Work-Family Conflict, Part I: Antecedents of Work-Family Conflict in National Collegiate Athletic Association Division I-A Certified Athletic Trainers

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Context: Work-family conflict (WFC) involves discord that arises when the demands of work interfere with the demands of family or home life. Long work hours, minimal control over work schedules, and time spent away from home are antecedents to WFC. To date, few authors have examined work-family conflict within the athletic training profession.

Objective: To investigate the occurrence of WFC in certified athletic trainers (ATs) and to identify roots and factors leading to quality-of-life issues for ATs working in the National Collegiate Athletic Association Division I-A setting.

Design: Survey questionnaire and follow-up, in-depth, in-person interviews.

Setting: Division I-A universities sponsoring football.

Patients or Other Participants: A total of 587 ATs (324 men, 263 women) responded to the questionnaire. Twelve ATs (6 men, 6 women) participated in the qualitative portion: 2 head ATs, 4 assistant ATs, 4 graduate assistant ATs, and 2 AT program directors.

Data Collection and Analysis: Multiple regression analysis was performed to determine whether workload and travel

predicted levels of WFC. Analyses of variance were calculated to investigate differences among the factors of sex, marital status, and family status. Interviews were transcribed verbatim and then analyzed using computer software as well as member checks and peer debriefing. The triangulation of the data collection and multiple sources of qualitative analysis were utilized to limit potential researcher prejudices.

Results: Regression analyses revealed that long work hours and travel directly contributed to WFC. In addition to long hours and travel, inflexible work schedules and staffing patterns were discussed by the interview participants as antecedents to WFC. Regardless of sex ($P = .142$), marital status ($P = .687$), family status ($P = .055$), or age of children ($P = .633$), WFC affected Division I-A ATs.

Conclusions: No matter their marital or family status, ATs employed at the Division I-A level experienced difficulties balancing their work and home lives. Sources of conflict primarily stemmed from the consuming nature of the profession, travel, inflexible work schedules, and lack of full-time staff members.

Key Words: work load, job responsibilities, quality of life

Key Points

- Factors contributing to the work-family conflict experienced by Division I-A athletic trainers included long working hours, required travel, inadequate staffing, and lack of control over work schedules.
- Regardless of sex or marital or family status, athletic trainers struggled to find sufficient time for themselves and their nonwork obligations.

Work-family conflict (WFC) is defined as discord that arises when the time devoted to or time spent fulfilling professional responsibilities interferes with or limits the amount of time available to perform family-related responsibilities.¹ This phenomenon results when the expectations and time constraints associated with the professional and personal lives of an individual are not compatible, making it difficult to manage both.¹ The WFC is a byproduct of the stress and overload that arises from the demands associated with home and work roles. It reflects the degree to which one's responsibilities from either the work or family domains affect or disrupt an individual's life: "participation in the work role/family role is made more difficult by virtue of participation in the family role/work role."² Ultimately, the demands and responsibilities of the professional life make it more difficult to accomplish or meet activities in the home and personal life.³

Long work hours, travel, minimal control over work schedules, and overlapping responsibilities are characteristics of the collegiate setting within the athletic training profession⁴ and often cited in the literature as job-related stressors and precursors to job dissatisfaction and burn-out.^{4–8} For many, time is viewed as a limited resource; thus, the more time and energy an individual invests in one role, the less time and energy available to spend in the other,^{1,9} resulting in conflicts. The limited evidence regarding antecedents of WFC suggests several identifiable sources, with work time often thought of as the cause.^{1,10–14}

As pointed out by Scriber and Alderman,⁴ the significant time commitment associated with the athletic training profession, particularly in the collegiate setting, can considerably diminish the amount of time available to spend on outside activities (ie, attending to personal and family needs). Echoing the thoughts of Scriber and Alderman,⁴ authors¹⁵ examining organizational influences

and quality-of-life issues revealed that National Collegiate Athletic Association Division I-A certified athletic trainers (ATs) felt consumed by their positions due to the high volume of hours necessary to meet their job-related responsibilities. The time-intensive nature of the profession, an identified antecedent of WFC among other working professionals,¹⁰⁻¹⁷ may create the potential for WFC for the AT. Furthermore, long work hours have been identified within the coaching literature as a source of WFC,^{16,17} as well as a factor in attrition.¹⁸ Conceivably then, WFC could be a variable that translates to the profession of athletic training because of the comparable time commitment necessary to meet job-related responsibilities.

Few researchers have actually examined work time as a predictor of the work-family interface¹⁰⁻¹⁴ and little is known about WFC among allied health care professionals,⁹ particularly ATs. However, family and personal life is a prime concern for ATs,¹⁹ and the lack of personal time has been identified as a contributing factor in the decision of ATs to leave the profession.⁸

Our aim was to build upon the examination of working professionals by Netemeyer et al¹ by studying ATs. Our purpose was to investigate the prevalence of WFC among Division I-A ATs and to determine the contributing factors. Specifically, we wanted to answer the following questions: (1) Were Division I-A ATs experiencing WFC? (2) If so, which factors contributed to WFC? and (3) Were factors such as sex, marital status, and family status predictors of WFC? We hypothesized that the more hours worked and more days traveled, the greater the WFC. Moreover, we hypothesized that female ATs experienced more WFC than male ATs, that married or partnered ATs experienced more WFC than those who were single, and that those ATs with children experienced more WFC than those without children.

METHODS

Participants

In this mixed-methods study, 587 ATs who represented all 10 National Athletic Trainers' Association (NATA) districts and who were employed at Division I-A universities sponsoring football responded to the WFC questionnaire. Twelve ATs, representing 3 Division I-A universities sponsoring football, volunteered to take part in the individual, in-person interviews conducted after data analysis of the survey instrument.

Instrumentation

Before piloting the WFC survey to a small group of ATs ($n = 95$) for readability, clarity, and time to complete the survey, we asked a panel of experts ($n = 6$) to examine the face and content validity of the survey. The panel of experts included ATs and professors of athletic training who reviewed the document for specific content related to athletic training. Additionally, sport management researchers with previous experience in mixed-methods qualitative research and knowledge of the profession of athletic training reviewed the document for clarity, content, and methodologic procedures. The survey, which took approximately 10 to 15 minutes to complete, consisted of 2 sections. The first section contained 20 items pertaining to

general demographic characteristics, such as age, sex, years of experience, current position, hours worked, travel load, and marital status. The second section contained 53 items evaluating WFC and several variables linked to WFC, including job and life satisfaction, burnout, and intentions to leave the profession. The survey, which was developed and validated by Netemeyer et al,¹ was scored on a 7-point Likert scale ranging from 1 (*strongly disagree*) to 7 (*strongly agree*). Validity and reliability have been documented for a group of working professionals.¹ For the purposes of this manuscript, we will discuss the findings generated by the portion of the survey instrument evaluating WFC. The WFC survey¹ is a 5-item tool designed to assess whether the demands of an individual's job interferes with his or her personal life. The 5 items pertaining to WFC were summed to determine an overall score and mean. Also, mean scores were calculated for each of the individual questions. Table 1 provides the 5 questions used to assess WFC. The Cronbach alpha established by Netemeyer et al¹ was .88; for our sample population of ATs, it was .90.

The interview guide was designed to further evaluate the topic of WFC and potential antecedents based on the current WFC literature and results generated by the survey (Appendix). The interview guide, which was reviewed by our peer debriefer for clarity and content, included a background questionnaire similar to the survey instrument asking participants if they experienced WFC and how they managed those conflicts.

Procedures

Before data collection began, the study was approved by the institutional review board. All survey respondents gave consent by completing and returning the survey. Interview participants were required to sign an informed consent at the start of the in-person interview. A packet containing 15 WFC surveys was mailed in mid-November to the head ATs working at each of the Division I-A universities sponsoring football ($n = 116$), who were asked to distribute the survey questionnaires to their staff. The mailing packet included an explanation of the study and directions for the distribution and return of questionnaires. One school, which participated in the pilot study, was not included in the mailing. A cover letter to each participant was also included, serving as the consent letter, and provided an explanation of the study, time requirements, and confidentiality and instructions to mail the survey directly back to the authors. Surveys were coded to identify only the university. Three weeks after the mailing, the head ATs were contacted via e-mail in an attempt to increase the response rate. If additional surveys were needed, they were sent to the head AT.

To try to match the demographic make-up of the survey results (as outlined in the Results section), we purposefully identified the following positions for interviewing: 2 head ATs (1 man, 1 woman), 4 assistant ATs (2 men, 2 women), 4 graduate assistant ATs (2 men, 2 women), and 2 program directors (1 man, 1 woman). Initially, we contacted ATs whom we knew and had confidence in regarding their ability to speak forthrightly about their personal and professional lives. We selected these participants according to their current position, sex, accessibility, region, and

Table 1. Results for Individual Work-Family Conflict Survey Questions

	Mean $\pm$ SD ^a	n	% Above Mean
1. The demands of my work interfere with my home and family life.	4.8 $\pm$ 1.6	363	62
2. Because of my job I can't involve myself as much as I would like in maintaining close relations with my family.	4.7 $\pm$ 1.7	357	61
3. Things I want to do at home do not get done because of the demands of my job.	4.8 $\pm$ 1.5	367	63
4. I often have to miss important family activities because of my job.	5.0 $\pm$ 1.5	395	68
5. There is a conflict between my job and the commitment and responsibilities I have to my family.	4.3 $\pm$ 1.6	296	50

^a 7-Point Likert scale (1 = *Strongly disagree*, 7 = *Strongly agree*).

willingness to participate in our study. We then employed a snowball sample to gain access to additional ATs in the Division I-A setting. In the end, the 12 interview participants represented 3 Division I-A universities that sponsored football and the position breakdown as previously outlined. In-depth, semistructured interviews were completed with each of the 12 participants. All interviews were conducted in person.

Member checks, peer debriefing, and triangulation of data collection methods were undertaken to limit the potential researchers' prejudices. The interviews were documented through field notes and tape recordings. In the interest of confidentiality, all participants were asked to select pseudonyms that were used throughout the transcription. Also, to maintain confidentiality, school names, names of buildings, and any other identifying references were changed. After completing each interview, the researcher transcribed the interview and shared the transcript with the participant as a form of member checking for clarity and accuracy. Interview transcripts, coding sheets, and theme interpretations were shared with the peer debriefer. The peer debriefer was an AT with previous research experience in the topic of WFC. The methods were triangulated by including a background questionnaire, field notes, and the individual interview, as well as by interviewing ATs in different positions (ie, head AT, assistant AT, graduate assistant AT, and program director) within the profession.

Data Analysis

We analyzed the quantitative data using SPSS (version 10.5; SPSS Inc, Chicago, IL). Demographic data and WFC scores were calculated using percentages, means, and frequencies. One-way analysis of variance was conducted to investigate the relationship among sex, marital status (married versus single), family status (children versus no children), and WFC. We conducted a regression analysis using free entry of the variables to determine whether hours worked and travel time predicted levels of WFC in this population. The themes from the interviews were initially categorized based upon the research questions developed before the study began. Then after transcription was completed, the investigators independently hand coded the data with different-colored pens to match the emerging themes. Next, the data and emerging theme structure were loaded into the computer software program N6 (QSR International Pty Ltd, Melbourne, Australia). The software aided in connecting emerging ideas and themes in the data.

RESULTS

A total of 587 surveys (representing 324 men, 263 women) were completed and returned, yielding an approximate response rate of 42%. Our response rate was calculated by utilizing data generated by NATA membership statistics,²⁰ revealing 2132 certified members employed at the Division I level. Of those 2132 members, the NATA estimated that, according to self-reporting of position, 66% were practicing clinically,²⁰ for an overall n of 1407. Of those who responded to the survey, 55.2% were male and 44.8% were female (Table 2). The average number of years of experience for the survey respondents was 8 years. Of those who responded to the survey, 12.6% (n = 74) were head athletic trainers, 5.8% (n = 34) were associate athletic trainers, 46.8% (n = 275) were assistant athletic trainers, 34.8% (n = 204) were graduate assistant athletic trainers, and 2.6% (n = 15) had program director duties in addition to their clinical responsibilities. Overall, 59.3% (n = 356) of the survey respondents had their master's degrees, and 79% (n = 464) were between the ages of 20 and 35 years. On average, the survey respondents worked a total of 62 $\pm$ 14 hours per week, traveled 8 $\pm$ 4 days per month during their in-season sport coverage assignments, and were responsible for 3 $\pm$ 3 athletic teams throughout the scholastic year. Of this sample, 54.5% (n = 320) were single; 42.8% (n = 251) were married, partnered, or living with their significant other; and 1.6% (n = 9) were divorced or separated. A total of 24.0% (n = 142) had children: 7.6% (n = 20) of the female ATs and 37% (n = 122) of the male ATs (Figure 1). Figure 2 provides a comparison of ATs with children by age category. On average, they had 2 $\pm$ 1 children, and the primary caregiver was the spouse (42.6%, n = 60), day care (28.4%, n = 40), or other (family or babysitter) (17%, n = 24).

Table 2. Demographic Make-Up of Survey Respondents by Age and Sex

Age Group, y	Overall Sample, n (%)	Males, n (%)	Females, n (%)
20–25	218 (37.1)	89 (27.5)	129 (49)
26–30	149 (25.4)	82 (25.3)	67 (25.5)
31–35	97 (16.5)	60 (18.5)	37 (14.1)
36–40	42 (7.2)	27 (8.3)	15 (5.7)
41–45	27 (4.6)	18 (5.6)	9 (3.4)
46–50	22 (3.7)	20 (6.1)	2 (0.8)
51–55	16 (2.7)	12 (3.7)	4 (1.5)
56–60	12 (2)	12 (3.7)	0 (0)
61+	4 (0.7)	4 (1.2)	0 (0)
Total	587	324	263

Figure 1. Male and female total respondents and those with children.

Experiences of Work-Family Conflict

Quantitative Results. A total of 68% ($n = 395$) of survey respondents reported a 5 or higher on the Likert scale (5 ± 1.5), indicating they agreed with the statement, “I often have to miss important family activities because of my job” (Table 1). Additionally, 50% ($n = 296$) of the survey respondents replied with a 5 or higher on the Likert scale (mean = 4.3 ± 1.6) to “There is a conflict between my job and the commitment and responsibilities I have to my family.”

Qualitative Results. Throughout the interviews, it was evident that participants had experienced challenges when attempting to balance their personal and work lives. Some were directly aware of their struggles, openly admitting to them when asked, whereas other participants inadvertently described difficulties while discussing their current position or job-related responsibilities. (See Table 3 for participant background information.) When asked about conflicts, Madison openly stated, “Yeah, (I) definitely experience challenges... Mostly my social life is affected because of work (long hours) and having to work weekends.” Similarly, Harold discussed his heavy travel load when asked about work-family conflict:

Yeah, [I have little personal time]. Especially if you are working with a sport that travels a lot. You can be gone from Thursday to Sunday on a road trip. You really do not have a day off. Even when the team may not play or practice, I still have treatments so I usually work seven days a week. So I would say it impacts my ability to have personal time/social time.

Harrietta also openly reflected upon the many social events she missed: “When you do sit back and think about it, I can count how many weddings I have missed, or a funeral, or you weren’t at something that you should have been at and you still feel like you are missing out, and it all can be contributed by work.” Jamie, on the other hand, discussed her situation as she reflects on the holiday season: “It is hard to get together, especially tough during the year while I am in season with basketball, and a little at the holidays as well.”

Some of the younger professionals felt as though they had limited opportunities for personal time; however, they felt the conflicts were manageable at this point. Yet those

Figure 2. Athletic trainers (ATs) by age with children.

ATs who felt their limited experiences with WFC reflected their current marital status anticipated a higher level of WFC once they started a family. For instance, Samantha said,

No, because it doesn’t really impact my parents that much. It really goes back to me being single right now. It would be different if I were not single. When I am married and have a family, then without a doubt I will struggle to balance my personal and professional life.

The 5 previous quotes acknowledge ATs’ conflicts between their professional and personal lives, a finding comparable with the results generated by the survey portion of this study.

Antecedents of Work-Family Conflict

Quantitative Results. We used a multiple regression analysis with free entry of the independent variables to develop a model for predicting WFC from hours worked and days traveling. The average in-season workweek was 62 ± 14 hours. The average out-of-season workweek was 46 ± 11 hours. The average in-season travel load per month was 8 ± 4 days. The average out-of-season travel load per month was 2 ± 2 days. The set of independent variables provided a statistically significant explanation of the variance in WFC: $R^2 = .041$, $R^2_{adj} = .034$, $F_{4,577} = 6.181$, $P < .001$. Thus, a small portion of the variance in WFC can be explained by hours worked and days traveled.

Qualitative Results

Consistently, the long hours worked were discussed by the interview participants as a cause of WFC. Of the 12 participants interviewed in person, 9 indicated that the large volume of hours played a significant factor in

Table 3. Background Information for 12 Interviewees

Participant	Sex	Experience, y	Marital Status	Children	Current Position
Mark	Male	15–20	Married	Yes	Head athletic trainer
Jamie	Female	15–20	Single	No	Head athletic trainer
Davis	Male	20–25	Married	Yes	Assistant athletic trainer
Phil	Male	0–5	Married	No	Assistant athletic trainer
Madison	Female	10–15	Married	No	Assistant athletic trainer
Samantha	Female	5–10	Single	No	Assistant athletic trainer
John	Male	0–5	Single	No	Graduate assistant athletic trainer
Harold	Male	0–5	Single	No	Graduate assistant athletic trainer
Harrietta	Female	0–5	Single	No	Graduate assistant athletic trainer
Ashley	Female	0–5	Single	No	Graduate assistant athletic trainer
Allison	Female	15–20	Single	No	Program director
Jeffrey	Male	10–15	Married	Yes	Program director

mediating WFC. Ashley bluntly stated, “It is kind of hard to have a life with the long hours you work.” Madison discussed how consuming the job can be, particularly when days off are far and few in between: “Working seven days a week is what I dislike the most. The biggest thing [contributing to my struggle balancing my life] is the lack of time off.” Davis said, “[I experience WFC] because of the time I spend away from home with travel and my work schedule. I am not around as much as I would like to be.” Phil discussed the effect of work time on balance. He stated, “I know I work long hours and I look at other [ATs] who also work 70 to 80 hours a week with families and I wonder how they balance work and family.”

Many discussed their pay and hours as unsatisfactory elements to their job. One AT felt the 2 factors also contributed to the experiences of WFC. Jeffrey stated:

These two things go together. It is a lot of hours with low pay. It is those factors, but it really is one in the same. If you worked long hours with a lot of pay or less hours with low pay, it would be better. It is hard for people to imagine successfully having a career and a home and a family life while working all those hours and having such low pay.

The 5 previous quotes speak directly regarding the volume of hours as precursors to WFC, an issue addressed in the questionnaire and confirmed by the regression analysis. However, 2 other themes emerged from the interview data as factors creating WFC for this sample that were not addressed by the survey instrument: control/flexibility over work schedules and staffing patterns. Of the 12 participants interviewed in person, 5 discussed flexibility/control over work schedules as problematic when managing their professional and personal lives. While discussing the role of a collegiate AT and the occurrence of WFC, Jamie concluded that the lack of control over work schedules led to quality-of-life issues:

If I practice on Christmas day, then I obviously have to be there. I am sure I would love not to be there on Christmas day, but that is not our profession. It is the way our job is set up, it does not work that way. We just do not have the control over the situation or schedules.

Ashley believed that inflexible work schedules led to the inability to find a balance between personal and professional responsibilities. With constant changes to practice and game schedules and last-minute notice, many participants strug-

gled to spend time at home on personal matters. Ashley stated,

The irregularities is the most problematic, when you can't always know for sure your schedule, when it can change day to day when practice is. Not knowing ahead of time your schedule...makes it difficult to make plans/get things accomplished outside of the workplace.

Madison had this to offer: “More often [my] work interferes with [my] home life. Ultimately the head coach has the control over the schedule and the hope is they involve you [in the scheduling process].”

Work overload, most often due to an inadequate number of full-time ATs to satisfactorily cover all athletic teams, was discussed by many as the most problematic factor for this group. Nine of those interviewed in person mentioned staffing issues as a concern and potential cause of WFC. Many ATs immediately had dual in-season sport assignments. The long work hours and travel spilled into more than 1 season, causing significant challenges regarding balancing and juggling their life roles. John directly linked an increase in quality of life to staffing patterns:

When the staffing patterns are adequate in terms of the number of full-time staff members to cover the load required of an ATC, then I think there will be less conflicts (for an AT). But until we can hire more ATCs to effectively cover all teams (in/out of season) then the struggle will still exist.

Long work hours and travel were predictors of WFC for Division I-A ATs. Furthermore, lack of control, inflexible work schedules, and inadequate staffing patterns may increase WFC for Division I-A athletic trainers, as identified by interview participants.

Demographic Factors Related to Work-Family Conflict

Quantitative Results. No differences were detected between WFC and sex ($F_{1,579} = 2.167, P = .142$), marital status ($F_{1,581} = 7146.40, P = .687$), family status ($F_{1,250} = 0.055, P = .814$), and age of children ($F_{2,131} = 0.044, P = .957$) (Table 4).

Qualitative Results. Quality-of-life issues, specifically juggling professional and personal responsibilities, were discussed by all the participants, regardless of sex, marital status, or family status. The time-intensive commitment required and expected of an AT indeed affected the ability to manage their responsibilities in and out of the workplace.

Table 4. Work-Family Conflict^a by Sex, Marital Status, and Family Status^b

Group	Analysis of Variance
	Mean $\pm$ SD Scores
Sex	
Male	23.7 $\pm$ 6.9
Female	23.6 $\pm$ 6.5
Marital status	
Single	23.8 $\pm$ 6.2
Married	24.6 $\pm$ 6.2
Family status	
Children	24.9 $\pm$ 6.1
Ages of children, y	
Up to 6	22.7 $\pm$ 7.7
7 to 17	22.6 $\pm$ 6.9
18+	22.6 $\pm$ 6.6
No children	24.9 $\pm$ 6.6

^a The 5 items pertaining to work-family conflict were summed to determine overall and mean scores. Possible scores ranged from a low of 5 to a high of 35.

^b Analyses of variance revealed no differences in work-family conflict by sex, marital status, or family status.

Harrietta, while reflecting on her role as a collegiate AT, concluded that she was having difficulties finding time to meet social obligations. She stated, “Definitely [I am struggling]. I have no flexibility. I am dictated with what day I have off. I feel like I am missing out [on opportunities to go to social events/time for myself], and it all can be contributed by work.” Mark acknowledged struggling to find a balance between his personal and professional life. He attributed it to the nature of the profession and athletics: “Yes, definitely [I experience conflicts]. It is the lifestyle of athletics. Everything is dictated by my job and the responsibilities associated with the job.”

All 12 participants shared concerns regarding their quality of life at some point during the interview. The types of conflicts they experienced may have varied, but they all reported experiencing WFC. For example, conflicts arose for married and partnered ATs when attempting to meet immediate family obligations, such as spending time with the spouse, attending sporting events or family outings, and even performing household chores. Davis reflected upon the days he only saw his family in passing as he ran from one activity to another:

Often times my wife will take the earlier practice and I will rush home [from work] to get my other son to take him to the later practice. We [my wife and I] only see each other in passing and by the time I get home they [my son and wife] are in bed.

Single ATs typically did not have the same home responsibilities as married or partnered ATs, yet their personal time was not inherently less valuable and they, too, had personal obligations. The single AT participants discussed the difficulty they had in finding the balance or time to do the small things, such as laundry, cleaning, or reading a book. Allison described her many discussions with the staff at her university and her peer ATs regarding the challenge of finding the time to meet new friends or dating:

Some of the aspects of the job make it difficult [to have a family or social life]. Early on (in your professional

career) you are so busy, therefore, you do not have a social life. Some of the ATCs here laugh and say, “What social life?” You do not have time to go out and meet people. You can’t do things consistently. You know you can’t plan a date because you do not know if you have to work that night the schedule is so inflexible and can change at any time.

In concert with the responses gathered by the interviews, the data analysis suggested that the job-related responsibilities of an AT create the potential for WFC, regardless of sex or marital or family status.

DISCUSSION

Our primary goal was to assess whether WFC occurs within the athletic training profession, particularly in the Division I-A setting. Additionally, we set out to determine the antecedents of WFC within this population. Overall, the results revealed that Division I-A ATs were experiencing WFC. Similar to previous findings regarding WFC antecedents,^{1,9–14,17} sources of WFC for this population stem from the general demands of the AT’s role and the time necessary to complete those job-related responsibilities.

Antecedents to Work-Family Conflict

The most significant contributing factors of WFC for Division I-A ATs were the hours worked and travel necessary to meet job-related responsibilities. Similar to the results shown by Pitney¹⁵ within the athletic training literature and by Dixon and Bruening¹⁷ within the coaching literature, we found that time spent at work served as the foundation of WFC for Division I-A ATs. Our findings, which support our first hypothesis, and previous research link time away from home^{17,21,22} and excessive time commitments to work^{9–14,17,21,22} as major contributing factors to the degree of WFC. Nine of the 12 participants indicated hours worked and travel were significant factors in WFC, but only a small portion of the variance was explained by these factors. One possible explanation is related to the design of the survey instrument. Survey respondents were only asked to indicate hours worked and days traveled per month, not whether these factors influenced their abilities to balance their professional and personal lives. In the future, ATs should be asked directly whether time spent at work and traveling contributes to WFC.

Two factors not theorized at the outset of the study—staffing patterns and flexibility and control over work schedules—emerged as contributing factors to WFC among this group of Division I-A ATs. Nine of the 12 interview participants indicated a lack of full-time staff members, which meant they had to cover multiple sports with different in-season schedules. Thus, they worked longer hours over an extended period of time. As a result of the staffing shortage, ATs experienced work overload, which has been cited in the past as an antecedent to WFC and has been linked to other working professionals.²¹ Five of the 12 interview participants felt that if they had more control over or flexibility within their schedules, they would be able to meet more of their personal obligations. This is consistent with other findings linking flexibility in work assignments and scheduling with successful management of home and personal responsibilities.^{11,16,17,23}

Through the interviews, it became apparent that many of the factors identified as sources of WFC were unique to the profession of athletic training and possibly not fully addressed by the Netemeyer et al¹ survey. A better model to predict WFC among this group may include work time, travel, flexibility of work schedules, and staffing patterns. Furthermore, employing a multifactorial perspective (individual, organizational, and sociocultural factors) when exploring contributing factors may further explain the context of WFC within the athletic training profession.¹⁷

Demographic Factors Influencing Work-Family Conflict

Family Status Influences on Work-Family Conflict. Contrary to our initial hypothesis, married or partnered ATs, with or without children, did not experience more WFC than single ATs. Single ATs still have important personal obligations to meet; therefore, the fact that they do not have the responsibility of maintaining a traditional household (with spouse or partner and/or with children) does not limit the conflicts they may experience. Perhaps single individuals experienced a different type of conflict than those who were married or partnered. One possible explanation, which warrants further investigation, is that this group may be experiencing work-life conflict rather than WFC. Many of the single interview participants reflected upon how the demands of the profession limited the amount of time they had to pursue personal interests or meet basic household needs (laundry, etc). Furthermore, fewer than half of the survey respondents were married, thus limiting our ability to generalize. An accurate comparison between the current study and the demographic make-up of NATA Division I is not possible because data on marital and family status are lacking.²⁰ Nonetheless, based upon our findings, we believe that regardless of marital or family status, ATs are struggling to find time for themselves and their obligations outside of work.

Again, differing from our original hypothesis and previous research,^{11,22,24,25} having parental responsibilities did not increase the experience of WFC for Division I-A ATs. It is important to mention, however, that of those ATs with children, a majority utilized their spouse or partner for full-time child care, which may have minimized potential conflicts regarding home responsibilities. Research suggests that satisfaction with child care can help mediate parental demands, which directly influence WFC.²⁶ It is entirely plausible that this dynamic played a role in this current sample of ATs. Also, fewer than a quarter of those ATs surveyed had children; therefore, the results may be skewed with regard to WFC differences as related to parental status.

Gender Influences on Work-Family Conflict. Traditionally, women have tended to assume more of a role within the family domain.^{11,27} Coupling their responsibilities at work with these family responsibilities, we hypothesized that women would then tend to perceive a higher level of WFC. However, for ATs at the Division I-A level, no sex differences were found, which is consistent with the results of other research.^{11,28} Of the nearly 600 ATs involved in the study, only a small number were married with children. Although this finding is consistent with another group's²⁹ study of WFC among Division I ATs involving 22 females

employed at that level, the low number of married female participants with children may have limited the significance.

One theory, which we did not investigate, was the effect of attrition. Several interview participants discussed intentions of leaving the profession themselves to start a family or had witnessed a coworker's departure from the profession or setting to spend more time with their family and children. In the coaching literature, investigators have suggested that female coaches leave the profession due in part to the inability to meet the challenges of the work-family interface, which is a reasonable explanation for the low number of female ATs with children in this sample.^{17,18} A comparison between our findings regarding sex and marital status and the NATA membership is not possible because no demographic data currently exist on that topic.²⁰ Previous authors^{8,19} within athletic training have alluded to concern over the lack of personal and family time, but further inquiry into the effect of attrition among Division I-A ATs, especially female ATs, is necessary for an accurate description of the work-family interface.

CONCLUSIONS

Close to 600 Division I-A ATs volunteered their time to participate in this mixed-methods study on the occurrence and importance of WFC. In addition to time spent at work, lack of control over work schedules and inadequate staffing patterns were also antecedents for Division I-A ATs, a finding that has not been identified in other WFC literature. Furthermore, based upon the results of our study, the term *WFC* may not accurately describe the conflicts experienced by ATs. Work-life conflict may be a more appropriate description due to the demographic make-up of the Division I setting. Many of the ATs who participated in the study were young, unmarried, and without children and still experiencing conflicts. Therefore, *family* may need to be exchanged for *life* to reflect a more global perspective. Additionally, the results of this study demonstrate the need for discussions of WFC within academic curriculums.³⁰

The results generated by this study, however, may not be transferable to all other settings because we only surveyed individuals who were employed by Division I-A universities sponsoring football. Further, even though the purpose behind qualitative research methods is to individually investigate research questions, the participants were selected based upon location and accessibility; thus, they did not represent all regions of the country. In addition, the themes that emerged from the interviews may not portray the feelings or concerns of others within the profession. Finally, we were unable to include within the interview group a female AT who was married with children. We recognize that with future inquiries, an attempt to represent this demographic will be necessary. However, we were constrained by the limited sampling within that group.

Future authors can expand the scope of this study to investigate whether WFC exists in other athletic training settings, such as clinics and high schools and across all collegiate NCAA divisions. Time of year may also have an influence regarding the responses and results generated. Therefore, we suggest that future researchers investigate the construct over a period of time. Job dissatisfaction, job burnout, job turnover, and life dissatisfaction have been linked to WFC,¹ so to adequately address quality-of-life

issues within athletic training, these constructs should be investigated. Additionally, to further explore the topic of WFC, it is important to investigate how ATs cope with conflicts, what prompted those who have already left the profession to leave, and suggestions for change. Demographic results revealed only 20 female ATs with children at the Division I-A level. It is necessary, then, to study this population in depth to learn if it represents the profession, and if so, which issues the ATs experience, how they cope with and manage these conflicts, and what can be done to keep these ATs in the profession. Finally, more demographic data need to be collected to accurately describe the make-up of the NATA: more specifically, data regarding the family status of current ATs.

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REFERENCES

- Netemeyer RG, McMurrian R, Boles JS. Development and validation of work-family conflict and family-work conflict scales. *J Appl Psychol.* 1996;81(4):400–410.
- Kahn RL, Wolfe DM, Quinn R, Snoek JD, Rosenthal RA. *Organizational Stress.* New York, NY: Wiley; 1964.
- Katz D, Kahn RL. *The Social Psychology of Organizations.* New York, NY: Wiley; 1978.
- Scriber KC, Alderman MH. The challenge of balancing our professional and personal lives. *Athl Ther Today.* 2005;10(6):14–17.
- Hendrix AE, Acevedo EO, Hebert E. An examination of stress and burnout in certified athletic trainers at Division I-A universities. *J Athl Train.* 2000;35(2):139–144.
- Capel SA. Psychological and organizational factors related to burnout in athletic trainers. *Athl Train J Natl Athl Train Assoc.* 1986;21(4):322–328.
- Capel SA, Sisley BL, Desertrain GS. The relationship of role conflict and role ambiguity to burnout in high school basketball coaches. *J Sport Psychol.* 1987;9(2):106–117.
- Capel SA. Attrition of athletic trainers. *Athl Train J Natl Athl Train Assoc.* 1990;25(1):34–39.
- Bacharach SB, Bamberger P, Conley S. Work-home conflict among nurses and engineers: mediating the impact of role stress on burnout and satisfaction at work. *J Organ Behav.* 1991;12(1):39–53.
- Gutek BA, Searle S, Klepa L. Rational versus gender role expectations for work-family conflict. *J Appl Psychol.* 1991;76(4):560–568.
- Duxbury L, Higgins C, Lee C. Work-family conflict: a comparison by gender, family type, and perceived control. *J Fam Iss.* 1994;15(3):449–466.
- O'Driscoll MP, Ilgen DR, Hildreth K. Time devoted to job and off-job activities, interrole conflict, and affective experiences. *J Appl Psychol.* 1992;77(3):272–279.
- Frone MR, Yardley JK, Markel KS. Developing and testing an integrative model of the work-family interface. *J Vocation Behav.* 1997;50(2):145–167.
- Major VS, Klein KJ, Ehrhart MG. Work time, work interference with family, and psychological distress. *J Appl Psychol.* 2002;87(3):427–436.
- Pitney WA. Organizational influences and quality-of-life issues during the professional socialization of certified athletic trainers working in the National Collegiate Athletic Association Division I setting. *J Athl Train.* 2006;41(2):189–195.
- Dixon MA, Sagas M. The relationship between organizational support, work-family conflict, and the job-life satisfaction of university coaches. *Res Q Exerc Sport.* 2007;78(3):236–247.
- Dixon MA, Bruening JE. Work-family conflict in coaching, I: a top-down perspective. *J Sport Manage.* 2007;21(3):377–406.
- Patore DL, Inglis S, Danylchuk KE. Retention factors in coaching and athletic management: differences by gender, position, and geographic location. *J Sport Social Iss.* 1996;20(4):427–441.
- Survey of men and women in athletic training. Women in Athletic Training Committee. www.nata.org/members1/committees/watc/watc_historywomen/member_surveys.htm. Accessed April 26, 2004.
- Member statistics. National Athletic Trainers' Association. www.nata.org/members1/documents/membstats/2005eoy.htm. Accessed April 20, 2005.
- Cooke RA, Rousseau DM. Stress and strain from family roles and work-role expectations. *J Appl Psychol.* 1984;69(2):252–260.
- Greenhaus JH, Beutell NJ. Sources of conflict between work and family roles. *Acad Manage Rev.* 1985;10(1):76–88.
- Babin BJ, Boles JS. The effects of perceived co-worker involvement and supervisor support on service provider role stress, performance, and job satisfaction. *J Retail.* 1996;72(1):57–75.
- Pleck JH. Men's family work: three perspectives and some new data. *Family Coord.* 1979;28(4):481–488.
- Pleck JH, Staines GL, Lang L. Conflict between work and family life. *Mon Labor Rev.* 1980;103(3):29–32.
- Bedeian AG, Burke BG, Moffett RG. Outcomes of work-family conflict among married male and female professionals. *J Manage.* 1988;14(3):475–491.
- Duxbury LE, Higgins CA. Gender differences in work-family conflict. *J Appl Psychol.* 1991;76(1):60–74.
- Lyness KS, Thompson DE. Above the glass ceiling? A comparison of matched samples of female and male executives. *J Appl Psychol.* 1997;82(3):359–375.
- Milazzo SA, Miller TW, Bruening JE, Faghri PD. A survey of Division I-A athletic trainers on bidirectional work-family conflict and its relation to job satisfaction [abstract]. *J Athl Train.* 2006;41(suppl 2):S-73.
- Mazerolle SM, Casa TM, Casa DJ. Addressing WFC in the Athletic Training Profession Through High-Quality Discussions. *Athl Ther Today.* 2008;13(4):5–10.

APPENDIX. IN-PERSON, INDIVIDUAL INTERVIEW QUESTIONNAIRE

- Tell me a little about yourself, your daily routine. Does your routine change or differ from season (in versus out)?
- Do you feel that you experience conflicts between your home and family life?
- If so, how do you manage those conflicts? Does anyone help you manage those conflicts?
- Do you feel more conflicts between your home to work versus work to home?
 - Why?
 - Does that impact your feelings/conflicts at home/work?

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