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Arne L. Kalleberg

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# Flexible Firms and Labor Market Segmentation

## Effects of Workplace Restructuring on Jobs and Workers

ARNE L. KALLEBERG  
*University of North Carolina*

*Employers in all industrial societies have sought greater flexibility in their employment systems. This article discusses some key ways in which employers have sought to restructure their workforces to become more flexible and the consequences of such restructuring for workers and jobs. The author argues that U.S. employers' use of numerical and functional flexibility strategies has led to a division between organizational insiders (standard employment relations) and outsiders (who have nonstandard work arrangements). The consequences of working in non-standard employment relations differ depending on workers' individual and collective control over skills and other valued resources.*

**Keywords:** *flexibility; labor market segmentation; dual labor markets; nonstandard work arrangements; employment relations*

**S**ocial and economic changes in all industrial societies during the past quarter century have underscored the need for organizations to have greater flexibility in their production processes and employment systems in order to adapt quickly to rapid developments in technology, greater diversity in labor markets, growing international and price competition in product markets, and corporate financial restructuring in capital markets (see, for example, Boyer, 1987; Piore & Sabel, 1984; Vallas, 1999).

Employers have responded to these changes by seeking two main kinds of organizational flexibility. First, functional or internal flexibility refers to the ability of employers to redeploy workers from one task to another. This is often accomplished by the use of "high performance work organizations"

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that empower workers to participate in decision making, enable them to work in teams, and enhance their commitment to the organization by, among other things, linking their compensation to organizational performance (see Appelbaum & Batt, 1994; Gittleman, 1999; Osterman, 2000; Wood, 1999).

Second, numerical or external flexibility refers to the organization's ability to adjust the size of its workforce to fluctuations in demand by using workers who are not their regular, full-time employees. (Organizations can also obtain numerical flexibility by asking or requiring their regular, full-time employees to work overtime.) An organization's externalized workforce includes several kinds of nonstandard employment relations (see Table 2). Organizations can limit the duration of employment through the use of part-time and (especially) short-term temporary workers who (a) are often viewed as being disposable and can be recruited and selected quickly, (b) may be used when the organization does not have the authorization to hire, and (c) often cost less than regular, full-time employees. These workers are on the company payroll but have relatively weak ties to the organization, are generally hired for finite periods on an as-needed basis, and, at least in the United States, typically receive no or few benefits. In addition, organizations can obtain numerical flexibility and often reduce costs by externalizing administrative control through the use of temporary help agency or contract workers. These workers are considered to be employees of the temporary agency or contract company, not the client organization. They include both high skilled (e.g., consultants and independent professionals) and low skilled (e.g., clericals, food service) workers.

There is some disagreement about the extent to which organizations have adopted one or both of these forms of flexibility. Although some evidence suggests that the use of high performance work organizations has diffused considerably (Osterman, 2000), writers have not always agreed on how best to measure these practices and longitudinal data on organizations' practices of adoption are scarce. Moreover, support for the productionist view that there has been a decline in Fordism and a rise of alternatives such as flexible specialization is arguably less powerful with regard to the service sector that dominates the advanced countries (see, for example, Frenkel, Korczynski, Shire, & Tam, 1999). With regard to numerical flexibility, the evidence is fairly clear that there has been an increase in some forms of nonstandard work arrangements such as temporary help agency employment and probably contractors (see the review in Kalleberg, 2000), although the prevalence of these arrangements varies across industries: For example, the use of agency temporaries is relatively high in manufacturing, whereas the use of short-term temporaries is higher in services (Houseman, 2001). Writers also disagree about the extent to which nonstandard work arrangements represent a fundamental

change in the institutions underlying employment relations (see, for example, Cappelli, 1999, and Jacoby, 1999).

In any event, it appears that employers frequently benefit from adopting flexible work practices and employment systems: Organizations adopting high performance work practices have been shown to often experience improvements in productivity and performance (Appelbaum, Bailey, Berg, & Kalleberg, 2000), and some organizations have been able to save on labor costs by using temporary and part-time workers and thus have enjoyed greater profits. Subcontracting and outsourcing nonessential functions have also enabled some organizations to concentrate more on their core competences and thereby to use their resources more efficiently. However, attempts to increase flexibility also have a "dark side" in the form of negative consequences for some organizations and employees, and these effects have been less documented. The flip side of flexibility is insecurity and there has been a general increase in job insecurity in the workforce. Moreover, employers' attempts to achieve flexibility have led to increased segmentation of their workforces into core and periphery components, creating a division between organizational insiders and outsiders. Organizational outsiders are heterogeneous and include both highly skilled, well-paid workers as well as low skilled, low-paid workers.

In this article, I discuss some key ways in which employers have sought to restructure their workforces in an attempt to become more flexible and some of the consequences of such restructuring for workers. I argue that U.S. employers' use of numerical and functional flexibility strategies has led to a division between organizational insiders (standard employment relations) and outsiders (who have nonstandard work arrangements). The consequences of working in nonstandard employment relations differ depending on workers' individual and collective control over skills and other valued resources. I illustrate some of my main points using data from recent U.S. national surveys of establishments and labor force participants.

### **THE SEARCH FOR NUMERICAL AND FUNCTIONAL FLEXIBILITY**

Most studies of organizational flexibility have focused on either functional or numerical flexibility, although some have considered explicitly the interplay between them and have sought to explain how organizations are able to obtain simultaneously these seemingly contradictory forms of flexibility (see the review in Kalleberg, 2001). Writers have used various labels to refer to models of organizations' labor utilization strategies that combine

numerical and functional flexibility; perhaps the most influential is the dualistic model of the flexible firm proposed by John Atkinson (1984, 1987). His “core-periphery” or “micro dual labor market” model (Pollert, 1988, p. 283; Harrison, 1994) has been the subject of lively and often critical debate (e.g., Hakim, 1990; Hunter, McGregor, MacInnes, & Sproull, 1993; Pollert, 1988; Procter, Rowlinson, McArdle, Hassard, & Forrester, 1994).

The core-periphery model offered managers and government policy makers a framework for identifying the main practices on which they should focus in order to obtain both functional and numerical flexibility. Managers were urged to internalize part of their workforces (the core, regular, permanent workers who are highly trained, skilled, and committed to the organization, attributes that are thought to be needed for functional flexibility) at the same time as they externalize other activities and/or persons by means of transactional contracts. Segmenting the organization’s workforce into fixed and variable components is assumed to achieve cost effectiveness, as the numerically flexible, nonstandard, peripheral workers are used to buffer or protect the regular, core labor force from fluctuations in demand. This segmentation is believed to avoid the morale problems engendered by laying off regular employees and the disequilibria (and illegalities in some countries) associated with treating regular workers differently. This model has been thought to be especially applicable to the United States and United Kingdom, where labor laws leave employers relatively free to choose and vary their employment contracts, compared with many other European countries (Hakim, 1990).

Several assumptions of the core-periphery model have been the subject of considerable empirical research, particularly the idea that organizations use both functional and numerical flexibility simultaneously. Although there is little hard, direct systematic evidence on this assumption, some research has examined it indirectly. A number of studies have found a negative or no relationship between functional and numerical flexibility within establishments, suggesting that there are conflicts and other problems that make the two kinds of flexibility incompatible (Cappelli, 1995; Gittleman, 1999), for example, segmenting workforces could well divide loyalty and diminish cooperation and teamwork.

Other studies have found that patterns of internalization and externalization may co-exist within the same organization (Lautsch, 1996). A recent (1996) study of high performance and flexible staffing practices based on a representative sample of establishments in the United States (the Second National Organizations Survey—see Kalleberg, Knoke, & Marsden, 1999) provides information on establishments’ simultaneous use of numerical and functional flexibility practices. Table 1 cross-classifies establishments by

their use of these two flexibility strategies. Nearly three quarters (72% = 479/669) of establishments used some combination of numerical flexibility strategies such as direct hire temporaries, temporary help agencies, or contract companies. The columns of the table indicate the number of establishments that use from 0 to 4 high performance work practices (i.e., teams, offline committees, multi-tasking, performance incentives—see Kalleberg, Marsden, Reynolds, & Knoke, 2002). If we consider establishments that use two or more of these practices as functionally flexible, then 42% (281/669) fit this description; if we use one or more practices as the criterion, then two thirds (67% = 447/669) are in this category. Cross-classifying establishments by their use of both numerical and functional flexibility indicates that 36% (242/669) use both forms of flexibility (using two or more high performance work practices as the criterion of functional flexibility), whereas about half (333/669) use numerical flexibility strategies as well as at least one high performance work practice. These data provide suggestive evidence that between one third and one half of U.S. establishments have adopted some form of core-periphery labor utilization strategy.

Moreover, more than half of the participants in the same survey agreed or strongly agreed with the statement, “Your human resource management strategy divides the workforce into permanent and nonpermanent employees.”

### **ORGANIZATIONAL INSIDERS AND OUTSIDERS: STANDARD VS. NONSTANDARD EMPLOYMENT RELATIONS**

Employers' search for the two kinds of flexibility has led to a polarization between organizational insiders versus outsiders. One useful way of representing this is the division between standard and nonstandard work arrangements. Table 2 defines these types of employment relations and Table 3 presents the distributions of the labor force among these types of work arrangements in the United States in 1995 and 1997.

Standard work arrangements refer to regular, full-time jobs with a single employer. Having a standard work arrangement is usually regarded as a necessary condition for being located in the core of the organization, although it is probably not a sufficient condition because most writers assume that core workers do more than simply work full-time on open-ended contracts; for example, they are also assumed to be involved in decision making and otherwise be well integrated into the organization.

**TABLE 1: Models of Labor Utilization (1996 National Organizations Survey)**

<i>Type of Staffing Arrangement</i>	<i>No. of High Performance Work Practices</i>					
	<i>0</i>	<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	
Full-time only						
Only full-time and part-time	76	75	25	12	2	190
Full-time/full-time and part-time and direct-hire temporaries						
Full-time/full-time and part-time and employment intermediaries						
Full-time/full-time and part-time and direct-hire temporaries and employment intermediaries	146	91	154	70	18	479
Number of establishments (weighted)	222	166	179	82	20	669

Nonstandard employment relations are generally located in the organization's periphery, including temporary work (both direct-hire temporaries and employees of temporary agencies) and contractors (both employees of contract companies and independent contractors). Part-timers may be located in either the organization's core or periphery.

Table 3 indicates that in the mid- to late-1990s, about 70% of men and about 60% of women in the United States worked in standard arrangements.<sup>1</sup> (These percentages represented about 80 million jobs in 1995 and 83 million jobs in 1997.) The biggest category of nonstandard jobs for women was regular part-time jobs (about 22%<sup>2</sup>), whereas for men it was self-employment (about 14% of men were self-employed, either as independent contractors or in other forms of self-employment). Overall, though, the sexes' distributions across employment relations are quite similar, with an index of dissimilarity of about 15% in both 1995 and 1997.

The creation of a dualism between organizational insiders and outsiders is intimately related to employers' search for numerical and functional flexibility. Bennett Harrison (1994, p. 196) argued that the flexibility of large firms depends fundamentally on the perpetuation of contingent work (part-time, part-year, temporary, and contract work), which he argued that American companies were deliberately creating (p. 205). The insiders that Harrison describes are full-time, relatively secure core workers with fringe benefits, training, and promotional opportunities; the outsiders are often contingent workers. Employees who occupy an organization's periphery may be employees of other organizations that are connected to the focal organization by means of networks (see also Heckscher, 2000).

Much of the writing on organizational flexibility (especially functional flexibility) has focused on the "survivors" of the restructuring process, who have experienced enhanced autonomy and control, and has neglected the contradictions in the meaning of flexibility for different groups who have been increasingly marginalized as a result of the growth in segmentation and polarization that has accompanied this flexibility (Goldthorpe, 1984; Harrison, 1994; Vallas, 1999). Many lower-level, often contingent workers are likely to continue to be governed by the logic of Fordist employment relations, which sees them as disposable, a concern earlier expressed by Atkinson (1984), who worried that an increased use of a core-periphery model would mean that "an individual's pay, security and career opportunities will increasingly be secured at the expense of the employment conditions of others, often women, more of whom will find themselves permanently relegated in dead-end, insecure and low paid jobs" (p. 31).

**TABLE 2: Characteristics of Standard and Nonstandard Work Arrangements**

<i>Type of Work Arrangement</i>	<i>Dimension of Work Arrangements</i>					
	<i>Who is the de jure employer?</i>	<i>Who is the de facto employer?</i>	<i>Assumption of continued employment by de jure employer?</i>	<i>Assumption of continued employment by de facto employer?</i>	<i>Who directs work?</i>	<i>Hours of Work</i>
Standard	organization A	organization A	yes	yes	organization A	full-time
Part-time	organization A	organization A	sometimes	sometimes	organization A	part-time
On-call/day labor	organization A	organization A	no	no	organization A	full-time or part-time
Short-term temporary	organization A	organization A	no	no	organization A	full-time or part-time
Temporary help agency	THA agency	organization A	sometimes	no	organization A	full-time or part-time
Contract company <sup>a</sup>	contract company	organization A	yes	no	contract company	full-time or part-time
Independent contracting, self-employment	self	client(s)	yes	no	self	full-time or part-time

a. Contract company employees may have a standard work arrangement with their de jure employer (the contract company), but from the point of view of Organization A, their work arrangements are nonstandard.

**TABLE 3: Distribution of Workers Across Work Arrangements in the United States, 1995 and 1997**

<i>Type of Work Arrangement</i>	<i>1995</i>			<i>1997</i>		
	<i>Male</i>	<i>Female</i>	<i>Number (Weighted)</i>	<i>Male</i>	<i>Female</i>	<i>Number (Weighted)</i>
Standard (regular full-time)	69.2 <sup>a</sup>	61.1	79,232,748	70.7	62.3	83,173,388
Regular part-time	7.7	21.9	17,222,418	7.5	21.9	17,654,592
Day labor	.1	0	109,278	0	0	27,035
On-call (regular hours) <sup>b</sup>	1.2	1.6	1,701,224	.5	.6	705,882
On-call (without regular hours)	—	—	—	.8	1	1,121,605
Short-term temporary	3.9	3.5	4,510,980	3.4	2.8	3,924,647
Temporary help agency	.8	1.1	1,170,876	.9	1.2	1,288,398
Contract company	1.7	.9	1,619,654	1.7	.9	1,639,150
Independent contractor (W&S)	.9	.9	1,125,179	.7	.8	975,576
Independent contractor (self-employed)	7.6	3.9	7,114,850	7.7	4	7,455,704
Self-employed (other)	6.7	5	7,174,467	6	4.3	6,495,478
Total	65,214,948	55,766,726	120,981,674	66,765,743	57,695,712	124,461,455

a. These figures are percentages.

b. On-call category in 1995 does not distinguish between those with and without regular hours.

SOURCE: Current Population Survey Supplements, February 1995 and 1997.

## WORKER CONTROL AND NONSTANDARD WORK ARRANGEMENTS

Workers differ in the extent to which they are able to benefit from the growth in nonstandard work arrangements. Whether or not workers are able to take advantage of the opportunities presented by these work arrangements depends on the degree to which they can exercise individual or collective control over their skills or otherwise obtain market power by collective forms of control such as unionization and professional associations. Workers with portable skills and autonomy/control over their work are likely to be employable in a variety of organizations and thus are also likely to have relatively stable employment in the occupation (through structures such as occupational internal labor markets), if not with a given employer.

Sociologists have suggested some mechanisms that lead to the differences in the control that workers have over their jobs. For example, Sørensen (1996) argued that agency and monitoring problems enable some workers to establish closed employment relations and to obtain rents or higher than market wages, whereas open employment relations are subject to competitive market forces and do not provide rents. Wright (1997) also suggested that autonomous workers receive higher wages due to a "loyalty rent" that is paid to induce their cooperation and effort. Similarly, efficiency wage theory in economics assumes that employers pay wage premia to workers in closed employment relations to induce them to avoid shirking or to reciprocate as part of a gift exchange (Akerlof, 1984). The premium that firms pay above market clearing levels is assumed to be the difference between closed and open employment relations. Closed employment relations pay high wages because workers have high autonomy/control over their work, and so it is difficult for managers to monitor their work and to detect whether they are shirking. By contrast, in open employment relations, workers are often closely supervised and monitored (e.g., Neal, 1993).

Table 4 cross-classifies the core-periphery distinction with the degree of control that workers have over their skills and their market situation. The two-by-two representation in Table 4 is intended only to illustrate the nature of the relationship between these dimensions of labor market segmentation; differences in degree of worker control, as well as the core vs. periphery nature of the employment relationship, are more complex than shown in this table.

The division between an organization's core and periphery is distinct from the degree of control that workers have over their skills and market situation. Some core workers have considerable control over their skills and autonomy over their work, whereas some periphery workers have relatively little control. However, there are also workers in the periphery of the organization who

**TABLE 4: Dimensions of Labor Market Segmentation**

<i>Relationship to Employer</i>	<i>Degree of Worker Control</i>	
	<i>High</i>	<i>Low</i>
Core	High firm-specific skills; high security with employer Example: autonomous jobs in standard employment relations	Low skills; low security with employer Example: regular part-time, routine jobs
Periphery	Highly portable skills; effective occupational association; high security with an occupation Examples: high-skilled independent contractors and consultants High-skilled temporary help agency employees	Nontransferable skills; weak occupational association; low security with employer or occupation Examples: short-term hires in routine jobs Low-skill temporary help agency employees

have considerable control and autonomy over their work: These workers do not have high levels of security within a particular firm; temporary workers, independent contractors, and other peripheral workers—even highly skilled ones—face job insecurities and instabilities due to their weak ties to their client organizations. Nevertheless, some of these peripheral workers have skills that are in high demand, so they are highly employable and should have little trouble obtaining highly rewarded employment elsewhere. Examples include highly skilled temporary help agency employees such as nurses and computer programmers, as well as sought-after consultants in specialized areas such as software design and the knowledge workers in the bank divisions described by Royal and Althausser (2003). Workers with high control over their skills and market situations are thus found both in firm internal labor markets (in the core of the firm) as well as in occupational internal labor markets that span firms and provide opportunities to move from one firm to another via networks of organizations and strategic alliances. Finally, some workers who might be classified in the core of the organization have few skills and relatively low security but have few opportunities to move elsewhere either. An example is regular, full-time jobs in fast-food establishments, which provide little security and opportunity for advancement.

**HETEROGENEITY IN OPEN VS. CLOSED TYPES OF WORK ARRANGEMENTS**

Occupational differences are a reasonable (albeit imperfect) indicator of variations in worker autonomy/control and skills. Table 5 presents the distribution of occupational groups within standard and the various types of non-standard work arrangements in the United States in 1997, separately for men and women. Table 5 shows that there is considerable heterogeneity in occupational membership within a given type of work arrangement, and this varies for men and women.

For example, temporary help agency employment includes workers in high- as well as low-skilled occupations: about 22% of men and 17% of women employed by temporary help agencies work in managerial, professional, or technical occupations, whereas more than one quarter of men and more than half of women who are employed by temporary help agencies work as machine or transport operatives and administrative or clerical workers, respectively. These high- and low-skilled occupations are likely to vary considerably in their employability and so will be found in both primary and secondary labor markets. This division into high- and low-end occupations also illustrates the polarization of the temporary help supply industry that has been observed in cities such as Chicago (see Peck & Theodore, 1998).

Moreover, independent contractors are found in both high- and low-skilled occupations: More than 40% of self-employed independent contractors (both men and women) are in managerial or professional occupations, whereas more than one quarter of men and nearly one fifth of women who are self-employed independent contractors work in craft and sales occupations, respectively. Whereas some independent contractors may actually be employees who are misclassified by their employers to avoid payment of various taxes and benefits (e.g., Morgan, 1998), others are highly valued and relatively well-paid consultants. Although the latter group may be peripheral labor in the sense of being exposed to the open labor market, they are a privileged group of workers who have scarce skills and should thus properly be regarded as part of the primary sector (e.g., Pollert, 1988, p. 290).

In addition, there is considerable occupational variation in regular part-time work. About one quarter of women and men who are in regular part-time positions work in service occupations, and another quarter of women are in administrative and clerical occupations. At the same time, about 14% of women and about 11% of men who work in regular part-time positions are employed in professional occupations. This is consistent with the notion that there is a duality within part-time employment (see Tilly, 1996).

Finally, there is also considerable occupational variation among regular full-time employees: More than one third of women and nearly 30% of men

**TABLE 5: Percentage of Nonstandard Workers in Each Major Occupational Group in 1997**

	<i>Regular Full-Time</i>	<i>Regular Part-Time</i>	<i>On-Call (regular hours)</i>	<i>On-Call (w/o reg. hours)</i>	<i>Short- Term Temp.</i>	<i>Temp. Help Agency</i>	<i>Contract Co.</i>	<i>Indep. Cont. (WS)</i>	<i>Indep. Cont. (SE)</i>	<i>Self- Emp. (other)</i>	<i>All Workers</i>
<b>Males</b>											
Managerial	14.9	3.6	6.5	1.0	13.9	4.6	11.0	13.6	24.1	26.1	14.9
Professional	13.2	10.6	7.3	11.8	18.5	9.5	21.4	17.7	15.4	14.7	13.5
Technical	3.4	2.6	7.0	.9	3.0	8.1	6.0	1.4	.7	1.0	3.1
Sales	9.7	15.0	4.9	1.5	4.7	1.6	3.6	32.5	14.5	21.8	11.0
Administrative, clerical	6.4	9.7	2.8	5.2	5.8	13.9	4.0	3.4	.8	.6	5.9
Private household	.0	.1		.1				1.8			.0
Protective service	3.0	2.0	6.8	.5	3.1	1.8	11.5		.4		2.6
Service	6.2	24.1	8.1	7.4	5.8	6.1	5.8	2.1	1.9	2.5	7.2
Craft and repair Machine operatives	19.6	7.1	30.5	27.6	18.5	10.4	24.8	12.8	26.8	11.4	18.6
Transport operatives	9.2	2.9	4.8	3.0	8.9	21.3	1.8	.4	1.5	1.4	7.4
Laborers	7.3	5.5	11.1	19.3	7.7	7.8	5.8	7.0	6.1	2.4	6.9
Farming, forestry, fishing	4.9	13.9	9.2	14.4	6.8	12.0	2.6	4.4	.9	.7	5.3
	2.1	2.9	.9	7.3	3.3	2.9	1.8	2.8	7.0	17.3	3.6
	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0

*(continued)*

TABLE 5 (continued)

	<i>Regular Full-Time</i>	<i>Regular Part-Time</i>	<i>On-Call (regular hours)</i>	<i>On-Call (w/o reg. hours)</i>	<i>Short- Term Temp.</i>	<i>Temp. Help Agency</i>	<i>Contract Co.</i>	<i>Indep. Cont. (WS)</i>	<i>Indep. Cont. (SE)</i>	<i>Self- Emp. (other)</i>	<i>All Workers</i>
Females											
Managerial	16.6	4.7	3.9	1.4	15.7	8.8	12.1	6.7	17.8	21.0	13.6
Professional	19.3	13.5	22.5	38.2	21.3	4.3	23.1	14.2	24.2	10.1	17.9
Technical	4.0	3.2	9.8	1.4	3.3	3.9	5.9		.9	.3	3.5
Sales	10.1	19.2	19.0	6.1	6.8	1.7	2.9	32.6	19.1	18.9	12.9
Administrative, clerical	26.6	24.1	10.7	14.7	26.8	50.4	11.1	12.4	9.1	13.0	24.6
Private household	.6	1.9	3.1	7.7	2.5	.3	1.1	18.4	1.9		1.2
Protective service	.6	.6	1.7	1.0	1.0	.3	6.2	.1	.1		.6
Service	10.8	26.1	22.6	19.5	9.7	9.3	27.6	14.9	18.1	22.2	15.4
Craft and repair Machine operatives	2.2	.9	.7	.9	2.7	1.0	4.3	.5	3.0	1.3	1.9
Transport operatives	6.4	1.9	.4	1.4	6.5	13.6	2.3		2.4	2.1	4.9
Laborers	.8	1.3	.6	2.1	.7		2.4		.9	.2	.9
Farming, forestry, fishing	1.5	2.0	2.7	4.9	2.4	5.8	.9		.1	.3	1.6
	.4	.5	2.2	.6	.5	.6		.2	2.3	10.6	1.0
	100.00	100.00	100.00	100.00	100.00	100.00	100.00	100.00	100.00	100.00	100.00

NOTE: All figures are percentages.

classified as regular full-time workers are employed in managerial or professional occupations, whereas about 20% of men and more than one quarter of women are in semi-skilled or unskilled and clerical occupations, respectively.

These occupational differences also underscore the differences in women's and men's situations even when they are classified within the same nonstandard employment arrangement. For example, the modal temporary help agency occupation for women is secretaries, whereas for men it is nonconstruction laborers; self-employed men are most often managers and administrators (not elsewhere classified), whereas for women it is bookkeepers.

### CONSEQUENCES FOR LABOR MARKET INEQUALITY

Both dimensions of labor market segmentation discussed above—the distinction between standard and nonstandard employment relations, as well as differences in the degree of worker control—are needed to explain adequately the heightened labor market and social duality between advantaged and disadvantaged labor force members. Employers' search for flexibility has resulted in a more diverse set of employment relations and a more differentiated labor market than previously (cf. Herzberg, Alic, & Wial, 1998). This diversity in employment relations has implications for inequality in labor market outcomes. Moreover, occupational differences in skills (level and portability) and autonomy over work and schedule suggest the importance for inequality of worker control over skill development and acquisition. In this section, I provide suggestive evidence that differences in both standard and nonstandard employment relations, as well as occupations, have distinct effects on inequality.

Table 6 shows the relationship between various standard/nonstandard work arrangements and several indicators of job quality in 1997: the proportion of workers in these arrangements that do not receive health insurance and retirement benefits, and the proportion who are in the bottom 20% of the wage distribution (see also Kalleberg, Reskin, & Hudson, 2000).

Every nonstandard work arrangement is more likely to be associated with these three bad job characteristics than standard work arrangements. At the same time, workers in certain nonstandard work arrangements—particularly self-employment (both independent contracting and other forms of self-employment) and contract-company employment—have jobs that are not all that bad. Although workers in these nonstandard arrangements were less

**TABLE 6: Quality of Nonstandard Work Arrangements in the United States, 1997**

<i>Type of Work Arrangement</i>	<i>Dimension of Job Quality</i>					
	<i>% No Employer Health Care</i>		<i>% No Employer Pension</i>		<i>% Low Wages</i>	
	<i>Male</i>	<i>Female</i>	<i>Male</i>	<i>Female</i>	<i>Male</i>	<i>Female</i>
Standard (regular full-time)	29	33	39	39	10	15
Regular part-time	84	82	87	78	51	43
On-call workers	79	94	86	85	30	33
Short-term temporary	45	46	57	52	16	22
Temporary help agency	94	95	96	96	24	33
Contract company	45	66	57	77	13	25
Independent contractor (self-employed)	60	72	60	61	15	31
Self-employed (other)	47	65	51	62	20	49
Total	39	49	47	52	15	24

SOURCE: Current Population Survey Supplement, February 1997.

likely to have fringe benefits than workers in standard arrangements, many earned higher wages than regular full-time workers in standard jobs (results not shown). Moreover, relatively few workers in these particular nonstandard arrangements expressed a preference for standard jobs (see Kalleberg et al., 1997). The heterogeneity within some nonstandard work arrangements is seen in the overrepresentation of some workers—such as self-employed women—in both the low- and high-wage groups (results not shown).

On the other hand, male and female temporary-help agency employees, on-call workers and day laborers, and part-time workers are consistently more likely than workers in the other nonstandard arrangements to have low pay and to lack insurance and pension benefits (an exception is “other” self-employed women, who are the most likely group of women to have jobs with low wages). Moreover, most workers in these arrangements (especially temporary-help agency employees and on-call workers and day laborers) prefer standard, full-time employment (Kalleberg et al., 1997). In view of these findings, the explosive growth of the temporary-help industry, in particular, makes the strong negative effect of employment in temporary-help agencies on job quality a matter of concern in the United States. As suggested above, there are also differences in job quality within some of these categories of nonstandard work (results not shown). Thus, the wages of temporary help agency employees differ considerably: Temporary help agency nurses, for example, earn wages that are typically higher than nurses who are regular employees of a hospital, whereas auto supply workers who are employees of temporary agencies typically earn less than regular employees (see Houseman, Kalleberg, & Erickcek, in press).

In addition, there are occupational differences in wages as well as receipt of these kinds of fringe benefits when the type of work arrangement is controlled. Thus, Kalleberg, Reskin, and Hudson (2000) found that women operatives, sales workers, and service workers—nearly one third of all women—experience significantly more bad job characteristics than do female managers. Men and women in more complex (and thus more highly skilled and autonomous) occupations are less likely to obtain low wages and more likely to obtain health insurance and pension benefits from their jobs. Moreover, within part-time workers, men and women in low-skill occupations (and low-end service and sales occupations in particular) earn less and receive fewer health and fringe benefits than members of other occupations (analysis not shown), which provides further support for the idea that there is a duality within part-time employment (Tilly, 1996).

## CONCLUSIONS

Organizations have differed in their responses to pressures to become more flexible: Some have taken the “high road” and adopted high performance work organizations and functional flexibility, whereas others have taken a “low road” and sought to cut costs by treating workers as disposable. A sizeable number of organizations have adopted a mixed strategy and tried to obtain both forms of flexibility simultaneously by protecting a core of functionally flexible workers with a buffer of numerically flexible workers.

These flexible employer strategies have helped to generate great diversity in employment relations, and there has been a proliferation of nonstandard work arrangements. These arrangements represent a potential source of both employment flexibility and uncertainty for employers as well as workers. Nonstandard employment relations are attractive to employers because they may often reduce employment costs in addition to enhancing flexibility. On the other hand, in some cases the use of nonstandard workers may create conflicts with regular employees and thereby diminish cooperation and teamwork.

Whether workers are able to benefit from the growth of nonstandard work arrangements depends on their degree of control over resources such as portable skills. Some workers—such as those employed by the bank divisions studied by Royal and Althausser (2003)—have highly portable skills and hence considerable control over their employment situations, as the bank tried to retain them using sophisticated human resource management strategies. These workers participate in occupational internal labor markets, which are likely to become increasingly important as bases for career progression. Other nonstandard workers, such as those in part-time and temporary positions, may be less likely to exercise much control over their employment situations and thus often are in bad jobs that pay less and do not provide fringe benefits (e.g., Kalleberg, Reskin, & Hudson, 2000).

More research is needed on each of the links in the argument presented in this article. Relatively few longitudinal data are available on the trends in organizations’ adoption of each type of flexibility, much less on the extent to which these employment systems are used simultaneously. The establishment may not be as useful as the firm for studying organizational flexibility because firms may often obtain flexibility by dividing work differently among various establishments, as is the case with profit as opposed to cost centers. To the extent that organizations obtain functional and numerical flexibility by means of their relations to other organizations in networks—as is the case in subcontracting relations or linkages to temporary help firms—the most appropriate unit of analysis may be neither the firm nor the establish-

ment but the network defined by the relationships among the organizations and the labor market intermediaries from which they recruit their workers and subcontract some of their functions.

We also know relatively little about the inequalities associated with membership in core and periphery parts of organizations. Studies are particularly needed of inequalities within as well as between firms, of patterns of mobility between core and periphery sectors, and of differences among temporary help agency workers, independent contractors, and other categories of non-standard workers. It is particularly important to collect data on factors that differentiate occupations within particular kinds of employment relationships, such as autonomy/control and skill portability. Analyses of the portion of inequality that is attributable to employer strategies (such as the creation of nonstandard work arrangements) as opposed to occupational differences (such as the growth of service sector occupations) would help to identify likely points of intervention that might be useful for reducing inequalities in job-related rewards. For example, if inequality is mainly due to employer strategies, then policies designed to discourage the use of contingent workers might be helpful in creating more good jobs. If, on the other hand, inequality results mainly from differences in skill portability, this suggests that attention might more profitably be paid to strengthening institutions that span organizations and enhance worker power such as unions and occupational associations.

My focus in this article has been on the United States, yet cross-national research on flexibility and labor market segmentation is sparse. Comparative research is essential for understanding the effects of workplace restructuring on jobs and workers. Much of the research on organizational flexibility has tended to be firm-centered, which may reflect the very deregulated labor markets and employment relations characteristic of the United States and United Kingdom, where most studies have been carried out. Extending the discussion of organizational flexibility to other countries underscores the importance of considering explicitly the role of the state (e.g., laws and regulations governing trade union influence, employment protection, and the operation of temporary help agencies) and of economic, social, and political institutions in shaping employers' labor utilization strategies. Organizations in all industrial countries need to be flexible to respond to competition, technological changes, and changes in labor force composition, although the types of flexible labor utilization strategies that organizations are likely to adopt will depend on their country's institutional context. For example, whether organizations are apt to use numerical flexibility strategies depends on their country's regulatory regime, such as the amount of protection given to regular, permanent workers and the existence of laws that limit the use of

temporary help agencies to certain kinds of work. Moreover, the likelihood that organizations will adopt functionally flexible labor utilization strategies depends on the existence of institutions that help employers spread the risk of long-term training, development, and innovation in work design, as well as on a high level of trust between managers and workers (see the discussion in Kalleberg, 2001, pp. 493-495).

Understanding the nature and consequences of workplace restructuring for labor market segmentation is a potentially fruitful area for cross-national research and of collaboration between sociologists and economists. The ways in which institutions affect the operation of markets is becoming increasingly urgent given the growing importance of diversity in employment relations for issues ranging from labor market stratification to individuals' work experiences, family relations, and patterns of gender inequality.

## NOTES

1. Contract company employees and on-call employees with regular hours could also be considered to have standard employment relations with their employers.

2. This figure underestimates the percentage of part-time jobs in the economy, because a person could also work part-time in any of the other nonstandard arrangements. Table 3 defines regular part-time jobs as those that are not classified in any of the other nonstandard work arrangements.

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*Arne L. Kalleberg is a Kenan Professor of Sociology at the University of North Carolina at Chapel Hill. He has written more than 90 articles and chapters and has coauthored or coedited six books dealing with topics related to the sociology of work, organizations, occupations and industries, labor markets, and social stratification. His current research addresses issues related to job quality and changing work attitudes in the United States, the meaning of time at work, the matching of persons to jobs, flexible staffing arrangements, family friendly organizations, the nature and consequences of high performance work organizations, and changing employment relations in the United States and Norway.*