ATTACHMENT AND GOAL ORIENTATION AS PREDICTORS OF UNIVERSITY STUDENTS' ACADEMIC HELP-SEEKING INTENTIONS

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by

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Abstract

University students' intentions to seek help for hypothetical academic problems were examined in the context of Bartholomew's (1990) four-category attachment model (using both prototype and internal working model scores) and Elliot's (1999) model of goal orientation. Undergraduate students (N = 201; aged 18–42 years, M = 20.2) completed the Relationship Scales Questionnaire (Griffin & Bartholomew, 1994a), the Achievement Goal Questionnaire (Elliot & McGregor, 2001), and the General Help-Seeking Questionnaire (Wilson, Deane, Ciarrochi, & Rickwood, 2005). ANOVA and regression analyses revealed that internal working models of other (p = .009) and mastery-approach goal orientation (p = .013) were the best predictors of academic help-seeking among the variables tested; mastery-approach was also the best predictor of help-seeking from formal sources (p = .033). Combining attachment and goal orientation improved prediction of academic help-seeking. Inconsistencies with previous literature are noted and directions for future research are suggested.

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Table of Contents

Abstract		īi
Acknowledgements		iii
List of Ta	List of Tables	
List of Fig	List of Figures	
List of Ap	ppendices	vii
Introduction		1
	Adult Attachment	3
	Attachment and Academic Help-Seeking	7
	Goal Orientation and Academic Help-Seeking	13
	Predicting Help-Seeking with Attachment and	
	Goal Orientation	15
	Hypotheses	16
Method		17
	Participants and Procedure	17
	Measures	19
Results		21
	Scoring and Scale Properties	21
	Attachment and Academic Help-Seeking	24
	Goal Orientation and Academic Help-Seeking	26
	Attachment and Goal Orientation	29

Discussion		30
	Sample Characteristics	30
	Attachment and Academic Help-Seeking	31
	Goal Orientation and Academic Help-Seeking	36
	Attachment and Goal Orientation	39
	Caveats and Limitations	41
	Future Directions	43
References		46

List of Tables

Table I	Descriptive and Reliability Statistics for Subscales of the Relationship Scales Questionnaire (RSQ) and the Achievement Goal	
	Questionnaire (AGQ)	60
Table	Means and Standard Deviations (in Parentheses) for Help-Seeking	
2	Intentions, by Problem Type and Help Source	61
Table	Statistics for Interactions of Help-Seeking Variables	
3		63
Table		
4	Help-Seeking	64
Table	Intercorrelations Between Internal Working Models and Goal	1
5	Orientations	65

List of Figures

Figure 1	Distribution of self-reported number of courses completed	66
Figure 2	Students' mean (+SD) likelihood of seeking help from various sources, across four academic problems	67
Figure 3	Sex differences in mean (+SD) likelihood of seeking help for four academic problems	68

List of Appendices

Appendix A	Relationship Scales Questionnaire	54
Appendix B	Achievement Goal Questionnaire	56
Appendix C	General Help-Seeking Questionnaire	58

Attachment and Goal Orientation as Predictors

of University Students' Academic Help-Seeking Intentions

In the course of their university studies, all students are likely to encounter some difficulty at one time or another. In fact, one study reported that 94% of students surveyed at a large university in the United States stated that they had needed help with courses or study skills at some point during the preceding term (Knapp & Karabenick, 1988). One of the strategies that students can employ for overcoming their difficulties is to ask for help – from a professor, classmate, teaching assistant, friend, and so on. While some students avail themselves of assistance, there are many others who do not. Of the students in the aforementioned study who reported having needed academic help, 24% did not seek any help at all, either from formal or informal sources (Knapp & Karabenick, 1988). Moreover, students who are most in need of help are reported to be as unlikely to seek academic assistance as students who are least in need of help (Karabenick & Knapp, 1988).

The fundamental question being asked in this research is, *Why do some students ask for help, and others do not*? In order to answer this question, help-seeking was examined in its relationship to two individual difference variables: attachment, which is a socioemotional construct, and goal orientation, which is an academic motivation construct. Theoretically, these variables represent two intrinsic domains that could both influence a student's help-seeking behaviour for academic difficulties. With the exception of one study (Lopez, 1997), these two variables have not previously been studied together, either to investigate how they are related to each other or to estimate

their combined predictive power with respect to academic help-seeking. Goal orientation is often examined as a predictor of learning strategies (e.g., Elliot & McGregor, 2001). Newman (1991) posits that help-seeking is distinct among learning strategies because of the social-interactional aspect that is not required for other strategies such as rehearsal and notetaking. Thus, attachment is an appropriate predictor of academic help-seeking because of its direct relevance to the relational component of help-seeking, which is not inherent in achievement goal orientation.

There are several issues that must be addressed regarding theory and measurement of the variables involved in the present study. In particular, reviewing and integrating this literature is difficult because both attachment and help-seeking have been variously operationalized. Attachment has been defined and measured in several ways; for instance, the target relationship may be parents (e.g., Larose, Boivin, & Doyle, 2001), romantic partners (e.g., Vogel & Wei, 2005), or others in general (e.g., Ognibene & Collins, 1998). It is the latter target relationship for attachment that was employed in the present study. Similarly, while *help-seeking* is used herein as a blanket term, it is important to acknowledge that different aspects or operational definitions of help-seeking have been measured, such as behaviour in a counselling relationship (e.g., Larose, Bernier, Soucy, & Duchesne, 1999, Study 2) and avoidance of help-seeking (e.g., Karabenick, 2003). Some studies including attachment have not examined help-seeking as such, but have measured related variables such as social support expectations (e.g., Larose & Boivin, 1997, 1998); this research has also informed the present study.

Parallels between previous studies and the present one are also complicated by the fact that existing studies of attachment and academic help-seeking have ill-defined constructs or variables. Two central issues are (a) whether students' relationships with help-sources (e.g., professors) are or are not intimate, and (b) whether the problems in question are or are not emotional in nature. In studies that have examined an "academic counselling" relationship (Larose et al., 1999, Study 2; Larose et al., 2001), it has been stressed that the relationship has no history; however, regularly maintained, one-on-one interactions that are meant to help one party (i.e., the student) will, arguably, develop some level of intimacy. Furthermore, it is difficult to glean from the reports of prior studies what, precisely, is the relationship between attachment and academic helpseeking, since the type of problem is not adequately specified in studies. Thus, while attachment constructs have been extended to the academic *context*, one cannot clearly articulate the relationship between attachment and academic *problems* in particular. The present study addresses both of these issues by measuring help-seeking intentions for academic problems only, and by separately assessing help-seeking intentions for different help sources. In order to present the extant literature relevant to the current research, previous studies have been grouped according to the measure of help-seeking. Within these groups, the operational definition of attachment is specified for each study. Adult Attachment

Attachment theory was developed through the partnership of John Bowlby and Mary Ainsworth, with the initial intention of gaining some understanding of child and adult psychopathology by examining early childhood relationships (Ainsworth &

Bowlby, 1991). Attachment behaviour is focused on maintaining proximity to a particular relationship partner (often referred to as the attachment figure; Bowlby, 1980). For example, attachment behaviour in infants is directed toward the goal of staying close to the mother or primary caregiver. Although attachment theory was originally studied with infants and young children, it has also been extended into adolescence and adulthood. Conceptions of adult attachment are consistent with Bowlby's (1969, 1973, 1980) theoretical framework. He specifies that the development of attachment systems continues through adolescence and adulthood, though changes occur particularly in the identity of attachment figures (Bowlby, 1969). Adult attachment has been characterized in reference to both parent-child relationships (e.g., George, Kaplan, & Main, 1996) and current peer and/or romantic relationships (e.g., Hazan & Shaver, 1987). Bartholomew (1990) argues that models which only refer to childhood are lacking, and she echoes Bowlby's (1969) argument that adults' attachment relationships with non-parental figures are at least as important as their attachment to parents. Adult attachment theory has proven to be a useful framework for studying adult relationships, and has been associated with therapeutic processes (Dozier & Tyrrell, 1998) and couple violence (Roberts & Noller, 1998), among other things.

Studies of help-seeking with postsecondary students have used various operational definitions of attachment, which can make it complicated to integrate their findings. Much of the published research of adult attachment is based on models that include three attachment styles: secure, preoccupied (sometimes called anxious or ambivalent), and avoidant (sometimes called dismissing; Brennan, Clark, & Shaver,

1998). The present study is based on Bartholomew's (1990; Griffin & Bartholomew, 1994a) four-prototype, two-dimensional attachment model. This conceptual framework is based on the assumption that all adult attachment measures can be reduced to the underlying dimensions of internal working models of self and other, which can be positive or negative. Internal working models are mental representations derived from experience, which serve as both a set of expectations and as a mental filter for processing new information and situations (Bowlby, 1969, 1980). The self-model is based on the self-concept and a sense of worthiness of others' care and attention. The other-model reflects the degree to which others are perceived as available, trustworthy and caring. These internal working models then translate into expectations of how responsive, attentive and caring interaction partners will be (Bartholomew, 1990).

In Bartholomew's (1990; Griffin & Bartholomew, 1994a) conceptualization of attachment, each possible pairing of positive and negative self- and other-models is associated with an particular attachment style. A *secure* attachment style (positive selfand other-models) denotes comfort with both intimacy and autonomy. *Preoccupied* attachment (negative self-model, positive other-model) is characterized by a dependence on the approval of others for a sense of self-worth. Bartholomew's theoretical model includes two variants of the avoidant attachment style found in other models (e.g., Hazan & Shaver, 1987): individuals with a *fearful* style (both internal working models negative) desire intimacy but are fearful of rejection, while individuals with a *dismissing* style (positive self-model, negative other-model) do not acknowledge a need for intimacy, therefore precluding the hurt of rejection. The construct validity of the four-prototype, two-dimensional attachment framework has been demonstrated using different measurement methods, including interview ratings and self-reports. Attachment style scores from interviews assessing family relationships and current peer relationships yielded similar results, indicating validity of the attachment model across different target relationships. Bartholomew's attachment framework was also shown to have reliability across different methods of measurement, since ratings from interviews, same-sex peer reports and romantic partner reports, converged with self-report ratings. The discriminant validity of the four attachment styles within the model is demonstrated by their association with distinct profiles of personality characteristics and interpersonal functioning (e.g., introversion, nurturance, competitiveness; see Bartholomew & Horowitz, 1991, and Griffin & Bartholomew, 1994b, for detailed descriptions of reliability and validity tests).

This attachment model is designed to accommodate several operational definitions of attachment constructs. Individual scores are prototype ratings on each of the four attachment styles, but a categorical designation may be assigned using the highest prototype rating, or self- and other-model scores may be calculated from the four prototype ratings. Bartholomew (1990) argues that conceptions of attachment style that place an individual in one category at the exclusion of other categories are inaccurate. She contends that each attachment style is a prototype, and that a perfect match is not expected; rather, an individual will approximate each prototype to varying degrees. Griffin and Bartholomew (1994a) further argue that prototype ratings improve upon

dimensional approaches by accounting for the combined effects of multiple properties, while acknowledging within-group variation.

Griffin and Bartholomew (1994b) present conflicting arguments regarding whether researchers should test relations using the four attachment styles or the two working models. On the one hand, they attest that "there are both theoretical and empirical reasons to believe that attachment styles are more than simply the sum of underlying dimensions" (p. 442), and that "a dimensional approach may oversimplify the relation between adult attachment and interpersonal functioning" (p. 443). On the other hand, they caution that while the self-report measures of the underlying internal working models are verified to be reliable, the reliability of self-report measures for the attachment patterns is both theoretically and empirically questionable. Their recommendation is that self-report scores for attachment patterns should therefore be validated by interviewer ratings. Since interviews were not possible in the present study due to practical constraints, scores for internal working models were the main predictors in the present study (though one analysis included prototype ratings).

Attachment and Academic Help-Seeking

Attachment constructs have been used to explain help-seeking tendencies in a number of contexts including romantic relationships (Collins & Feeney, 2000; Simpson, Rholes, Oriña, & Grich, 2002), and combat training (Mikulincer & Florian, 1995). Attachment theory has also been applied to examination of help-seeking for particular actual or hypothetical issues, such as alcohol abuse (Codd & Cohen, 2003), and hypothetical unplanned pregnancy (Pierce & Lydon, 1998). Attachment has been used as

a framework for examining processes specific to the postsecondary school context. For example, attachment theory has been examined in relation to college students' adjustment, particularly over the transition from high school to college (e.g., Bernier, Larose, Boivin, & Soucy, 2004; see also Kenny & Rice, 1995, for a review). Studies of attachment and help seeking that have been conducted with university and college students have tended to focus on socioemotional problems (e.g., DeFronzo, Panzarella, & Butler, 2001; Larose, Guay, & Boivin, 2002). Recently, though, some researchers have applied attachment theory to the process of help-seeking in the academic domain (Larose & Bernier, 2001; Larose et al., 1999; Larose, Bernier, & Tarabulsy, 2005; Larose & Boivin, 1997, 1998; Larose et al., 2001; Larose, Guay, & Boivin, 2002; Lopez, Melendez, Sauer, Berger, & Wyssmann, 1998; Ognibene & Collins, 1998; Vogel & Wei, 2005).

A number of studies linking attachment and help-seeking in postsecondary students have been conducted by Larose and his colleagues, in which help-seeking has been defined in terms of behaviour in a counselling relationship or students' perceptions of their own help-seeking tendencies. Several studies have not measured help-seeking per se, but have examined students' perceptions of social support (Larose & Boivin, 1997, 1998; Larose et al., 2002). In two studies, Larose and Boivin (1997, 1998) measured attachment as students' perceived security to their parents (i.e., parental representations), and found that students who reported greater security to their parents also had higher general perceptions of social support. These general perceptions of social support then predicted students' expectations of support from their network of friends, from a specific

same-sex friend, and for specific stressful events. Larose et al. (2002) extended these findings, showing that perceived security to parents predicted perceived social and emotional support, which were related to support-seeking as reported by students' peers.

In Larose's studies of students' help-seeking in a counselling relationship, attachment has been measured as both parental representations (Larose et al., 2001) and as representations of relationships with others in general (Larose et al., 1999, Study 2; Larose et al., 2001). These studies examined a selected sample of students in their first year of college who were invited to participate in a program for new students who were considered "at risk" due to low high school grades. Each student was paired with a teacher who served as a mentor (Larose et al., 1999) or counsellor (Larose et al., 2001; it is not clear from the descriptions in the articles if these programs were identical). Similar to the findings for perceived social support (Larose & Boivin, 1997, 1998), Larose et al. (2001) observed that parental representations were positively related to students' perceptions of counsellor sensitivity and support. Parental representations were also associated with students' reports of their own support-seeking, which was defined in terms of disclosure, proactive problem-solving in the counselling context, and comfort within the counselling relationship (Larose et al., 2001).

In addition to assessing security with respect to parents, Larose et al. (2001) also measured attachment in terms of general representations of others, yielding scores for avoidance and ambivalence (corresponding to preoccupied attachment style in Bartholomew's model). Students higher on both avoidance and ambivalence were less likely to seek help during sessions with their counsellors. Using the same measure of

avoidance and ambivalence, Larose et al. (1999) observed that both these insecure attachment patterns were predictive of a negative network orientation (i.e., help-seeking was seen as less desirable and effective). Further, network orientation was predictive of the help-seeking from mentors, in the form of self-disclosure. Vogel and Wei (2005) also examined counselling as the context for help-seeking, though for students not yet in a counselling relationship. This study differs from those by Larose et al. because attachment was measured in reference to romantic relationships, and also because it specified problems that were academic in nature. Similar to the reports by Larose et al. (1999; Larose et al., 2001), their findings showed that avoidant attachment was negatively associated with intentions to seek counselling for academic problems. In contrast to previously discussed findings, however, anxious attachment (highly correlated with Bartholomew's preoccupied style; Brennan et al., 1998) was positively related to help-seeking intentions.

In addition to investigation of attachment and help-seeking in the counselling context, Larose and his colleagues have assessed college students' self-reported tendencies to seek help for academic difficulties from both peers and teachers (Larose & Bernier, 2001; Larose et al., 1999, Study 1; Larose et al., 2001). As previously mentioned, Larose et al. (1999) found that attachment representations of others in general predicted network orientation. Outside of the counselling context the latter construct remained a predictor of help-seeking, in that students with a positive network orientation reported greater "quality of help-seeking", a latent factor which was composed of students' reports of their general tendencies both to seek help from teachers for learning difficulties and to disclose personal difficulties to teachers. Using attachment dimensions based on recollected childhood experiences and current relationships with parents, Larose and Bernier (2001) reported that students who were more dismissing were less likely to seek help in learning situations, from both teachers and peers, while students high on the preoccupied style tended to seek help from teachers only. In another study employing the same attachment measure but with categorical analyses, comparisons were made between students classified as secure and those classified in the two insecure categories (Larose et al., 2005). These results are not consistent with those of Larose and Bernier, since dismissing students reported a lesser tendency to seek help from teachers only, while preoccupied students reported a lesser tendency to seek help from peers but not from teachers (Larose et al., 2005).

Some help-seeking research in the academic domain has utilized Bartholomew's (1990; Griffin & Bartholomew, 1994a) four-prototype, two-dimensional model of attachment. Using categorical analyses, Lopez et al. (1998) found that students with a negative self-model (Preoccupied, Fearful) reported more personal problems (emotional, financial, and academic) than those with a positive self-model (Secure, Dismissing). For all students who reported a high number of problems, willingness to seek counselling for those problems was higher with a positive other-model (Secure, Preoccupied) versus a negative other-model (Fearful, Dismissing). Ognibene and Collins (1998) found that support-seeking was positively predicted by secure and preoccupied styles, and was also predicted by other- but not by self-models. These relationships were evident for both social and achievement stressors. In addition to the theoretical sophistication afforded by

the four-prototype, two-dimensional attachment model, the latter two studies extend the research conducted by Larose and his colleagues to include upper-year students, since every one of Larose's studies involved only participants who were in their first year of postsecondary school. Moreover, Larose's research concerning student-mentor and student-counsellor relationships (Larose et al., 1999; Larose et al., 2001) included only students who were assessed to be academically "at risk" coming out of high school into college, so they may not be representative of the general student population.

While all the studies of attachment and help-seeking reviewed herein have focused on the student population, they have not necessarily isolated academic problems when examining students' help-seeking behaviour. None of the research to date has specifically examined the role that attachment plays in the process of help-seeking for academic (rather than personal, social or financial) difficulties. In Larose et al. (2001), the authors refer to the program as *academic* counselling, presumably because the counsellors were teachers, but the support-seeking measure was worded in very general terms, with no specification of the type of difficulty for which support was being sought. Similarly, Larose et al. (1999) measured quality of help-seeking from teachers both as disclosure and as students' reports of their help-seeking tendencies for learning difficulties, but these variables were combined in the model, so attachment effects on help-seeking for academic problems in particular cannot be isolated. Given that attachment systems may operate differently in situations with a lesser emotional component, it is crucial that problem types are differentiated in research. Therefore, the

present study is isolating academic difficulties by assessing help-seeking intentions for specific hypothetical academic problems.

Goal Orientation and Academic Help-Seeking

Goal orientation refers not to the what of discrete goals that an individual sets (e.g., getting an A on the next midterm), but to the why of that individual's schema. Goal orientation determines how students approach tasks and evaluate their performance (Pintrich, 2000). The model used in the present study (Elliot & McGregor, 2001; Pintrich, 2000) includes four goal orientations that correspond to two dichotomous dimensions: definition and valence. Definition may be either mastery (a focus on absolute requirements of the task), or performance (a focus on normative comparison); valence may be positive (approaching success) or negative (avoiding failure). The resulting four goal orientations are: mastery-approach, mastery-avoidance, performance-approach, and performance-avoidance. The distinction between mastery and performance orientations is more or less the same across various models of goal orientation, though different terminology is used (see Pintrich & Schunk, 1996, for a review). It is Elliot's (1999; Elliot & McGregor, 2001) addition of the approach-avoidance dimension that lends superior theoretical sophistication and empirical utility to this particular model.

Various conceptualizations of goal orientation have been associated with college students' academic behaviours, such as the use of various cognitive or learning strategies (Elliot & McGregor, 2001; Karabenick, 2003; Pintrich & Garcia, 1991; Schraw, Horn, Thorndike-Christ, & Bruning, 1995). Help-seeking is a particular learning strategy that has been predicted by goal orientation. Several studies have revealed a relationship

between goal orientation and help-seeking behaviour among school-aged children (Arbreton, 1998; Newman, 1990; Ryan & Pintrich, 1997). For example, Ryan and Pintrich examined help-seeking indicators with seventh- and eighth-grade math students, using the task- and relative ability-goals distinction (corresponding to mastery and performance orientation, respectively), without the approach/avoidance dimension. The findings were that students who were high on relative-ability goals perceived high threat to their self-concept for help-seeking from both teachers and peers; conversely, task-goals were negatively associated with threat to self concept for help-seeking from teachers.

This finding has been extended to the college student population in a study involving students' achievement motivation and learning strategies within chemistry classes. Mastery-avoidance and both performance-approach and -avoidance orientations were positively related to avoidance of help-seeking, as well as to a sense of threat to self-esteem engendered by help-seeking. Additionally, help-seeking from a formal source (i.e., the chemistry instructor) was positively related to mastery-approach orientation (Karabenick, 2003). In another study, Pintrich and Garcia (1991) reported that undergraduate biology and social science students' reports of their help-seeking tendencies were more strongly related to intrinsic (similar to mastery) than to extrinsic (similar to performance) motivation. The present study extends and complements this research by examining help-seeking intentions for specific problems rather than helpseeking indicators (e.g., threat to self-esteem) or general academic help-seeking tendencies.

Predicting Help-Seeking with Attachment and Goal Orientation

Help-seeking, in attachment studies, has been measured as willingness to seek help (e.g., Lopez et al., 1998), disclosure in a counselling relationship (e.g., Larose et al., 2001), and perceived help-seeking tendencies (e.g., Larose et al., 1999). Some studies including attachment have not examined help-seeking as such, but have measured related variables such as social support expectations (Larose & Boivin, 1997). In the present study, help-seeking was measured as help-seeking intentions, which is simply more practical than measuring the behaviour itself. Measurement of help-seeking intentions allows an uncomplicated assessment of help-seeking tendencies for a range of problems and help sources, because the level of need is controlled by using hypothetical but realistic problems. Sheeran's (2002) meta-analysis reported an average correlation of .53 between intention and a variety of behaviours. As well, Ognibene and Collins (1998) found similar coping style response patterns for the real-life and hypothetical stressors included in their study. In order to improve the accuracy of measuring intentions as a proxy for behaviour, instructions for the help-seeking measure in this study included a brief "corrective entreaty", based on the one used by Ajzen, Brown, and Carvajal (2004). Ajzen et al. found that the intention-behaviour association was strengthened by first informing participants about people's tendency to overestimate their own likelihood of enacting a certain behaviour (in their study it was a vote to donate to a scholarship fund), and then asking them to indicate their intentions as if the situation was real.

The present study differs from most previous studies of attachment and helpseeking in the academic context because help-seeking is being examined *only* in reference to academic problems, as opposed to also including socioemotional difficulties. This is an important step in attachment research, in order to empirically validate Bowlby's (1969) assertion that "during adolescence and adult life a measure of attachment behaviour is commonly directed not only towards persons outside the family but also towards groups and institutions other than the family" (p. 207). Because of this narrowed focus on academic problems, it makes sense to bolster the prediction of helpseeking by including an academic variable, such as goal orientation. While attachment addresses the relational aspect of help-seeking, goal orientation should account for psychological forces specific to the academic context (i.e., achievement motivation) that would also affect a student's perception of the desirability of seeking help. To date, only one study could be found that investigated associations between attachment and goal orientation. Lopez (1997) reported that mastery orientation was not related to retrospective reports of early parent-child bonds, but that it was higher for students who were secure versus insecure in a current student-professor relationship. Given that the two operationalizations of attachment used by Lopez are not directly comparable to the present measure, no predictions concerning whether or not attachment and goal orientation are orthogonal were made in the present study.

Hypotheses

 Attachment and academic help-seeking. Given previous findings that secure attachment style is positively related to help-seeking in the academic domain (Larose et al., 1999; Larose et al., 2001; Larose et al., 2005; Larose & Bernier, 2001; Lopez et al., 1998; Ognibene & Collins, 1998; Vogel & Wei, 2005), it was hypothesized that secure attachment style would be associated with help-seeking intentions. No predictions were made for the other three attachment styles, since reports of previous research are mixed. It was also predicted that Lopez et al. (1998) and Ognibene and Collins' (1998) findings would be replicated for academic difficulties, such that negative other models would be associated with fewer help-seeking intentions than positive other models.

- 2. Goal orientation and help-seeking. Based on Karabenick (2003) and Pintrich and Garcia's (1991) findings, it was expected that mastery-approach goal orientation would predict more help-seeking intentions than the other three orientations, and that Karabenick's findings would be replicated, in that help-seeking from formal sources would be associated with both mastery- and performance-approach but not avoidance orientations.
- 3. Attachment and goal orientation as predictors of help-seeking. Given the research showing that help-seeking is predicted by both adult attachment and goal orientation, it was hypothesized that it would be better predicted by both constructs together than by either alone.

Method

Participants and Procedure

Surveys were completed by 201 undergraduate students, ranging in age from 18 to 42 years (M = 20.2; SD = 2.7); there were 96 (47.8%) men and 102 (50.7%) women (3 participants did not complete demographic information). Students reported having

completed between 2 and 95 courses¹ (M = 18.8, SD = 15.2). The distribution is skewed, as illustrated in Figure 1. Self-reported grade point average (GPA) had a mean of 3.02 (SD = .60), on a 4-point scale.

Survey distribution and collection took place during the last week of classes and the first week of exams in the Winter term. The researcher approached students in various areas across campus, and while an effort was made to recruit students in each academic building, most recruitment took place in the library and campus food court. Few participants were found in academic buildings, since most of them do not have large seating areas for students. Participants were offered two chances in a draw for a \$200 restaurant gift certificate, however, the vast majority of students agreed to participate without any mention of the incentive and learned of it only when they read the consent form.

The researcher approached students, and introduced herself as a graduate student in Psychology who was looking for undergraduate students to complete surveys. Students who agreed to participate were given (a) a consent form, (b) two raffle tickets, and (c) a survey package. Any students sitting in groups of two or more were asked to keep their responses independent by not discussing the surveys as they were being completed. The researcher then sat in a visible location away from the participants, who returned all materials after completion. Consent forms, raffle tickets, and completed survey packages were immediately filed separately, in order to ensure participants' anonymity.

¹ The majority of undergraduate programs at this institution are 4 years, with 2 semesters of 5 courses per year.

Measures

The survey package distributed to students included the three measures described below. The order of the measures in the survey packages was counterbalanced, so that every possible order occurred approximately the same number of times; furthermore, surveys were distributed in a counterbalanced order, so that identical survey packages were not completed by participants sitting together. Every survey package concluded with a page collecting demographic information, including sex, age, number of courses completed, and approximate cumulative grade average.

Relationship Scales Questionnaire. (RSQ; Griffin & Bartholomew, 1994a) The RSQ consists of 30 items, each rated on a 5-point scale anchored by *not at all like me* and *very like me* (Appendix A). Scores may be calculated for each of four attachment styles, by taking the mean of 4 or 5 items (depending on the attachment style; see Griffin & Bartholomew, 1994a, for details). Scores for the self- and other-models may then be calculated for each individual, from their attachment style scores: self-model = (secure + dismissing) – (preoccupied + fearful); other-model = (secure + preoccupied) – (dismissing + fearful). Griffin and Bartholomew (1994a) present data supporting convergent validity of the RSQ with other measures designed for this attachment model, including researcher ratings of interviews and self-report ratings of paragraphs describing each attachment style prototype. The construct validity of the four-prototype, twodimensional model has also been empirically demonstrated in two studies (Bartholomew & Horowitz, 1991; Griffin & Bartholomew, 1994b). Internal reliability of the prototype subscales has been reported as quite low (α s = .41–.70), but Griffin and Bartholomew (1994a) argue that it is a reflection of the fact that two orthogonal factors (self- and othermodel) have been combined.

Achievement Goal Questionnaire. (AGQ; Elliot & McGregor, 2001) The AGQ consists of 12 items embedded in a 21-item scale (obtained directly from A. Elliot, personal communication, February 11, 2006), each rated on a 7-point scale anchored by *not at all true of me* and *very true of me* (Appendix B). For the purpose of the present study, wording was altered slightly, to refer to "my classes" rather than "this class". For each individual, scores may be calculated for each of the four goal orientations. The scale was used by Elliot and McGregor to show empirical support for the 2×2 dimension (definition × valence) goal orientation model, through both exploratory and confirmatory factor analysis; over the course of three studies internal consistency for the subscales was never lower than $\alpha = .82$.

General Help-Seeking Questionnaire. (GHSQ; Wilson, Deane, Ciarrochi, & Rickwood, 2005) The GHSQ consists of a single statement that can be adapted to assess help-seeking intentions for many different problems: "If you were having [problem type], how likely is it that you would seek help from the following people?" The statement is followed by a list of help sources, including *no one*, and participants rate each help source on a 7-point scale anchored by *extremely unlikely* and *extremely likely* (Appendix C). For the present study, the word "people" at the end of the question was changed to "sources", because some of the help sources listed were not people (e.g., the Writing Centre). Wilson et al. reported internal consistencies no less than $\alpha = .70$, and test-retest reliabilities over a three-week period of at least .86. Wilson et al. demonstrated moderate

predictive validity of the GHSQ for actual help-seeking behaviour over the three weeks following test administration (rs = .17-.48). It is possible that predictive correlations were attenuated by low levels of actual experience of the problems, which was not measured. Nonetheless, in order to improve the validity of measuring intentions rather than behaviour, the GHSQ questions were preceded by a brief statement based on the conclusion of the corrective entreaty used by Ajzen, Brown, and Carvajal (2004), in order to reduce hypothetical bias.

The version of the GHSQ employed in the current study included five academic difficulties: (a) writing a paper, (b) understanding the textbook/readings for a course, (c) understanding the lecture content for a course, (d) preparing a presentation, and (e) managing your time. Possible help sources listed for each item were based on those included by Wilson et al. (2005) and the resources available to students on campus. All items had identical lists of help sources, except *writing a paper*, which included the addition of the Writing Centre. In order to maintain a manageable number of items, there are two cases in which several people were listed together as a possible help source because they shared key features. For example, *professor*, *TA* (teaching assistant), and *library staff* were grouped together because they are persons rather than centres but they are a part of the academic institution.

Results

Scoring and Scale Properties

Subscale scores for the RSQ and AGQ were calculated according to the authors' instructions, and sample means and standard deviations are provided in Table 1. For the

AGQ, participants' mean ratings were computed for each of the four goal orientations in the model, using the items specified by Elliot and McGregor (2001). For the RSQ, the four attachment prototype ratings were computed for each participant, as means of the subscale items specified by Griffin and Bartholomew (1994a). Subsequently, the attachment style scores were used to compute scores for internal working models of self and other, also according to Griffin and Bartholomew's (1994a) formulas. Participants' primary attachment styles were distributed as follows: 46% Secure, 28% Dismissing, 14% Preoccupied, and 10% Fearful (2% missing).

Internal consistency was not calculated for RSQ subscales, for the reasons cited in the scale description (see Method section). Internal consistency was calculated for each AGQ goal orientation subscale (Table 1). Goal orientation subscale reliabilities were acceptable with α s ranging from .70 to .93, though these were somewhat lower than those reported by Elliot and McGregor (2001).

Table 2 shows GHSQ descriptive statistics in a Problem Type × Help Source matrix, so that mean help-seeking intention ratings can be examined across either variable. Mean ratings ranged from 1.26 to 5.46 on the 7-point scale; the overall mean was 3.84, indicating that students in this sample were only moderately likely to seek help for the five academic problems included in the questionnaire. In order to determine if participants intended to seek help from different sources depending on the problem, a 2 (Sex) × 4 (Problem) × 5 (Help Source) mixed ANOVA was conducted, with Sex as a between-subjects variable and Problem and Help Source as within-subjects measures. The problem *writing a paper* was excluded from this analysis because it included a help

source that the other problems did not (i.e., Writing centre), and so the design would not have been balanced; ratings for No one were examined in a separate analysis. Of the three possible two-way interactions, Sex × Problem and Problem × Help Source were statistically significant (statistics for all interactions are presented in Table 3). The interaction of Problem × Help Source, depicted in Figure 2, indicates that students' pattern of help-seeking intentions across sources depended on the problem. One obvious variation in the pattern is that students indicated that they were most likely to seek help from a professor, TA, or library staff if they had difficulty understanding the content of a lecture; however, for all other problems the most highly rated help source was Partner, etc. As well, the difference between ratings for Partner etc. and all other help sources is substantially greater for difficulty managing time, compared to the other three problems. Also interesting is the interaction of Sex and Problem. Figure 3 compares men's and women's help-seeking intentions across problems and clearly illustrates that, while women had greater help-seeking intentions for three out of the four problems, they were as unlikely as men to seek help for time management difficulties. Main effects were evident for Sex, F(1, 195) = 7.06, p = .009, Problem, F(3, 585) = 244.86, p = .000, and Help Source, F(4, 780) = 114.14, p = .000, although each one was qualified by the interactions.

A second ANOVA was conducted on ratings for seeking help from No one, with Sex as a between-subjects factor and Problem as a within-subjects factor, this time with all five problems included. The main effect of Sex was significant, F(1, 195) = 535.92, p= .006, as was the main effect for Problem, F(4, 780) = 35.58, p = .000. In contrast to the results for help sources, the interaction of Sex and Problem was not statistically significant, F(4, 780) = 1.24, p = .294. Inspection of the means shows that men (M =2.75, SD = 1.69) reported being more likely than women (M = 2.16, SD = 1.28) to seek help from no one for these academic problems. Across problems, students indicated being most likely to seek help from no one for difficulties with time management (M = 3.40, SD = 2.46), and least likely to seek help from no one for difficulty with both understanding a lecture (M = 2.18, SD = 1.69) and preparing a presentation (M = 2.18, SD= 1.67; all means and standard deviations may be found in Table 2).

Attachment and Academic Help-seeking

In order to test the hypothesis that secure attachment style would predict helpseeking intentions, an initial correlational analysis was conducted (see Table 4). The relationship between secure attachment style and Overall Help-Seeking was nearsignificant² with a small effect size. Correlations were also computed between the insecure attachment styles and Overall Help-Seeking. A near-significant effect was present for preoccupied style, and a small, statistically significant effect was evident for fearful attachment. The latter result indicates that students high on ratings of fearfulness were slightly less likely to seek help for academic problems.

Correlational analyses were followed up with a regression on Overall Help-Seeking with Sex entered in the first block, and the four attachment styles entered in the second block. As previously indicated by the ANOVAs, Sex accounted for a significant

² For the sake of brevity, rather than report statistical data for all variables in all analyses, variables at p < .05 are reported as statistically significant, and variables at .05 are reported as near significance for the purpose of discussion.

portion of the variance in help-seeking intentions, $R^2 = .053$, F(1, 193) = 10.89, p = .001, with women (M = 4.03, SD = .81) intending to seek help more than men (M = 3.63, SD = .95). Attachment styles, however, did not add to the prediction of help-seeking intentions after the variance accounted for by Sex was removed, R^2 change = .040, F(4, 189) = 2.09, p = .084. Thus, not one of the attachment styles accounted for unique variance in help-seeking intentions at a statistically significant level. The preoccupied style was near significance, t(189) = 1.83, p = .068, and the relationship between fearful attachment style and help-seeking was no longer present when the effect of sex was controlled.

The prediction that internal working models of other would be positively related to help-seeking was tested by a correlational analysis, which indicated that more positive other-models were associated with greater intentions to seek help (Table 4). A regression on Overall Help-Seeking was conducted to further test the hypothesis, with Sex and Other Model entered in the first block and the Sex × Other Model interaction entered in the second block. In addition to the effect of Sex, internal working model of other accounted for unique variance in help-seeking intentions, t(192) = 2.66, p = .009. There was no interaction of Sex and Other Model, R^2 change = .007, F(1, 191)= 1.53, p = .218. So, regardless of sex, students in this study were more likely to seek help for their academic problems if they viewed others as generally caring and responsive.

Previous studies have found different associations between attachment and helpseeking, depending on whether teachers or peers were the help source (Larose & Bernier, 2001; Larose et al., 2005). Therefore, exploratory regressions on help-seeking intentions for *Professor, etc.* and *Partner, etc.* (averaged across the five problems) were conducted
with the current data. For both regressions, Sex was entered in the first block, and the four attachment styles were entered in the second block. In the case of Professor, etc., Sex did not predict help-seeking intentions at a statistically significant level, $R^2 = .014$, F(1, 193) = 2.75, p = .099. Furthermore, attachment styles did not add to predicted variance in help-seeking after Sex was entered, R^2 change = .040, F(4, 189) = 2.00, p = .096. For prediction of help-seeking intentions for Partner, etc., Sex predicted variance in help-seeking, $R^2 = .046$, F(1, 193) = 9.35, p = .003. In this case, attachment style added to the variance predicted by Sex, R^2 change = .056, F(4, 189) = 2.94, p = .022, and secure attachment style was the only one that accounted for unique variance, t(189) = 2.27, p = .024. It appears that, within this sample, attachment style did not influence students' intentions to seek help from a professor, teaching assistant, or library staff, but that securely attached students were more likely to seek help from peers and family.

Goal Orientation and Academic Help-seeking

The hypothesis that mastery-approach goal orientation would predict more helpseeking intentions than any of the other three orientations was first addressed by computing correlations between the four goal orientations and Overall Help-Seeking. Mastery-Approach orientation had a small to moderate positive association with helpseeking intentions, and Performance-Avoidance was also related to help-seeking intentions but with a smaller effect size than Mastery-Approach (Table 4). This initial analysis suggests that mastery-approach was the strongest predictor of help-seeking intentions among the four goal orientations.

Two regressions on Overall Help-Seeking were conducted to further test this hypothesis. Given that the sample comprised students at various stages of undergraduate education, the variable Courses³ (i.e., number of courses completed) was included in order to rule out any effect that academic experience may have on students' achievement motivation. In the first analysis, Sex and Courses were entered in the first block and the four goal orientations were entered in the second block. Courses did not significantly account for variance in help-seeking intentions, t(190) = -.66, p = .511. The second block containing the four goal orientations added to the predicted variance in help-seeking intentions, R^2 change = .053, F(4, 186) = 2.73, p = .03; no single goal orientation predicted unique variance at a statistically significant level, but mastery-approach orientation was near significance, t(186) = 1.85, p = .066. In the second regression analysis testing this hypothesis, the same variables were included in each block, but with stepwise inclusion of the four goal orientations in the second block. The only goal orientation that was retained in the model was mastery-approach, R^2 change = .031, F(1, R)(189) = 6.31, p = .013, hence, mastery-approach was the single best predictor of helpseeking intentions among the four goal orientations tested. These analyses indicate that at least some of the variance shared by mastery-approach with the other orientations is also common to help-seeking intentions. Nonetheless, since the effect size is greater when all four orientations are included in the model, it appears that it was a student's *profile* of goal orientations that best predicted likelihood of seeking help.

³ Age and Courses were highly correlated, r(N = 194) = .70, p < .001, and although Courses is a less reliable variable, it was included instead of age because it is much more likely to be associated with academic experience.

In order to test the hypothesis that mastery- and performance-approach orientations would predict help-seeking from formal sources, the variable *Formal Sources* was created by calculating each participant's mean response across all five academic difficulties, for all help sources formally associated with the university institution (i.e., Professor, etc., Learning skills instructor, Subject help centre, Writing centre). In correlational analyses, intentions to seek help from formal sources were predicted at a statistically significant level by mastery-approach orientation, and by performance-approach orientation at near-significance. Contrary to expectations, formal help-seeking intentions were also positively associated with both mastery- and performance-avoidance orientations.

A regression on Formal Sources was also conducted, with Sex and Courses entered in the first block and the four goal orientations entered in the second block. The first block predicted variance in help-seeking intentions for formal sources, $R^2 = .039$, F(2, 190) = 3.89, p = .022; as with overall help-seeking, Sex predicted unique variance, t(190) = 2.38, p = .18, while Courses did not, t(190) = -1.52, p = .129. Goal orientations added to the predicted variance in help-seeking intentions for formal sources, R^2 change = .071, F(4, 186) = 3.72, p = .006. Mastery-approach orientation was the only single orientation that accounted for unique variance, t(186) = 2.15, p = .033. This result lends partial support to the hypothesis, suggesting that students who reported that they strive to learn and do well at academic tasks were most likely to exhibit adaptive help-seeking for academic problems by availing themselves of more knowledgeable help sources.

Attachment and Goal Orientation

A regression on Overall Help-Seeking was conducted to test the combined effect of attachment and goal orientation for predicting help-seeking intentions, with Sex and Courses entered in the first block, the two internal working models entered in the second block, and the four goal orientations in the third block. Internal working models were entered first because, theoretically, they should operate across various contexts, whereas goal orientations are context-specific. Internal working models predicted unique variance after that accounted for by Sex and Courses was removed, R^2 change = .032, F(2, 190) =3.26, p = .041. Internal working model of self did not significantly account for variance in help-seeking intentions, but internal working model of other did, t(186) = 2.45, p =.015. Goal orientations added to the predicted variance after internal working models had been entered, R^2 change = .054, F(4, 182) = 2.82, p = .027. As with previous analyses, no single goal orientation predicted unique variance, but mastery-approach was near significance, t(182) = 1.75, p = .083.

Correlations between internal working models and goal orientations are presented in Table 5. The only significant internal working model-goal orientation relationship is between self-model and mastery-avoidance orientation, r(N = 199) = -.191, p = .007, therefore, internal working models and goal orientation are mainly additive as joint predictors of help-seeking intentions. This is reflected in that when the preceding regression analysis was repeated with goal orientations entered before working models, the results were virtually the same. Thus, though effect sizes are small, the results of this final analysis suggest that the prediction of help-seeking for academic problems can be improved by accounting for multiple factors that influence students' decisions to seek help.

Discussion

Sample Characteristics

Overall, students reported a moderate likelihood of seeking help for the academic problems included in this study. Most of the academic help-seeking studies reviewed earlier in this paper either did not include overall descriptive data for help-seeking measures, or the measures used were not comparable to the current measure of helpseeking intentions. Where comparisons are possible, the present findings appear to be consistent with prior research in that students in Larose al.'s (2005) study reported helpseeking tendencies that were moderate overall, and Vogel and Wei's (2005) findings reflect that students' intentions to seek counselling for academic problems were also in the moderate range of their scale. Sex differences emerged in the present study for the overall likelihood of seeking help, with women indicating higher intentions than men. This was not surprising, given that a number of studies have found that women are more likely than men to seek help (Lopez et al., 1998; Meissen, Warren, & Kendall, 1996; Morgan, Ness, & Robinson, 2003; Ognibene & Collins, 1998; Skaalvik & Skaalvik, 2005). In the present study, the effect of sex depended on the problem with which students were presented, in that the sex difference did not exist for students' intentions to seek help if they were having difficulty managing time.

Attachment data reveals that approximately half of participants had a secure primary attachment style, which is similar to the findings of other studies that have included the four-prototype attachment model (Bartholomew & Horowitz, 1991; Ognibene & Collins, 1998; Scharfe & Bartholomew, 1994). The proportion for preoccupied attachment style also falls into the expected range, but the proportion for fearful style is somewhat low and for dismissing style it is somewhat high. Comparison of the current and previously-reported ratings for the four goal orientation scales reveals that both mastery orientations are comparable with Elliot and McGregor (2001), but performance-approach was lower, and performance-avoidance was slightly higher. A particular concern with this measure was the low internal consistency of several subscales. Despite this and other limitations (addressed in detail below), some interesting results have been found in this study, and there are several directions that future research may take to build upon these findings.

Attachment and Academic Help-Seeking

The hypothesis that secure attachment would be the best predictor of help seeking was not supported; in fact, none of the attachment categories was significantly related to help-seeking intentions (when the effect of sex was controlled). This differs from prior findings for non-academic help-seeking within the social network (DeFronzo et al., 2001; Larose et al., 2002). More importantly, the present findings are not consistent with reports of the relationship between attachment and academic help-seeking (Larose & Bernier, 2001; Larose et al., 2005; Ognibene & Collins, 1998). However, the effect of the preoccupied style was near significance, which resembles previous findings that students with a more preoccupied attachment style were more likely to seek help when experiencing difficulty (Ognibene & Collins, 1998).

Examination of the results of previous studies suggests that differences between attachment styles may exist for the preferred help source, rather than simply for overall help-seeking. For example, Larose and Bernier (2001) reported that dismissing tendencies were inversely related to help-seeking for both teacher and peers, but preoccupied tendencies were inversely related to help-seeking for teachers only. Conversely, Larose et al. (2005) found that dismissing students reported more difficulty seeking help from teachers (compared to autonomous students) and preoccupied students reported less help-seeking from peers (compared to autonomous students). Thus, it is possible that differences in help-seeking across attachment styles are moderated by the help source. Among studies that included multiple help sources, one exception is DeFronzo et al., who found no between-group differences for preferred help source. Exploratory analyses run on the present data revealed that attachment styles were not predictive of help-seeking from professors, teaching assistants, and library staff. On the other hand, students' help-seeking from friends and family was predicted by secure attachment style. The differences between these two studies could be reflective of different sample characteristics, or result from different measures being used for both attachment and help-seeking. Given the mixed results from extant research and the present study, more research is clearly required in order to elucidate the relationship between attachment style and preferred help source.

As predicted, internal working model of other was positively related to helpseeking intentions; moreover, this relationship was not moderated by sex, even though women were more likely to seek help than men. This confirms the finding of Lopez et al.

(1998) that among students reporting high levels of problems (including emotional, financial, academic), those with negative internal working models of other (i.e., dismissive, fearful) were less willing to seek counselling than those with positive other models (i.e., secure, preoccupied). It also replicates Ognibene and Collins' (1998) finding that other-model positivity predicted more help-seeking, even after the effect of sex was held constant.

The fact that the present study indicated a relationship between other-model and help-seeking, but not any of the attachment styles and help-seeking is curious. Since a more negative model of other predicted less help-seeking, it would make some sense that the attachment styles with negative other models (i.e., fearful and dismissing) would be associated with less help seeking, particularly given that Lopez et al. (1998) utilized categories of attachment rather than the actual working model scores. One explanation for this incongruity, at least for the dismissing pattern, is that a sufficiently positive selfmodel will compensate for a negative other-model. But what might explain the lack of association in the present study (at least after controlling for sex), between fearful attachment style and help-seeking? Griffin and Bartholomew (1994a) argue that the constellation of behavioural patterns and motivations associated with each attachment style is not merely an additive property of the two underlying models; it is an individual's profile of attachment styles, not simply the primary style, which determines behaviour. Accordingly, the theoretical explanation may be that, as suggested by Griffin and Bartholomew, the persons in this study who had high fearful scores may have also been high on another style. This may have attenuated the relationship between other-model

and help-seeking. Of the 21 participants who had a fearful primary attachment style, the distribution of secondary attachment styles was 6 secure, 4 preoccupied, and 12 dismissing (one participant had equal secure and dismissing scores). The mean difference between fearful scores and the secondary attachment style score was only .40, thus, secondary attachment styles may have been sufficiently powerful to influence help-seeking tendencies. The importance of secondary attachment styles may be a fruitful topic for continued research, in order to clarify how, among persons with the same primary attachment style, different secondary attachment styles are related to variables such as emotional adjustment and interpersonal behaviours.

Measurement of help-seeking intentions may be too artificial to access true behavioural tendencies in reference to attachment. Since attachment systems are thought to be activated by the experience of stress (Bowlby, 1973), in the absence of stress, students may *intend* to behave in a way that they would not behave when stress is present. On the other hand, previous studies are characterized by a lack of control of the type, severity, and/or experience of problems. Some of the work of Larose and his colleagues (Larose et al., 1999; Larose et al., 2001) seems to be based on the assumption that, because their participants had been identified as "at-risk" (because of low high school grades), they necessarily had problems to talk about in counselling sessions. What is more, the study conducted by Larose et al. (2001) took place in the academic context, but the counselling sessions were unstructured, and were not focussed on specific problems. In addition, there was no control or tracking of whether the problems addressed were personal, financial, social, or academic. By measuring help-seeking

intentions and instructing participants to respond as if the problems were real, experience of difficulty is held constant so that the measure of help-seeking is not dependent on whether or not participants are actually experiencing academic difficulty. This means that the previously demonstrated relationship between self model and reported problem level (Lopez et al., 1998) is precluded. Future studies of attachment and academic help-seeking could employ a method similar to that of Wilson et al.'s (2005) validation of the GHSQ, in order to assess the intention-behaviour association relative to current stress levels. Wilson et al. took a retrospective assessment of actual help-seeking for the period of 3 weeks following administration of the GHSQ, thus allowing them to estimate the intention-behaviour consistency for the problems under scrutiny.

Another issue related to the study of attachment processes is the definition or operationalization of attachment that is employed. Some extant help-seeking research has measured attachment in reference to parents rather than current relationships, and researchers using these measures have drawn connections between parental attachment and aspects of current interpersonal relationships. Larose et al. (2001) reported that positive parental representations were predictive of perceived counsellor sensitivity, and suggest that their results indicate that representations of parents may be extrapolated to non-attachment figures. These authors also propose that this effect in their study may have been due to the relational similarities between the parental and counselling context. If that is the case, then attachment systems are likely to be activated by some help sources more than others. This argument is not necessarily supported by other research, though, since only one of Lopez's (1997) four parental attachment measures was related to

students' relationship style with professors. Lopez asserts that this may be due to revision of relationship schemas over time. The fact that attachment is influenced by many familial and nonfamilial relationships through development (Bowlby, 1969) is one reason why assessment of current attachment styles in the present study may be more appropriate for persons in their late adolescence. Lopez suggests measuring both parental and current attachment patterns in order to assess their interrelations with current relationship dynamics. Bartholomew (1990) argues that a purely developmental perspective of adult attachment assessment is lacking because romantic and non-romantic peer relationships will also have a profound effect on current attachment style. In sum, the results of the present study suggest that attachment is related to help-seeking in contexts other than intimate relationships, and for more than just emotional problems; nonetheless, this relationship may not be evident for all dimensions or operationalizations of attachment.

Goal Orientation and Academic Help-Seeking

Some support was found for the hypothesis that mastery-approach would be the best predictor of help-seeking intentions among the four goal orientations. Masteryapproach had the strongest relationship with help-seeking intentions when assessed with bivariate correlations. On the other hand, when all four orientations were entered into the regression model following sex and courses, the total predicted variance was significantly increased, but no single orientation predicted unique variance at a statistically significant level (though mastery-approach was close to significance). The power to detect an effect of mastery-approach orientation may have been affected by the somewhat low reliability of that subscale. When the four orientations were entered in a stepwise procedure, however, mastery-approach was the only variable retained as a predictor. The results of the first regression analysis may suggest that it is a person's goal orientation *profile*, rather than a particular dominant orientation that will determine that person's likelihood of seeking help for academic problems; but the second analysis indicates that if one goal orientation is to be used as a predictor of help-seeking for academic problems, as has been done by some researchers (e.g., Lopez, 1997), then mastery-approach seems to be the best choice. Relations in the current study may not directly mirror prior findings, because Karabenick (2003) measured help-seeking avoidance, which is not necessarily the inverse of help-seeking intentions. It is also likely that with the small effect sizes in the present study, the sample was not sufficiently large to afford enough power to detect real (albeit small) effects.

Partial support was obtained for the hypothesis that approach but not avoid orientations would be associated with more intentions to seek help from formal sources. Correlational data were not consistent with this prediction. However, when sex was held constant, mastery-approach, but not performance-approach, was positively associated with students' help-seeking intentions for formal sources. Differences between results of the present study and those found by Karabenick (2003) may be related to sample characteristics. Karabenick acknowledges that his sample, being composed of upper-year chemistry students, is made up of motivated and successful students, and that his results may not generalize to students in less selective samples and those in other subject areas. The present sample is composed of a mix of students from different faculties and subject

areas, with an average GPA of 3.02 (compared to an average GPA of 3.34 in Karabenick's sample). A rough estimate of the effect size of the difference between these two sample GPAs is d = .53, which is a moderate difference (Cohen, 1992; calculated with only the present sample standard deviation because Karabenick did not report it for his sample). Given that effect sizes for predicting help-seeking were moderate at best in both the present study and Karabenick's, the moderate difference in GPA may be important. As well, Karabenick's (2003) analyses did not include sex as a variable. Considering the association between sex and help-seeking found in the present study and in others (Lopez et al., 1998; Meissen et al., 1996; Morgan et al., 2003; Ognibene & Collins, 1998; Skaalvik & Skaalvik, 2005), the fact that it was omitted from Karabenick's analyses makes comparisons between his and the present data tenuous. The current findings resemble those of Skaalvik and Skaalvik (2005) with a sample of adult high school mathematics students; the simple correlation between task (i.e., mastery) orientation and help-seeking was no longer significant when they computed a model that included sex as an initial predictor (though the relationship between sex and task orientation was mediated by math self-concept). Taking into consideration the disparate results between the current study and Karabenick's report and the established sex difference for help-seeking, perhaps future studies should examine paths to help-seeking separately for male and female students. Clearly, conclusions cannot be made about the relationship between goal orientation and help-seeking with postsecondary students until more research has been conducted with that population.

Attachment and Goal Orientation

The hypothesis that attachment and goal orientation would predict help-seeking better together than either alone was supported. These constructs are evidently almost entirely complementary in the prediction of help-seeking intentions for academic problems, in that there was very little overlap in the variance predicted by each construct. This finding suggests that prediction of help-seeking behaviour must take into account both the driving socioemotional forces within an individual, and the context-specific motivational forces.

Although the interrelatedness of attachment and goal orientation was minimal in the current study, it is consistent with Lopez's (1997) findings. He reported that students with typically secure relationships with professors reported higher mastery learning attitudes, and in the present study, the only goal orientation that was related to attachment constructs was mastery-avoidance (Table 5). Although this comparison between studies must be made cautiously because Lopez's measure of security in student-professor relationships is an extrapolation of attachment constructs, it still indicates a relationship between adult attachment and goal orientation. Given that there has not been much study of the 2×2 goal orientation model with university students or of the relationship between goal orientation and attachment, additional research using the approach-avoidance distinction for mastery goal orientation would be beneficial in clarifying the relationship with attachment that is indicated by both the present results and Lopez's findings.

Another possibility for ongoing examination of attachment processes in postsecondary education is that attachment may also be related in meaningful ways to

academic attitudes and behaviours other than goal orientation, such as quality of attention and exam preparation (Larose et al, 2005). Extension of the present research including other important variables (e.g., instructors' goal orientations) may reveal mediators and/or moderators in the interrelationship of attachment, goal orientation and academic help-seeking. Inclusion of an anxiety measure, for example, may be warranted, given that anxiety is associated with both attachment (e.g., Larose & Boivin, 1997; Lopez, Mauricio, Gormley, Simko, & Berger, 2001) and academic processes (e.g., Chamorro-Premuzic & Furnham, 2003). Use of structural equation modelling, as in other attachment studies (e.g., Larose et al., 1999), may more accurately reflect the complex psychological processes that lead to students' decisions to seek help.

The relationship between attachment and academic help-seeking is likely to be more complicated than the analysis conducted in the present study, and future studies should include multiple indicators of academic help-seeking, such as threat to self-esteem (Karabenick, 2003). Additionally, it may be that attachment constructs predict the *type* of help-seeking that students employ. The same argument has been made for studying goal orientation and help-seeking (Arbreton, 1998), with a distinction drawn between instrumental and executive help-seeking; instrumental help-seeking is characterized by requests for hints and explanations, whereas executive help-seeking usually involves asking for a direct solution (Nelson-Le Gall, 1985). For instance, mastery-approach orientation has been linked to greater tendency to seek instrumental help, while masteryavoidance and performance orientations (particularly performance-avoidance) have been associated with preference for executive help-seeking (Karabenick, 2003; Karabenick &

Knapp, 1991). Skaalvik and Skaalvik (2005) note the limitation of their study of attachment and coping styles in not differentiating between these two modes of academic help-seeking. Therefore, subsequent studies including attachment and goal orientation would benefit from using measures of adaptiveness of help-seeking, rather than simply the incidence of help-seeking.

Caveats and Limitations

Some issues of measurement must be acknowledged in regards to this study. Firstly, all data were derived from self-report measures. Future studies may benefit from using external ratings of some variables (e.g., interviews), because Griffin and Bartholomew (1994b) found that shared method variance for self-reports substantially attenuated the relationship between self-model and self-esteem. Secondly, some internal reliability scores are lower than ideal, particularly for the mastery-approach subscale. Given that mastery-approach is the goal orientation that shows the most relations with academic help-seeking, achieving greater reliability would afford more confidence in conclusions being made from the data and more power for detecting small effects. Thirdly, it is suspected that the reliability is low for the reported number of courses completed, because surveys were administered at the end of a term and the question did not specify whether or not students should include their courses which were just coming to an end at that time. This may have been related to that variable's non-significance as a predictor. It would be hasty to conclude that academic experience has no bearing on students' help-seeking, particularly since it has been implicated as a factor for other academic behaviours; for example, students in their final undergraduate year have

reported utilizing library internet resources much more than students in their first undergraduate year (Callinan, 2005).

The correlational design of the study means that causation cannot be inferred. It is certainly possible that a third variable (perhaps some aspect of socialization of academic norms) could explain the interrelations found between the variables in the present study. For example, through early play interactions, parents may convey to their children that learning is fun and inherently rewarding (similar to mastery orientation), and that it is good to ask for help when having difficulty. By providing help when children request it, parents foster a sense that others will be responsive to such requests (as in a positive other-model). In this example, it would be the parental style of play that fosters goal orientation, tendency to seek help, and a positive working model of others; if these principles are applied by the child during early school experiences and are reinforced, then they may persevere through to postsecondary studies.

Measurement of behavioural intentions rather than the behaviour itself was beneficial because it provided a controlled set of problems rather than having a unique set of problems for each participant (Ognibene & Collins, 1998). It is possible, however, that the relationship between help-seeking intentions and behaviour may be weak. The effectiveness of the brief corrective entreaty was not tested prior to its inclusion in the current study, nor does it appear that Ajzen et al.'s (2004) extensive corrective entreaty has been subsequently tested. An interesting direction for future study may be to test the effects of various forms of Ajzen et al.'s corrective entreaty and in different contexts, in order to determine if it should be a more frequent addition to self-report measures.

Finally, it is important to note that where regressions showed prediction of academic help-seeking, effect sizes were quite small. While small statistical effect size is not necessarily indicative of little practical importance, it points to the need for continued investigation of the factors that influence postsecondary students' help-seeking tendencies. As suggested above, more sophisticated models need to be developed and tested, including examination of mediator and moderator effects. In addition to individual differences variables such as attachment and goal orientation, environmental variables could also be considered, such as instructors' emphasis on independent learning, and structure of academic programs (e.g., many courses are taken with the same classmates or students all have different schedules). Institutional attachment (i.e., students' feeling of connectedness to their school institution) may be an important variable to consider, since it has been associated with mastery learning orientation (Lopez, 1997).

Future Directions

In addition to the research directions suggested throughout the discussion of present results, alternative designs and operationalizations of the three variables under study are indicated. As working models of other, but not attachment styles themselves, have been implicated in the present study, more examination is warranted in order to clarify the differential relations of attachment styles and working models with helpseeking in the academic domain. One direction that may be fruitful is to directly compare help-seeking for socioemotional and academic problems, because it may be that different aspects of attachment are important in those two domains. Continued application of Bartholomew's (1990; Griffin & Bartholomew, 1994a) four-prototype, two-dimensional

model of attachment will allow researchers the flexibility to examine different operationalizations of attachment. Ognibene and Collins (1998) argue that the distinction of the two avoidant types in the four-prototype attachment model may reveal differences in coping style with more detail. Whenever possible, it would be advisable to follow Griffin and Bartholomew's (1994b) recommendation that self-report assessment of attachment patterns is validated using interview procedures (e.g., Bartholomew & Horowitz, 1991).

Students' perceptions of the educational environment also appear to play an important role in academic outcomes. Church, Elliot, and Gable (2001) report that undergraduate students' perceptions of their course as engaging and learning-focused (rather than evaluation-focused) influenced their goal orientation for that course, which then influenced graded performance in the course. More pertinent to the present study is that Karabenick (2004) found that perceived classroom goal structure predicted helpseeking after students' dispositional goal orientation had been controlled. A longitudinal model measuring dispositional goal orientations later in the term may offer a more clear picture of how goal orientation is related to academic help-seeking. Moreover, understanding the relative contributions of individual disposition and environmentallyinfluenced goals could inform teaching practices.

Ognibene and Collins (1998) examined multiple coping methods for dealing with social and academic stressors. In addition to distinguishing between types of help seeking, as previously mentioned, it would be interesting to examine the pattern of

multiple coping strategies for academic difficulties predicted by attachment and goal orientation. With multiple coping strategies included, some interaction of attachment and goal orientation may be observed. A conjecture worth investigating is Ognibene and Collins' suggestion that secure individuals may be afforded more *flexibility* in their use of coping strategies, because they have strong resources both personally and socially.

Results of this study are by no means conclusive, owing to small effect sizes and findings that are inconsistent with extant research. However, the present study reinforces the existence of connections between academic help-seeking and both attachment and goal orientation. These relationships cannot yet be articulated with great confidence. It is necessary for researchers to clarify the dispositional and environmental factors that affect students' help-seeking behaviour. As researchers continue to define the dispositional and environmental influences on postsecondary students' help-seeking behaviour, the body of research may inform educational practices at both the classroom and institutional levels, in order to foster students' academic development.

- Ainsworth, M. D. S., & Bowlby, J. (1991). An ethological approach to personality development. American Psychologist, 46, 333-341.
- Ajzen, I., Brown, T. C., & Carvajal, F. (2004). Explaining the discrepancy between intentions and actions: The case of hypothetical bias in contingent valuation. *Personality and Social Psychology Bulletin*, 30, 1108-1121.
- Arbreton, A. (1998). Student goal orientation and help-seeking strategy use. In S. A.
 Karabenick (Ed.), *Strategic help seeking: Implications for learning and teaching* (pp. 95-116). Mahwah, NJ: Lawrence Erlbaum.
- Bartholomew, K. (1990). Avoidance of intimacy: An attachment perspective. Journal of Social and Personal Relationships, 7, 147-178.
- Bartholomew, K., & Horowitz, L. M. (1991). Attachment styles among young adults: A test of a four-category model. *Journal of Personality and Social Psychology*, 61, 226-244.
- Bernier, A., Larose, S., Boivin, M., & Soucy, N. (2004). Attachment state of mind: Implications for adjustment to college. *Journal of Adolescent Research*, 19, 783-806.

Bowlby, J. (1969). Attachment and loss: Vol. 1. Attachment. London: Hogarth Press.

- Bowlby, J. (1973). Attachment and loss: Vol. 2. Separation: Anxiety and anger. London: Hogarth Press.
- Bowlby, J. (1980). Attachment and loss: Vol. 3. Loss: Sadness and depression. London: Hogarth Press.

- Brennan, K. A., Clark, C. L., & Shaver, P. R. (1998). Self-report measurement of adult attachment: An integrative overview. Attachment theory and close relationships (pp. 46-76). New York: Guilford Press.
- Callinan, J. E. (2005). Information-seeking behaviour of undergraduate biology students: A comparative analysis of first year and final year students in University College Dublin. *Library Review*, 54, 86-99.
- Chamorro-Premuzic, T., Furnham, A. (2003). Personality traits and academic exam performance. *European Journal of Personality*, 17, 237-250.
- Church, M. A., Elliot, A. J., & Gable, S. L. (2001). Perceptions of classroom environment, achievement goals, and achievement outcomes. *Journal of Educational Psychology*, 93, 43-54.
- Codd, R. T., III, & Cohen, B. N. (2003). Predicting college student intention to seek help for alcohol abuse. *Journal of Social and Clinical Psychology*, 22, 168-191.

Cohen, J. (1992). A power primer. Psychological Bulletin, 112, 155-159.

- Collins, N. L., & Feeney, B. C. (2000). A safe haven: An attachment theory perspective on support seeking and caregiving in intimate relationships. *Journal of Personality and Social Psychology*, 78, 1053-1073.
- DeFronzo, R., Panzarella, C., & Butler, A. C. (2001). Attachment, support seeking, and adaptive inferential feedback: Implications for psychological health. *Cognitive* and Behavioral Practice, 8, 48-52.

- Dozier, M., & Tyrrell, C. (1998). The role of attachment in therapeutic relationships. *Attachment theory and close relationships* (pp. 221-248). New York: Guilford Press.
- Elliot, A. J. (1999). Approach and avoidance motivation and achievement goals. *Educational Psychologist, 34*, 169-189.
- Elliot, A. J., & McGregor, H. A. (2001). A 2 × 2 achievement goal framework. Journal of Personality and Social Psychology, 80, 501-519.
- George, C., Kaplan, N., & Main, M. (1996). Adult Attachment Interview (3rd ed.). Unpublished manuscript, University of California, Berkley.
- Griffin, D. W., & Bartholomew, K. (1994a). The metaphysics of measurement: The case of adult attachment. In K. Bartholomew & D. Perlman (Eds.), Advances in personal relationships: Vol. 5. Attachment processes in adulthood (pp. 17-52).
 Philadelphia, PA: Jessica Kingsley.
- Griffin, D., & Bartholomew, K. (1994b). Models of the self and other: Fundamental dimensions underlying measures of adult attachment. *Journal of Personality and Social Psychology*, 67, 430-445.
- Hazan, C., & Shaver, P. (1987). Romantic love conceptualized as an attachment process. Journal of Personality and Social Psychology, 52, 511-524.
- Karabenick, S. A. (2003). Seeking help in large college classes: A person-centred approach. Contemporary Educational Psychology, 28, 37-58.
- Karabenick, S. A. (2004). Perceived achievement goal structure and college student help seeking. *Journal of Educational Psychology*, 96, 569-581.

- Karabenick, S. A., & Knapp, J. R. (1988). Help-seeking and the need for academic assistance. *Journal of Educational Psychology*, 80, 406-408.
- Karabenick, S. A. & Knapp, J. R. (1991). Relationship of academic help seeking to the use of learning strategies and other instrumental achievement behavior in college students. *Journal of Educational Psychology*, 83, 221-230.
- Kenny, M. E., & Rice, K. G. (1995). Attachment to parents and adjustment in late adolescent college students: Current status, applications, and future considerations. *The Counseling Psychologist*, 23, 433-456.
- Knapp, J. R., & Karabenick, S. A. (1988). Incidence of formal and informal academic help-seeking in higher education. *Journal of College Student Development*, 29, 223-227.
- Larose, S., & Bernier, A. (2001). Social support processes: Mediators of attachment state of mind and adjustment late in adolescence. *Attachment and human development*, *3*, 96-120.
- Larose, S., Bernier, A., Soucy, N., & Duchesne, S. (1999). Attachment style dimensions, network orientation and the process of seeking help from college teachers. *Journal of Social and Personal Relationships*, 16, 225-247.
- Larose, S., Bernier, A., & Tarabulsy, G. M. (2005). Attachment state of mind, learning dispositions, and academic performance during the college transition. *Developmental Psychology*, 41, 281-289.

- Larose, S. & Boivin, M. (1997). Structural relations among attachment working models of parents, general and specific support expectations, and personal adjustment in late adolescence. *Journal of Social and Personal Relationships*, 14, 579-601.
- Larose, S. & Boivin, M. (1998). Attachment to parents, social support expectations, and socioemotional adjustment during the high school—college transition. *Journal of Research on Adolescence*, 8, 1-27.
- Larose, S., Boivin, M., & Doyle, A. B. (2001). Parental representations and attachment style as predictors of support-seeking behaviors and perceptions of support in an academic counseling relationship. *Personal Relationships*, 8, 93-113.
- Larose, S., Guay, F., & Boivin, M. (2002). Attachment, social support, and loneliness in young adulthood: A test of two models. *Personality and Social Psychology Bulletin*, 28, 684-693.
- Lopez, F. G. (1997). Student-professor relationship styles, childhood attachment bonds and current academic orientations. *Journal of Social and Personal Relationships*, 14, 271-282.
- Lopez, F. G., Mauricio, A. M., Gormley, B., Simko, T., & Berger, E. (2001). Adult attachment orientations and college student distress: The mediating role of problem coping styles. *Journal of Counseling and Development*, 79, 459-464.
- Lopez, F. G., Melendez, M. C., Sauer, E. M., Berger, E., & Wyssmann, J. (1998). Internal working models, self-reported problems, and help-seeking attitudes among college students. *Journal of Counseling Psychology*, 45, 79-83.

- Meissen, G., Warren, M. L., & Kendall, M. (1996). An assessment of college student willingness to use self-help groups. *Journal of College Student Development*, 37, 448-456.
- Mikulincer, M., & Florian, V. (1995). Appraisal of and coping with a real-life stressful situation: The contribution of attachment styles. *Personality and Social Psychology Bulletin*, 21, 406-414.
- Morgan, T., Ness, D., & Robinson, M. (2003). Students' help-seeking behaviours by gender, racial background, and student status. *Canadian Journal of Counselling*, 37, 151-166.
- Nelson-Le Gall, S. (1985). Help-seeking behavior in learning. Review of Research in Education, 12, 55-90.
- Newman, R. S. (1990). Children's help-seeking in the classroom: The role of motivational factors and attitudes. *Journal of Educational Psychology*, 82, 71-80.
- Newman, R. S. (1991). Goals and self-regulated learning: What motivates children to seek academic help? In M. L. Maehr, & P. R. Pintrich (Eds.), Advances in motivation and achievement (Vol. 7, pp. 151-183). Greenwich, CT: JAI Press.
- Ognibene, T. C., & Collins, N. L. (1998). Adult attachment styles, perceived social support and coping strategies. *Journal of Social and Personal Relationships*, 15, 323-345.
- Pierce, T., & Lydon, J. (1998). Priming relational schemas: Effects of contextually activated and chronically accessible interpersonal expectations on responses to a stressful event. *Journal of Personality and Social Psychology*, 75, 1441-1448.

- Pintrich, P. R. (2000). The role of goal orientation in self-regulated learning. In Boekaerts, M., Pintrich, P. R., & Zeidner, M. (Eds.), *Handbook of self-regulation* (pp. 451-502). San Diego, CA: Academic Press.
- Pintrich, P. R., & Garcia, T. (1991). Student goal orientation and self-regulation in the college classroom. In M. L. Maehr, & P. R. Pintrich (Eds.), Advances in motivation and achievement (Vol. 7, pp. 371-402). Greenwich, CT: JAI Press.
- Pintrich, P. R., & Schunk, D. H. (1996). Motivation in education: Theory, research, and applications. Englewood Cliffs, NJ: Prentice-Hall.
- Roberts, N., & Noller, P. (1998). The associations between adult attachment and couple violence: The role of communication patterns and relationship satisfaction.
 Attachment theory and close relationships (pp. 317-350). New York: Guilford Press.
- Ryan, A. M. & Pintrich, P. R. (1997). "Should I ask for help?" The role of motivation and attitudes in adolescents' help-seeking in math class. *Journal of Educational Psychology*, 89, 329-341.
- Scharfe, E., & Bartholomew, K. (1994). Reliability and stability of adult attachment patterns. *Personal Relationships*, 1, 23-43.
- Schraw, G., Horn, C., Thorndike-Christ, T., & Bruning, R. (1995). Academic orientations and student classroom achievement. *Contemporary Educational Psychology*, 20, 359-368.

- Sheeran, P. (2002). Intention-behavior relations: A conceptual and empirical review. In W. Stroebe & M. Hewstone (Eds.), *European review of social psychology: Vol. 4* (pp. 1-36). Chichester, UK: John Wiley and Sons.
- Simpson, J. A., Rholes, W. S., Oriña, M. M., & Grich, J. (2002). Working models of attachment, support giving, and support seeking in a stressful situation. *Personality and Social Psychology Bulletin*, 28, 598-608.
- Skaalvik, S., & Skaalvik, E. M. (2005). Self-concept, motivational orientation, and helpseeking behavior in mathematics: A study of adults returning to high school. Social Psychology of Education, 8, 285-302.
- Vogel, D. L., & Wei, M. (2005). Adult attachment and help-seeking intent: The mediating roles of psychological distress and perceived social support. *Journal of Counseling Psychology*, 52, 347-357.
- Wilson, C. J., Deane, F. P., Ciarrochi, J., & Rickwood, D. (2005). Measuring helpseeking intentions: Properties of the General Help-Seeking Questionnaire. *Canadian Journal of Counselling*, 39, 15-28.

Appendix A

Relationship Scales Questionnaire

Please read each of the following statements and rate the extent to which you believe each statement best describes your feelings about <u>close relationships</u>.

1	2	3	4	5
not at all		somewhat		Very
like me		like me		like me

- 1. _____ I find it difficult to depend on other people.
- 2. _____ It is very important to me to feel independent.
- 3. _____ I find it easy to get emotionally close to others.
- 4. _____ I want to merge completely with another person.
- 5. _____ I worry that I will be hurt if I allow myself to become to close to others.
- 6. _____ I am comfortable without close emotional relationships.
- 7. _____ I am not sure that I can always depend on others to be there when I need them.
- 8. _____ I want to be completely emotionally intimate with others.
- 9. ____ I worry about being alone.
- 10. ____ I am comfortable depending on other people.
- 11. _____ I often worry that romantic partners don't really love me.
- 12. _____ I find it difficult to trust others completely.
- 13. _____ I worry about others getting too close to me.
- 14. _____ I want emotionally close relationships.
- 15. _____ I am comfortable having other people depend on me.
- 16. _____ I worry that others don't value me as much as I value them.
- 17. _____ People are never there when you need them.
- 18. _____ My desire to merge completely sometimes scares people away.
- 19. _____ It is very important to me to feel self-sufficient.
- 20. ____ I am nervous when anyone gets too close to me.
- 21. _____ I often worry that romantic partners won't want to stay with me.

1	2	3	4	5
not at all		somewhat		Very
like me		like me		like me

- 22. ____ I prefer not to have other people depend on me.
- 23. _____ I worry about being abandoned.
- 24. _____ I am uncomfortable being close to others.
- 25. _____ I find that others are reluctant to get as close as I would like.
- 26. _____ I prefer not to depend on others.
- 27. ____ I know that others will be there when I need them.
- 28. ____ I worry about having others not accept me.
- 29. _____ Romantic partners often want me to be closer than I feel comfortable being.
- I find it relatively easy to get close to others.

Note. Subscale items are as follows: Secure = 3, 9 (reversed), 10, 15, 28 (reversed);

Fearful = 1, 5, 12, 24; Preoccupied = 6 (reversed), 8, 16, 25; Dismissing = 2, 6, 19, 22,

26.

Appendix B

Achievement Goal Questionnaire

The following statements are focused on your thoughts and feelings about this class. There are no right or wrong answers; please just answer as accurately and honestly as possible.

1	2	3	4	5	6	7
not at all						Very
true of me						true of me

- It is important for me to understand the content of my courses as thoroughly as possible.
- My goal for my classes is to avoid performing poorly compared to the rest of the class.
- I view my classes as a positive challenge.
- 4. _____ It is important for me to do better than other students.
- 5. _____ I think my classes represent a threat to me.
- 6. _____ I want to learn as much as possible from my classes.
- My fear of performing poorly in my classes compared to others is often what motivates me.
- 8. _____ I desire to completely master the material presented in my classes.
- 9. _____ I think my classes represent a positive challenge to me.
- 10. _____ My goal in my classes is to get a better grade than most of the other students.
- 11. _____ I worry that I may not learn all that I possibly could in my classes.
- 12. _____ I view my classes as a threat.
- 13. _____ I just want to avoid doing poorly in my classes compared to others.
- 14. _____ I am often concerned that I may not learn all that there is to learn in my classes.
- 15. ____ I expect to do well in my classes.
- It is important for me to do well compared to others in my classes.
- 17. _____ Sometimes I'm afraid that I may not understand the content of my classes as thoroughly as I'd like.
- 18. ____ I believe I will get an excellent grade in my classes.

1	2	3	4	5	6	7
not at all						Very
true of me						true of me

- 19. _____ My goal for my classes is to avoid performing poorly.
- 20. _____ My fear of performing poorly in my classes is often what motivates me.
- 21. _____1 just want to avoid doing poorly in my classes.
- *Note*. Subscale items are as follows: Mastery-approach = 1, 6, 8; Mastery-avoidance
- 11, 14, 17; Performance-approach = 4, 10, 16; Performance-avoidance = 19, 20, 21.

Appendix C

General Help-Seeking Questionnaire

In the survey that you are going to complete next, please do the following:

- Think about the situation as if it was real. If you were having a problem *right now*, what would you do?
- Answer each question as if you were really facing that problem, and your answer is a statement of what help you are actually going to seek out.

1	2	3	4	5	6	7
extremely						extremely
unlikely						likely

- 1. If you were having difficulty writing a paper, how likely is it that you would seek help from the following sources?
- a) _____ Partner (boy/girlfriend), Classmate, Friend, Family member
- b) _____ Internet
- c) _____ Professor, TA, Library staff
- d) _____ Learning skills instructor (Counselling Centre)
- e) _____ Subject (e.g., Chemistry) Help Centre
- f) _____ MUN Writing Centre
- g) _____ No one
- 2. If you were having difficulty understanding the textbook/readings for a course, how likely is it that you would seek help from the following sources?
- a) _____ Partner (boy/girlfriend), Classmate, Friend, Family member
- b) _____ Internet
- c) _____ Professor, TA, Library staff
- d) _____ Learning skills instructor (Counselling Centre)
- e) _____ Subject (e.g., Chemistry) Help Centre
- f) _____ No one

1 extremely unlikely 7 extremely likely

3. If you were having difficulty understanding the lecture content for a course, how likely is it that you would seek help from the following sources?

3

4

5

6

a) _____ Partner (boy/girlfriend), Classmate, Friend, Family member

2

- b) _____ Internet
- c) _____ Professor, TA, Library staff
- d) _____ Learning skills instructor (Counselling Centre)
- e) _____ Subject (e.g., Chemistry) Help Centre
- f) ____ No one
- 4. If you were having difficulty preparing a presentation, how likely is it that you would seek help from the following sources?
- a) _____ Partner (boy/girlfriend), Classmate, Friend, Family member
- b) _____ Internet
- c) _____ Professor, TA, Library staff
- d) _____ Learning skills instructor (Counselling Centre)
- e) _____ Subject (e.g., Chemistry) Help Centre
- f) ____ No one

5. If you were having difficulty managing your time, how likely is it that you would seek help from the following sources?

- a) _____ Partner (boy/girlfriend), Classmate, Friend, Family member
- b) _____ Internet
- c) _____ Professor, TA, Library staff
- d) _____ Learning skills instructor (Counselling Centre)
- e) _____ Subject (e.g., Chemistry) Help Centre
- f) ____ No one

Descriptive and Reliability Statistics for Subscales of the Relationship Scales

Scale	М	SD	Observed	Possible	Cronbach's
			range	range	α
RSQ – Attachment Styles ^a			12		2.77
Secure	3.42	.62	1.80-5.00	1.00-5.00	-
Fearful	2.62	.85	1.00-4.75	1.00-5.00	1
Preoccupied	2.77	.73	1.00-4.50	1.00-5.00	3 - 3
Dismissing	3.20	.60	1.80-4.60	1.00-5.00	1 23
RSQ – Internal Working					
Models ^a					
Self	1.22	1.67	-3.70-4.90	-8.00-8.00	
Other	.38	1.64	-4.60-4.40	-8.00-8.00	1.
AGQ ^b					
Mastery-Approach	5.45	1.03	2.33-7.00	1.00-7.00	.70
Mastery-Avoidance	3.98	1.31	1.00-7.00	1.00-7.00	.77
Performance-Approach	4.00	1.76	1.00-7.00	1.00-7.00	.93
Performance-Avoidance	4.72	1.45	1.00-7.00	1.00-7.00	.79

Questionnaire (RSQ) and the Achievement Goal Questionnaire (AGQ)

^a N = 199 for all statistics, except N = 198 for Preoccupied style Cronbach's α .

^b N = 201 for all statistics.

		Problem Type						
Source Writing paper	Writing paper	Understanding	Understanding	Preparing	Time	Overall		
		readings	lecture	presentation	management			
Partner, etc.	5.46 (1.75)	5.29 (1.82)	4.87 (2.02)	5.40 (1.73)	4.02 (2.20)	5.03 (1.47)		
Internet	5.38 (1.80)	4.72 (2.03)	4.29 (2.15)	4.97 (1.97)	2.24 (1.76)	4.32 (1.44)		
Professor, etc.	4.51 (1.72)	4.76 (1.76)	5.21 (1.77)	4.71 (1.81)	2.59 (1.85)	4.35 (1.39)		
Learning skills	2.47 (1.47)	2.62 (1.55)	2.70 (1.69)	2.46 (1.52)	2.27 (1.71)	2.50 (1.26)		
instructor								
Subject help	3.74 (1.90)	3.68 (2.03)	3.70 (2.07)	3.12 (1.94)	1.96 (1.51)	3.23 (1.53)		
centre								
Writing centre	2.82 (1.77)	1.1				2.82 (1.77)		

Means and Standard Deviations (in Brackets) for Help-Seeking Intentions, by Problem Type and Help Source

Table 2 (continued)

	Problem Type							
Writing paper	Understanding	Understanding	Preparing	Time	Overall			
	readings	lecture	presentation	management				
4.07 (.98)	4.21 (1.04)	4.15 (1.09)	4.13 (1.09)	2.62 (1.23)	3.84 (.91)			
3.77 (1.00)	3.99 (1.07)	3.91 (1.14)	3.89 (1.09)	2.61 (1.28)	3.63 (.95)			
4.34 (.88)	4.42 (.97)	4.39 (1.00)	4.36 (1.05)	2.62 (1.18)	4.03 (.81)			
2.26 (1.71)	2.23 (1.75)	2.18 (1.69)	2.18 (1.67)	3.40 (2.46)	2.44 (1.51)			
	4.07 (.98) 3.77 (1.00) 4.34 (.88)	readings 4.07 (.98) 4.21 (1.04) 3.77 (1.00) 3.99 (1.07) 4.34 (.88) 4.42 (.97)	Writing paper Understanding Understanding readings lecture 4.07 (.98) 4.21 (1.04) 4.15 (1.09) 3.77 (1.00) 3.99 (1.07) 3.91 (1.14) 4.34 (.88) 4.42 (.97) 4.39 (1.00)	Writing paper Understanding Understanding Preparing readings lecture presentation 4.07 (.98) 4.21 (1.04) 4.15 (1.09) 4.13 (1.09) 3.77 (1.00) 3.99 (1.07) 3.91 (1.14) 3.89 (1.09) 4.34 (.88) 4.42 (.97) 4.39 (1.00) 4.36 (1.05)	Writing paper Understanding Understanding Preparing Time readings lecture presentation management 4.07 (.98) 4.21 (1.04) 4.15 (1.09) 4.13 (1.09) 2.62 (1.23) 3.77 (1.00) 3.99 (1.07) 3.91 (1.14) 3.89 (1.09) 2.61 (1.28) 4.34 (.88) 4.42 (.97) 4.39 (1.00) 4.36 (1.05) 2.62 (1.18)			

Means and Standard Deviations (in Brackets) for Help-Seeking Intentions, by Problem Type and Help Source

Note. For all items, Observed range = 1–7, Possible range = 1–7. N = 197, except $n_{men} = 96$ and $n_{women} = 101$.

^a The variable *No one* was excluded from calculations of *Overall M* and *SD* for each problem type.

Statistics for Interactions of Help-Seeking Variables

Source	df	F	р
Problem × Sex	3, 585	5.24	.001
Source × Sex	4, 780	1.00	.407
Problem × Help Source	12, 2340	31.70	.000
Problem $ imes$ Help Source $ imes$ Sex	12, 2340	1.73	.055

Note. The problem Writing a paper and ratings for seeking help

from No one were excluded from this analysis.

	Overall He	Overall Help-Seeking		lp-Seeking
	r	p	r	р
Attachment Styles ^a		1. 18. 7	1000	
Secure	.11	.068	.07	.345
Preoccupied	.11	.058	.12	.092
Fearful	13	.033	10	.148
Dismissing	09	.103	04	.556
nternal Working Models ^b				
Self	.02	.756	.01	.888
Other	.19	.007	.15	.034
Goal Orientations ^c				
Mastery-Approach	.21	.003	.23	.001
Mastery-Avoidance	.10	.150	.14	.043
Performance-Approach	.11	.122	.12	.087
Performance-Avoidance	.16	.023	.20	.005

Correlations of Predictor Variables with Overall and Formal Help-Seeking

 ${}^{a}N = 195$. ${}^{b}N = 197$. ${}^{c}N = 199$.

Intercorrelations Between	1 Internal Working	Models and G	ioal Orientations
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Variable	1	2	3	4	5
1. Self Model	100 - 100		1		
2. Other Model	.18**	-			
3. Mastery-Approach	.07	.01	-		
4. Mastery-Avoidance	19**	11	.25**	•	
5. Performance-Approach	04	03	.18*	.10	-
6. Performance-Avoidance	.01	.00	.11	.36**	.24**

*p < .05. **p < .01.







Figure 2. Students' mean (+SD) likelihood of seeking help from various sources, across four academic problems.



Figure 3. Sex differences in mean (+*SD*) likelihood of seeking help for four academic problems.





