What Do Female Jobs Do for Women's Job Continuity? : Occupational Sex Segregation and Women's Job Exits in the U.S.*

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노동시장에서 성별직업분리의 연속성을 설명하는 주요한 논의들은 여성들의 직업선택에 성역할분화가 뿌리깊은 영향을 미치고 있음을 지적하고 있다. 즉, 여성들은 어머니로서의 역할을 보다 수월하게 병행할 수 있는 직업--그것이 모성역할에 보다 호의적이건, 또는 노동시장의 진입과 이탈에 보다 우호적이건--을 선택하는 경향이 강하다는 것이다. 그리고 이러한 여성들의 자녀양육의 책임에 따른 직업선택이 결과적으로 성별직업분리를 영속화시키는 주요한 원인이라는 점을 강조하고 있다. 이러한 이론적, 경험적 논의를 바탕으로, 여성들의 임신과 자녀양육의 영향에 초점을 두고, 본 연구는 성별 직업분리가 여성들의 직업연속성에 미치는 효과를 분석한다. 본 연구는 미국의 National Longitudinal Survey of Youth (NLSY) 1979-1998 데이터를 이용하여 시간연속적 사건사 분석 방법(continuous time event history models)을 적용하여 여성들이 직업을 이탈하는 다양한 유형과 과정을 분석한다. 본 연구결과에 따르면, 여성직종에 근무하는 여성들은 비여성직종에 근무하는 여성들보다 직업을 이탈할 가능성이 더 낮은 것으로 나타났다. 더욱이, 이러한 직업분리도와 여성직업 연속성의 관계는 여성의 자녀양육에 의해 영향을 받지 않는 것으로 나타났다. 자녀를 둔, 또는 임신한 여성들이 직장을 떠날 가능성은 더 많지만, 여성직종에 근무하는 여성들은 비여성직종에 근무하는 여성들보다 노동시장을 완전히 이탈할 가능성은 오히려 낮은 것으로 본 연구결과는 나타내고 있다. 이러한 결과는 기존의 이론적 논쟁점 여성들의 여성직종 선택은 여성성의 표현이고, 그들의 모성역할을 수행하기 위하여 전략적으로 여성직종을 선택한다는 것과 일치하지 않는 것이다. 결론적으로, 본 연구결과는 성별 직종분리가 임신과 육아책임을 수행하기 위한 여성의 경제적 합리성에 근거한 자발적 선택이라는 이론적 논의는 다시 고찰되어야 한다는 점을 강조한다.

핵심단어: 성별직업분리, 여성노동, 자녀양육과 여성취업, 사건사분석

I. Introduction

Although women's labor force participation has increased dramatically in advanced industrial societies over the last several decades, most women workers remain in predominantly female occupations (e.g. Reskin, 1993; Weeden, 1998). Predominant explanations of the persistence of sex segregation links occupational choices to profoundly gendered responses to childrearing and other family demands, arguing that women are more likely to seek jobs which are family friendly (Desai Waite 1991), and involve less in the way of long term commitment to the job (Becker, 1991; Bielby Bielby, 1988). Further, given an expectation that they will leave their jobs for some period to bear and raise children, women may be especially attracted to occupations that are easy to exit and re-enter, entailing little skill depreciation during times away from employment (Mincer Polachek, 1974; Polachek, 1981; England, 1982, 1984). While it is the case that women tend to work fewer hours than men and that female-dominated occupations tend to have flatter earnings trajectories than male occupations, a number of studies have failed to find support for the idea that women are less committed to their jobs or that women's jobs have more family friendly characteristics.

In this paper, I examine the effect of occupational sex segregation on job exits among women, with a special attention to the role of childbearing and child rearing in the United States. For this purpose, I examine the process of job leaving, differentiating job changes from transitions to nonemployment, and evaluate the claim that women and especially mothers in female-typed occupations are more likely to leave their jobs than women in non female-dominated occupations.

II. Theoretical and Empirical Evidences

1. Women's Work Preferences and Occupational Sex Segregation

While employers actions, or demand-side factors, may play a significant role in the allocation of men and women into different sorts of jobs (Bielby Baron, 1986a; Spilerman Petersen, 1999), many scholars argue that workers' preferences may play the most important role in explaining the differences in the kinds of jobs men and women hold (e.g. Polacheck, 1981). Broadly speaking, two theoretical perspectives attempt to explain why women and men prefer different types of occupations: the sex role socialization perspective, and the neoclassical economic explanation.

The socialization perspective holds that men and women internalize sex role appropriate aspirations at any early age. This socialization leads women to avoid male-dominated occupations as inappropriate for their gender, perhaps because they involve tasks or working conditions which are perceived as more suitable for men, including heavy physical labor and hazardous tasks (see, Reskin, 1993 for a review). In this perspective, occupational aspirations are formed as part of the socialization process and occupational choices reflect a gendered identity.

In contrast, the neoclassic economic perspective holds that occupational choices are forward looking and strategic in terms of maximizing lifetime earnings. In this view, workers who anticipate exits from the labor force will strategically seek jobs involving skills which will not readily depreciate during their absence (Polachek, 1979, 1981). Because women more frequently anticipate sporadic employment as a consequence of their family roles and especially childbearing, occupations which minimize the costs of exit and re-entry become female-dominated. Predominantly male occupations, on the other hand, may involve higher earnings and better opportunity for advancement, but require higher commitment and impose a greater penalty on sporadic employment.

While these two perspectives differ in important ways, female-dominated

occupations can be seen to result from women's family roles in both views. In the economic perspective, it is the primacy of maternal roles and the associated expectation of job exits which lead women to develop preferences for certain jobs. In the socialization perspective, it is the gendered identity which for adult women, revolves around maternity which defines which jobs are appropriate, and this in turn may lead women to find jobs which will minimize work's interference with a maternal identity and therefore her family roles.

Surprisingly, however, the bulk of research on family friendly job characteristics fails to support the idea that women's jobs have tangible family friendly characteristics. Existing research indicates that women's jobs do not involve less commitment or effort (Bielby Bielby, 1984; Desai Waite, 1991), are not more flexible and accommodating (Glass, 1990; Glass Camarigg, 1992), and do not experience reduced wage depreciation during job exits which would facilitate sporadic employment patterns (England, 1982). Thus, fundamental questions about the relationship between occupational sex segregation, maternal roles, and job exits remain.

2. Occupational Characteristics, Gender, and Job Transitions

Childbearing is associated with labor force exits, but the family cycle is not only reason why women might quit a job, transition to a new job, or withdraw from the labor force. Chances for advancement, job satisfaction, wage rates and other job characteristics play an important role in shaping job transitions in general and these kinds of characteristics are differentially distributed among male and female dominated occupations. Women may experience higher rates of job exits in part because their jobs tend to lack the kinds of characteristics that encourage job retention, including high wages, high probabilities for advancement, and pleasant working conditions (e.g. Reskin, 1993; Felmlee, 1984; Glass, 1988; Glass Estes, 1997; Lichter Landry, 1991; Desai Waite, 1991). Indeed, job transitions among women appear to be more strongly linked with job characteristics such as these than to family characteristics (Glass Estes, 1997; Glass Riley, 1998; Rosenfeld Spenner,

1992).

However, the relationship between occupational characteristics and job transitions may itself be shaped by gender, and, given a decision to exit a job, gender may shape the choice between making a job-to-job transition and making a more extended departure from market work altogether. For example, Wharton and Baron (1984) suggest that women in female-typed jobs have low levels of job satisfaction which has a negative effect on their psychological well-being. They argue that this depressed psychological state may cause women to withdraw from the labor force rather than change to another job as a similarly situated male might do. Further, while male-dominated jobs tend to have more appealing remuneration and work conditions, women in these sex-atypical occupations tend to experience fewer of these benefits than their male counterparts (e.g. Kanter, 1977). This too may lead to a higher rate of withdrawal from market work among women in male-dominated occupations when compared to men.

Social support also may be a crucial element in women's work commitment. While a few studies have found no association between the proportion of female employees or the proportion of mothers in each occupation and women's job transitions surrounding childbirth (Glass Riley, 1998; Desai Wait, 1991), researchers continue to argue that women in predominantly male jobs encounter difficulty in finding role models for combining motherhood and face discouragement in doing so from male coworkers (Glass Riley, 1998). A lack of social as distinct from structural supports may cause women and especially young mothers in male-dominated job to withdraw from the labor force, provided sufficient alternative sources of income in the family such as spousal earnings. Alternatively, new mothers facing strains associated with the costs of an additional dependent in the family might seek to acquire and retain male-typed occupations because of the higher wages they frequently involve (Rosenfeld Spenner, 1992).

Together, this literature suggests that women in female- and non female-dominated occupations may have very different patterns of job exits, and this relationship may be especially enhanced when women are, or become, mothers.

3. Research Questions

In this study, I examine the effect of occupational sex segregation on women's employment transitions with a focus on the effect of child bearing and child rearing on women's job transitions, including both job-to-job transitions and sustained exits from market work. While many previous studies of women's employment behaviors and fertility have focused on the pattern of women's exit and re-entry before and after first childbirth, I examine all job transitions among both mothers and non-mothers, looking at child bearing and child rearing as one life course event. Following the arguments that women's occupational choices result from anticipated events surrounding childbearing (Becker 1981; Polackek 1981), I examine both the effect of sex-type on job exits as well as the interaction effect of sex-type and childbearing on job exits, distinguishing between job transitions (taking on a new job) and job exits (experience a sustained exit from market work).

Ⅲ. Data

I draw on data from 1979 through 1998 waves of the National Longitudinal Survey of Youth (NLSY), a panel study of 6,283 young women who were aged 14-22 at the time of the 1979 interview, and who are 33 to 41 in the 1998 wave. The NLSY has considerable appeal owing to it's large sample size and the large number of waves over a demographically dense period of the life course, but is particularly attractive for this research project because at every interview the NLSY collects detailed information on up to five jobs (per year). This information includes exact start and exit dates, hourly wages, weekly work hours, occupation, industry, and union status. From the data we construct person-period files which reflect continuously time-varying measures of occupational and family characteristics. These files, in turn, are used to estimate continuous-time event historical models. This process is described further below.

1. Dependent Variables

Job exit model has two distinct outcomes: exits from the labor force, defined as a job exit followed by at least a month of nonemployment; job-to-job transitions, defined as a job exit followed by a new job within a four week period. While previous research examined only the process of job transitions in general (Desai Waite, 1991; Glass, 1988) or of job change from the first to the next job by the types of occupations (Rosenfeld Spenner, 1992), this study aims at identifying the causal relationship of the types of occupations on recurrent job transitions as well as overall transitions. Previous studies on women's employment behaviors and fertility focused on the pattern of women's exit before and after first childbirth. Rather than focusing on a single job transition from a certain firm or around a pivotal event, such as first childbirth, I model all job transitions of women, conceptualizing job transitions as a multiple-failure typed event. For the 6,283 young women we observe in the NLSY, we observe 26,338 job exits over the 18 year period; roughly two-thirds of those are job-to-nonemployment transitions, and the remaining one-third are rapid job-to-job transitions.

2. Occupational Characteristics

To examine occupational sex segregation, I use 3-digit detailed occupational categories in the NLSY merged with longitudinal information from the Bureau of Labor Statistics identifying the percentage of women in each occupation. In classifying the types of occupations, I modify previous research (e.g. Bielby Baron, 1986b, Wharton Baron, 1987). While those studies classified occupational types as three: female-typed (greater than 70 percent female), mixed (20 70 percent female) and male-typed occupations (less than 20 percent female) based on percent female in each occupation, I generate a binary measure of occupation gender type, grouping occupations into the following categories of sex composition: predominantly female occupations (greater than 70 percent female) and non predominantly female occupations (less than 70 percent female). Since this study primarily concerns how

female-dominated occupations shape women's work behaviors, I expect that dichotomous types of jobs will better capture and contrast the effect of the types of occupations on job transitions among women.

To control for the effect of other, related occupational characteristics, I also include measures of respondent's hourly earnings, weekly work hours, actual work experience, job duration with one employer, global job satisfaction, and union membership at each job. Numerous studies have argued whether working conditions rather than family events are more decisive in women's making a decision to continue to work (Desai Waite, 1991; Felmlee, 1995; Glass, 1988; Glass, 1990; Glass Riley, 1998). Therefore, the occupational characteristics of each job will identify what factors, occupational characteristics or family events over the life cycle, are most influential in shaping women's decision to commit to a job.

3. Individual and Family Characteristics

A major interest of this study is to examine the effect of occupational characteristics on women's job transitions during the years of child bearing and child rearing. Therefore, I include three measures of maternity status: an indicator of whether or not the respondent is currently pregnant[1] (as evidence suggests that a large proportion of maternity related job exits occur before birth), an indicator whether or not the respondent currently has a child under the age of four, and a measure of the number of children over 5. By looking at three stages of child bearing and child rearing respectively, I can capture the dynamic effect of the family life cycle on women's job transitions.

I look at the maternity status at one's last job exit instead of current maternity status of women in the re-entrance model. As some studies evidenced that women who stayed longer at a job when they are pregnant tend to return to their work sooner (Desai Waite, 1991; Glass, 1988), the

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1) The NLSY data set does not provide directly the date of the onset of a pregnancy. We created the pregnancy measure by subtracting 32 weeks from the date of birth. Thirty-two weeks is shorter than the average period of gestation, but women typically become cognizant of a pregnancy only after four to six weeks. We expect that the vast majority of pregnancy related decisions would occur after this point in time.

timing of job exit upon the change in maternity status is a significant indicator to predict women's work behaviors. While studies found the effect of pregnancy on women's job transitions, there is little evidence on the effect of the presence of preschool aged children and/or the number of children at the job exit on the process of the re-entrances. The presence of baby and/ or the number of children may have divergent effects on women's job re-entrance. Since women get older, on the one hand, when their children become age 5 or older, their re-participation to the labor force may be discouraged due to the limitation of appropriate jobs for older mother workers. In addition, mother's quitting a job when their children are school aged may indicate a complete withdrawal or discouragement because school-aged children are assumed to hamper less than younger children mother's work activities. On the other hand, mother workers who went through pregnancy period may return to work sooner after a shorter period of time-bind to childcare responsibility partially due to increase in the economic needs, given the tendency that the proportion of women's sharing with their husband or partner in the family economy has been increased. Based on those theoretical considerations, I assume that the timing of job exit given maternity status reflects women's aspiration for long-term career and thus we expect the maternity status at the job exit rather than current status to predict better the timing of re-entrances to the labor force and the types of jobs women choose upon re-entrance.

In addition to occupational characteristics and measures of maternity status, I include controls for race (white, black, and other), education and spousal earnings. Several studies have found that women are more likely to withdraw from the labor force when they have additional income resources in the family (Desai Waite, 1991; Felmlee, 1984; Glass, 1988), and husband's income is most often the major source of non-earned income resources available to women which could facilitate exits from and delay re-entrance to the labor force. Education is measured here with two dummy variables flagging high school drop-outs and those who proceeded beyond high school, to distinguish these groups from high school graduates.

I do not include a direct measure of age in our models. While age may

have important moderating effects on the relationships we examine here, we could not include both age and a measure of total actual work experience in our models without generating collinearity problems. Because work experience is robustly associated with the tendency to remain in a job and because age effects are difficult to interpret in a single cohort study, we use total actual work experience instead of age in the results presented here.

Ⅳ. Method

For our continuous time event historical models, I construct a person-period file in which each record represents a given individual over some interval in which the variables of interest (including job, education, maternal status, and marital status) remain static. Multiple records represent variation over time in a woman's characteristics. For example, each time a woman begins or ends a job, becomes pregnant, or has a baby, a new record is written to the person-period file with appropriate start and end dates in addition to, for example, time-varying spell-specific characteristics such as wage rate. With respondent identifiers for each record, the person-period data file represents each NLSY woman's experiences over the nearly two decades of the NLSY. For our analysis of employment exits, I consider only those spells in which women are at risk for leaving a job; that is, all spells of employment.

I used Gompertz proportional hazard model, which assumes the effects of the covariates on the hazard rates of labor market transition is proportional through the observation periods. The model is of the form:

$$h_i(t) = h_0(t) * \lambda_i, \quad where \ \lambda_i = \exp(X_i \beta) \tag{1}$$

where is the baseline hazard, is a vector of individual characteristics, and is a vector of regression coefficients. In a proportional hazard (PH) model, scales the baseline hazard by the same proportion at each value of t (Blossfeld Rohwer, 1995).

Since this study assumes that the transitions from job to non-employment may differ from transition from job to another job and the causal process of each event follows independent routes from each other, we use 'independent competing risk model' (see, Hachen, 1988 for details). In a model of employment duration, I may wish to examine not only time until exit from employment by whatever route, but also about time to exit from employment to another job, and compare this with this time to exit from employment to economic inactivity (out-of-labor force). Independent competing risk models provide a method of addressing such issues. The model is of the form:

$$r_j(t) = \exp(a_j + b_{ij}X_i)$$
(2)

where j is the number of different types of events.

V. Results

Statistics describing the characteristics of our person-period data file are described in Table 1 for job exit models and Table 2 for job re-entrance models. Note first that nearly 73,000 spells of employment have been constructed from the 6,283 women observed over nearly two decades from whom I draw data. In the job exit model, 51% of the records are associated with female-dominated occupations and 49% with non female-dominated occupations (36% with mixed-sex occupations, and the remaining 13% with male dominated occupations in Table 1). In the descriptive statistics in Table 1, there is no significant difference in the rate of job exits between female dominated and non female dominated occupations: 36% of spells both in female-dominated and non female-dominated jobs ended with a job exit. Further, the proportion of job exits to nonemployment from female-dominated jobs is not significantly larger than that in non female-dominated jobs (22% versus 23%).

Women in female-dominated jobs appear to be slightly more likely to

become pregnant (7% as compared to 6% in other occupations) and have higher probability of the presence of babies at home, but have fewer children over the age of five, on average. This may be because women with more children enter non female-dominated occupations which provide higher wages than female-dominated occupations do to compensate the expense for childrearing. I also find that women in periods of employment in female-dominated occupations have fewer years of experience than women in other occupations (8.39 years as compared with 9.05 for women in non female-dominated), but the difference is not statistically significant. Women in female dominated occupations are less likely to have some college education, stay shorter with same employer, and work fewer hours than women in other occupations. Perhaps as a function of education, work hours, and tenure differentials, women in periods of employment in female-dominated occupations also earn less (though with more variation) than women employed in non female-dominated occupations.

To examine the patterns of women's job leaving in a multivariate format, we estimate event historical models. These results are presented in Table 2. The first set of three columns of Table 2 represents models predicted job exits of any type. The next two sets of models distinguish between job-to-job transitions and job-to-nonemployment transitions. For each of these three sorts of outcomes, I estimate three models. Model I includes on the gender-typing of the occupation among the occupational characteristics, but includes individual and family background controls. Model II add controls for other job characteristicssuch as wages, hours worked, and job satisfactionto examine the effect of occupational sex segregation on job exits net of the other characteristics of jobs that are associated with gender. Finally, Model III adds interaction effects between the gender-type of the occupation and our measures of maternity status (pregnant, pre-school aged children, and number of children over the age of 5). These final models address the question of whether female- or non female-dominated occupations are especially likely to lose mothers.

Motherhood and Job Transitions

Reading across the top panel of Table 2, the results indicate that maternity status is important predictor of job transitions, but perhaps not in the way I had anticipated. First, women who are pregnancy are less likely to experience a job exit (e.g. the coefficient of -.227 in Model I). This may at first appear surprising, but it is not unanticipated given that job exits are comprised of both job-to-job transitions and job-to-nonemployment transitions; pregnant women are more likely to make only the latter kind of departure from a job (e.g. 0.10 in Model I of Job-to-Nonemployment Transitions). This tendency to leave the labor force, however, is more than compensated by pregnant women's far reduced tendency to switch to an alternative job (e.g. 1.199 in Model I of Job-to-Job transitions).

However, the situation changes fairly rapidly after the child is born. Women with very young children are more likely to make job exits, at least once controls for job characteristics are considered (see Model II under Job Exits of Any Kind). Again, this is primarily because they leave employment for non-employment (.106 in Model I and .121 in Model II under Job-to-Nonemployment); young mothers remain slightly less likely to switch to a new job (-0.097 and -.068 are statistically significant in the job-to-job transitions analyses). Mothers with school-aged children are also more likely to exit a job, and at this life stage they are more likely to make job-to-job transitions in addition to being more likely to leave work for non-employment. Indeed there may be two differing causes among those mothers to generate this seemingly contradictory work behaviors: one is that they may need more financial sources to compensate child-related costs and thus they are more likely to change jobs rather than exiting from the labor force when they have some pent-up demand for young children. The other cause is that those women may be unwilling to hold jobs that may not be worth retaining in the face of competing pressures from intensive childcare responsibility, especially if alternative income sources are available (for instance, from a spouse's earnings). Jobs that pay poorly, have low status, or otherwise offer few rewards may not provide the kinds of incentives required for a worker to resist pressures to leave.

Occupational Sex Segregation and Job Transitions

Turning to the effects of occupation type, my multivariate models indicate that women in female-typed occupations are more likely to leave their jobswhether for another job, or for non-employmentthan women in non female-dominated jobs. However, this effect is rather reversed a great deal when controls are introduced into the model (e.g. 0.064 versus -.053 in model of all job exits; 0.039 versus 0.082 in model of job-to-nonemployment), and remains statistically significant in the models of all job exits and job-to-nonemployment. Again, this result is inconsistent with the idea that female dominated occupations are somehow linked to higher rates of transitioning out of market work (Becker 1991; Polachek 1981). Rather, the relationship found here is more consistent with the idea that women find employment in non female-dominated occupations difficult to sustain.

Besides that my results indicate that women in female-dominated occupations are more likely to leave work, the remainder of my findings are also consistent with the previous studies in finding that women who secure the kinds of benefits that non female-dominated occupations are supposedly offer are more likely to stay on the job. Women with higher earnings, more job satisfaction, more work experience, and union membership at the workplace are less likely to change a job and withdraw from the labor force.

Previous studies suggest that women are less likely to change a job as they work longer hours, perhaps because women who work long hours are select of work-oriented women. We find that women who work more hours are less likely to make the transition out of market work entirely, but are significantly more likely to make job-to-job transitions. These presumably work-oriented women may be seeking new jobs for enhanced promotion possibilities or other benefits, like flexibility.

Motherhood, Occupational Sex Segregation and Job Transitions

As described above, the results in Table 2 indicate that maternity status does shape women's transitions out of jobs, with mothers being more likely

than non-mothers to leave market work for an extended period. However, Models I and II in Table 2 do not address how occupations of different types (non female-dominated or female-dominated) moderate the relationship between maternity and job exits. If it is the case that female-typed occupations are somehow more mother friendly, either because the nature work itself is easier to integrate with motherhood or because the social environment is more supportive of motherhood, we should expect to find that women in female-dominated jobs should exhibit a stronger attachment to the labor force when they are pregnant or have young children than women in other types of jobs. The interactive models, Model III under each of the three sub-headings, examine this hypothesis. Because the six interaction effects are difficult to interpret straight off the table, Figure 1 presents the net effects of maternity and occupation type as compared to the reference category of non-mothers in non female-dominated occupations.

Considering women without any children and who are not pregnant, I observe some effect on occupational sex-segregation on job exits except for those women who made job-to-job transition. Even when women are not pregnant, women in female-dominated jobs are less likely to exit from the labor force (job-to-nonemployment transition in Figure 1). With pregnancy, women in all occupations are less likely to transition to a new job, but there are differentials by occupation type in the tendency to leave market work altogether. Inconsistent with the argument that mothers in female-typed occupations take advantage of more favorable work condition to integrate between paid work and motherhood (Polachek 1976), I find that pregnant women in female-dominated occupations are more likely than women in other occupations to leave their jobs for nonemployment. However, mother of children who are a baby or school aged children in female-typed occupations are less likely to leave market work than women in non female-dominated jobs. These findings are consistent with the previous study which argues that women in male-dominated occupations may lack role model and/or social support from coworkers or supervisors in combining work and motherhood (Glass and Riley 1998). Not only considering some arguments in previous studies which emphasized the status of pregnancy as a pivotal point of

women's long-term orientation (Desai and Waite 1991; Felmlee 1984; Felmlee 1995; Glass and Riley 1998), the presence of younger children and/ or the number of children at home need to be taken into consideration as a significant barrier of mother workers especially in non female-typed occupations.

VI. Summary and Discussion

Perceptions of female workers as unstable or uncommitted to the work role entail substantial costs to the worker. Real or presumed differences in work commitment, work productivity, and associated low levels of accumulated work experience have been cited as major factors underlying women's low wages, employment in gender-segregated jobs, and limited promotion opportunities (Felmlee 1995; Royalty 1998). While some may argue that these differences stem from essential differences between women and men, predominant theoretical models link these characteristics of women's employment to their family roles. Indeed, in theory, it is the primacy of family roles in women's lives which drives them disproportionately to some occupations (which become female-dominated) and away from other (which in turn become male-dominated).

This study offers no support to this general model of occupational sex segregation's causes and effects. Contrary to the human capital based arguments from neoclassical economists, I find that women in female-typed demonstrate a reduced tendency to make job exits of any kind, including job exits for non-employment. This clearly suggests that the model of occupational sex segregation which emphasizes the mechanics of job exits among women is misguided.

My results are also not consistent with the claim that female-dominated occupations offer something to women that is more supportive of the maternal role than male-typed jobs. While I observed that pregnancy was somewhat more common among women in female-dominated jobs, women in those jobs

who did get pregnant were likely to leave market work altogether.

Considering the process of job exits, I found two differentiated effects of maternity status by the types of occupations on the job transitions. In the exit process the presence of baby and the number of school aged children cause a higher probability of job separation than the pregnancy state except for job-to-job transitions. Especially, women in non female-typed occupations are far more likely to withdraw from the labor force when they have a baby or more children at home. Given longer work hours in non female-dominated occupations, women with at least one preschool aged child and/or more, older children may feel sharper time-constraint from childcare responsibility than pregnant women, and thus they are more likely to take time off from the market work.

While this study has found no support for the idea that occupational sex segregation comes from women's strategic choice given their childrearing role, it is still necessary to examine the process of return to market work to completely test the Polachek's idea. Thus, future study may focus on the both processes of job exits and re-entry in association with occupational sex segregation and maternal role. By doing so, we can expect to explain whether women choose female-typed occupations in order to combine their dual role.

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Table 1. Descriptive Statistics for Job Exits, NLSY 1979-1998

Variables	Total		Female-typed Occupations		Non-female-typed Occupations	
	Mean	Std.Dev.	Mean	Std.Dev.	Mean	Std.Dev.
	(No.of Spells:72895)		(No.of Spells:37426)		(No.of Spells:35469)	
Types of Transitions						
Job Exit of any kind (%)	0.36	0.48	0.36	0.48	0.36	0.48
Job-to-Job Transition (%)	0.14	0.34	0.14**	0.35	0.13**	0.34
Job-to-Nonemployment (%)	0.23	0.42	0.22+	0.42	0.23	0.42
Maternity Status						
Pregnant (%)	0.07	0.25	0.07*	0.25	0.06*	0.25
Pre-school aged child (%)	0.26	0.44	0.26**	0.44	0.25**	0.43
Number of children over 5	0.44	0.85	0.39**	0.79	0.50**	0.91
Job Characteristics						
Female-typed Occ.(%)	0.51	0.50	-	-	-	-
Non Female-typed Occ. (%)	0.49	0.50	-	-	-	-
Actual work exp. (in years)	8.71	6.04	8.39	6.04	9.05	6.03
Logged hourly wage	1.63	0.58	1.59**	0.59	1.68**	0.58
Weekly work hours	35.02	11.89	33.83**	11.60	36.28**	12.06
Global job satisfaction	3.21	0.85	3.22	0.86	3.21	0.85
Union membership (%)	0.13	0.34	0.12**	0.33	0.14**	0.35
Tenure (in months)	30.97	36.43	29.35**	35.02	32.69**	37.78
Controls						
Married (%)	0.42	0.49	0.42**	0.49	0.44**	0.50
Logged spouse earnings	4.06	4.76	3.99**	4.75	4.13**	4.77
White (%)	0.72	0.45	0.73**	0.45	0.71**	0.46
Black (%)	0.23	0.42	0.22**	0.41	0.24**	0.43
Others (%)	0.05	0.21	0.05	0.22	0.05	0.21
Education <12 (%)	0.16	0.36	0.15**	0.36	0.16**	0.37
Education =12 (%)	0.43	0.49	0.44**	0.50	0.42**	0.49
Education >12 (%)	0.42	0.49	0.42**	0.49	0.44**	0.49

Note: *p<0.05; **p<0.01

Table 2. Event History Gompertz Models of Job Exits, Job-to-Job Transitions, and Job-to-Nonemployment Transitions

Variables	Job Exit of Any Kind			Job-to-Job Transitions			Job-to-Nonemployment Transitions		
	I	II	III	I	II	III	I	II	III
Maternity Status									
Pregnant	-0.227**	-0.276**	-0.162**	-1.199**	-1.262**	-1.138**	0.100**	0.038	0.150**
	(0.03)	(0.04)	(0.04)	(0.07)	(0.11)	(0.11)	(0.03)	(0.05)	(0.05)
Pre-school aged child	0.033*	0.055*	0.035	-0.097**	-0.114**	-0.123**	0.106**	0.143**	0.118**
	(0.02)	(0.02)	(0.02)	(0.03)	(0.04)	(0.04)	(0.02)	(0.03)	(0.03)
Number of Children over 5	0.096**	0.106**	0.251**	0.032*	0.037*	0.177**	0.131**	0.142**	0.289**
	(0.01)	(0.01)	(0.01)	(0.01)	(0.02)	(0.02)	(0.01)	(0.01)	(0.01)
Job Characteristics									
Female-typed Occupation	0.064**	0.081**	-0.066**	0.108**	0.104**	-0.027	0.039*	0.063**	-0.094**
	(0.01)	(0.02)	(0.02)	(0.02)	(0.03)	(0.03)	(0.02)	(0.02)	(0.02)
Non Female-typed Occupation (Reference)		-	-		-	-		-	-
Actual Work Experience		-0.246**			-0.136**			-0.300**	
		(0.00)			(0.01)			(0.01)	
Actual Work Experience^2		0.006**			0			0.008**	
		(0.00)			(0.00)			(0.00)	
Tenure		-0.031**			-0.037**			-0.028**	
		(0.00)			(0.00)			(0.00)	
Tenure^2		0.000**			0.000**			0.000**	
		(0.00)			(0.00)			(0.00)	
logged Hourly Wage		-0.114**			-0.087**			-0.130**	
		(0.01)			(0.02)			(0.02)	
Weekly Work Hours		0			0.002**			-0.001*	
		(0.00)			(0.00)			(0.00)	
Global Job Satisfaction		-0.170**			-0.209**			-0.149**	
		(0.01)			(0.01)			(0.01)	
Union		-0.235**			-0.295**			-0.200**	
		(0.02)			(0.03)			(0.03)	

Table 2. Event History Gompertz Models of Job Exits, Job-to-Job Transitions, and Job-to-Nonemployment Transitions, *continued*

Variables	Job Exit of Any Kind			Job-to-Job Transitions			Job-to-Nonemployment Transitions		
	I	II	III	I	II	III	I	II	III
Controls									
Married	0.838**	0.834**	-0.635**	1.172**	1.169**	-0.354+	0.631**	0.627**	-0.807**
	(0.11)	(0.11)	(0.12)	(0.18)	(0.18)	(0.19)	(0.14)	(0.14)	(0.15)
logged Spouse earnings	-0.125**	-0.125**	0.070**	-0.168**	-0.168**	0.032	-0.098**	-0.098**	0.093**
	(0.01)	(0.01)	(0.01)	(0.02)	(0.02)	(0.02)	(0.01)	(0.01)	(0.02)
Black	-0.098**	-0.099**	-0.149**	-0.260**	-0.260**	-0.292**	-0.005	-0.005	-0.063**
	(0.02)	(0.02)	(0.02)	(0.03)	(0.03)	(0.03)	(0.02)	(0.02)	(0.02)
Others	-0.016	-0.016	-0.007	-0.107*	-0.106*	-0.104*	0.036	0.036	0.051
	(0.03)	(0.03)	(0.03)	(0.05)	(0.05)	(0.05)	(0.04)	(0.04)	(0.04)
Education < 12	0.344**	0.342**	-0.249**	0.199**	0.198**	-0.345**	0.423**	0.421**	-0.193**
	(0.02)	(0.02)	(0.02)	(0.03)	(0.03)	(0.03)	(0.02)	(0.02)	(0.02)
Education > 12	0.002	0.002	0.287**	0.067**	0.067**	0.315**	-0.041*	-0.040*	0.264**
	(0.01)	(0.01)	(0.01)	(0.02)	(0.02)	(0.02)	(0.02)	(0.02)	(0.02)
Interaction Terms									
Female occupation* Pregnant		0.091+	0.09		0.114	0.101		0.114+	0.118+
		(0.06)	(0.06)		(0.14)	(0.14)		(0.06)	(0.06)
Female occupation* Preschooler		-0.041	0.035		0.03	0.102*		-0.071*	0.007
		(0.03)	(0.03)		(0.05)	(0.05)		(0.04)	(0.04)
Female occupation* Children		-0.023+	0		-0.012	0.005		-0.025	0.002
		(0.01)	(0.01)		(0.02)	(0.02)		(0.02)	(0.02)
Constant	-3.713**	-3.722**	-1.430**	-4.593**	-4.591**	-2.558**	-4.249**	-4.261**	-1.842**
	(0.02)	(0.02)	(0.04)	(0.02)	(0.03)	(0.06)	(0.02)	(0.02)	(0.04)
Number of Spells	26338	26338	26338	9877	9877	9877	16461	16461	16461
Total Number of Spells	72854	72854	72854	72854	72854	72854	72854	72854	72854
X^2	1701.73	1709.21	22137.51	1305.91	1307.23	9314.27	1123.96	1133.43	14085.39
-2(Log-Likelihood)	166673.404	166665.93	146237.632	78422.316	78421.00	70413.956	122353.92	122344.452	109392.494
df	10	13	21	10	13	21	10	13	21

Note: (1) Standard errors in parentheses
(2) ** $p < 0.01$
 * $p < 0.05$

Figure 1. Event History Gompertz Model Effects on Job Exits, Job-to-Job Transitions, and Job-to-Nonemployment Transitions, by Maternity Status and Occupation Type

Job Exits of Any Kind

Job-to-Job Transitions

Job-to-Nonemployment Transitions