

CHAPTER 5: RELATEDNESS

Defining Relatedness

Relatedness is the need to feel belonging and connection with others (Ryan & Deci, 2000). This critical factor builds upon three key features of settings that promote positive adolescent development: supportive relationships, opportunities to belong, and integration among family, schools, and community efforts (Eccles & Gootman, 2002). Relatedness encompasses relating to and caring for others, feeling cared for, and feeling involved with the social world (Leveresen, Danielson, Birkeland, & Samdal, 2012). Barber and Schluterman (2008) highlighted the importance of addressing the nuanced nature of relatedness through a review of the concept “connectedness,” which is conceptually similar to relatedness. Connectedness is primarily a relational construct, which represents a youth’s interpersonal experience, or the degree to which a reciprocal and dynamic dyadic relationship exists (e.g., between parent and youth, peer and youth). However, another view examines connectedness within an environmental framework; that is, the degree to which the youth enjoys and engages with different contexts (e.g., school). In general, connectedness is best understood in relation to two basic components: a relational component (i.e., relatedness) and an autonomy component (Barber & Schluterman, 2008).

The development of relatedness is initially fostered by the dynamics of the parent-child relationship. A child’s sense of security in primary relationships (i.e., parent-child) is thus paramount for later positive outcomes (Bowlby, 1969). Three critical dimensions of parenting foster positive adolescent development: 1) parental support (e.g., warmth, nurturance), 2) behavioural control (e.g., reasonable rules), and 3) psychological control (e.g., intrusive parenting; Barber & Schluterman, 2008). However, as children move into and through adolescence, other attachments increase in importance (Gorrese & Ruggieri, 2012; Markiewicz, Lawford, Doyle & Haggart, 2006).

Outcomes

Although relatedness can manifest among youth in different forms (for a review, see Barber & Schluterman, 2008), there is a general consensus that having a strong sense of connection, to both other individuals and other systems, may be critical to positive youth development and positive outcomes. Factor analytic studies investigating variables that represent the latent construct “positive youth development” provide some support for the importance of connectedness among children and adolescents. For example, Bowers and colleagues (2010) provided psychometric evidence suggesting that relatedness is an important indicator of positive youth development that is equally important for youth at different stages in development (e.g., early, middle, late adolescence). In this context, relatedness was defined as youth’s reciprocal bonds with both people and institutions (Bowers et al., 2010). Those youth who report higher degrees of relatedness to both people (e.g., family) and institutions (e.g., school) tend to report higher scores on indices of thriving by the Search Institute⁸ (Theokas et al., 2005). Relatedness is a significant predictor of both concurrent and prospective positive affect among youth and adolescents (Verroneau, Koestner, & Abela, 2005). Taken together, the research consistently provides strong evidence for the association between youth relatedness and positive outcomes across cognitive/learning, behavioural/social, and psychological/emotional domains.

⁸ The Search Institute proposes seven behavioural indicators of thriving: 1) school success, 2) leadership, 3) helping others, 4) maintenance of physical health, 5) delay of gratification, 6) valuing diversity, and 7) overcoming adversity (Scales, Benson, Leffert, & Blyth, 2000).

Cognitive/learning outcomes

Relatedness is a critical factor inside and outside of school settings, having positive effects on a range of indicators. Within schools, cognitive and learning outcomes are most often measured using direct indicators of achievement, such as grades and test scores, or indirect indicators of engagement, such as involvement in learning activities and effort that mediates achievement. Outside of school settings, cognitive and learning outcomes are sometimes framed through career development and commitment.

Relatedness is significantly associated with academic achievement. For example, Roorda, Koomen, Spilt, and Oort (2011) found significant, but low, effect sizes between teacher-student relationships and achievement. In a subset of 17 studies, including 38,343 secondary students, overall effect size for positive relationships on achievement was $r = .16$ (fixed) and $r = .20$ (random)⁹. In three studies, involving 12,176 secondary students, overall effect size for negative relationships was $r = -.13$ (fixed) and $-.16$ (random). Effect sizes for positive relationships on achievement were larger in studies that used grades (rather than test scores) as indicators of achievement ($r = .24$ for positive and $-.15$ for negative relationships). Evidence of the influence of relatedness on academic achievement can also be seen in individual studies. For example, Crosnoe, Johnson, and Elder (2004) conducted a longitudinal study with American students from Grade 7-12 ($N=14,736$) to examine the link between relatedness and grades. Student-teacher relationships were positively associated with higher grades for all students regardless of age, particularly for Hispanic American girls.

School belonging is acknowledged in the literature as a factor in student motivation and achievement (see review in Osterman, 2000). However, this connection varies across diverse youth. For example, Faircloth and Hamm (2005) investigated dimensions and mechanisms of belonging relevant to motivation (efficacy beliefs and valuing school) and achievement (grade-point average) among high school students in four ethnic groups. Participating students ($N=5494$) attended seven ethnically diverse high schools in San Francisco and Wisconsin, in Grades 9-12. All four dimensions of belonging (relationships with teachers, involvement with peers, engagement in school activities, perceived ethnic-based discrimination) were relevant, but variably so, across ethnic groups. For example, all four were significant for Euro-American and Latino students; whereas friendship nominations were not significant for all African-American or Asian students in predicting achievement. In a structural model postulating belonging as a mediator, belonging accounted for much of the relationship between student motivation and academic success across all groups (particularly African-American and Latino students).

There is significant theoretical and empirical evidence of the relation between the quality of teacher-student relationships and school engagement (see Pianta, Hamre & Allen, 2012 for a review). Teacher-student relationship associations with engagement were stronger than with achievement in the Roorda et al. (2011) meta-analysis. Twenty-three studies involving 54,923 secondary students revealed a high overall effect size (fixed effects model $r = .30$; random effects $r = .40$, $p < .01$) between positive teacher-student relationships and school engagement. The effect size was slightly lower for students in primary school. In two studies involving 853 postsecondary students examining the relationship between negative teacher-student relationships and school engagement, overall effect size (fixed effects model $r = -.25$, random effects $r = -.31$, $p < .01$) was moderate. For primary school studies only, the overall associations with engagement were somewhat stronger for negative relationships than for positive relationships, whereas for secondary school studies, positive relationships had stronger associations with engagement (Roorda, Koomen, Spilt, & Oort, 2011).

⁹ Fixed effects models permit inferences only about the studies included in the meta-analysis and assumes a shared true effect size. Random effects models assume that the studies are a random sample of the relevant distribution of the effects. Random effects models allow generalizations, beyond the particular set of studies included, to comparable studies. Tests of random effects have less statistical power to detect significance than tests of fixed effects.

Individual studies reinforce this finding. For example, in a study involving low-income, urban, early adolescents (in Grades 7-9), teacher-student relationship quality accounted for 25% of variance in student behavioural participation in school activities, while parent-child relationship quality accounted for an additional 24% (Murray, 2009). Relatedness seems to be especially important for school involvement of immigrant youth. In a longitudinal study, emotionally supportive school-based relationships accounted for 15% of the variance of behavioural engagement (Suarez-Orozco, Pimental, & Martin, 2009). The association between relatedness and school engagement is important for achievement. In a theoretical review and longitudinal study by Reeve (2012), student engagement, defined as “active involvement in a learning activity” (p. 150) that includes behavioural, emotional, cognitive and agentic aspects, was found to fully mediate the motivation-to-achievement relation.

Outside of school settings, cognitive and learning outcomes can be assessed using indicators related to career development. For example, Felsman and Blustein’s (1999) study with 147 university undergraduate students (mean age = 18.62) examined the role of peer relatedness in late adolescent career development. Three peer relatedness variables (attachment, intimacy, mutuality) shared a modest significant and unique amount of variance with career exploration and commitment. Attachment to peers and intimacy were positively associated with environmental exploration and progress in committing to career choices. These findings suggest that late adolescents may use peer relationships to buffer anxiety and provide support (over and above relationships with parents). Despite the study’s flaws (i.e. the study is not current and its analysis is not robust), it suggests possibilities for moving research into relatedness and cognitive/learning outcomes beyond the school into the world of work.

Summary

- Supportive teacher-student relationships and school belonging are associated with school achievement and engagement. School belonging is additionally associated with motivation;
- Peer attachment, intimacy, and mutuality are important for career exploration and commitment.

Behavioural/social outcomes

In the behavioural/social domain, relatedness serves as a protective factor, preventing a range of adolescent problem behaviours. Problem behaviours are assessed in terms of severity or frequency of deviant or delinquent acts. Relationships with parents, peers, and teachers predict differential associations with problem behaviours.

Youth who feel a sense of belonging tend to be less antisocial, and exhibit better self-regulation and social responsibility (Grotevant, 1998). Attachment to parents may reduce the severity of adolescent boys’ delinquency (Anderson, Holmes & Ostresh, 1999). However, there may not be as significant a decrease in frequency of problem behaviours for boys as there is for girls. For example, in a study involving 911 7th to 12th graders (mean age = 15), attachment bond variables (particularly parent quality and adult bond) accounted for 22% of the variance of delinquency for females but only 8% for males (Huebner & Betts, 2002).

Higher peer attachment has been associated with higher rates of school misconduct (Damanet & Van Houtte, 2012). However, relationships with regulating peers (peers who report low deviant behaviours) are negatively associated with antisocial behaviour. For example, youth with regulating

peers may be least likely to behave antisocially (Barber & Olsen, 1997). Positive socialization with family and peers related so strongly to antisocial behaviour as to neutralize the influence of neighborhood and school. Newman and colleagues (2007) explored three aspects of peer group membership in adolescence in relation to behaviour problems in a sample of 733 ethnically and socioeconomically diverse adolescents aged 11-18. A positive sense of group belonging was connected to lower internalizing and externalizing behaviour problems (one SD increase in peer group belonging = about a half SD decrease in behavioural problems).

Longitudinal studies have replicated the preventive effect on deviancy of school belonging (e.g., Dornbusch, Erickson, Laird & Wong, 2001) and teacher attachment (e.g., Freidenfelt Liljeberg, Eklund, Vafors Fritz, & af Klinteberg, 2011). Crosnoe and colleagues (2004) found that the odds ratio for the longitudinal association between teacher-student relationships and later disciplinary problems indicated that the odds of disciplinary problems decreased by 39% with every unit increase in teacher-student bonding for youth between Grades 7-11. This effect size exceeded all demographic factors (Crosnoe, Johnson, & Elder, 2004). Using multilevel analyses, Damanet and Van Houtte (2012) examined peer and teacher bonding and misconduct in a nationally representative sample of students between 15-20 years old in Finnish secondary schools (N=11,872). Students' individual bonding with teachers and school were negatively associated with school misconduct.

Although the literature tends to focus on parental and teacher relationships, there are a few studies that examine other adults in mentorship roles. Non-parental adult mentors are effective at supporting social skill-building only if their relationships with youth are deeply connected (i.e. duration, closeness, frequency of contact, and involvement). Outcomes for youth who are less-connected to their mentors do not differ from those for youth without mentors (Hurd & Sellars, 2013). Similarly, duration of relationship is important. Grossman and Rhodes' (2002) study examined Big Brothers Big Sisters programs involving urban adolescents (N=1138) between 10 – 16 years of age. Mentorship relationships that lasted less than 6 months were associated with adverse effects, such as increased alcohol use and decreased self-worth (Grossman & Rhodes, 2002). Further, different types of youth-adult relationship lead to different social outcomes. Individual or mentor-type relationships foster one-on-one social development, whereas collaborative forms of youth-adult leadership are conducive to communal group belonging (Mitra, 2004).

Summary

- Parent quality and adult bond are associated with lower rates of delinquency;
- Peer attachment and belonging with regulating peers predict lower rates of antisocial and problem behaviours;
- Teacher-student relationships are associated with lower rates of school misconduct and disciplinary problems.
- Deep connection and long duration of adult mentor relationships are protective factors for problem behaviours and are associated with increased social skills.

Psychological/emotional outcomes

Relatedness is associated with reducing negative psychological and emotional outcomes, such as depression, the lack of which are most often used to indicate well-being. However, the absence of negative outcomes is not sufficient. Positive psychology focuses on associations between relatedness and the presence of positive psychological and emotional outcomes as indicators of well-being.

In an exploratory quantitative study involving 900 5th and 8th grade primarily White students in Utah, Barber and Olsen (1997) investigated the relation of connection with significant others, regulation of behaviour, and autonomy to grades, depression, and antisocial behaviour in four social contexts (family, school, neighbourhood, peers). Socialization experiences within the family were most salient to feelings of depression. Male and female eighth graders who reported high levels of connection with parents had significantly lower levels of depression. Similarly, in a random sample of English school children (N=6425) between 11-15, young people with a low sense of school belonging were twice as likely to report feeling low each week (Morgan & Haglund, 2009). Young people with low sense of belonging and low neighbourhood involvement were almost twice as likely to report 'less than good health' than students high in those dimensions (Morgan & Haglund, 2009).

To complement the more prevalent use of negative measures of psychological adjustment in the literature, Van Ryzin, Gravely, and Roseth (2009) focused on measures of hope, which tend to be correlated positively with self-efficacy, optimism, self-actualization, task-based coping in times of stress, and general well-being (and negatively correlated with maladjustment), basing their study on previous research where hope predicted grade-point averages in college and increased likelihood of graduation (Snyder et al., 2002). In their 5-month longitudinal study with secondary students (mean age 15.33) in rural Midwestern United States, Van Ryzin and colleagues examined the relationship among autonomy, belongingness, school engagement, and psychological adjustment. Both peer- and teacher-related belongingness were found to have an independent positive effect on engagement in learning, which in turn had a positive impact on adjustment, so that engagement in learning mediated these relationships. There was also a direct link between peer-related belongingness and positive adjustment, supporting the hypothesis that positive peer relations can impact adjustment independently of engagement. The predictors explained 51% of variance in engagement and 35% of the variance in hope (Van Ryzin, Gravely, & Roseth, 2009).

Summary

- Family connection and school belonging are associated with lower rates of depression;
- Peer and teacher-related belongingness are associated with hope, which, in turn, is connected to improved psychological adjustment and well-being, higher GPA and increased likelihood of college graduation.

Summary of Literature on Relatedness and Youth Outcomes

Relatedness is a critical factor for positive outcomes in cognitive/learning and psychological/emotional domains, and a critical protective factor in the behavioural/social domain. The presence of relatedness is critical for school achievement, motivation, engagement, career development, and hope. In turn, these outcomes are associated with long-term achievement, psychological and behavioural adjustment, and well-being. Table 5.1 provides a summary of these relatedness outcomes.

Table 5.1: Summary table of outcomes associated with relatedness

Outcome domain	Relatedness dimension	Outcome measure	Long-term implication ¹⁰
Cognitive/ learning	Supportive teacher-student relationships	School achievement and engagement	Achievement
	School belonging	School achievement and motivation	Achievement
	Peer attachment, intimacy, and mutuality	Career exploration and commitment	Career development
Behavioural/ social	Parent quality and adult bond	Lower rates of delinquency	Responsible citizenship
	Peer attachment and belonging (with regulating peers)	Lower rates of antisocial and problem behaviours	Responsible citizenship
	Teacher-student relationships	Lower rates of school misconduct and disciplinary problems	School adjustment
	Adult mentor relationships	Social skills	Achievement and future relatedness
Psychological/ emotional	Family connection and school belonging	Lower rates of depression	Well-being
	Peer- and teacher-related belongingness	Hope	Psychological adjustment and well-being Higher GPA Increased college graduation

¹⁰ Long-term implications are connected to thriving and well-being over time.

Chapter 5 References

[Starred studies are described in tabular form in Appendix Chapter 5.]

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