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Working Around the Military

Challenges to Military Spouse Employment and Education

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Prepared for the Office of the Secretary of Defense

Approved for public release; distribution unlimited

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The research described in this report was sponsored by the Office of the Secretary of Defense (OSD). The research was conducted in the RAND National Defense Research Institute, a federally funded research and development center supported by the OSD, the Joint Staff, the unified commands, and the defense agencies under Contract DASW01-01-C-0004.

Library of Congress Cataloging-in-Publication Data is available for this publication.

ISBN: 0-8330-3656-4

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Cover design by Eileen Delson La Russo

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Published 2004 by the RAND Corporation
1700 Main Street, P.O. Box 2138, Santa Monica, CA 90407-2138
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Preface

This study responds to the recognition that the majority of military spouses have paid employment, but that neither the Department of Defense nor other organizations, such as military family advocacy groups, understand which occupations military spouses pursue, their motivations for work, or their perceptions of how the military lifestyle has affected their employment or education. This report provides a rich analytical understanding of military spouses' employment and educational status, drawn from robust quantitative data, while also incorporating the input from more than 1,100 military spouses who participated in interviews in the context of this research. The title of this report is intended to reflect the challenges to military spouse employment and education inherent in their proximity to the military as well as the many accommodations to the military lifestyle reflected in the spouse comments herein.

This report should be of interest to military policymakers, the analytical community that studies military families, the proponents for military families, and military service members and their spouses.

The research was conducted for the Office of the Secretary of Defense within the Forces and Resources Policy Center of the RAND National Defense Research Institute, a federally funded research and development center sponsored by the Office of the Secretary of Defense, the Joint Staff, the unified commands, and the defense agencies. Margaret Harrell served as the principal investigator. Comments are welcome and may be addressed to Margaret Harrell at Margaret_Harrell@rand.org. For more information on the Forces and

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Summary

Background

Successful recruiting and retention of the active duty force relies in large part on the extent to which service members and their spouses experience both job satisfaction and contentment with life in the military. In his February 12, 2001, speech at Fort Stewart, Georgia, President Bush acknowledged the importance of caring not just for service members but their entire families, pledging, "We owe you and your families a decent quality of life. . . . [Service members] deserve a military that treats them and their families with respect."

A major challenge to ensuring familywide quality of life is overcoming the hurdles to military spouse employment. Data indicate that the majority of military spouses are in the workforce; however, research indicates that they have difficulty finding jobs and that limited career opportunities for military spouses may be a factor in military personnel leaving the service.

Given its impact on service member contentment and retention, spouse employment and education is thus an area of significant concern to the military. This study seeks to (1) provide a richer and more detailed depiction of military spouse employment and earnings, (2) explore the degree to which employment is problematic for military spouses, and (3) identify policies to reconcile spouse employment issues with the military's need to retain qualified personnel.

Perhaps most importantly, this study seeks to address the *ground truth*, or actual reality, of military spouse employment and education, based on the analysis of available data, as well as the *personal perceptions and experiences* of military spouses, based on a new quantitative and qualitative data set gathered from interviews with more than 1,100 military spouses.

Who Are Military Spouses?

A question that has often emerged in past research of military spouses is whether military spouse employment difficulties can be traced to the demographic features of military spouses, such as the fact that they tend to be younger, thus affecting their earnings and employability. Or are their employment conditions a result of other, less-manifest factors, such as the challenges posed by the military lifestyle (e.g., frequent moves, often to locations with labor market limitations) or the possibility that military spouses have less of a "taste" for work and thus are self-selecting a lifestyle that is more conducive to staying at home to rear children.

To help answer these questions, this study sought to consider the impact of military spouses' *observed* characteristics, such as age, educational level, and number and age of children, as well as *unobserved* factors, such as a spouse's taste for work, employer biases against military spouses, and the impact of military demands on service member families.

In terms of the observed characteristics of military spouses, analyses of the existing quantitative data assembled for this study indicate that military spouses do have different characteristics than civilian spouses. Specifically, military spouses, compared with civilian spouses, are, on average:

- younger.

And are more likely to

- be racial or ethnic minorities
- have graduated from high school or have some college experience
- have young children at home
- experience frequent long-distance relocations
- live in metropolitan areas.

Some of these characteristics, such as the high likelihood that military spouses have some college and that they live in metropolitan areas, are counter to general perceptions or stereotypes of military spouses and the military lifestyle.

Given these demographic features, the researchers next turned to the issue of employment to consider whether military spouses do in fact fare less well in the workforce. Analysis of the existing data sets yielded the following findings.

Military Spouses Are Less Likely to Be Employed, and Those Who Do Have Jobs Earn Less

An examination of employment status indicates that military spouses are less likely to be employed and more likely to be unemployed (i.e., seeking work) than the average civilian spouse. Military spouses who do work earn lower hourly wages than civilian spouses, both at a national level and when compared with their neighbors.

In light of these findings, the researchers approached the issue of whether these conditions are the result of the spouse's observed characteristics. That is, are they less likely to be employed, or do they earn lower wages simply because they are younger, move more frequently, and are more likely to have young children? Do these characteristics fully explain the employment differences between military and civilian spouses?

Civilians with Same Characteristics Fare Better in Workforce

When the research team compared military spouses with civilian spouses who share their same observed characteristics, it found that these civilian "look-alikes" generally fared better than both the military spouses and the civilian average. In other words, the characteris-

tics of military spouses suggest that they should have *better* outcomes than the average civilian spouse. Instead, however, they are employed at much lower rates due to some combination of effects from unobserved factors.

The same is true for wages. Military wives who are employed make less than do civilian wives. This is true when compared with the national average as well as when military wives are compared with their civilian neighbors. This finding is important, because it addresses the prior assertion that the discrepancy could be explained by residence, in that military wives may tend to live in areas with lower wages. Instead, we find that military wives make less than civilian wives who live in the same areas. Further, these income disparities cannot be explained by the characteristics of military spouses, which would suggest that Army, Air Force, and Marine Corps spouses should earn approximately $2 per hour more than they do and that Navy wives should earn $1 more per hour. Thus, unobserved factors are costing military spouses $1–2 an hour.

So what are these unobserved factors, and are there steps that the military can take to improve? To answer these questions, the researchers sought a closer look at the interaction of those less manifest, quantifiable features. To do so, they turned to the perceptions and experiences of military spouses themselves. Specifically, the team conducted interviews with more than 1,100 military spouses to explore in-depth what previously existing data could not show, such as reasons for working or staying at home, experiences in or out of the labor market, and what the spouses themselves believe about the impact of military life on their employment and educational opportunities.

What Do Military Spouses Do? Why Do They Work? Why Do They Choose to Stay Home?

Past research (e.g., Hosek et al., 2002) has posed various hypotheses regarding why military spouses' labor force participation and earnings differ from their civilian peers, such as the view that military spouses

(1) prefer not to work, (2) have difficulty reconciling the schedule and demands of the military lifestyle with work, (3) are unable to work while satisfying volunteer and other role demands, and (4) are hampered by their frequent moves. The findings from the interviews address these hypotheses.

Occupational Choices Mirror Those of Civilian Spouses

The researchers found that military spouses' occupational choices are, in general, very similar to those of civilian spouses, suggesting that, in terms of occupational choice at least, military spouses are not being deterred from their desired careers. For example, the jobs held most commonly by both military and civilian spouses are lower-paid administrative jobs. Still, there are differences, primary among them the fact that military spouses appear more inclined to accept or seek retail positions and are much more likely to work in child care. Military spouses also have less of a grip on the higher-paid administrative positions that rank second among civilian spouses and are less prone to work in male-dominated blue-collar occupations than are civilian wives. However, teaching and health care, occupations that are generally perceived to require certification or licensing, are similarly ranked among both military and civilian wives. Of those occupations, teaching is notable, as it ranks as the fourth most common job for both comparison groups (and first among senior officer spouses and military spouses with graduate degrees).

Education, Financial Status, and Service Member's Pay Grade Contribute to Motivations for Working

In our sample, about 75 percent of spouses who were either employed or seeking work mentioned financial reasons for working, with working to pay bills and cover basic expenses as the most widely cited primary reason for working. Additional financial motives were working for long-term savings and for extra spending money. The majority of spouses also discussed nonmonetary motives: Working to avoid boredom and keep busy was the most frequently cited nonmonetary reason. Other motives included personal fulfillment and

independence, maintain their skills and career status, and to obtain a return on their education.

Spouses' motivation for working varied based on the pay grade of the service member, the family's financial situation, and the education and occupation of the military spouse. For instance, spouses in clerical or retail positions were more inclined to mention working to pay the bills, as were spouses of junior enlisted and mid-grade enlisted personnel. Spouses with less education and in more-challenging financial circumstances also tended to cite financial necessity as a reason to work. In contrast, working for personal fulfillment and independence was a nonfinancial reason that was widely cited by better-educated spouses and those in higher pay grade categories. Almost 40 percent of spouses with graduate degrees regarded personal fulfillment as their most important reason for working, making it the only education category in which financial necessity was not the most frequently cited primary incentive.

Since pay grade, education level, and family finances are often intertwined, it can be difficult to tell which factors, when considered in isolation, truly explain the type of spouses that provided a specific work motive. To address this concern, we conducted more-sophisticated statistical analyses to assess their effects simultaneously. In the case of the financial necessity motive, this type of analysis revealed that education does not have an independent effect when considered in conjunction with pay grade and financial situation. This finding suggests that an investment in spouse education without a change in the service member's pay grade or otherwise improving family finance may not lessen a spouse's need to work to cover basic expenses.

The variety of motives for working suggests that future policies addressing military spouse employment need to be cognizant of the different reasons different types of spouses work. Thus, for example, cash compensation for work lost may effectively address the needs of less-educated wives or those married to more-junior service members, but it would not effectively deal with the needs of more-educated spouses or those married to more-senior service members, because

these latter spouses tend to work for reasons other than to cover their basic expenses.

Spouses Out of the Workforce Point First to Parenting Demands

The majority of spouses interviewed who were neither employed nor seeking employment mentioned parenting responsibilities as their reason for not working. Another one-tenth of spouses cited volunteering or attending school as reasons for not working. However, the data suggest that as many as one-third of stay-at-home spouses were reluctantly out of the workforce, because they mentioned at least one barrier to their working. These spouses tended to cite moves, local labor market conditions, demands of the military lifestyle, or day care problems, with the rates varying depending on pay grade, financial situation, location, and education level. Even one-third of the spouses at home for parenting reasons cited a barrier to their working, suggesting that full-time parenting may not have been the preferred outcome of all the military's stay-at-home parents. While day care and local labor market conditions are issues that large numbers of civilian spouses also face, many military spouses perceived these conditions as the result of their military lifestyle, either because they were removed from extended family that could help with the parenting demands, because they would not have chosen the location to which the military sent them, or because they believed many aspects of the military workplace such as long hours, TDYs,[1] and the general inability of service members to accommodate sudden family needs (such as picking up a sick child from school) precluded their service member spouse from assisting them.

Given this wide array of factors and conditions, it is clear that all military spouses out of the labor force do not necessarily lack a "taste" for working. Indeed, military spouses thwarted in their quest for employment by local labor market conditions cannot change their residence as easily as civilian spouses might, nor can they exert much control over the nature and frequency of family moves. In addition,

[1] TDY and TAD refer to military-related travel away from home station.

the level of involvement the military requires from its personnel differs from and often far exceeds that expected from even the most demanding civilian employers. These conditions call into question whether spouses truly "choose" to leave the labor force or whether the demands of the military life are the largest obstacles to employment for those spouses reluctantly out of the labor force.

Majority Believe Military Life Negatively Affected Their Employment

Almost two-thirds of spouses interviewed felt that being a military spouse had negatively affected their work opportunities. About one-third believed that their circumstance had no effect on their work opportunities, and a small number of spouses actually perceived a positive effect. These findings are roughly consistent across locations and services, but they differ some by the service member's pay grade. The more senior the service member, the more likely the spouse is to perceive a negative impact, ranging from slightly fewer than half of those married to junior enlisted personnel to more than three-quarters of senior officer spouses. The most frequently cited cause for negative effect was frequent and disruptive moves. The findings show that the longer you have been a military spouse (and thus, the more moves undertaken), the more likely you are to attribute any perceived negative impact on your work opportunity to the frequent or disruptive moves that are a part of the military lifestyle. Thus, consistent with prior research, the belief that the frequent moving demands of military life is damaging to spouse work opportunity was pervasive among the sample of military spouses.

Many spouses cited the negative impact of such unobserved factors as service member absence (including deployment, TDYs, and extended work hours), expressing a consistent frustration in having to carry the brunt of their family's parenting responsibilities. These spouses referred to the inflexibility of the military workplace to satisfy family demands and an unwillingness on the part of the military to help accommodate the needs of military parents. Finally, some

spouses cited an employer bias against or stigmatization of military spouses, often driven by the employer's concern that the spouse will be forced to leave abruptly. Fewer spouses cited this as a problem than frequent moves or service member absence, but it is an unobserved factor that is uniquely military.

Many Spouses Also See a Negative Impact on Their Education

As part of the analyses, the researchers also looked at the impact of the military life on spouse education. Slightly fewer than one-tenth of those interviewed believed that they had educationally benefited from being a military spouse. The remaining majority of spouses were split, with approximately half of them believing that their educational opportunities had suffered negatively and half perceiving no effect on their education. Service member absence and military work schedules were the most commonly cited negative factors affecting spouses' educational opportunities, with frequent moves also mentioned as detrimental. The frequent moves delayed completion of degree programs, as spouses struggled to transfer credits and satisfy multiple programs' degree criteria. Further, spouses often faced the choice of either paying higher out-of-state tuition rates or further delaying their studies while they waited for residency status. The educational programs available for spouses, the perceived financial stability of military life, and the academic programs available on or near the base were the most common positive factors mentioned.

Spouses Suggest Ways for the Military to Improve Their Employment or Educational Opportunities

We provided the spouses interviewed the opportunity to suggest ways in which the military could improve the educational or employment opportunities of military spouses. Their suggestions for improvement focused most frequently on the following areas:

- *Increasing affordability and accessibility of education.* When asked how the military might help spouses pursue their educational or employment aspirations, the interviewees offered numerous suggestions, the most common (approximately one-third of spouses) being for the Department of Defense (DoD) to provide financial assistance for spouse education. Related ideas were to decrease the cost of education (such as by securing in-state tuition for military spouses), increase the accessibility of education, or reduce administrative problems with applying for school and transferring credits between schools.
- *Improving military child care programs.* Many spouses mentioned child care as requiring improvements in order to address hurdles to both employment and education. These suggestions included reducing the cost of child care and improving its limited availability, especially part-time or evening child care, both of which are perceived as necessary for many spouses to pursue their education.

Other suggestions for change included increasing spouse awareness of the current employment programs, improving the civil service system hiring process, lessening the number of moves, and addressing licensure and certification constraints on spouse employment. Approximately one-quarter of spouses felt that the existing spouse employment and educational programs were already sufficient; that the military did as much as it could, given the limitations of the military lifestyle; or that the military should not become involved in issues related to spouse employment or education.

Recommendations Addressing Military Spouse Employment Opportunities

Given these suggestions and the findings gained from the quantitative and qualitative assessment of both existing and new data, the researchers generated the following recommendations for DoD to

consider in addressing the problems that military spouse face pursuing their employment or educational opportunities.

Continue to Address Military Child Care Availability and Affordability

Child care remains an extremely important issue to military families. DoD efforts to address availability (including extended-hours care) and affordability should continue, and spouses should be made aware of future plans to address shortcomings.

Pursue Relationships with Local Employers

DoD should continue to explore relationships with large, nationally prevalent employers and with local employers to improve hiring conditions for military spouses, recognizing that such programs are more likely to benefit spouses of enlisted personnel, who are more likely to occupy retail, administrative, and restaurant jobs (which are industries commonly represented among nationally prevalent employers).

Pursue Spouse Employment Incentives with Military Contractors

DoD should consider incentives or other programs to encourage military contractors to hire qualified military spouses.

Reexamine the Priority System for Civil Service Jobs

DoD should reexamine the priority system for civil service jobs, including whether military spouses should receive higher priority than they do currently.

Address Licensing and Certification Hurdles

DoD needs to pursue ways to address licensing and certification issues for spouses who relocate, such as making it easier for them to learn the professional requirements for different states. At a minimum, the department should consider compensating spouses for the costs of transferring or re-obtaining professional certification and licensure.

Tailor Spouse Employment Programs and Policies to Appropriate Audience

When designing spouse programs or policies related to spouse employment, DoD should recognize that different groups of spouses are motivated to work for different reasons, which may include financial needs or nonfinancial motivations. For example, spouses of enlisted personnel are more likely to work for financial reasons, whereas officers' spouses are more likely to cite personal fulfillment and career aspirations.

Raise Awareness About Existing Spouse Employment Programs

DoD should continue to explore ways to inform military spouses about current programs to aid them with their education or with their employment search.

Become a More Family-Friendly Employer

The military leadership needs to acknowledge the value of being perceived of as a family-friendly employer, to pursue such opportunities whenever possible, and to acknowledge and reward the leadership of those units that do accommodate families. Given the stresses of today's environment, the military's mission can obviously make difficult or impossible many features enjoyed by the civilian workplace. However, if the military could better inform families about their service member's schedule, better accommodate a spouse's desire to work or attend schools regularly in the evening, and create more ways for service members to share in the "crises" of parenthood (e.g., calls from schools to pick up sick children), it could gain added respect as a family-friendly employer. Moreover, given the Chairman of the Joint Chiefs' recent assertion to Congress that quality-of-life concerns are inseparable from combat readiness (Myers, 2004), there are real operational reasons to respect and pursue the family's well-being.

Recommendations Addressing Military Spouse Educational Opportunities

Develop a Policy Statement on Spouse Education

DoD needs to establish officially that it believes it is to the department's benefit for military spouses to acquire advanced education. Further, a fuller consideration of the value of extending financial benefits for spouse education, while extremely costly, will address the complaints and suggestions of many military spouses.

Pursue Opportunities to Gain In-State Tuition Rates for Military Spouses

DoD should explore ways in which it can influence states to provide in-state tuition arrangements for military families in order to reduce educational costs.

Strengthen Relationships Between DoD and Education Providers

There are also less-costly ways to improve military spouses' opportunities to gain an education. DoD could work to strengthen its relationship with universities to maximize the number of classes offered on military bases, encourage such universities to offer a wider range of coursework, and increase the ease with which military spouses (and military members) can transfer credits.

Support and Facilitate Online Education or Distance Learning

DoD should investigate ways to support online education, such as providing or loaning computers, or subsidizing the cost of home computers or online access. Additional support may include distance-learning facilities on post, arrangements with an increased number of universities, or providing spouses access to programs such as eArmyU.

Acknowledgments

We are grateful to Aggie Byers and Jane Burke of our sponsoring office for their support and assistance provided during this research. This work benefited from interaction with the Department of Defense Spouse Employment Working Group.

Our field research benefited from the participation of individuals in each of the services who facilitated our communications with the military installations and units selected for participation. We thus thank Karen Reilly, Personal and Family Readiness Division, Headquarters Marine Corps; Richard Fafara, Senior Research Analyst, U.S. Army Community and Family Support Center; Ed Roscoe, Manager and Principal Policy Adviser, Spouse Employment Assistance Program, Navy Personnel Command; and Deborah Laskiewicz, Family Matters Operations, Headquarters Air Force Personnel Center. Additionally, we owe a debt of gratitude to the various individuals who hosted our orientation visits to their locations, including Janet Paulovich, Chief of Services, NAS North Island Fleet and Family Support Center; Nancy Piper, Director, Fort Bliss Community Services Center; Billie Gaines, Flight Chief, Offutt Air Force Base Family Support Center; Rose Deem, Eglin Air Force Base Family Support Center; Terry Peace, Yuma Marine Corps Community Services; Regina Steward, Camp Lejeune Marine Corps Community Services; Ned Cronin, Fort Lewis Army Community Services Center; and Paul East, Director, New London Fleet and Family Support Center.

Although confidentiality precludes us from mentioning their names or unit identities, we are tremendously grateful to the military

units who participated in this study and to the many military spouses who dedicated their time to answer our questions and share their experiences.

We are appreciative of Chintan Turakhia and Sherm Hussain, who led the team from Schulman, Ronca, and Bucuvalas Inc., which conducted many of the telephone interviews.

This research benefited from the assistance and intellectual contributions of many RAND colleagues, including James Hosek, Gregory Ridgeway, Melissa Chiu, Megan Abbott, Catherine Chao, Holly Johnson, and Sonia Nagda. We also appreciate the constructive reviews from Laura Miller and David Loughran. Phillip Wirtz edited the document, and Eileen La Russo designed the cover.

Abbreviations

AFB	Air Force Base
CMSA	Consolidated Metropolitan Statistical Area
CONUS	continental United States
CPS	Current Population Survey
MCAS	Marine Corps Air Station
MCB	Marine Corps Base
MSA	Metropolitan Statistical Area
NSB	Naval Submarine Base
PMSA	Primary Metropolitan Statistical Area
PUMS	Public Use Microdata Samples
SEAP	Spouse Employment Assistance Program
SOC	Servicemembers Opportunity Colleges

CHAPTER ONE

Introduction

Background

In the all-volunteer military force, successful recruiting and retention of the active duty force relies on the ability of the military to afford both service members' and their spouses' job satisfaction and contentment with all facets of life. Members of the armed forces must be motivated to perform at their best. The economic well-being of military members, the degree to which they believe that their families are cared for, and their general quality of life are key to maintaining and motivating the force. President Bush acknowledged the importance of caring for military members and their families when he pledged during his February 12, 2001, speech at Fort Stewart, Georgia, "We owe you and your families a decent quality of life. . . . [Service members] deserve a military that treats them and their families with respect." The recommendations of the 2001 Morale and Quality of Life review reflected this pledge. Additionally, the Chairman of the Joint Chiefs of Staff, General Richard B. Myers, has recently asserted that he views "all of the Quality of Life issues as inseparable from overall combat readiness" (Myers, 2004).

A major feature of military spouse quality of life is the ability, if one chooses, to pursue employment or a career. Data indicate that the majority of military spouses have paid employment, but further research shows that military spouses have difficulty finding jobs and

that one reason military personnel are leaving the service may be related to limited career opportunities for military spouses.[1]

Recent studies also support the relative importance of spouse employment in the military community. A 1999 study found that two-thirds of spouses in pay grades E-5 and below had financial difficulties and that most of these spouses wanted or needed to work (DMDC, 1999). The 2002 Marine Corps Quality of Life Study determined that the least-satisfied spouses were those who were wholly dependent on the Marine Corps for their household income and that the most satisfied families were those deriving at least one-quarter of their household income from sources other than the service member's pay. This study, which asserts the tremendous importance of perceived quality of life, finds that one of the two best opportunities for improvement of spouse global quality of life appears to be job and professional development and that for Marine Corps officer spouses without children, the job and professional development domain was the most influential aspect in their overall quality of life (Decision Engineering Associates, 2002). Private-sector studies have found that individuals with multiple roles—i.e., spouses who pursue interests outside their home—are both psychologically and physically healthier (Barnett and Hyde, 2001). This finding implies that a military spouse who pursues employment or education is a happier, healthier spouse who is capable of more sound support for the military member. Additionally, an Army study found that spouse influence on military retirement or resignation decisions has increased with the rate of military spouses working outside the home. The study's researchers summed up this relationship by stating that "the needs of the Army no longer trump the needs of the family" (Watkins and Cohen, 2002, p. 91).

Prior research, such as the studies outlined above, has provided insights about the labor force participation and earnings of military spouses (Hosek et al., 2002; Wardynski, 2000), the effects of working in the direct shadow of military installations (Booth et al., 2000), and

[1] Wood, 1989, cited in Schwartz, Wood, and Griffith (1991).

the other demands and role expectations placed on military spouses (Segal, 1988; Harrell, 2001; Harrell, 2003). The Hosek et al. work is especially useful as a foundation, because it established that, compared with civilian wives, military wives are less likely to work and more likely to have lower wages.

Our research seeks to build on these studies by (1) providing a richer and more detailed depiction of military spouse employment and earnings, (2) exploring the degree to which employment is problematic for military spouses, and (3) identifying policies to reconcile spouse employment issues with the military's need to retain qualified personnel. It examines whether military spouses face difficulty in finding employment as well as whether they are more likely to experience difficulties in the labor market when compared with their civilian counterparts. Perhaps most importantly, this work addresses the "ground truth," or actual reality, of military spouse employment, based on the analysis of available data, as well as the personal perceptions and experiences of military spouses, based on a rich quantitative and qualitative data set gathered from interviews with more than 1,100 military spouses.

The balance of detailed survey data and rich qualitative interview data enables us to explore hypotheses proposed in prior research regarding why military spouses' labor force participation and earnings differ from their civilian peers'. Specifically, we consider the hypotheses posed by Hosek et al., who posit that military wives' lower labor participation may reflect either (1) their preference, or "taste," not to work; (2) their inability to reconcile the schedule and demands of the military lifestyle with work; (3) their inability to work while satisfying volunteer and other role demands; or (4) their frequent moves. Further, we are able to examine these concepts separately for spouses associated with each of the four military services, which had not previously been done.

Method and Approach

This Study Benefited from Multiple Existing Data Sets

The data used in this study provide larger samples of military spouses than do data from previous studies of military spouses. We used two U.S. Census Public Use Microdata Samples (PUMS), the 1 percent and 5 percent sample files. These individual-level samples represent independent samples of 1 percent and 5 percent, respectively, of the U.S. population in 1990. By combining these two samples, we created a 6 percent sample of the U.S. population in 1990.[2] This set provided the most robust data available for military spouses and permitted comparisons by service as well as by other demographic features, such as age, education, mobility, and residence. We confirmed many of our findings by running parallel analyses with the less robust data from the 1999 Military Spouse Survey and the 1999 Current Population Survey (CPS, for civilian spouse data) to assess any changes over time. We were satisfied that the 1990 data provided accurate comparisons between military spouses and civilian spouses, although we acknowledge that the actual demographics of the populations may have changed slightly.[3] Table 1.1 provides the sample size for civilian spouses and military spouses, by service, for each of the preexisting quantitative data sources used in this study. (We also gathered additional quantitative data from the interviews discussed below.) Appendix A presents more detail of the 1990 Census data, samples, and variables.

We Also Conducted Interviews with Military Spouses

To complement the existing quantitative data sets, we conducted telephone or in-person interviews with military spouses.[4] The inter-

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[2] We appropriately adjusted sampling weights to account for the merging of these two samples.

[3] The PUMS from the 2000 Decennial Census were not available at the time of this analysis.

[4] The data set resulting from the interviews is referred to hereafter as RAND Military Spouse Interviews, 2003.

Table 1.1
Preexisting Quantitative Data Sources and Sample Sizes (number of observations)

	Data Source		
	1990 Census (1% and 5% Sample)	1999 Military Spouse Survey	1999 Current Population Survey
Civilian	294,836		19,193
Army	11,959	4,068	
Navy	9,746	3,118	
Air Force	11,498	2,510	
Marine Corps	3,305	1,982	

views permitted us a richer understanding of military spouse employment and education and allowed us to capture military spouses' perceptions of their employment and education, the ways they believe the military lifestyle has affected them, and their suggestions for improvement. The interview protocol, provided in Appendix E, features a combination of closed-ended questions as well as semi-structured open-ended questions. The questions asked to any particular spouse varied based on her[5] current employment status; employed spouses were asked different questions than spouses seeking employment or those who were not in the labor force. The closed-ended questions addressed demographic factors (e.g., age, education, years married, number and age of children) and their experience as a military spouse (e.g., number of relocations, whether they lived on a military installation). The open-ended questions permitted us to capture, on electronic audio, spouses' reflections on why they have chosen either to work outside the home or not participate in the labor force, how they believe being a military spouse has affected their employment or education, and what they believe the military could do to help its service members' spouses.

[5] While there were male spouses included in the interviews, the preponderance of our interviews was with female spouses, reflecting the demographics of that population. We occasionally use female pronouns for ease but included the male spouses in the interview data.

We conducted interviews with slightly more than 1,100 spouses residing at eight different continental United States (CONUS) military installations—two from each of the four military services.[6] We selected the installations in a manner that provided geographic and economic variation. We also chose them to include spouses of service members who were assigned to a variety of military units that differed by size (from a submarine to an aircraft carrier) and by type (e.g., combat arms or support units). Table 1.2 reflects the differences among the locations. The population density and unemployment columns are based on a relative ranking of all major military installations. In other words, very low population density, as noted by Yuma, Arizona, for example, indicates that, of all major military installations, this facility ranks among the bottom fifth of major military installations for surrounding population density, as of 2001.[7] The unemployment rankings are similarly calculated and represent March

Table 1.2
Relative Comparisons of Installations Sampled

Installation/ Region	Service	Geographic Region	Population Density (2000)	Unemployment (2002)
Fort Lewis, Wash.	Army	Northwest	Mid	Very high
Fort Bliss, Tex.	Army	Southwest	High	Very high
Offutt AFB, Neb.	Air Force	Midwest	High	Very low
Eglin AFB, Fla.	Air Force	Southeast	Low	Very low
MCAS Yuma, Ariz.	Marine Corps	Southwest	Very low	Very high
MCB Camp Lejeune, N.C.	Marine Corps	Southeast	Low	High
New London NSB, Conn.	Navy	Northeast	Mid	High
San Diego, Calif.[a]	Navy	Southwest	High	Low

[a]Comprises multiple installations.

[6] The focus on CONUS installations reflected the research sponsor's resourcing decision.

[7] Based on zip code data from the 1990 Census.

2002 CPS data.[8] These data provide a descriptive understanding of the areas. For example, the area surrounding Fort Bliss, Texas, has a high population density but a very high unemployment rate. In contrast, San Diego's population density is high and its unemployment rate is low. The main purpose of these rankings and factors was to ensure variation in the focus locations selected.

After identifying specific units at each location, we met with unit leadership to introduce the study and respond to questions. We then mailed a letter to every spouse associated with the unit to inform them of our study and to let them know that we would be telephoning a randomly selected sample of spouses from the unit, stratified for service members' pay grade. Both the letter and interview's introductions stressed that participation was voluntary. Still, the study benefited from a very high participation rate: Approximately 82 percent of the eligible spouses randomly contacted agreed to participate.[9] To interview sufficient numbers of spouses of more-senior service members, we also obtained interview volunteers through the local spouses' clubs.[10] Table 1.3 indicates the number of spouses interviewed from each location, by service member's pay grade. The table provides the number of spouse participants and then the representative percentages: The far right column indicates the share of spouse participants

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[8] These unemployment representations reflect, as do all unemployment measures, the presence of those seeking work. As we discuss in more detail later, discouraged workers, or those not seeking work for other reasons, will not be represented in an unemployment rate.

[9] Eligibility generally meant that the subject was married to an active duty service member. Of those who declined to participate, some simply refused, while others were unable or unwilling to answer basic demographic questions, such as education level of spouse or pay grade of service member; these spouses were gently excused from the survey. Overall, interviewers were instructed not to reverse any refusals; if a spouse indicated that she was not interested in participating, the caller did not try to persuade her to change her mind. We believed that a slightly lower participation rate was more acceptable than an approach that would irritate military spouses by attempting to reverse refusals. Additionally, some callers indicated interest in being interviewed at another time. Many of these spouses were contacted subsequently. Those who indicated interest but were not reached again are not reflected in this response rate.

[10] Some of the units selected included no officers at the pay grade of O-6, only one O-5, and often only one or two O-4s.

Table 1.3
Number of Spouses Interviewed, by Location and Pay Grade

	Pay Grade							
Installation/ Region	**E-1 to E-4**	**E-5 to E-6**	**E-7 to E-9**	**O-1 to O-3**	**O-4+**	**W-1 to W-5**	**Total**	**Percentage of Total**
Fort Bliss	38	57	17	18	11	6	147	13.3
Fort Lewis	32	51	14	20	11	5	133	12.1
Eglin AFB	43	73	22	22	15	n/a[b]	175	15.9
Offutt AFB	9	53	22	32	18	n/a[b]	134	12.2
San Diego[a]	18	48	12	27	16	5	126	11.4
New London NSB	22	47	20	12	9	0	110	10.0
MCB Camp Lejeune	35	45	10	22	16	7	135	12.3
MCAS Yuma	37	43	19	25	15	3	142	12.9
Total	234	417	136	178	111	26	1,102	
Percentage of Total	21.2	37.8	12.3	16.2	10.1	2.4		

[a] Comprises multiple installations.
[b] The Air Force does not have warrant officers.

by location, and the bottom row lists the percentage of participation by pay grade group. For instance, 38 junior enlisted spouses from Fort Bliss were interviewed; 21.2 percent of the total sample were junior enlisted spouses; and 13.3 percent of all spouses interviewed were from Fort Bliss. The sampling strategy was to approach the relative representation in the services while acknowledging that the services, as well as the individual units included, vary in their pay grade representation.[11] The sampling also reflects the difficulty of obtaining participants from some locations, such as officers' spouses from New London and junior enlisted spouses from Offutt and San Diego. In the case of junior enlisted spouses, the Offutt units had proportionately fewer junior enlisted personnel than did other selected units. In the case of San Diego, many of the junior enlisted

[11] Spouses of warrant officers were sampled from the three services that include warrant officers. Because of the small numbers, we do not conduct any analysis of these spouses by pay grade. They were, however, included in all other analysis.

spouses were unreachable, largely because they left the locale while their service members were at sea.

Although we did not sample based on work status, we designed the telephone interviews to include spouses who were employed, seeking work, and who had chosen not to work. The protocol required interviewers to ask each of these groups of spouses a different set of questions tailored to her employment status. Interviews were conducted during both day and evening hours and averaged 14 minutes in length. Tables 1.4 and 1.5 indicate the employment status of interviewed spouses, by location and then by the service member's pay grade.

Even though the interview participants are not a probability sample of the military spouse population, the sample contains adequate representation of that population. To verify, we compared the

Table 1.4
Number and Percent of Spouses Interviewed, by Employment Status and Location

	Employment Status				
Installation/ Region	**Employed (Full- or Part-Time)**	**Seeking Employment**	**Not in the Labor Force**	**Total**	**Percentage of Total**
Fort Bliss	76	21	50	147	13.3
Fort Lewis	58	25	50	133	12.1
Eglin AFB	100	12	63	175	15.9
Offutt AFB	73	12	49	134	12.2
San Diego[a]	74	17	35	126	11.4
New London NSB	65	9	36	110	10.0
MCB Camp Lejeune	64	29	42	135	12.3
MCAS Yuma	87	9	46	142	12.9
Total	597	134	371	1,102	
Percentage of Total	54.2	12.2	33.7		

[a]Comprises multiple installations.

Table 1.5
Number and Percentage of Spouses Interviewed, by Employment Status and Pay Grade

	Employment Status				
Pay Grade	Employed (Full- or Part-Time)	Seeking Employment	Not in the Labor Force	Total	Percentage of Total
E-1 to E-4	125	40	69	234	21.2
E-5 to E-6	235	51	131	417	37.8
E-7 to E-9	89	14	33	136	12.3
O-1 to O-3	90	18	70	178	16.2
O-4+	39	10	62	111	10.1
W-1 to W-5	19	1	6	26	2.3
Total	597	134	371	1,102	
Percentage of Total	54.2	12.2	33.7		

characteristics of the sample, including age, education, and family conditions, with the 1999 Survey of Spouses of Active Duty Personnel. We found that the characteristics are similar, and even when they differ slightly in specific categories, the overall distributions of the characteristics remain similar.

Quantitative and Qualitative Methods Support a Rich Analysis

The robust existing quantitative data sets permitted a thorough quantitative assessment of military spouse demographics, military spouses' employment situations, and the extent to which their individual characteristics can be expected to account for their employment situations. We performed this assessment using regression models and propensity analysis, which is discussed in more detail in the context of our findings (see Chapters Two and Three). Such quantitative analysis provides an understanding of the current status of military spouses.

The interviews, in turn, provided us with additional quantitative data associated with the 1,100 spouses who participated, as well as sophisticated qualitative data from those same spouses. The closed-ended quantitative interview questions supplement the open-ended

qualitative answers so that we can portray a rich understanding of what military spouses do; why they choose to work or stay home; how they perceive their work and educational opportunities; how they believe the military lifestyle has affected them; what they think could or should be done to improve their opportunities; and how these experiences and opinions correlate with spouse demographics such as education level, number of children, and service member's pay grade.

The qualitative data were transcribed and coded using the grounded theory method, which permits us to interpret spouse comments both inductively and deductively, which means we explored the existence of expected answers to questions while also identifying themes that emerged unexpectedly. After coding the data using software designed to facilitate this process, we analyzed patterns and relationships between the comments both qualitatively and quantitatively. This combination of inductive and deductive reasoning and statistical correlations and regressions permitted us to understand and render the experiences and perceptions of military spouses more completely than previous studies.

Some of the spouses' specific comments are directly cited in this work as examples of themes that emerged. To protect the identity of participating spouses, we distinguish each interview with a unique number rather than a name. This number, along with some demographic descriptors relevant to the discussion, follows each comment.

A Necessary Focus on Military and Civilian Wives

As noted earlier, although the interviews included both male and female spouses of service members, the vast majority of military spouses interviewed were female. Because of the small numbers of male spouses, the quantitative analysis of Census and other data included only female spouses of male service members.[12] Thus, given the absence of available significant data, our quantitative analysis nec-

[12] Male spouses comprised 8.5 percent of all the military spouses included in the data sample and less than 5 percent of Marine Corps spouses. This level of representation is insufficient for analysis.

essarily focuses on military wives. As an appropriate comparison, this analysis also focuses on civilian wives. The qualitative analysis includes male spouses' perspectives, but cannot significantly assess whether spouse perceptions differ by gender.

Organization of This Report

This chapter has provided the context and a brief discussion of the method of our study of military spouse employment. The following chapter describes the demographics of military spouses. Chapter Three assesses the employment status of military spouses nationwide. Chapters Four and Five provide insights directly from military spouses as gathered during our interviews with current military spouses. These chapters describe what military spouses do, why they work or have chosen not to work, and how they believe the military lifestyle has affected their work and educational opportunities. Chapter Six synthesizes the comments and suggestions from the interviews and describes what spouses think should be done to help them with their employment or educational opportunities. Chapter Seven provides conclusions and recommendations.

In addition, Appendix A focuses on the U.S. Census data. Appendix B provides the Metropolitan Statistical Areas (MSAs) of the United States. Appendixes C and D detail the breakdown of methods and formulas used by the researchers. Appendix E presents both the letter sent to spouses and the interview protocol used for our survey.

CHAPTER TWO

Who Are Military Spouses?

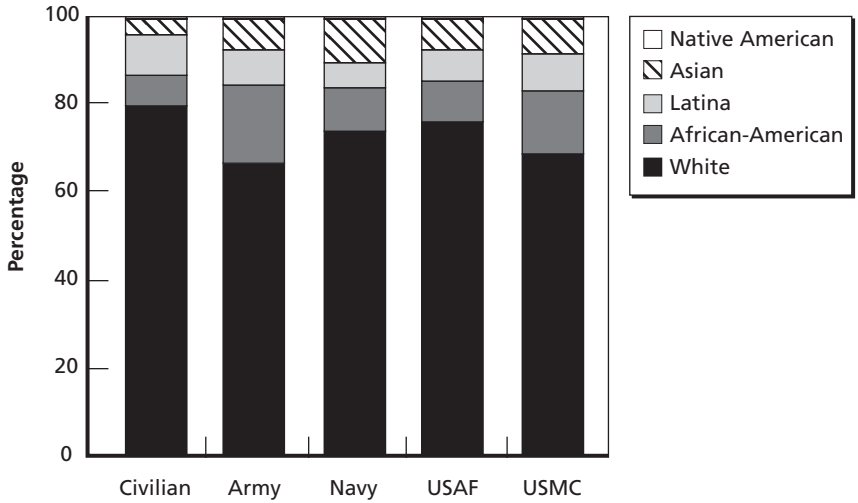
This chapter compares the demographic characteristics of military and civilian wives, specifically race, age, education, employment status, and number and age of children. The conditions described will contribute to an understanding of the key differences in their labor market situations, as discussed in later chapters.[1]

Military Wives Are More Likely to Be Racial and Ethnic Minorities

Figure 2.1 shows the extent to which military wives are more likely to be racial and ethnic minorities. This likelihood is especially true for those married to service members in the Army and the Marine Corps: About three out of ten Army and Marine Corps wives were minorities. Among minority groups, compared with the civilian population, African- and Asian-American wives are overrepresented in all services, while Latinas are underrepresented. The net effect of this finding on the labor market conditions of military wives is not clear. The impact may vary with specific labor market outcomes. For instance,

[1] While this chapter concentrates on results from the analyses of the 1990 Population Census, we have conducted parallel analyses with the 1999 DoD military spouse survey (DMDC, 2001) and the 2000 CPS and found that results reported here continue to reflect the current conditions of military and civilian wives.

Figure 2.1
Race and Ethnicity of Military and Civilian Wives



SOURCE: Authors' tabulation from the 1990 Census.
RAND *MG196-2.1*

previous research suggests that, as members of minority groups, military wives may experience discrimination in the labor market and receive lower wages compared with their civilian counterparts (Higginbotham and Romero, 1997; Browne, 1999). Conversely, minority married women, especially African-Americans, have a long history of participating in the labor force—even before dramatic changes in the economic role of married women in the later part of the 20th century (Goldin, 1990, pp. 119–158). Hence, the higher level of minority representation among military wives may suggest, on average, a higher level of labor force participation among military spouses.

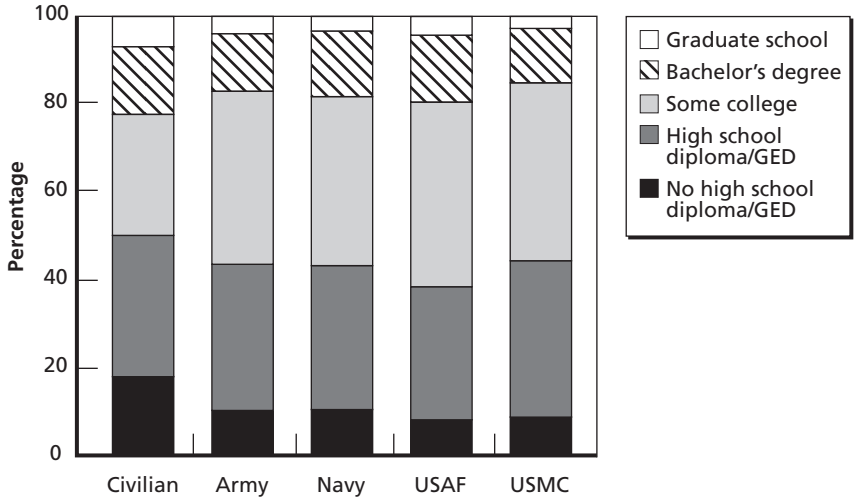
Military Wives Are More Educated Than Their Civilian Counterparts

Education has a clear impact on labor market conditions of everyone, including married women. Significantly, Census data show that mili-

tary wives have higher levels of education compared with their civilian counterparts.[2]

For instance, as Figure 2.2 shows, civilian wives are twice as likely as military wives to be high school dropouts—one out of five civilian spouses are high school dropouts. In addition, military wives are more likely to acquire college education compared with their civilian counterparts. In all services, more than half of military wives had some form of college education. This finding contradicts the popular preconception that military wives have less education but is consistent with what demographic research has shown about the high level of "educational assortive" marriages among Americans: indivi-

Figure 2.2
Distribution of Educational Levels of Military and Civilian Wives



SOURCE: Authors' tabulation from the 1990 Census.
RAND *MG196-2.2*

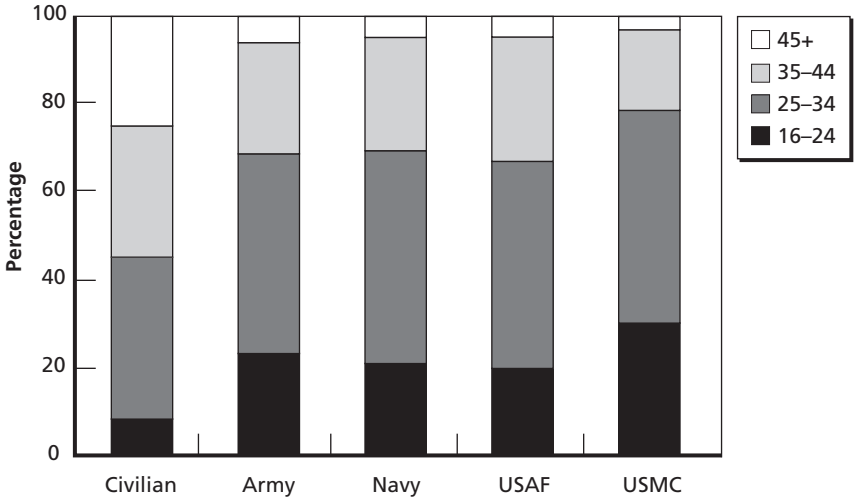
[2] 1990 Census, 1999 DoD military spouse survey, and the March CPS 2000.

duals tend to marry to those with similar educational attainment (Mare, 1991),[3] and since military men are more likely to be educated than their civilian counterparts, so are their wives.

Military Wives Are Younger Than Civilian Wives

Some of these educational differences also reflect generational differences in educational attainment. Military wives are younger than civilian wives. For example, as shown in Figure 2.3, in 1990, fewer than 10 percent of civilian spouses were between 16 and 24 years old, while 20 to 30 percent of military spouses across the services were in

Figure 2.3
Distribution of Age of Military and Civilian Wives, by Service



SOURCE: Authors' tabulation from the 1990 Census.
RAND *MG196-2.3*

[3] A high school diploma is generally a minimum requirement for entry into the military.

this age category. Given that dramatic changes in educational attainment, especially among women, occurred in the latter part of the last century, it is not surprising that younger military wives have higher levels of education, as reflects their generation.

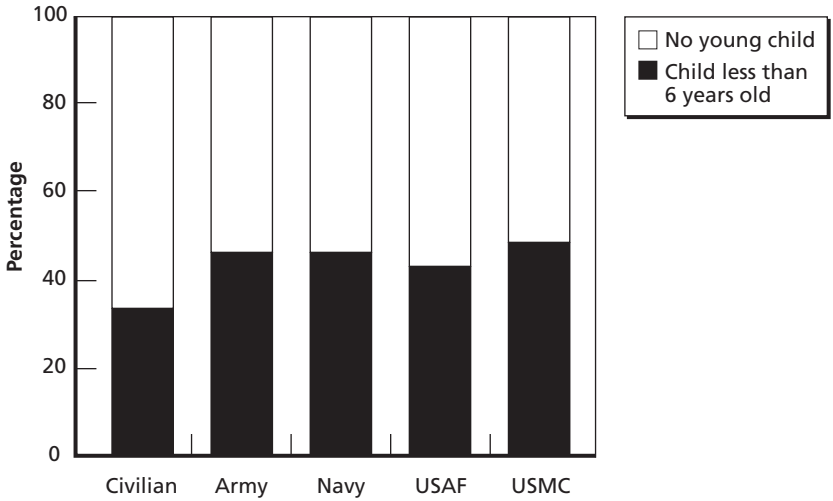
By the same token, because they are younger than their civilian counterparts, military wives have not yet accumulated as much work-related experience and tend to be at the beginning of their career, compared with their civilian counterparts who are more likely to have peaked in their earning potential. Given their aspiration for higher education, young military spouses are also more likely to be in school. For instance, in 1990, 11–13 percent of military wives were enrolled in school, compared with 8 percent of civilian wives. While these young military wives are in school, developing a career may take a backseat to other pressing issues or complexities of being a military spouse. As a result, as Hosek et al. (2002) hypothesized, they may be more willing to take stopgap jobs that are more likely to pay less and have limited career growth.

Military Wives Are More Likely to Have Young Children at Home

Military and civilian wives are at different stages of life. While military wives have similar child-bearing patterns as civilian wives[4] (see Hosek et al., 2002), their relative age differences mean that military wives are more likely to have young children at home, as reflected in Figure 2.4. Having to raise young children can have negative impacts on military wives' labor market situation for several reasons. First, they may opt to remain out of the labor force while their children are still young. Second, given the challenges of finding quality, affordable child care, military wives may simply find that it is more economical

[4] We have also replicated this finding using the 1990 Census data.

Figure 2.4
Having a Young Child at Home for Military and Civilian Wives



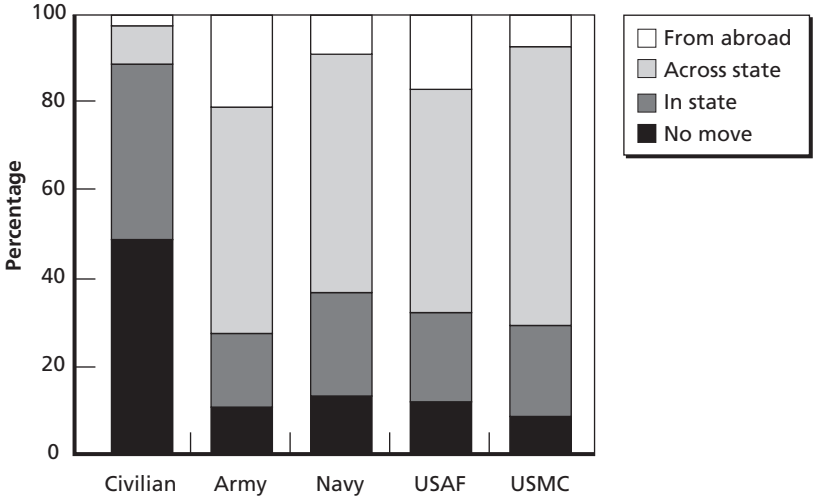
SOURCE: Authors' tabulation from the 1990 Census.
RAND *MG196-2.4*

to stay home, unless wages are high enough to make employment worthwhile. The interviews conducted with military spouses permit us to pursue these issues further in Chapter Four.

Military Families Move Farther and More Frequently Than Civilians

Previous studies (e.g., Hosek et al., 2002) had shown that the feature of military life that most negatively affects military wives' careers is being asked to move often and far. As noted above, the 1990 Census data confirm that military wives are more likely to move and tend to move longer distances, compared with civilian wives. For instance, as shown in Figure 2.5, half of civilian wives did not move in the five years prior to the 1990 Census, while only 10 percent of military

Figure 2.5
Geographical Mobility of Military and Civilian Wives in the Five Years Prior to the 1990 Census



SOURCE: Authors' tabulation from the 1990 Census.
RAND *MG196-2.5*

wives had stayed in one location in the same period. To make matters more difficult, the majority of military moves are either across states or abroad.

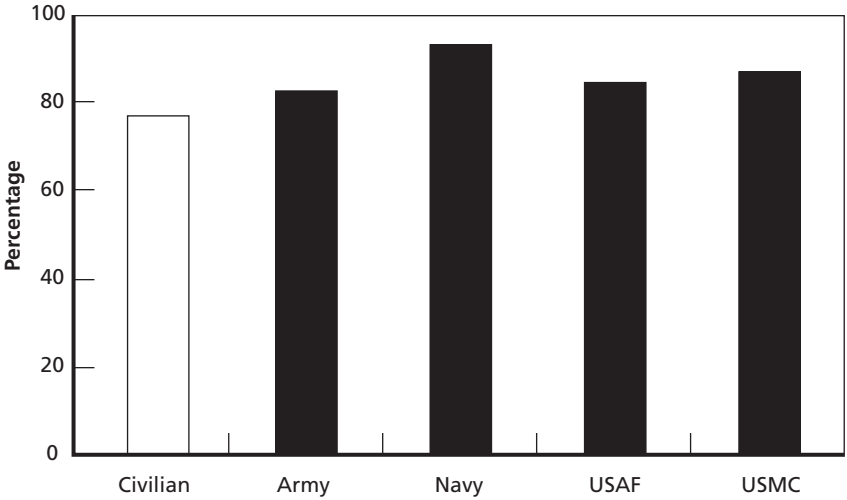
As a result, geographical mobility often disrupts the career development of military wives. For instance, social science studies (e.g., Granovetter, 1995) have shown consistently that people get jobs through social networks. Frequent long-distance moves make it difficult for military wives to develop the kinds of networks that can help them in the labor market. In addition, they face additional barriers to accumulating job tenure, which is positively related to their earning. Moreover, knowing that military wives are more likely to move, employers may offer them lower salaries, choose not to hire them for key positions, or not invest in their training (see Hosek et al., 2002). Further, moves may be more likely to affect military spouses more than they do civilian wives, because civilian couples decide whether to

move based on the total impact on their family, whereas military couples have less choice of when or where to move.

Military Wives Are More Likely to Live in Metropolitan Areas

There is, however, a silver lining in the opportunities posed by the residential life of the military. Even though military wives move often and over great distances, they are more likely to end up living in metropolitan areas, as shown in Figure 2.6. This is especially true for Navy spouses. This finding contradicts a popular image of military families living in remote, rural areas and is consistent with findings from Hosek et al. (2002). As metropolitan dwellers, these wives can reap the benefits of living among a large population in a cluster of counties with a high degree of economic and social integration. That

Figure 2.6
Percentage of Military and Civilian Wives Living in Metropolitan Areas



SOURCE: Authors' tabulation from the 1990 Census.
RAND *MG196-2.6*

is, in general, residents of metropolitan areas have more job opportunities and earn relatively more compared with other Americans.[5]

Summary

The data presented in this chapter are solely descriptive in that they do not reveal the reasons for any differences between military and civilian wives. What is clear from the data, however, is that notable differences do exist between military and civilian wives. Military wives, on the one hand, tend to be young women who are raising young children while continuing with their education. Their lives are frequently punctuated by frequent moves to follow their husbands' career. Civilian wives, on the other hand, are relatively older, finished with their schooling, and are rooted in their communities. In short, they are at a different stage of life. Hence, we should expect to see certain differences in labor market activities between military and civilian wives. The central question then is whether these differences can "explain" the disparities of these groups in the labor market, which we address in the later chapters.

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[5] See Appendix B for a map of the MSAs in the United States.

CHAPTER THREE

How Do Military Wives' Employment Conditions Compare with Civilian Wives?

In Chapter Two, we learned that military and civilian wives, on average, have different racial/ethnic representation and are also at different stages of life that may lead them to set different priorities regarding school, work, and family. This chapter describes, based on large sample data, how military spouse employment conditions compare with those of civilian wives and explores the effects of specific characteristics of military spouses on their employment conditions in comparison with similar civilian spouses. These characteristics include education, experience, mobility, and where they live, as described in the previous chapter. Finally, the discussion turns to whether or not these characteristics and other similar inherent characteristics fully explain the employment differences between military and civilian spouses.

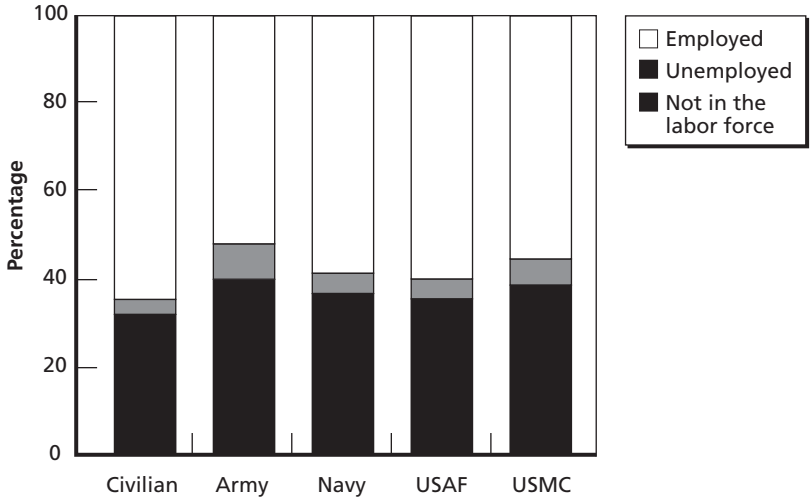
Military Spouses Are Less Likely to Be Employed

The labor force is technically defined as individuals who are either unemployed (i.e., jobless but actively looking for work) or employed. Individuals who are jobless yet not actively looking for work are not considered to be a part of the labor force. Thus, there are two kinds of jobless people: those who are unemployed (seeking work) and those who are out of the labor force (not seeking work). It is important to keep in mind that some of these individuals may prefer not to be in the labor force, while others may have given up hope, having

become discouraged in their pursuit of employment. Census data do not distinguish these two groups, but we are able to provide some information from qualitative data in the later chapters.

The data show that, compared with their civilian counterparts, military wives are less likely to be employed and more likely to be either "unemployed" or not seeking a job at all. Figure 3.1 shows that Army wives in particular were most likely to be either unemployed (seeking work) or not in the labor force, followed closely by Marine Corps wives.[1]

Figure 3.1
Employment Status of Civilian and Military Wives, by Service



SOURCE: Authors' tabulation from the 1990 Census.
RAND *MG196-3.1*

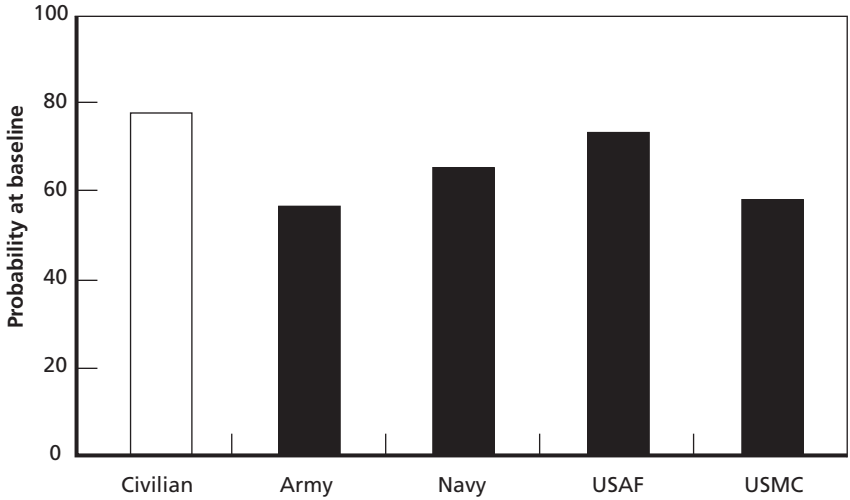
[1] Similar to the previous chapters, we reported results from the analyses using the 1990 Census data but performed parallel analyses with the 1999 DoD military spouse survey and the 2000 March CPS. The results were consistent.

Net Disparity Between Military and Civilian Spouses

We examine whether the differences in the employment status of wives can result from the demographic differences outlined in the previous chapter. To estimate whether there is a real disadvantage of being a military spouse, we need to compare groups of wives who have similar demographic characteristics. One way to compute any net effect of being a military wife is to use regression models.[2]

Figure 3.2 shows the net effect of a husband's military service on a wife's employment. As a baseline, the probability of being employed is computed for wives who are high school educated, white, have not moved in the last five years, have no young children, are not enrolled

Figure 3.2
Net Effect of Husband's Military Service on Whether Wives Are Employed



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.2*

[2] To account for the sampling scheme of the 1990 PUMS, we estimate logistic regression models using an estimation procedure designed for survey data. Models are available upon request.

in school, have no experience in the labor market, live in metropolitan areas, have no years of civilian labor market experience, and whose husband is also high school educated. The only difference among these wives is whether or not the husband is in the military.

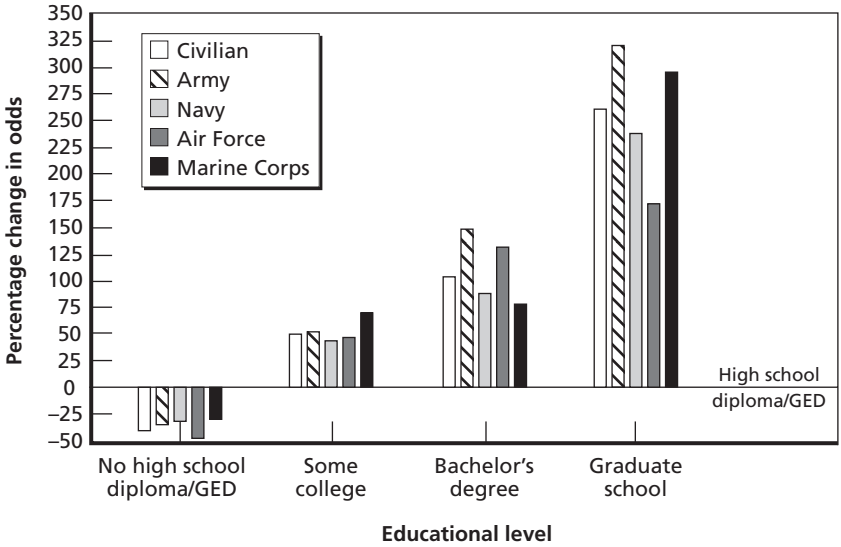
The results show that 80 percent of civilian wives of this group are employed, closely followed by Air Force wives. At the bottom end, only about half of the Army wives with these same characteristics are employed. In other words, it is possible that the military lifestyle is affecting Army wives the most and Air Force wives the least. These differences represent the "net" impact of being a military wife on her employment.

Effect of Education on Spouse Employment Varies by Service

Below, we examine different factors that could affect the likelihood of being employed, beginning with education. Figure 3.3 shows the net effect[3] of educational levels on the likelihood of employment for spouses of the different services and civilian wives. All the educational groups are compared with high school/GED graduates. Not surprisingly, higher levels of education generally increase the likelihood of both civilian and military wives being employed. But the "return" for investing in education varies across groups. The positive impact of having higher education is the greatest among Army wives, followed closely by Marine Corps wives. As we have seen in Figure 3.2, among the high school graduates, these two groups again pay the heaviest price for being military wives. Army wives with college degrees increase their odds of having a job by 125 percent compared with

[3] Technically speaking, we present the regression coefficients associated with selected explanatory characteristics. For ease of interpretation, we converted the regression coefficient of interest into a percentage change in odds of being in certain employment status, which was accomplished using: $[1 - e^{(\text{coefficient of interest})}] \times 100$. We have chosen to report results in percentage change in odds, mainly based on the type of regression models used. The net effect of a characteristic presented in change in odds remains the same regardless of changes in other characteristics, while the changes in probability vary depending on the value of other characteristics.

Figure 3.3
Change in Odds of Being Employed, by Educational Level, for Civilian and Military Wives, by Service



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.3*

Army wives who have only a high school education. The impact is similar for civilian wives, but its magnitude is smaller. Conversely, the positive effect on employment is smallest for Air Force wives with a bachelor's degree and for Navy wives with a graduate school–level education.

It is important to distinguish the relative impacts of education on employment (presented in Figure 3.3) from the overall differences in the percentage employed in these groups (presented in Figure 3.1). Figure 3.3 presents how much employment conditions change by improving the educational level of military wives, by service. The results suggest that Army and Marine Corps wives can significantly

improve their employment chances by getting higher education.[4] The question of whether educational differences—or any other observed characteristics—among groups of wives explain the observed disparities was addressed in Figure 3.2, which indicates that there is indeed a gap in employment between military and civilian wives, after controlling for every observed factor in the survey.

Effects of Labor Market Experience on Spouse Employment

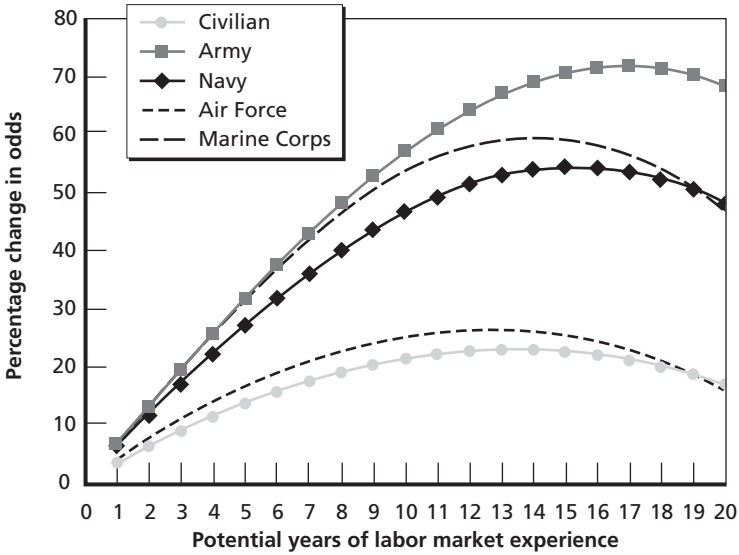
Another factor that often affects the likelihood of being employed is the accumulated years of labor market experience. Theoretically, the more experience an individual has, the more attractive she is to an employer and thus the more likely to be employed. In addition, the longer an individual is in the labor force, the more stable her work career. But we expect the positive effect to diminish as the individual becomes older and more settled into her chosen career.

The results shown in Figure 3.4 are consistent with this hypothesis. The figure displays the change in the likelihood of being employed for each potential year of labor market experience. Following the standard labor economic literature, we estimate an individual's potential labor market experience by subtracting years of schooling and five years from her age. For example, a 30-year-old wife with 20 years of schooling, according to our measure, has five years of potential work experience. By design, then, the measure certainly is associated with an individual's age. But the association weakens as the level of an individual's education increases.

As Figure 3.4 indicates, the net effect of work experience on the likelihood of employment varies across services as well as civilian

[4] We note that the causal impact of education on employment is not well established, but we make this assertion herein based on the correlation between higher education and the change in odds of being employed.

Figure 3.4
Change in Odds of Being Employed, by Labor Market Experience, for Civilian and Military Wives, by Service



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.4*

status.[5] For instance, the effect of work experience is the smallest for civilian wives, indicating that increased work experience does not substantially increase the likelihood that civilian wives will be employed. Army and Marine Corps wives benefit the most from increasing work experience, while the benefit of having labor market experience is relatively smaller for Air Force and Navy wives. Holding other factors constant, Army and Marine Corps wives who have been out of school

[5] This finding seems contrary to the results of Hosek et al. (2002), who find that civilian and military wives do not differ in the effects of age on being employed. However, Hosek et al. used a different type of regression model, limited their study to wives who were 20–41 years old, and had a relatively very small sample of military wives. The most likely source of the difference is that Hosek et al. combined all military wives as one group. As a result, the stronger effects of experience for Army and Marine Corps wives could have been balanced out by the weaker effects for Air Force and Navy wives, producing an overall effect for all military wives that was more similar to that for civilian wives.

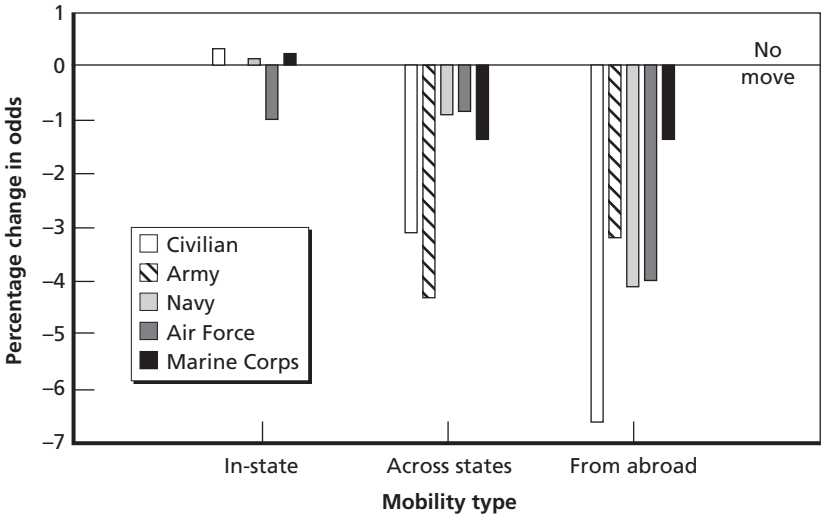
longer are more likely to be employed compared with Army and Marine Corps wives who just finished their schooling. For example, an Army wife with 15 years of potential work experience is about 70 percent more likely to be employed than another Army wife who just finished school with no accumulated work experience. In contrast, an Air Force wife with 15 years of potential work experience is about 20 percent more likely to be employed compared with another Air Force wife with no work experience. This finding is interesting because it may suggest that spouses—Army, Marine Corps, and Navy spouses interested in employment—are not necessarily self-selecting out of the system or encouraging their husbands to leave the military, as previous research has hypothesized (Hosek et al., 2002). Instead, wives of more-senior military personnel are actually more likely to be employed than are spouses married to more-junior service members within the same service.

There is also an alternative explanation: Military wives who cannot coordinate their own aspirations to work with their military lifestyle may have successfully encouraged their husbands to leave the military. Hence, over time, more-senior wives are actually those who fit the military life. We cannot distinguish between these two explanations with the available data.

Effects of Mobility on Spouse Employment

As shown in Chapter Two, military wives relocate more frequently than civilian wives, and the majority of military moves are across states. These relocations are another characteristic of military spouses that we might expect to affect employment opportunities. Figure 3.5 displays the change in the likelihood of employment, based on relocation within the five-year interval. As the figure indicates, while in-state moves have only a negligible effect on employment status, moves across states or from abroad have a considerable negative effect on the likelihood of employment. The slight positive effects of in-state moves for some groups may indicate that these are voluntary relocations by families to improve their socioeconomic conditions.

Figure 3.5
Likelihood of Being Employed, by Types of Residential Mobility, for Civilian and Military Wives, by Service



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.5*

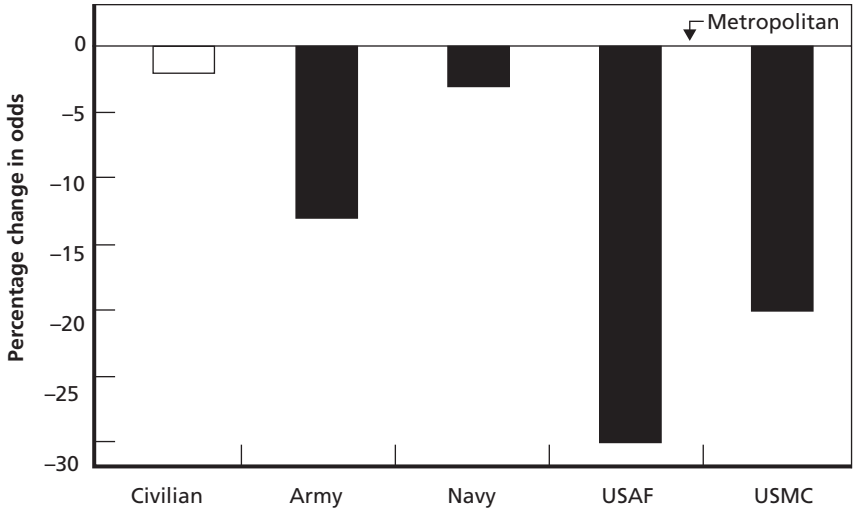
While the employment status of Marine Corps wives indicates the least employment consequence from moves within the country, and the largest apparent impact is felt by civilian wives who move from abroad, all military wives suffer negative effects from relocating.[6] As shown in the previous chapter, military wives relocate more frequently than do civilian wives, and the majority of military moves are across states. Hence, the effect of long-distance moves on military employment is considerable, and the perception of frequent moves as a barrier to employment is discussed later in this report.

[6] The overall trend is consistent with previous finding by Hosek et al. (2002, Table 5.3). We, however, did not analyze whether a wife worked full-time nor her weeks worked. Hence, we cannot confirm their conclusion that military families are more-efficient movers, because it is based on analyses of weeks of work. As the Hosek et al. study pointed out, civilians who move from abroad are most likely to be immigrants.

Effects of Residence on Spouse Employment

Living in a nonmetropolitan area[7] has a negative effect on employment, especially for Air Force wives. Figure 3.6 illustrates that living in such areas reduces the odds of being employed by 30 percent for Air Force wives, 20 percent for Marine Corps wives, and about 15 percent for Army wives, while the effect is negligible for civilian and Navy wives. Although this finding may confirm popular perceptions that the military wives living in nonmetropolitan areas—mostly areas far away from major cities—have a difficult time competing in the labor market, the data also indicate, as we saw in the previous chapter, that the overwhelming majority of military wives actually live in metropolitan areas. Hence, the negative impact on military wives' employment status is minimal.

Figure 3.6
Likelihood of Being Employed, by Types of Residential Areas, for Civilian and Military Wives, by Service



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.6*

[7] Those classified by the Census Bureau as outside of MSAs with integrated labor markets.

Effects of Other Characteristics

We also investigated effects of other characteristics in our regression analyses.[8] For instance, while we do not graphically present the effect of having young children at home on being employed, the results show that, as one may expect, having young children reduces the odds of being employed (by about 70 percent[9]). The effect, however, is similar for all wives.

Effects of Observed Characteristics and Unobserved Factors on Spouse Employment

Chapter Two showed that there are differences in individual characteristics (e.g., educational level, age, ethnicity) as well as employment status among military and civilian wives. The preceding discussion in this chapter explored the specific effects of individual characteristics on the likelihood of being employed. A natural question then is whether differences in something other than such observed characteristics of wives can account for the differences in their employment status, as shown in Figure 3.1. In other words, how can one be sure whether the characteristics affect employment, and if so, which ones do?

There may, after all, be employment effects that result from biases or behaviors that are not attributable to individual characteristics. We would consider such bias or behaviors as "unobserved factors" as compared with the "observed characteristics" that we can directly explore. Table 3.1 lists observed characteristics and potential unobserved factors that can influence the employment status of wives. The observed characteristics are those, such as education, that were controlled for in the previous data explorations of the effects of specific characteristics. The unobserved factors emerge as hypotheses from prior research (Hosek et al., 2002; Harrell, 2001; Harrell, 2003)

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[8] Complete coefficients from the regression are available from the authors upon request.

[9] Calculated by $(0.34 - 1) \times 100$.

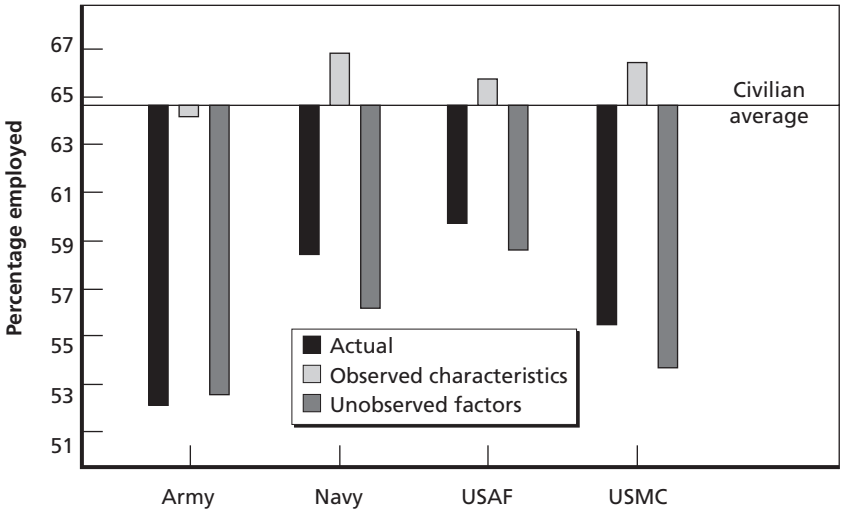
Table 3.1
Observed Characteristics and Unobserved Factors in Military Spouse Employment

Observed Characteristics	Unobserved Factors
• Wife's characteristics –Education –Work experience –School enrollment –Occupation or industry –Race or ethnicity • Family factors –Young children –Recent move –Metropolitan area • Husband's characteristics –Education –Work experience –Military experience	• Military wife's "taste" for work • Employer bias • Family demands by military

and are explored here as well as in successive chapters. The unobserved factors listed below include whether a military wife has a "taste" for work; in other words, is she inclined to work outside the home, or is her preference not to work? There may also be an employer bias toward military wives, compared with similar civilian wives, which could work either in favor of military wives or against them. Finally, the third unobserved factor addresses the demands that the military places on the entire family, which has been addressed in prior research labeling the military as a "greedy" employer (Segal, 1988).

Figure 3.7 provides three observations for each group of spouses, compared with the average employment rate of civilian spouses. For the spouses of each service, the first bar indicates the actual employment rate. The second bar indicates the employment rate that would occur for that group of spouses if based entirely on their observed characteristics. The third bar suggests the amount of outcome that results from unobserved factors. (For detailed explanation of this de-

Figure 3.7
Effects of Observed Characteristics and Unobserved Factors in Military Spouse Employment



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.7*

composition, see Appendix C.) This figure thus enables us to distinguish what is affecting employment status, the demographic characteristics among military wives, or their lifestyle or status as a military wife.

This analysis demonstrates that, were military spouses employed solely on the basis of their observed characteristics, they would generally be more likely than civilian spouses to be employed. This is discernable from the figure, which indicates the average civilian employment rate with a horizontal line just below 65 percent.[10] Using the Army as an example, the first bar indicates the actual employment rate of Army wives as approximately 52 percent. The next bar shows that, were their employment based on observed characteristics (e.g., age, educational level), they would be employed at

[10] The civilian wife measure is used here and in similar figures as a basis of comparison; it is therefore represented as a horizontal line to contrast with the military wives.

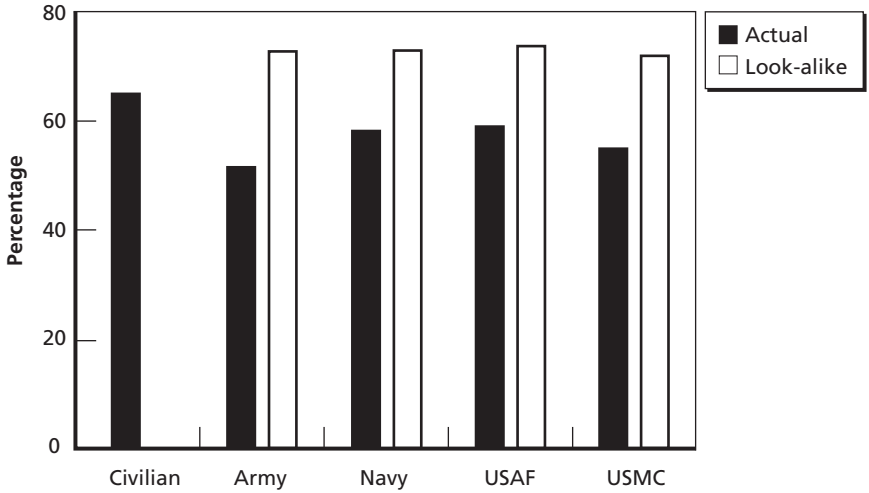
almost the same rate as civilian wives (approximately 64 percent). The third bar indicates that unobserved factors (e.g., the demands associated with military life, employers' perceptions or treatment of them) are dragging their employment rate down to as far as 53 percent, or more than 11 percentage points lower than that of the average civilian wife. When considering Air Force wives, their actual employment rate is the highest of all military wives. However, were they employed based on their observed characteristics, they would be employed at a rate higher than the civilian average. This is also true for Navy and Marine Corps wives.

What is unclear from this analysis is which unobserved factors are negatively affecting the employment rate. Are they predominantly the actions of employers acting with bias against military spouses, or are they the actions of military spouses who may not desire to work or who may be unable to participate in the workforce because of the family demands of the military? Later chapters pursue this distinction with interview data.

We can, however, confirm the combined effects of observed characteristics and unobserved factors by considering the data differently. It is especially instructive to understand how military spouses compare with civilian spouses who share their same observed characteristics, whom we refer to as "look-alikes" for the purpose of this analysis. (See Appendix D for detailed description of the propensity analysis.) Such propensity analysis permits us to confirm that military spouses are not as likely to be employed as their civilian look-alikes.

Figure 3.8 indicates the civilian average rate of employment in the left-most bar. The first of the next pair of bars indicates the actual employment status of Army spouses as less than the 65 percent of civilian spouses indicated in the first bar. The second Army bar—Army spouses' look-alikes—indicates that if Army spouses were employed at the same rate as their look-alikes, more than 70 percent of Army spouses would be employed. The look-alikes for spouses from the other services suggest similar employment rates.

Figure 3.8
Percentage Employed Among Civilian, Military, and "Look-Alike" Civilian Wives



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.8*

This analysis confirms the importance of unobserved factors: Military spouse employment rates cannot be explained away by their own characteristics. In other words, asserting that military spouses are younger, more racially and ethnically diverse, and more geographically mobile than the civilian population does not explain their employment rates. To the contrary, "who they are" would suggest that they might be employed at a higher rate than the civilian average. Thus, to understand their employment rates, we must further examine the interaction of unobserved factors. We undertake this examination in the following chapters as we explore why military spouses work and how they perceive the military lifestyle has affected their employment and educational opportunities.

Military Spouses Are More Likely Than Civilians to Be Seeking Work

We now consider the likelihood of military wives being unemployed, defined as those who are jobless but actively seeking work.[11] The examination of unemployment among military and civilian wives addresses one popular explanation of military wives' employment conditions: Their conditions are direct results of their lifestyle and values, which may be fundamentally different from civilian wives. For example, we can consider the hypothesis that military wives are less employed because they generally have less of a "taste" for work than civilian wives. That is, by concentrating on those who are in fact seeking work, the differences in employment status we observe cannot be attributed to possible differences in motivation and attachment to work.

An examination of unemployed military spouses, as shown in Figure 3.9, indicates that Army wives are three times more likely to be unemployed than civilian wives. Similarly, Marine Corps wives are more than two times as likely as civilian wives to be unemployed.

Figure 3.10 provides a baseline comparison for this issue by illustrating the net differential unemployment rates among wives by their husband's military status. In this figure, the probability of being unemployed is computed for wives who are high school educated, white, have not moved in the last five years, have no young children, are not enrolled in school, have no experience in the labor market, live in metropolitan areas, and whose husbands are also high school educated, with no years of civilian labor market experience. Holding all these factors constant, the only difference among these wives is their husband's military service. This depiction provides a necessary baseline in order to explore the effects of observed characteristics on the likelihood of being unemployed.

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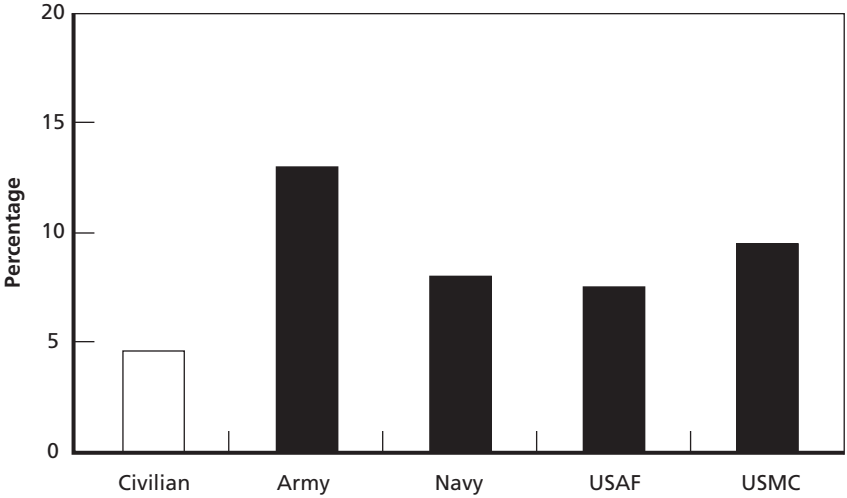
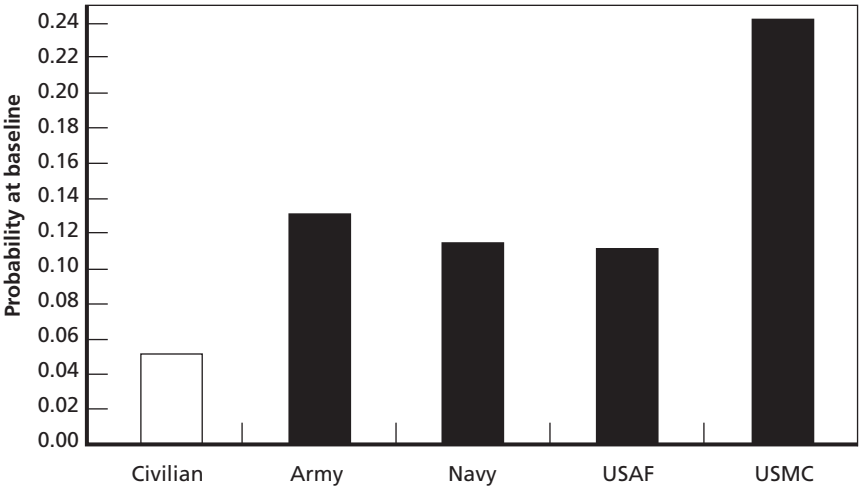
[11] In contrast, those who do not have jobs and are not seeking work are not in the labor force. Thus, all individuals fall into one of three categories: employed, unemployed, or out of the labor force. Thus, being unemployed is not simply the opposite of being employed.

Figure 3.9
Unemployment Rate (Percentage Seeking Work) Among Civilian and Military Wives, by Service



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.9*

Figure 3.10
Unemployment of Baseline Military Spouses, by Service



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.10*

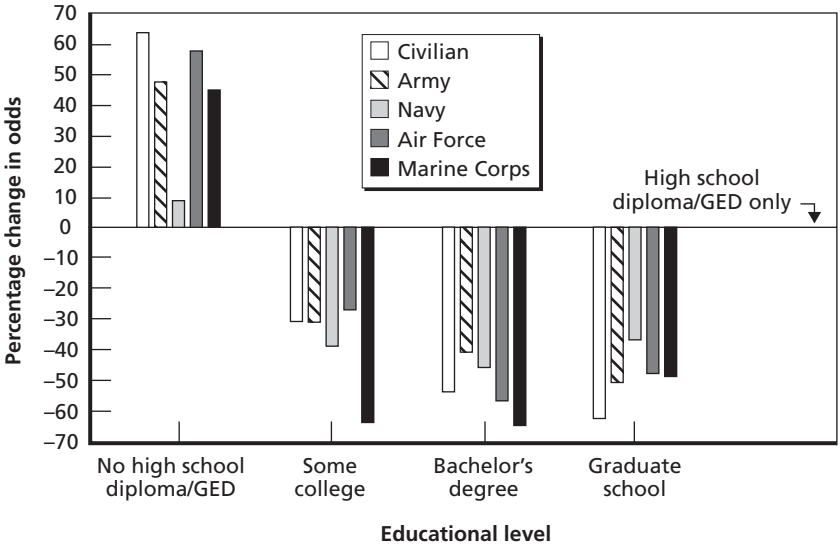
The results are quite startling. First, military wives from all the services are more likely to be actively seeking work, implying either that they do so more frequently or that their job searches take longer, or both. For instance, about 5 percent of civilian wives who are in the labor force are unemployed. In contrast, military wives, regardless of their husband's service affiliation, are at least twice as likely as their civilian counterparts to be unemployed. Marine Corps wives face the most drastic condition: One out of four Marine Corps wives with the baseline characteristics are actively seeking work. This disparity cannot be explained away by differences in the characteristics, as the only variation is the husband's military service or lack thereof.

It is instructive to compare Figures 3.9 and 3.10. Figure 3.9 shows raw percentages of the unemployed in each group without controlling for their characteristics. The figure reveals that Army and Marine Corps wives are most likely to be unemployed. Comparing only those two groups, Army wives are more likely than Marine Corps wives to be unemployed. However, Figure 3.10 shows that, at the baseline, when we control for differences and compare strictly homogeneous groups, Marine Corps wives are in fact more likely than Army wives to be unemployed. This finding highlights the importance of controlling for differences in individual characteristics. Army wives characteristics, or "who they are," negatively affects their unemployment status. However, because Figure 3.9 portrays a more positive story for Marine Corps wives, we know that Marine Corps wives' characteristics in fact alleviate their overall unemployment status. When they are compared with other wives with baseline characteristics, their unemployment rate increases from 10 percent to 24 percent. Figure 3.10 thus shows that, when we control for differences, the disparity between military and civilian wife unemployment becomes even clearer and the impact of the husband's military service is revealed as the major explanatory factor.

Effects of Education on Spouse Unemployment

Figure 3.11 shows the relative likelihood of unemployment, given certain levels of education. Thus, the bars extending upward indicate

Figure 3.11
Changes in Odds of Being Unemployed, by Educational Level, for Civilian and Military Wives, by Service



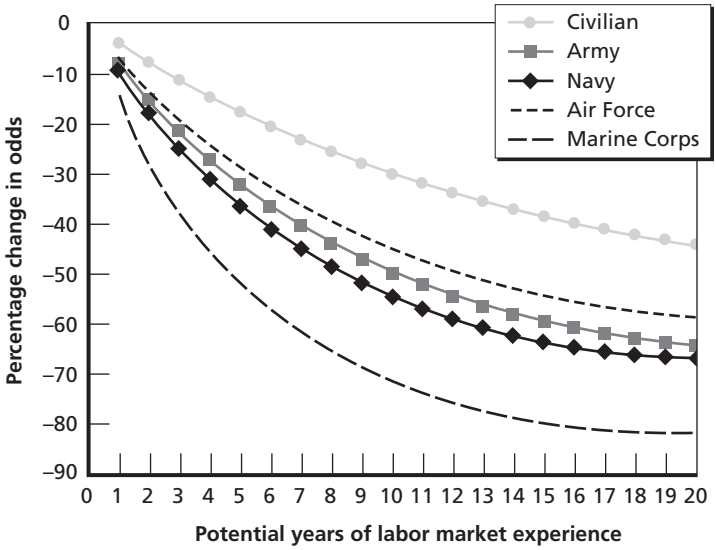
SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.11*

that high school dropouts have a higher likelihood of unemployment than do high school graduates, the comparison group. The bars extending downward indicate that education does reduce the likelihood of being unemployed. It is notable that the failure to graduate from high school hurts civilian wives more than military wives. At the same time, gaining additional education helps civilian wives to avoid unemployment. Among the military wives, Marine Corps wives seem to benefit the most from some college education, whereas Navy wives see a significant positive effect from completing their undergraduate degree. Military wives do not benefit to the same extent that civilian wives do from obtaining a graduate degree. These findings indicate that, once again, observable characteristics cannot sufficiently explain the disparity.

Effects of Labor Market Experience on Spouse Unemployment

Figure 3.12 indicates the effect of labor market experience on unemployment. As with higher education, gaining labor market experience helps all wives experience lower unemployment as they gain labor market experience. In other words, their job searches may be briefer because they increase experience that they can market to potential employers. Also, similar to the results from employment status, Marine Corps wives benefit the most from increasing age and experience in the labor market. As expected, these results show that increasing work experience benefits all wives in terms of lowering unemployment, but the degree to which these increases help wives in the labor market varies by the husband's civilian and service status.

Figure 3.12
Odds of Being Unemployed, by Labor Market Experience, for Civilian and Military Wives, by Service



SOURCE: Authors' calculation from the 1990 Census.

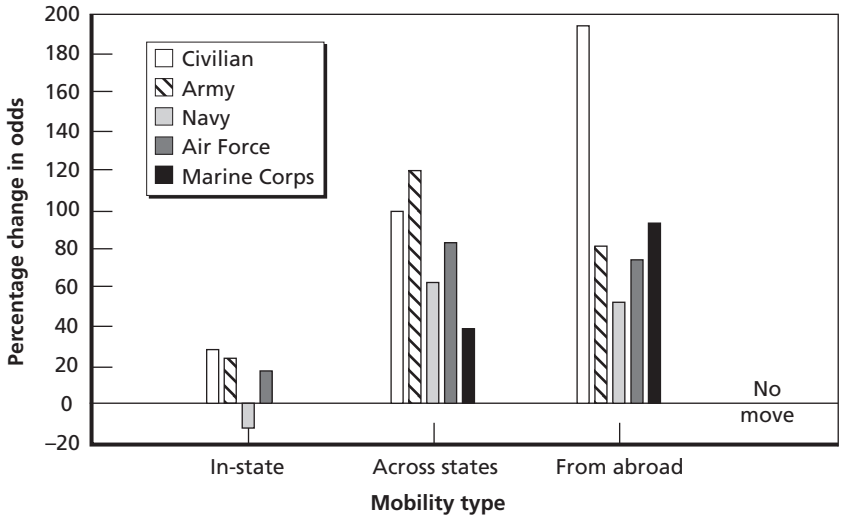
RAND *MG196-3.12*

This finding once again suggests unexplained differences in the degree to which work experience is rewarded in the labor market for wives of military and civilian men.

Effects of Mobility on Spouse Unemployment

Mobility appears to affect unemployment much as it did employment status (see Figure 3.13). Consistent with the hypothesis that mobility causes disruptions in employment tenure, relocating increases the likelihood of being unemployed, and these adverse effects generally increase with the distance of the move. Similar to the results for joblessness, civilian wives who relocate from abroad suffer the most, and civilian wives who move across states suffer more than most military spouses. However, as our findings in Chapter Two indicated, most

Figure 3.13
Changes in Odds of Being Unemployed, by Mobility Types, for Civilian and Military Wives, by Service



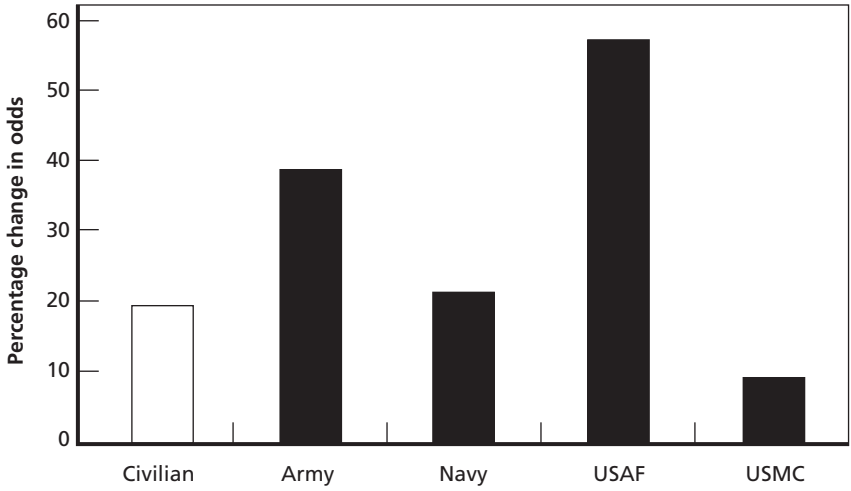
SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.13*

military moves are across states and military wives move considerably more frequently than civilian wives. Thus, Army wives suffer the most overall from mobility, compared with wives of other servicemen, because they are the most negatively affected by this most-frequent type of move. Marine Corps wives are the least affected by the moves.

Effects of Residence on Spouse Unemployment

As noted in Chapter Two, Navy wives are slightly less likely to reside in nonmetropolitan areas than are other military wives, and all military wives are less likely than civilian wives to live in such areas.[12] As with employment, nonmetropolitan residence has a consistent effect on unemployment, because it always increases the likelihood of the wife being unemployed. However, Figure 3.14 indicates that for

Figure 3.14
Odds of Being Unemployed, by Nonmetropolitan Residence, for Civilian and Military Wives, by Service



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.14*

[12] See Appendix B for a map of the MSAs in the United States.

those spouses who do live in nonmetropolitan areas, the effect differs by service. Being in a nonmetropolitan rather than a metropolitan area is twice as harmful to Army wives and close to three times as harmful for Air Force wives seeking work as it is to civilian wives. However, residing in nonmetropolitan areas does not hurt Navy or Marine Corps wives significantly more when compared with civilian wives.

Effects of School Enrollment and Having Small Children on Spouse Unemployment

Being enrolled in school and having small children in the home are both competitors for time that could be barriers to employment, but they do not affect unemployment status through the same mechanisms. Such factors may affect unemployment status if a woman has to find certain types of jobs—for instance, one with a flexible or part-time schedule—to accommodate these other activities. Such criteria may limit her employability in the labor market even if she is actively looking for work.

In this study, we find that having young children has a detrimental effect on *all* wives' unemployment status, while being currently enrolled in school is not consistently detrimental. For most wives, having young children increases unemployment status by about 25 percent, but it is especially detrimental to Army and Navy wives, increasing the likelihood of unemployment by 41 percent and 36 percent, respectively. In contrast, current school enrollment increases unemployment only for civilian wives and has a trivial effect on military wives.

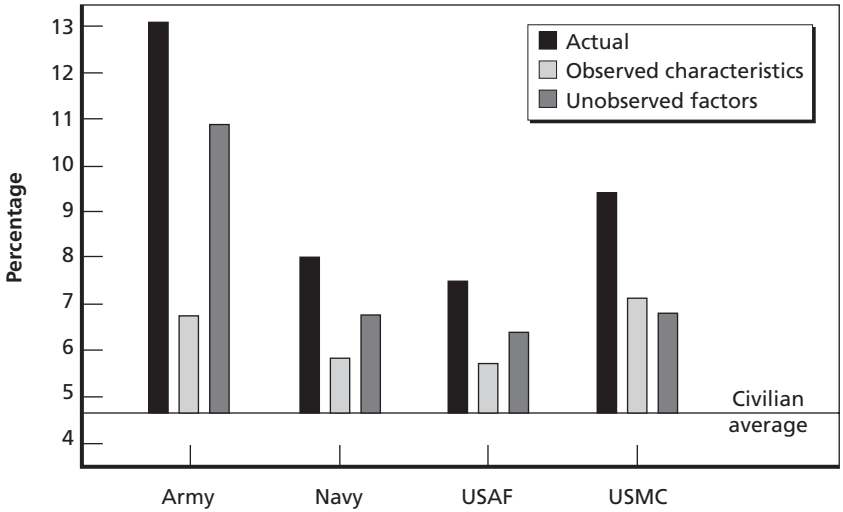
Effects of Observed Characteristics and Unobserved Factors on Spouse Unemployment

This discussion has explored individual observed characteristics for their effects on the unemployment status of military spouses, asking whether particular characteristics make a job search more difficult or more prolonged, thus increasing the likelihood that the wives are unemployed. Earlier in the chapter, we looked at the impact of all observed characteristics together on employment rates (see Figure

3.7). Now we turn to a consideration of whether all the observed characteristics account for the increased likelihood that military wives are unemployed when compared with civilian wives.

Figure 3.15 shows that the answer to this uncertainty varies by service. Army spouses, who are most likely to be unemployed, would have considerably lower unemployment rates were it not for the effect of unobserved factors. Again, these factors may include bias on the part of the employer, lack of a real desire to work, or considerable difficulty finding a job that accommodates the demands of the military on the family and spouse. Spouses in the other services do not experience such a dramatic effect of unobserved factors. Instead, the

Figure 3.15
Effects of Observed Characteristics and Unobserved Factors in Military Spouse Unemployment

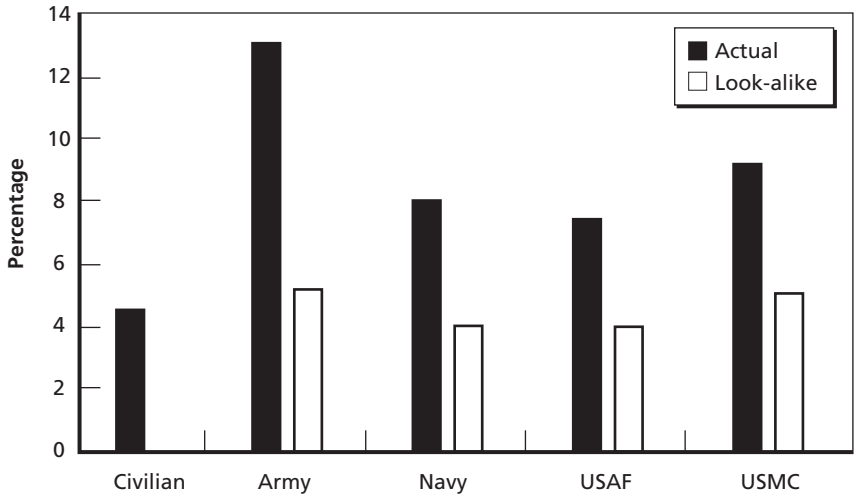


SOURCE: Author's calculation from the 1990 Census.
RAND *MG196-3.15*

effect of observed characteristics and unobserved factors are roughly equal for Air Force and Navy spouses, and the unemployment of Marine Corps spouses is based more heavily on observed characteristics. Nonetheless, the effect of unobserved factors still roughly doubles the likelihood that these spouses will be unemployed.

These findings are consistent with the look-alike analysis shown below in Figure 3.16,[13] which indicates that Army spouses are considerably more likely to be unemployed than their civilian look-alikes, while the spouses of other services were only slightly more likely to be unemployed than their civilian look-alikes.

Figure 3.16
Percentage Unemployed Among Civilian, Military, and Military Look-Alike Civilian Wives



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.16*

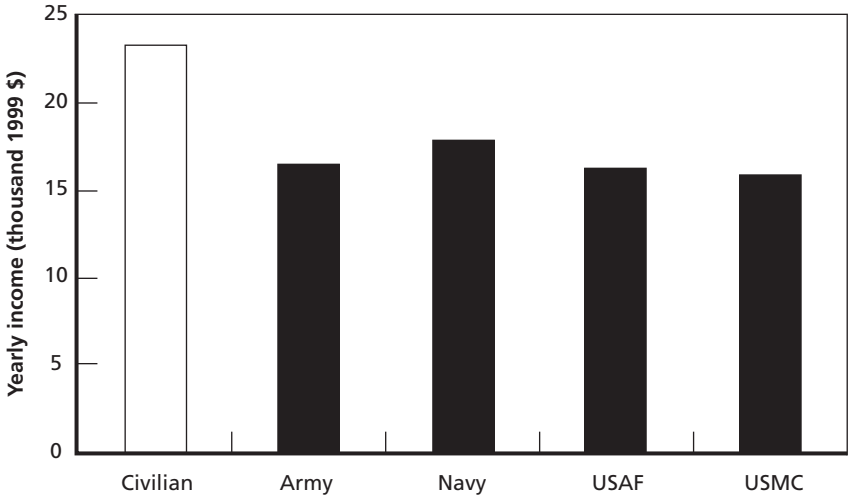
[13] See earlier explanation of Figure 3.8 for an explanation of how to interpret the "look-alike" material.

Military Wives Earn Less Than Civilian Wives

Not only are military wives more likely to be jobless, but even when they do have jobs, they earn less than their civilian counterparts. For example, in 1990, the annual income gaps ranged from $5,500 between Navy and civilian wives to $7,400 between Marine Corps and civilian wives, as shown in Figure 3.17.[14]

Concentrating on gaps in annual incomes can be misleading because military wives may in fact not work as much during a year as

Figure 3.17
Annual Income of Civilian and Military Wives, by Service



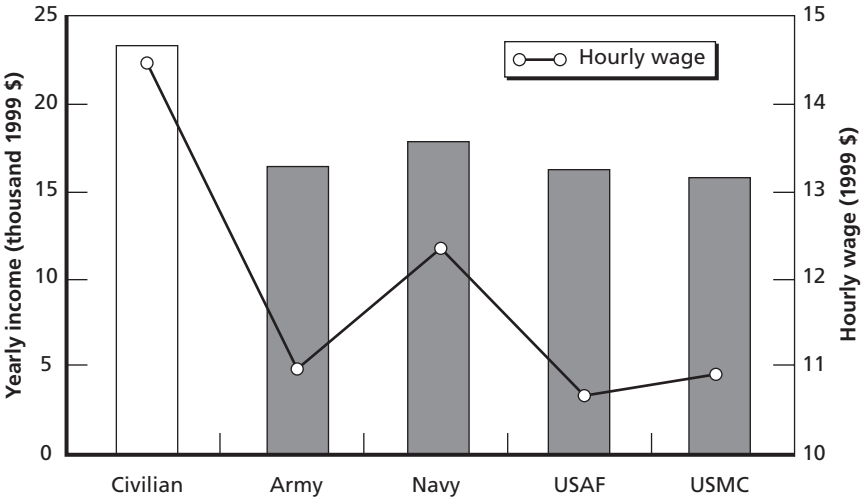
SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.17*

[14] While 1990 salaries do not convey what spouses are currently earning, surveys of military spouses have not included salary questions since 1992, and the 1990 Census data are more robust than the 1992 data set. Additionally, it is the relative differences in income between spouses of the different military services and between military and civilian spouses that are of interest here.

their civilian counterparts do, given that frequent moves may disrupt their employment. Alternatively, they may work part-time to care for their young children. All these possibilities could distort the gaps we observed in the previous figure. However, the disparities remain even if we compare hourly wages. For instance, Figure 3.18, which displays annual income as bars (read from the left axis) and hourly income as lines (read from the right axis), indicates that military wives generally earned about $3 per hour less than civilian wives, with Navy wives having the best average hourly wage.

Concentrating on hourly wages, we effectively control for possible differences in weeks and hours worked among the groups. Similar to Figures 3.2 and 3.10, Figure 3.19 provides a baseline assessment of wives' hourly wages, for those who are high school educated, white,

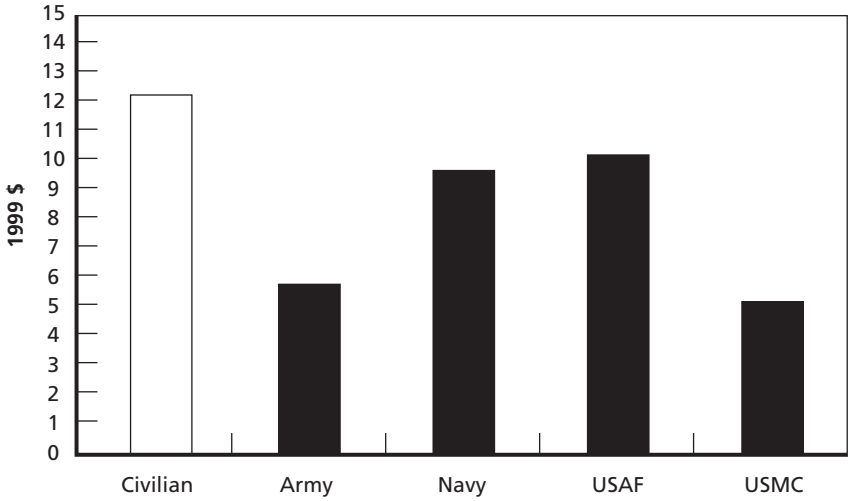
Figure 3.18
Annual Income and Hourly Wages (in 1999 Dollars) Among Civilian and Military Wives, by Service



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.18*

have not moved in the last five years, have no experience in the labor market, and live in metropolitan areas.[15] The figure shows that civilian wives earn about twice as much as Army and Marine Corps wives, while Air Force and Navy wives with similar characteristics earn about $3 per hour less than their civilian counterparts. These differences represent the net "cost" of being a military wife.

Figure 3.19
Baseline Hourly Wages of Civilian and Military Wives, by Service



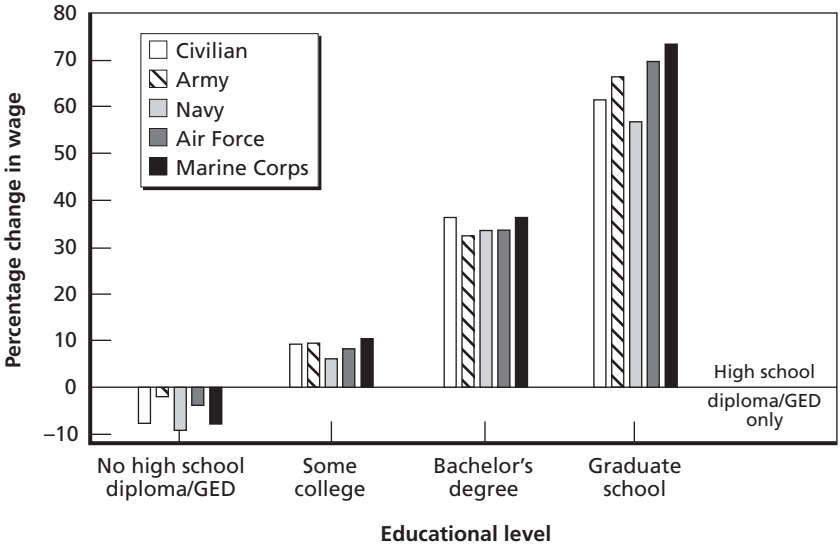
SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.19*

[15] We also control for differences in occupational and industrial characteristics among military and civilian wives by fixing the values of the variables at national averages. To correct for selection bias due to wives' decision to work, we used regression models with the Heckman correction implemented for the survey data. Characteristics such as having young children at home, school enrollment, husband's education, and his years of civilian labor market experience are included only in the selection equation of the Heckman model, postulating that these characteristics directly affect wives' decision to work but not their hourly wages.

Effects of Education on Spouse Earnings

Figure 3.20 demonstrates the effect, controlling for other characteristics, of education on hourly wage. The effect is generally what one might expect. Having a higher educational level increases one's average hourly wage for those with a bachelor's or graduate degree, compared with those having only a high school education. However, Army and Air Force wives in particular suffer less in average wage decrease than other wives for dropping out of high school. The benefit of getting some college education and going to graduate school for Navy wives is relatively smaller, indicating the high level of in-group equity among Navy wives. This is reinforced by the fact that Navy wives earn the highest average hourly wage among all military wives.

Figure 3.20
Effects of Education on Civilian and Military Wives' Hourly Wages, by Service

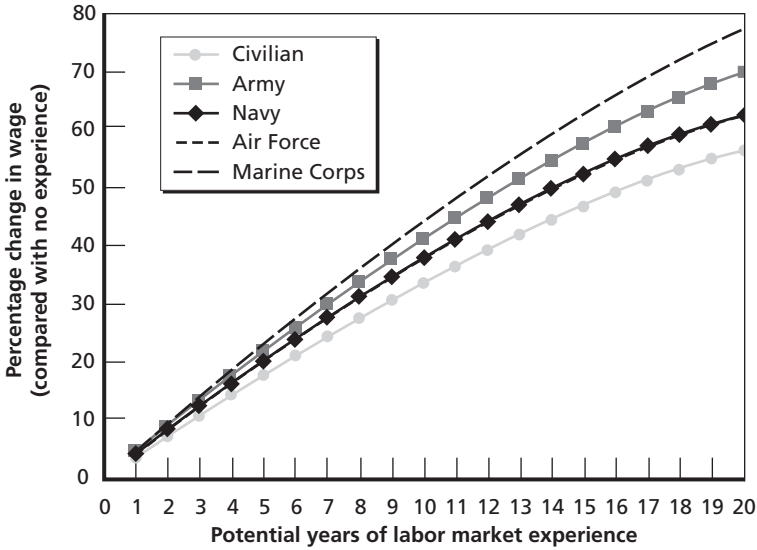


SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.20*

Effects of Labor Market Experience on Spouse Earnings

As for experience, potential years of labor force participation increase pay per hour for all wives. Contrary to the results of Hosek et al. (2002), we find that the labor market "returns" for work experience vary between civilian and other wives; the difference increases with experience as years of experience increase. Yet, the difference favors military wives. For instance, Figure 3.21 shows that military wives enjoy higher returns for their labor market experience. This finding may signify that military wives who have been in the labor market longer have been able to adapt to the military life and minimize its effect on their hourly wages.

Figure 3.21
Effects of Labor Market Experience on Civilian and Military Wives' Hourly Wages, by Service



SOURCE: Authors' calculation from the 1990 Census.

RAND *MG196-3.21*

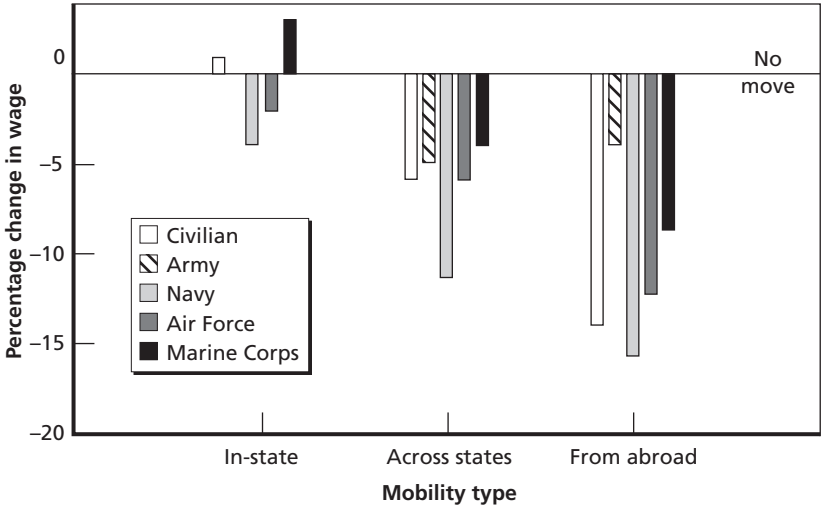
Effects of Mobility on Spouse Earnings

Not surprisingly, mobility negatively affects wages, with Navy wives faring the worst. Figure 3.22 suggests that not only does moving clearly have the negative effect of interrupting employment and, therefore, increasing joblessness and unemployment, but it also appears to prevent wives from getting higher paying jobs or from gaining tenure, seniority, and accompanying pay increases, as well. Moving across states within the last five years cost more than $10 per hour for Navy wives; for others, the cost is about $5 per hour on average.

Effects of Residence on Spouse Earnings

Living in a nonmetropolitan rather than a metropolitan area also decreases hourly wages for all spouses other than Air Force wives (see

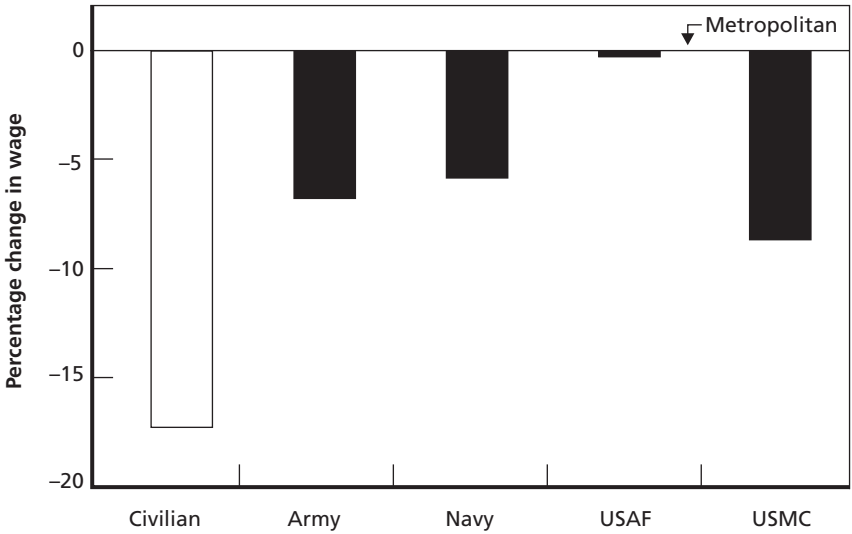
Figure 3.22
Effects of Residential Mobility on Civilian and Military Wives' Hourly Wages, by Service



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.22*

Figure 3.23). Civilian wives in particular suffer from living in a nonmetropolitan area, earning about $15 per hour less than their counterparts living in a metropolitan area. This finding supports the hypothesis that military bases in nonmetropolitan areas create their own microeconomies that benefit military wives more than civilian wives (Hosek et al., 2002). Nonetheless, our finding is slightly different from previous research that found that military wives in nonmetropolitan areas fared approximately the same as military wives in metropolitan areas (Hosek et al., 2002). Given the robustness of our data, which permitted analysis by service, we are able to assert that military spouses of three of the four services do suffer an income disadvantage, albeit less than that of civilian wives, from residing in nonmetropolitan areas.

Figure 3.23
Effects of Living in Nonmetropolitan Area on Civilian and Military Wives' Hourly Wages, by Service



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.23*

Relative Earnings of Military Wives Living in Metropolitan Areas

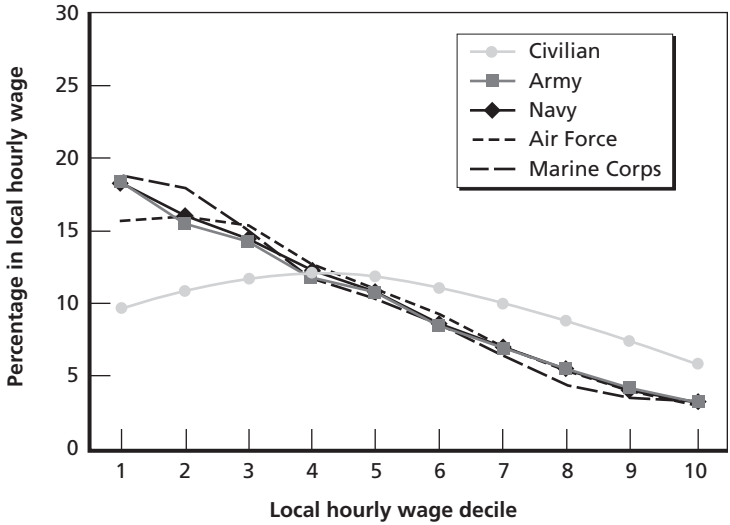
Even though military wives living in nonmetropolitan areas earn less than their metropolitan counterparts, we cannot assume that military wives living in metropolitan areas fare well. Additionally, because the Census data include civilian wives from all over the country, including areas with few military families, one may argue that conclusions drawn from analyses of national-level data are misleading, since military wives may reside in areas where prevailing wages are on average lower or higher than other geographical areas. To rule out this possible explanation, we designed an analysis that concentrates on the local labor markets of the places where military wives reside.

To do so, we compared military and civilian wives who live in the same geographical areas. Using the 1990 Census data, we sorted all residents of each MSA into 10 equal groups based on their hourly wages.[16] We included everyone who had hourly wages in 1990. The first group belongs to the lowest earners and the 10th group belongs to the highest earners within a metropolitan area. Then, we assigned each wife into an hourly-wage-decile group based on her wage. To wit, wives who belong to the 10th decile group earn the highest level of hourly wages compared with every wage earner living in the same metropolitan area.

Figure 3.24 indicates the income positions of military wives compared with their neighbors in the same MSA. If the wages of military and civilian wives could be described by the same distribution, we would see 10 percent of the sample falling in each decile, indicating equal shares of high and low earners. We found, however, that wives are generally underrepresented among high earners. For instance, looking at civilian wives, we can see that they are slightly overrepresented (more than 10 percent) in lower wage deciles, concentrated in the middle deciles, and underrepresented (less than 10 percent) in higher wage deciles. To put it differently, about 32 per-

[16] Appendix B includes a map of the MSAs in the United States.

Figure 3.24
Military Spouse Earnings, by Service, Compared with Civilian Neighbors Living in the Same Metropolitan Area



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.24*

cent of civilian wives belong to the bottom 30 percent of wage earners, while 22 percent of civilian wives belong to the top 30 percent of wage earners in their local labor markets. This finding may reflect the fact that, in general, civilian wives tend to be secondary earners in their families. Nonetheless, one might make a similar assumption that military wives are also the secondary earners and thus expect to see similar patterns among military and civilian wives.

What is most relevant for our purposes, however, is that military wives are overrepresented among the lowest earners. The differences are most profound at the lowest end of the income distribution. For instance, about 52 percent of Marine Corps wives belonged to the lowest three deciles, while only about 32 percent of civilian wives were in the same wage categories. Additionally, military wives from all the services are underrepresented in higher wage groups. For instance, civilian wives are more likely (22 percent) to be in the top

30 percent of income earners compared with military wives; about 12 percent of them are in the top categories. These results indicate that we cannot fully attribute observed hourly wage differences between military and civilian wives from the national-level analyses based on differences in local prevailing wage structures. Military wives are, in fact, worse off than their civilian neighbors.

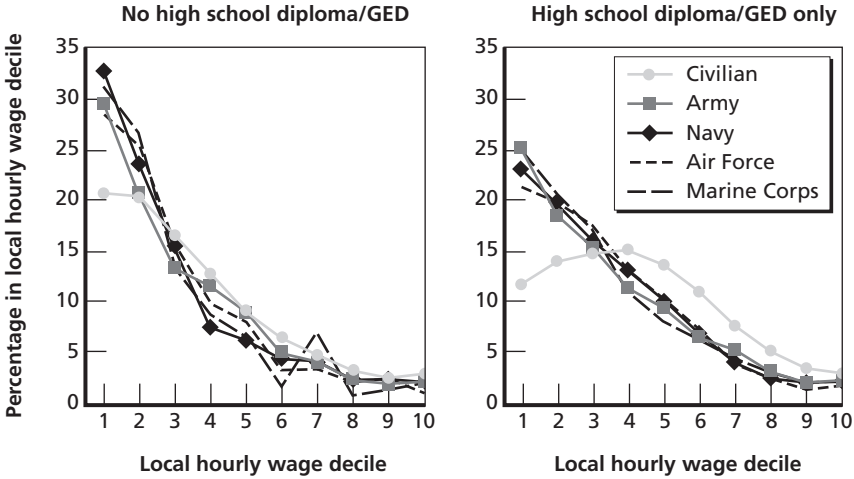
We may be able to explain some of these discrepancies by examining the same decile data by educational level. Figures 3.25 and 3.26 show the data divided by educational level. We find that less-educated military spouses are more likely than their civilian neighbors to occupy the lower deciles. This finding might suggest that employers, when hiring less-skilled workers, are willing to pay higher wages for those from the local area, compared with military wives who may have arrived recently. If so, this practice is consistent with social science research on preferences of employers who hire low-skilled workers, which suggests that low-skilled workers lack reliable "signals" about their work ethic that employers can take into account in their hiring decisions. As a result, employers rely on other informal signals, such as familiarity. (See, for example, Moss and Tilly, 2001.)

The gap between the proportions of military wives and the proportions of civilian wives who occupy the lower deciles decreases with education, but military wives with some college are still more likely to occupy the lower deciles and less likely to occupy the higher deciles. Among more-educated groups, military spouses still have difficulty reaching the higher deciles; even with a college degree, they make less than their civilian neighbors.

Effects of Observed Characteristics and Unobserved Factors on Spouse Earnings

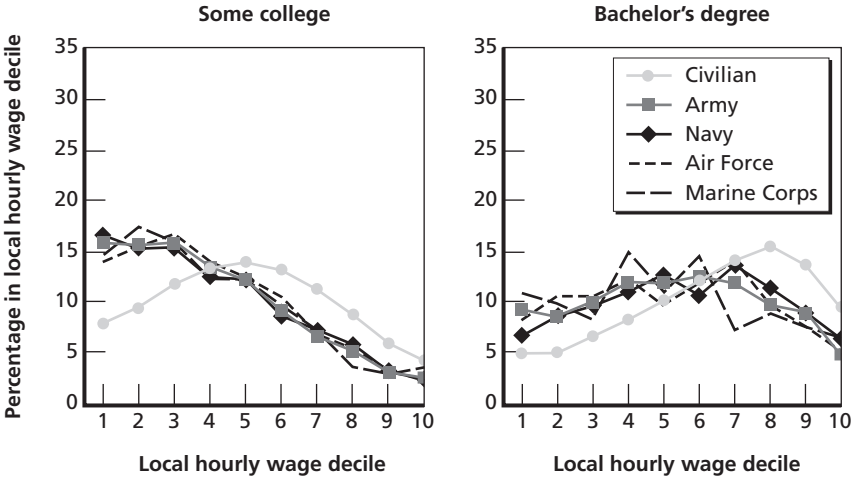
Now that we have depicted the differences between military and civilian wives' earnings, we turn to the source of these differences. Figure 3.27 illustrates the effects of observed characteristics and unobserved factors on military spouses hourly earnings, compared with the civilian average of roughly $14.50 per hour. Army, Air Force, and Marine Corps spouses are more likely to average about $11 per hour,

Figure 3.25
Military Spouse Earnings, by Service, Compared with Civilian Neighbors: No High School Diploma and High School Diploma or GED Only



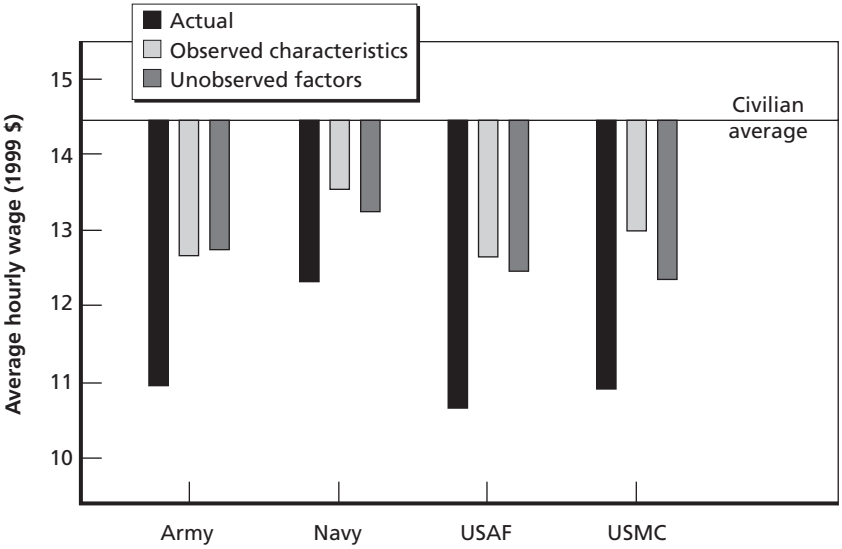
SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.25*

Figure 3.26
Military Spouse Earnings, by Service, Compared with Civilian Neighbors: Some College and Bachelor's Degree



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.26*

Figure 3.27
Effects of Observed Characteristics and Unobserved Factors in Hourly Earnings for Military Wives, by Service



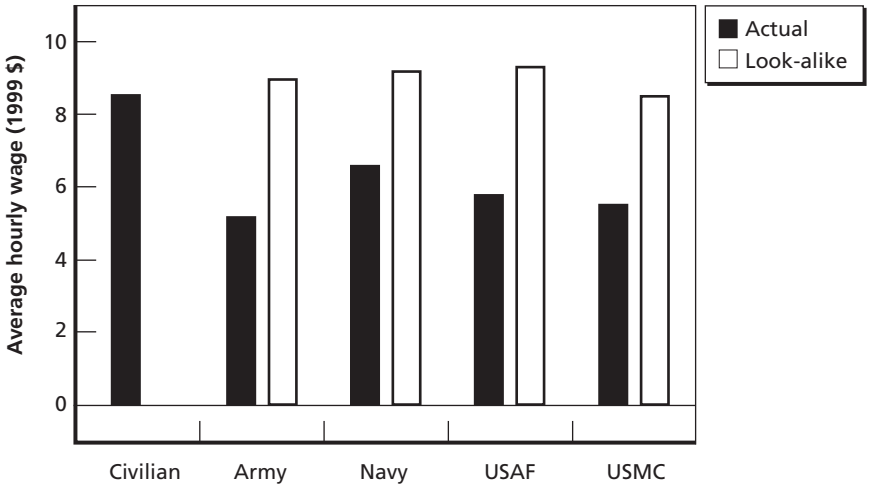
SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.27*

with Navy spouses earning more than $12 an hour. Were military spouses paid based on their observed characteristics, they would earn roughly $13 an hour. Thus, "who they are" still suggests a lower hourly wage than the average civilian wage, but unobserved factors are costing military spouses $1–2 per hour.

This analysis is confirmed by considering the hourly wages of military spouse look-alikes, shown in Figure 3.28, who consistently earn more than military spouses.[17]

[17] The average level of earnings indicated in Figure 3.28 differs from Figures 3.18 and 3.19 because these data include wives who are not employed, which reduces the average.

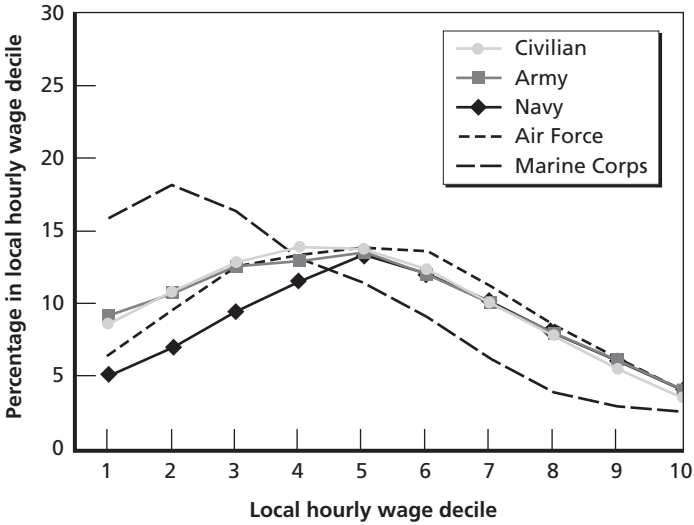
Figure 3.28
Hourly Wages Among Civilian, Military, and Military Look-Alike Civilian Wives



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.28*

This finding can also be confirmed by reexamining the earnings, by decile, of military spouses and their civilian look-alikes (see Figure 3.29). By taking the analysis this step further, we assert that Army and Air Force wives' observed characteristics account for their disadvantages when compared with their neighbors. We see this because their pattern across the deciles is very close to their neighboring look-alikes. However, among Navy spouses, the unobserved factors may actually favor Navy spouses, compared with their neighbors, because they are more likely than their neighboring look-alikes to be earning among the higher deciles. In contrast, Marine Corps wives who look like their civilian neighbors do worse, implying that the unobserved factors disadvantage Marine Corps wives, compared with their neighbors.

Figure 3.29
Hourly Wages Among Civilian, Military, and Military Look-Alike Civilian Wives



SOURCE: Authors' calculation from the 1990 Census.
RAND *MG196-3.29*

Summary

Evidence from the descriptive analyses shows that military wives certainly experience disparities in the labor market. Military wives are more likely to be jobless; when they participate in the labor market, they are more likely to be unemployed compared with their civilian counterparts; and if they work, they earn less than civilian wives do at a national level and when compared with their neighbors.

Results from regression analyses confirm some well-known explanations of military wives' difficulty in the labor market. For example, residential mobility negatively affects the labor market conditions of military wives. However, contrary to expectations, results show that military wives tend to enjoy higher "returns" for their human capital—education and work experience—than do civilian

wives. In other words, military wives can improve their labor market conditions by acquiring higher education, and they do appear to learn to minimize the impact of the military lifestyle over time.

Results from multivariate statistical analyses suggest that differences in individual and family characteristics between military and civilian wives cannot fully account for these differences in the labor market conditions. In fact, civilian wives who look very much like military wives do better than other civilian wives do in the labor market. But these numbers do not tell the entire story. Hence, for a fuller explanation, we now turn to qualitative information and share what military spouses say about how the military lifestyle has affected their employment and educational opportunities.

CHAPTER FOUR

What Do Military Spouses Do, and Why Do They Work or Stay Home?

Beginning in this chapter, we assess the data gathered from the many spouse interviews we conducted. The combination of qualitative and quantitative data resulting from the interviews complements the robust quantitative data previously available and permits us an understanding of military spouse experiences and perceptions. The discussion of spouse occupations is based on, and benefits from, both data sets (Census data and interview data). The analysis of spouses' motivations for being employed or their reasons for staying home depend almost entirely on the interview data, which permits us to portray aspects of spouse employment previously unavailable.

What Do Military Spouses Do?

Two different data sets contribute to our discussion about the occupations of military spouses. The Census data give us a robust description of military spouses for the specific geographic areas we studied as well as nationwide. With these data, we were able to observe whether military spouses' occupations vary considerably from those of civilian spouses. In addition, the qualitative data we gained from our interviews with military spouses provided us with an understanding of what those spouses do and allowed us to analyze these answers by service member's pay grade and other demographic factors.

Ultimately, the Census data and the interviews present us with a richer portrait of military spouse employment. We can assert that military spouses pursue many different kinds of careers and jobs and are represented in many different workplaces. There are, however, some observable patterns in the kind of work they choose, based on their location, their education level, and their active duty spouse's service and pay grade, and there are some differences from civilian wives. The most notable observation is that military wives' occupational choices, nationwide, are remarkably similar to those of civilian wives. Table 4.1 indicates the 10 most frequent occupations of military spouses nationwide, civilian spouses nationwide, and then divides the military data by service. The occupations shown reflect the Census occupational categories and are sometimes split to reflect differences in pay or differences in manager versus worker. For example, administrative support work is split into two salary categories, and retail work is divided between those who are salesclerks and those who manage or own a store. The numbers reflect the relative rankings of the occupations.

From these data we note the tremendous similarity between the occupations of military and civilian spouses, despite the unique pressures of the military lifestyle. There are some differences, however. First, military spouses are more inclined to accept or seek retail positions and are much more likely to work in child care. Military wives also have less of a grip on the higher paid administrative positions that rank second among civilian wives and are less inclined to work in male-dominated blue-collar occupations.

Table 4.2 provides the occupational patterns of spouses from the study focus areas. The table indicates the ranking of each occupation for military spouses at each base's location and also for civilian spouses at the same location. For example, the top-left table entry indicates that the most common job for military wives at Fort Lewis is lower-paid administrative work, and, as noted in parentheses, this occupation category is also ranked first for civilian wives. The cell below that indicates that better-paid administrative work ranks fifth

Table 4.1
The 10 Most Common Military and Civilian Spouse Occupations Nationwide

Occupations	Overall Ranking		Ranking by Service			
	Military	Civilian	Army	Navy	Air Force	Marine Corps
Administrative—less well paid	1	1	1	1	1	1
Administrative—better paid	3	2	3	3	3	3
Retail sales	2	5	2	2	2	2
School teacher	4	4	4	4	5	4
Restaurant	5	7	5	5	4	5
Child care	6	—	6	6	6	6
Registered nurse	8	8	8	8	8	9
Health service aide	9	10	9	9	9	8
Blue collar, majority male	7	3	7	7	7	7
Manager	—	9	10	10	—	—
Sales supervisor/proprietor	10	—	—	—	10	10
Blue collar, majority female[a]	—	6	—	—	—	—

SOURCE: 1990 Census.
NOTE: These data are descriptive and do not control for spouse characteristics.
[a]Blue-collar work that is predominantly female tends to include any factory work involving fabric (e.g., sewing clothes, upholstery) as well as small assembly and factory inspection work.

for spouses at Fort Lewis but is the second most common type of work for civilian spouses. The second most common occupation for military spouses at Fort Lewis is retail sales work, which is ranked only fifth among local civilian wives.

These data indicate differences between the niches found by military wives and those available to civilian wives; they also provide information about the local job market. For example, civilian wives around Camp Lejeune, North Carolina, are highly likely to be employed in food-preparation, or restaurant, jobs (ranked second), although this work is not highly ranked for civilian spouses at other locations. In general, lower-paying administrative work is common at all locations, but otherwise the locations show some very different patterns from one another and from the national rankings. In cases

Table 4.2
Military and Civilian Spouse Occupations at Focus Locations

	Army		Navy		Air Force	Marine Corps	
Occupation	**Fort Lewis**	**Fort Bliss**	**San Diego**	**New London NSB**	**Offutt AFB**	**MCB Camp Lejeune**	**MCAS Yuma**
Administrative—less well paid	1 (1)	1 (1)	1 (1)	1 (1)	1 (1)	2 (1)	1 (2)
Administrative—better paid	5 (2)	4 (5)	3 (2)	7 (4)	5 (2)	4 (3)	6 (4)
Retail sales	2 (5)	2 (6)	2 (6)	2 (6)	2 (6)	1 (10)	2 (6)
School teacher	4 (4)	3 (3)	10 (3)	8 (2)	4 (5)	5 (5)	7 (3)
Restaurant	3 (8)	8 (7)	8 (10)	3 (5)	—	3 (2)	9 (5)
Child care	7 (9)	9 (21)	—	6 (17)	3 (10)	7 (n/a)	8 (n/a)
Registered nurse	—	6 (9)	4 (9)	4 (22)	—	9 (6)	5 (n/a)
Health service aide	6 (10)	—	5 (12)	10 (11)	—	8 (17)	—
Blue collar, majority male	8 (3)	5 (4)	6 (4)	—	8 (3)	9 (4)	3 (1)
Managers	—	—	9 (5)	—	9 (8)	—	—
Sales supervisor/proprietor	10 (12)	7 (8)	—	5 (7)	7 (10)	—	—
Blue collar, majority female	—	—	7 (8)	—	8 (12)	6 (n/a)	—
Cleaning and building services	9 (11)	—	—	—	6 (12)	—	—
Accountants and auditors	—	10 (13)	—	—	10 (20)	—	—
Finance and business sales	—	—	—	—	—	—	4 (n/a)
Writers, entertainers	—	—	—	9 (9)	—	—	—

SOURCE: 1990 Census.
NOTES: Civilian spouse occupational rankings noted in parentheses.
Eglin AFB area not included in the 1990 PUMS.
"n/a" refers to an insignificant number of civilian wives in those occupations.

for which the military wife occupational ranking for a specific type of employment is lower at a specific location than nationally, the data may be suggesting some difficulty finding that kind of work, such as for teachers at some of the locations (especially at San Diego and

New London). Likewise, the relatively higher rankings for military spouse nurses at San Diego, New London, and Yuma may reflect relatively more opportunities for military spouses who are nurses at these locations, in sharp contrast with Fort Lewis and Offutt, where nursing was not among the top 10 occupations for military spouses. We note, however, that there are many factors involved regarding whether individuals are hired, and we can only, with certainty, note the differences in outcome and not the reasons for these differences.

These data provide a robust national portrayal of military and civilian spouse occupations and the differences across the research locations. From our interview data, we add another layer of analysis, exploring differences among military spouses at the locations and differences overall by their active duty spouse's pay grade to provide a more discerning portrait to contribute to future policy decisions regarding military spouse employment. Among the interviewed spouses, administrative office jobs were the most common type of employment among the 597 employed spouses from all four services with whom we spoke.[1] This was especially true for spouses at Yuma and Offutt, where more than one-quarter of employed spouses held such office jobs, and slightly less so for New London (18 percent), Fort Lewis (17 percent), and Camp Lejeune (14 percent). This finding also varied by pay grade, with almost one-third of employed senior enlisted spouses working in office and clerical jobs, but fewer than 5 percent of employed senior officer spouses doing so. Tables 4.3 and 4.4 indicate the top five occupations for interviewed spouses by service member's pay grade and by spouses' education.

Retail sales jobs were very common for interviewed spouses of all the services, but not across all pay grades. More than one-quarter of employed junior enlisted spouses worked in retail jobs, but only 5–10 percent of officer or senior enlisted spouses did so. Not surprisingly,

[1] Because we did not inquire about salary, we cannot distinguish better-paid administrative jobs from those of lower compensation.

Table 4.3
Top Five Interviewed Spouse Occupations, by Service Member's Pay Grade

Occupation	Ranking for:				
	Junior Enlisted Spouses	Mid-Grade Enlisted Spouses	Senior Enlisted Spouses	Junior Officer Spouses	Senior Officer Spouses
Administrative/office	2	1	1	1	
Retail sales	1	2	3	5	4
Hotel/restaurant	3	4	4	—	—
Health care	4	2	2	3	3
Child care	5	5	—	—	—
School teacher	—	—	4	2	1
Entrepreneur	—	—	—	4	2

SOURCE: RAND Military Spouse Interviews, 2003.
NOTE: Occupations provided by similar numbers of spouses are classified as a tie and have the same ranking.
[a]Small numbers preclude the identification of a 5th-ranked occupation for senior officer spouses.

Table 4.4
Top Five Interviewed Spouse Occupations, by Spouse's Highest Degree Obtained

Occupation	Ranking for Those with:		
	High School Diploma/GED	College Degree	Graduate Degree[a]
Administrative/office	1	1	
Retail sales	2	4	
Hotel/restaurant	3		
Health care	4	2	3
Child care	5		
School teacher		3	1
Entrepreneur		5	
Financial		5	4
Lawyers, professionals			2

SOURCE: RAND Military Spouse Interviews, 2003.
NOTES: "College degree" category includes those with two- and four-year degrees. "Graduate degree" category includes those who have completed advanced or professional degrees.
[a]Small numbers preclude the identification of a 5th-ranked occupation for spouses with graduate degrees.

these jobs were especially common among spouses lacking a college degree.

Health care jobs were the third most common category of employment, representing about one-eighth of employed spouses, excluding junior enlisted spouses, of which fewer than one-tenth worked in health care. Health care was the second most common occupation for those with undergraduate college degrees (following administrative office work).

Hotel and restaurant jobs were also common among the employed spouses interviewed but represent a different portion of the spouses than do health care jobs. That is, junior enlisted spouses and spouses lacking a college degree were most likely to be employed in hotel and restaurant jobs, and these jobs were most prevalent at Fort Bliss and Eglin.

Teaching school was the most prominent career choice among senior officer spouses—more than one-quarter of employed senior officer spouses taught school—and second most prevalent (after office work) among junior officer spouses. Teaching was also the primary career choice of spouses with graduate degrees, of whom approximately one-quarter taught school. About one-tenth of college-educated spouses with undergraduate degrees taught school.

Child development and entrepreneurial ventures were the next most common work cited by employed spouses. Entrepreneurial ventures included operating residential cleaning services, selling products (such as baskets or candles) from their home, and providing music lessons. They also consisted of a few larger-scale ventures such as owning a bed and breakfast or hair salon. Roughly 5 percent of employed spouses worked in child development, often in their own homes. This percentage was spread fairly evenly across most pay grade groups; only junior officer spouses were not inclined to do such work. Two-thirds of the women working in child development lacked a college degree. Almost 5 percent of interviewed employed spouses pursued some entrepreneurial venture, generally from their homes. This figure was fairly evenly split across the services, with Marine Corps spouses slightly less likely to do so. Entrepreneurs were evenly split between spouses with high school educations and those with

college degrees. Further, entrepreneurial ventures were the second most popular work option for senior officer spouses (after teaching), and less common among spouses of enlisted personnel than officers' spouses.

In summary, military spouses work in many different occupations. Some spouses are following such careers as teaching and nursing that have notable prerequisites, including educational requirements, special training, licensure, and certification. Other spouses occupy relatively low-paying jobs with few barriers to entry. The choice of occupation that spouses pursue depends tremendously on the spouses' characteristics, such as educational level. Thus, summarizing spouse occupations is somewhat problematic, because indicating the most popular work for spouses overall, such as clerical/office work and retail/sales jobs, does not capture all spouses by service member's pay grade, education, location, or other descriptors. While military spouses' occupational choices look very much like those of civilian spouses, it is still very difficult to answer the question "What work do spouses pursue?" given that the answer depends heavily on the individual spouse. For example, senior officer spouses are not well captured by discussion of the overall most common occupations. Alternatively, addressing research conclusions or policy decisions toward the occupational interests of senior officer spouses may affect relatively small numbers of spouses, given the limited numbers of senior officers. Thus, any policy actions designed to address military spouse employment, such as those we present in our concluding chapter, need to take into consideration the number as well as the kind of spouses targeted by such changes.

Why Do Spouses Work?

Military spouses who work for career satisfaction, to keep their skills current, or for personal fulfillment have very different motivations and needs than those spouses who work to help pay the basic household bills. The intent herein is not to compare or contrast military spouses' motivations for working with their civilian counterparts.

Instead, we provide a relatively detailed understanding of why military spouses work so that policymakers can aptly design policies that will appropriately support spouse employment. Knowing which groups of spouses work for which motivations is very important to understanding this population and designing policies that support military spouse employment.

Spouses who were in the labor force at the time of their interviews[2] were asked in an open-ended question to explain why they worked, and they responded with a wide variety of motives. About three-quarters of the 731 spouses cited financial reasons as a factor in their decision to work outside the home, while slightly more than half noted other, nonmonetary reasons. In addition, spouses who provided multiple reasons for working during their interviews were prompted to identify the reason most important to them. Approximately half of working spouses mentioned more than one reason to work, while more than a third of them gave both financial and nonfinancial reasons for working; so their responses to this follow-up question were especially enlightening. In total, 607 spouses either indicated their most important reason for working or answered the initial question with a single motive. Two-thirds of these spouses cited a financial reason as their most important incentive for working, while the remainder specified a non-pecuniary reason instead.

In most cases, working spouses' responses were detailed enough to permit a finer grained analysis of their reasons for working beyond the financial/nonfinancial distinction. Three different types of financial reasons became apparent. Almost one-half of spouses interviewed explained that they were working to pay the bills and cover basic expenses, and one-third of spouses regarded paying the bills as their *most important* motive. The other two financial reasons were extra spending money and long-term savings. Several nonmonetary distinc-

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[2] Recall from Table 1.4 in Chapter One that 731 of the spouses interviewed were either employed full-time, employed part-time, or seeking employment. The results reported in this discussion are based on these 731 men and women, except for sections referring to occupations, where the findings instead pertain to the 597 men and women employed at the time of their interviews.

tions emerged as well. For example, a number of spouses noted working to avoid boredom and keep busy, while others reported a desire to work for personal fulfillment. A list of the major reasons spouses provided for working, along with representative comments and their relative rankings, is provided in Table 4.5. We categorize the reasons for working in two ways: first, as *one* reason for working, and second, as the *most important* reason for working (the rankings are based on both the frequency and strength of spouses' responses). Reasons provided by similar numbers of spouses are classified as a tie and have the same ranking. For instance, two reasons—extra spending money and personal fulfillment—are tied for third as reasons for working.[3]

These reasons did not tend to vary by location or service. However, notable patterns[4] were observed based on spouse occupation and level of education, the service member spouse's pay grade, and the family's perceived financial situation.

Who Works to Pay the Bills, to Cover Basic Expenses?

Working spouses holding lower-skilled, entry-level occupations frequently cited working to pay the bills as a reason for working, and in many cases as their *most important* reason. Specifically, about one-half of the spouses in clerical or retail positions and more than two-thirds of those in telemarketing or customer service positions stated that they were working to pay the bills, while approximately one-third of spouses holding clerical or retail positions and one-half of those in telemarketing or customer service positions cited covering basic expenses when prompted to identify their *most important* motive for

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[3] Frequencies that were mathematically similar, i.e., those that empirically clustered, were considered ties. Thus, rankings indicate significant differences in the number of spouses who mentioned that reason.

[4] All the findings discussed in this section are statistically significant. Relationships between a specific reason for working and a single factor such as pay grade or educational level were evaluated using correlations. Logistic regression models were employed to consider the effects of these factors simultaneously, using junior enlisted spouses with a high school education as a basis for comparison. These models are available upon request from the authors.

Table 4.5
Interviewed Spouses' Reasons for Working

Reason	Ranking as *One* Reason for Working (N = 731)	Ranking as the *Most Important* Reason for Working (N = 607)	Typical Comments
Financial			
Bills, basic expenses	1	1	"We're very tight if I don't work. We're hard put to cover the bills if I don't work." *—1284: Marine Corps E-4's spouse with a high school education*
			"To help support my family; basically, just to make sure that we're able to survive day-to-day." *—20: Army E-6's spouse with a college degree*
			"Because we have a substantial amount of student loan debt, and in order to pay all of that, I've got to work." *—804: Marine Corps O-3's spouse with a graduate degree*
Extra spending money	3	2	"Her paycheck pays the bills. Anything beyond that, that's what I work for—to pay for stuff for a better, higher quality of life; to be able to buy stuff like movies, vacation, going out to dinner, DVDs, CDs, TVs, whatever." *—183: Army E-5's spouse with a high school education*
			"I need to work to be able to earn income to sustain my lifestyle. To be able to give us the opportunity not only to pay our bills and save some money, but to be able to travel, to shop, and to enjoy entertainment." *—1357: Navy E-9's spouse with a high school education*
			"I don't need to work. So it's for extra spending money, for leisure, extra trips, extra . . . for my fun money!" *—696; Air Force O-3's spouse with a college degree*

Table 4.5—Continued

Reason	Ranking as *One* Reason for Working (N = 731)	Ranking as the *Most Important* Reason for Working (N = 607)	Typical Comments
Long-term savings	5	5	"We're saving for retirement and braces for our kids." *—677: Air Force E-7's spouse with a high school education* "My husband and I want to have a house one day when he gets out of the military, so we both work full-time to attain that goal." *—1626: Marine Corps E-5's spouse with a college degree* "[I] need to work for future housing costs, financial security." *—9204: Navy O-5's spouse with a college degree*
Nonfinancial			
Avoid boredom, keep busy	2	2	"I want to work because it's boring to be staying at home." *—475: Navy E-4's spouse with a graduate degree* "It gets me out of the house and gives me something to do during the day." *—577: Air Force E-7's spouse with a high school education* "[I work] to fill my time, for something to do." *—9676: Marine Corps O-3's spouse with a high school education*
Personal fulfillment, independence	3	2	"Actually I work for my own self-fulfillment. I mean, the extra money's nice, but it's mainly self-fulfillment, to be able to get out and do something, to make a difference." *—142: Air Force E-6's spouse with a high school education*

Table 4.5—Continued

Reason	Ranking as *One* Reason for Working (N = 731)	Ranking as the *Most Important* Reason for Working (N = 607)	Typical Comments
Personal fulfillment, independence (cont.)			"Because I believe every person is an individual, and I have my own identity. I believe that it's healthy if you find something to do, and I love to work. I enjoy working." *—1146: Army E-6's spouse with a college degree*
			"I like the independence, keeps the brain going; [makes me] a good role model for my children too." *—9404: Marine Corps O-3's spouse with a graduate degree*
Skills, career	5	5	"Want to work to keep my skills up to date." *—1558: Army E-7's spouse with a college degree*
			"I need to work because I need to stay current, to stay licensed. As long as you work, you can stay licensed." *—558: Air Force O-6's spouse with a college degree*
Return on education	5	7	"I don't want to let a good college education go to waste." *—1570: Marine Corps E-4's spouse with a college degree*
			"I went to school to have a career in my field." *—1042: Army O-3's spouse with a college degree*

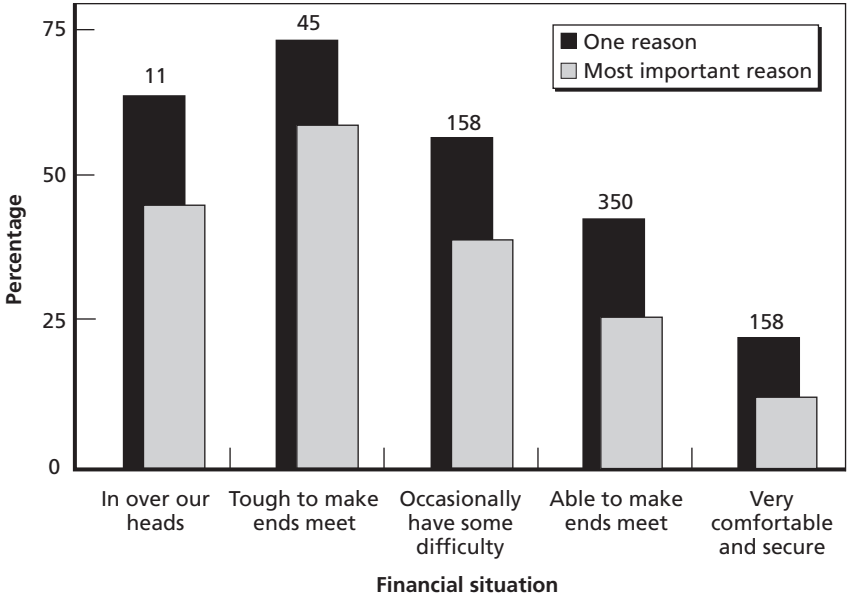
SOURCE: RAND Military Spouse Interviews, 2003.

working outside the home. Not only was there a strong link between these occupations and working out of financial necessity, but paying the bills surpassed other most important motives for working by large margins.

A notable relationship existed between the family's perceived financial situation and working out of financial necessity. Spouses were asked to characterize their financial situation using a five-point scale. Not surprisingly, working spouses who portrayed their financial

situation as "tough to make ends meet, but keeping our heads above water" or "in over our heads" were far more likely to cite bills and basic expenses as a motive for working than were those who described their financial situation as "very comfortable and secure" or "able to make ends meet without much difficulty." Almost three-quarters of the working spouses in the two more-dire financial categories reported working out of necessity, while only about one-third of those with a rosier financial situation expressed a similar sentiment. In addition, slightly more than half of the working spouses living in less-favorable financial conditions provided financial necessity as their *primary* incentive for working, compared with just fewer than one-quarter of their better-situated counterparts. We illustrate these results in Figure 4.1, which shows how the percentage of spouses

Figure 4.1
Distribution of Spouses Working to Pay the Bills, by Perceived Family Financial Situation

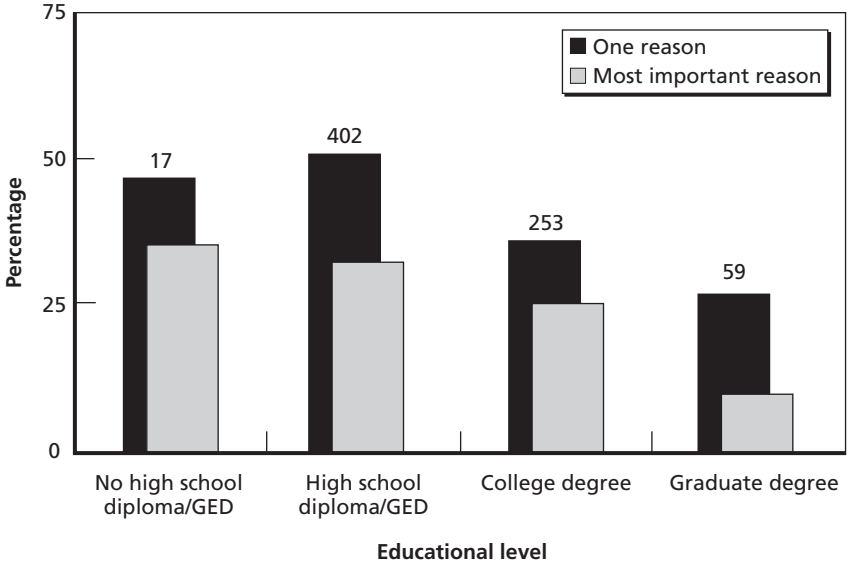


SOURCE: RAND Military Spouse Interviews, 2003.
NOTE: Numbers indicate working spouses in each financial situation category.
RAND *MG196-4.1*

citing "to pay the bills" as *one* reason for working or the *most important* reason varied by financial situation.

A third factor, education, shed additional light on the type of spouses offering a bills and basic expenses-oriented explanation for working outside the home. Specifically, the higher the level of education, the less likely a spouse was to say she was working to pay the bills. As shown in Figure 4.2, which breaks down financial necessity responses by educational level, approximately half of spouses with a high school education or less said they were working to cover basic expenses, compared with about one-third of working spouses with a college degree and one-quarter of those with a graduate degree. This pattern persisted when only *most important* reasons were considered,

Figure 4.2
Distribution of Spouses Working to Pay the Bills, by Educational Level



SOURCE: RAND Military Spouse Interviews, 2003.
NOTE: Numbers indicate working spouses in each educational level.
RAND *MG196-4.2*

albeit in smaller proportions: One-third of working spouses with a high school education or less, one-quarter of those with a college degree, and only one-tenth of those with a graduate degree cited financial necessity as their most important reason for working.

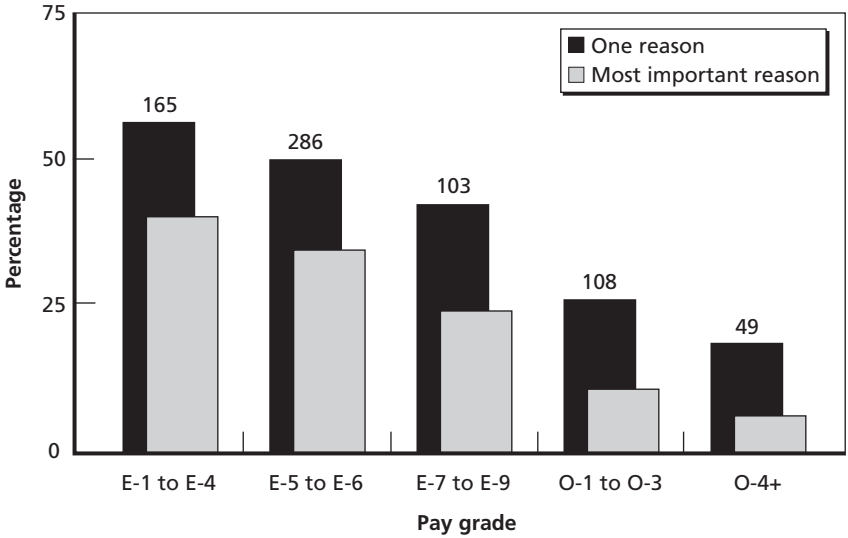
In addition, when the responses of working spouses were grouped into these four education-based categories, paying the bills was the most frequently cited *most important* reason for all spouses without a graduate degree. As the striped bars in Figure 4.2 indicate, however, the percentages fall well short of a majority; when spouses are categorized based on their level of education, no single reason predominates as the most important reason.

Finally, pay grade, which has some socioeconomic implications but can also be considered a proxy for age and experience, came to bear on this work incentive. We depict financial necessity responses by pay grade category in Figure 4.3. Spouses married to junior enlisted (E-1 to E-4) service members or mid-grade enlisted (E-5 to E-6) service members were more likely to say that they were working to cover basic expenses, and financial necessity was their most frequently cited *primary* motive for working. Slightly more than half of junior enlisted spouses offered financial necessity as *one* rationale for working, while two-fifths of them regarded it as their *most important* reason. Similarly, half of mid-grade enlisted spouses provided this motive as *one* reason for working, and approximately one-third of them viewed it as their *most important* reason for working.

A number of these spouses explicitly referred to their spouse's pay grade or commented on military pay when discussing their rationale for working. Typical comments included:

> I need to work to support my husband. I like working, but I feel like I need to work to assist in the support. I don't feel the BAH [Basic Allowance for Housing] given to my husband's pay grade is enough to cover living expenses. It's not sufficient. I don't believe that we, as a family, could be supported just by the income he has.
>
> *—1423: Navy E-3's spouse with a high school education*

Figure 4.3
Distribution of Spouses Working to Pay the Bills, by Service Member Spouse's Pay Grade Category



SOURCE: RAND Military Spouse Interviews, 2003.
NOTE: Numbers indicate working spouses in each pay grade category.
RAND *MG196-4.3*

> [I work] to survive. My husband's paycheck doesn't pay the bills and put food on the table and give us money to survive.
> —*910: Army E-6's spouse with a college degree*

> [You n]eed to work because you need the money when you're in a military family—because you don't get paid a lot. It's not just to go out and spend; it's to get by on, just essentials, the things your family needs to pay bills.
> —*1342: Air Force E-6's spouse with a high school education*

In contrast, spouses of senior enlisted service members and senior officers were less inclined to discuss pay grade–related reasons for working. Moreover, being an officer's spouse was negatively associ-

ated with providing financial necessity as either *one* reason for working or the *most important* reason for working. About one-quarter of junior officer spouses said they were working to pay the bills as *one* reason for working and only about one-tenth of them regarded it as their *most important* motive. The same proportions for senior officer spouses were one-fifth and fewer than one-tenth, respectively.

There were strong relationships between pay grade category and educational level in our sample. Financial situation was linked to these two demographic attributes as well. Accordingly, it was important to bear in mind how these factors, when considered simultaneously, helped to describe the type of spouse that cited financial necessity as *one* reason for working or as her *most important* reason. For instance, did a spouse consider financial necessity her primary work incentive because she was married to an E-4, because she has only a high school education, or both?

The results of a more sophisticated statistical analysis revealed that, for our sample of working spouses, pay grade category and financial situation were critical factors that explained more about spouses working to pay the bills than did education. Both junior and senior officer spouses were less likely to report working for financial necessity as *one* reason for working and, along with senior enlisted spouses, were less likely to cite financial necessity as their *most important* reason for working. Financial situation also was a key predictor of the type of spouse citing financial necessity as either *one* reason to work or the *most important* reason to work, but it was less of an influence than pay grade. Educational level, however, has no independent effect on the likelihood of identifying financial necessity as *a* reason for working or *the* reason for working. In other words, our analysis of working spouses revealed junior enlisted spouses, even those with higher levels of education, are more likely to work for financial reasons. These findings suggest that an investment in spouse education without a change in the military member's pay grade or otherwise improving their family's financial situation may not lessen the need to work to cover basic expenses.

Occupation, Family Finances, and Pay Grade Category Help Explain Which Spouses Cite Avoiding Boredom and Keeping Busy as a Rationale for Working

As indicated in Table 4.5, working to avoid boredom and keep busy trailed only financial necessity as *one* reason for working and the *most important* reason for working. Other representative comments included the following:

> I couldn't see myself sitting at home every day.
> —*337: Navy O-1's spouse with a high school education*

> I guess the main reason I want to work is because I don't want to stay at the house day in and day out. . . . I would just go stir crazy if I just stayed inside all the time and never did anything.
> —*441: Army E-9's spouse with a college degree*

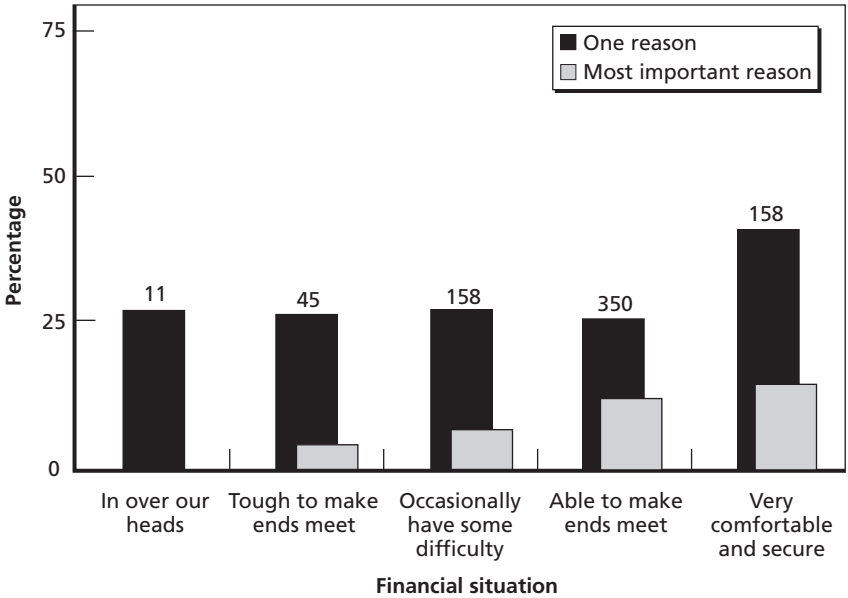
> I want to work because my children are going to school full time and I'm looking to occupy myself.
> —*1318: Army O-4's spouse with a college degree*

As with financial necessity, spouses in certain occupations were more likely than others to cite this boredom-avoidance rationale for working. Specifically, about half of the spouses holding clerical or hotel/restaurant jobs provided this response as *one* reason for working, with approximately one-fifth of spouses in hotel or restaurant jobs also citing this as their *most important* reason for working. Finally, spouses in teaching and health care, two fields generally regarded as more professional with higher barriers to entry, were less likely to cite boredom avoidance as a reason for working. Only one-fifth of teachers and one-quarter of spouses working in health care occupations cited keeping busy as a work incentive.

The family's financial situation also helped to characterize the spouses who were working to avoid boredom and keep busy. Specifically, spouses in a more comfortable financial situation were more inclined to offer boredom avoidance as *one* reason for working—and even as the *most important* reason for working—while spouses in more-challenging financial circumstances were less inclined to provide this rationale. Two-fifths of spouses in the two most favorable

financial situation categories gave a boredom-avoidance–related explanation as *one* reason for working, while one-quarter of them identified this reason as their *most important* work incentive. On the opposite side of the scale, only about one-quarter of working spouses in the two most difficult financial situation categories cited these kinds of reasons, with fewer than one-twentieth of them viewing boredom avoidance as their *most important* reason for working. These findings are depicted in Figure 4.4, which reveals how the percentage of spouses providing boredom avoidance as *one* reason for working and the *most important* reason differed by financial situation.

Figure 4.4
Distribution of Spouses Working to Keep Busy, by Perceived Family Financial Situation



SOURCE: RAND Military Spouse Interviews, 2003.
NOTE: Numbers indicate working spouses in each financial situation category.
RAND *MG196-4.4*

Another indicator of financial standing, pay grade, was also related to working for boredom-avoidance reasons. Approximately one-half of both junior enlisted and junior officer spouses identified boredom avoidance as a reason for working. In general, the more senior the service member's pay grade within both the enlisted and officer ranks, the less likely spouses were to report working to avoid boredom and keep busy. Accordingly, only one-quarter of E-5/E-6 spouses and one-fifth of O-4 and higher spouses provided this rationale as one of their reasons for working.[5] We summarize these results in Figure 4.5, which features a breakdown of spouses working to keep busy by pay grade category.

A partial explanation for this result was suggested by the distribution of spouses within our sample who were also parents. Specifically, spouses of junior officers and junior enlisted personnel were less likely to have children. Spouses in higher enlisted and officer pay grades tended to be parents, and a strong link existed between having children and *not* working to keep busy. Following this logic, it would appear that junior enlisted and junior officer spouses were at similar marriage and family stages. The two groups of spouses diverged, however, when consideration was given to boredom avoidance as the most important reason for working. About one-fifth of junior officer spouses felt that keeping busy was their primary work incentive. This fraction is not a large share of junior officer spouses, yet it is still almost double the proportion of junior enlisted spouses who provided this motive.[6]

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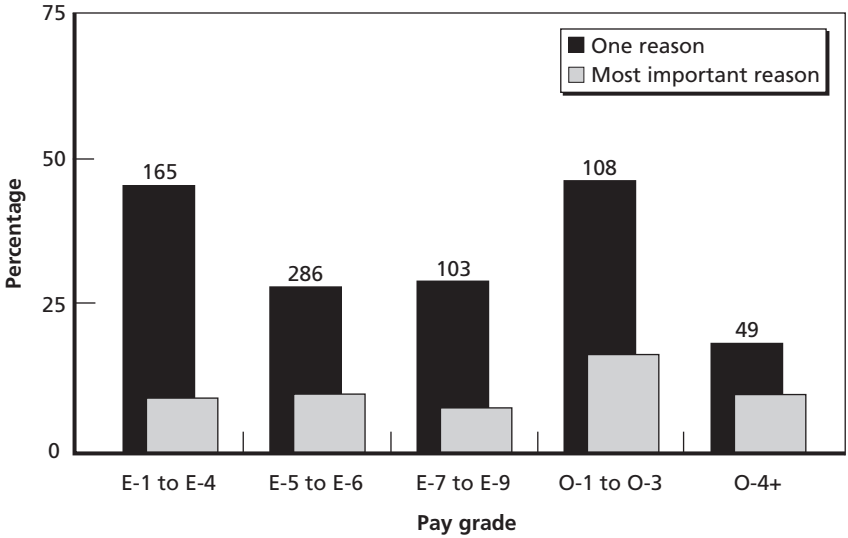
[5] Although proportion of senior enlisted spouses working to keep busy was slightly greater than that of E-5/E-6 spouses, the association between senior enlisted spouses and the boredom-avoidance response was not statistically significant.

[6] The relationship between junior enlisted spouses and boredom avoidance as the *most important* reason for working was not statistically significant but is mentioned here to facilitate comparison with junior officer spouses.

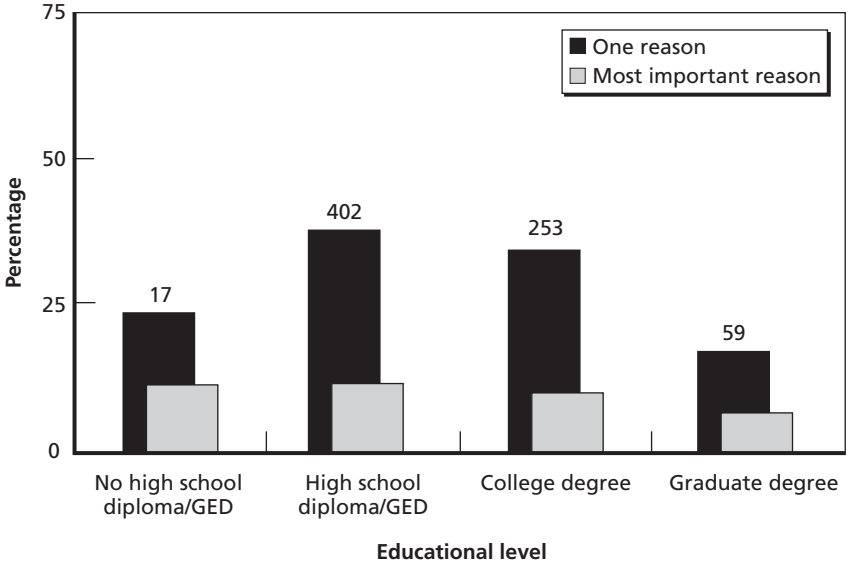
Figure 4.5
Distribution of Spouses Working to Keep Busy, by Service Member Spouse's Pay Grade Category



SOURCE: RAND Military Spouse Interviews, 2003.
NOTE: Numbers indicate working spouses in each pay grade category.
RAND *MG196-4.5*

A spouse's highest level of education was another factor related to working to avoid boredom and keep busy. Figure 4.6 shows the distribution of boredom-avoidance responses by education. Spouses with a high school education were more likely to cite this reason for working, while those with a graduate degree were less inclined to provide this rationale for employment. Almost two-fifths of high school graduates offered boredom avoidance as *one* reason to work, compared with slightly fewer than one-fifth of spouses with a graduate degree. We observed little variation, however, when considering the relationship between educational level and keeping busy as the *most important* reason for working.

Figure 4.6
Distribution of Spouses Working to Keep Busy, by Educational Level



SOURCE: RAND Military Spouse Interviews, 2003.
NOTE: Numbers indicate working spouses in each educational level.
RAND *MG196-4.6*

Given their interrelationships, it was illuminating to consider the effects of pay grade category, financial situation, educational level, and parental status on spouses' tendencies to work to avoid boredom and keep busy. Statistical analysis that took these factors into account simultaneously corroborated most of the findings induced by considering them separately. Spouses of mid-grade enlisted personnel, senior enlisted personnel, and senior officers all were less likely to cite boredom avoidance as a reason for working, as were spouses with a college or graduate degree. Financial situation and parental status were also related to this motive, with parents and those in more-challenging financial situations less likely to regard boredom avoidance as a reason for working. Overall, senior officer spouses with graduate degrees were least likely to mention that *one* of their reasons for working was to avoid boredom and keep busy.

The results were somewhat different when determining who tended to identify boredom avoidance as the *most important* reason for working. Parental status no longer helped to explain the type of spouses who regarded boredom avoidance as their primary incentive, and only junior officer spouses were more likely to identify this reason as *most important* for working. Spouses with a college or graduate degree were less likely to consider boredom avoidance as their primary work incentive, as were spouses reporting financial difficulty. All things considered, spouses with a graduate degree were least likely to cite boredom avoidance as their most important reason for working.

Better-Educated Spouses and Those in Higher Pay Grade Categories Frequently Work for Personal Fulfillment or Independence

Although working to avoid boredom and keep busy was the most frequently cited nonmonetary reason for working in our overall sample, working for personal fulfillment or independence was another nonfinancial reason given. The following comments, considered in conjunction with those in Table 4.5, convey the difference between spouses seeking fulfillment and spouses previously discussed who were working to keep busy.

> I want to work because it fulfills me intellectually.
> *—158: Army O-2's spouse with a college degree*

> I want to work because I enjoy the challenge of working.
> *—19: Army E-7's spouse with a college degree*

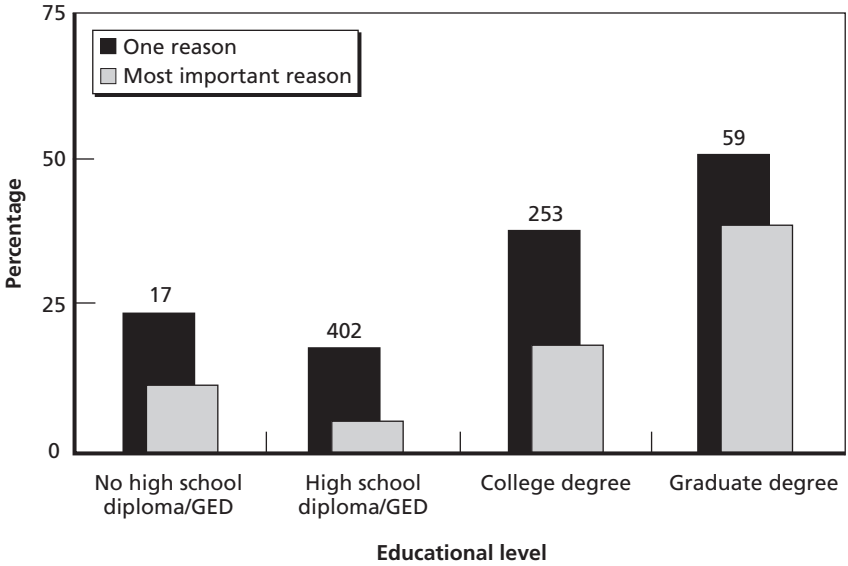
> I want to work because it establishes my own independence, bringing in my own income. It's not all on my husband, so it establishes my role in the family.
> *—1218: Marine Corps E-3's spouse with a high school education*

> I work because I enjoy my career. I think I am a good partner to my husband in his career and a good role model to my children and my family.
> *—9245: Navy O-6's spouse with a graduate degree*

Such comments were widely cited by certain groups of spouses, especially those working in professional occupations with higher barriers to entry. Slightly more than three-fifths of those working as lawyers or professors, about half of teachers, roughly two-fifths of small business owners, and all but one of the small number of social workers in our sample provided this reason for working. This pattern is also apparent among the smaller group of spouses that identified fulfillment as their primary, or *most important*, reason for working: Half of lawyers and professors, more than one-third of teachers, about one-fifth of spouses in health care occupations, and the majority of social workers viewed personal fulfillment as their primary work incentive. In addition, personal fulfillment was the most frequently cited *most important* reason for working by spouses in these occupations, surpassing other primary motives for working by large margins. In contrast, only one-fifth of spouses in either clerical or retail positions offered personal fulfillment as *one* rationale for working, and fewer than one-tenth of them viewed it as their *most important* reason. It appears that spouses in lower-skilled, entry-level positions are more inclined to work out of financial necessity than for fulfillment, while the opposite is true for spouses in more-professional positions.

Many of the spouses in professional positions are better educated, and in general, the higher the level of education, the higher the proportion of spouses who cited personal fulfillment as both *one* reason to work and the *most important* reason to work. Only the responses of the 17 spouses with less than a high school education run counter to this tendency. As shown in Figure 4.7, fewer than one-fifth of spouses with a high school education provided this motive as *one* reason for working, while fewer than one-tenth of them felt it was their *most important* reason. Similar proportions were about two-fifths and one-fifth for spouses with a college degree, respectively, and approximately one-half and two-fifths for spouses with a graduate degree, respectively. For the latter group, personal fulfillment was also the most frequently cited *most important* reason for working.

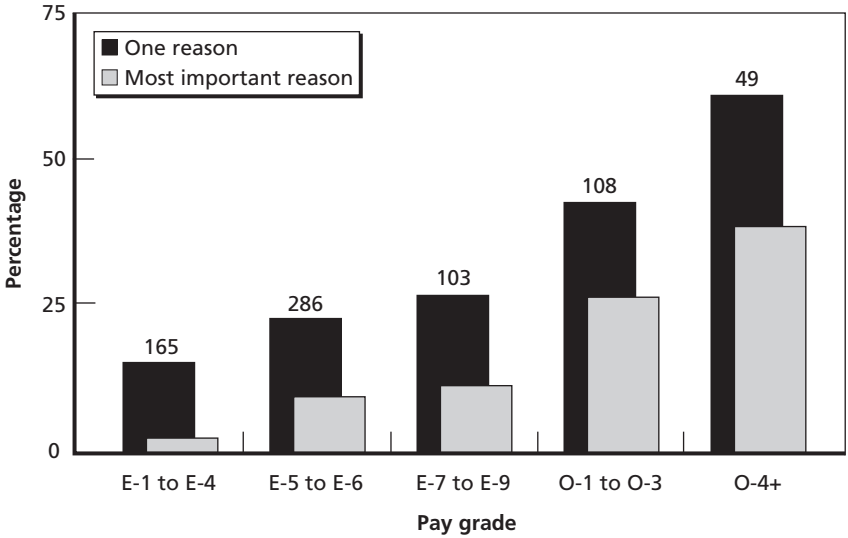
Figure 4.7
Distribution of Spouses Working for Personal Fulfillment, by Educational Level



SOURCE: RAND Military Spouse Interviews, 2003.
NOTE: Numbers indicate working spouses in each educational level.
RAND *MG196-4.7*

We also observed an upward pattern of responses across enlisted and officer pay grades, which we illustrate in Figure 4.8. The proportions of spouses citing personal fulfillment as *one* reason for working ranged from about one-sixth of junior enlisted spouses to three-fifths of senior officer spouses. When considering personal fulfillment solely as the *most important* reason for working, figures ranged from a very small percentage of junior enlisted spouses to about two-fifths of senior officer spouses. In addition, personal fulfillment was the most frequently cited *most important* reason for both junior and senior officer spouses.

Figure 4.8
Distribution of Spouses Working for Personal Fulfillment, by Service Member Spouse's Pay Grade Category

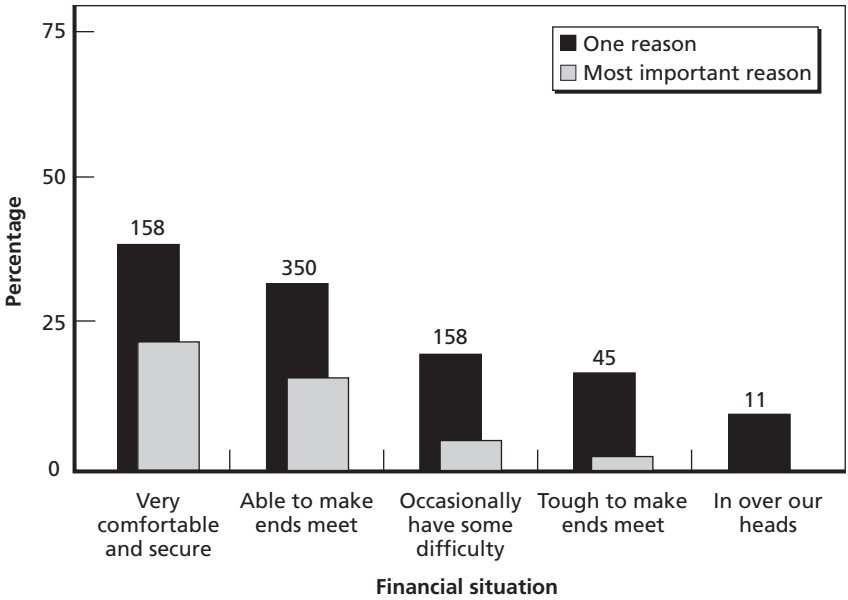


SOURCE: RAND Military Spouse Interviews, 2003.
NOTE: Numbers indicate working spouses in each pay grade category.
RAND *MG196-4.8*

Finally, there was an *upward* pattern between family finances and working for personal fulfillment. The more comfortable the financial situation, the larger the proportion of spouses who cited personal fulfillment as either *one* reason for working or their *most important* reason. The proportion of spouses providing personal fulfillment as a reason for working ranged from slightly more than one-third of "very comfortable and secure" spouses to one-tenth of those "in over our heads." Not a single spouse in the "in over our heads" category identified personal fulfillment as her most important reason for working, while one-fifth of those in the "very comfortable and secure" category did. We summarize these results in Figure 4.9.

When financial situation was considered in conjunction with education and pay grade, however, its importance was comparatively

Figure 4.9
Distribution of Spouses Working for Personal Fulfillment, by Perceived Family Financial Situation



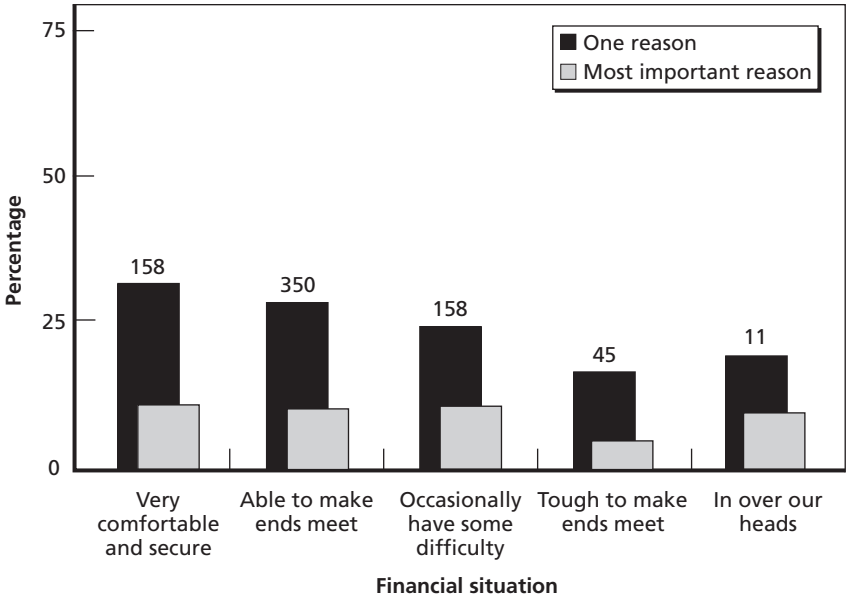
SOURCE: RAND Military Spouse Interviews, 2003.
NOTE: Numbers indicate working spouses in each financial situation category.
RAND *MG196-4.9*

minimal. Both pay grade and education, though, greatly helped to explain the types of spouses that regarded personal fulfillment as a reason for working. Spouses married to senior enlisted personnel, junior officers, and senior officers were all more likely to provide this reason for working. Similarly, spouses with a bachelor's or graduate degree were more likely to cite personal fulfillment. Virtually identical results were obtained when assessing personal fulfillment as the *most important* reason for working, with one notable exception: Spouses married to mid-grade enlisted personnel were also more likely to cite this motive. Overall, a senior officer's spouse with a graduate degree was the type of spouse most likely to identify personal fulfillment as her most important reason for working.

Spouses Who Work for Extra Spending Money Are More Difficult to Characterize

In the overall sample, the number of spouses working for extra spending money was similar to the number working for personal fulfillment and satisfaction. However, fewer patterns were discernable for this financial work incentive when factors such as financial status, education, and pay grade category were considered separately. Financial situation helped describe the types of spouses working for extra spending money, but this relationship was not as strong as for other reasons (e.g., financial necessity). As seen in Figure 4.10, the differences in spouse responses by financial category are not as pronounced

Figure 4.10
Distribution of Spouses Working for Extra Spending Money, by Perceived Family Financial Situation



SOURCE: RAND Military Spouse Interviews, 2003.
NOTE: Numbers indicate working spouses in each financial situation category.
RAND *MG196-4.10*

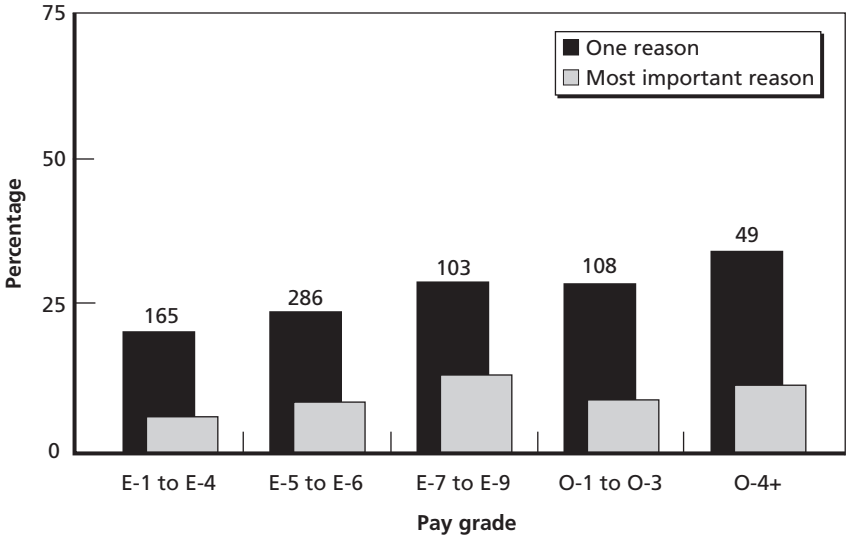
as they were for the financial necessity, boredom avoidance, and personal fulfillment work incentives. Approximately one-quarter of spouses in the two most comfortable financial situation categories identified extra spending money as a reason for working, while just one-tenth of them claimed this as their *most important* reason. Conversely, spouses with more-challenging family finances were less inclined to offer financial extras as a rationale: About one-sixth of spouses in the two most difficult financial situation categories provided this explanation as *one* reason for working, and only a very few of them cited it as their *most important* motive.

We gained few insights by evaluating pay grade and education independently: Only the E-1 through E-4 pay grade category and high school education level were related to working for extra spending money. Specifically, just one-fifth of junior enlisted spouses identified "extra spending money" as even *one* of their reasons for working, and merely one-tenth of those with a high school education felt it was their *most important* work incentive. The distribution of "extra spending money" responses by pay grade category and education are provided in Figures 4.11 and 4.12, respectively.

When considering pay grade, education, and financial situation simultaneously, additional patterns became evident. Financial situation still helps to explain the type of spouses working for extra spending money, with more-comfortable spouses more likely to provide this reason for working, but the influences of pay grade and education were stronger than when considered separately. Senior officer spouses were more likely to identify financial extras as a reason for working, but college-educated spouses were less likely to do so. Apparently, the relationship between education and working for extra spending money is somehow moderated by pay grade and possibly financial situation.

Findings differed somewhat when spouses considered extra spending money as the *most important* reason for working. Both senior enlisted and senior officer spouses were inclined to cite financial extras as their primary work incentive. Conversely, college-educated spouses were less likely to express this sentiment. In addition, finan-

Figure 4.11
Distribution of Spouses Working for Extra Spending Money, by Service Member Spouse's Pay Grade Category



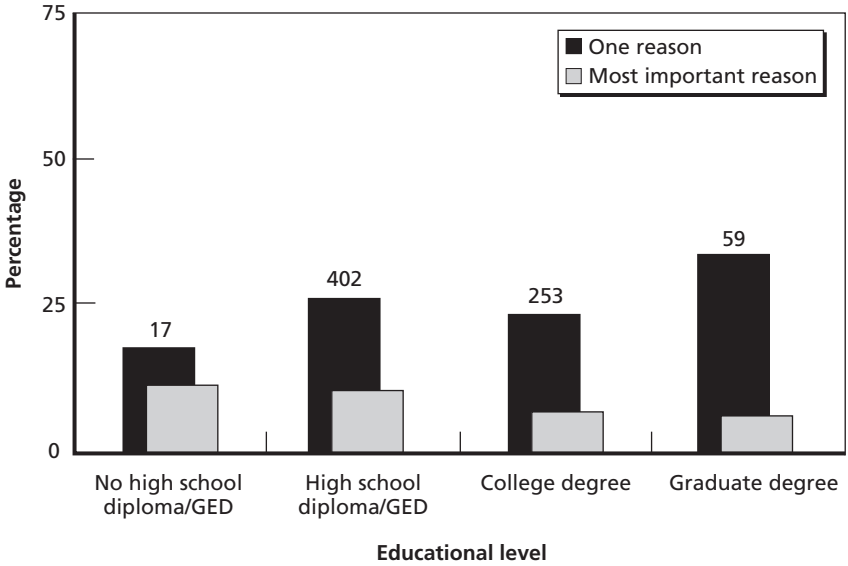
SOURCE: RAND Military Spouse Interviews, 2003.
NOTE: Numbers indicate working spouses in each pay grade category.
RAND *MG196-4.11*

cial situation no longer mattered; only pay grade and education-related factors helped explain the type of spouse that regarded extra spending money as her most important reason for working.

Limited Numbers of Spouses Work for Long-Term Savings, to Keep Skills Current, and for a Return on Education

Fewer working spouses overall mentioned the three remaining reasons for working provided in Table 4.5: long-term savings, skills/career, and return on education. The small numbers rendered it difficult to detect significant patterns, but a few relationships were evident. For instance, clerical workers were more likely to identify long-term savings as either *one* reason for working or the *most important* reason for working. The proportions of clerical workers who cited this reason

Figure 4.12
Distribution of Spouses Working for Extra Spending Money, by Educational Level



SOURCE: RAND Military Spouse Interviews, 2003.
NOTE: Numbers indicate working spouses in each educational level.
RAND *MG196-4.12*

were small but were larger than those for other occupations. There was also a notable relationship with financial situation. As with the extra spending money motive, spouses who felt more financially comfortable tended to provide long-term savings as *a* reason for working or *the* reason for working more frequently than did spouses in more-troubling financial circumstances. In both cases, the relationship was precisely the opposite as the one observed between financial situation and working to pay the bills to cover basic expenses. This finding implies that spouses who are more comfortable, to the degree that they work for monetary reasons at all, have the luxury of planning for the future.

The associations between working for long-term savings and both pay grade and education, however, differed somewhat from

those of the other two financial reasons. For example, junior enlisted spouses were more likely than others to work to pay the bills, but this was not true for the long-term savings motive. About one-sixth of both senior enlisted and senior officer spouses cited long-term savings as *one* reason for working, and just fewer than one-tenth of senior enlisted spouses also viewed long-term savings as their *most important* reason for working. Junior officer spouses, however, were even less likely to work for long-term savings. (Only a handful of junior officer spouses offered this reason for working.)

The long-term savings motive also differed from working to pay the bills or for extra spending money, in that no patterns between this reason and education were apparent. Yet, educational level was linked to working to keep skills current or maintain one's career and to obtain a return on one's education. In both cases, spouses with a high school education were less inclined to cite working for these reasons, and few regarded one of these reasons as their primary work incentive. Spouses with a college degree (i.e., bachelor's or associate's) were more likely to work to obtain a return on education, whereas those with a graduate degree tended to work both to keep skills current and to enjoy a return on education. With the exception of spouses with a graduate degree, the proportions of those providing non-pecuniary reasons for working were notably smaller than comparable ones for financial reasons and for the personal fulfillment work incentive. About one-quarter of spouses with a graduate degree reported working to keep skills current and maintain a career, while just fewer than one-tenth of them worked to reap a return on education. The number of spouses identifying one of these non-pecuniary motives as her *most important* reason for working was notably smaller than comparable numbers for other reasons, even for spouses with a graduate degree.

A limited number of occupations were also associated with working to keep skills current or to receive a return on education. Spouses working in health care positions, which often have educational or licensure prerequisites, were more inclined to cite a desire to maintain one's skills and career as a reason for working. However, those in retail and hotel/restaurant positions—frequently entry-level

jobs requiring less education—were less inclined to do so. In addition, spouses working in health care and those in high-skilled financial analysis were more likely to cite the "keep skills current" motive as their *most important* reason for working. Health care may be strongly linked to this employment motive because of licensing and continuing education requirements inherent to many occupations in the field. For the "return on education" reason, spouses in several professional occupations with higher barriers to entry tended to provide this motive more than other spouses. The small number of high-skilled financial analysts, social workers, lawyers, and professors in our sample were more inclined to note working for a return on education, with teachers and social workers more likely to cite it as their primary work incentive. No pattern between return on education and spouses in health care occupations was apparent, though.

Neither financial situation nor pay grade came to bear on the return on education employment motive, although both factors were linked to working to keep skills current or maintain one's career. Specifically, spouses who were more financially comfortable were more inclined to identify keeping skills current as the *most important* reason for working than were spouses in more-difficult financial straits. In addition, mid-grade enlisted spouses were less inclined to cite this motive as either *one* reason to work or the *most important reason* to work. Conversely, junior officer spouses were more likely to cite keeping skills current as both *a* reason to work and *the* reason to work, and senior officer spouses also tended to offer the keep skills current rationale for working.

Given the small number of working spouses who cited long-term savings, keeping skills current, or return to education as reasons for working, it was not possible to consider the effects of multiple factors, such as pay grade and education, simultaneously. The findings gleaned by studying simple associations do, however, reinforce the notion that pay grade, educational level, and financial situation all shape a spouse's reasons for working. Further, occupational patterns corroborate the premise the spouses in lower-skilled, entry-level positions may work for different reasons than those in professional positions with higher barriers to entry.

The Perils Inherent to Active Duty Served as a Salient Work Incentive

The major reasons for working comprise Table 4.5, but very small numbers of spouses provided additional reasons for working. One such reason, employability and financial security in the event of a service member's casualty, is of particular note given the current military mission. The few comments of this nature included the following:

> My husband's in the military, so we don't know when he's going to be gone, or how long he's going to be gone, or whether he's coming home. It's sad to think like that, but I want to be able to support myself if something happens and I am on my own with my daughter.
>
> *—25: Army E-4's spouse with a high school education*

> I do want to work because I'm going to have to take care of myself one day if something happens. God forbid, you know. I want to be able to be secure and have something. As it stands now, I have nothing to fall back on.
>
> *—584: Marine Corps E-6's spouse with a high school education*

Although such comments are few, all interviews were conducted prior to the March 2003 commencement of combat operations in Iraq. It is plausible that, had the study been administered during the war, this reason for working would have been salient to a larger number of spouses. In addition, the current military action suggests this rationale for working may have important policy implications.

Conclusion

Overall, our interviews revealed that military spouses work for a wide variety of reasons, including several unrelated to the income they gain from employment outside the home. While we are unable to compare directly the work motives of spouses in our sample with those of military spouses overall or with civilian spouses, our findings may extend to spouses who resemble those in our sample in terms of family financial situation, pay grade, and education—three factors consistently linked to a number of disparate work incentives.

Financial situation was related to both financial and nonfinancial reasons for working. Even when considered in conjunction with other factors, financial situation helped to explain the types of spouses working to pay the bills, to avoid boredom, for personal fulfillment, and for extra spending money. In addition, simple associations were noted between financial situation and working either for long-term savings or to keep skills current. Working to pay the bills, however, was related to financial situation in a different way. Specifically, spouses in the most challenging financial circumstances—reporting either that it was "tough to make ends meet" or they were "in over our heads"—cited financial necessity as both *one* reason to work and the *most important* reason to work more frequently than did spouses in the most comfortable financial circumstances. Moreover, spouses in difficult financial conditions were less likely to cite other reasons for working, such as personal fulfillment and extra spending money.

Yet, financial situation generally did not play as large a role in explaining the types of spouses working for a certain reason as pay grade category did, and, with the exception of the financial necessity motive, this was also true with respect to education. Accordingly, it was instructive not only to group spouses on a reason-by-reason basis but also to examine those reasons by pay grade category and educational level. Junior enlisted spouses, for instance, tended to work for financial necessity and to avoid boredom, as indicated by positive associations between this pay grade category and these two reasons. They were less inclined to work for personal fulfillment or for extra spending money. Further, working to pay the bills was most frequently cited by junior enlisted spouses as their *most important* reason for working—about two-fifths of them felt this way—while only a handful of them similarly perceived the personal fulfillment rationale.

Mid-grade enlisted spouses resembled those married to junior enlisted service members in that they also tended to cite financial necessity as both *a* reason and *the* reason for working and were less likely to work for personal fulfillment. Mid-grade enlisted spouses differed from junior enlisted spouses in that they were disinclined to work to avoid boredom and, even after considering differences in educational and financial situation, were less likely to identify finan-

cial necessity as their primary work incentive. Overall, however, for mid-grade enlisted spouses, financial necessity was still the most frequently cited *most important* reason for working, with approximately one-third of them providing this response.

Fewer findings pertinent to senior enlisted spouses emerged, suggesting that pay grade may be a less useful way to characterize these individuals' work incentives. Simple associations revealed only that senior enlisted spouses tended to identify long-term savings as *a* reason to work and *the* reason to work. However, after considering this pay grade category in conjunction with differences in educational and financial situation, additional patterns became apparent. Specifically, senior enlisted spouses were also more likely to view personal fulfillment as either *one* reason to work or the *most important* reason to do so, and to cite extra spending money as their primary work incentive. Additionally, senior enlisted spouses were less likely to offer boredom avoidance as a rationale for working and to identify paying bills as their most important reason for working. Although senior enlisted spouses were less likely to regard financial necessity as their most important reason for working, it was still their most frequently cited primary work incentive. Still, only about a quarter of senior enlisted spouses felt that way; their *most important* reasons for working were more varied than those of either junior or mid-grade enlisted spouses.

Much can be said about junior officer spouses' reasons for working. There was a positive link between being a junior officer spouse and identifying boredom avoidance, personal fulfillment, and keeping skills current as either *one* reason to work or the *most important* reason. Controlling for differences in education and financial situation, junior officer spouses were more likely to view boredom avoidance as their primary motive and to mention personal fulfillment as either *a* reason to work or *the* reason to work. Personal fulfillment was also the most widely cited primary work incentive for junior officer spouses, with about one-quarter of them offering this response. However, simple associations showed they were less inclined to cite long-term savings as a reason for working. Further, when accounting for differences in education and financial situation,

junior officer spouses were less likely to view financial necessity as either *a* work rationale or *the* primary work incentive. Only about one-tenth of junior officers noted that paying the bills was their most important reason for working.

Like junior officer spouses, senior officer spouses tended to view personal fulfillment as either *a* reason or *the* reason for working. Senior officer spouses were inclined to offer keeping skills current and long-term savings as incentives to work, although junior officer spouses did not frequently cite the latter reason. Senior officer spouses also differed from junior officer spouses in that there was a negative association between being a senior officer spouse and identifying boredom avoidance and keeping busy as a reason for working. In addition, they were disinclined to cite financial necessity as a work motive (or primary work incentive). These results held true when we evaluated pay grade, education, and financial situation simultaneously, and the analysis further revealed that senior officer spouses were more likely to provide extra spending money as *one* reason for working and the *most important* reason for working. Senior officer spouses' most frequently cited *primary* work incentive, though, was personal fulfillment, with almost two-fifths of them indicating as much. All in all, the personal fulfillment and extra spending money work incentives figured more prominently for senior officer spouses than did financial necessity and boredom avoidance.

Shifting gears from pay grade distinctions to educational level, we found that high school–educated spouses tended to identify financial necessity as both *one* reason and the *most important* reason for working. Working to pay the bills or to cover basic expenses was their most widely cited *primary* work incentive, with about one-third of high school–educated spouses making this assertion. There was also a positive association between having a high school education and both boredom avoidance as *a* reason for working and extra spending money as *the* reason for working. High school–educated spouses did not tend to work for personal fulfillment, to keep skills current, or to achieve a return on their education.

Fewer relationships were present between incentives for working and having a college degree. Spouses with a college degree tended to

regard both personal fulfillment and return on education as *a* reason or their *most important* reason for working. Even after accounting for differences in pay grade and financial situation, the personal fulfillment motive remained a prominent work incentive for college-educated spouses. Although simple associations indicated that spouses with a college education were less inclined to cite paying the bills as a reason for working, this finding was not supported when education was considered in conjunction with pay grade and financial situation. Yet, the analysis of all factors simultaneously did reveal that spouses with a college education were less likely to cite boredom avoidance and extra spending money as reasons to work. The most frequently mentioned *primary* work incentive for these spouses was financial necessity, with about one-quarter of spouses with a college degree expressing this sentiment.

Spouses with a graduate degree tended to identify personal fulfillment, keeping skills current, and obtaining a return on education as reasons for working. Of these reasons, personal fulfillment and a return on education also emerged as their *primary* reasons. The findings for personal fulfillment persist even after taking into account the differences in pay grade and financial situation. However, spouses with a graduate degree were less inclined to work either to pay the bills or to avoid boredom, and the latter finding was supported when education was assessed in conjunction with pay grade and financial situation. Even in light of differences in pay grade and financial situation, spouses with a graduate degree were less likely to cite boredom avoidance as *one* reason to work or the *most important* reason to work. As in the case of spouses with a college education, however, the relationship between spouses with a graduate degree and the financial-necessity work motive suggested by simple associations was not corroborated by the analysis of education, pay grade, and financial situation simultaneously. Nearly two-fifths of spouses with a graduate degree regarded personal fulfillment as their most important reason for working, making graduate degree the only educational category in which personal fulfillment rather than financial necessity was the most frequently cited *primary* incentive.

The variety of motives for working suggest that future policies addressing military spouse employment need to be cognizant of the different reasons for which different types of spouses work. Thus, for example, cash compensation for work lost may effectively address the needs of less-educated wives or those married to more-junior service members, but it would not effectively address the needs of more-educated spouses or those married to more-senior service members, as the latter tend to work for reasons other than to cover their basic expenses.

Why Do Spouses Stay Home?

About one-third (371 spouses) of those in our study were out of the labor force at the time of their interview. During the interviews, these spouses[7] were asked to discuss why it was their choice at that time not to work outside the home. They mentioned diverse reasons, and about one-third identified multiple factors that influenced their decision. In many instances, we detected patterns that help to characterize the types of spouses giving different reasons for being out of the labor force.[8] Certain spouses were more likely to be "stay-at-home" parents, for example, while others tended to cite military demands as an employment barrier. Still others were not working because of the demands of school or volunteering, or for health reasons.[9] Taken together, the varied explanations offered by spouses suggest remaining outside the labor force is not always a "choice."

---

[7] For the remainder of this chapter regarding the reasons spouses did not work, the term "spouses" refers to those out of the labor force at the time of their interview.

[8] All trends discussed in this section are statistically significant. Relationships between a specific reason for remaining out of the labor force and a single factor such as location or pay grade were evaluated using correlations.

[9] Fewer than one-tenth (7 percent) of spouses were out of the labor force because of disability or health problems. We detected no patterns that merit discussion, but it is important to note that these spouses may not be able to work, regardless of DoD policy changes or other actions. Further, the active duty spouse may be more likely to opt to remain in the military for stable health care benefits.

This discussion complements Chapter Three, which established that military spouses are more likely to be out of the labor force (neither employed nor seeking work) than their civilian counterparts. The chapter also identified prior hypotheses that military spouses may lack a "taste" for work and that military spouses who encourage their service member spouses to remain in the military may be those who prefer the military lifestyle, including being stay-at-home spouses. The qualitative data discussed in this section permit an opportunity to explore those assertions.

The Vast Majority of Spouses Out of the Labor Force Cited Parenting Reasons for Not Working

By far, the most widely cited reason for not holding a job or seeking employment was being a stay-at-home parent. Approximately three-quarters of spouses explained that they did not work outside the home because of parenting responsibilities. Many spouses noted that they were stay-at-home moms, while others mentioned that they were pregnant or wanted to homeschool their children. We note, however, that as many as one-third of stay-at-home parents also cited a barrier to their working, suggesting that being a stay-at-home parent may not have been the preferred outcome for the spouses citing this reason.

Location and the service member's pay grade helped to explain the types of spouses who were out of the labor force for parenting reasons. Specifically, spouses at New London NSB, Connecticut, were more likely to remain at home for parenting reasons, with almost nine out of ten providing such a motive. Conversely, San Diego, California, spouses were less inclined to cite that being stay-at-home parents was their reason for not working, with roughly three out of five offering this explanation. Although this proportion of San Diego spouses was still large in an absolute sense, it was notably less than comparable figures for the other locations included in our fieldwork. Perhaps the perceived higher cost of living at San Diego, which we heard about in some of our interviews, offers fewer mothers the opportunity to remain at home with their children if that is their preference. Staying at home with children was the most frequently

cited reason for not working at all locations studied, including San Diego.

A relationship also existed between pay grade and this reason for labor force withdrawal. Junior officer spouses were more inclined to characterize themselves as stay-at-home parents, with slightly more than four-fifths providing this description. Senior enlisted spouses, however, were somewhat less likely to identify themselves as stay-at-home parents. About three-fifths of these spouses offered parenting-related reasons for staying out of the labor force—a smaller proportion than for other pay grade categories, but still a majority and a fraction large enough to make stay-at-home parenting the most widely cited reason for this group of spouses.

Mid-Grade Enlisted and Financially Challenged Spouses Tended to Offer Child Care Concerns as Barriers to Employment

A related reason, albeit one cited less frequently, pertained to child care. While all of these individuals citing child care concerns were stay-at-home parents, day care issues were especially salient for them. Just fewer than one-sixth of spouses alluded to child care as a barrier to their seeking employment. Spouses frequently mentioned the cost of this type of care in their responses, as illustrated in the following comments:

> I can't afford to work. I [would] have to pay too much in child care.
>
> *—1157: Army E-4's spouse with a high school education*

> Day care costs too much. It wouldn't benefit us for me to get a job.
>
> *—85: Air Force E-7's spouse with a high school education*

> We have two small children, and the day care is very expensive. We don't feel that at this point, even if I went back to work, we wouldn't be that far ahead financially.
>
> *—57: Navy O-3's spouse with a college degree*

Child care expenses, considered in conjunction with their potential net income, deterred these spouses from obtaining employment. While some of these parents may have preferred to work, these concerns resulted in decisions to remain out of the labor force to attend to parenting responsibilities. Availability and quality of child care were also mentioned as factors influencing spouses' decisions not to work, albeit less frequently than were child care costs.

Mid-grade enlisted spouses, those married to E-5/E-6 active duty service members, were more likely to express these sentiments. Almost two-fifths of E-5/E-6 spouses offered child care–related reasons for remaining out of the labor force—almost double the proportion of spouses in other pay grade categories who provided this explanation. Spouses in more-challenging financial situations were also more likely to mention child care as an obstacle to employment. About one-third of the spouses who depicted their financial situation as "tough to make ends meet, but keeping our heads above water" or "in over our heads" cited child care as a factor in their decision not to seek employment, compared with fewer than one-tenth of the spouses who described their financial situation as "very comfortable and secure" or "able to make ends meet without much difficulty."

Service, Location, and Financial Situation Help to Describe Spouses Kept Out of the Labor Force by Local Labor Market Conditions

Local labor market conditions affected the employment decision of about one-tenth of spouses. Local labor market characteristics such as low wages, excessive labor supply, and Spanish-language fluency requirements were frequently mentioned by this subset of spouses. The military member's service helped to explain the type of spouse deterred by local labor market conditions, with Navy and Air Force spouses less likely to cite this reason and Marine Corps spouses more likely to do so. Yet, service effects may have been influenced at least in part by the military installations selected for our fieldwork; location also came to bear on the types of spouses who regarded local labor market conditions as a reason for not working. In particular, spouses in San Diego were less likely to view local labor market conditions as a work disincentive, while spouses at Fort Bliss, Texas, and

Camp Lejeune, North Carolina, were more likely to do so. About one-quarter of Fort Bliss and Camp Lejeune spouses identified local labor market conditions as a factor affecting their decision not to seek work, while no San Diego spouses expressed such a viewpoint. Fort Bliss spouses emphasized language barriers and low wages, as exemplified by the following remarks:

> I haven't worked here yet. I didn't really try that much because I don't speak Spanish, and all the jobs require you to speak Spanish a lot. So I'm probably not going to look for a job here.
> *—381: Army E-4's spouse with a high school education*

> I refuse to work for $5.15 an hour. If you're not bilingual, you cannot get a job over $5.15.
> *—464: Army E-5's spouse with a college degree*

Language was not a problem at Camp Lejeune, although frustration with wages and labor supply was apparent. Typical comments included the following:

> I don't work currently because I just cannot make enough money to make it worth it. This is a very poorly paid town, and it's just . . . there's so many people here and so few jobs that they can pay people next to nothing.
> *—700: Marine Corps E-5's spouse with a high school education*

> I am way overqualified for the work here. . . . I'm looking at McDonald's-type jobs, so there's just no reason for me to work.
> *—741: Marine Corps O-3's spouse with a graduate degree*

> I've been thinking about looking for a job, but this area does not have many jobs. The jobs they do have are minimum wage, and many people are seeking employment.
> *—822: Marine Corps O-5's wife with a college degree*

These comments, along with additional ones pertaining to labor market conditions, support the premise that the relationship between local labor market conditions and service is driven by the kinds of installations featured in our study. Specifically, the remarks tended to

focus on location-specific idiosyncrasies rather than problems inherent to a particular service.

Last, there was also a link between financial situation and not working due to local labor market characteristics. The more difficult the family's financial situation, the more likely a spouse was to cite local labor market issues as a factor in her decision not to work. The relationship between financial situation and this disincentive appears to have been driven by the proportionately large number of spouses who mentioned this reason for not working and who "occasionally have some difficult making ends meet." About two-fifths of spouses who cited "local labor market conditions" as an impediment were in this financial category. A small number of spouses in more-dire financial circumstances expressed similar concerns; they comprise nearly one-sixth of the spouses out of the labor force due to local market characteristics. Perhaps their decision not to work had a larger than anticipated effect on their family's financial situation.

Some Spouses Cite Military Demands

A similar-size proportion, about one-tenth of spouses, mentioned the demands of the military as a reason for remaining out of the labor force. These spouses explained that their service member's hours and deployments made it challenging to work outside the home. This was especially true for spouses who were parents, as 90 percent of the spouses out of the labor force were. Typical comments included the following:

> It's hard to have a job when your husband is in the military, because he's gone all the time.
>
> *—1009: Army E-6's spouse with a high school education*

> [I stay at home b]ecause the job my husband has is a commanding position, and I told myself that if he ever got this position that I would devote myself to the unit and its families.
>
> *—220: Army O-5's spouse with a graduate degree*

> With my husband's schedule, I'm basically a single parent, so that does not allow me the freedom to work.
>
> *—9318: Army O-6's spouse with a college degree*

> My husband's job is a team effort here, so I decided not to work.
> *—9536: Air Force O-6's spouse with a college degree*

> He's being deployed, so I'm leaving to go home.
> *—1000: Army E-4's spouse with a high school education*

As with the local labor market explanation, the active duty spouse's service, the location, and the family's financial situation helped to explain the type of spouses out of the labor force for this reason. Air Force spouses were less likely to mention this concern, with fewer than one-tenth of them providing this reason. San Diego spouses, however, were more likely to identify military demands, frequently including a spouse "out to sea," as a factor in their decision not to work outside the home. Approximately one-quarter of San Diego spouses felt this way. Interestingly, only one spouse at our other Navy installation, New London NSB, responded this way, suggesting the issue is not inherent to Navy life but rather may be influenced by the service member's career path within the service, given that most of the San Diego spouses were married to individuals assigned to surface ships and most of the New London spouses were married to submariners.

Spouses in more-difficult financial circumstances also tended to regard military demands as a reason for not obtaining employment. Although no one who reported that her family was "in over our heads" (the most dire financial category) provided this reason, slightly more than one-fifth of those in the "tough to make ends meet" category did so. Conversely, fewer than one-tenth of spouses who were "very comfortable and secure" or "able to make ends meet without much difficulty" identified military demands as an employment barrier.

Some Spouses Point to Transition-Related Employment Barriers

A limited number of spouses explained that they were neither working nor seeking work because their families were in a state of transition. Specifically, they were either adjusting after a recent move or

anticipating a move in the near future, as the following comments illustrate:

> We are getting ready to move to Germany, so there is no point in getting a job for two months.
> *—1006: Army E-4's spouse with a high school education*

> We are getting ready to move on base, so I am waiting.
> *—278: Air Force E-4's spouse with a high school education*

> Because we're moving so much, I got tired of looking for a job every six months.
> *—9105: Air Force O-2's spouse with a college education*

Spouses based in Yuma were inclined to stay out of the labor force for a transition-related reason, with about one-sixth of them expressing this sentiment. This proportion was much higher than comparable ones for other locations, and not a single spouse at Fort Bliss mentioned this type of work impediment. It is possible that other issues, such as local labor market conditions, may have proven more salient employment barriers for Fort Bliss spouses.

Some Spouses Attend School or Volunteer Instead of Working

Slightly more than one-tenth of spouses explained they were not working because they were in school or planning to start school. Pay grade helped to characterize the types of spouses attending school. Specifically, junior enlisted spouses were more likely to provide this reason for being out of the labor force, while senior officer spouses were less likely to do so. About one-fifth of junior enlisted spouses stated they chose not to work to attend school, compared with just a handful of senior officer spouses.

A limited number of spouses explained that they remained out of the labor force to perform volunteer work. These spouses were all volunteers for our study as well, and not surprisingly, were more likely to be better educated, more comfortable financially, and senior officer spouses. In fact, only senior officer spouses mentioned volunteering as a factor in their decision not to work, with nearly one-fifth

of them providing this reason. Further, none of the spouses in the "tough to make ends meet" or "in over our heads" financial categories offered volunteering as a work disincentive, and only a handful of spouses with a high school education did so.

Conclusion

Overall, our interviews demonstrated that the military spouses who opt not to work or seek employment do so for diverse reasons, but some patterns are evident. As in the case of working spouses, pay grade and financial situation helped to explain spouses' decisions regarding employment. Location also played a role in the types of spouses out of the labor force for several distinct reasons, although it was not a predictor of working spouses' employment motives.

A review of tendencies by pay grade revealed that junior enlisted spouses were more likely to provide school as a reason for being out of the labor force, while mid-grade enlisted spouses were more inclined to identify child care as a work impediment. Senior enlisted spouses were less likely to describe themselves as stay-at-home parents, but junior officer spouses were inclined to do so. Finally, senior officer spouses were disinclined to mention student status as a factor in their decision not to work. Instead, they tended to identify volunteer obligations as a reason for staying out of the labor force. Moreover, they were the only group to express this sentiment; spouses in other pay grades never mentioned volunteering as a reason for not working.

Spouses who cited volunteering were also more likely to be in the most comfortable financial circumstances. Conversely, spouses in more-challenging financial situations were more likely to offer child care concerns, local labor market conditions, and military demands as explanations for being out of the labor force. In many cases, spouses in dire financial straits identified more than one of these reasons as barriers to employment, indicating that some military families who would perhaps benefit most from dual incomes face multiple obstacles to spouse employment.

Factors affecting spouses' decisions not to work also tended to vary significantly by location. Spouses in Yuma, for instance, were

more inclined to identify move- and transition-related reasons for not working. Fort Bliss spouses, however, were less likely to do so. Instead, Fort Bliss spouses tended to discuss how local labor market characteristics (e.g., Spanish-language proficiency) influenced their decision to stay out of the labor force. Camp Lejeune spouses resembled Fort Bliss spouses in this regard, although the specific labor market obstacles varied somewhat. San Diego–based spouses were less inclined to cite local labor market conditions as impediments, instead focusing more on employment challenges posed by military demands. San Diego–based spouses also were less likely to refer to their role as a stay-at-home parent as a reason for not working. Their counterparts at our second naval installation, New London NSB, were just the opposite, however.

It was surprising that education did little to explain differences in spouses' reasons for remaining out of the labor force. Education was linked only to the volunteer obligations reason, with higher-educated spouses more likely to offer it as an explanation. A careful examination of the comments made by spouses with a college education, as well as those with a graduate degree, suggested that their decision not to work was influenced more by their desire to be a stay-at-home parent than by feelings that they were overqualified for the employment options available to them, although both were mentioned. As their children age, however, the relative importance of these factors may shift.

Although both military and civilian spouses may opt to be stay-at-home parents, and both may leave the labor force to attend school or for child care concerns, military spouses have a distinct, additional set of issues that may come to bear on their employment decision, most particularly those related to having their service member absent for long periods and living in a state of frequent, often involuntary transition. These issues were apparent in that one-third of the interviewed spouses not in the workforce cited one or some combination of child care, local labor market conditions, military demands, and moves as barriers to their employment.

Given this wide array of factors and conditions, it is clear that military spouses out of the labor force are not all women who lack a

"taste" for working. Military spouses thwarted in their quest for employment by local labor market conditions cannot change their residence as easily as civilian spouses might, nor can they exert much control over the nature and frequency of family moves. In addition, the level of involvement that the military requires from its personnel differs from and often far exceeds what is expected from even the most demanding civilian employers. These conditions suggest that military spouses may not truly "choose" to leave the labor force and that, for the spouses reluctantly out of the labor force, aspects unique to military life are perceived as the largest obstacles to employment.

CHAPTER FIVE

How Do Spouses Feel the Military Has Affected Their Work or Education?

In Chapter Three, we explored the employment status of military spouses quantitatively and established that military spouses are less likely to be employed, more likely to be unemployed, and earn less when compared with their civilian counterparts. Our findings demonstrated the importance of understanding the differences between observed characteristics and unobserved factors. Chapter Four explored what occupations employed spouses choose, their motivations for being employed or staying home, and the role of unobserved factors on these decisions. We now turn to spouses' perceptions of how the military lifestyle has affected their employment and education, with special focus on the role of unobserved factors.

While the analysis of quantitative data focused on spouse employment, we addressed both employment and education during our interviews. We believed it important to include education both because of the positive effect of education on employment outcomes (as shown in Chapter Three) and because we perceived education to be an issue of importance to military spouses. The extent to which military spouses felt that the military should provide assistance for spouse education (discussed in Chapter Six) confirms the importance of educational opportunities to military spouses.

How Has the Military Lifestyle Affected Their Work?

When asked how their spouse's military career had affected their work opportunities, almost two-thirds of those interviewed felt that being a military spouse had negatively affected their work opportunities;[1] about one-third felt that it had no effect on their work opportunities; and a small portion of spouses perceived a positive effect. When we exclude those not in the labor force and consider the opinions only of those spouses who are working or seeking work, there is a slight increase in the percentage that perceives a negative impact and a corresponding slight decrease in the portion that perceives no effect, with little change in the small percentage perceiving positive effect.

These findings are roughly consistent across locations and services but differ some by the pay grade of the service member, which can also be considered a proxy for the age and experience of the spouse. Of interviewed spouses, those married to junior enlisted personnel were the least likely to perceive a negative impact (slightly fewer than half), and the more senior the service member, the more likely the spouse to perceive a negative impact. More than three-quarters of the senior officer spouses we interviewed perceived a negative impact on their work opportunities.

We note here a few details about our interview and analysis method. First, open-ended questions were asked that encouraged spouses to talk about their employment experience. In other words, spouses were asked "How has your spouse's military career affected your work or education opportunities?" but were not provided specific causes of effect. Instead, the direction of their answer (positive, neutral, or negative) and the causes of that effect were derived inductively and deductively from the interview transcripts.

Some spouses provided a directional answer that appeared inconsistent with their subsequent comments. We tended to code, or categorize, their answers based on their perception rather than their

[1] There were 936 spouses who answered the question, "How has your spouse's military career affected your work or educational opportunities?" with comments about the effect on their work. For this section, "spouses interviewed" refers to these 936 spouses.

subsequent explanation. For example, there were some spouses who tended to be predominantly positive in their responses; thus, they asserted that being a military spouse had not negatively affected their work opportunities, even though they cited examples of negative impact. We consider them as perceiving either a positive effect or no effect, based on their interpretation of their experiences. Below is an example of such a "glass half full" sort of attitude. This spouse associates her difficulties with her location but does not recognize that she would have been unlikely to live there had she not been a military spouse:

> I don't know that it has affected my work. If I had moved here on my own, I would have had the same difficulties finding a job. I think it's the community that has a bigger impact than the fact that my husband's in the military.
>
> *—619: Marine Corps O-2's spouse with a college degree*

However, some spouses blame the military lifestyle for the lack of their own career success, whether or not their personal objectives were likely or feasible. We code such comments, like the one that follows, as perceiving a negative impact, regardless of whether the assertion appears logical or likely:

> When I met my husband, I was working at a bank and I could probably be president of that bank now if I hadn't met my husband and moved away. I could be on the top of the world but instead I'm sitting in Jacksonville [North Carolina] and not performing to my potential.
>
> *—727: Marine Corps E-8's spouse with a high school education*

A Small Number Perceive a Positive Effect on Work Opportunities

Of the few spouses in the labor force who perceived a positive effect, they tended to attribute that effect primarily to the experience of frequent moves and thus variety in their job experiences or to a change of job market:

> In some ways it has enhanced [my work opportunities] because it has given me more experience because I've been able to go to different places to work.
>
> *—1045: Air Force E-6's spouse with a college degree*

> It's been for the better [for both work and school]. It got us out of a place, a real small town where there was no future there for us. For us it's worked out great. We're happy, with good benefits and everything.
>
> *—1067: Air Force E-5's spouse with a high school education*

Or, for a converse reason:

> It's enhanced it, because I was from a college town where everyone had college degrees. You come on the base, and not everyone has college degrees, so it's easier to get professional jobs.
>
> *—1356: Marine Corps E-5's spouse with a college degree*

It is notable that only a very few spouses mentioned the positive effect of having work opportunities available to them precisely because they are military spouses:

> With spousal preference, that helps you get a better job, a better position [on post].
>
> *—226: Army E-6's spouse with a high school education*

> It's helped. The jobs here, they pay more on post than they do off post. With spousal preference, that helps you get a better job, a better position [on post].
>
> *—901: Army E-6's spouse with a high school education*

A small number of spouses answered the question with the assertion that military pay and benefits permit them to accomplish their own work objective, which is to remain out of the labor force, supporting their preferred lifestyle:

> By him being in the military, it has allowed me to stay home with the kids and still get medical benefits and dental benefits and all the benefits we need, but at the same time, given me the freedom to stay home with them and raise them.
>
> *—1128: Air Force E-4's spouse with a high school education*

> It's made our wishes for our lifestyle possible.
> *—1531: Air Force E-4's spouse with a high school education*

> Because of the stability and comfort and just the security of the military, it's provided enough financially for us to, for me, to stay home with our baby.
> *—73: Air Force O-1's spouse with a college education*

We believe that this small number of spouses is likely representative of other interviewed spouses out of the labor force who did not consider their opportunity not to work within the context of this question. We also see this theme in the responses to an earlier question, designed to ascertain why spouses are out of the labor market (neither working nor seeking work).

Most Spouses Perceive a Negative Effect on Work Opportunities

The majority of spouses interviewed, those who perceive that the military lifestyle has negatively affected their work opportunities, cite different causes of the negative impact, but there is similarity in their accounts. The causes for negative effect were primarily frequent and disruptive moves, service member absence (deployment, TAD/TDY,[2] training, etc.) and related child care difficulties, and employer bias against or stigmatization of military spouses. These causes are described in more detail below, with supporting examples from the interviews.

One-Third of Spouses Perceive Frequent and Disruptive Moves as Harmful to Their Work Opportunities

Approximately one-third of spouses interviewed perceived that their work opportunities had been negatively affected due to frequent or disruptive moves. This pattern is even across the services and is also consistent with the quantitative analysis in Chapter Three (see Figure 3.13). When one considers only those spouses who claim that the military lifestyle has negatively affected their work opportunities, then

[2] TDY and TAD refer to military-related travel away from home station.

some differences emerge among the services. For example, two-thirds of the Air Force spouses who felt a negative impact attributed it to frequent or disruptive moves, whereas only approximately half of Army spouses claiming an overall negative effect attributed it to frequent moves.

There are also differences by educational level of the spouses and by service member's pay grade. The higher the spouse's education, the more likely she was to perceive a negative impact from moving. Spouses without a high school education were considerably less likely to perceive a negative impact from moving. Almost half of high school–educated spouses, about two-thirds of college-educated spouses, and approximately three-quarters of spouses with graduate degrees mentioned the harmful impact of frequent or disruptive moves.

Typical comments included the following:

> You can't really make a career being married to a military member because they move you all the time. You know? It's hard to keep starting over and over. That's what I think anyways.
>
> *—151: Air Force E-6's spouse with a high school education*

> When he has to relocate I have to leave, and that's hard because you're leaving behind clientele and leaving behind opportunities; you have to start over.
>
> *—227: Army E-5's spouse with a college degree*

Some spouses were more explicit in the ways they perceived the moves to have affected them. These comments often included mention of benefits, such as vested retirement, or the lack of acquired seniority which affects the substance of work as well as pay increases. The following comments from teachers illustrate this perception:

> I lost a year's retirement because it took me over a year to find a teaching job when we relocated. So I should be a year closer to my 30-year than I am now. We arrived here in June 2001, and I just started teaching in October 2002.
>
> *—277: Air Force E-6's spouse with a graduate degree*

> Well it's just that you never get to develop at one place. Everywhere I go, I have to teach a different grade. And I'm the low man on the totem pole and so I usually get the worst classes. And so that makes it hard.
>
> *—270: Navy O-5's spouse with a college degree*

A very small number of spouses took a more positive and pragmatic approach, even while acknowledging that the military lifestyle put their career in a holding pattern for 20 years or more:

> It's had a great impact on my life. I can't further my career with him being in the military because of the relocation every three years. So what I can do is keep my knowledge and skills up to date and try to better myself now, but as for my career, I'll have to wait 'til his retirement.
>
> *—704: Marine Corps E-7's spouse with a college degree*

Not surprisingly, as junior enlisted spouses are less likely to have moved,[3] junior spouses were somewhat less likely to mention frequent moves as having a negative impact. Among all junior enlisted spouses interviewed, only about one-fifth mentioned this as a factor. Of those who cited a negative impact on work opportunities, only about one-third of them targeted moves as a cause, suggesting that other factors were more salient to them. In contrast, approximately one-quarter of all E-5/E-6 spouses, one-half of senior enlisted spouses, one-half of junior officer spouses, and two-thirds of all senior officer spouses mentioned the moves as a negative factor in their lives. When we consider only those spouses who do perceive a negative impact, the likelihood that they attribute this impact, at least in part, to frequent moves increases with pay grade, from one-third of junior enlisted spouses, as mentioned above, to two-thirds of junior officer spouses, three-quarters of senior enlisted spouses, and more than four-fifths of senior officer spouses. In short, the longer that you have been a military spouse, the more likely you are to attribute any per-

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[3] Junior enlisted spouses interviewed had moved with their service member an average of only 0.8 times, whereas mid-grade enlisted spouses had relocated 2.2 times; senior enlisted spouses, 4.2 times; and junior and senior officer spouses, 3.1 and 6.8 times, respectively.

ceived negative impact on your work opportunity to the frequent or disruptive moves that are a part of the military lifestyle. Although the more junior spouses have experienced fewer of these moves and are less likely to mention them as being a negative factor, they may also be less-"efficient" movers, taking them longer to recover after a move. The moves may also have a stronger effect on them, given their relative lack of maturity and experience, as the following comment suggests:

> It's a sacrifice that every wife makes all the time. . . . I feel that if I put effort into something, we'll have to pick up and go. It takes a lot of your self-esteem; you're not confident with yourself anymore. It breaks you down.
>
> *—415: Army E-4's spouse with a high school education*

In summary, consistent with prior research, the perception that the frequent moving that generally typifies military life is likely to be damaging to spouse work opportunity is very pervasive in the interview comments. Many spouses tend to offer such perceptions as the following:

> I have the disposable jobs; I have the jobs that can be easily discarded and moved.
>
> *—383: Air Force E-6's spouse with a high school education*

> His career has flourished, and mine has had to take a backseat. Up to this point, I've been out of work nine years due to relocating.
>
> *—406: Navy E-6's spouse with a college degree*

> I haven't had a real career because it's always time to leave.
>
> *—476: Army E-4's spouse with a college degree*

Many Spouses Mention Deployments, Work Schedules, and Parenthood as Affecting Their Work Opportunities

Many military spouses mentioned some combination of deployments, TDY/TAD absences, field training, or military work schedules as

having a negative impact on their work opportunities. Some spouses distinguished deployments from other absences, but for many spouses, this distinction was blurred; they simply knew that their service member was "gone a lot." Further, some TDY/TAD absences are longer than some deployments, so this distinction is not necessarily important to many spouses, absent a real-world crisis in which service members serve at peril. The pressure such absences place on the family overall can be considered one of the unobserved factors discussed in Chapter Three.

The negative impact on work opportunities associated with these factors was second only to the frequent moves. Overall, approximately one-quarter of military spouses cited this as the cause of such negative impact. However, when we consider those spouses who did perceive a negative impact on their work opportunities, almost half of them attributed it to their service member's absences. Enlisted spouses were the most likely to cite this as a problem: Of those who perceived a negative impact, about half of junior enlisted spouses, almost two-thirds of E-5/E-6 spouses, and about a third of senior enlisted spouses cited such absences, compared with one-quarter to one-third of officers' spouses.

There were also some differences by service, in that approximately one-third of all Army and Navy spouses mentioned service member absence, compared with approximately one-fifth of Air Force and Marine Corps spouses. This pattern is also consistent among spouses who perceive a negative impact on their work overall: Approximately half of Army and Navy spouses with negative perceptions mention this as a factor, compared with slightly more than a third of Air Force and Marine Corps spouses who perceive a negative impact.

The educational level of spouses also affected the way they interpreted the impact of service member absence: The higher their educational level, the less likely they were to mention this as a factor. Of all spouses interviewed, nearly half of high school graduates, approximately one-third of college graduates, and only approximately one-quarter of those with graduate degrees mentioned service member absence as having a negative impact on their work opportunities.

These differences could imply that more-highly-educated spouses had higher wages and thus could either more easily afford day care for their children or had more control over their work schedules and could accommodate such absences more easily.

When we examine the comments about service member absence, it becomes apparent that many refer to the difficulty of sharing parenthood with a service member, especially in dual-career families. Some of the spouses explicitly used the term "single parent" to describe their experience:

> [Being a military spouse] has affected me greatly in being able to work a full-time job and maintain supervision for the children in his absence because he's gone a lot. We can't really depend on him as far as picking the kids up, making dinner, and things of that nature. So basically, I feel like I've been a single parent even though I'm married. And I think that's one of the biggest downfalls of being a military spouse . . . you're the sole provider of everything.
>
> *—1146: Army E-6's spouse with a college degree and four children*

> Working full-time and being a single parent is not what I would choose. Though in a way, I guess I did.
>
> *—9547: Air Force O-3's spouse with a graduate degree and one child*

Sometimes, spouses' comments indicate a pragmatic recognition that day care is either unavailable or expensive and that the likely income would not compensate for the expenses. The availability issue is especially true when the couple needs evening and weekend child care, should the service member and spouse work schedules overlap. While child care expense is a consideration for any dual-career family, not just military families, the perception of many military spouses is that their situation is unique, in that the service member is unable to contribute much to the parenting demands; the spouses are generally far removed from extended family that could assist; and that more child care is needed than just daytime child care. One spouse below even coined the term "night care" when explaining her child care constraints. The following comments illustrate these points:

> And it's really hard for me now that my husband is deployed because I don't even get a break. And with no family around here, so . . . I mean, what else can I say? . . . I definitely would need a day position, and that's not always available. . . . They really couldn't care less that my husband is military and that he has to go and that I don't have any day care because I don't have family here.
>
> *—887: Marine Corps E-5's spouse with a college degree and three children*

> It's harder because I don't have family here, and with a child, it's hard if he's sick because I always have to be the one to miss work or school.
>
> *—1528: Army E-4's spouse with a high school education and one child*

> When they're on a seagoing command, it's very hard, if you have more than one child, to afford the day care in order to work outside the home. It's a lot easier when they're on shore command and your spouse is home to help take care of the children. Day care has been the biggest factor in my work situation.
>
> *—1501: Navy E-7's spouse with a college degree and three children*

> It affects my work when he is in the field because it's hard for me to be able to do my job because of the cost of day care . . . and night care because I work until 1 a.m., 2 a.m., or 3 a.m. in the morning, and if he's gone, it's really expensive to have somebody watch my son. He goes in the field, and he stays out there for two to three weeks, a month, whatever they decide to do. It gets expensive for day care.
>
> *—299: Army E-4's spouse with a high school education and two children*

We also heard from military spouses a consistent frustration that, even when the military service member was not away from home, the spouse still carried the brunt of the parenting responsibilities. These spouses referred to the inflexibility or "greediness" (Segal, 1988) of the military workplace to satisfy family demands and its unwillingness to compromise to accommodate the small crises that are a part of parenthood. For example:

> With his particular job, it's hard. I guess I feel like I'm the basic care provider for all the children. There's a lot of times where there's something going on, and I have to cancel whatever I've got going on because he can't be supportive. Unless you've married to someone in the military, it's hard to understand. It's not that he doesn't try; it's just that the Army has a view that they have to come first all the time.
>
> *—1056: Army E-6's spouse with a high school education and four children*

> Even when he's not deployed, he's in and out—no dependability, no consistency in his schedule as far as parenting responsibilities go.
>
> *—9703: Navy E-9's spouse with a high school education and two children*

> My job definitely takes second priority. If there's ever a problem with my daughter or with scheduling difficulties, my job is always the one that has to take a backseat.
>
> *—1183: Marine Corps E-4's spouse with a high school education and one child*

> My job revolves around his military career. If he can't get home, I can't get to work, which means I get reprimanded. . . . It is my responsibility to make arrangements for day care or to make the choice to work. His command, or any command, has very little sympathy for the working spouse.
>
> *—1341: Marine Corps E-6's spouse with a high school education and one child*

Some Spouses Mention an Employment Stigma

Some spouses report a stigmatization or bias against hiring military spouses. Their perceptions suggest that this perceived stigma is an unobserved factor that negatively affects military spouses' employment outcomes. Fewer spouses cited this as a problem than frequent moves or service member absence, but this theme is uniquely military. A very small number of spouses who answered the question regarding the impact on their work opportunity of being a military spouse mentioned a stigma of military spouses. Additionally, other

spouses referred to this issue even if they did not personally perceive a negative impact on their own work opportunity. Altogether, nearly one-tenth of the 1,100 spouses interviewed mentioned the issue of stigma. Spouses with college and graduate degrees as well as officers' spouses were more likely to mention stigma toward military spouses. Spouses with only high school educations and spouses of junior and mid-grade enlisted personnel were less likely to mention a perception of stigma.

The comments about stigma tend to refer to a few different ways that military spouses are disadvantaged. Some comments referred to the concern of employers that military spouses would leave soon and thus were only "temporary solutions" to their need for a good employee. In other instances, military spouses acknowledged that their résumés do not compete well with civilian job candidates because of the instability indicated on them. While related to frequent moves, these comments indicate that employers stigmatize military spouses because of their résumé content. Other comments referred to perceptions and experiences that even when military spouses are hired, employers treat them differently. Finally, we heard some describe concerns among employers that military spouses will leave their employment prematurely due to a deployment.

We will address these stigma results separately, beginning with the resistance of employers to hire military spouses because of the concern that they will move soon. The comments below reflect that shared experience. The final entry in the following quotations even refers to the difficulty some spouses have hiding their status as military spouses.

> When I go to apply for a job, when they find out I'm a military spouse, they don't want to hire me because we're going to be leaving eventually. They want someone who's going to be there for a while.
>
> *—159: Army O-2's spouse with a high school education*

> Employers do not want to hire military spouses because they see it as a temporary solution: [they are] going to hire and train us, and then we're going to leave.
>
> *—199: Army E-6's spouse with a college degree*

> Since last year [when I got married], I've had the hardest time finding a job, and I've never had that trouble before. Possible employers tell me "we'd love to hire you, you're a great person to hire, but we can't because of your situation. Your husband's in the Navy, and we need someone who can be here long term." It's not fair. And if you live in [military] housing, all the streets are named after states or boats, and people in the area, like civilian employers, they know that. Employers realize that you're somehow attached to the Navy and may not be stationed there for long, so they don't want to hire you.
>
> *—1358: Navy E-5's spouse with a high school education*

Other spouses indicate that even when they do receive a job offer, employers are less likely to invest resources in them or promote them. This perception is consistent with the earlier comments regarding the damaging effects of frequent moves:

> [Employers] don't like to promote too much if they know you're a military spouse because they think you're going to leave. If they know you're a [military] spouse, they kind of hesitate a little because they don't want to spend the money to train if they're not going to have you there.
>
> *—469: Army E-6's spouse with a college degree*

> As a military spouse, you're going to be gone, so they do not want to train you and let you excel, because they don't want to put the money in you because you're going to leave. When I was here before, I worked for an accounting firm, but they would not help pay for my schooling to get an accounting degree because they knew I was going to leave, and they flat out told me that. If I had been a local person, they would have helped pay the bill for me to get an accounting degree. That's how it is around here: They do not like to hire you if you are a military spouse, and if they do hire you, they will not put any extra money into your training. You have to do that on your own.

> [*continued from previous page*] My boss hired me and a local girl the same day. He wouldn't pay for me to do anything, to be an accountant myself, because I was leaving. When I left four years later, I went to him and reminded him that I was still there, even though the local girl quit 60 days [after being hired] and he had 10 other people [fill that other position] before I had to leave after four years.
>
> *—727: Marine Corps E-8's spouse with a high school education*

This last comment suggests that the hesitation employers have regarding military spouses may be ill founded, given that the tenure of civilian employees can also be difficult to predict. However, spouses perceive that employers remain concerned about the likelihood of military spouses leaving during deployments. This problem is uniquely military, more difficult to predict, and will likely occur with less notice. Indeed, we observed within our study considerable difficulty contacting junior enlisted spouses associated with a Navy ship that deployed during the study. The following comments reflect the damage that this practice (departing during deployments) does to the perceived employability of military spouses in general:

> [It is h]arder to find work here; not sure why that is. I think it's because my husband is military, a lot of the businesses that I've applied to are very hesitant to hire the military because they do leave. There are a number of marines that are deploying from here, and when that happens, the spouses go back to their families, and the businesses want someone that will stay here.
>
> *—1007: Marine Corps E-7's spouse with a high school education*

> [It is h]arder because when you tell people in an interview that your husband is in the Army, they think you are not going to be able to make it. If he gets deployed, they think you will quit.
>
> *—1004: Army E-5's spouse with a high school education*

> Every interview I went to, I was asked, "Well, are you married to a Marine?" And once you said yes, it was like, "oh, bye," because most Marine spouses go home when their husbands deploy.
>
> *—1587: Marine Corps E-4's spouse with a college degree*

> I've noticed that businesses really shy away from hiring young military spouses because they can't rely on them.
> *—959: Marine Corps E-2's spouse with a high school education*

Those who perceived a stigmatization of military spouses were often frustrated, feeling that they were unfairly disadvantaged given the notion but uncertainty that civilian spouses would actually remain in the job longer. At least one spouse argued for legal protection against such hiring bias, and another interviewee pointed out that such hiring biases were inconsistent with publicly professed support for military families. As she pointed out:

> The community needs to know that 10 percent off at Denny's for military families is not enough; we need the jobs!
> *—9325: Army O-3's spouse with a high school education*

Some Spouses Mention Other Causes of the Negative Effect on Work

One factor that has been discussed in other work (Hosek et al., 2002; Harrell, 2001; Harrell, 2003) but not mentioned much in our interviews was the volunteerism demands placed on senior military spouses. Only about a dozen spouses mentioned the need to volunteer or do "wifely things" as a factor hampering the work opportunities of senior officer spouses. A small number of spouses also mentioned their frustration with licensing and certification restrictions. These spouses said that it sometimes took them months or longer to become recertified in their professions, and often by the time they had invested the time and money to do so, it was time to relocate. The small number of spouses who commented on licensing and certification issues may reflect the relatively small portion of spouses interviewed in occupations with such restrictions rather than the relative importance of such issues to military spouses nationwide.

Summary

Most employed spouses interviewed perceived that being a military spouse negatively affected their work opportunities, citing frequent

moves as the primary reason for this impact. Spouses also recurrently mentioned service member absence as a work-related problem, especially to the extent that they perceived themselves as de facto single parents, given the cost of child care, their distance from extended family, and their need for nighttime child care. Spouses also expressed frustration that, even when the service members were not absent, the spouses still had to provide single-handed care for the children. These spouses claimed the military workplace to be unsympathetic to family needs such as sick children or children's medical appointments. Although not mentioned as frequently as the above causes, stigmatization of military spouses, or employer bias against hiring, training, and promoting military spouses, was also mentioned as having a negative effect on work opportunities. Occupational licensure and certification as well as the volunteer role expectations for senior officer spouses were mentioned less frequently as negative factors.

These aspects of military life, especially the frequent relocations, the "greedy" nature of the military and its demands on the family, the military's lack of accommodation for family needs, and any employer bias, can be considered some of the unobserved factors that the quantitative analysis in Chapter Three indicated. While the earlier analysis can indicate the quantitative effects of these factors, only such qualitative input can confirm the existence of such factors.

Location-Specific Attitudes About Work

While many spouses took a long-term perspective when answering question about how the military lifestyle had affected them, other spouses, especially junior enlisted spouses, were experiencing their first military location. For these spouses, the perceptions of the local surroundings were especially important. The attitudes about the local job markets varied by location. Spouses at the Navy locations—San Diego, California, and New London, Connecticut—were more likely to comment positively about their ease in finding a job in the local market. Air Force spouses at Eglin AFB, Florida, and Offutt AFB, Nebraska, were fairly evenly split between positive and negative per-

ceptions about the availability of work, although Eglin spouses tended to note the lower salaries of the area and the predominance of tourist-related jobs versus more-professional or technical jobs. Army spouses differed based on their location. Spouses in the Fort Lewis, Washington, area were generally split on their opinions of the local job market, but those spouses without a college degree were more likely to perceive difficulty in finding a job. Spouses at Fort Bliss, Texas, however, as discussed earlier in Chapter Four, were consistent in their negative perception of the local job market, which generally required Spanish fluency and paid little, given the border-town nature of El Paso, which is near Fort Bliss. Marine Corps spouses had similar comments about Yuma, Arizona. However, it was primarily spouses who lacked a college degree who had difficulty with the job market there; only slightly more than half of college-educated spouses in Yuma perceived the job market there to be worse than their prior locations. Some of these spouses who viewed Yuma positively spoke Spanish or were using even more-remote Marine Corps installations (such as 29 Palms or Okinawa) as their basis of comparison. Marine Corps spouses were more unanimous in their negative perceptions of the job market around Camp Lejeune, North Carolina, where few jobs overall were available, and, when they were, tended to be very low paying.

How Has the Military Lifestyle Affected Education?

Education, which bears a strong relation to employment and employment opportunities, is another critical area in which military spouses perceive an impact from living the military lifestyle. About 800 spouses commented on whether they perceived being a military spouse as having affected their educational opportunities.[4] Of these spouses, slightly fewer than one-tenth believed that they had educa-

[4] There were 792 spouses who answered the question, "How has your spouse's military career affected your work or educational opportunities?" with comments about the effect on their education.

tionally benefited from being a military spouse. Some spouses referred to the financial stability and benefits the military provided for their service member, enabling the spouses to cease working and attend school. Others based their positive answer on the programs available to some military spouses, such as in-state tuition rates (available in some states) and GI Bill benefits available to some spouses. In other instances, the academic programs available at their military installation were better than those where they had lived before being married or entering the military. Typical comments included the following:

> It has increased my education opportunities because we're financially able to allow me to [go to school] because he receives excellent benefits and fairly decent pay.
>
> *—60: Navy O-2's spouse with a college degree*

> Education-wise, it's been a benefit because he's in the military, so active duty and spouses don't have to pay out-of-state tuition in Florida. Since I'm not a native Floridian, I would have had to pay greater tuition here.[5]
>
> *—148: Air Force E-9's spouse with a graduate degree*

> [The military] helped [my education] with the programs that they provide for the spouses. In Puerto Rico for instance, they had a STAP [spouses tuition assistance program] program where the military provided $1,000 a year for the spouses. And they offered night classes so my husband could watch my daughter. And the semesters were six to eight weeks.
>
> *—704: Marine Corps E-7's spouse with a college degree*

> It's offered me more of an educational opportunity than I would have had otherwise because of location. I'm from a very rural poor community, and the duty stations where we've lived have always had some kind of community college, whereas I didn't have that option where I was before.
>
> *—1028: Marine Corps E-6's spouse with a college degree*

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[5] This spouse and some others perceived this in-state status as a positive benefit and seemed incognizant that they would likely not require this benefit (because they would likely have accumulated residence status somewhere) if their spouse were not in the military.

The other spouses who responded with perceptions of the effect on their educational opportunity (approximately 90 percent) were split evenly between believing that their educational opportunities had suffered negatively from being a military spouse and that their military lifestyle had had no effect on their education. Neither location, service, nor service member's pay grade had much effect on these perceptions, but attitudes did differ slightly by level of education. Spouses with an undergraduate college degree were more likely to claim a negative effect (approximately half did so) and slightly less likely to believe that the military lifestyle had not affected their educational opportunities. Those spouses with a graduate degree or other professional degree were more likely to claim that being a military spouse had not affected them: Almost two-thirds of these spouses claimed no effect on their educational opportunities. The remaining third of spouses with graduate degrees were fairly even split between those claiming a positive effect and those claiming a negative effect on their educational opportunities. Additionally, any spouses enrolled in school at the time they answered the question were more likely to perceive that they had benefited from being a military spouse. Not surprisingly, the more spouses had relocated, the more likely they were to believe they had been disadvantaged. We discuss this finding further in examples of specific interview answers below.

Service Member Absence and Military Work Schedules

Service member absence, the unpredictability of military work schedules, and the responsibility of parenting without much assistance from the service member were consistently mentioned as factors inhibiting spouses' educational opportunities. More than three-quarters of spouses who perceived a negative effect on their education cited these issues. As discussed before, these comments are sometimes difficult to separate, but they do reflect spouses' perceptions that they bear the brunt of responsibility for their home life, and spouses' comments were consistent with the perceptions discussed earlier about how such absences or unpredictability were deleterious to their work opportunities. Spouses cited problems similar to those that came up with working around their service member's schedules to

attend school. The issue of day care, given the unpredictability of the service member's schedule, was especially strong for education, given that many classes are taught at night and on the weekend, when day care is more difficult to find. Further, some spouses dismissed day care as too expensive, especially in conjunction with school tuition. This perception was also apparent in comments in which spouses indicated that if their service member was not available to watch the children, they could not attend school; day care was not mentioned as a viable alternative. The following comments illustrate these points:

> I really can't go to work or school because I'd have to find day care, and we can't afford day care because he works over 12 hours a day.
>
> *—1237: Marine Corps E-5's spouse without a high school education and with three children*

> Oh, it's hard. Because he can't watch the kids. If I was to go to school in the nighttime, I'd have to find a night time provider to watch my kids because he goes to the field a lot. So it's hard.
>
> *—1251: Army E-6's spouse with a high school education and two children*

> It's difficult to take a class because of his work schedule and minimal day care possibilities.
>
> *—1336: Army E-6's spouse with a high school education and two children*

> Wow . . . His military career has affected my education opportunities greatly because he's not home very often to be able to keep the kids while I go to school.
>
> *—1392: Navy O-2's spouse with a high school education and three children*

The last two comments underscore the importance of child care in the decision to attend school as well as the role that extended family can play to enable work or school or, through absence, to preclude it:

> Well, if we were to stay where I'm from, which is where all my family is, in Oklahoma, my family would watch my kids so I could go to school. But since we're away from there, I have to pay out the nose for day care, and that's pretty much the big difference.
>
> *—1129: Army E-4's spouse with a high school education*

> I think for most people, day care is a problem. I find that a lot of classes and programs are offering nighttime classes, and that's hard because day cares close at 6 p.m., and, like me, I go to classes from 5 p.m. to 10 p.m. I'm blessed because my mom is here [in Fort Lewis]. I have a support system, unlike some of these other people that I've noticed—I've actually heard some the horror stories that they're facing—it's just basically day care and financial. My husband has been in the Army for 16 years. My entry-level job was paying as much as he was making with 16 years. A lot of people can't afford to put their kids in day care and pursue careers or education goals because the money is not there—especially if they don't work. And if they can't work, then they can't get paid—they can't get the services that they need.
>
> *—1146: Army E-6's spouse with a college degree*

Many military spouses perceive the military lifestyle to negatively impact their educational opportunities, and their comments are consistent with those made about the impact on their employment opportunities. They express frustration that frequent moves disrupt and prolong their educational efforts. Relocations also increase the cost of their education, because of the academic redundancies caused by the moves and tuition wasted on classes they could not finish as well as the residency tenure required to qualify for in-state tuition. Service member absences and inflexible or unpredictable work schedules are also problems for military spouses pursuing their education, and spouses emphasize the need for available, low-cost child care appropriate to a student's schedule, which is not full-time and may include evening or weekend hours.

Causes of the Negative Effect on Education: Frequent and Disruptive Moves

Spouses perceive frequent moves to be an extremely negative factor affecting their educational opportunities. This type of impact was mentioned in roughly half of comments from spouses who perceived a negative effect. Some spouses who persevered to finish their degrees despite the frequent moves reported how much longer it took them to complete their degrees during years in which they moved, as the following comments show:

> Well, as far as school goes, each time he moves, I get set back a little bit as far as repeating stuff. Each time we relocate, I have to repeat some classes, or maybe the degree plans are different for the schools and I have to, you know, take some different stuff that I've already taken. It takes longer to get your degree than it would if you were at one place for the whole time.
>
> *—4: Army E-5's spouse with a high school education*

> I've gone to four different colleges to get my degree because I followed him wherever he moved. So instead of four years to get my degree, it took six.
>
> *—1558: Army E-7's spouse with a college degree*

> It took me a lot longer to complete my degree because of moving around and having to wait on in-state tuition requirements. Following him around the Air Force is why it took me eight years to finish my bachelor's.
>
> *—1274: Air Force O-3's spouse with a college degree*

Besides the frustration of the additional time spent to complete their degrees, these spouses also were referring to the additional tuition money spent to repeat classes. Additionally, some spouses referred to other financial ramifications of moving, including tuition money wasted on classes they could not finish. Some comments also referred to the issue of in-state tuition. To the extent that spouses waited to qualify for in-state tuition, they then limited the time in which they could take classes at that location before their next relocation.

Finally, the uncertainty of their residential tenure and the timing of their next impending move sometimes precluded spouses from even trying to pursue education, which is apparent in the following comments:

> It pretty much puts my life on hold. It's very hard for me to make plans because I never know when they are going to tell us to pack up and move. We would take a money loss if I was enrolled in school and have to drop in the middle of the semester because we have to move. I'm still responsible for paying for those classes. And then when we get to our new location, maybe that college won't accept the classes I've taken, and I'd have to start all over again.
>
> *—25: Army E-4's spouse with a high school education*

> It really limits my advancement and my ability to be able to go back to school. Because I do want to go back to school, but everything's up in the air as to how long we're going to be here. So it's hard to enroll in school.
>
> *—700: Marine Corps E-5's spouse with a high school education*

> [The military life has d]efinitely [affected] my education, because I am hoping to finish a nursing program, but I haven't been in one place long enough to complete the program and clinical hours do not transfer; so it's pointless for me to even begin another nursing program until I know we're going to be in one spot for more than a couple of years.
>
> *—1397: Navy E-5's spouse with a high school education*

Summary

Military spouses generally perceive the military lifestyle to negatively affect their employment and educational opportunities. These perceptions are consistent with the quantitative findings that assert military spouses suffer from lower employment, higher unemployment, and lower income levels than do civilian spouses with the same characteristics and attributes, including frequent relocations. The quantitative

analysis cannot pinpoint the reasons for such differences beyond an acknowledgment of the unobserved factors. The data from the interviews permit us to contribute some depth of understanding to what the unobserved factors might comprise.

Frequent relocations are an observed characteristic for which quantitative analysis can control, but military spouses' experiences and comments regarding the negative impact of such relocations are consistent with the quantitative assessment. Spouses emphasize the negative impact of the relocations, and their inability to control the timing or the destination of such moves. They perceive such moves to detract from their acquired seniority at work and to preclude them from obtaining many benefits, such as vested retirement, as well as to discourage advancement or salary increases. Spouses who are attempting to complete a degree program also perceive the moves to delay their progress and increase educational costs.

Military spouses also proclaim considerable negative impacts of the military work schedule, including inflexibility, unpredictability, and frequent absences (including but not limited to deployments). Military spouses generally feel that such demands from the military compel them to manage their household and parenting demands as a single parent rather than as part of a marriage team, even when the service member is not away from the installation. Some spouses also perceive a negative stigma in the workplace; they describe their experiences with employers who treat military spouses differently in the workplace or who are reluctant to hire military spouses. Both the military work schedule—with its attendant prolonged service member absences as well as inflexible and unpredictable daily schedules—and perceptions of stigma of spouses emerge from the qualitative discussions as likely elements of the unobserved factors that have deleterious effects on military spouse employment outcomes, as described in the earlier discussion.

Now we have a clearer, more comprehensive view of military spouse employment conditions and the spouses' perceptions thereof. There is general consistency between the quantitative data that demonstrate a disadvantage among military spouses and the qualitative data that indicate perceptions of such disadvantage.

CHAPTER SIX

Helping Military Spouses

This chapter reflects what military spouses believe could or should be done to help them with their employment or education. We believe there is value in understanding the expectations, opinions, and suggestions of military spouses, and many of these ideas are reflected in our final conclusions and recommendations, although we do not adopt all their suggestions.

At most of their locations, the military services support Family Employment Readiness Programs[1] that "empower clients to manage their work lives in a way that is personally satisfying and consistent with their financial needs, despite the obstacles posed by mobility."[2] This research was not designed to evaluate these programs overall or at any particular location. Nonetheless, because prior research has indicated that military families most in need of support programs are also the least likely to be aware of them, we thought it to be of interest to determine whether the military spouses we interviewed were aware of the spouse employment programs and how they perceived the programs. We designed the questions to elicit information about the programs generally, not just in the focus locations. Further, this series of questions referred to the spouse's most recent job search, which may have occurred at a prior location. Thus, our findings are

[1] Each of the services has a unique name for its program: Employment Readiness Program (Army); Spouse Employment Assistance Program, or SEAP (Navy); Career Focus Program (Air Force); and Family Member Employment Assistance Program (Marine Corps).

[2] Navy SEAP mission statement.

intentionally not location specific.[3] We investigated whether spouses were generally aware of the programs available throughout military locations, whether they had made use of the programs, and whether they were satisfied with these programs. We also asked military spouses what they thought could or should be done to help military spouses with their work and education.

Awareness, Use, and Perceptions of Existing Spouse Employment Programs

Of the spouses interviewed who had ever sought employment, two-thirds had been aware of the military spouse employment-assistance programs at the time of their last job search. Junior enlisted spouses were the least likely to know about of the programs, and senior officer spouses were the most likely. Of the spouses aware of such programs, only about one-quarter used these programs to aid in their employment search, and senior officer spouses were the least likely to use the programs. Said another way, fewer than one-fifth of all military spouses who had sought work used the programs available to them. The three-quarters of spouses who knew about the programs but chose not to make use of them provided a variety of reasons when queried. More than half of them claimed that they had not needed assistance; they either found their job without the program or already possessed the résumé and job search skills they believed the program would have helped them with.[4] Other spouses perceived the employment programs to be inappropriate to them, either because they believed the program targeted government jobs or minimum wage jobs, or because of a perception that the program was designed

[3] We also designed the research in this way because we wanted open communication and considerable assistance from the program directors and others at the local centers while conducting the field research, and we chose to emphasize that we were not reporting on the efficacy of their work.

[4] Some of these spouses indicated that they had acquired these skills through their interaction with the programs during prior job searches.

only to assist active duty personnel. Only a relatively small number of spouses claimed a prior poor experience with the program, a perception of poor quality, or difficulty accessing the program because of its location or appointment limitations.

While the research was not designed to evaluate specific programs, our observations from traveling to multiple locations and interviewing many spouses and DoD employees suggest a considerable range of services offered and varying levels of creativity and skill employed while assisting spouses. Some of the differences are warranted, given the different sizes of the bases and resources available. Others are more likely due to exemplary employees and motivating directors at some locations. Regardless, it is not clear that spouses can expect a consistent range of services as they relocate, nor is it apparent that there is a systematic means to acknowledge and reward exemplary programs or to improve sagging ones.

Spouse Suggestions for Improvements to Employment and Educational Opportunities

During the interview, spouses were asked, "What do you think the military could do to help spouses with their education and paid work?" The answers to this open-ended question were coded and analyzed, and the section below discusses the themes that emerge. While these comments contribute to the recommendations in the concluding chapter of this report, they differ somewhat from our recommendations and are presented here to provide voice to the spouses who participated in this research and to indicate the ways in which the spouses themselves thought the military could help.

Table 6.1 indicates the number of spouses, from each service member's pay grade group, who responded to this question and the number of those who included work- and education-related comments in their answer.

Table 6.1
Respondents to "What Do You Think the Military Could Do to Help Spouses with Their Education and Paid Work?"

	Pay Grade				
	E-1 to E-4	E-5 to E-6	E-7 to E-9	O-1 to O-3	O-4+
Responded to question	231	412	135	175	111
Provided work-related comments	143	255	92	123	86
Provided education-related comments	150	251	98	109	63

The likelihood that a spouse offered a work- or education-related comment did not seem to depend on her own personal characteristics, such as employment status. This was in large part because individuals were prompted for both kinds of suggestions. However, spouses sometimes made suggestions that would help others as well as, or instead of, themselves. Some comments were also of a positive nature, noting what the military is already doing for spouses. Because the spouses were asked to contribute ideas, rather than to offer opinions on a list of possible policies, an omission or a small rate of mention may mean only that spouses did not think of that idea, not that they would not appreciate or benefit from a policy. However, a high rate of mention suggests with confidence an issue that spouses feel should be addressed.

Helping Military Spouses with Their Educational Opportunities

Financial Assistance for Spouse Education

The most frequent suggestion from military spouses was for the military to provide financial assistance for spouse education. One-third of all spouses interviewed mentioned financial assistance, and those comments represent more than half of all education-related comments. Employed spouses were slightly more likely than either job-

seekers or those outside the labor force to mention such financial assistance. Many of these comments advocated that the GI Bill be extended to military spouses. Others suggested grants, scholarships, or loan opportunities targeted to military spouses.

When spouses discussed the negative effects of the military lifestyle, they mentioned in-state tuition eligibility and the choice between either additional cost after each move or the delay while they waited to be eligible for in-state tuition. However, in the context of actions the military could take to assist spouses, a few suggested that the military address ways to reduce tuition costs, rather than provide more financial assistance:

> There are only a few states where you are not offered in-state tuition right away. Virginia, where I had to finish my education, was unfortunately one of those where it's not automatic. [That put me a year behind.] In my home state of Colorado, military and their dependents are offered in-state tuition immediately. In Virginia, you must establish residency in that state to get in-state tuition. They should change the residency requirement for in-state tuition for military and dependents. That would make it cheaper and faster.
>
> *—1274: Air Force O-3's spouse with a college degree*

Better Educational Accessibility

A considerably smaller portion of spouses offered suggestions for ways the military could increase the accessibility of education for spouses. These comments pertained to increasing both the number of classes offered on base and the range of course offerings. Some of these comments mentioned the benefit of online classes and even suggested that the military do what it could to increase the number of online courses available to military spouses. Comments included the following:

> Put classes inside the base for spouses. Most of the time, if they don't work, they can't afford the child care. I talk to wives and ask them why they don't go to school if they're not working. They say, "my husband gets off late, and with no family around,

> there's no one to watch the kids." If they had classes offered inside the base at night, that would help spouses.
>
> *—520: Marine Corp E-6's spouse with a high school education*

> Most of the degrees that they offer on the satellite campuses [on base] are ones that they think are more likely to be of interest to active duty members, like degree programs that might correlate with their active duty jobs.
>
> *—803: Marine Corps E-5's spouse with a college degree*

Assistance Transferring Educational Credits

A small number of spouses expressed a desire for DoD to help them transfer their credits, provide planning assistance to determine which classes were likely to transfer and thus strategize their course selection, and make available general assistance in applying for grants or scholarships. Given that spouses mentioned frequent moves as a primary disruptive influence in their education, it is likely that such assistance would benefit considerably more spouses than those who contributed these suggestions unprompted. Such comments included the following:

> Maybe a partnership with local schools to facilitate application process for spouses and to improve the transfer of credits. I had to retake Freshman English 101 in my senior year because my English 101 class [from my first school] didn't have the words "critical thinking" in its description.
>
> *—9208: Navy O-1's spouse with a college degree*

> I have never pursued much higher education, so at [my] age, I don't really know the steps, how to go about it. I don't know any of that stuff. [It would help] if they would offer classes on how to go back to school, how to fill out the paperwork, how to apply for grants. It's even harder to start over, because I think that the older you get, the less you think you know about that college stuff.
>
> *—613: Air Force E-6's spouse with a high school education*

Proposed Changes to Child Care Perceived to Benefit Both Education and Employment

Comments about changes to military child care were second only to the asserted need for educational financial assistance, as about one-fifth of spouses who answered this question made suggestions for child care. Both in the context of work and school, many military spouses mentioned child care as an issue of concern and a hurdle to military spouses working outside the home or pursuing education. As background, we note that military child care is generally heralded as a high-quality program offered at lower cost than comparable civilian programs. Zellman and Johansen (1998) asserted that the Military Child Care Act of 1989 has generally improved quality of care and increased affordability for military child care such that military parents' fees for child care average almost 25 percent less than those for civilian families. However, the same report notes the shortage of military child care generally, as well as the relative lack of funds and focus on school-age programs. Thus, it was not surprising that, of the eight locations we visited, those installations that had military child care facilities also generally had a long waiting list for new children. The following comments are representative:

> I've been working here almost a year, and my son is still on the waiting list to get into the day care center on base.
>
> *—291: Air Force E-5's spouse with a college degree and one child at Eglin*

> The waiting list is horrific. They don't even have drop-in day care where you could job hunt or go to classes. It's not acceptable here.
>
> *—631: Marine Corps E-7's spouse with a high school education and two children at Yuma*

> The waiting list here is a year.
>
> *—869: Air Force E-5's spouse with a college degree and two children at Offutt*

> They have a child care program, but there's a long waiting list, and it's on base, and it doesn't really do anything for those who don't work on base and don't live on base.
>
> *—981: Marine Corps E-3's spouse with a high school education and one child at Lejeune*

> I think they closed down the day care here.
>
> *—264: Navy E-4's spouse with a high school education and one child at San Diego*

As discussed in Chapter Five, the debate over whether military child care is expensive continues and depends on the comparison basis. Of importance here, however, are the perceptions of military spouses. They generally felt that the child care issue was one that needed resolution. Many mentioned the cost of day care for spouses employed or in school. To the extent that military spouses perceived available day care to be expensive, it was even stronger for spouse students who were not earning income to offset the cost of leaving their children in day care. The other child care issue perceived to need resolution, beyond providing additional capacity and improving the cost, was the availability of extended hours of day care. For spouses who work irregular hours or who attend evening classes, when their service members are deployed or otherwise away from home, day care arrangements become either extremely expensive or generally infeasible. The suggestions below address these concerns:

> [The military should o]ffer some kind of child care assistance so we can continue our education while our spouses are out to sea, because everywhere I go to find help to take care of the children, it is way too expensive to afford. I would be paying $600 a month for me to take a night class.
>
> *—273: Navy O-2's spouse with a college degree and three children at San Diego*

> Child care can be very difficult to find, especially if you're looking for less than full-time, [such as] three hours this day and two the next. I have looked for drop-in care that would allow me to do some volunteering or take one class. It can be especially

> difficult to find that kind of situation. If there was any way to provide that, that would be really nice.
> *—573: Air Force O-4's spouse with a graduate degree and one child at Offutt*

Helping Military Spouses with Their Employment Opportunities

Increase Awareness of Existing Military Spouse Employment Programs

As many as one-quarter of spouses offered suggestions to either increase awareness of existing military spouse employment programs or improve the programs themselves. In many instances, the suggestions to improve the existing programs seemed to be redundant with current features of the program. This finding implies that spouses were not aware of the programs currently offered or that their location did not offer all the possible program services. For instance, spouses would make suggestions like the following:

> Have workshops where spouses can go to learn about how to get ready for job interviews and learn what to say and stuff like that.
> *—476: Army E-4's spouse with a college degree*

> Maybe they could set up a temporary agency thing where they could have lists of jobs available or personnel that help people, you know, find careers in their field.
> *—620: Air Force E-5's spouse with a high school education*

Because the interviewer had already inquired whether the spouse was familiar with or had used the existing spouse employment programs, many spouses referred back to that question in the context of answering this question.

> I didn't know that there were any programs that could help me get a job or help me further my education.
> *—5: Army E-4's spouse with a high school education at Fort Bliss*

> Let it be known that those services are available, because I've never heard of them. I'd have to go down and ask, but I haven't and I've never received anything or read anything, and nothing's ever been given me through my husband's command.
>
> *—492: Navy O-4's spouse with a college education at San Diego*

Others were more aware of the programs offered but felt that other spouses were not. For example:

> Let the spouses know what's out there for them with résumés and career counseling and things like that. A lot of spouses do not know that.
>
> *—577: Air Force E-7's spouse with a high school education at Offutt*

The lack of awareness of existing programs and the tendency of some spouses to suggest creating programs that already exist suggest that information about the programs needs to be better disseminated, regardless of the fact that two-thirds of spouses claimed awareness of the existing programs prior to their last job search. Those who claim awareness, however, may not be fully knowledgeable about all the services offered or the specific program details, and junior enlisted spouses are significantly less likely to be the aware of the programs to help spouses with their educational or employment opportunities. Also, since programs vary so considerably by installation, awareness of what one installation offers does not necessarily provide spouses with an understanding of what might be available at their current (or future) locations.

Improve Civil Service Employment Processes and Policies

Of those who offered employment-related comments, about one-fifth felt strongly that there should be more government employment opportunities for military spouses or that the application or transfer policies should be revised. Many spouses perceived that local civilians without ties to the military were receiving hiring priority, especially when other local civilians were in positions of authority.

> Military spouses, even retirees or disabled vets, I think, should be able to have first dibs on the jobs that are on base, before the civilians. Military spouses have to compete with the civilians for work. They steal our work.
>
> *—718: Marine Corps E-6's spouse with a high school education*

> [The government employees in management positions] could hire people based on education, experience, and qualifications rather than hiring people that they know.
>
> *—864: Marine Corps warrant officer's spouse with a college degree*

To the extent that local civilians are hired into government jobs, they are less likely to leave the jobs as frequently. Thus, a single hire of a civilian who stays in a job for 10 years may preclude three to five military spouses from being hired for the same job. While this promotes stability within the organization, it is detrimental to spouse employment opportunities.

Others believed the system to be complicated and illogical, as the following comments demonstrate:

> I wanted to work at [the military hospital] as a medical receptionist. . . . I was told to work for the commissary as a cashier and then quit so I'd have prior government experience. Personally, I think that's stupid.
>
> *—878: Marine Corps E-5's spouse with a high school education*

> For paid work, they could give spouses preference for civil service jobs even if they're not prior civil service. . . . I have a big problem with civil service. My husband passed my résumé around to people in his squadron, and there was a colonel that wanted to hire me. The colonel requested me by name, but they would not let me have it because they had to give preference to all these other people first. I gave up a $40,000 career to follow my husband around, and civil service couldn't accommodate me to allow me to keep working and contribute to my family.
>
> *—1346: Air Force E-5's spouse with a high school education*

> Rules for government positions are different every place you go. I can't get a government job, and I wasted five months trying. We're good enough to go have lunch with the Korean presi-

> dent's wife to promote U.S. relations, but we're not good enough to walk into a GS-4 job schlepping paperwork somewhere.
>
> *—9539: Air Force O-6's spouse with a college degree*

Still other spouses felt that contractors should be encouraged, if not required, to hire military spouses for the work they do on military bases.

In summary, those spouses who felt that they understood the civil service hiring process believed that it did not place sufficient preference on hiring military spouses, but that it should. Others were baffled or angered by what they perceived to be an archaic and confusing system that could, if revised, offer employment solutions to military spouses as they relocate with their service members. Other spouses looked elsewhere on the military bases and felt that many jobs were being contracted out to organizations that did not hire military spouses but that should be offered incentives or required to include military spouses among their on-base employees.

Require Less-Frequent Moves

The frequent moves that characterize the military lifestyle are generally perceived to be the basis of many of the employment and educational frustrations and barriers of military spouses, and not surprisingly, some spouses mentioned the possibility of lessening the number of moves. Often, those who did even made the suggestion wryly, sarcastically, or even laughed as they did so. Military spouses recognize that many of their employment and educational problems would be reduced if they settled for longer in some locations, but they generally seem to believe that frequent moves is an unchangeable, if insurmountable, feature of the military lifestyle.

Address Licensing and Certification Constraints

A relatively small number of spouses proposed policy changes that would address the constraint of licensure and certification. These spouses often realized that it was not an issue DoD could resolve, but instead one to be dealt with by professional associations or individual

states. Nonetheless, spouses were eager for the military to facilitate agreements with these organizations or, at a minimum, to compensate spouses for the associated costs.

Some Spouses Believe the Military Is Doing Enough Already

A sizable minority, as many as one-quarter of spouses who responded to the question, felt either that the military was already doing enough to address spouses' employment and educational opportunities or that the military was doing all it could against insurmountable hurdles. While such comments are similar, it is still worth noting the difference between those spouses who, for example, felt the existing programs were functioning well and helping spouses and those spouses who did not attribute educational and employment problems to the military. Comments reflecting the former attitude included the following:

> I think they're doing a great job right now with what they offer.
> *—213: Navy O-3's spouse with a college degree*

> I feel, as a military spouse, that the resources are there and the military does provide for us as spouses, but a lot of spouses don't partake in what's offered to them.
> *—234: Army E-6's spouse with a high school education*

> The education programs they have for spouses are excellent. They offer spouses plenty of opportunities to go to school and help school be funded.
> *—153: Air Force E-5's spouse with a college degree*

Spouses who saw educational or employment problems for military spouses but were disinclined to blame the negative situation on the existing spouse employment programs were likely to say such remarks as the following:

> There's nothing the military can do to help me get a paid job except make their bases in big cities, and that's not going to work. I don't know how else to say it. I have my master's in social work, and I'm an elementary school counselor. At isolated

> bases, jobs like that are pretty hard to find. My husband's job just doesn't happen in big cities, and since it was my choice to marry my husband, I guess I chose not to be in big cities. I think the military's doing everything fine. There's nothing the military can do to get more paid work.
>
> *—0138: Air Force O-3's spouse with a graduate degree*

> I guess the reality is [that] they are better than they used to be, and there is a lot more out there now for military spouses than there was when I first became a military spouse 23 years ago. They are making advances, but I do not know how they can get around local emotions of not wanting to hire a military spouse. That's a mind-set that I don't think anyone can get around.
>
> *—727: Marine Corps E-8's spouse with a high school education*

These spouses felt that the issues addressed here were unchangeable. However, while the locations of military installations may be a difficult hurdle, the military could address the inaccurate perceptions of military spouses through outreach programs to local employers or provide incentives for them to hire military spouses.

Other spouses felt that perceived hurdles could be overcome with a combination of existing programs to help spouses and improved, more-positive and -proactive attitudes on the part of the spouses, as the following comments show:

> Can I be blunt? Tell the spouses to get off their butts and quit moaning about their lives. They sit around and don't do anything to improve their lives, but there's so much out there they can do. There are so many programs that will allow them to enhance their lives, and they choose not to use them. There's this place that's a block from me. They have every amenity you could think of to get a job. The jobs aren't going to land at your feet. The spouses have got to put forth effort. [The military] is doing a good job, they really are.
>
> *—1356: Marine Corps E-5's spouse with a college degree*

> Honestly, I feel that the military does enough to help spouses with both education and work. A lot of it, when they choose to have an excuse why [they haven't succeeded] is more an issue of self-drive than it is lack of opportunity.
>
> *—854: Marine Corps O-2's spouse with a college degree*

Related to these attitudes, another small number of individuals (roughly 3 percent) felt that the military should not be involved in issues pertaining to spouse employment or spouse education. Typical comments reflecting this attitude include the following:

> Personally I don't believe it's the military's responsibility to provide education [for the spouses]. For example, if I wanted to go college, I could, but I would not expect the military to pay any portion of my education. Employment-wise, spouses should hit the pavement if they want [a job].
> *—373: Army warrant officer's spouse with a high school education*

> Honestly, I don't think that the military would have to do anything. It's up to the individual wives themselves to make the best of the situation, whatever situation they're in.
> *—1050: Marine Corps E-5's spouse with a high school education*

> Prior to September 11 [2001], I would have said a lot of things, like have husbands work fewer hours, let spouses go to school, but now with the world the way it is, I don't think the Army should be focusing on helping spouses with education and work. The Army is busy training my husband to save his life somewhere down the road, and that's most important to me.
> *—9323: Army O-4's spouse with a college degree*

Summary

The majority of military spouses were aware of existing spouse employment programs at the time of their last job search, although junior enlisted spouses were the least likely to know about such programs. In general, spouses who used the programs were satisfied, although many who were aware of the programs did not use them, because either they felt they had the skills that would be provided or they perceived the programs (correctly or not) to be inappropriate for them.

When asked how the military might help spouses pursue their educational or employment aspirations, spouses offered numerous

suggestions. The most common suggestion was for DoD to provide financial assistance for spouse education. Related suggestions included increasing the accessibility of education or reducing administration problems with applying for school and transferring credits between schools. The second most common suggestion addressed child care, which continues to be an important issue for military spouses. While some spouses perceive military child care as too expensive, others focused their response on improving the limited availability of child care, especially part-time or evening child care, both of which are perceived as necessary for many spouses to pursue their education. Other suggestions for change were directed toward increasing spouse awareness of the current programs, improving the civil service system hiring process, and addressing licensure and certification constraints on spouse employment. Approximately one-quarter of spouses felt that either the existing programs were already good or the programs did as much as they could, given the limitations of the military lifestyle.

CHAPTER SEVEN

Conclusions and Recommendations

This research assessed the demographics and employment outcomes of military spouses with robust existing data sets. We complement that quantitative analysis with interviews conducted with more than 1,100 military spouses, representing all four services and eight different installations. The interviews provide a rich understanding of military spouses' experiences and perceptions of their employment and educational opportunities.

The existing quantitative data indicate that, compared with civilian wives, military spouses are, on average, younger, more likely to be racial or ethnic minorities, more likely to be high school graduates, more likely to have frequent long-distance relocations, and more likely to live in metropolitan areas.

An examination of military spouses' employment status indicates that they are less likely to be employed and more likely to be unemployed (seeking work) than their civilian counterparts. The spouses who do work earn lower hourly wages than civilian spouses. These differences are most notable if you compare spouses not to the civilian average, but to their civilian "look-alikes," who generally fare even better than the civilian average. In other words, the characteristics of military spouses suggest that they should have better outcomes than the average civilian spouse.

Of special interest is the exploration of the role of residence. Our findings are consistent with prior research that asserted that most military spouses live in metropolitan areas and that those military

spouses in nonmetropolitan areas have similar outcomes to military spouses who live in metropolitan areas. In other words, military spouses who must live away from major cities have better employment outcomes in these areas than do their civilian neighbors. However, our analysis also indicates that those military spouses living in metropolitan areas (the majority of military spouses) do not succeed to the same extent as their neighbors. Instead, military spouses in metropolitan areas earn less than civilian spouses living in the same geographic areas. This finding is a new contribution to military spouse employment research.

Education has a positive effect on the likelihood of employment, but the effect differs by service and the level of education obtained. In general, military spouses reap more benefits from additional education than do civilian spouses. The greatest positive impact is for Army and Marine Corps spouses, who are most disadvantaged in the marketplace because the majority of them have only a high school education. Navy spouses are less likely to see as much benefit from additional education, but that may be in part because they fare relatively well in their employment outcomes.

Senior military spouses are more likely to be employed than younger, junior spouses. This finding may reflect differences in family stages, with older children presenting fewer hurdles to overcome for working mothers. This finding also potentially suggests either that military spouses who cannot pursue their own interests while being a military spouse encourage their service members to leave the service or that military spouses gain coping mechanisms over time. Regardless, the employment success of more-experienced spouses does suggest that the military lifestyle is appealing (however challenging) even for spouses who are interested in pursuing their own education and employment.

Census data indicate that military spouses are involved in many different occupations and jobs and that their occupational choices nationwide are very similar to those of civilian spouses, although there are obvious location differences. We can also characterize the jobs or occupations that appeal to (or are available to) military spouses at our research locations by pay grade. In general, junior

enlisted spouses occupy administrative office, retail, and hotel or restaurant jobs. Many mid-grade and senior enlisted spouses also work in the health care industry. Officers' spouses are less likely to work in retail jobs but are more likely to teach school or pursue entrepreneurial opportunities.

The motivation for working varies based on the pay grade of the service member, the family's financial situation, and the education and occupation of the military spouse. About three-quarters of spouses employed or seeking work cited financial reasons as *one* reason for working, and two-thirds of the spouses queried asserted financial reasons as the *most important* reason they worked. Working to pay bills and cover basic expenses was the most common answer when spouses were asked the primary reason that they worked. Extra spending money, boredom avoidance, and personal fulfillment also emerged frequently as primary motivations for working. Other reasons included long-term savings, maintaining skills and career status, and obtaining a return on education. Junior enlisted spouses tended to work for financial necessity and to avoid boredom. Mid-grade enlisted spouses were likely to cite financial necessity and were less likely to mention boredom as a motivator. Senior enlisted spouses were more motivated by personal fulfillment or extra spending money. Junior and senior officers' spouses were more likely to work for personal fulfillment and to keep skills current, although junior officer spouses tended to mention boredom avoidance, whereas senior officer spouses were more focused on long-term savings or extra spending money.

The vast majority (approximately three-quarters) of spouses out of the labor force mentioned full-time parenting responsibilities as their reason for not working. While some of these spouses preferred to remain out of the labor force, not all at-home spouses lacked a "taste" for work. A sizable number of spouses neither working nor seeking work mentioned barriers, including day care issues, local labor market conditions, or demands of the military lifestyle, that hinder their employment. While day care and local labor market conditions are issues that civilian spouses may also face, many military spouses viewed these conditions as the result of their military life-

style, because either they were removed from extended family that could help with the parenting responsibilities, they would not have self-selected the location to which the military sent them, or they believed that many aspects of the military workplace such as long hours, TDYs, and the general inability of service members to accommodate sudden family needs (such as picking up a sick child) precluded their service member spouse from assisting them.

Regarding the existing military spouse employment programs, as many as one-quarter of the spouses interviewed were unaware of such programs. Of the spouses who *were* aware, only one-quarter of them had used them in their last job search. Many of the spouses who chose not to use the programs claimed that they had not needed assistance in their job search. Other spouses perceived, sometimes incorrectly, the programs to be inappropriate for them.

Many spouses emphasized the degree to which they felt the military workplace lacks family-friendly attitudes. It is extremely difficult for many of the units to focus on anything other than the military mission, given the stresses of today's environment. However, if military families could be more informed about their service member's schedule, if the military could better accommodate a spouse's desire to work or attend schools regularly in the evening, and if service members could share more in the "crises" of parenthood (e.g., the need to pick up a sick child from school), the military could gain added respect as a family-friendly employer. While some of these conditions are impossible at certain times, much could be made possible in many units and during relative downtimes. The inevitable compromises and sacrifices that military families make during deployments and exercises mean that respecting and prioritizing family needs while at home is important. Finally, given the Chairman of the Joint Chiefs of Staff's assertion to Congress that quality-of-life concerns are inseparable from combat readiness (Myers, 2004), there are real operational reasons to respect and pursue the family's well being.

These findings provide an expansive portrait of military spouses' living and working conditions. The quantitative data available confirm the perceptions and experiences of military spouses and demon-

strate that many military spouses have had to make—and continue to make—personal employment or academic sacrifices to support their service member spouse's career demands. The strains posed by, for instance, frequent moves, long service member absences, and child care dilemmas exacerbated by the distance from extended family and the unpredictability of service members' schedules, are products of the military life. And these strains may in fact play a role in service members leaving the military to pursue what they perceive to be more "family-friendly" professions. But there are steps DoD can take to improve employment and educational conditions for spouses.

The recommendations below emerge from the preceding analysis and conclusions. They are informed by the spouse suggestions for changes but they neither adopt all the spouse suggestions nor are limited to elicited spouse comments. Given that the spouse perceptions and experiences are generally consistent with data portrayal establishing spouses as disadvantaged in the labor market, these recommendations address ways DoD can improve employment and educational opportunities for spouses.[1] By pursuing some or all of these actions, DoD could reap rewards in terms of concrete quality of life improvements as well as in general perceptions among service members and spouses that the military is listening to, and acting on, their concerns.

Recommendations Addressing Military Spouse Employment Opportunities

Continue to Address Military Child Care Availability and Affordability

Child care remains an extremely important issue to military families. While many of the spouses interviewed believe that military day care is very expensive, others appreciate the value they receive compared with equivalent civilian day care facilities. Thus, the relative expense

[1] If perceptions and experiences had not reflected the "ground truth," our recommendations might have been very different.

of day care is largely a subjective issue. However, the limited capacity of military day care options and the unavailability of affordable (by most standards) off-hour care is apparent and much less subjective (Abell, 2004). DoD efforts to address these issues should continue, and spouses should be made aware of future plans to address perceived shortcomings.

Pursue Relationships with Local Employers, Including Military Contractors

DoD should continue to explore relationships between DoD and large, nationally prevalent employers, such as The Home Depot. Additionally, DoD might explore outreach programs with local employers or promote legislation that would provide incentives for local employers to hire military spouses. Still, DoD should recognize that positive relationships with retail organizations and national restaurant chains could provide employment opportunities for many spouses but will be less helpful for officers' spouses and spouses with college or graduate degrees. Thus, DoD should consider agreements with a portfolio of different types of employers to accommodate different types of spouses. For example, positive interaction or agreements with the Department of Education or with local school organizations would have the most positive impact for more-senior officer spouses and for spouses with graduate degrees.

Pursue Spouse Employment Incentives with Military Contractors

In addition to pursuing positive relationships as discussed above, DoD should consider incentives or other programs to encourage military contractors, those with a more direct link to and dependence on the department, to hire qualified military spouses.

Reexamine the Priority System for Civil Service Jobs

DoD should reexamine the priority system for civil service jobs. To the extent that a former service member fills a civil service job, he or she may remain in that position for decades. Given that military spouses may only fill a position for a couple of years before they relocate, a single civilian in a position might preclude 10 or more military

spouses from filling that position. Given the degree to which military spouse employment has been shown to be positive for DoD, the department should reconsider whether military spouses should receive higher priority, such as a priority slightly lower than military retirees but ahead of nonretiree veterans.

Address Licensing and Certification Hurdles

DoD needs to explore ways to address licensing and certification issues for spouses who relocate. While only a small number of spouses raised this issue as a problem or a suggested policy change, there are possibly other spouses whose career direction has been altered away from these occupations—which tend to be better compensated—because of the recognition of such constraints. DoD should explore ways to influence states to reciprocally honor credentials obtained in other states. Many states do so for their neighboring states and could potentially push their practices more broadly for military spouses.

At a minimum, DoD should consider compensating spouses for the costs of transferring or re-obtaining professional certification and licensure. If this is a small problem, affecting only a minimal number of spouses, then associated costs will be small. If this is a larger problem, then DoD should consider how to address and resolve this issue. At a minimum, reimbursing spouses for part or all of the associated costs will permit the department to track the number of spouses affected, the relevant occupations, and the locations where such problems exist, in preparation for further action.

Finally, DoD should make it easier for spouses to discover the professional requirements for different states and how to satisfy requirements prior to their relocations.

Tailor Spouse Employment Program Policies to Appropriate Audience

When designing spouse programs or policies related to spouse employment, DoD should recognize that different groups of spouses are motivated to work for different reasons, which may include financial needs or nonfinancial motivations. Such differences occur by service member's pay grade, the educational level of the spouse, or the

family's financial situation. For example, spouses of enlisted personnel are more likely to work for financial reasons, and officers' spouses are more likely to cite personal fulfillment and career aspirations.

Raise Awareness About Existing Spouse Employment and Educational Programs

DoD should continue to explore ways to inform military spouses about the current programs that can aid them in their education or employment search. Despite the orientation presentations at many installations, and other publicizing of the programs, one-third of spouses interviewed were not aware of the programs. A more consistent dissemination effort is required.

Become a More Family-Friendly Employer

The military leadership needs to acknowledge the value of being perceived as a family-friendly employer, pursue such opportunities at the military workplace whenever possible, and acknowledge and reward the leadership of those units who do accommodate families. Clearly there are military units and missions that are not accommodating to family needs but need priority. However, it also appears likely that other military units could accommodate the military family to a greater degree. The extent to which the military workplace currently accommodates the family is extremely dependent on the unit leadership, and there are few incentives, at the unit level, for accommodating families.

Recommendations Addressing Military Spouse Educational Opportunities

Develop a Policy Statement Regarding DoD's Position on Spouse Education

DoD needs also to establish officially that it believes it is to DoD's benefit for military spouses to acquire advanced education. While military spouses do not reap the same wage increases from additional education as civilian spouses do, they still see some increased wages

with additional education. Prior studies have associated higher spouse wages with greater satisfaction with military life (USMC, 2002). Thus, more educated military spouses could bring long-range benefits to the military, including the spouse's greater satisfaction with military life, given that their academic aspirations are satisfied and their earning potential increases with that education. Educational opportunities may also represent productive activities in locations with few or less-desirable employment opportunities. Admittedly, however, having more military spouses with greater earning potential may result in families prioritizing her career over a continued military lifestyle.

Nonetheless, the absence of a DoD policy regarding spouse education (including the extent to which DoD supports spouse education) is notable and creates a vacuum of context for policies regarding the extent to which the department should support military spouse education. If DoD determines that promoting spouse education is to its benefit, then extending financial benefits for education, while extremely costly, will address the complaints and suggestions of many military spouses. If DoD indicates limited support for spouse education, then other changes are possible, as discussed below, that will involve less expense to the department.

We note, additionally, that educational benefits should be designed to compel spouses to complete classes that they have already begun. Given that some spouses, primarily junior enlisted spouses, tend to depart (return to their extended families) when their service members are away, DoD should not provide tuition expenses for courses from which spouses willingly drop out (for reasons other than a permanent relocation).

Pursue Opportunities to Gain In-State Tuition Rates for Military Spouses

Additionally, DoD should explore ways in which it can influence states to provide in-state tuition arrangements for military families in order to reduce educational costs.

Strengthen Relationships Between DoD and Educational Providers

There are also less-costly ways to improve military spouses' opportunities to gain an education. DoD could work to strengthen its relationship with universities, such as that with the Servicemembers Opportunity Colleges (SOC) program,[2] to maximize the number of classes offered on military bases, encourage such universities to consider offering coursework other than technical courses aimed primarily at service members, and increase the ease with which military spouses (and military members) can transfer credits. To the extent that universities, such as the University of Maryland, increase the number of bases where they offer classes, the issue of transferring credits can be considerably ameliorated.

Support and Facilitate Online Education or Distance Learning

DoD should explore ways in which the military can support online education. Such support may include providing or loaning computers, or subsidizing the cost of home computers or online access. Additional support may include distance-learning facilities on post, arrangements with an increased number of universities, or providing spouses access to programs such as eArmyU.[3]

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[2] See www.soc.aascu.org for more information on the SOC program.

[3] eArmyU is a distance-learning program offered to service members. For more information, see www.earmyu.com.

APPENDIX A

Census Data, Samples, and Variables

Data Sources

The data used in this study come from two U.S. 1990 Census Bureau's Public Use Microdata Samples (PUMS), the 1 percent and the 5 percent sample files. These individual-level files represent 1 percent and 5 percent, respectively, of the U.S. population in 1990. The two files provide mutually exclusive cases and differ mainly in the types and levels of geography available. For more information on the U.S. Census, the reader is recommended to consult the U.S. Census Bureau.[1] From the 1 percent file, we include all married couples; from the 5 percent file, we include only couples in which the husband is currently a member of one of the four main U.S. armed forces: the Army, Air Force, Navy, or Marine Corps. Combining both files, the data used in this study can be thought of as the 1 percent PUMS file with an oversample of military couples.

The majority of variables in this study come from individual-level information. Table A.1 provides the variable definitions at the individual level for our analysis of 1990 Census data. Table A.2 indicates the aggregate variables used in the analysis of Census data by

[1] See www.census.gov.

Table A.1
Variable Definitions, Individual Level

Variable	Definition
Husband in military	In military if husband is in the Army, Navy, Air Force, or Marines.
Husband's veteran status	Veteran if husband was formerly in military but not currently.
Dependent Variables	
Wife employed	Employed if currently employed in civilian job.
Wife unemployed	Unemployed if not currently employed but looking and available for work. Includes women waiting to be called back to a job from which they had been laid off.
Hourly income	[1989 Annual Wage Income] / [Weeks Worked in 1989 × Usual Hours Worked Per Week in 1989]
Independent Variables	
Wife's education/ husband's education	Mutually exclusive categories: –No high school diploma or GED –Earned high school diploma or GED, no college education –Some college or associate's degree, no bachelor's degree –Earned bachelor's degree, no graduate education –Graduate or professional school education.
Wife's potential labor force experience (and squared term)	[Wife's Age] – [Years of Education] – 5 Negative values set to 0
Wife's race	Mutually exclusive categories: –White –Black –Latina –Asian –Native American/Eskimo –Other.
Wife has young children	True if wife has at least one child under the age of 6 in the household.
Wife moved in last five years	Mutually exclusive categories: –Did not move in the last five years –Moved, in state –Moved, across states –Moved, from abroad –Moved, but move type is missing.
Wife's school enrollment	Mutually exclusive categories: –Not attending school –Enrolled, in public school –Enrolled, in private school.
Husband's years of military service	Years served in the military. Top code at 50 years.

Table A.1—Continued

Variable	Definition
Husband's potential years of civilian labor force experience (and squared term)	[Husband's Age] – [Years of Education] – [Years in Military] – 5 Negative values set to 0.
Husband's period of military service	Mutually exclusive categories: –No active duty –September 1980 or later –May 1975 to August 1980 only –May 1975 to August 1980 *and* after September 1980 –Vietnam Era, no Korean Conflict, no WWII –Vietnam Era *and* Korean Conflict, no WWII –Vietnam Era, Korean Conflict, *and* WWII –February 1955 to July 1964 only –Korean Conflict, no Vietnam Era, no WWII –Korean *and* WWII, no Vietnam Era –WWII, no Korean Conflict, no Vietnam Era –Other period of service
Nonmetropolitan status	Nonmetropolitan if not living in a Census metropolitan area (i.e., a Metropolitan Statistical Area or Primary Metropolitan Statistical Area)

Table A.2
Aggregate Variables, by Occupation and Industry (three-digit)

Occupation	Industry
Median years of education	Median years of education
Median potential years of experience	Median potential years of experience
Median weeks a year	Median weeks a year
Median usual hours a week	Median usual hours a week
Median hourly income	Median hourly income
Percent female	Percent female
Percent black	Percent black

occupation and industry. However, we also utilize contextual information on wives' industrial and occupational environments. To create these variables, we compute the national means and medians of individual characteristics within three-digit occupation and industry codes, using *all* civilians, married or single, in the 1 percent PUMS file only.

Data Samples

We include three types of husbands in this study—current military, veteran, and civilian—and one type of wife, currently civilian. Our sample of "military" couples includes those for which the husband is currently employed in the Army, Air Force, Navy, or Marine Corps. We exclude the couple if the husband is in the Coast Guard, Reserves, or National Guard or in an unspecified military unit. "Veteran" couples include all couples for which the husband was an active member of *any* of the military units in the past, but is not currently employed by the military. "Civilian" couples include all couples for which the husband is not currently and has never been an active member of the U.S. military. Couples are excluded if the wife is actively or most recently employed in the four main armed forces divisions, in the Coast Guard, or in the Reserves or National Guard. We did include couples if the wife is a Reservist but either employed in a civilian position or not currently employed. We further excluded couples if the wife is not of working age, under 18 or over 65.

Because the data utilized here contain an oversample of military couples, the data are reweighted to represent the population of the United States in 1990. The original person weights within each of the 1 percent and 5 percent files are used to represent the population of the United States. When combining cases from the two files, we first multiply the weights of cases from the 5 percent PUMS file by 5. Then we multiply all weights of military wives by the ratio of percentage of military couples in the population to military couples in the unweighted sample. Similarly, we multiply the civilian and veteran wives by the ratio of percentage of nonmilitary wives in the population to the percentage in the unweighted data. The resulting weights, when used, scale down the oversample of military couples so that the entire data set is representative of the U.S. population at large.

For the regression models, we use three samples. For employment, we consider all wives in our sample. When modeling unemployment, we limit the sample only to those wives who are currently employed and those who are jobless but actively seeking work. In

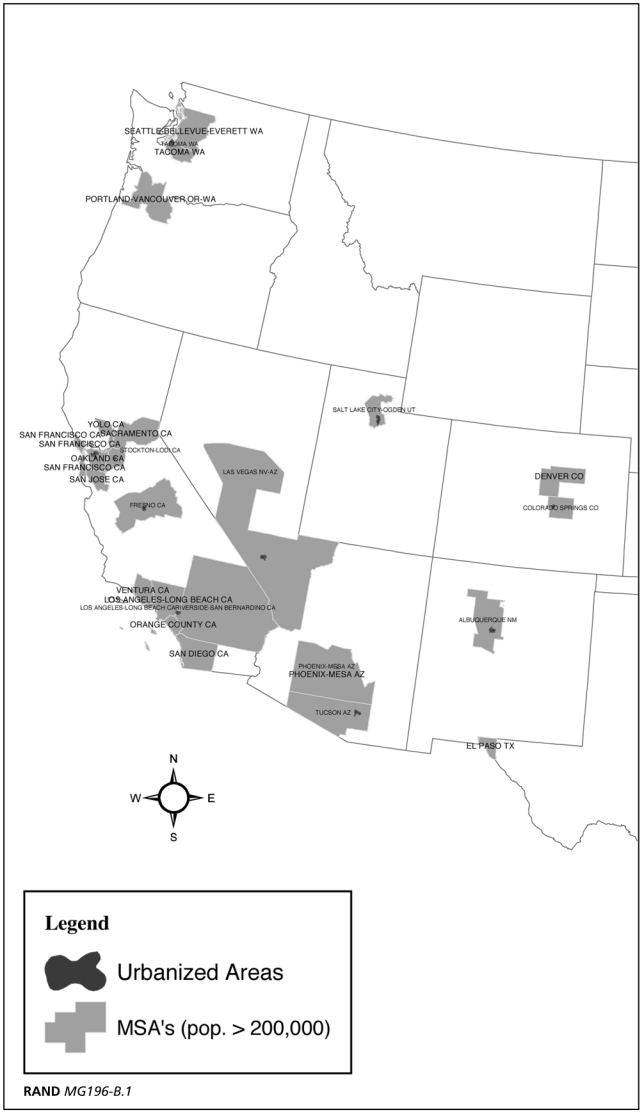
models of hourly wage, we limit the sample to wives who are both currently employed and were wage earners in the previous year, but we implement the Heckman correction for selection bias.

APPENDIX B

Metropolitan Statistical Areas in the United States

We used both the Metropolitan Statistical Areas (MSAs) and the Primary Metropolitan Statistical Areas (PMSAs) as local labor market areas in this report. The MSAs represent relatively freestanding metropolitan areas, while the PMSAs are parts of the larger area, the Consolidated Metropolitan Statistical Areas (CMSAs). Both the MSAs and the PMSAs are designed to represent a large population living in adjacent communities with strong economic and social links. Each metropolitan area contains either an area with a minimum population of 50,000 or a Census Bureau–defined urbanized area and a total metropolitan population of at least 100,000. A metropolitan area comprises one or more counties. Figure B.1 shows the MSAs in the United States.

Figure B.1
Metropolitan Statistical Areas in the United States



RAND *MG196-B.1*

Figure B.1—Continued

APPENDIX C

Decomposition of Differences in Employment Conditions

How much of differences in employment conditions can be "explained" by differences in characteristics of military and civilian wives? This is the central question of the study. The employment conditions include employment status, unemployment, and hourly wage. We describe an example of how we decomposed these differences to answer our central question using the classic wage equations.

The decomposition is based on the idea that the average wage differences between military wives and civilian wives can be separated into two mutually exclusive and exhaustive components: the difference in average characteristics of each group and the difference in treatment each group experiences in the labor market. In other words, if $\overline{W}$ is the average hourly wage per group—C marks civilian wives, and M marks military wives—then

$$(1)\quad \ln(\overline{W}_C) - \ln(\overline{W}_M) = (\textit{difference in average productivity}) + (\textit{treatment}).$$

Since $\ln(\overline{W})$ can be approximated by regression equation coefficients and average characteristics, the gap in average wages is approximately equal to the total gap in predicted values of military wives' wages and civilian wives' wages. Mathematically, this gap is

$$(2)\quad \ln(\overline{W}_C) - \ln(\overline{W}_M) = \sum \hat{\beta}_{Cj}\,\overline{X}_{Cj} - \sum \hat{\beta}_{Mj}\,\overline{X}_{Mj},$$

where j indexes the number of people in each group, $\bar{X}$ represents the average characteristics of each group, and $\hat{\beta}$ represents the estimated regression coefficients. According to Oaxaca (1973), there are two ways to decompose the total difference in predicted values of wages between military and civilian wives. Under the first scenario, if there were no discrimination, civilian wives would be rewarded under the wage structure faced by military wives, but discrimination would take the form of civilian wives being rewarded *more* than would be expected in a nondiscriminatory labor market. In this case, the difference in wages is decomposed as

$$(3)\quad \ln(\overline{W}_C) - \ln(\overline{W}_M) = \sum \hat{\beta}_{Mj}(\bar{X}_{Cj} - \bar{X}_{Mj}) + \sum(\hat{\beta}_{Cj} - \hat{\beta}_{Mj})\,\bar{X}_{Cj}.$$

Under an alternative scenario, if there were no discrimination, military wives would be rewarded under the wage structure faced by civilian wives, but discrimination would take the form of military wives being rewarded *less* than would be expected in a nondiscriminatory labor market. In this case, the difference in wages is decomposed as

$$(4)\quad \ln(\overline{W}_C) - \ln(\overline{W}_M) = \sum \hat{\beta}_{Cj}(\bar{X}_{Cj} - \bar{X}_{Mj}) + \sum(\hat{\beta}_{Cj} - \hat{\beta}_{Mj})\,\bar{X}_{Mj}.$$

In both decompositions, the first term on the right-hand side is the difference in *observed* characteristics, and the second term is the difference in *unobserved* factors, such as differential treatments received by military and civilian wives in the labor market. The two decompositions are distinguished by the reference group for each term on the right-hand side and the resulting interpretation. The two decompositions also produce different numerical, and therefore interpretational, results. To account for this difference, research using wage differentials either reports results from both sets of decompositions, thus providing a range of values for the two components, or from one set of decomposition terms, thus making assumptions about the prevailing wage structure in the absence of differential treatments.

In another approach posited, Cotton (1988) suggests that researchers mix the two decompositions by creating first a new wage structure under the nondiscriminatory labor market, the average of the wage structure for both groups, weighted by population size. Then, the decomposition will consist of three terms: the difference in productivity under the new wage structure, the difference in treatment for civilian wives under the new wage structure, and the difference in treatment for military wives under the new wage structure.

In the current study, military wives constitute fewer than 1.5 percent of the sample. This means (a) Cotton's adjustment does little to the results of the decompositions, and (b) the wage structure of civilian wives is more likely to be the prevailing wage structure in the absence of discrimination against military wives. This assumption fits with the decompositions under the second scenario described above with equation (4), which we utilize in all decompositions described in the main text. In addition, choosing a single decomposition method makes it easier to compare across military status as well as services.

We adopt this decomposition method for the two logistic regression equations, in addition to the wage equation example described above. Given that logistic regressions are nonlinear models, equation (2) no longer holds. As a result, we compute a portion of the differences "explained" by observed characteristics instead. For instance, we can depict the portion of the average wage gap between military and civilian wives attributable to observed characteristics as

$$(5)\quad \%\text{ of the Gap Explained} = \frac{\sum \hat{\beta}\,(\bar{X}_{Cj} - \bar{X}_{Mj})}{\ln(\overline{W}_C) - \ln(\overline{W}_M)}$$

Although this simplification deviates from classical usage of the "Blinder-Oaxaca" decomposition, it provides us with a unified approach across linear and nonlinear regression models.

APPENDIX D

"Look-Alike" Analyses Using the Propensity Scores

In Appendix C, we described how we adopted the "Blinder-Oaxaca" decomposition method to investigate whether differences in observed characteristics explain average differences in labor market conditions of military and civilian wives. Even though the use of this method has been the standard approach of studies of labor market inequality, recent research shows that it has serious weaknesses. For example, Barsky et al. (2001) bring to light the fact that the Blinder-Oaxaca method requires a parametric assumption about the form of the conditional expectations function and that the misspecification of the function can result in estimation errors of the portion of the gap attributable to differences in the characteristics. The researchers propose a nonparametric approach to overcome the weaknesses of the standard approach. Similarly, in the current study, we complement the Blinder-Oaxaca decomposition with a nonparametric approach using propensity scores.

The propensity score method is an effective way to balance observed characteristics across different samples. In this study, we define propensity score as the conditional probability of being a military wife, $(T_i = m)$, versus a civilian wife, $(T_i = c)$, given a set of observed characteristics, X_i : $p(x) = \Pr(T_i = m \mid X_i)$. Based on the central result from Rosenbaum and Rubin (1983), one can show that military wives and civilian wives with the same value of the propensity score have the same distribution of X_i. In other words, the propensity score, $p(x)$, is a balancing score, defined as a function of the

observed characteristics X_i such that the conditional distribution of X_i given $p(x)$ is the same for observations from two groups. By comparing market conditions of military and civilian women with similar propensity scores, we can investigate whether observed characteristics explain the observed differences in the labor market. Hence, we refer to this approach as a "look-alike" analysis.

Estimating Average Labor Market Conditions Using Propensity Scores

Let T_i be a group indicator, if $T_i = m$, then woman i belongs to the group of military wives, if $T_i = c$, then subject i belongs to the group of civilian wives.

Let y_m be a labor market outcome, such as employment status or wage, for a military wife. Propensity scores use the idea of potential outcomes. In our context, this means that there are two possible outcomes associated to every wife. More specifically, if we are considering wage, then for every woman we could observe both y_m, the wage that she would make if she married a military man, and y_c, the wage that she would make if she married a civilian. Notice that, for all the women, we are able to observe either outcome but not both at the same time.

We can express the wage gap, for every woman i in our sample, due to being married to a man in the military by: $y_m - y_c$. Our goal consists of estimating the average wage gap: $E(y_m - y_c)$. More precisely, we are interested in estimating the average wage gap on the military wives:

$$(1)\quad E(y_m - y_c \mid T = M) = E(y_m \mid T = M) - E(y_c \mid T = M).$$

However, for every woman, we can observe only one of the two outcomes but not both. While obtaining an estimate of $E(y_m \mid T = M)$ is straightforward, obtaining an estimate for $E(y_c \mid T = M)$ is a challenge.

An estimate of $E(y_m \mid T = M)$ will be given by the average of the outcomes of all military wives:

$$(2)\quad E(y_m \mid m) \approx \frac{\sum_{i \in M} y_m}{n_M}.$$

For an estimate of $E(y_c \mid T = M)$, we are going to reweight the civilian wives to create a group of military wives' look-alikes using the propensity scores. (A detailed description of the computations can be found in McCaffrey et al., 2003.)

To describe briefly, using the definition of expectation, we can express

$$(3)\quad E(y_c \mid T = m) = \int y_c f(y_c \mid m) dy_c = \iint y_c f(y_c, x \mid m) dx dy_c.$$

In the equation above, x represents the set of individual characteristics, including demographics about the wife and the husband such as race, age, education, number of children, and geographic location of residence.

Notice that we do not have a sample from $f(y_c \mid m) dy_c$, but we have a sample from $f(y_c, x \mid c)$. Multiplying and dividing by $f(y_c, x \mid c)$ and using the Bayes' theorem, we can express the formula above in the following way:

$$(4)\quad E(y_c \mid m) = \frac{f(c)}{f(m)} \iint y_c \frac{f(m \mid y_c, x)}{f(c \mid y_c, x)} f(y_c, x \mid c) dx dy_c,$$

The conditional distribution $f(m \mid y_c, x)$ is the probability of a woman with characteristics x and outcome y_c (the outcome that we would observe if the woman were to marry a civilian man) of being married to a man in the military. We make the assumption that the potential outcome y_c is independent from T given the set of characteristics $\boldsymbol{x}$.

Hence, we get

$$(5)\quad E(y_c \mid m) = \frac{f(c)}{f(m)} \iint y_c \frac{f(m \mid x)}{1 - f(m \mid x_i)},$$

which can be expressed in the following way:

$$(6)\quad E(y_c \mid m) = \frac{\iint y_c \frac{f(m \mid x)}{1 - f(m \mid x)} f(y_c, x \mid c)\,dx\,dy_c}{\iint \frac{f(m \mid x)}{1 - f(m \mid x)} f(y_c, x \mid c)\,dx\,dy_c}.$$

The expression above is a weighted average of the outcomes of civilian wives, where the weights are given by the odds of being a military wife.

So we can estimate the expectation above in the following way,

$$(7)\quad E(y_c \mid m) = \frac{\sum_{i \in C} w_i y_{ci}}{\sum_{i \in C} w_i}, \text{ where } w_i = \frac{f(m \mid x_i)}{1 - f(m \mid x_i)}.$$

To be able to compute the weighted average above, we need an estimate of the weights w_i, i.e., an estimate of $f(m \mid x_i)$. In other words, we need an estimate, for every civilian wife, of the probability of being a military wife.

Under the assumption that the group indicator T is independent of the outcome y_c given x, we estimate the average wage gap for the military wives in the following way:

$$(8)\quad \frac{\sum_{i \in M} y_{mi}}{n_M} - \frac{\sum_{i \in C} w_i y_{ci}}{\sum_{i \in C} w_i}.$$

The last thing that remains to be explained is how to estimate $f(m \mid x_i)$. We need a flexible statistical model that can predict well the probability of being a military wife. We chose to estimate

$f(m \mid x_i)$ using boosted logistic regression. (For more details, refer to Ridgeway, 2004.) In short, the reason for using boosted logistic regression relies on the fact that this method allows fitting nonlinear models with multiple interaction terms, offering more flexibility than the simple linear regression and possibly a better estimate of the probability of treatment assignment.

APPENDIX E

Letter, Interview Introduction, and Interview Protocol

This appendix includes the introductory letter sent to all spouses from the selected military units. The letter was personalized, with individual name and appropriate unit name. The introduction to interviews is the second item in this appendix. This was read to each spouse who was telephoned or interviewed in person, including those spouses who thereafter declined to participate. The third item is the interview protocol. Because this research is based on interviews (not surveys), only the interviewer saw the protocol; the participating spouse did not see the questions asked. The protocol directs the interviewer on whether or not to provide multiple-choice answers and how to skip to other questions, depending on the spouse answers. Thus, this protocol was used for all spouses, including those employed, seeking work, or not in the labor force. The combinations of questions each spouse answered, however, depended on their individual situations and answers to prior questions. The answers to the open-ended questions were electronically recorded and transcribed by the researchers.

Introductory Letter

[Date]

Dear Mr./Ms._____:

The purpose of this letter is to inform you of a study about military spouse employment being conducted by RAND. RAND is a non-profit research organization that serves as a federally funded research and development center for the Office of the Secretary of Defense (OSD), the Joint Staff, the Air Force, and the Army. As part of our work for OSD, we have been asked by the Deputy Assistant Secretary of Defense (Military Community and Family Policy) to investigate the perceptions and experiences of military spouses regarding their employment.

We are speaking with military spouses from the Army, Navy, Air Force, and Marine Corps. Two military installations were selected from each of the four Services, including the installation where your spouse is currently stationed. [Unit Name], your spouse's unit, is one of the units selected for study. Your spouse's commander is aware of this study and has authorized our interviews. This letter of introduction has been mailed to all spouses of [Unit Name], and a subset of those spouses will be randomly selected to participate in an interview. We anticipate speaking to spouses who are employed as well as those who are not; we are interested in your thoughts regardless of your current employment status.

If you are selected to participate in an interview, you will be contacted via telephone by a professional interviewer from SRBI, an organization working for RAND during this study. During the interview you will be asked questions about your experience as a military spouse, your employment history, and your opinions about both. Taking part in this interview is *voluntary* and *confidential*. The commanders of your spouse's unit do not know whom we are contacting, nor will they know if you decline to participate. RAND will use the information you provide for research purposes only, and will not disclose your identity or information that identifies you to anyone outside of the project team. Additionally, because we are interviewing spouses from multiple units, at multiple locations, comments will not be associated with any unit. During the course of the study, we will safeguard the information you provide, and after the study is complete we will destroy all information that identifies you.

If you have any questions about the study, please contact me or my colleague, Laura Castaneda:

Dr. Meg Harrell
Senior Social Scientist
RAND
1200 South Hayes Street
Arlington, VA 22202-5050
Telephone: 703-413-1100, ext. 5240
E-mail: Megc@rand.org

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P.O. Box 2138
Santa Monica, CA 90407-2138
Telephone: 310-393-0411, ext. 6897
E-mail: Laurawc@rand.org

Introductory Letter—Continued

You may also contact one of us if you are interested in being interviewed but have *not* received a telephone call about the study by November 22nd. If you have any questions or concerns about your rights as a research subject, you may also contact the Human Subjects Protection Committee at RAND, 1700 Main Street, P.O. Box 2138, Santa Monica, CA 90407-2138, 310-393-0411, ext. 6369.

Thank you for your time and attention. Both OSD and RAND appreciate your support of this important project. The results of this study will be published in a report approximately one year from now. That report will be available from the RAND website at www.rand.org or by request from either of us.

Sincerely,

Dr. Meg Harrell
Principal Investigator
Senior Social Scientist
RAND

Interview Introduction

Good [morning/afternoon/evening]. I'm calling on behalf of the RAND study of military spouse employment.

May I please speak with [spouse name]?

[IF INITIAL CALLED PARTY IS NOT SPOUSE, REPEAT: Good (morning/afternoon/evening). I'm calling on behalf of the RAND study of military spouse employment.]

RAND is a non-profit organization that conducts research for the Office of the Secretary of Defense. As part of this research, RAND has been asked to investigate the perceptions and experiences of military spouses regarding their employment.

You may also recall from RAND's letter of introduction that your spouse's unit is one of the units the project team has been authorized to study. The letter of introduction was mailed to all spouses with husbands or wives in your spouse's unit, and a subset of those spouses has been randomly selected to participate in an interview.

My name is _____. I am from SRBI, a company employed by RAND to conduct these interviews. We are in the process of contacting a group of randomly selected spouses now. That's the reason for my call today; you have been randomly selected for an interview. If you agree to be interviewed, either today or at a more convenient time, I will be asking you questions about your experience as a military spouse, your employment history, and your opinions about both.

Interview Introduction—Continued

I will take notes during our conversation, but I will not insert your name into the notes. With your permission, I will also record parts of our conversation so that I accurately capture your responses.

RAND will use the information you give me for research purposes only, and will not disclose your identity or information that identifies you to anyone outside of the project team, except as required by law. Additionally, because we are interviewing spouses from multiple units, at multiple locations, comments will not be associated with any specific unit. During the course of the study, the project team will safeguard the information you provide, and one year after the study is complete, all information that identifies you will be destroyed.

Please let me know if you don't want to participate in this interview, or if you want to stop it at any time and for any reason. You should also feel free to skip any questions that you prefer not to answer. Taking part in this interview is *voluntary* and *confidential*. The commanders of your spouse's unit are aware of our research but do not know whom we are contacting, nor will they know if you decline to participate.

The interview will take approximately 25 minutes.

Do you have any questions about the study?

Do you need a copy of RAND's letter of introduction sent to you again?

Do you agree to participate in this research interview?

[IF RESPONDENT NEEDS TO VALIDATE THE SURVEY, INSTRUCT HIM/HER TO CONTACT SPOUSE'S UNIT COMMAND]

Interview Protocol

RESPONDENT ID: _____

Preliminary Information

1. Are you a *civilian* currently *married* to an active-duty service member?
   - ❑ Yes → Continue with the interview.
   - ❑ No → Stop interview. Thank subject for participation.
2. What is your spouse's service? **[DON'T READ LIST]**
   - ❑ Army
   - ❑ Navy
   - ❑ Air Force
   - ❑ Marine Corps

Interview Protocol—Continued

3. What is your spouse's pay grade? **[DON'T READ LIST]**

Enlisted	*Officer*	*Warrant Officer*
❑ E-1	❑ O-1	❑ W-1
❑ E-2	❑ O-2	❑ W-2
❑ E-3	❑ O-3	❑ W-3
❑ E-4	❑ O-4	❑ W-4
❑ E-5	❑ O-5	❑ W-5
❑ E-6	❑ O-6	
❑ E-7	❑ O-7	
❑ E-8	❑ O-8	
❑ E-9	❑ O-9	
	❑ O-10	

Personal Information

4. What is your gender? **[DON'T READ LIST]**
   ❑ Female
   ❑ Male

5. How old were you on your last birthday?
   _____ years old

6. Are you of Spanish/Hispanic/Latino origin or descent?
   ❑ *Prefer not to answer*
   ❑ Yes
   ❑ No

7. What race do you consider yourself? **[DON'T READ LIST]**
   ❑ *Prefer not to answer*
   ❑ White
   ❑ Black or African-American
   ❑ Asian or Pacific Islander
   ❑ Indian (American), Eskimo, or Aleutian
   ❑ Other race: _____

8. What is the *highest* grade or academic degree you have *completed*? **[DON'T READ LIST]**
   ❑ Less than 12 years of school (no diploma)
   ❑ GED or other high school equivalency certificate
   ❑ High school degree
   ❑ Vocational training after high school
   ❑ Some college credit, but no college degree
   ❑ 2-year college degree (A.A./A.S.)
   ❑ 4-year college degree (B.A./B.S.)
   ❑ Some graduate school credit, but no graduate degree
   ❑ Master's degree
   ❑ Doctoral degree (Ph.D./M.D.)
   ❑ Other professional degree (e.g., J.D.)

Interview Protocol—Continued

9. If you are currently enrolled in school, what kind of school are you enrolled in? **[DON'T READ LIST]**
   - ❑ *Does not apply; not currently enrolled in school*
   - ❑ High school
   - ❑ Vocational school
   - ❑ 2-year college
   - ❑ Undergraduate program at 4-year college or university
   - ❑ Post-bachelor's degree program leading to master's, doctoral, or professional degree
   - ❑ Other: _____

Marital History and Children

10. For how many years have you and your spouse been married?
    _____ year(s)

11. For how many years has your spouse been an active duty service member?
    _____ year(s)

12. How many children under the age of 18 live at home with you?
    _____ children
    ❑ *Does not apply; does not have any children living at home.* → **SKIP TO 14**

13. What are their ages?
    Child 1: _____
    Child 2: _____
    Child 3: _____
    Child 4: _____
    Child 5: _____
    Child 6: _____
    Child 7: _____

Residence and Relocation

14. How many times have you and your spouse relocated more than 50 miles for military-related reasons? **[IF NONE, SKIP TO 16]**
    _____ times

15. How long ago was the last such move?
    _____ year(s), _____ month(s)

16. Which of the following places best describes where you live? You can stop me when you hear the appropriate place.
    - ❑ On a military installation → **SKIP TO 19**
    - ❑ Off a military installation but in military provided housing,
    - ❑ Off a military installation in housing you rent,
    - ❑ Off a military installation in housing you own, *or*
    - ❑ Somewhere else? (Specify: _____)

17. How long would it take you to travel from your current residence to the nearest military installation or the one you use the most?
    _____ hour(s), _____ minutes

Interview Protocol—Continued

18. How often do you go to the nearest military installation or the one you use the most? You can stop me when you hear the appropriate response. **[READ LIST]**
- ❑ Every day,
- ❑ Several times a week,
- ❑ Once a week,
- ❑ Several times a month,
- ❑ Once a month,
- ❑ Several times a year,
- ❑ Once or twice a year, *or*
- ❑ You have never visited the military installation

Job Search and Employment

19. Which of the following categories best describes your current employment status? You can stop me when you hear the appropriate category. **[READ LIST]**
- ❑ Employed full time (35 or more hours per week) → **SKIP TO 21**
- ❑ Employed part time (less than 35 hours per week) → **SKIP TO 21**
- ❑ Not employed but seeking part-time or full-time employment → **SKIP TO 26**
- ❑ Not employed and not currently looking for employment

20. Would you tell me why that is your choice for now? → **SKIP TO 32**

21. Tell me about your work. What do you do?

22. How many hours do you work in a typical week?
_____ hours

23. Was it hard to find your job?
Only for Main Job
- ❑ Yes
- ❑ No

24. How did you find your job? **[DON'T READ LIST]**
Coding options for how job was found
Only for Main Job
- ❑ Answered an ad in newspaper/trade journal
- ❑ Answered an ad on the Internet (e.g., job board)
- ❑ Contacted the employer directly
- ❑ Job fair
- ❑ Information provided by a friend or relative
- ❑ Contacts made while doing volunteer work
- ❑ Civilian/private employment agency
- ❑ Employment assistance program sponsored by the military
- ❑ State employment service
- ❑ Job bank
- ❑ Other: _____

Interview Protocol—Continued

25. Which of the following phrases best describes how well your qualifications match the work you do in your job? You can stop me when you hear the appropriate phrase. **[READ LIST]**
- ❑ I am greatly overqualified for the work,
- ❑ I am somewhat overqualified for the work,
- ❑ My qualifications are appropriate for the work,
- ❑ I am somewhat under qualified for the work, *or*
- ❑ I am greatly under qualified for the work.

[SKIP TO 29]

26. What kind of work are you looking for?

27. Have you turned down any offers of employment?
- ❑ Yes
- ❑ No → **SKIP TO 29**

28. For what type of work and why?

29. If you had your choice, would you rather work full time or part time?
- ❑ Full time
- ❑ Part time

30. Why do you work, want to work, or need to work?

31. Which of those reasons is most important?

32. Which of the following phrases best describes your financial situation? **[READ LIST]**
- ❑ Very comfortable and secure
- ❑ Able to make ends meet without much difficulty
- ❑ Occasionally have some difficulty making ends meet
- ❑ Tough to make ends meet but keeping our heads above water
- ❑ In over our heads

[DON'T READ NEXT OPTION]
- ❑ *Prefer not to answer*

33. How has your experience with work or school at this location differed from that of other locations where your spouse has been assigned? For example, are you doing the same kind of work if you worked in both places? If you've chosen not to work here, is that consistent with your decision at other locations?

Interview Protocol—Continued

34. How has your spouse's military career affected your work or education opportunities?

Employment Assistance Programs

35. Military-sponsored employment assistance programs offer services to individuals looking for work. Such services include career counseling and training in resume preparation. Were you aware of these military-sponsored programs during your most recent job search?
- ❑ Does not apply; have never sought employment → **SKIP TO 40**
- ❑ Yes
- ❑ No → **SKIP TO 40**

36. Did you participate in such a program during your most recent job search?
- ❑ Yes → **SKIP TO 38**
- ❑ No

37. Why not?

[SKIP TO 40]

38. What types of services did you use?

39. Overall, how satisfied were you with this military-sponsored program?
[READ LIST]
- ❑ Very satisfied
- ❑ Somewhat satisfied → **SKIP TO 40**
- ❑ Neither satisfied nor dissatisfied → **SKIP TO 40**
- ❑ Somewhat dissatisfied
- ❑ Very dissatisfied

[DON'T READ NEXT OPTION]
- ❑ *Prefer not to answer* → **SKIP TO 40**

39a. Why do you feel this way?

Conclusions

40. What do you think the military could do to help spouses with their education and paid work?

41. Are there other comments you'd like to make regarding the topics we discussed today?

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