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WORK, STUDY, AND HOME DEMANDS: AN INVESTIGATION OF THEIR INTERRELATIONSHIP, COPING, AND SATISFACTION

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Abstract

Escalating tertiary fees, user pay systems, and high living costs are some of the reasons students are combining paid work with study. In tertiary institutions there are a large proportion of students studying while working. Working students of all ages have home commitments, be it household management, family, pet, or flatmate responsibilities. The aim of this research was to look at how working students manage interrole conflicts between work, study, and home. This included how interrole conflicts, satisfaction, and coping related to one another and whether task-focussed coping and emotion-focussed coping mediated and moderated the interrole conflict and satisfaction relationships. Three hundred and twenty seven students who had been undertaking paid work during the semester completed an online survey. Results showed that although there were some mediational and moderational relationships, overall coping made little difference to the relationships between interrole conflict and satisfaction. It was found that the domain that gave rise to interrole conflict was also the domain where most dissatisfaction was experienced, suggesting the source of the conflict is more resented than the role affected by the conflict. The highest conflict was time-based study interfering with home, and the second highest conflict was time-based work interfering with study. Tertiary institutions need to extend hours for their services, and evening and weekend availability of lecturing staff. Ongoing promotion through seminars of ways to successfully manage home commitments with study commitments would be useful for working students as well. It is also important that workplaces promote initiatives such as flexible hours to help students combine work and study successfully. Postgraduates experienced interrole conflict more than undergraduates in 5 of the 6 interrole conflicts so it is important that they are specially targeted for attention. Future research might like to compare larger samples of postgraduates and undergraduates and see if each group experiences similar or different mediational or moderational effects such as coping. Future research should also continue to differentiate between time and strain-based interrole conflict as working students experience them differently.

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Chapter 1: Interrole Conflict and Satisfaction

Introduction

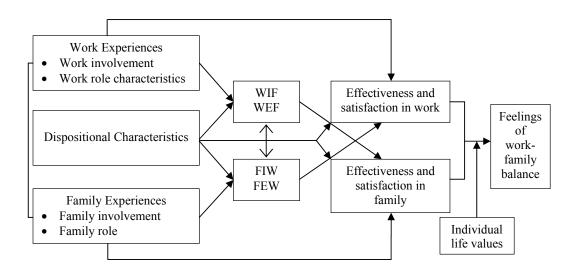
Today's students often have multiple roles, all of which are important to them. Blending paid work and study over the semester is very common. Some studies, which include research from New Zealand (Gilmore & Manthei, 2005) and Ireland (Holmes, 2008) report that over 80% of students work during term time. Cost of living (Holmes, 2008), student loan debt, cost recovery due to user pays systems (Gilmore & Manthei, 2005) and high university fees (Buda & Lenaghan, 2005; Butler, 2007; Gilmore & Manthei, 2005; Riggert, Boyle, Petrosko, Ash, & Rude-Parkins, 2006) often make the combination of working and studying a necessity. While the recession and the likely effects of unavailability of work in New Zealand has impacted on student employment with 65% of students working and studying in 2010, in the 2007 academic year there were up to 90% of students studying and working according to a New Zealand Union of Students' Associations (2010) survey of over 2500 students.

In New Zealand there are a large proportion of students studying in their mature and working years. Over 53% of working students were aged 25 years and over in 2010 for formal qualification enrolments greater than one week in duration (New Zealand Ministry of Education, 2011). Many students will have commitments outside of work and study, including home commitments. It is possible however that older students and postgraduate students have more overall commitments than younger and undergraduate students.

One of the aims of the present research was to compare working tertiary students in terms of age groups and stages of study to see if there are differences in the type of interrole conflicts that students experience. Other aims of the present research were to look at various conflicts between domains and their relationship to satisfaction, and to see how coping mediates and moderates between interrole conflicts and satisfaction.

Looking at levels of interrole conflict can be seen as a gauge of work-life balance. Frone (2003) commented that a lack of conflict between family and work roles was the most commonly understood interpretation of work-family balance. The relationship of levels of conflict to levels of satisfaction could also be an indicator of work-life balance. Lower work-life balance could be signified by a relationship between high conflict

levels and outcomes like lowered satisfaction. Frone (2003) comments that having role imbalance can be a significant stressor that can influence wellbeing. Work-life balance is related to a wide range of factors, some of which are reflected in Greenhaus & Allen's (2011) model. The model does not include coping which will be included in Chapter 2.



WIF = work interference with family; WEF = work enrichment of family; FIW = family interference with work; FEW = family enrichment of work.

Figure 1: A Model of Work-Family Balance (Greenhaus & Allen, 2011, p.176)

Understandably the breadth of what makes up life and the debate over what makes up balance has meant that the best way to measure the construct of work-life balance has not been agreed on. Work-life balance can be broadly interpreted as "the interrelationship between people's work and non-work roles" (Roche & Baskerville, 2007, p. 59). This can be examined in relation to conflict and facilitation between roles. Facilitation happens between roles when "participation in one role is made better or easier by virtue of participation in the other role" (Wayne, Musisca, & Fleeson, 2004, p. 109). While the present research does not examine facilitation as a part of work-life balance, the literature on work and family (e.g. Hill, 2005; Wayne et al., 2004), and on work and study (e.g. Butler, 2007) to a more limited extent has looked at whether role facilitation occurs.

Interrole Conflict

It is important to explore conflict between domains because of its known associations with stress. Involvement in one role can make involvement in the other role more difficult (Greenhaus & Beutell, 1985). This can result in interrole conflict which has been described as what is experienced "when pressures arising in one role are incompatible with pressures arising in another role" (Greenhaus & Beutell, 1985, p. 77).

Interrole conflict is associated with role theory. Every role an individual occupies has required activities, responsibilities, and behaviours associated with it (Kahn, Wolfe, Quinn, Snoek, & Rosenthal, 1964). People have many roles in their lives which accumulate, and role interference is one type of conflict that can occur from occupying multiple roles (Voydanoff, 2002). This is because each role demands different sets of obligations which can lead to conflict between roles (Goode, 1973).

Work interfering with family (WIF) and family interfering with work (FIW) are forms of interrole conflict which have been most researched. Greenhaus & Beutell (1985, p. 77) describe work-family conflict as "a form of interrole conflict in which the role pressures from the work and family domains are mutually incompatible in some respect." In early work-family conflict research WIF and FIW were not treated as separate constructs and instead measured as part of one global scale (Ford, Heinen, & Langkamer, 2007). As work-family conflict research has progressed there has been an increased understanding that WIF and FIW are two different constructs (Gaffey & Rottinghaus, 2009; Greenhaus & Beutell, 1985; Kossek & Ozeki, 1998). To date there has been more research on WIF than FIW (Netemeyer, Boles, & McMurrian, 1996), and WIF has been found to occur more frequently than FIW (Frone, 2003).

Three primary forms of work-life conflict have been identified. These are time, strain, and behaviour-based conflict. Time-based conflict occurs when time given to one role makes it difficult to give time to meet the needs of another role (Greenhaus & Beutell, 1985). Time-based conflict between roles falls under resource drain theory and resource scarcity theory in that time resources are depleted. Time is seen as a limited and fixed resource (Voydanoff, 2004) so allocation of the resource of time means that one domain may drain time resources that could have been used for the other domain (Frone, 2003). Strain-based conflict occurs when strain arising from one role makes it difficult to meet the needs of another role (Greenhaus & Beutell, 1985). In situations such as this, the

effects of strain such as irritability, fatigue, anxiety, and low energy which arise in one domain are felt in the secondary domain. Behaviour-based conflict occurs when the behaviour exhibited in one role is carried over to another role but is inappropriate for that role. At work, for example, it may be important for managers to keep a power distance from their staff, whereas at home they may struggle to adopt a warmer style of relating (Greenhaus & Beutell, 1985).

Many studies do not clearly differentiate between time, strain, and behaviour-based domain conflicts. Some researchers have focussed exclusively on time and strain conflict, but not behaviour-based conflict (Lapierre & Allen, 2006; Premeaux, Adkins, & Mossholder, 2007). There have been fewer studies investigating behaviour-based conflict in research into work and family interrole conflict (Dierdorff & Ellington, 2008). Behaviour-based interrole conflict is not part of the present research because it is difficult to examine empirically. This is due to the wide variety of behaviours people exhibit in their different roles. The focus of the present research instead is on time and strain conflicts between domains.

Work, family, and study

Interrole conflict research has limited itself largely to work and family domain conflicts. Very little research has looked at other non-work roles or other types of domains (Butler, 2007; Egleston, 2008). It is prudent to look at conflict between non-work domains as well as between non-work and work domains as it may show a lack of balance. Work-life balance can change over time depending on what commitments a person has (Kalliath & Brough, 2008). While study is often a temporary role in people's lives, it is often a primary and salient role for students. Therefore, study is an important role to single out and examine in conjunction with other domains. The student role could be an added stressor when combined with work and family roles (Adebayo, 2006; Kohler Giancola, Grawitch, & Borchert, 2009).

Interest has intensified in how students see their ability to balance work and study (Holmes, 2008). Labels associating working and studying are becoming more prolific. Students who work are also known as 'learner-earners' (Swanson, Broadbridge, & Karatzias, 2006). Both Casey & Williamson (2007) and Holmes (2008) comment on the importance of the work identity for full-time students. Workers who study are also known as 'earner-learners' (Swanson et al., 2006). Often earner-learners are studying

when they are older (Swanson et al., 2006). Earner-learners consider themselves to be chiefly employees despite the study role. It has been suggested that it would be good to look at these two types of students and compare them, as having a more diverse range of participants might make the findings more generalisable (Butler, 2007). Utilising role theory, study is an added role that has obligations that may conflict when combined with other roles like work and family. Despite this, there has been limited research in looking at study as a domain that could interact with the work domain potentially resulting in interrole conflict (Lenaghan & Sengupta, 2007). To date, research on conflict involving work and study has mainly focussed on work interfering with study (e.g. Butler, 2007). Some research has examined whether study interferes with work (e.g. Kohler Giancola et al., 2009), family (e.g. Egleston, 2008), leisure (e.g. Ratelle, Senécal, Vallerand, & Provencher, 2005), and sporting activities (e.g. Settles, Sellers, & Damas, 2002). There has also been research on how family interferes with study (e.g. Egleston, 2008; Kohler Giancola et al., 2009).

Students have regularly been used as a convenience sample in research (Gaffey & Rottinghaus, 2009; Wiley, 1987), while the study domain part of their lives has often been ignored. Gakovic & Tetrick (2003) investigated part-time and full-time work using a student sample but were not concerned with the student role or interrole conflict. In some research the study domain has not been separated out (Egleston, 2008; Riggert et al., 2006). Instead it has been included under other domains such as work (e.g. Gröpel & Kuhl, 2009), personal benefit activities (e.g. Allis & O'Driscoll, 2008), or role balance (e.g. Marks & MacDermid, 1996).

Study as part of interrole conflict does not have its own theoretical foundation (Buda & Lenaghan, 2005). Instead research often utilises the same theories as for work-family interrole conflict, like resource drain and scarcity theories. As with work-family conflict, research into work, study, and family conflict has often been based on resource depletion theory (e.g. Adebayo, 2006; Buda & Lenaghan, 2005; Butler, 2007; Derous & Ryan, 2008; Kohler Giancola et al., 2009; Swanson et al., 2006), and on the effects of strain arising in one domain on another domain (e.g. Butler, 2007; Kohler Giancola et al., 2009).

Work interfering with study (WIS)

In terms of interrole conflict research involving study and work, study has been primarily treated as the receiving domain of conflict from work rather than as the originating domain of the conflict on work (e.g. Butler, 2007; Markel & Frone, 1998). This one-directional focus is similar to some early work-family conflict research where researchers often ignored FIW but predominantly looked at WIF (Frone, 2003). This narrow focus on work interfering with study (WIS) relates to the interest in the impact of the high employment rate among university students on their studies (Butler, 2007). While some of the research on WIS has been done on adolescents, the focus in the present study will be on tertiary students. An exception is that reference will be made to Markel & Frone's (1998) combined study of high school and college students. Due to the focus on tertiary students the word 'study' is referred to rather than the American term 'school' throughout this research. In the present research WIS is defined as interference in the participants' study role by their work related demands and responsibilities. This is based on Markel & Frone's (1998) definition of WIS.

Some WIS research has been done through basic question and answer surveys and qualitative research rather than specially designed conflict measures for quantitative research. Time and strain demands have been identified in some of this research (e.g. Gilmore & Manthei, 2005; Hawkins, Smith, Hawkins, & Grant, 2005; Roche & Baskerville, 2007). Roche & Baskerville (2007) found that a standard workload could prevent New Zealand social workers from studying daily, as did the social workers' experience of fatigue. A qualitative study of Auckland University students found, through interviews with 32 students, that one third felt that work compromised their studies during term time (Casey & Williamson, 2007). A study of 83 Canterbury University undergraduates found that 65% felt that they had less time for study than they would like because of paid work (Gilmore & Manthei, 2005). In a question and answer survey, Hawkins et al. (2005) found in their research that 80% of 300 students worked during enrolment and 54.8% found work interfered to some extent with their studies. In the qualitative comments from 138 students, 21% of those indicated that work interfered with study by increasing stress, fatigue, and exhaustion, while 63% commented that work decreased time for study (Hawkins et al., 2005).

Study interfering with work (SIW)

The present research will also examine whether study interferes with work (SIW). Work and study conflicts are bi-directional. Based on a previous definition of WIS (Markel & Frone, 1998), SIW could broadly be termed interference in the participants' work role by study related demands and responsibilities. Presently there is limited empirical research on SIW (e.g. Buda & Lenaghan, 2005; Egleston, 2008; Kohler Giancola et al., 2009). This lack of research also means that the relationship between SIW and demographics like age, gender, part-time or full-time student, hours of work, and stage of study also lack exploration. In terms of SIW, Kirby, Biever, Martinez, & Gómez (2004) found through using an open question that 21% of their sample felt that attending school takes time away from work in terms of how school has impacted on work life.

There have been mixed results on whether SIW is higher than WIS. Buda & Lenaghan (2005) and Kohler Giancola et al. (2009) found that SIW was more of a conflict for working students than WIS among mainly full-time undergraduate students and busy adults respectively. Egleston (2008) however, found that WIS was more of a conflict than SIW with his primarily graduate student sample.

Study interfering with family (SIF)

There is little research on study interfering with family (SIF) (e.g. Biggs & Brough, 2005; Egleston, 2008; Kohler Giancola et al., 2009). This type of research tends to focus on SIF as a small part of larger research objectives, which has meant that the relationship between SIF and demographics like age, gender, part-time or full-time work and type of study also lack exploration.

Kirby et al. (2004) found through using an open-ended question that 40% of their sample felt that attending school interfered with family time. A Hong Kong qualitative study which conducted face to face interviews with 53 part-time students found that sacrifices and negotiations were made with family time to make room for study (Yum, Kember, & Siaw, 2005). Results from a small study of 9 Hong Kong respondents indicated that those who worked full-time made room for part-time study by cutting down on family connected activities (Tak-Ying Shiu, 1999).

The current research investigates how study interferes with home (SIH), instead of SIF. The 'home' role is conceptualised as being broader than the 'family' role in order to include any living situation and home or home life commitments. Based on a previous definition of WIS by Markel & Frone (1998), SIH can be defined as interference in the home role by study related demands and responsibilities.

SIF, SIW, and WIS

Previous research has focussed on SIF, rather than SIH. It has been found that the family domain is often more affected by high levels of interrole conflict in comparison to the study and work domains. Of the three conflicts: WIS, SIW, and SIF, Kohler Giancola et al. (2009) and Egleston (2008) found that SIF had the highest level of conflict. The comparisons of mean levels of time and strain conflict from the present research will be reported in the Results section.

Time and strain-based conflict

Research into WIS, SIW, and SIF does not appear to focus specifically on time-based or strain-based conflict. Instead, WIS, SIW, and SIF measures have been based primarily on existing work-family conflict measures (e.g. Buda & Lenaghan, 2005; Egleston, 2008; Hammer, Grigsby, & Woods, 1998; Kirby et al., 2004; Kohler Giancola et al., 2009) or on Markel & Frone's (1998) WIS measure (e.g. Adebayo, 2006; Adebayo, Sunmola, & Udegbe, 2008; Butler, 2007; Derous & Ryan, 2008). In these measures, strain and time items are often combined as part of a larger conflict measure, although some researchers mention the importance of time conflict (e.g. Adebayo, 2006; Buda & Lenaghan, 2005; Egleston, 2008; Kohler Giancola et al., 2009). The present research will look at time-based conflict and strain-based conflict separately. Time-based conflict from study interfering with work (SIW: Time), work interfering with study (WIS: Time), and study interfering with work (SIW: Strain), work interfering with study (WIS: Strain), and study interfering with home (SIH: Strain) will also be examined.

Group differences in interrole conflicts

Gender

There have been mixed findings for gender differences in work-life balance research (Voydanoff, 2002). Gaffey & Rottinghaus (2009) found that men had more WIF time-

based conflict than women but the other conflict measures in their study did not show a difference. Voydanoff (2004) on the other hand asserted that women are more likely than men to experience higher WIF because of gender dissimilarity in work and family roles (Voydanoff, 2004). In their research into work, study, and family interrole conflicts, Biggs & Brough (2005) & Kohler Giancola et al. (2009) found no significant gender differences when looking at SIF, but Egleston (2008) found women experienced more SIF conflict than men. No support for gender differences was found with WIS (e.g. Adebayo, 2006; Adebayo et al., 2008; Buda & Lenaghan, 2005; Egleston, 2008; Kohler Giancola et al., 2009) or with SIW (e.g. Buda & Lenaghan, 2005; Egleston, 2008; Kohler Giancola et al., 2009).

Working more hours

There is often a positive relationship between work hours and WIF (Greenhaus & Beutell, 1985), and WIS (e.g. Butler, 2007; Derous & Ryan, 2008; Egleston, 2008; Markel & Frone, 1998). One exception was Buda & Lenaghan (2005) who found the more hours a student works the less WIS they experience. A relationship was also found between higher work hours and higher SIW (Egleston, 2008).

Dependent children

While there have been mixed results for the relationship of dependents and interrole conflict, Brough & Kelling (2002) found that FIW was higher for women with dependents than for women without dependents. Premeaux et al. (2007) found that higher numbers of children were associated with more WIF. In terms of WIS, Adebayo et al. (2008) found a positive relationship with WIS and number of children. Hawkins et al. (2005) however found that those with children did not have higher WIS than those without children. Egleston (2008) did find a positive relationship between SIF and number of children.

Stage of study

There has been a lack of research into stage of study and its relationship to interrole conflict. Manthei & Gilmore (2005) have suggested researching undergraduates and postgraduates from diverse faculties with a large sample. This is backed up by Tak-Ying Shiu (1999) who sees postgraduates as having potentially more dilemmas and life events than undergraduates. Egleston (2008) did find however, that freshmen and

sophomores had higher levels of conflict than the graduates who made up most of the sample.

Age

There have been mixed findings on the relationship between age and conflicts between work, family, and study domains. It has been suggested that older students may have more external demands and responsibilities than younger students which can cause time constraints (Lundberg, 2003). Egleston (2008) and Kohler Giancola et al. (2009) found that age was not related to interrole conflict experiences, while Derous & Ryan (2008) and Adebayo et al. (2008) found that age was positively related to WIS. Kirby et al. (2004) who examined SIF found that family stress was less for older than younger participants. Group differences will be explored in the results section for the present research.

Satisfaction with Work, Home and Study Domains

Work hours and satisfaction

In research into work, family, and study interrole conflict, several studies have examined the relationship between hours worked and study satisfaction. Buda & Lenaghan (2005) found more paid work was related to less student satisfaction in their research on undergraduate students, more of whom worked part-time than full-time. Swanson et al. (2006) found that satisfaction with university life, which included satisfaction with academic performance, had a negative relationship with hours worked in their research on full-time undergraduates working in term time employment. In the present study it is expected that there will be a negative relationship between study satisfaction and hours worked.

<u>Hypothesis 1</u>: Hours worked will be negatively related to study satisfaction.

Interrole conflicts and satisfaction

The relationship of interrole conflicts and outcomes such as satisfaction as an indicator of work-life balance is important to examine because conflicts between different roles can have damaging effects for well-being (Poelmans, O'Driscoll, & Beham, 2005). Often low conflict can be associated with high satisfaction while high conflict can be associated with low satisfaction. The present research focusses on the relationships of

interrole conflicts to satisfaction in the work, study, and home life domains. Home life satisfaction rather than family satisfaction is explored in the current research because of the wide variety of home situations students live in. Investigation is needed as to whether satisfaction is more reduced in the domain giving rise to role conflict or the domain affected by the conflict. It is also possible that there is a separate argument for all interrole conflicts to be associated with lowered home life satisfaction.

Cross-domain effects and matching-domain effects for work, study, and family satisfaction

Researchers have different opinions on how interrole conflicts relate to satisfaction. Cross-domain effects occur when dissatisfaction arises with the domain that receives the conflict. For example, FIW may primarily affect satisfaction with the work domain, while WIF would primarily affect satisfaction with the family domain. This argument is based on reasoning that the receiving domain of the conflict is a secondary role in which the effects of the primary role are manifesting themselves. As a result, dissatisfaction will be felt in outcomes related to the second role.

An alternative is matching-domain effects in which the domain in which the conflict originates is related to dissatisfaction with that domain. For example, FIW would have consequences in the family domain. The belief behind this is that an individual will resent the interference from the originating domain on another area of their life, the receiving domain. As a result, the individual will have negative feelings towards the domain causing the interference.

Mesmer-Magnus & Viswesvaran (2005) found a slightly stronger cross-domain effect in which FIW had a slightly higher relationship than WIF with work satisfaction. Ford et al. (2007) in their meta-analysis focussed on cross-domain outcomes but did not research matching-domain outcomes. They found a stronger negative relationship for WIF and family satisfaction than FIW and work satisfaction (Ford et al., 2007). Frone, Russell, & Cooper (1992) examined WIF as a predictor of family distress and FIW as a predictor of work distress but only the relationship between FIW and work distress was significant (Frone et al., 1992).

There is no intentional comparison of matching-domain and cross-domain effects in research into work, study, and family interrole conflict. Butler (2007) found no

significant relationship between WIS and study satisfaction in his research on full-time undergraduate students employed on average 21 hours per week. As a result, there was not a cross-domain effect.

While the evidence for cross-domain effects is weak, there is stronger meta-analytic evidence for matching-domain effects. Amstad, Meier, Fasel, Elfering, & Semmer (2011) and Shockley & Singla (2011) support the matching-domains effect. Both Amstad et al. (2011) and Shockley & Singla (2011) in their meta analyses found WIF was more powerfully associated with work satisfaction than family satisfaction, and FIW was more powerfully associated with family satisfaction than work satisfaction. Allen, Herst, Bruck & Sutton (2000) in their review found that WIF was more strongly related to work satisfaction than family satisfaction but did not look at FIW and satisfaction.

There is some evidence of matching-domain effects in research into work, study, and family interrole conflict, but in most cases cross-domain effects are not investigated. Kirby et al. (2004) labelled SIW under work stress, and found that student satisfaction with school experience was predictive of lower work stress so had a matching-domain effect. SIF was labelled under family stress but student satisfaction was not related to family stress so there was no matching-domain effect. Work and family satisfaction although researched were not commented on. Markel & Frone (1998) in their research through structural equation techniques found that work dissatisfaction, which was assessed overall through combining three different measures, was positively related to WIS conflict so there was a matching-effect. School dissatisfaction was only looked at indirectly through a path model (Markel & Frone, 1998), so was not examined for matching-effects or cross-domain effects.

Given that there is stronger evidence for matching-domain effects than cross-domain effects, both effects will be investigated in the present research, but it is expected that there will be stronger matching-domain effects than cross-domain effects with work, study, and home interrole conflict.

<u>Hypothesis 2a</u>: *SIH: Time* and *SIH: Strain* will be more strongly negatively related to study satisfaction than home life satisfaction.

<u>Hypothesis 2b</u>: *SIW: Time and SIW: Strain* will be more strongly negatively related to study satisfaction than work satisfaction.

<u>Hypothesis 2c</u>: *WIS: Time and WIS: Strain* will be more strongly negatively related to work satisfaction than study satisfaction.

Interrole conflict and family satisfaction

Both WIF and FIW have been associated with reduced family satisfaction (Amstad et al., 2011; Shockley & Singla, 2011). It has been found that work roles have less interference from family, and family roles have more interference from work (Frone, 2003). This suggests that with both WIF and FIW, family can have lower precedence than work. This low prioritisation of family could be an explanation for low family satisfaction experienced by both interrole conflicts.

Research into work, study, and family interrole conflict has shown that family is an area that often makes way for other commitments so has high permeability when role conflicts occur (e.g. Egleston, 2008; Kohler Giancola et al., 2009; Tak-Ying Shiu, 1999; Yum et al., 2005). To date there does not appear to be any empirical analysis relating WIS, SIW, and SIF to family satisfaction.

SIW and WIS have been found to experience lower conflict than SIF (e.g. Egleston, 2008; Kohler Giancola et al., 2009) suggesting that study and work are being prioritised over family. In line with work-family conflict literature, when family is given a lower priority which has been seen with both WIF and FIW (Frone, 2003), there can be a relationship to lower family satisfaction (Amstad et al., 2011; Shockley & Singla, 2011). Therefore it is expected that SIH will relate to reduced home life satisfaction in the present research. SIW and WIS are also envisioned to be associated with lower home life satisfaction. Regardless of what conflicts occur between the work and study domains, work and study are given preference over the family domain (e.g. Egleston, 2008; Kohler Giancola et al., 2009) so home life satisfaction is expected to be lessened.

<u>Hypothesis 3a</u>: *SIH: Time* and *SIH: Strain* will be negatively related to home life satisfaction.

<u>Hypothesis 3b</u>: *SIW: Time* and *SIW: Strain* will be negatively related to home life satisfaction.

Hypothesis 3c: WIS: Time and WIS: Strain will be negatively related to home life satisfaction.

The next chapter will investigate the relationship of coping, interrole conflicts, and satisfaction.

Chapter 2: Coping

Coping is the "constantly changing cognitive and behavioural efforts to manage specific external and/or internal demands" (Lazarus & Folkman, 1984, p. 140). Some individuals who experience stressful situations experience high levels of wellbeing whereas other individuals experience lower levels of wellbeing (Quimby & O'Brien, 2006). It is possible that some people do better in their lives or thrive because of the way they cope (Folkman & Moskowitz, 2004). The research model for this study is based on Lazarus & Folkman's (1984) widely known transactional model of demands, coping, and outcomes.

The model is an orderly theoretical framework that explains how positive or negative outcomes can arise from demanding situations. In the present research, the demands of interest are study interfering with home (SIH: Time, SIH: Strain), work interfering with study (WIS: Time, WIS: Strain), and study interfering with work (SIW: Time, SIW: Strain), and the outcomes are study satisfaction, work satisfaction, and home life satisfaction. Coping strategies can mediate or moderate the relationship between stressors and outcomes. These relationships are shown in Figure 2.

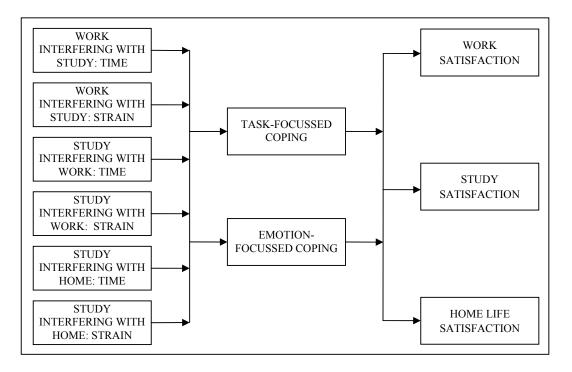


Figure 2: The Influence of Coping on the Conflict-Outcome Relationship of Working Students: A Model of Interrole Demands, Coping Strategies, and Domain Satisfaction for Working Students

There is debate as to whether coping strategies are situation specific or whether an ongoing preference for using particular forms of coping is dispositional (Carver, Scheier, & Weintraub, 1989). Individuals often give priority to a particular coping style and the same coping strategies have been found to be used over time by individuals (Rotondo & Kincaid, 2008; Santiago-Rivera, Bernstein, & Gard, 1995). In the present research, coping is viewed as dispositional, given that the focus is on ongoing long-term situations that include study, home, and work demands. Given the evidence for cross situational stability in choice of coping strategies a dispositional focus appears to be appropriate.

Types of Coping

There are many ways of categorising coping. One widely used distinction is between types of task-focussed coping (TFC) which manage demands, and types of emotion-focussed coping (EFC) which regulate the feelings the demands generate (Carver et al., 1989; Lazarus & Folkman, 1984). Social support as a coping strategy will also be discussed as it can fall under TFC or EFC.

Task-focussed coping

TFC involves finding a practical way to manage a demand. It involves directly facing up to the demand, and it can involve altering a situation (Cox & Ferguson, 1991). Examples of TFC might involve formulating a plan or taking direct action (Rantanen, Mauno, Kinnunen, & Rantanen, 2011) thereby lessening a demand's negative impact (Aryee, Luk, Leung, & Lo, 1999). Planning involves thinking about the problem, analysing what the problem is, and strategising about the best way of dealing with it (Carver et al., 1989). Examples of taking a direct action might include actively trying to improve the situation, putting effort into trying to stop the effects of the situation, or working around it (Carver et al., 1989).

Often research has found TFC to have an association with positive wellbeing and health outcomes as it functions in a protective way (Rantanen et al., 2011). Chao (2011) found students who used TFC reported more psychological well-being. Penley, Tomaka & Wiebe (2002) found through their meta-analyses that TFC had positive correlations with health outcomes on the whole which included psychological outcomes.

TFC has been found to relate to increased levels of life satisfaction (e.g. Aryee et al., 1999), job satisfaction (e.g. Aryee et al., 1999; Rantanen et al., 2011), and family satisfaction (e.g. Aryee et al., 1999; Perrone, Aegisdottir, Webb, & Blalock, 2006; Rantanen et al., 2011) in work-family interrole conflict research. Life satisfaction has been found to relate to TFC in research on work, study, and family interrole conflict (e.g. Kohler Giancola et al., 2009). To date, research has not been discovered on the relationship of TFC to study satisfaction. Due to the strong evidence for TFC and satisfaction it is hypothesised that TFC will be positively related to satisfaction.

<u>Hypothesis 4</u>: TFC will be positively related to a) work satisfaction b) study satisfaction c) home life satisfaction.

Emotion-focussed coping

EFC strategies are used to lessen the emotional distress felt from a demand (Aryee et al., 1999; Folkman & Moskowitz, 2004). Strategies include getting emotional support, denial, avoiding the truth of the situation, and venting ones feelings (Carver et al., 1989). Disengagement is an EFC strategy which involves distracting oneself from the demand (Carver et al., 1989). Avoidance and denial are strategies which are not aimed at solving or facing the problem but at avoiding or denying it. Other EFC strategies include the use of humour, self blame, alcohol, and reframing which involves looking at a situation more positively.

EFC is complex as the negative or positive effect of EFC on outcomes can be varied depending on the type of EFC employed, and on its use as a short or long-term coping strategy. The negative side of EFC is that it is often related to poor wellbeing outcomes (Rantanen et al., 2011), and is frequently associated with elevated levels of distress in research (Folkman & Moskowitz, 2004). For example, there is much research on poor mental health outcomes associated with escapist coping strategies (Folkman & Moskowitz, 2004). Some EFC strategies like avoidance and denial have been found to make worse the effects of stressors on outcomes (Koeske, Kirk, & Koeske, 1993). Other forms of EFC which can have negative outcomes include using alcohol which is a type of avoidance coping (Stanton & Revenson, 2007), and practising self-blame (e.g. Donovan-Kicken & Caughlin, 2011).

Some EFC strategies can relate to positive outcomes. Carver (2007) found in breast cancer research that there was less distress when EFC strategies such as acceptance, positive reframing, and humour were employed. Social support has been related to life satisfaction (Stanton & Revenson, 2007). A large amount of research has shown that high quality interpersonal relationships predict coming to terms with chronic illness (Stanton & Revenson, 2007). Emotional social support from interpersonal interactions can encourage psychological wellbeing and keep people from worsening health, especially when they are facing stressful situations (Cohen, Gottlieb, & Underwood, 2000).

There have been mixed findings on the relationship of EFC and domain satisfaction in work-family interrole conflict research, and research into work, family, and study interrole conflict. Some studies have found the use of EFC strategies to be related to increased satisfaction. An increase in a social support type of avoidance, which was conceptualised as seeking out alternative tasks and people, was related to an increase in family satisfaction (e.g. Rantanen et al., 2011), and higher positive thinking was related to an increase in life satisfaction (e.g. Kohler Giancola et al., 2009).

Other studies have found the use of EFC strategies to be related to decreased satisfaction. Increased venting, denial, and behavioural disengagement were associated with decreased life satisfaction (e.g. Kohler Giancola et al., 2009) and increased use of EFC which included self-blame was associated with lower job and family satisfaction (e.g. Rantanen et al., 2011).

Some research has found that EFC was not related to satisfaction. Positive thinking based EFC was unrelated to job, life and family satisfaction (e.g. Aryee et al., 1999) and an increase in a social support type of avoidance was not related to job satisfaction (e.g. Rantanen et al., 2011).

Despite the inconsistent evidence, EFC strategies like social support (e.g. Rantanen et al., 2011) and positive thinking (e.g. Kohler Giancola et al., 2009) have been found to relate to increased satisfaction. It is expected that higher EFC will be related to increased work, study, and home life satisfaction.

<u>Hypothesis 5</u>: EFC will be positively related to the outcomes of a) work satisfaction b) study satisfaction c) home life satisfaction.

Social support

While different forms of social support may be categorised as TFC or EFC, social support has been treated in a variety of ways. One point of view is that social support should be characterised in a very broad fashion (Cohen et al., 2000; Lakey & Cohen, 2000; Poelmans et al., 2005). Lakey & Cohen (2000) attest that social support includes a wide range of interpersonal processes and constructs that involve relationships between people. Another viewpoint is that social support falls under a wide range of categories. Wills & Shinar (2000) list five categories of social support: companionship support, validation, emotional support, instrumental support and informational support. On the other hand, Carver et al. (1989) divide social support into two categories. Instrumental social support which includes seeking advice is categorised under TFC, whereas emotional social support to gain understanding (Carver et al., 1989). As the present research is focussed on TFC and EFC, relevant research which involves social support is discussed when social support comes under TFC or EFC.

Coping Effectiveness

TFC is likely to be most effective when there is some ability to control and directly address demands (Lazarus & Folkman, 1984; Parkes, 1994). Effective TFC use is related to feeling in control and experiencing mastery (Folkman & Moskowitz, 2004). It is possible that people using higher TFC see their conflicts as more controllable and subject to change (Lazarus & Folkman, 1984). To the extent that work-life balance demands are controllable, TFC is likely to be more effective than EFC.

In some situations there may be few options for the management of demands and problem solving (Lazarus & Folkman, 1984). In situations such as these, EFC can be temporarily useful, particularly if the situation seems out of one's control (Folkman & Moskowitz, 2004). Often when a situation cannot be solved, the use of short–term strategies like venting (Carver et al., 1989), avoidance (Aryee et al., 1999; Roth & Cohen, 1986; Stanton & Revenson, 2007), distraction (Folkman & Moskowitz, 2004) distancing (Aryee et al., 1999), and denial (Lazarus & Folkman, 1984) are types of EFC that can alleviate feelings of distress for short periods of time. Therefore, while the demand is not being reduced, changed, or managed, one's personal comfort level can be elevated through lessening negative feelings (DeGraff & Schaffer, 2008). The problem

with this is that the comfort lasts only a short time as EFC does not deal with the causes of problems and leaves them to continue or get worse. These strategies are not useful as long term coping mechanisms as they can become maladaptive.

For these reasons neither EFC nor TFC are necessarily good or bad (Lazarus & Folkman, 1984; Rotondo & Kincaid, 2008). In order to get a feeling of control one might firstly use EFC then follow up with TFC (Roth & Cohen, 1986). A combination of strategies can be effective (Koeske et al., 1993). In a study by Folkman & Lazarus (1985) more TFC was used before an examination and more EFC was used while awaiting examination results. Overall a combination of coping strategies was used by 96% of the students (Folkman & Lazarus, 1985). In other research, middle aged men and women reported using both TFC and EFC in over 98% of stressful situations (Folkman & Lazarus, 1980). Lazarus and Folkman (1984) also asserted that using both TFC and EFC could be effective with work-family conflict. Rotondo & Kincaid (2008) commented that current research often showed that individuals used a combination of coping types to cope with demands.

Coping with Conflict among Life Domains

While there has been research on coping and work-family conflict, surprise has been expressed that there is not more research (Eby, Casper, Lockwood, Bordeaux, & Brinley, 2005; Rantanen et al., 2011; Thompson, Poelmans, Allen, & Andreassi, 2007). It is important to recognise however that the use of personal coping strategies can affect the consequences of conflict between domains (Kirchmeyer, 1992; Somech & Drach-Zahavy, 2007). There are a variety of ways to manage conflicts between domains which include mastering, tolerating, reducing or minimising them (Lazarus & Launier, 1978).

TFC and interrole conflict

Some studies have found the use of TFC, particularly direct action (e.g. Aryee et al., 1999; Rotondo & Kincaid, 2008) and family social support strategies (e.g. Rotondo, Carlson, & Kincaid, 2003) are related to reduced WIF and FIW. Other research has found direct action TFC (e.g. Rantanen et al., 2011; Rotondo et al., 2003), general TFC (e.g. Lapierre & Allen, 2006), and work social support TFC strategies (e.g. Rotondo et al., 2003) are related to reduced WIF and FIW in some cases, and in other cases have no relationship to WIF and FIW.

One study found direct action TFC had no relationship to FIW and WIF (Haar, 2006). Other studies have found general TFC (e.g. Matsui, Ohsawa, & Onglatco, 1995) and advice seeking social support TFC strategies (e.g. Rotondo et al., 2003) had a combination of positive relationships and no effects with FIW and WIF.

In terms of study-related interrole conflicts and TFC, only one study was found. Higher SIW was associated with reduced planning, but WIS and SIF had no relationship with planning (Kohler Giancola et al., 2009). All three interrole conflicts had no relationship with active coping, or instrumental social support which was treated as a form of TFC (Kohler Giancola et al., 2009).

There are various reasons why TFC and interrole conflict can be negatively related. It is possible that domain conflicts are effectively managed or reduced using TFC, so high rates of effective coping would be related to low levels of conflict (Thompson et al., 2007). Alternatively those with low interrole conflict may have more time and energy to invest in TFC (Thompson et al., 2007).

Research to date shows there is support for TFC to be associated with reduced WIF and FIW. There are also plausible arguments as to why TFC can be negatively related to interrole conflict (Thompson et al., 2007). It is therefore expected that TFC use will relate to reduced interrole conflict between study, work, and home.

<u>Hypothesis 6</u>: TFC will be negatively related to a) WIS: Time b) WIS: Strain c) SIW: Time d) SIW: Strain e) SIH: Time f) SIH: Strain.

EFC and interrole conflict

Evidence was found for EFC to be related to increased WIF and FIW. Some studies have found the use of EFC, particularly a negative self-focus type including self-blame (e.g. Rantanen et al., 2011), and avoidance with resignation coping (e.g. Haar, 2006) to be related to increased FIW and WIF. Another study found an EFC strategy of avoidance with resignation coping to have a positive relationship with strain-based WIF, but to be unrelated to time-based WIF and strain and time based FIW (e.g. Rotondo et al., 2003)

There is also evidence for EFC to be related to reduced FIW and WIF. Positive thinking had negative relationships (e.g. Rotondo & Kincaid, 2008) or had a mix of negative and unassociated relationships with WIF and FIW (e.g. Rotondo et al., 2003).

Some EFC strategies had no effects at all on WIF and FIW. Avoidance, conceptualised as social diversion (e.g. Rantanen et al., 2011), and a positive thinking based EFC strategy (e.g. Aryee et al., 1999; Haar, 2006) were unrelated to WIF and FIW.

There was mixed evidence for study related interrole conflict and its relationship to EFC in the one study found to date. Substance abuse was positively related to SIW, but unrelated to WIS and SIF (Kohler Giancola et al., 2009). Positive thinking was negatively related to SIW, but unrelated to WIS and SIF. The EFC strategies of venting, denial, and behavioural disengagement were all unrelated to SIW, WIS, and SIF (Kohler Giancola et al., 2009).

Despite the inconsistent evidence, it seems that people are likely to use a range of EFC strategies when managing domain conflicts. A higher use of positive thinking was unrelated to higher domain conflict (e.g. Aryee et al., 1999; Haar, 2006; Kohler Giancola et al., 2009; Rotondo et al., 2003; Rotondo & Kincaid, 2008) but there was evidence that EFC which included self-blame (e.g. Rantanen et al., 2011), avoidance coping which includes resignation (e.g. Haar, 2006; Rotondo et al., 2003), and substance abuse was related to higher interrole conflict (e.g. Kohler Giancola et al., 2009). Therefore it is expected that EFC will be related to increased interrole conflict.

<u>Hypothesis 7</u>: EFC will be positively related to a) *WIS: Time* b) *WIS: Strain* c) *SIW: Time* d) *SIW: Strain* e) *SIH: Time* f) *SIH: Strain*.

Mediation and moderation effects of coping

The current research investigates whether the style of coping an individual uses can influence the relationship of interrole conflicts to outcomes. In today's society there is an increasing need to manage interrole conflicts. If coping can influence the relationship between interrole conflicts and satisfaction outcomes then this is useful information for organisations, academic institutions, and individuals.

Mediation will be examined to see if coping accounts for the relation between interrole conflict (the predictor) and satisfaction (the criterion). A moderator can buffer or enhance the effect of the independent on the dependent variables. Moderation will be investigated to see if coping influences the interrole conflict-satisfaction relationship.

Coping as a mediator

There is considerable evidence for coping as a mediator between stressful circumstances and psychological health (e.g. Alarcon, Edwards, & Menke, 2011; Chen & Cunradi, 2008; Snow, Swan, Raghavan, Connell, & Klein, 2003), but to date there has been less research into the role of coping as a mediator between interrole conflicts and satisfaction (Eby et al., 2005; Thompson et al., 2007). In the only mediation research that includes the study domain, Kohler Giancola et al. (2009) found both appraisal and coping partially mediated the relationship between family interfering with study (FIS) and SIW, and life satisfaction. Perrone et al. (2006) found that TFC partially mediated the relationship between work and family conflict, and family satisfaction but not work satisfaction. In Guelzow, Bird, & Koball's (1991) research, the relationship of role strain (measured by role conflict and role overload) and distress was not mediated by EFC represented by cognitive restructuring, by TFC as in cutting back on role activities, or by marital relationship equity which was a form of EFC. Burley (1995) found that the negative relationship between WIF and marital adjustment was partially mediated by EFC in the form of perceived emotional spousal social support and by TFC in the form of equity in the distribution of household work between spouses.

Due to the inconsistent findings, the current research will explore coping as a possible mediator between work, study, and home interrole conflicts and satisfaction.

The first set of hypotheses examines TFC as a mediator between interrole conflict and outcomes.

<u>Hypothesis 8</u>: TFC will mediate the relationship between *WIS: Time* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 9</u>: TFC will mediate the relationship between *WIS: Strain* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 10</u>: TFC will mediate the relationship between *SIW: Time* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 11</u>: TFC will mediate the relationship between *SIW: Strain* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 12</u>: TFC will mediate the relationship between *SIH*: *Time* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 13</u>: TFC will mediate the relationship between *SIH: Strain* and a) work satisfaction b) study satisfaction c) home life satisfaction.

The second set of hypotheses examines EFC as a mediator between interrole conflict and outcomes.

<u>Hypothesis 14</u>: EFC will mediate the relationship between *WIS: Time* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 15</u>: EFC will mediate the relationship between *WIS: Strain* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 16</u>: EFC will mediate the relationship between *SIW: Time* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 17</u>: EFC will mediate the relationship between *SIW: Strain* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 18</u>: EFC will mediate the relationship between *SIH*: *Time* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 19</u>: EFC will mediate the relationship between *SIH: Strain* and a) work satisfaction b) study satisfaction c) home life satisfaction.

Coping as a moderator

Non-supporting evidence was found for the moderating effects of TFC with WIF or FIW on the outcomes of family satisfaction (e.g. Aryee et al., 1999; Rantanen et al., 2011) and job satisfaction (e.g. Aryee et al., 1999; Rantanen et al., 2011).

There was supporting evidence however for a variety of EFC strategies acting as moderators in the relationship of FIW, and family and job satisfaction. In a study of Hong Kong Chinese working parents, a low use of positive thinking based EFC was found to positively moderate FIW on job satisfaction. Therefore low EFC was beneficial in these circumstances (Aryee et al., 1999). In a study of Finnish workers, higher use of an EFC social support type of avoidance was helpful as it buffered in high FIW circumstances, so higher family satisfaction was experienced (Rantanen et al.,

2011). In the same research another type of EFC which included self-blame was found to act as a moderator between FIW and family satisfaction. In this case, high EFC use in high FIW circumstances related to less family satisfaction, so high EFC was an unhelpful strategy (Rantanen et al., 2011). High EFC use was favourable however in low FIW circumstances as higher family satisfaction was experienced (Rantanen et al., 2011). EFC which included self-blame was also a moderator between FIW and job satisfaction. Low EFC use in low FIW circumstances increased job satisfaction so was beneficial, whereas higher EFC was unhelpful as there was decreased job satisfaction (Rantanen et al., 2011).

There has also been non-supporting evidence for EFC as a moderator. No moderating effects were found for EFC which included self-blame, and WIF on the outcomes of job and family satisfaction (Rantanen et al., 2011). There were no moderating effects for an EFC social support type of avoidance and FIW on the outcomes of job satisfaction, or for WIF on the outcomes of job and family satisfaction (Rantanen et al., 2011). There were also no moderating effects for positive thinking based EFC and WIF and job and family satisfaction, and for FIW and family satisfaction (Aryee et al., 1999).

The only research found to date that included the study domain was Adebayo et al. (2008) on the buffering effects of proactive coping on the relationship between WIS and subjective wellbeing. As WIS increased, students with moderate to high levels of proactive coping had greater subjective wellbeing than students with low proactive coping (Adebayo et al., 2008).

While some moderating effects were found for EFC with FIW and satisfaction, there is no evidence to date for the moderating effects of TFC and EFC on the relationship of interrole conflict between work, study, and home, and satisfaction with work, study, and home life. It is therefore important to see if TFC and EFC make a difference to these interrole conflict and satisfaction relationships.

The first set of hypotheses examines TFC as a moderator between interrole conflict and outcomes.

<u>Hypothesis 20</u>: TFC will moderate the relationship between *WIS: Time* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 21</u>: TFC will moderate the relationship between *WIS: Strain* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 22</u>: TFC will moderate the relationship between *SIW: Time* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 23</u>: TFC will moderate the relationship between *SIW: Strain* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 24</u>: TFC will moderate the relationship between *SIH: Time* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 25</u>: TFC will moderate the relationship between *SIH*: *Strain* and a) work satisfaction b) study satisfaction c) home life satisfaction.

The second set of hypotheses examines EFC as a moderator between interrole conflict and outcomes.

<u>Hypothesis 26</u>: EFC will moderate the relationship between *WIS: Time* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 27</u>: EFC will moderate the relationship between *WIS: Strain* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 28</u>: EFC will moderate the relationship between *SIW: Time* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 29</u>: EFC will moderate the relationship between *SIW*: *Strain* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 30</u>: EFC will moderate the relationship between *SIH*: *Time* and a) work satisfaction b) study satisfaction c) home life satisfaction.

<u>Hypothesis 31</u>: EFC will moderate the relationship between *SIH: Strain* and a) work satisfaction b) study satisfaction c) home life satisfaction.

Chapter 3: Method

Procedure

The research was reviewed and approved by the Massey University Human Ethics Committee: Northern, Application 10/057 (Appendix A). The questionnaire was distributed and collected online through Survey Monkey www.surveymonkey.com during the semester and took ten minutes to complete. Participants were eligible to participate in the survey if they were currently doing any combination of paid work and tertiary study in New Zealand. The survey was cross-sectional and consisted of 3 sections of psychological questions and a fourth section on demographics (Appendix B). A draw to win a one-off \$100 book voucher was offered to encourage participation. After pilot testing the questionnaire was distributed.

An email and in one case a phone call inviting participation and providing an email link back to the survey was sent to 4 universities and 1 Institute of Technology in New Zealand. Suitable contact persons were identified who were either Heads of Departments or Lecturers. Through the researcher's own network, contact persons were asked to forward the email and link to their own contact lists. No response rate could be calculated as it is not possible to know how many people the emails reached.

Once the study was completed, all Heads of Departments and Lecturers who confirmed they had sent out the survey were sent a summary of findings to circulate to students and display on the departmental notice board. Additionally, online participants were able to email the researcher through an email link at the end of the survey to request a summary of findings.

Participants

Four hundred and eight working tertiary students responded to the survey. Data were used from 327 of the participants who had no missing data. For these 327 participants demographic information is listed (Table 1).

Table 1: Demographic Information (N=327)

	No. of respondents	%		No. of respondents	%
Gender			Student Type	-	
Male	73	22.3	Undergraduate	157	48.0
Female	254	77.7	Graduate	24	7.3
Age			Postgraduate	132	40.4
20 or under	63	19.3	Other	14	4.3
21-24	82	25.1	<u>Student</u> <u>Status</u>		
25-30	72	22.0	Part time	136	41.6
31-40	49	15.0	Full time	191	58.4
Over 40	61	18.7	<u>Hours</u> <u>Worked</u>		
Ethnicity			Less than 10	65	19.9
NZ European/ Pakeha	246	75.2	10-20	108	33.0
Maori	11	3.4	21-34	69	21.1
Asian	25	7.6	35 or more	85	26.0
Other	45	13.8	Children Living at Home		
			0 children	233	71.3
			1 child	40	12.2
			2 or more children	54	16.5

It was not possible to work out how representative the sample was of the working population as a whole. The finding that nearly $\frac{3}{4}$ of the respondents did not have children further supports that using 'home' life rather than 'family' life gives a broader view of commitments other than work or study. The small number of Maori, Asian, and 'Other' respondents means that ethnicity was not used as a predictor.

Measures

Time conflict

Three forms of time-based interrole conflicts were studied. These were *WIS: Time, SIW: Time,* and *SIH: Time*. Items from Markel & Frone's (1998) WIS measure were reworded for this study to make them more suitable for tertiary students. One item was removed from each scale to improve reliability, leaving 2 items for each of these 3 scales. For the *WIS: Time* scale, the items used were "I spend less time studying than I would like because of my job." and "My job takes up time that I'd rather spend on study." The alpha for the *WIS: Time* scale was .78. For the *SIW: Time* scale, the items used were "My study takes up time that I'd rather spend working." and "I spend less time working than I would like because of my study." The alpha for the *SIW: Time* scale was .80. For the *SIH: Time* scale the items used were "I spend less time on my home life than I would like because of my study" and "My study takes up time that I'd rather spend on things at home." The alpha for the *SIH: Time* scale was .81. For each scale there were 5 options ranging from Strongly Disagree to Strongly Agree to rate the questions.

Strain conflict

Three forms of strain-based domain conflict were studied. These were *WIS: Strain*, *SIW: Strain*, and *SIH: Strain*. Items were reworded from Rotondo & Kincaid's (2008) WIF and FIW measures to include the study domain. For example, for *WIS: Strain*, the item "Stress at work makes you irritable at home" was adapted to "I am irritable when I study because of work demands." For *SIW: Strain* "Your job reduces the effort you can give to activities at home" was adapted to "Study reduces the effort I can give to my job." For *SIH: Strain* "Job worries or problems distract you when you are at home" was adapted to "Study worries or problems distract me when I am at home." All 3 strain-based conflict measures had 4 items. *WIS: Strain* had an alpha of .82, *SIW: Strain* had an alpha of .82, and *SIH: Strain* had an alpha of .86. For each scale there were 5 options ranging from Never to Always for every question.

Coping

Coping was measured with the 28 item Brief Cope (Carver, 1997). Respondents were asked to indicate how they generally cope with conflicts between study, paid work, and

home demands during the semester. Principal Component Analysis with Varimax rotation identified two factors. The two factors explained 28.12% of the variance. One factor was a 5-item TFC factor which had an alpha of .76. An example of a TFC item is "I try to come up with a strategy about what to do." The other factor was an EFC factor with 6 items which had an alpha of .79. An example of an EFC item was "I express my negative feelings." There were 5 options from Never to Always for each question.

Work satisfaction

Job satisfaction was measured with Clark's (2001) 7-item measure, e.g. "My activities at work are rewarding in and of themselves." The alpha was .94 and each question had 5 options from Strongly Disagree to Strongly Agree.

Study satisfaction

The 5-item short form of Brayfield & Rothe's (1951) job satisfaction scale was used with the word "study" substituted for "work", e.g. "Most days I am enthusiastic about my work" was adapted to "Most days I am enthusiastic about my study". Two negative items were reversed. These were "Each day I study seems like it will never end" and "I consider my study rather unpleasant." The alpha was .80. Each question had options from Strongly Disagree to Strongly Agree.

Home life satisfaction

Home life satisfaction was measured with Diener, Emmons, Larsen, & Griffin's (1985) Satisfaction With Life Scale. Four items were reworded and the word "home life" was used instead of "life", e.g. "The conditions of my life are excellent" was changed to "The conditions of my home life are excellent." One item was not used: "If I could live my life over, I would change almost nothing." The alpha was .91. There were 5 response options from Strongly Disagree to Strongly Agree.

Demographics

Demographic questions were asked about gender, age, the ethnic group that the participant most strongly identified with, how many children lived in their home, whether they were undergraduate or postgraduate, part-time or full-time students, and their current paid work situation.

Data Analysis

All surveys were entered into the Statistical Package for the Social Sciences (SPSS), version 19, which was used to analyse the data. Baron & Kenny's (1986) procedure was used to investigate mediation (Figure 3).

For mediation to be examined, the first step was to check that the independent variable (IV) and dependent variable (DV) were related. The second step was to check that the IV was related to the mediator. With the third step, the mediator must affect the dependent variable. At step 3 the effect of the IV on the DV must be reduced for partial mediation to occur or have no effect for full mediation to occur (Baron & Kenny, 1986).

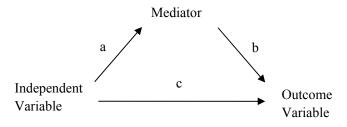


Figure 3: Mediator Model (Baron & Kenny, 1986, p1176)

Baron & Kenny's (1986) moderation procedure was used to investigate whether coping acted as a moderator between conflict and outcomes. The predictor and moderator variables were centred by subtracting the means in order to reduce multicollinearity. The predictor and moderator were entered followed by the interaction term. A significant interaction effect indicates that moderation has occurred (Baron & Kenny, 1986).

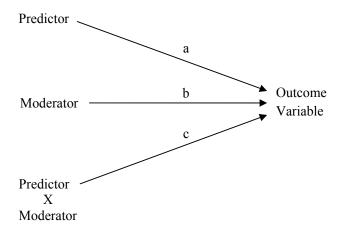


Figure 4: Moderator Model (Baron & Kenny, 1986, p1174)

Chapter 4: Results

Group Differences

There were no significant gender differences for ethnicity, age, number of children living at home, part-time and full-time student category, and hours worked. However there were more male undergraduate than graduate/postgraduate respondents (65.8% vs 34.2%) while women respondents were slightly more likely to be graduate/postgraduate than undergraduate students (54.6% vs 45.4%) ($\chi^2_{1df} = 9.26$, p < .01).

Compared to men, women had more *SIW*: *Strain* ($t_{325df} = -1.98$, p < .05, CI -.40, -.00), *SIH*: *Time* ($t_{325df} = -3.81$, p < .001, CI -.70, -.22) and *SIH*: *Strain* ($t_{325df} = -3.53$, p < .001, CI -.54, -.15).

Women were more likely to have higher work satisfaction ($t_{325df} = -2.02$, p < .05, CI - .49, -.01), and to use more EFC ($t_{325df} = -5.51$, p < .001, CI -.64, -.31) than men.

Postgraduates had more *WIS: Time* ($t_{287df} = -2.80$, p < .01, CI -.57, -.10) and more *WIS: Strain* ($t_{287df} = -5.24$, p < .001, CI -.67, -.31) than undergraduates. Postgraduates also had more *SIW: Strain* ($t_{287df} = -2.72$, p < .01, CI -.42, -.07), more *SIH: Time* ($t_{287df} = -4.51$, p < .001, CI -.68,-.27), and more *SIH: Strain* ($t_{287df} = -2.90$, p < .01, CI -.43, -.08). There were no differences for undergraduates and postgraduates for *SIW: Time*. The categories 'other' and 'graduate' were not compared because of small samples.

Compared to undergraduates, postgraduates were more likely to have higher work satisfaction ($t_{287df} = -3.24$, p < .01, CI -.57, -.14) and use more EFC ($t_{287df} = -2.97$, p < .01, CI -40, -.08). The categories 'other' and 'graduate' were not compared because of small samples.

Part-time students had more WIS: Strain ($t_{325df} = 4.57$, p < .001, CI .23, .58) and more SIH: Time ($t_{325df} = 2.23$, p < .05, CI .23, .10), but less SIW: Time ($t_{325df} = -2.31$, p < .05, CI -.47, -.04) than full-time students. Being a part-time or full-time student was not related to experiencing more or less WIS: Time, SIW: Strain, and SIH: Strain.

Part-time students were more likely to have higher work satisfaction ($t_{325df} = 2.30 \text{ p} < .05$, CI .04, .45) and higher home life satisfaction ($t_{325df} = 2.01$, p < .05, CI .00, .42) than full-time students.

Respondents who had children living with them at home did not experience more or less domain conflicts than those who did not.

Correlations and Means

Older respondents had more WIS: Time, WIS: Strain and SIH: Time, but less SIW: Time. Age was not related to experiencing more or less SIW: Strain and SIH: Strain (Table 2).

Students who worked more hours had higher WIS: Time, WIS: Strain, SIW: Strain, and SIH: Time but less SIW: Time. The amount of hours worked was not related to experiencing more or less SIH: Strain (Table 2).

Higher work hours were related to reduced home life satisfaction. Higher work hours were also related to higher work satisfaction (Table 2).

The mean levels of conflict are presented in Figure 5. With regards to interrole conflict, respondents reported that the highest level of interrole conflict experienced was for *SIH*: *Time*. The lowest levels of conflict were reported for *SIW*: *Time* and *SIW*: *Strain*.

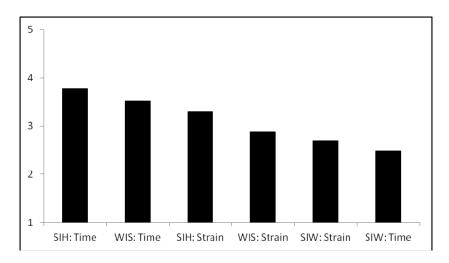


Figure 5: Mean Levels of Conflict between Roles

Table 2: Correlation Matrix Showing the Relationships between the Research Variables

Variables	1	2	3	4	5	6	7	8	9	10	11	12	13
1. Work Interfering with Study: Time	1												
2. Work Interfering with Study: Strain	.62**	1											
3. Study Interfering with Work: Time	09	.03	1										
4. Study Interfering with Work: Strain	.39**	.53**	.17**	1									
5. Study Interfering with Home: Time	.26**	.35**	.21**	.35**	1								
6. Study Interfering with Home: Strain	.29**	.43**	.25**	.56**	.66**	1							
7. Work Satisfaction	11*	02	.06	17**	.03	07	1						
8. Study Satisfaction	03	18**	29**	28**	25**	35**	.07	1					
9. Home Life Satisfaction	18**	20**	06	26**	18**	29**	.15**	.26**	1				
10. Task-Focussed Coping	.07	.01	12*	17**	04	13*	.26**	.29**	.25**	1			
11. Emotion-Focussed Coping	00	.03	.07	.14*	.13*	.13*	.07	.01	.29**	.21**	1		
12. Age	.18**	.31**	13*	.01	.18**	03	.21**	.22**	.01	.12*	.04	1	
13. Paid Work Hours	.27**	.45**	22**	.14*	.14*	.05	.13*	04	14*	.12*	01	.52**	1
Mean	3.52	2.89	2.49	2.69	3.78	3.30	3.54	3.47	3.22	3.67	3.04	2.89	2.53
S.D	1.01	.82	.99	.76	.93	.75	.94	.72	.94	.56	.68	1.38	1.08

^{**} Correlation is significant at the 0.01 level (2-tailed).

^{*} Correlation is significant at the 0.05 level (2-tailed).

Hypothesis Testing

Hypothesis 1 was not supported as hours worked were not related to study satisfaction (Table 2).

Hypothesis 2 tested whether satisfaction was more strongly reduced in the domain giving rise to role conflict rather than the domain receiving role conflict. Hypothesis 2a was supported as SIH: Time and SIH: Strain were more strongly related to study satisfaction (r = -.25, p < .01 and r = -.35, p < .01 respectively) than they were to home life satisfaction (r = -.18, p < .01, r = -.29, p < .01 respectively). Similarly, hypothesis 2b was supported as SIW: Time and SIW: Strain were more strongly related to study satisfaction (r = -.29, p < .01, and r = -.28, p < .01 respectively) than to work satisfaction (r = .06, r = .

Hypothesis 3 tested whether all forms of interrole conflict were related to reduced home life satisfaction. This hypothesis was supported for *SIH*: *Time* and *SIH*: *Strain* (hypothesis 3a), for *SIW*: *Strain*, but not for *SIW*: *Time*, only partially supporting hypothesis 3b. There was support for hypothesis 3c as *WIS*: *Time* and *WIS*: *Strain* were both related to reduced home life satisfaction (see Table 2).

Hypothesis 4 was supported as TFC was related to higher levels of work, home life, and study satisfaction (Table 2).

Hypothesis 5 was partially supported as higher levels of EFC were related to higher levels of home life satisfaction. There was no relationship with work or study satisfaction (Table 2).

Hypothesis 6 was partially supported. TFC was negatively related to *SIW: Time*, *SIW: Strain*, and *SIH: Strain*. TFC was not related to *WIS: Time*, *WIS: Strain*, and *SIH: Time* (Table 2).

Hypothesis 7 was partially supported. EFC was positively related to *SIW: Strain, SIH: Time*, and *SIH: Strain*. EFC was not related to *WIS: Time*, *WIS: Strain*, and *SIW: Time* (Table 2).

Coping as a mediator

TFC as a mediator

There was only limited support for the hypotheses that TFC would mediate the relationships between conflict and satisfaction.

For mediation to be examined, the first step was to check that the IV and DV were related. WIS: Time was not related to study satisfaction, WIS: Strain was unrelated to work satisfaction, SIW: Time was not related to work and home life satisfaction, and SIH: Time and SIH: Strain were not related to work satisfaction. Mediation analysis was not carried out for these variables and hypotheses 8b, 9a, 10a, 10c, 12a, and 13a were not supported. The second step was to check that the IV was related to the mediator. As TFC (the mediator) was not related to WIS: Time, WIS: Strain, and SIH: Time (see Table 2) no mediation analysis was carried out and hypotheses 8a, 8c, 9b, 9c, and 12b and 12c were not supported.

With the third step, the mediator must affect the dependent variable. All three conditions were met for hypotheses 10b, 11a, 11b, 11c, 13b, and 13c. These hypotheses were therefore tested for evidence of mediation.

Hypothesis 10b was supported (Table 3). TFC partially mediated the relationship between *SIW: Time* and study satisfaction, in that at the third step of the analysis the relationship between the IV and DV was reduced but remained significant, and the Sobel test was significant.

Table 3: Testing TFC as a Mediator between SIW: Time and Study Satisfaction

Testing	Dependent	Independent	В	SE B	β	Adj. R²	Sobel
steps	Variable	Variable					test
Hypothes	sis 10b Testing	TFC as a Mediato	or between	SIW: Tim	e and Study	Satisfaction	n
Step 1	Study Satisfaction	SIW: Time	21	.04	29***	.08	
Step 2	TFC	SIW: Time	07	.03	12*	.01	
Step 3	Study Satisfaction	SIW: Time	19	.04	26***	.14	
		TFC	.33	.07	.25***		-2.05*

^{*} p < .05 ** p < .01 *** p < .001

The mediation analyses for TFC and *SIW: Strain* are shown in Table 4. TFC partially mediated the relationship between *SIW: Strain* and work satisfaction (hypothesis 11a), between *SIW: Strain* and study satisfaction (hypothesis 11b), and *SIW: Strain* and home life satisfaction (hypothesis 11c).

Table 4: Testing TFC as a Mediator between SIW: Strain and Types of Satisfaction

Testing steps	DV	IV	В	SE B	β	Adj. R²	Sobel test
Hypothes	is 11a Testing	TFC as a Mediato	or between	SIW: Strai	n and Work	Satisfaction	on
Step 1	Work Satisfaction	SIW: Strain	21	.07	17**	.03	
Step 2	TFC	SIW: Strain	13	.04	17**	.03	
Step 3	Work Satisfaction	SIW: Strain	16	.07	13*	.08	
		TFC	.39	.09	.23***		-2.56**
Hypothes	is 11b Testing	TFC as a Mediato	or between	SIW: Strai	n and Study	Satisfaction	on
Step 1	Study Satisfaction	SIW: Strain	26	.05	28***	.07	
Step 2	TFC	SIW: Strain	13	.04	17**	.03	
Step 3	Study Satisfaction	SIW: Strain	22	.05	23***	.13	
		TFC	.32	.07	.24***		-2.62**
Hypothes	is 11c Testing	TFC as a Mediato	or between	SIW: Strai	n and Home	e Life Satis	faction
Step 1	Home Life Satisfaction	SIW: Strain	32	.07	26***	.06	
Step 2	TFC	SIW: Strain	13	.04	17**	.03	
Step 3	Home Life Satisfaction	SIW: Strain	27	.07	22***	.10	
		TFC	.36	.09	.21***		-2.48**

^{*} p < .05 ** p < .01 *** p < .001

A further set of analyses explored TFC as a mediator of the relationship between *SIH*: *Strain* and study satisfaction (hypothesis 13b) and home life satisfaction (hypothesis 13c). Again partial mediation was found (see Table 5).

Table 5: Testing TFC as a Mediator between SIH: Strain and Types of Satisfaction

Testing steps	DV	IV	В	SE B	β	Adj. R²	Sobel test
Hypothe	sis 13b Testing	TFC as a Mediato	or between	SIH: Strain	n and Study	Satisfaction	ı
Step 1	Study Satisfaction	SIH: Strain	33	.05	35***	.12	
Step 2	TFC	SIH: Strain	10	.04	13*	.01	
Step 3	Study Satisfaction	SIH: Strain	30	.05	32***	.18	
		TFC	.31	.07	.24***		-2.09*

Hypothesis 13c Testing TFC as a Mediator between SIH: Strain and Home Life Satisfaction

Step 1	Home Life Satisfaction	SIH: Strain	37	.07	29***	.08	
Step 2	TFC	SIH: Strain	10	.04	13*	.01	
Step 3	Home Life Satisfaction	SIH: Strain	33	.07	27***	.13	
		TFC	.36	.09	.22***		-2.02*

^{*} p < .05 ** p < .01 *** p < .001

Overall, there was some evidence for TFC as a mediator between some forms of interrole conflict and some satisfaction outcomes. However, only 6 of the possible 18 mediations could be analysed so the evidence for mediation is not strong. The implications will be covered in the Discussion.

EFC as a mediator

The findings for EFC were unexpected. As with TFC, a number of mediated hypotheses could not be tested, either because the IV was unrelated to the DV, or the IV was unrelated to the mediator. In addition, if the mediator (EFC) was unrelated to some of the DVs these hypotheses could not be tested. There was no relationship between *WIS*:

Time and study satisfaction, WIS: Strain and work satisfaction, and SIW: Time and work and home life satisfaction. In addition SIH: Time and SIH: Strain were not related to work satisfaction. As a result of this, hypotheses 14b, 15a, 16a, 16c, 18a, and 19a were not supported. As EFC was not related to WIS: Time, WIS: Strain, and SIW: Time, hypotheses 14a, 14c, 15b, 15c, and 16b were not supported. Further exploration showed that EFC was not related to work or study satisfaction so hypotheses 17a, 17b, 18b, and 19b were not supported.

All three steps were met for hypotheses 17c, 18c, and 19c. These hypotheses were therefore tested for evidence of mediation.

Hypothesis 17c, that EFC would mediate the relation between *SIW: Strain* and home life satisfaction was not supported. When the independent variable (*SIW: Strain*) and the mediator (EFC) were entered together into the regression at the third step, the association between the independent variable (*SIW: Strain*) and the dependent variable (home life satisfaction) increased, and remained significant. The Sobel test also was significant. EFC did not partially mediate the relationship between *SIW: Strain* and home life satisfaction.

Similar results came from the analysis of hypotheses 18c, 19c (Table 6). For each analysis, instead of the relationship between the IV and DV being reduced with the addition of the mediator at the third step, it increased. The implications are considered in the Discussion.

Table 6: Testing EFC as a Mediator between Types of Conflict and Home Life Satisfaction

Testing steps	DV	IV	В	SE B	β	Adj. R²	Sobel test
Hypothes	Hypothesis 17c Testing EFC as a Mediator between SIW: Strain and Home Life Satisfaction						
Step 1	Home Life Satisfaction	SIW: Strain	32	.07	26***	.06	
Step 2	EFC	SIW: Strain	.12	.05	.14*	.02	
Step 3	Home Life Satisfaction	SIW: Strain	37	.06	30***	.17	
		EFC	.46	.07	.33***		2.34**
Hypothes	sis 18c Testing	EFC as a Mediato	or between	SIH: Time	and Home	Life Satisfa	ction
Step 1	Home Life Satisfaction	SIH: Time	18	.06	18**	.03	
Step 2	EFC	SIH: Time	.09	.04	.13*	.01	
Step 3	Home Life Satisfaction	SIH: Time	22	.05	22***	.12	
		EFC	.44	.07	.32***		2.15*
Hypothes	sis 19c Testing	EFC as a Mediato	or between	SIH: Straiı	n and Home	Life Satisf	action
Step 1	Home Life Satisfaction	SIH: Strain	37	.07	29***	.08	
Step 2	EFC	SIH: Strain	.12	.05	.13*	.01	
Step 3	Home Life Satisfaction	SIH: Strain	42	.06	34***	.19	
		EFC	.46	.07	.33***		2.26**

^{*} p < .05 ** p < .01 *** p < .001

Coping as a moderator

As the results for the mediation by EFC were so unexpected, and the evidence for mediation by TFC was at best partial, further analysis was undertaken to see if EFC or TFC acted to moderate the relationships between conflict and outcomes. All possible combinations were tested because while there are recommendations for exploring moderation, the only firm criterion for establishing moderation is that there is a significant interaction effect for the predictor and moderator. The significant moderation analyses are shown in Tables 7-12. Evidence for moderation was limited. TFC only acted as a moderator in one instance and EFC in 5 instances.

TFC as a moderator

TFC significantly moderated the relationship between *SIW: Strain* and study satisfaction (hypothesis 23b). At low levels of *SIW: Strain*, higher TFC was more strongly related to study satisfaction than for lower levels of TFC. *SIW: Strain* and study satisfaction had a stronger negative relationship with high TFC than with low TFC (Figure 6 and Table 7).

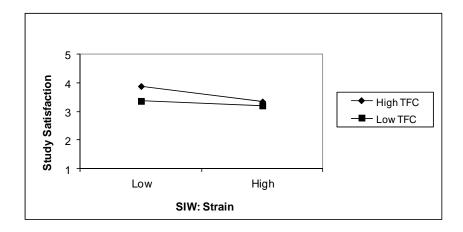


Figure 6: Moderation by TFC of SIW: Strain and Study Satisfaction

Table 7: Summary of Regression Analysis Testing Moderating Effects of TFC on SIW: Strain and Study Satisfaction

Dependent Variables	Study Satisfaction	
Predictors	В	β
SIW: Strain	23	24***
TFC	.30	.23***
SIW: Strain x TFC	23	15**
Adjusted R ²	.15	
F (3, 323) = 19.70, p < .001		

^{*} p < .05 ** p < .01 *** p < .001

EFC as a moderator

Overall, EFC moderated the relationship between *SIW: Time* and work and study satisfaction (hypothesis 28a and 28b), *SIW: Strain* and work satisfaction (hypothesis 29a), *SIH: Time* and study satisfaction (hypothesis 30b), and *SIH: Strain* and work satisfaction (hypothesis 31a). These moderated relationships are described in more detail below.

EFC significantly moderated the relationship between *SIW: Time* and work satisfaction (hypothesis 28a). For those with high EFC the relationship between *SIW: Time* and work satisfaction is negative. For those with low EFC the relationship between *SIW: Time* and work satisfaction is positive (Figure 7 and Table 8).

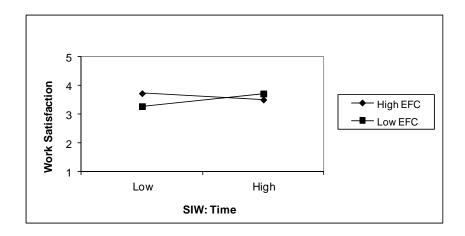


Figure 7: Moderation by EFC of SIW: Time and Work Satisfaction

Table 8: Summary of Regression Analysis Testing Moderating Effects of EFC on SIW: Time and Work Satisfaction

Dependent Variables	Work Satist	faction
Predictors	В	β
SIW: Time	.06	.06
EFC	.09	.06
SIW: Time x EFC	25	17**
Adjusted R ²	.03	
F(3, 323) = 4.15, p < .01		

^{*} p < .05 ** p < .01 *** p < .001

EFC significantly moderated the relationship between *SIW: Time* and study satisfaction (hypothesis 28b). For both those with low and high EFC the relationship between *SIW: Time* and study satisfaction was negative. When levels of EFC are high, low *SIW: Time* was slightly more strongly related to higher study satisfaction. When levels of EFC are low, high *SIW: Time* was slightly more strongly related to higher study satisfaction (Figure 8 and Table 9).

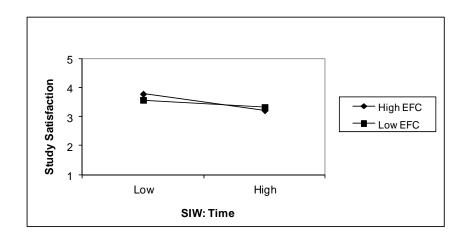


Figure 8: Moderation by EFC of SIW: Time and Study Satisfaction

Table 9: Summary of Regression Analysis Testing Moderating Effects of EFC on SIW: Time and Study Satisfaction

Dependent Variables	Study Satisfaction	
Predictors	В	β
SIW: Time	21	29***
EFC	.04	.04
SIW: Time x EFC	12	11*
Adjusted R ²	.09	
F (3, 323) = 11.45, p < .001		

^{*} p < .05 ** p < .01 *** p < .001

EFC moderated the relationship between *SIW: Strain* and work satisfaction (hypothesis 29a). For those with low EFC the relationship between *SIW: Strain* and work satisfaction is marginally negative. For those with high EFC, *SIW: Strain* and work satisfaction were more strongly negatively related (Figure 9 and Table 10).

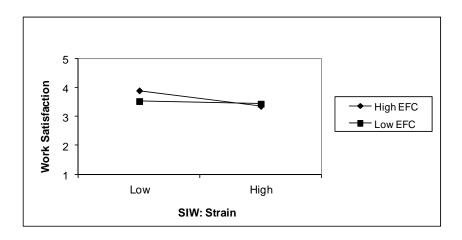


Figure 9: Moderation by EFC of SIW: Strain and Work Satisfaction

Table 10: Summary of Regression Analysis Testing Moderating Effects of EFC on SIW: Strain and Work Satisfaction

Dependent Variables	Work Satis	faction	
Predictors	В	β	
SIW: Strain	21	17**	
EFC	.11	.08	
SIW: Strain x EFC	21	12*	
Adjusted R ²	.04		
F(3, 323) = 5.91, p < .01			

^{*} p < .05 ** p < .01 *** p < .001

EFC moderated the relationship between *SIH: Time* and study satisfaction (hypothesis 30b). High EFC had a stronger negative relationship with *SIH: Time* and study satisfaction than lower EFC did (Figure 10 and Table 11).

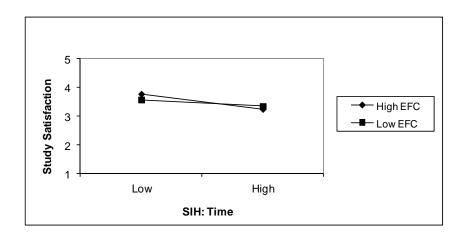


Figure 10: Moderation by EFC of SIH: Time and Study Satisfaction

Table 11: Summary of Regression Analysis Testing Moderating Effects of EFC on SIH: Time and Study Satisfaction

Dependent Variables	Study Satisfaction	
Predictors	В	β
SIH: Time	21	27***
EFC	.04	.04
SIH: Time x EFC	12	11*
Adjusted R ²	.06	
F(3, 323) = 8.49, p < .001		

^{*} p < .05 ** p < .01 *** p < .001

EFC significantly moderated the relationship between *SIH: Strain* and work satisfaction (hypothesis 31a). For those with low EFC the relationship between *SIH: Strain* and work satisfaction is positive, whereas for those with high EFC the relationship is negative (Figure 11 and Table 12).

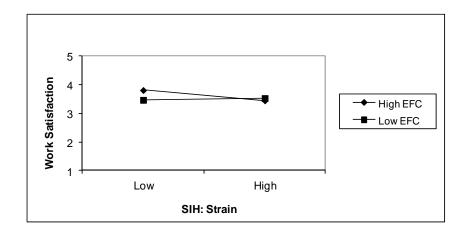


Figure 11: Moderation by EFC of SIH: Strain and Work Satisfaction

Table 12: Summary of Regression Analysis Testing Moderating Effects of EFC on SIH: Strain and Work Satisfaction

Dependent Variables	Work Satis	Work Satisfaction		
Predictors	В	β		
SIH: Strain	10	08		
EFC	.09	.07		
SIH: Strain x EFC	20	12*		
Adjusted R ²	.02			
F(3, 323) = 2.86, p < .05				

^{*} p < .05 ** p < .01 *** p < .001

Overall there was virtually no evidence for moderation by TFC and very limited evidence for moderation by EFC. The implications will be investigated in the discussion.

Chapter 5: Discussion

Interrole Conflict

Three forms of interrole conflict were studied: work interfering with study, study interfering with work, and study interfering with home. Different roles can interfere with each other in different ways, and this research focussed on the ways in which the time demands of one role interfere with another role (time-based interference), and the ways in which strain arising in one role affects other roles (strain-based interference). For both strain-based and time-based interrole conflict, study interfering with home showed the highest level of conflict, work interfering with study showed the next highest and study interfering with work showed the lowest level of role conflict. This suggests that work is the most protected domain in that participants were least likely to allow study commitments to interfere with their work role. Home was the least protected domain and the most vulnerable to conflict.

The highest interrole conflict was found when the time demands of study interfered with home commitments. This suggests that study takes time away from home more than the respondents would like. Home demands make way for study commitments when time conflicts occur, perhaps because study often has immovable deadlines and fixed time commitments, whereas an untidy house and section can wait for attention. The second highest level of role conflict arose when time commitments of work interfered with study. This could be because fixed time commitments are allocated to work through formal employment agreements which limit the time available to study. The third highest level of role conflict arose when strain arising from study interfered with home commitments. The strain effects from study felt at home can include tiredness, reduced effort, distraction, and irritability.

Overall, the time and strain demands of study were not found to interfere substantially with work. This implies that work was prioritised over study so that study was not allowed to interfere greatly with work. Working students may prioritise work in order to meet financial demands which include high university fees and living costs, so work will be the domain least compromised by other commitments.

Group Differences

Postgraduates reported more interrole conflict than undergraduates for 5 out of the 6 interrole conflicts that were studied. It seems that postgraduates have more commitments than undergraduates so reported more strain and time conflicts in trying to meet their obligations.

For students who worked more hours, time resources were focussed more on work commitments than study commitments. Therefore, time-wise, study interfered less with work but work interfered more with study. Working more hours was also associated with study time commitments interfering with home. This suggests that students may have made work their first priority, study their second priority, and home their third priority. Time available after working more hours may be allocated more to study than to home demands. Both work and study caused strain in each other's domains for those who worked more hours. Fatigue, lack of energy, irritability, and distraction were experienced because combining long working hours with studying can take a mental toll.

Younger students were more likely to have more study commitments than older students. For younger students, time spent on study encroached on potential work time. For older students, study often left little time for home commitments, possibly because older students have more home commitments than younger students. Strain and time demands of work interfered with study more for older than younger students. Older students may have been likely to make work their primary commitment so that less time was available for study. Older students may have also found that a higher work involvement also generated strain which affected studying.

Part-time students appeared to prioritise work over study, whereas full-time students tended to prioritise study over work. As a consequence of these priorities, part-time students' concentration on work affects study strain-wise, more than for full-time students for whom work is less of a priority. Full-time students' concentration on study affects their ability to give time to work, whereas this is less of a problem for part-time students whose priority is work over study. It is possible that full-time students have less home commitments than part-time students. This would explain why full-time students have less of a problem with time given to study affecting time at home than part-time students.

Compared to men, women reported more that the strain and time demands of study interfered with home commitments. Women still have considerable responsibility for housework, home life, and household management, which may be difficult to fit in with study demands. Women also reported that strain arising from study interfered with work, so study demands were causing fatigue, irritability, effort, and distraction at work. In this research, women found that study affected home and work more than men did.

There were no differences in interrole conflicts between respondents who had children living with them at home and those who did not. According to a 2010 survey, fewer people with children are attending university (New Zealand Union of Students' Associations, 2010). This could suggest that people with children are self selecting into a study programme taking into account their ability to manage child commitments.

Women used more emotion-focussed coping than men. In the present research emotion-focussed coping was primarily made up of social support items. There is a great deal of evidence for women rather than men using emotion-focussed coping which includes the seeking of social support (Carver et al., 1989; Matud, 2004; Torkelson & Muhonen, 2004) and this includes meta analytic evidence (Tamres, Janicki, & Helgeson, 2002). Various reasons have been given that support women using more emotion-focussed coping than men. These include the belief that emotion-focussed coping is a more traditional coping pattern for women where they use a more passive coping style (Torkelson & Muhonen, 2004) and the idea that it is a traditional gender role for women to use more emotional expressiveness (Matud, 2004).

Postgraduates used more emotion-focussed coping than undergraduates. With the higher amount of interrole conflicts experienced by postgraduates in comparison to undergraduates, the use of emotion-focussed coping may be a quick, temporary way to negate the negative feelings felt from interrole conflicts.

Hours and Satisfaction

Previous research has found that more working hours are related to less satisfaction with study (Buda & Lenaghan, 2005; Swanson et al., 2006). Unexpectedly in the present study, hours worked were not related to study satisfaction. This was surprising because it seemed likely that long working hours would leave less time or energy for study so a student would be less satisfied with their study. However, higher work hours were

related to reduced home life satisfaction, perhaps because time working meant that fewer hours were available to be spent on home life.

Interrole Conflict and Role Satisfaction

For 5 out of the 6 interrole conflicts that were studied, the domain that gave rise to role conflict was also the domain where most dissatisfaction was experienced. This is in line with previous research that has argued that an attributional tendency to dwell on the source of the conflict leads to more dissatisfaction with that role than the role which is affected by conflict (Amstad et al., 2011; Shockley & Singla, 2011). Unexpectedly, when strain arising from work interfered with study, there was more dissatisfaction with study than with work. It appears that overall, study satisfaction was more affected by role conflicts than satisfaction with other domains. It may be that it is hard to feel satisfied with study when one has other commitments, so enthusiasm and enjoyment with study are compromised more than home life and work satisfaction.

Reduced home life satisfaction was related to 5 out of 6 interrole conflicts. Work and study demands could mean reduced time for home and family commitments, strained home relationships, sleep upsets and reduced time for self care. The only interrole conflict not related to reduced home life satisfaction was time-based interference of study with work. On reflection, this was not surprising as this form of conflict affected students the least of the interrole conflicts.

Coping

Coping and wellbeing

Higher levels of task-focussed coping were related to higher levels of work, study, and home life satisfaction. Planning and direct action can contribute to meeting study and work deadlines and towards an organised home situation which can increase satisfaction rather than frustration with these domains. Emotion-focussed coping was related to higher levels of home life satisfaction. Strategies like expressing negative emotions and seeking emotional social support can be useful for reducing the negative feelings that are generated from interrole conflict. Emotion-focussed coping was not related to work or study satisfaction. On reflection, for study and work which are strongly achievement based, task-focussed coping might contribute to satisfaction by enabling progress, whereas emotion-focussed strategies have no impact in this regard.

Coping with interrole conflict

When there were low levels of strain from study interfering with work and home, participants used more task-focussed coping such as direct action and planning. This implies that strain-related problems such as a lack of energy, tiredness, distraction and irritability can make it difficult to focus on practical problem solving. Participants also used more task-focussed coping when there were low levels of time-based interference from study to work. Planning and direct action can be used when there is time available to implement and utilise problem solving to maintain a low role conflict situation.

High levels of emotion-focussed coping were found when time demands of study interfered with home. Lack of time may mean fewer opportunities to engage in task-focussed coping, while emotion-focussed coping, while not solving the problems, may make one feel better. Emotion-focussed coping is also useful when there are high amounts of strain if it can help lessen the negative feelings which result from the fatigue, reduced effort, distraction, and irritability felt at work and home from study. Because this not causal research, it is not clear if emotion-focussed coping is useful in that the participant is coping the best they can with ongoing role conflicts, or whether emotion-focussed coping is damaging. While the participant may be feeling better about the interrole conflict, strategies like venting and emotional support could be stopping the participant from dealing proactively with role conflicts.

Task and emotion-focussed coping were not related to time and strain-based conflict from work interfering with study. Task-focussed coping was also not related to the time demands of study interfering with home, and emotion-focussed coping was not related to the time demands of study interfering with work. It was not clear why this was and it warrants further investigation.

Mediation and moderation

There is inconsistent research on coping as a mediator or moderator in the interrole conflict literature with satisfaction. Coping does not play a strong role, and this is reflected in the present research where a limited role for coping as a mediator between interrole conflict and satisfaction was found.

Task-focussed coping partially mediated the relationships between strain-based study interfering with work, and work, study, and home life satisfaction; and between strain-

based study interfering with home, and study and home life satisfaction. It is possible that high levels of strain can limit the use of task-focussed coping, but it is also possible that low levels of strain enable more resources to be put into energy-intensive task-focussed strategies. Task-focussed coping also partially mediated the relationship between time-based study interference with work, and study satisfaction. Task-focussed coping can work well when there is time to address the conflicting demands of two priorities, unless high time demands restrict the ability to use preparation and action as a form of problem solving.

Emotion-focussed coping was examined as a mediator of the relationships between role conflicts and satisfaction. Unexpectedly, there appeared to be no mediation because of an increase in the coefficients. It is possible that emotion-focussed coping was acting as a suppressor variable. Suppressor effects are difficult to interpret. It appears that emotion-focussed coping may increase the negative relationship of inter-domain conflict and home life satisfaction. This would suggest that role conflict with emotion-focussed coping may be related to even less satisfaction than conflict alone. This finding however should be treated with caution and tested further.

There was virtually no evidence that task-focussed coping acted as a moderator. In 17 out of 18 analyses task-focussed coping did not moderate between interrole conflict and satisfaction. It did appear however, that when there was low strain-based interference from study to work, higher task-focussed coping was associated with higher study satisfaction. It could be that having low strain-based interference from study to work and choosing to use more task-focussed coping can enable a student to structure their commitments through strategies like planning and direct action. This could strengthen the relationship between low conflict and satisfaction, as students experience more satisfaction with their study through feeling well prepared and organised. At higher conflict levels high task focussed coping was associated with a reduction in study satisfaction. It seems that practical task-focussed strategies like planning and direct action may be less useful in managing this type of high strain situation.

There was some evidence that emotion-focussed coping could moderate the relationship between strain and time-based conflict on satisfaction. Emotion-focussed coping moderated the relationships between time and strain-based conflicts and work and study satisfaction. All 5 significant moderations found that participants with low levels of

conflict had higher satisfaction, with higher use of emotion-focussed coping. More emotion-focussed coping strengthened the relationship between lower conflict and higher satisfaction, albeit in a small way. Social support can be a protective factor so this suggests that at low conflict levels it may be enhancing satisfaction. Higher emotion-focussed coping was less helpful than lower emotion-focussed coping in higher conflict situations, resulting in lower satisfaction. While social support can be useful, it can be damaging in a high interrole conflict situation if the advice is irrelevant to the situation (Cohen et al., 2000).

Implications for Research

It is important to continue researching inter-domain conflicts between work, study, and home as working students with home commitments will continue to frequent tertiary institutions. Postgraduates had more inter-domain conflict than undergraduates, so research needs to be conducted separately on both these groups rather than treating them as an aggregated group.

Interrole conflict research needs to research strain and time-based conflicts separately as useful information is lost if they are combined. It is clear from the present research that there were significant differences for working students in time and strain conflict. There needs to be more research on study interfering with home rather than study interfering with family because living arrangements are very diverse for working students. There may be other roles such as a participants' leisure role that also experience interrole conflict and which can be researched in conjunction with work, study, and home roles.

Study satisfaction appears to be more compromised in relation to interrole conflicts in comparison to work and home life satisfaction. Further research is needed as to why study satisfaction is more affected.

In the current research, task-focussed coping and emotion-focussed coping were not related to all the interrole conflicts so further investigation needs to determine why this is. Little evidence for mediation was found so further research into coping with role conflicts is required. Moderation showed more effects with emotion-focussed coping than task-focussed coping, but had little effect overall, so further research is also needed. Mediation and moderation research needs to be further explored with postgraduates and undergraduates as separate groups to see if there are differences.

The very small effects for mediation and moderation by coping suggest that there may be other factors contributing to the relationship between interrole conflicts and satisfaction. There are a wide variety of other mediators and moderators that could be examined. These could include self efficacy, optimism, hardiness, perseverance, and other personality characteristics. Qualitative research on working students could be useful to find what factors help address conflicts between roles. The complexity of coping suggests that it is important to choose coping measures carefully. It is important to continue to explore coping as a mediator and moderator due to the sparseness of research with domain conflicts between study, work, and home. Longitudinal research would enable one to investigate trait coping over a long period of time which could give more robust results.

Implications for Practice

Tertiary institutions need to be made aware that the time commitments required for study can interfere with home commitments for working students and to look at ways to combat this, such as investigating how class timetabling including weekend, evening, block course, day-time, and on-line options can assist students with work-life balance. Access to lecturers for consultation needs to extend to include some evenings and weekends. Tertiary libraries and study support centres need to consider extended opening hours over weekends and evenings.

Tertiary institutions may also look at running seminars for working students in managing potential interrole conflict. As postgraduates are more vulnerable to interrole conflicts than undergraduates, it is important that postgraduates are included. Working students need to know that past students have found that role conflict can affect their home life even more than their study and work commitments. Information on time management and stress management to manage tiredness, irritability, reduced effort and distraction may be useful. Working students may need to lower their expectations about the study experience when combined with working and home commitments. Seminars could also paint a realistic picture of university commitments and their impact on the home.

Work situations can have an impact on a working student's success at studying. Human Resources departments and line managers need to be conscious of, and promote awareness that study time can be encroached upon by work. Workplace policies can

help offset the time issue and encourage a work culture where study is looked on positively. Initiatives can include promoting study leave, the ability to negotiate flexible work hours, and the provision of quiet space to study in lunch breaks.

Limitations

A cross-sectional approach can be limiting because of the inability to ascertain a deeper understanding of the complexity of coping behaviours. The use of self report has its flaws in assessing trait coping as participants may find it difficult to review individual coping strategies over a period of time. There may be a tendency to think only of a recent example or an example that stands out over other examples.

Emotion-focussed coping as a label is a broad term where particular types of emotion-focussed coping groupings through factor analysis may not completely clarify whether the grouping is operating in a maladaptive or adaptive way which makes findings hard to analyse.

While there were strong patterns with the correlational relationships between satisfaction and interrole conflict, causation could not be established.

Postgraduates experienced more interrole conflict in 5 out of the 6 conflicts than undergraduates. While there was a large sample of participants in the current research it would be enlightening to focus on postgraduates and undergraduates as separate samples rather than as an aggregated group and treat them separately in testing for mediation and moderation.

Conclusion

Group differences and differences for the sample as a whole were found with measuring interrole conflict as separate constructs which were strain and time-based. Postgraduates and undergraduates had strong group differences in experiencing interrole conflict which should be further investigated. There were some consistent patterns in correlational relationships between interrole conflict and satisfaction which could warrant deeper analysis and exploration. While there were some results that arose from the mediation and moderation analysis, coping overall had a limited effect as a mediator and moderator which suggests it is making little difference with interrole conflict and satisfaction relationships on the whole. The mediational and moderational relationships that were found with coping were not particularly strong so any results should be treated

with caution in applying to psychological practice. Coping however did have some direct correlational relationships with various interrole conflicts and types of satisfaction suggesting that coping is relevant to satisfaction and interrole conflict research with study, work, and home demands.

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Appendix A: Human Ethics Approval Application Letter



MASSEY UNIVERSITY ALBANY

5 August 2010

Susan Parr c/- Dr D Gardner College of Humanities and Social Sciences Massey University Albany

Dear Sue

HUMAN ETHICS APPROVAL APPLICATION - MUHECN 10/057

"Work, Study, and Home Demands - A Study Investigating Coping and Outcomes"

Thank you for your application. It has been fully considered, and approved by the Massey University Human Ethics Committee: Northern.

Approval is for three years. If this project has not been completed within three years from the date of this letter, a reapproval must be requested.

If the nature, content, location, procedures or personnel of your approved application change, please advise the Secretary of the Committee.

Yours sincerely

Dr Ralph Bathurst

Chair

Human Ethics Committee: Northern

cc: Dr D Gardner

College of Humanities and Social Sciences

Te Kunenga ki Pürehuroa Office of the Assistant to the Vice-Chancellor (Research Ethics)

Private Bag 102 904, North Shore City 0745, Auckland, New Zealand Telephone +64 9 414 0800 ex 9539 humanethicsnorth@massey.ac.nz

Appendix B:

Research Questionnaire for the Present Study

Managing Paid Work, Study, and Home Demands



My name is Sue Parr and I am currently studying towards a Master of Arts in Industrial and Organisational Psychology. This questionnaire investigates how people who do paid work and tertiary study experience and manage work-life balance.

Please complete this survey if you are <u>currently</u> doing any combination of <u>paid work</u> and <u>tertiary study</u> in New Zealand.

This survey takes less than ten minutes to complete.

As a thank you for completing the survey you have the option to go in the draw to **win a \$100 book voucher** at the end of the survey. Your contact details for the prize draw are separate from your survey responses and cannot be linked to your survey responses in any way.

Participation in this research is voluntary and confidential. All responses are anonymous. Your consent is given by completing and submitting the questionnaire. You have the right to decline to answer any particular question.

If you have any questions or would like to know more about the research, please contact me, Sue Parr, on 02102392628 or email me at s.u.e.p@xtra.co.nz. You can also contact my supervisor, Dr Dianne Gardner, on 09 414 0800 x 41225 or email her at d.h.gardner@massey.ac.nz. At the end of the survey, a link is provided which you can use to email me if you would like to be sent a copy of the summary of findings when they are available.

Thank you for taking part in this research!

This project has been reviewed and approved by the Massey University Human Ethics Committee: Northern, Application 10/057. If you have any concerns about the conduct of this research, please contact Dr Ralph Bathurst, Chair, Massey University Human Ethics Committee: Northern, telephone 09 414 0800 x 9570, email humanethicsnorth@massey.ac.nz

If you are <u>currently</u> doing any combination of <u>paid work</u> and <u>tertiary study</u> in New Zealand, please click "Next" to begin this survey.

naging Paid Work, Study, and Ho	ne Den	ianus			
Below are statements about how paid wor other during the semester. Please select to experience of each one.					
Questions on Studying					
1.	Strongly Disagree	Disagree	Neither Agree or	Agree	Strongly Agree
I spend less time studying than I would like because of my job	\bigcirc	\bigcirc	Disagree	\bigcirc	\bigcirc
My job takes up time that I'd rather spend on study	Ŏ	Ŏ	Ŏ	Ŏ	Õ
When I'm studying , I spend a lot of time thinking about my job	Ŏ	Ŏ	Ŏ	Ŏ	Ŏ
2.	Never	Rarely	Sometimes	Often	Always
I am irritable when I study because of work demands	0	0	0	0	0
When I am studying I feel tired from work demands	Ŏ	O	Ö	O	O
Job worries or problems distract me when I am studying	0	0	0	0	0

Questions on Working					
3.					
	Strongly Disagree	Disagree	Neither Agree or	Agree	Strong! Agree
I spend less time working than I would like because of my study	0	0	Disagree	0	0
My study takes up time that I'd rather spend working	0	0	0	O	0
When I'm working, I spend a lot of time thinking about my study	\circ	\circ	\circ	\circ	\circ
4.					
Study demands make me irritable at work	Never	Rarely	Sometimes	Often	Always
Study demands make me tired at work	\sim	\sim	\sim	\tilde{O}	$\tilde{\circ}$
Study worries or problems distract me when I am at work	Ŏ	Ŏ	Ŏ	Ŏ	Ŏ
Study reduces the effort I can give to my job	Ŏ	Ŏ	Ŏ	Ŏ	Ŏ

Questions on Home					
5.					
	Strongly Disagree	Disagree	Neither Agree or Disagree	Agree	Strongly
spend less time on my home life than I would like because of my study	0	0	O	0	0
My study takes up time that I'd rather spend on things at home	\circ	0	\circ	\circ	0
When I'm studying, I spend a lot of time thinking about my home ife	0	0	0	0	0
3.					
	Never	Rarely	Sometimes	Often	Always
Study demands make me irritable at home	\bigcirc	\odot	\odot	\odot	\mathcal{O}
My study makes me feel too tired to do the things that need attention at home	\circ	\bigcirc	\circ	\circ	\circ
Study worries or problems distract me when I am at home	0	0	0	0	0
My study reduces the effort I can give to my home life	Ó	Ō	Ó	Ó	O

Part 2					
For each statement, please select the opti	on that m	ost clos	ely repres	ents ho	w you
generally cope with conflicts between stu	dy, paid v	vork, an	d home de	mands	during
the semester.					
I take action to try to make the situation better	Never	Rarely	Sometimes	Often	Always
I think hard about what steps to take	ŏ	\sim	$\tilde{\circ}$	$\tilde{\circ}$	ŏ
I express my negative feelings	ŏ	\sim	\tilde{O}	\sim	
I look for something good in what is happening	$\tilde{\circ}$	$\tilde{\circ}$	$\tilde{\circ}$	$\tilde{\circ}$	000000000000000000000000000000000000000
I accept the reality of the fact that it has happened	Ŏ	$\tilde{\circ}$	Ŏ	$\tilde{\bigcirc}$	Õ
I make jokes about it	ŏ	$\tilde{\circ}$	Ŏ	Ŏ	Õ
I criticize myself	Ŏ	$\tilde{\bigcirc}$	Ŏ	Ŏ	Ŏ
I get emotional support from others	Ŏ	Ŏ	Ŏ	Ŏ	Ŏ
I make fun of the situation	Ŏ	Ŏ	Ŏ	Ŏ	Ŏ
I give up the attempt to cope	Ŏ	Ŏ	Ŏ	Ŏ	Ŏ
I try to get advice or help from other people about what to do	Ŏ	Ŏ	Ŏ	Ŏ	Ŏ
I use alcohol or other drugs to help me get through it	Ŏ	Ŏ	Ŏ	Ŏ	Ŏ
I learn to live with it	Ŏ	Ŏ	Ŏ	Ŏ	Ŏ
I pray or meditate	0	0	0	0	0

now you generally cope with conflicts betw during the semester.		•••			
do something to think about it less, such as going to movies,	Never	Rarely	Sometimes	Often	Always
watching TV, reading, daydreaming, sleeping, or shopping	0	0	0	0	0
try to come up with a strategy about what to do	O	O	O	O	O
get comfort and understanding from someone	O	Ō	O	O	O
turn to other activities to take my mind off things	O	O	O	O	O
say to myself "this isn't real"	\circ	\circ	0	\circ	00
try to see it in a different light, to make it seem more positive	\circ	\circ	\circ	\circ	\circ
refuse to believe that it has happened	0	0	\circ	0	0
say things to let my unpleasant feelings escape	\bigcirc	\bigcirc	\circ	\bigcirc	0
try to find comfort in my religion or spiritual beliefs	0	0	0	0	00000
give up trying to deal with it	0	0	0	0	0
concentrate my efforts on doing something about the situation I'm	O	0	0	0	0
I blame muself for things that have becomed	$\overline{\bigcirc}$		$\overline{\bigcirc}$		
I blame myself for things that have happened	\sim	\sim	\sim	\sim	0
use alcohol or other drugs to make myself feel better	\sim	\sim	\sim	\sim	\sim

Part 3					
1. Please select the option that most close	ly repres	ents hov	much yo	ou agree	or
disagree with the following statements abo	out your	paid wor	k.		
	Strongly Disagree	Disagree	Neither Agree or Disagree	Agree	Strongl
My activities at work are rewarding in and of themselves	0	0	Ŏ	0	0
I get a lot of satisfaction from carrying out my responsibilities at work		O	O	O	0
I find my activities at work to be personally meaningful	Ō	O	0	O	0
I love what I do at work	00000	Ö	Ö	O	Ö
Generally speaking, I am very satisfied with this job	0	O	0	ŏ	0
I frequently think of quitting this job	0	0	0	0	0
I am generally satisfied with the kind of work I do in this job	0	0	0	0	0
I am satisfied with my performance at work	0	0		0	0
2. Please select the option that most close	lv renres	ents how	much v	ou agree	or
disagree with the following statements abo				ou ugi ou	
	Strongly		Neither		Strong
	Disagree	Disagree	Agree or Disagree	Agree	Agree
Most days I am enthusiastic about my study	\bigcirc	\bigcirc	O	\bigcirc	\bigcirc
I feel fairly satisfied with my study	Ŏ	Ŏ	Ŏ	Ŏ	Õ
Each day I study seems like it will never end	Ŏ	Ŏ	Ŏ	Ŏ	Ŏ
I find real enjoyment in my study	Ŏ	Ŏ	Ŏ	Ŏ	Ŏ
I consider my study rather unpleasant	0000	Ŏ	Ŏ	Ŏ	Ŏ
I am satisfied with my academic performance	Ŏ	Ŏ	Ŏ	Ŏ	Ŏ

	Strongly Disagree	Disagree	Agree or	Agree	Strong Agree
In most ways my home life is close to my ideal	0	\bigcirc	Disagree	\bigcirc	0
The conditions of my home life are excellent	Ŏ	Ŏ	Ŏ	Ŏ	Ŏ
I am satisfied with my home life	000	O	Ö	O	O
So far I have obtained the important things I want in my home life	O	O	Ö	0	0
I am satisfied that I am doing the things that need attention at home	Ŏ	Ŏ	Ŏ	Ŏ	000000
I think I am doing well in my home life	\circ	\circ	\circ	\circ	\circ
I think I am doing well at the things that need attention at home	0	0	0	0	0

anaging Paid Work, Study, and Home Demands					
Please select the	relevant options from	n the tick-box items ar	nd the drop-down list b	elow to answer the de	mographic data questions.
Are you:					
Male	Female				
What is you	ur age?				
20 or under	21-24	25-30 31-40	41-50 (51-60	pove s old
Which ethn	ic group do y	ou most stron	gly identify wit	h?	
	ted "Other" please spe	ecify the ethnic group in	the text box directly b	elow	
				_	
		ently live with			\bigcirc
0 •	O 1	O 2	O 3	O 4	5 or more

Managing Paid W	ork, Study, and	Home Demands						
Please continue to select th	Please continue to select the relevant options from the tick-box items to complete the demographic data questions.							
What type of student are you currently?								
Undergraduate	Graduate	Postgraduate	Other (for example, non degree student doing a Certificate or Diploma)					
Are you a part tim student?	e or full time							
Part time	Full time							
What is your curre	ent paid work situati	on?						
I work less than 10 hou	urs per week I work 2	1-29 hours per week	I work 35-40 hours per week					
I work 10-20 hours per	week I work 36	0-34 hours per week	I work more than 40 hours per week					
		draw.						