (Table 2). Nonsupervisory workers in this sector earn 24.5 percent (\$112) more per week than employees in the rest of the workforce (\$569 versus \$457, respectively).

Better job quality prevails in “old Telecom”—Wired Telecom is the highest paid of all the seven target industries, with median weekly earnings of \$729. Employees in “new Telecom” earn significantly less—\$619 a week in Wireless and other Telecom, over a hundred dollars less than those in Wired Telecom. Radio/TV/Cable Broadcasting workers earn only \$581 per week. Two newly emerging and growing industries, Internet Service Providers and Other Information Services, also come up short, with earnings of \$538 and \$609, respectively.

Weekly earnings are only slightly higher for those working full-time in Telecom, Internet Service Providers, and Other Information Services, because most workers in those industries *are* full-time. In Newspaper Publishing and Motion Pictures and Video, however, there is a substantial difference between earnings of all workers and those of full-time workers—these sub-industries rely heavily on part-time workers.

## Women and Minorities<sup>12</sup>

**Employment.** Women make up more than half of nonsupervisory workers in Wireless Telecom (54.3 percent) (Figure 3 and Table 3). (Women are 46.0 percent of the entire U.S. workforce.) They are an even larger share of Other Information Services (67.4 percent), but that industry employs a tiny portion of the entire Communications and Media Sector workforce (fewer than 10,000 workers), so it is not as important an employer for women. In the other five target industries, women are represented at about their level in the rest of the workforce, with their relative employment lowest in Motion Pictures and Video (40.2 percent of all workers) and Radio/TV/Cable (41.2 percent).

### DATA USED IN THIS REPORT

This section analyzes data from the 2003 to 2005 Current Population Survey Outgoing Rotation Group Files, which are referred to as 2004 data. The number of workers employed in various Communications and Media Sector industries shown here differ somewhat from those in Table 1, which uses a different dataset (the Current Employment Statistics survey) and groups companies into industries differently. Except where noted, all analyses in this section are for nonsupervisory line workers only. See Appendix 1 for an explanation of occupational groupings. All earnings are in December 2005 dollars.

<sup>12</sup> Minority is defined as all workers except Non-Hispanic Whites. Sample sizes do not allow a more detailed racial or ethnic comparison.

Because the Wired Telecom workforce is so large (nearly 420,000 workers), it employs by far the most women of all the Communications and Media Sector industries.

**TABLE 2.**  
**Median Weekly Earnings,<sup>a</sup> by Industry, All Workers and Full-Time Workers, 2004**

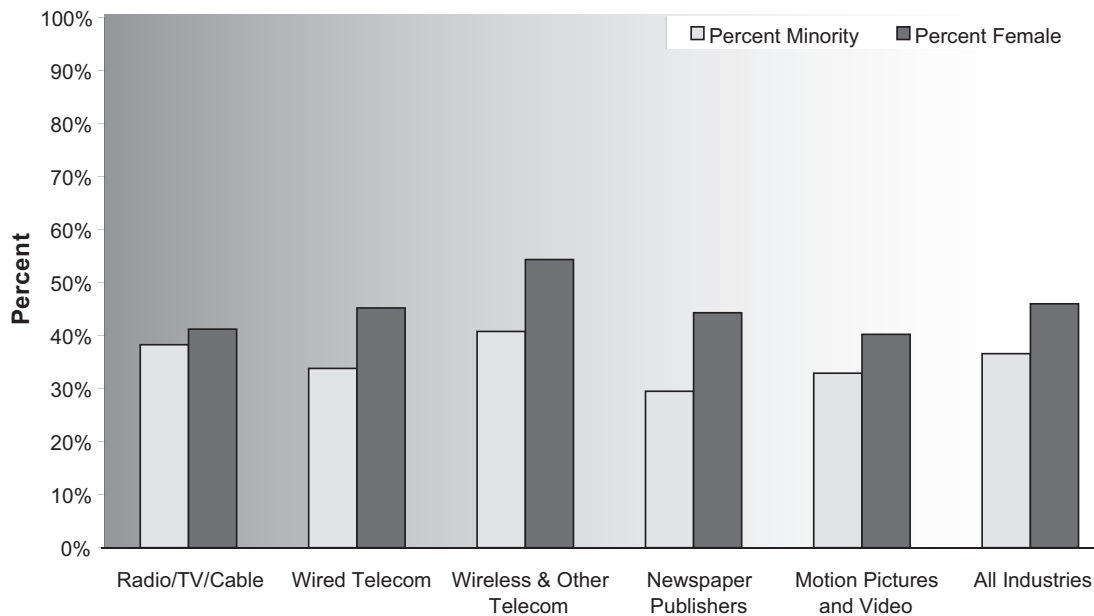
Industry	Median Weekly Earnings <sup>a</sup>	
	All Workers	Full-time Only
Radio/TV/Cable	\$581	\$598
Wired Telecom	\$729	\$750
Wireless and Other Telecom	\$619	\$638
Newspaper Publishers	\$402	\$505
Motion Pictures and Video	\$333	\$542
Internet Service Providers	\$538	\$541
Other Information Services	\$609	\$618
All Communications and Media Sector Industries	\$569	\$631
All Industries <sup>b</sup>	\$457	\$520

<sup>a</sup>In December 2005 dollars.

<sup>b</sup>Excludes Communications and Media Sector.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG files, nonsupervisory workers only.

**FIGURE 3.**  
**Percent Female and Percent Minority by Industry, 2004**



Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG Files, nonsupervisory workers only.

**TABLE 3.**  
**Number of Employees, Percent Female, and Percent Minority, by Industry, 2004 - Non-Supervisory Line Workers**

Industry	Number of Employees <sup>a</sup>	Percent Female	Percent Minority <sup>b</sup>
Radio/TV/Cable	167,532	41.2	38.3
Wired Telecom	419,411	45.2	33.8
Wireless and Other Telecom	138,171	54.3	40.8
Newspaper Publishers	196,964	44.3	29.5
Motion Pictures and Video	109,109	40.2	32.9
Internet Service Providers	15,123	44.4	28.8
Other Information Services	9,645	67.4	37.2
All Communications and Media Sector Industries	1,244,735	48.8	33.2
All Industries <sup>c</sup>	65,130,468	46.0	36.6

<sup>a</sup>These numbers differ from those in Table 1, which uses a different data source (the CES employer payroll survey) and includes supervisory workers.

<sup>b</sup>Minority is defined as all workers except Non-Hispanic Whites.

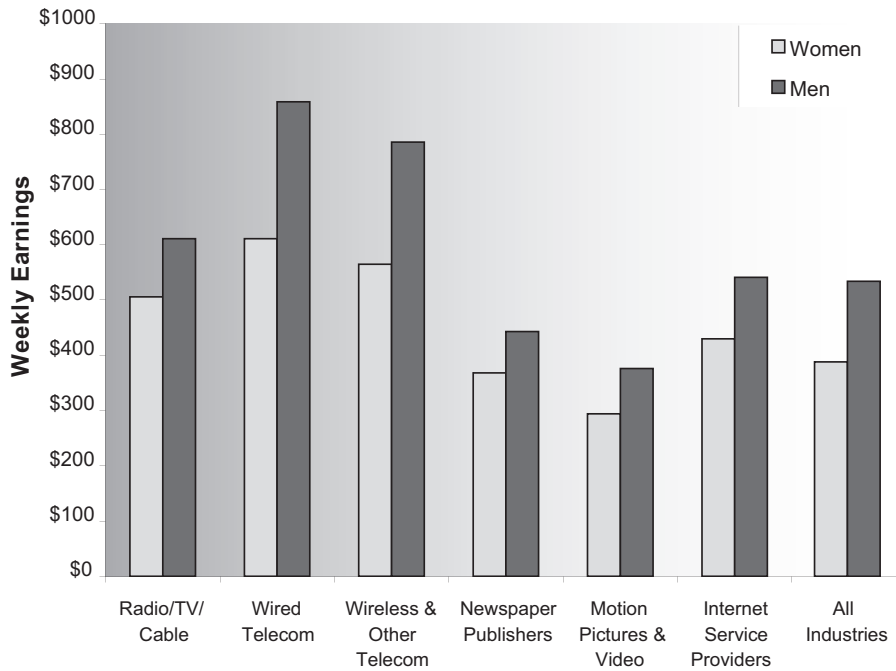
<sup>c</sup>Excludes Communications and Media Sector.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG Files, nonsupervisory workers only.

Of the seven target industries, “new” Telecom is the most racially and ethnically diverse. Minorities are two of every five workers in Wireless Telecom (40.8 percent; Figure 3 and Table 3); that is more than four percentage points higher than minority representation in the rest of the workforce (36.6 percent). Other Information Services also employs minority workers slightly more than other industries (37.2 percent). Wired Telecom has a somewhat lower proportion of minorities (33.8 percent). Newspaper Publishers and Internet Service Providers lag behind other Communications and Media Sector employers in hiring minorities (29.5 and 28.8 percent, respectively).

**Wages.** Men earn more than women in all the industries studied, and non-Hispanic whites earn more than minorities for both women and men in all industries studied (Figure 4). Women’s earnings are the highest in the industry with the highest proportion of women workers: Other Information Services, at \$618 per week (Table 4). More importantly, their pay is high in Wired Telecom, the biggest Communications and Media Sector employer: \$611 a week. This is over half again as much as the average for women in all other industries (\$388). Women’s pay in Wireless Telecom is 8 percent less than in Wired Telecom (\$565), and Radio/TV/Cable trails Wired Telecom by more than 20 percent (\$506).

**FIGURE 4.**  
**Median Weekly Earnings for All Employees, by Sex and Industry, 2004**



Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG Files, nonsupervisory workers only.

**TABLE 4.**  
**Median Weekly Earnings,<sup>a</sup> by Industry, Sex, and Work Hours, 2004**

Industry	Median Weekly Earnings <sup>a</sup> (All Employees)		Median Weekly Earnings <sup>a</sup> (Full-time Only)	
	Women	Men	Women	Men
Radio/TV/Cable	\$506	\$611	\$559	\$623
Wired Telecom	\$611	\$859	\$623	\$872
Wireless and Other Telecom	\$565	\$786	\$573	\$799
Newspaper Publishers	\$368	\$443	\$464	\$566
Motion Pictures and Video	\$294	\$376	\$502	\$600
Internet Service Providers	\$430	\$541	\$540	\$544
Other Information Services	\$618	n/a	\$681	n/a
All Communications and Media Sector Industries	\$494	\$651	\$565	\$721
All Industries <sup>b</sup>	\$388	\$534	\$462	\$585

<sup>a</sup> In December 2005 dollars.

<sup>b</sup> Excludes Communications and Media Sector.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG Files, nonsupervisory workers only.

Minorities employed in Communications and Media also fare well, relative to averages across the rest of the workforce, earning over a hundred dollars more per week (for full-time workers; Table 5).<sup>13</sup> (Their wages are lower than those of Non-Hispanic whites, however, and in some sub-industries by a very significant amount; see discussion under “pay equity” below.) “Old Telecom” offers the highest wages to male minority workers at \$725 weekly—and high wages to minority women at \$542 weekly. Women minority workers earn slightly more in Wireless Telecom (\$566), but earnings of minority men are lower there than in Wired Telecom (\$659).

**TABLE 5.**  
**Median Weekly Earnings<sup>a</sup> for Full-time Employees, by Industry, Race and Sex, 2004**

Industry	Non-Hispanic White			Minority		
	Women	Men	All	Women	Men	All
Radio/TV/Cable	\$592	\$642	\$616	\$498	\$578	\$557
Wired Telecom	\$711	\$926	\$817	\$542	\$725	\$624
Wireless and Other Telecom	\$593	\$864	\$733	\$566	\$659	\$582
Newspaper Publishers	\$476	\$641	\$520	\$446	\$479	\$450
Motion Pictures and Video	\$515	\$622	\$577	\$427	\$525	\$483
All Communications and Media Sector Industries	\$598	\$769	\$679	\$526	\$630	\$566
All Industries <sup>b</sup>	\$489	\$651	\$577	\$416	\$481	\$451

<sup>a</sup> Earnings are in December 2005 dollars.

<sup>b</sup> Excludes Communications and Media Sector.

Source: Institute for Women’s Policy Research analysis of 2003-2005 CPS ORG Files, nonsupervisory workers only.

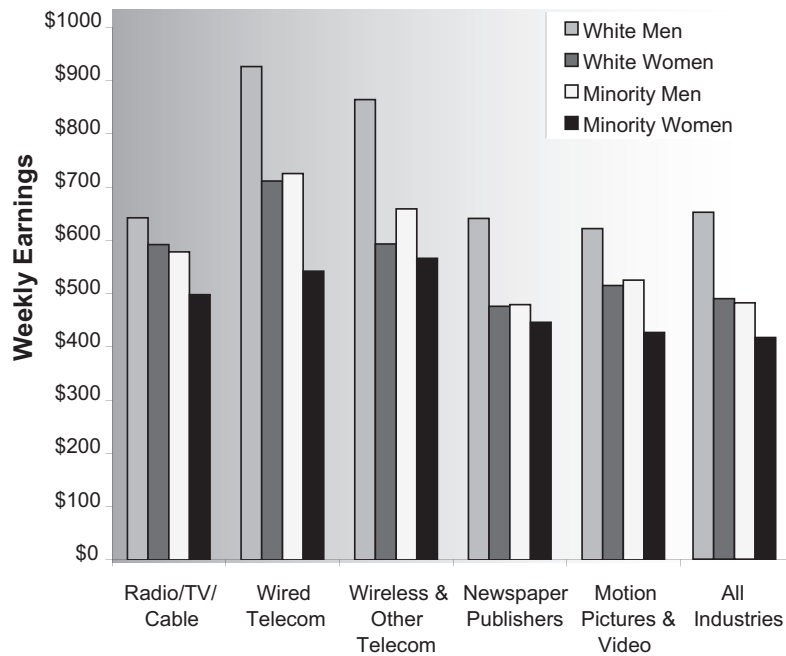
**Pay equity.** Although the Communications and Media Sector offers higher earnings to women and to minority workers than the rest of the U.S. economy, wage disparities by gender and by race and ethnicity are very significant (Table 5 and Figure 5). They are particularly striking in Wired Telecom. While this industry pays the highest wages of all Communications and Media Sector industries to minority men and to non-Hispanic white men and women, white men’s earnings are more than 27 percent higher than minority men’s (\$926 and \$725, respectively), and white women’s more than 31 percent higher than minority women’s (\$711 vs. \$542). In addition, white men earn 30 percent more than white women, and minority men earn 34 percent more than minority women.

Minority women and white women have very similar earnings both in the relatively low-wage Newspaper Publishing industry (\$446 and \$476, respectively) and in Wireless Telecom (\$566 vs. \$593), where earnings are relatively high. Minority men’s earnings do not approach white men’s in any Communications and Media Sector industry. They typically are about the same as, or slightly more than, white women’s earnings in the same industry.

<sup>13</sup> Sample sizes are not large enough to allow analysis of earnings by both sex and race for Internet Service Providers and Other Information Services.

Women employed full-time by Internet Service Providers fare very well in terms of earnings as compared with men, bringing in 99 percent as much as men (Table 6). However, this industry employs a small number of workers and pays about the average wage for this sector. Women also do well compared with men in Radio/TV/Cable, earning 90 percent as much as men. Women’s relative pay is also fairly high in Newspaper Publishers and Motion Pictures and Video (82 and 84 percent, respectively), both of which are lower-wage industries.

**FIGURE 5.**  
**Median Weekly Earnings for Full-time Employees, by Sex, Race, and Industry, 2004**



Source: Institute for Women’s Policy Research analysis of 2003-2005 CPS ORG Files, nonsupervisory workers only.

The wage differential between men and women full-time employees is highest in Wired and Wireless Telecommunications, with women earning only 71 and 72 percent, respectively, of what men earn. Of all the targeted industries, the gender pay ratio is lowest in these two relatively high-paying industries.

The minority/white wage ratio varies among Communications and Media Sector industries in a very similar pattern as that for the gender wage ratio. Minority workers’ earnings are closest to whites’ in Radio/TV/Cable, at 90 percent, and lowest in Wired and Wireless Telecom (76 and 79 percent, respectively), two industries with higher wage levels for both whites and minorities.

Contrary to some expectations, being a larger share of the workforce does not appear to depress earnings for either women or minorities. The gender and race/ethnicity wage gaps seem to be more related to individual industry structures (probably including occupational make-up) than a specific reaction to the presence of women and minorities in the industry.

**TABLE 6.**  
**Percent Female, Female-Male Pay Ratio, Percent Minority, and Minority-White Pay Ratio, by Industry, 2004**

Industry	Percent Female	Female-Male Pay Ratio (Full-time Only)	Percent Minority	Minority-White Pay Ratio (Full-time Only)
Radio/TV/Cable	41.2	0.90	38.3	0.90
Wired Telecom	45.2	0.71	33.8	0.76
Wireless and Other Telecom	54.3	0.72	40.8	0.79
Newspaper Publishers	44.3	0.82	29.5	0.87
Motion Pictures and Video	40.2	0.84	32.9	0.84
Internet Service Providers	44.4	0.99	28.8	n/a
Other Information Services	67.4	n/a	37.2	n/a
All Communications and Media Sector Industries	48.8	0.78	33.2	0.83
All Industries <sup>a</sup>	46.0	0.79	36.6	0.78

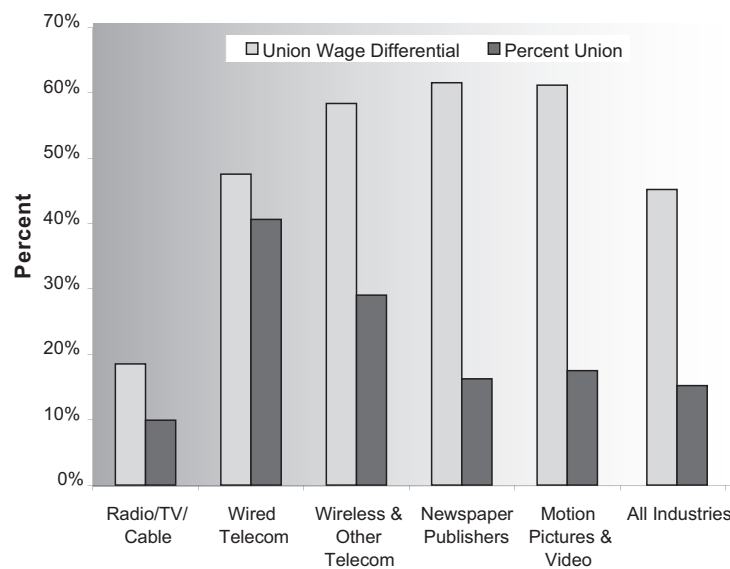
<sup>a</sup> Excludes Communications and Media Sector.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG Files, nonsupervisory workers only.

### Higher Wages through Unionization

The Communications and Media Sector is significantly more unionized than the workforce as a whole (Table 7 and Figure 6). One-quarter of employees in this sector are unionized (24.0 percent), as opposed to 15.2 percent of workers in all other industries. (Only 8.5 percent of all private-sector workers are represented by unions; U.S. Department of Labor 2006.)

**FIGURE 6.**  
**Union Wage Differential and Percent Union by Industry, 2004**



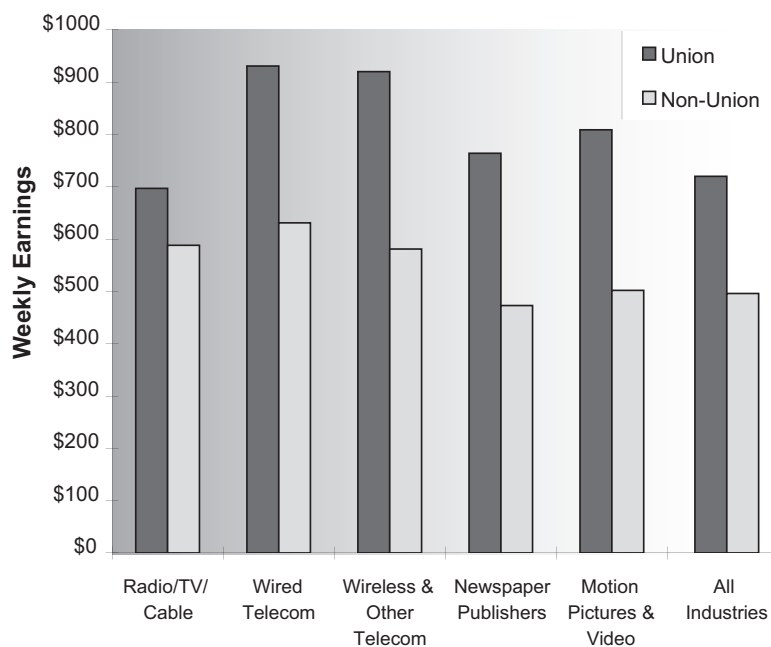
Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG Files, nonsupervisory workers only.

The “old” Wired Telecom industry stands out among the rest of the Communications and Media Sector industries in remaining very highly unionized. Two of five Wired Telecom workers are in a union (41 percent). Wages in Wired Telecom are the highest of the targeted industries

Unionization cannot be evaluated for Internet Service Providers or Other Information Services because of sample size limitations.

(\$729; Table 2), and union members in Wired Telecom earn even more: \$931 a week—one and a half times as much as non-union Wired Telecom workers (Figure 7)—an additional \$15,600 of income a year.

**FIGURE 7.**  
**Median Weekly Earnings for Full-time Employees, by Union Status and Industry, 2004**



Source: Institute for Women’s Policy Research analysis of 2003-2005 CPS ORG Files, nonsupervisory workers only.

Unions are less present in Wireless Telecom (29.1 percent of workers are in unions),<sup>14</sup> but they offer an even higher earnings boost. Wireless Telecom workers in unions take home nearly 60 percent more than non-union workers, or an additional \$17,630 per year.

Unions increase wages even more in Newspaper Publishing and Motion Pictures and Video—about 61 percent in each—but only 16.2 and 17.5 percent of workers in these two industries, respectively, enjoy this union benefit. Radio/TV/Cable has even lower unionization than the non-Communications and Media Sector workforce, at 9.9 percent, but even this level provides a 18.5 percent earnings premium.

<sup>14</sup> Cingular is the only unionized wireless phone company.

**TABLE 7.**  
**Percent Union, Median Weekly Earnings<sup>a</sup> by Union Status, and Union Differential, by Industry, 2004**

Industry	Percent Union	Median Weekly Earnings <sup>a</sup> (Full-time Only)		Union Earnings Differential (Percent)
		Union	Non-Union	
Radio/TV/Cable	9.9	\$697	\$588	18.5
Wired Telecom	40.6	\$931	\$631	47.5
Wireless and Other Telecom	29.1	\$920	\$581	58.3
Newspaper Publishers	16.2	\$764	\$473	61.5
Motion Pictures and Video	17.5	\$809	\$502	61.2
All Communications and Media Sector Industries	24.0	\$872	\$578	50.9
All Industries <sup>b</sup>	15.2	\$720	\$496	45.2

<sup>a</sup> In December 2005 dollars.

<sup>b</sup> Excludes Communications and Media Sector.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG Files, nonsupervisory workers only.

The lower union differential in Wired Telecommunications (47.5 percent) compared to that in Wireless (58.3 percent) is likely a result of the historically strong union presence in the industry. Over time, the presence of unions has increased wages for both union and non-union members, thus narrowing the earnings differential between the two.

Generally, over the entire workforce, union members earn 27.8 percent more than non-union members (U.S. Department of Labor 2006). The Communications and Media Sector stands out as bringing especially high union earnings premiums to workers.

### Use of Part-Time Workers

There is enormous variation in the extent to which employment is structured as full-time or part-time among the industries in the Communications and Media Sector (Table 8). Approximately one in three workers in Newspaper Publishers (34 percent), and more than two of five Motion Pictures and Video (43 percent) employees, work fewer than 35 hours per week. Only 17 percent of the total workforce in the Communications and Media Sector (fewer than one in five workers) is part-time. Not surprisingly, Newspaper Publishers and Motion Pictures and Video are also the two lowest-paying of the target industries, with median weekly earnings for all employees of \$402 and \$333, respectively. In Newspaper Publishers, the use of part-time scheduling may have a negative effect on full-time employees' earnings as well. Full-time employees' median weekly earnings in this industry are only \$505.

Part-time work cannot be evaluated for Internet Service Providers or Other Information Services because of sample size limitations.

**TABLE 8.**  
**Percent Part-time and Median Weekly Earnings<sup>a</sup> by Work Hours, by Industry, 2004**

Industry	Percent Part-Time	Median Weekly Earnings <sup>a</sup>	
		All	Full-time Only
Radio/TV/Cable	7.2	\$581	\$598
Wired Telecom	4.0	\$729	\$750
Wireless and Other Telecom	6.5	\$619	\$638
Newspaper Publishers	33.9	\$402	\$505
Motion Pictures and Video	42.8	\$333	\$542
All Communications and Media Sector Industries	17.1	\$569	\$631
All Industries <sup>c</sup>	20.3	\$457	\$520

<sup>a</sup> In December 2005 dollars.

<sup>b</sup> Part-time work is fewer than 35 hours a week.

<sup>c</sup> Excludes Communications and Media Sector.

Source: Institute for Women's Policy Research Analysis of 2003-2005 CPS ORG Files, nonsupervisory workers only.

Telecom, on the other hand, employs a very low share of part-time employees. Only 4.0 percent of the Wired Telecom workforce works part-time. Wireless Telecom is the second lowest of the seven target industries in use of part-time workers, with only 6.5 percent of its workforce putting in fewer than 35 hours a week.

### The Effect of Occupation

Some Communications and Media industries offer better wages or are more integrated by sex and race/ethnicity because of the jobs offered in that particular industry. For instance, Newspaper Publishers have more people in sales than Radio/TV/Cable does (Figure 8). To explore this effect, in this section occupations are grouped into four large clusters: Managers and Other Professionals (including first-line supervisors); Blue-Collar and Service Occupa-

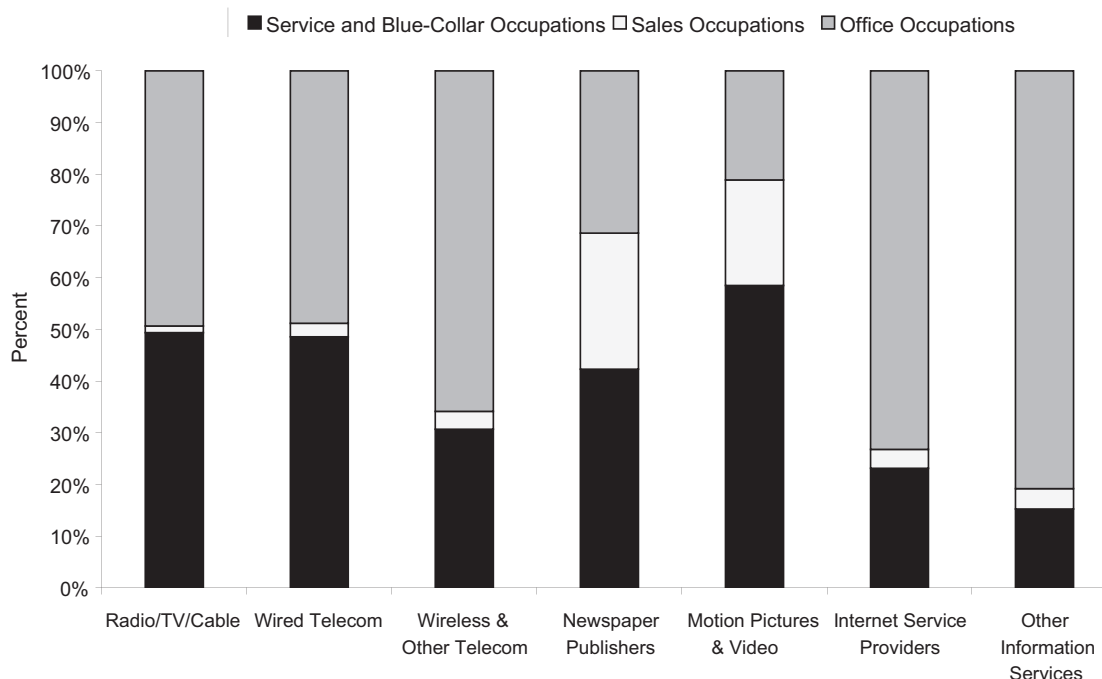
This section presents some specific data on Managers and Other Professionals. These jobs are excluded from the analysis up to this point, which focuses on non-supervisory line staff. This occupational cluster is included here to highlight the quality of employment opportunities in several jobs that are key to the Communications and Media Sector.

Specific occupations cannot be evaluated for Internet Service Providers or Other Information Services because of sample size limitations.

tions; Sales Occupations; and Office Occupations.<sup>15</sup> The study also examines six occupations that are of particular interest in the context of structural change in the Communications and Media sector: Journalists; Broadcast Technicians and Television Camera Operators; Computer and Engineering Professionals; Radio and Telecom Equipment and Line Installers and Repairers; Customer Service Representatives; and Telephone Operators. (Each of these is also included in one of the four occupational clusters when the analysis is conducted at that level.)

<sup>15</sup>This study employs a classification scheme developed by Dr. Stephen Rose that is based on the amount of education and job training required for each job (Rose 2006). For more information about the system, see Rose and Hartmann (2004).

**FIGURE 8.**  
**General Job-Types by Industry, 2004**



Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG Files, nonsupervisory workers only.

**Managers and Other Professionals.** Wired Telecom employs by far the most Managers and Other Professionals—over half a million (502,368; Table 9). Women are best represented in this occupational cluster in Newspaper Publishers (50.3 percent of that workforce is female), but are underrepresented in the other four industries. Minority employment is also quite low in this occupational group, with Newspaper Publishers doing an especially poor job of integrating managerial positions by race/ethnicity (only 15.7 percent of these jobs are filled by minorities). Earnings in Wired Telecom are the highest of the five target industries, but Radio/TV/Cable, Wireless Telecom, and Motion Pictures and Video also have high earnings for managers and professionals who work full-time.

**TABLE 9.**  
**Managers and Other Professionals: Number Employed; Percent Female, Minority, and Part-time; and Earnings, by Industry, 2004**

	Radio/TV/ Cable	Wired Telecom	Wireless and Other Telecom	Newspaper Publishers	Motion Pictures and Video
Number Employed	341,001	502,368	177,152	226,493	148,210
Percent Female	34.6	34.1	37.9	50.3	35.1
Percent Minority	22.6	27.8	27.0	15.7	20.8
Percent Part-time	7.1	2.9	3.9	9.8	13.4
Median Weekly Earnings <sup>a</sup>					
Full-time Only	\$924	\$1,190	\$1,064	\$777	\$948

Note: Includes first-line supervisors.

<sup>a</sup> In December 2005 dollars.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG files.

Some individual occupations within the Manager and Other Professionals cluster are strongly sex- or race-typed. For instance, women have established a successful niche as *journalists* in the Newspaper Publishing industry (Table 10): Nearly half of all workers in this occupation/industry intersection are women (48.2 percent), and earnings are fairly high: \$774 per week for full-time workers. Unions make a big difference here, adding 56.5 percent above non-union-members' wages, although only about one in every six workers (15.7 percent) is a union member. Minority workers are largely shut out of these jobs, however; only 14.5 percent are held by workers of color. Fewer journalists in Radio/TV/Cable are women (33 percent), more are workers of color (22 percent), and earnings are slightly higher.

**TABLE 10.**

**Journalists: Number Employed; Percent Female, Minority, Union, and Part-time; and Earnings; by Industry,<sup>a</sup> 2004** (Journalists are a subgroup of occupations in Table 9.)

	Radio/TV/Cable	Newspaper Publishers
Number Employed	48,541	48,889
Percent Female	32.5	48.2
Percent Minority	21.5	14.5
Percent Union	8.5	15.7
Percent Part-time	12.9	15.4
Median Weekly Earnings <sup>b</sup>		
All Employees <sup>c</sup>	\$803	\$718
Full-time Only	\$826	\$774
Union Members	n/a	\$1,103
Non-Union	\$816	\$705
Union Premium	n/a	56.5%

<sup>a</sup> Sample sizes are not adequate to analyze journalists in Motion Pictures and Video, Wired Telecom, or Wireless and Other Telecom.

<sup>b</sup> In December 2005 dollars.

<sup>c</sup> Median weekly earnings are given for all employees, in addition to full-time employees, because these industries rely heavily on the use of part-time scheduling for journalists.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG files.

In contrast, work as a *broadcast technician or TV camera operator* in Radio/TV/Cable and Motion Pictures and Video is restricted almost exclusively to men (only about 10 percent are women; Table 11). Relatively few minority workers are employed in this job (26.0 percent of workers in Radio/TV/Cable, and only 16.9 percent in Motion Pictures and Video are minorities). Unionization is high compared to the overall workforce (28.5 percent and 22.0 percent, respectively) and boosts earnings by over half (58.7 percent) in Radio/TV/Cable.

*Computer and engineering professionals* have high earnings, averaging around \$1,000 a week (Table 12). Women are poorly integrated into this occupation, constituting less than a third of workers in each industry, and only one in eight workers in Radio/TV/Cable. Workers of color are also underrepresented, making up about a quarter of all workers in this job. (Earnings cannot be calculated separately for union and non-union members in any industry because the sample size is not adequate for that analysis.)

**TABLE 11.**

**Broadcast Technicians and Television Camera Operators: Number Employed; Percent Female, Minority, Union, and Part-time; and Earnings; by Industry,<sup>a</sup> 2004**  
(Technicians and Operators are a subgroup of occupations in Table 9.)

	Radio/TV/Cable	Motion Pictures and Video
Number Employed	34,687	16,409
Percent Female	9.1	10.8
Percent Minority	26.0	16.9
Percent Union	28.5	22.0
Percent Part-time	16.3	17.7
<b>Median Weekly Earnings<sup>b</sup></b>		
All Employees <sup>c</sup>	\$768	\$794
Full-time Only	\$810	\$840
Union Members	\$1,141	n/a
Non-Union	\$719	\$826
Union Premium	58.7%	n/a

<sup>a</sup> Sample sizes are not adequate to analyze Broadcast Technicians and Television Camera Operators in Newspaper Publishers, Wired Telecom, or Wireless and Other Telecom.

<sup>b</sup> In December 2005 dollars.

<sup>c</sup> Median weekly earnings are given for all employees, in addition to full-time employees, because these industries rely heavily on the use of part-time scheduling for these jobs.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG files.

**TABLE 12.**

**Computer and Engineering Professionals: Number Employed; Percent Female, Minority, Union, and Part-time; and Earnings; by Industry,<sup>a</sup> 2004**  
(These professionals are a subgroup of occupations in Table 9.)

	Radio/TV/Cable	Wired Telecom	Wireless and Other Telecom	Newspaper Publishers
Number Employed	33,442	176,788	44,813	8,363
Percent Female	12.2	19.8	21.1	29.7
Percent Minority	24.0	29.8	27.4	23.9
Percent Union	12.7	13.9	12.8	8.9
Percent Part-time	3.0	2.4	2.3	4.0
<b>Median Weekly Earnings<sup>b</sup></b>				
Full-time Only	\$962	\$1,182	\$1,207	\$1,056

<sup>a</sup> Sample sizes are not adequate to analyze Motion Pictures and Video.

<sup>b</sup> In December 2005 dollars.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG files.

**Blue-Collar and Service Occupations.** The Blue-Collar and Service Occupations cluster is much less female than Managers and Other Professionals and Office Occupations, for every industry (Table 13).<sup>16</sup> Just slightly more than a quarter of workers in Blue-Collar and Service Occupations in Newspaper Publishers and Motion Pictures and Video are women, and the percent of the workforce in these occupations that is female is even smaller in Radio/TV/Cable (10.3 percent), Wired Telecom (14.5 percent), and Wireless Telecom (17.1 percent). In general, these industries have relatively high employment of workers of color—between one-quarter and two-fifths. The lowest worker-of-color representation is in Wired Telecom (27.5 percent), and the highest is in Radio/TV/Cable (40.7 percent).

**TABLE 13.****Blue-Collar and Service Occupations: Number Employed; Percent Female, Minority, Union, and Part-time; and Earnings; by Industry, 2004**

	Radio/TV/ Cable	Wired Telecom	Wireless and Other Telecom	Newspaper Publishers	Motion Pictures and Video
Number Employed	82,663	203,622	42,371	83,252	63,809
Percent Female	10.3	14.5	17.1	26.1	29.3
Percent Minority	40.7	27.5	36.3	32.8	33.8
Percent Union	14.0	52.2	50.3	25.3	22.5
Percent Part-time	2.6	1.7	3.3	25.8	45.0
Median Weekly Earnings <sup>a</sup>					
Full-time Only	\$666	\$926	\$948	\$603	\$520
Union Members	\$802	\$1,039	\$1,124	\$777	\$827
Non-Union	\$642	\$748	\$736	\$514	\$411
Union Premium	24.9%	38.9%	52.7%	51.2%	101.2%

<sup>a</sup> In December 2005 dollars.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG files, nonsupervisory workers only.

These jobs are very highly unionized in Wired and Wireless Telecom (52.2 and 50.3 percent, respectively), and their pay reflects this: Union members in this occupational cluster make about the same as Managers and Other Professionals. Unions boost wages by 38.9 percent and 52.7 percent, respectively, in Wired and Wireless telecom. Newspaper Publishing and Motion Pictures and Video rely heavily on a part-time workforce in these occupations: More than one-quarter of the former and nearly half the latter works fewer than 35 hours a week.

Earnings in Newspaper Publishing, Motion Pictures and Video, and Radio/TV/Cable are much lower than in telecom, averaging \$603, \$520, and \$666, respectively, for full-time workers. Unionization is higher in these industries than in the general workforce, with about a quarter of Newspaper Publishing and Motion picture and video workers represented by unions, and 14.0 percent of Radio/TV/Cable workers in unions.

Women are largely absent from *radio and telecom equipment and line installation and repair*, and especially so in Radio/TV/Cable, where only 5.3 percent of this occupation is female (Table 14). Minority representation is slightly below the average for all Communications and Media Sector industries. It is highest in the lowest-paid of the three industries employing significant numbers of these workers: Radio/TV/Cable; but earnings in this occupation/industry group are only about 70 percent of earnings in Wired and Wireless Telecom (for full-time workers). Unionization is extremely high in this occupation in telecom—over 55 percent—but less so in Radio/TV/Cable (15.4 percent). Unions add substantially to wages in both Wired (31.7 percent) and Wireless Telecom (46.9 percent).

<sup>16</sup>The sample is not large enough to calculate the percent female in Radio/TV/Cable and Wireless Telecom for Sales Occupations.

<sup>17</sup> Small sample sizes prevent the detailed analysis of sales occupations in Radio/TV/Cable and in Wireless Telecom. Union and non-union workers cannot be evaluated separately in these jobs for any industry.

**TABLE 14.****Radio and Telecom Equipment and Line Installers and Repairers: Number Employed; Percent Female, Minority, Union, and Part-time; and Earnings; by Industry,<sup>a</sup> 2004**

(Installers and Repairers are a subgroup of occupations in Table 13.)

	Radio/TV/Cable	Wired Telecom	Wireless and Other Telecom
Number Employed	49,957	172,513	32,695
Percent Female	5.3	11.9	12.1
Percent Minority	37.1	27.2	30.8
Percent Union	15.4	55.7	58.9
Percent Part-time	2.1	0.6	0.15
<b>Median Weekly Earnings<sup>b</sup></b>			
Full-time Only	\$673	\$957	\$1,035
Union Members	n/a	\$1,039	\$1,134
Non-Union	\$642	\$789	\$772
Union Premium	n/a	31.7%	46.9%

<sup>a</sup> Sample sizes are not adequate to analyze Radio and Telecom Equipment and Line Installers and Repairers in Newspaper Publishers or Motion Pictures and Video.

<sup>b</sup> In December 2005 dollars.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG files, nonsupervisory workers only.

**Sales Occupations.** Sales jobs are heavily female in these industries.<sup>17</sup> Over half the workforce in Motion Picture and Video and Wired Telecom is female, and two of every five Newspaper Publishing workers are women (Table 15). Wired Telecom employs workers of color at roughly their representation in the overall workforce (38.1 percent); minorities are underrepresented in Newspaper Publishing and Motion Pictures and Video (at 23.6 and 28.0 percent, respectively).

Even more than in Blue-Collar and Service Occupations, both Newspapers and Motion Pictures and Video structure their jobs around part-time work. Over half of sales workers in the former, and two-thirds in the latter, are on part-time schedules. Earnings are very low, even for full-time workers, at \$520 weekly for Wired Telecom and \$391 for Newspaper Publishers.

**TABLE 15.****Sales Occupations: Number Employed; Percent Female, Minority, Union, and Part-time; and Earnings; by Industry,<sup>a</sup> 2004**

	Wired Telecom	Newspaper Publishers	Motion Pictures and Video
Number Employed	11,020	51,875	22,269
Percent Female	58.6	39.9	54.2
Percent Minority	38.1	23.6	28.0
Percent Union	7.9	5.0	5.7
Percent Part-time	14.8	56.5	68.9
<b>Median Weekly Earnings<sup>b</sup></b>			
Full-time Only	\$520	\$391	n/a

<sup>a</sup> Sample sizes are not adequate to analyze Sales workers in Radio/TV/Cable or Wireless telecom.

<sup>b</sup> In December 2005 dollars.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG files, nonsupervisory workers only.

**Office Occupations.** True to stereotype, office jobs are female-dominated across all the industries (Table 16). Over half of all office workers in Motion Pictures and Video, and about three-fourths of those in the other four industries, are women. Earnings are lower here than in the other three occupational clusters. Unionization is low in these jobs in Newspaper Publishing, Motion Pictures and Video, and Radio/TV/Cable (in fact, less than 6 percent in the latter), but substantial in Wireless Telecom (20.3 percent) and quite sizeable in Wired Telecom (30.9 percent). Unionization offers significant wage advantages in these occupations, bringing weekly earnings to \$793 in Wired Telecom and \$775 in Wireless.

Workers of color are generally employed proportionally to their representation in the workforce in these occupations in this sector. In Wired and Wireless Telecom—two of the more highly unionized, and highest-paying, industries—workers of color are especially well-represented in office occupations, comprising 40.0 percent and 43.1 percent, respectively, of all workers..

**TABLE 16.**

**Office Occupations: Number Employed; Percent Female, Minority, Union, and Part-time; and Earnings; by Industry, 2004**

	Radio/TV/ Cable	Wired Telecom	Wireless and Other Telecom	Newspaper Publishers	Motion Pictures and Video
Number Employed	82,661	204,769	91,048	61,838	23,032
Percent Female	71.4	75.1	72.1	72.5	57.2
Percent Minority	36.4	40.0	43.1	29.8	34.9
Percent Union	5.7	30.9	20.3	13.5	15.0
Percent Part-time	11.5	5.6	6.3	25.9	11.4
<b>Median Weekly Earnings<sup>a</sup></b>					
Full-time Only	\$550	\$630	\$575	\$496	\$616
Union Members	n/a	\$793	\$775	\$591	n/a
Non-Union	\$546	\$579	\$558	\$483	\$616
Union Premium	n/a	37.0%	38.9%	22.4%	n/a

<sup>a</sup> In December 2005 dollars.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG files, nonsupervisory workers only.

Two traditionally female occupations—*customer service representatives* and *telephone operators*—also disproportionately employ workers of color: between 40 and 47 percent of workers in these jobs are minorities (Tables 17 and 18). Earnings for full-time customer service representatives range from \$500 in Radio/TV/Cable and \$558 in Wireless Telecom to \$607 in Wired Telecom. Operators make less: only \$474 in Wired Telecom, the only industry with this occupation.

**TABLE 17.**  
**Customer Service Representatives: Number Employed; Percent Female, Minority, Union, and Part-time; and Earnings; by Industry,<sup>a</sup> 2004**

(These jobs are a subgroup of occupations in Table 16.)

	Radio/TV/Cable	Wired Telecom	Wireless and Other Telecom
Number Employed	31,962	105,910	59,229
Percent Female	71.8	72.5	71.0
Percent Minority	44.6	46.6	46.2
Percent Union	5.5	29.9	19.6
Percent Part-time	3.6	4.5	6.7
<b>Median Weekly Earnings<sup>b</sup></b>			
Full-time Only	\$500	\$607	\$558
Union Members	n/a	\$872	\$750
Non-Union	\$304	\$498	\$557
Union Premium	n/a	75.1%	34.6%

<sup>a</sup> Sample sizes are not adequate to analyze Motion Pictures and Video or Newspaper Publishers.

<sup>b</sup> In December 2005 dollars.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG files, nonsupervisory workers only.

Of all the individual occupations examined in this study, unions make the biggest difference here, in Wired Telecom, turning customer service into a high-quality job by boosting earnings a phenomenal 75 percent (to \$872). In Wireless Telecom, union membership increases earnings 35 percent (to \$750). A greater share of the workforce benefits from this union premium in Wired (where 29.9 percent are union members) than in Wireless (19.6 percent unionized).

Unionization is also very high among operators (36.3 percent), and the union earnings premium is very large (64.8 percent), bringing earnings to \$633 for union members working full-time.

**TABLE 18.**  
**Telephone Operators: Number Employed; Percent Female, Minority, Union, and Part-time; and Earnings; by Industry,<sup>a</sup> 2004**

(Operators are a subgroup of occupations in Table 16.)

	Wired Telecom
Number Employed	15,839
Percent Female	79.0
Percent Minority	40.4
Percent Union	36.3
Percent Part-time	7.1
<b>Median Weekly Earnings<sup>b</sup></b>	
Full-time Only	\$474
Union Members	\$633
Non-Union	\$384
Union Premium	64.8%

<sup>a</sup> Sample sizes are not adequate to analyze any industry except Wired carriers.

<sup>b</sup> In December 2005 dollars.

Source: Institute for Women's Policy Research analysis of 2003-2005 CPS ORG files, nonsupervisory workers only.



# Trends in Employment of Women & Minorities

EEO-1 data for 1990 through 2002 show different trends for workers of color than for women in the Communications and Media Sector. Minority representation has increased in the sector overall (from 27.6 percent to 34.7 percent), although that growth was concentrated in certain industries. Workers of color are now employed in the sector in the same proportion as they are in the workforce as a whole. Women's share of all jobs declined 2.4 percentage points in the Communications and Media Sector, however, over a period when women's relative employment across All Industries remained constant at about 48 percent. The only Communications and Media Sector industry in which women's proportional employment grew is the low-paid Newspaper Publishing.

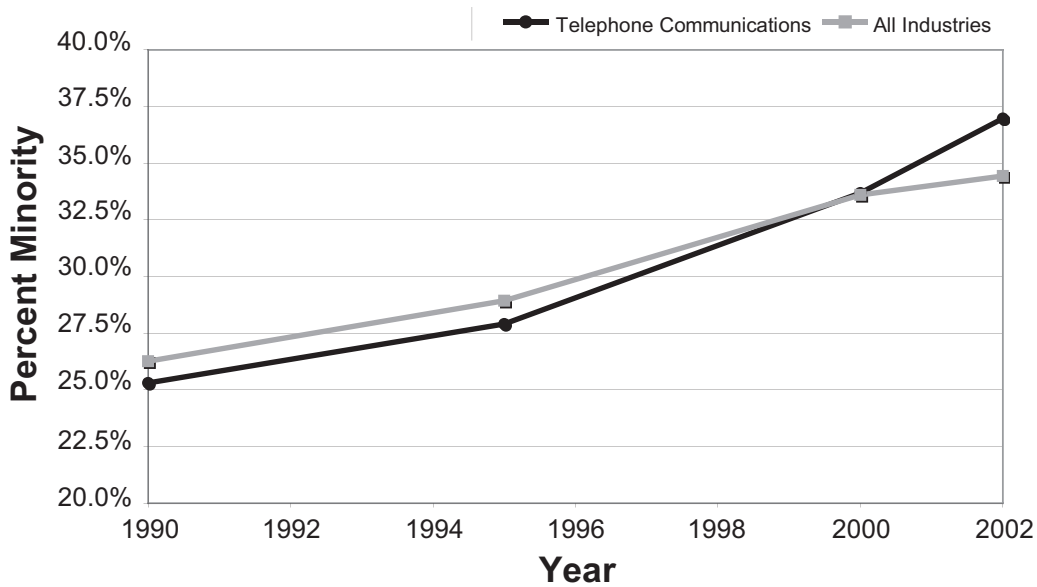
In 1990, the proportion of minorities in Wired and Wireless Telephone employment was slightly lower than that in All Industries (25.1 percent versus 26.3 percent minority, respectively; Figure 9). The relative employment of minorities has increased in both Wired and Wireless Telephone and All Industries since 1990, and somewhat more so in Wired and Wireless Telephone than in the workforce at large. In 2002, minority workers constituted 37.0 percent of total employment in Wired and Wireless Telephone, and 34.4 percent of employment in All Industries. The extra boost in minority employment in Wired and Wireless Telephone, as compared to All Industries, may reflect the extraordinary growth of jobs in the Wireless industry (433 percent from 1990 to 2005; Table 1); employers seeking to fill over 150,000 new jobs in this industry may have turned disproportionately to groups of workers who did not already have a solid niche in other industries.

Women's role in Wired and Wireless Telephone decreased across the period from 57.5 percent to 53.1 percent (Figure 10). During this same time, the total workforce remained about 48 percent female. Wired and Wireless Telephone was much more female than All Industries in 1990 (57.5 percent versus 48.5 percent, respectively), but this gap narrowed to less than a five-percentage-point difference in 2002, with 53.1 percent of jobs in Wired and Wireless Telephone and 48.4 percent in All Industries held by women. This is likely due to the loss of typically female-dominated jobs in customer service and telephone operators, with the effects of automation, new business models, and re-structuring being borne largely by women workers.

## DATA REPORTED ON EEO-1 FORMS

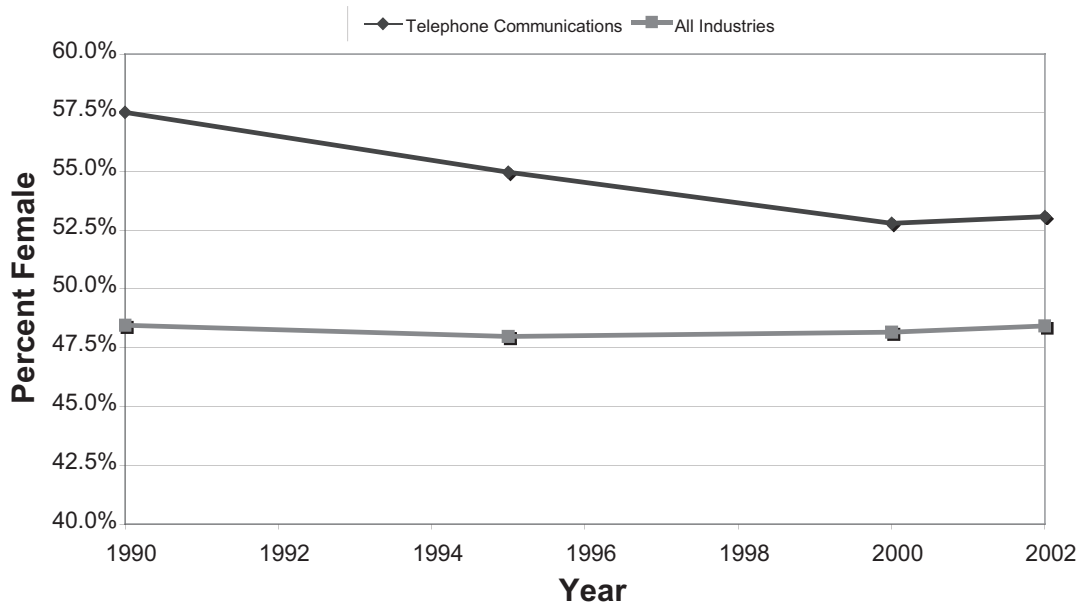
Employers' EEO-1 forms report the number of employees by sex and race/ethnicity. These data allow an analysis of changes in the share of jobs held by women and workers of color over the 1990s and into the early 2000s. They use a slightly different system for defining industries than both the CES and CPS surveys discussed above and a different scheme for defining occupations than the CPS. Officials, Managers, and Professionals are excluded from this analysis, but EEO-1 data group most first-line supervisors with their related broad occupational category.

**FIGURE 9.**  
**Minority Employment in Wired and Wireless Telephone and All Industries, 1990-2002**



Source: Institute for Women's Policy Research analysis of EEO-1 data.

**FIGURE 10.**  
**Female Employment in Wired and Wireless Telephone and All Industries, 1990-2002**

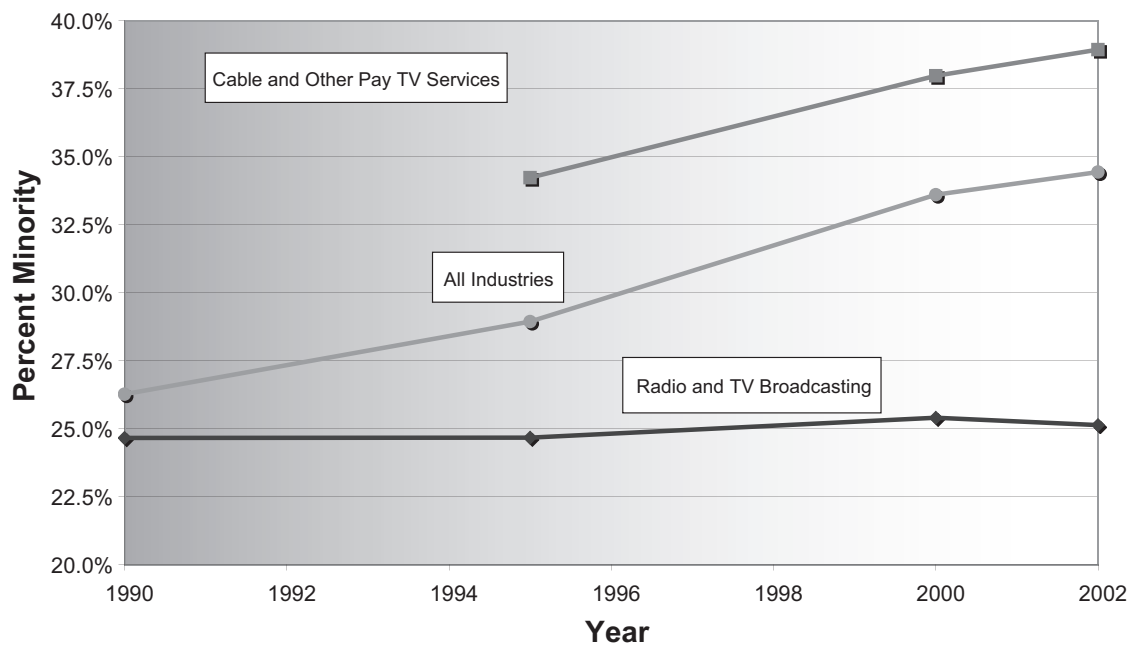


Source: Institute for Women's Policy Research analysis of EEO-1 data.

Minority representation in the Cable workforce was much higher in 1995 than in All Industries (34.2 percent and 28.9 percent, respectively).<sup>18</sup> The share of jobs held by minorities in both Cable and Other Pay TV Services and in All Industries grew through 2002, with Cable remaining more racially and ethnically diverse: Nearly two in five Cable workers were workers of color in

2002 (38.9 percent), compared with one-third of workers in All Industries combined (34.4 percent). In Radio and Television Broadcasting, however, workers of color were a smaller share of the workforce in 1990 than was the case for All Industries (24.7 percent as compared with 26.3 percent), and representation of minorities failed to grow over the next decade. In 2002, only one-fourth of Radio and TV Broadcasting jobs were held by workers of color, while minorities accounted for more than one-third of All Industries employment (34.4 percent). As in the Telephone industry, it may be that relatively high job growth in Cable fueled an increase in employment opportunities for workers of color, while older patterns of underutilization of minorities held steady in Radio and TV Broadcasting, where overall employment is either declining (Radio Broadcasting) or growing slowly (TV Broadcasting; see Table 1).

**FIGURE 11.**  
**Minority Employment in Radio, Television, and Cable Broadcasting and All Industries, 1990-2002**

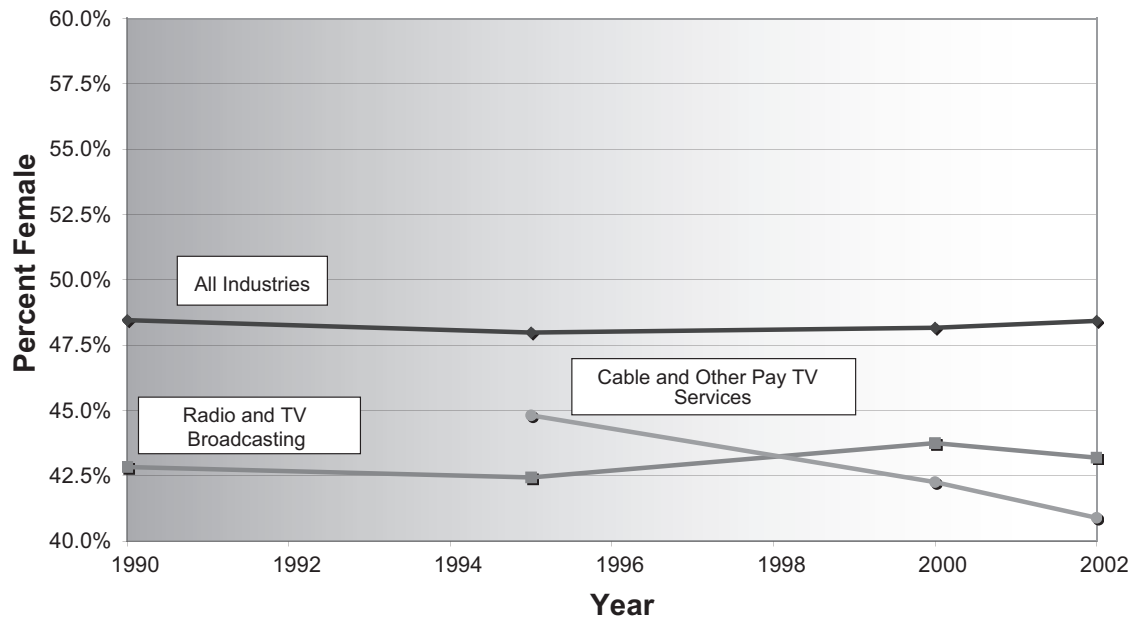


Source: Institute for Women's Policy Research analysis of EEO-1 data.

Cable and Other Pay Television Services and Radio and Television Broadcasting show different trends with respect to women's employment (Figure 12). Women's relative employment was lower in both industries than in All Industries over the period 1990 to 2002 (1995 to 2002 for Cable), with a decline in Cable (from 44.8 percent to 40.9 percent) and no change in Radio and TV Broadcasting (42.8 percent in 1990 and 43.2 percent in 2002). In the overall workforce, women's employment remained relatively constant at 48 percent of all workers.

<sup>18</sup> EEO-1 data are grouped using SIC3 codes, which, unlike the Census 2002 codes, allow the separation of Cable and Other Pay Television Services from Radio and Television Broadcasting for 1995, 2000, and 2002.

**FIGURE 12.**  
**Female Employment in Radio, Television, and Cable Broadcasting and All Industries, 1990-2002**



Source: Institute for Women's Policy Research analysis of EEO-1 data.

Trends in minority representation between 1990 and 2002 were similar in Newspaper Publishers, Motion Pictures and Video, and All Industries, with workers of color holding a larger share of employment in all three at the end of the period (Figure 13). Workers of color are very well represented in the relatively low-paid Motion Pictures industry (holding two of every five jobs, or 39.1 percent, in 2002), but are underutilized in the lower-paid Newspaper Publishers industry (filling just over a quarter of all jobs in 2002, or 27.7 percent). While minority representation increased in both industries, the differential between each and All Industries also grew: Motion Pictures and Video has pulled further ahead of All industries in relative minority employment, while Newspaper Publishers has fallen further behind.

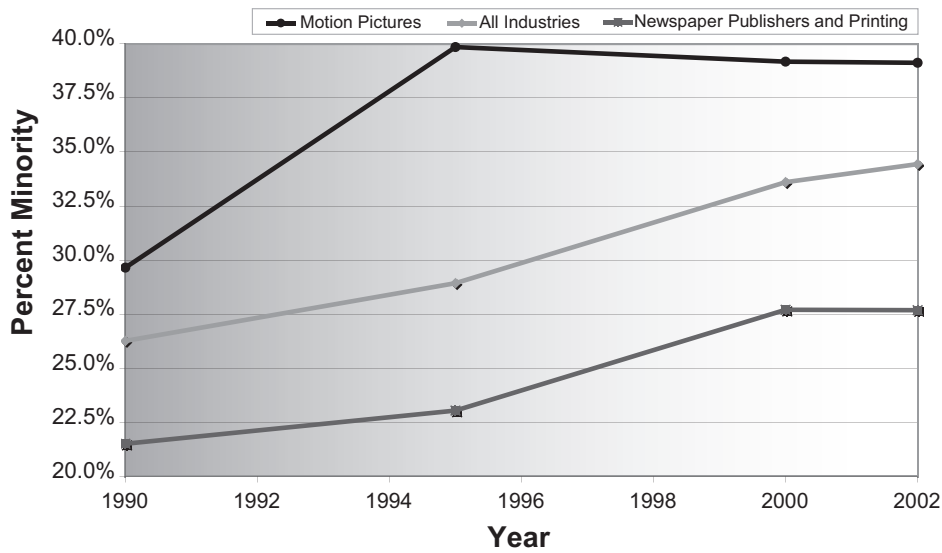
The opposite is true for women in Motion Pictures and Video and Newspaper Publishers: The gap between relative female employment in Motion Pictures and Video and in All Industries increased over the period 1990 to 2002, while that between Newspaper Publishers and All Industries shrank (Figure 14). In both instances, however, women are underrepresented, as compared to their share of jobs in All Industries. While 48.4 percent of the entire workforce was female in 2002, only 45.6 percent of workers in Newspaper Publishers, and 43.1 percent in Motion Pictures, were women.

In the Communications and Media Sector as a whole, then, the general trend over the period 1990 to 2002 was for greater integration of workers of color, and a drop in women's presence (Figure 15). Minority representation increased in Telephone, Cable and Other Pay TV Services, and Newspaper Publishers, and held steady in Radio and TV Broadcasting and Motion Pictures.

<sup>19</sup> Recall that this is for non-supervisory line workers only. When supervisory and professional positions are included, minorities hold a smaller share of all jobs.

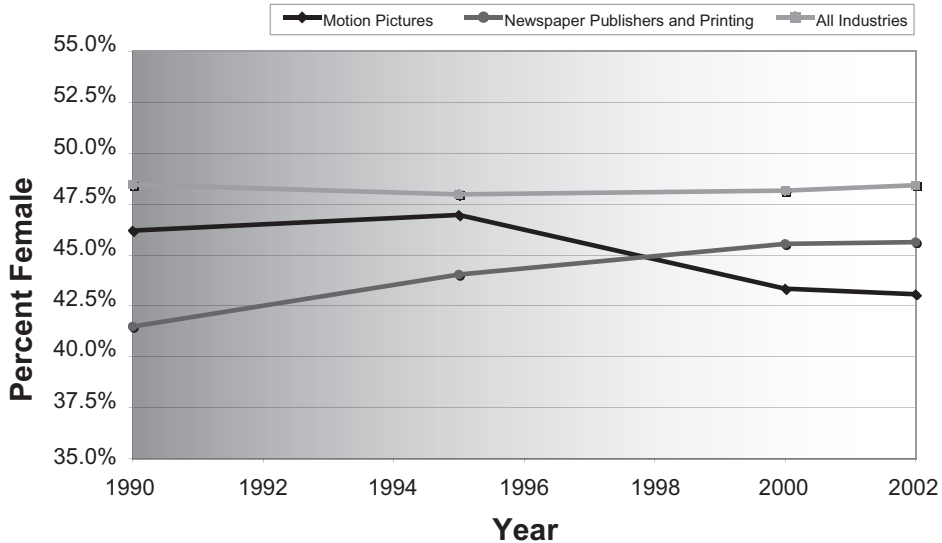
By 2002, the sector had caught up to the workforce as a whole, with just over one-third of jobs being filled by workers of color (34.7 percent of Communications and Media Sector workers, and 34.4 percent of All Industries).<sup>19</sup> For women, the sector overall is becoming somewhat less hospitable. The only industry in which women's share of employment is growing is the lowest-paid one: Newspaper Publishers. Women's dominant position in high-paid Telephone Communications is shrinking, and women's relative employment is falling in Cable and Motion Pictures. This leaves women with the same level of representation in the Communications and Media Sector as in the overall workforce (48.5 percent and 48.4 percent, respectively).

**FIGURE 13.**  
**Minority Employment in Motion Pictures and Video, Newspaper Publishers, and All Industries, 1990-2002**



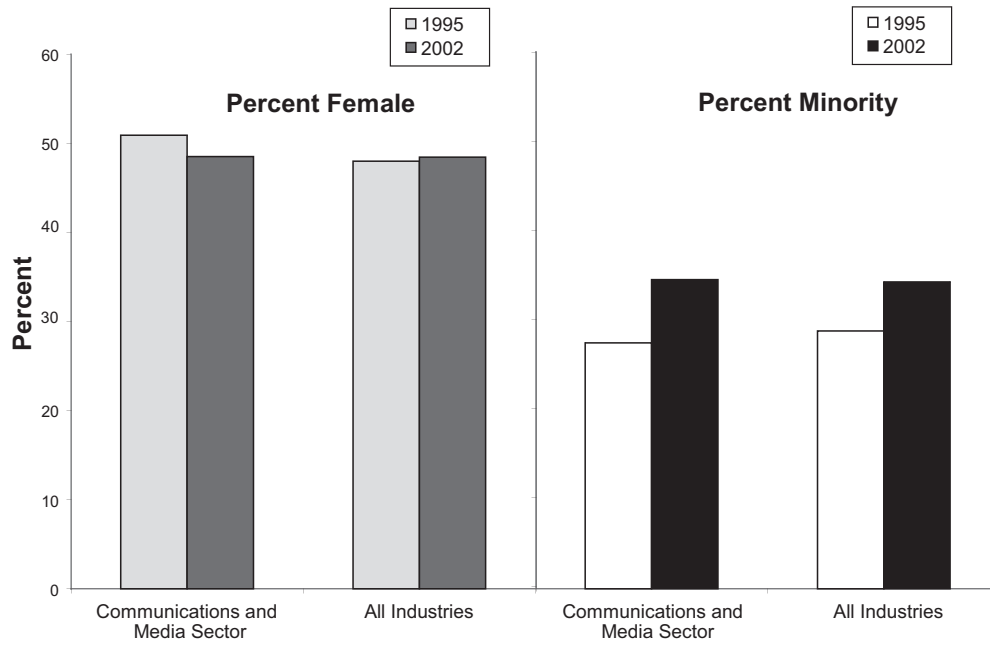
Source: Institute for Women's Policy Research analysis of EEO-1 data.

**FIGURE 14.**  
**Female Employment in Motion Pictures and Video, Newspaper Publishers, and All Industries, 1990-2002**



Source: Institute for Women's Policy Research analysis of EEO-1 data.

**FIGURE 15.**  
**Percent Female and Percent Minority, Communications and Media Sector and All Industries, 1995 and 2002**



Source: Institute for Women's Policy Research analysis of EEO-1 data.

# Making the Right Call

**W**omen and minorities have benefited from good employment opportunities in the Communications and Media Sector for decades. Wired Telephone Communications have played a central role in this, and unions are one key reason. With employment now expanding in some Communications and Media industries and contracting in others, this access to higher-quality jobs is jeopardized. Women are seeing their share of employment fall, and all workers face the prospect of lower earnings in some of the rapidly expanding industries.

Uneven regulation and inconsistent equal employment opportunity efforts in Communications and Media have weakened what was once a strong employment sector for women and minorities. These issues merit attention and action from policy makers as rapid change and evolution continue in these vital industries.



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# Appendix: Data and Methodology

The dataset used for most of the analysis in this report was compiled by the Institute for Women's Policy Research (IWPR) from the January 2003 through December 2005 Outgoing Rotation Group files of the Current Population Survey (ORG). The dataset includes workers ages 18 to 64 in the Communications and Media Sector who reported positive usual work hours and earned between \$3.20 and \$161.10 per hour, in December 2005 dollars. Self-employed workers were excluded. Usual weekly work hours are used, unless a worker's usual weekly hours vary, in which case actual weekly hours are used. The hourly pay rate is used as workers' hourly wage for hourly workers; for wage and salary workers, weekly earnings are divided by weekly work hours to calculate an hourly wage. Both measures include all tips, overtime, and commissions, in addition to regular pay. Part-time is defined as working less than 35 hours per week. Union status is based on whether workers are members of a union or are covered by a union or employee association contract. Median wages and population sizes were calculated using the ORG weight. Wages were inflated to December 2005 dollars using the CPI-All Urban Consumers.

The analysis focused on seven industries of the Communications and Media Sector: Newspaper Publishers (Census 2002 Code 6470), Motion Pictures and Video Industries (6570), Radio, Television Broadcasting, and Cable (6670), Wired Telecom (6680), and Wireless and Other Telecom (6690), Internet Service Providers (6692), and Other Information Services (6780). For these seven targeted industries, the dataset contains 10,546 observations. The sector as a whole has a sample size of 13,165.

Detailed occupations in these industries were grouped into four relevant, adequately large groups: (1) Managers and All Other Professionals, (2) Blue-Collar and Service Occupations (including transportation workers), (3) Sales Occupations, and (4) Office and Clerical occupations. These four categories reflect Dr. Stephen Rose's most recent detailed occupation classification system, which is based on the amount of education and job training that workers in a given occupation typically possess. Managers and All Other Professionals includes occupational groups 1-13 of Dr. Rose's 21 categories: managers and sales non-retail, lawyers and judges, health diagnosis professionals, accountants and other management, sales representatives and FIRE, science professionals and pilots, other business professionals, teachers, arts and letters, managers and sales retail, blue collar supervisors, farm owners and managers, and health support and technicians. (All first-line supervisors are in this group.) Blue-Collar and Service Occupations is comprised of precision craft and repair, protective services, machine operators and assemblers, service workers, laborers, and farm workers. The Sales category used in this report is the same as Dr. Rose's, and the Office Occupations cluster is equivalent to his clerical category.<sup>20</sup>

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<sup>20</sup> Dr. Rose groups non-professional self-employed workers with retail managers and supervisors.

Six detailed occupations are examined individually. The first of these is *computer and engineering professionals*, which includes computer and mathematical occupations and architecture and engineering occupations (Census 2002 Code 1000-1560). *Journalists* includes announcers (2800), news analysts (2810), technical writers (2840), and writers and authors (2850). *Broadcast technicians and television camera operators* includes broadcast and sound engineering technicians and radio operators (2900) and television, video, and motion picture camera operators and editors (2920). These three occupation groups are subsets of Managers and All Other Professionals. The report also examines *radio and telecommunication equipment and line installers and repairers* (7020 and 7420), a subset of Blue-Collar and Service Occupations, and two individual elements of Office Occupations: *telephone operators* (5020) and *customer service representatives* (5240).

Except where noted, CPS analyses reported here exclude Managers and All Other Professionals.

For the detailed industry and occupation analyses in this report, sample sizes were sufficient to define only two race/ethnicity categories: Non-Hispanic White, and Minority. Non-Hispanic White includes those who self-identified as White only, White-American Indian, White-Asian, White-Hawaiian, White-American Indian-Asian, or White-Asian-Hawaiian and as Non-Hispanic. All those who identified as Black only, White-Black, Black-American Indian, Black-Asian, Black-Hawaiian, White-Black-American Indian, White-Black-Asian, or White-Black-American Indian-Asian, American Indian/Alaskan Native only, Asian only, Hawaiian/Pacific Islander only, American Indian-Asian, Asian-Hawaiian, 2 or 3 races, 4 or 5 races, or Hispanic are defined as Minority.





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