Developmental Psychology

Prospective Associations Between Friendship Adjustment and Social Strategies: Friendship as a Context for Building Social Skills

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The proposal that friendships provide a context for the development of social skills is widely accepted. Yet little research exists to support this claim. In the present study, children and adolescents ($N = 912$) were presented with vignettes in which a friend encountered a social stressor and they could help the friend and vignettes in which they encountered a stressor and could seek help from the friend. Social strategies in response to these vignettes were assessed in the fall and spring of the school year. Different indicators of friendship adjustment had unique effects on youths' strategies in response to helping tasks. Whereas having more friends predicted decreases in avoidant or hostile strategies, having high-quality friendships predicted emotionally engaged strategies that involved talking about the problem. Moreover, whereas having more friends predicted *increases* in relatively disengaged strategies, like distraction and acting like the problem never happened, having high-quality friendships predicted *decreases* in these strategies. The present study also tested whether youths' strategies in the fall predicted changes in friendship adjustment by the spring. Only strategies which may be seen as major friendship transgressions (i.e., avoiding or blaming the friend when the friend encounters a problem) predicted changes in friendship over time. Collectively, these results provide important new information on the interplay between social competencies and friendship experiences and suggest that friendships may provide a critical venue for the development of important relationship skills.

Keywords: friendships, social competence, social support, helping, friendship quality

The idea that interpersonal experiences shape the development of social behavior has been of considerable interest to both social (Bandura, 1986; Kelley & Thibaut, 1978) and developmental (Piaget, 1965; Selman, 1980; Youniss, 1980) psychologists. Indeed, peer relations researchers have long been interested in the idea that interactions with friends may provide a context for the development of social skills that are important to relationships (Asher, Parker, & Walker, 1996; Berndt, 1982; Burhmester & Furman, 1986; Sullivan, 1953). However, there is little empirical support for the idea.

The current study tested prospective relations between youths' social strategies and adjustment in friendships in terms of how many friends they had and the quality of their best friendship. Given the centrality of helping to friendships (Asher et al., 1996), strategies were assessed in response to vignettes in which youth could help a friend or seek help from a friend. Consistent with peer relationship theories, strategies in these contexts were expected to predict changes in friendship adjustment over the school year. The study also tested whether having friends and friendship quality predicted changes in strategies over time to test the understudied proposal that friendships contribute to the development of social competencies.

Help-Giving and Help-Seeking: Predictions From a Social Task Perspective

Decades of work indicate that youths with peer relationship problems are at risk for maladjustment (see Kupersmidt, Coie, & Dodge, 1990). As such, much work was aimed at identifying social skills necessary for peer interaction. This work generally focused on behaviors that led to peer acceptance or being generally well-liked. Cross-sectional (Coie, Dodge, & Kupersmidt, 1990; Mostow, Izard, Fine, & Trentacosta, 2002) and longitudinal (Dodge, 1983; Wentzel, 2003) studies indicate that poor social skills, such as aggression and low prosocial behavior, are related to low peer acceptance.

Likewise, social skills deficits could contribute to problems in friendships (Asher, 1985; Asher & Renshaw, 1981). Note, however, that peer acceptance and friendships are distinct constructs (Asher et al., 1996; Bukowski & Hoza, 1989; Parker & Asher, 1993). Whereas acceptance refers to being generally well-liked, friendships are specific, dyadic relationships. Youths who are

better accepted are more likely to have friends, but some well-accepted youths are friendless, and some poorly accepted youths have friends (Parker & Asher, 1993; Vandell & Hembree, 1994). Also, although some studies indicate that better accepted youths have higher quality friendships (Oldenburg & Kerns, 1997; Parker & Asher, 1993) others do not (Kerns, Klepac, & Cole, 1996; Rose & Asher, 1999).

Given that effects of having friends and friendship quality on adjustment hold while controlling for acceptance (Parker & Asher, 1993; Vandell & Hembree, 1994), knowing the social competencies required for friendships is important. However, few studies have considered social skill correlates of friendship success. Some studies indicate concurrent links between low prosocial behavior and friendlessness (Bowker Wojslawowicz, Rubin, Burgess, Booth-LaForce, & Rose-Krasnor, 2006; McGuire & Weisz, 1982). Another study of unacquainted young children (Gottman, 1983) found that children with stronger interpersonal skills (e.g., communication, conflict resolution) were most likely to form friendships over 4 weeks. However, because peer acceptance was not controlled in these studies, whether the social skills uniquely predicted adjustment in friendship was unknown.

To understand the social skills correlates of friendship success, Asher et al. (1996) argued that it is important not only to control for acceptance but also to consider skills relevant for friendships, as opposed to general peer interaction. Asher et al. (1996) proposed specific social tasks that they argued were central to friendship success. This reflects the perspective that assessing skills in specific tasks is more effective than assessing skills globally, given that individuals may handle some tasks better than others (Dodge, McClaskey, & Feldman, 1985; McFall, 1982).

Studies by Rose and Asher tested Asher et al.'s (1996) hypotheses in regards to the social tasks of managing conflicts (Rose & Asher, 1999) and seeking and giving help (Rose & Asher, 2004). In the first study (Rose & Asher, 1999), fourth- and fifth-grade children were presented with vignettes depicting conflicts of interest (e.g., wanting to do an activity with a friend who wants to do something else) and rated strategies in terms of how likely they would be to engage in each strategy. Endorsing hostile strategies (e.g., telling the friend to go away, threatening to end the friendship) was related to having few friends and friends who reported greater conflict. Endorsing prosocial strategies (e.g., accommodation, compromise) was related to friends reporting less conflict. The results were particularly striking given that peer acceptance was controlled. Children's strategies were not related to friends' reports of positive qualities (i.e., companionship, intimate exchange, help/guidance, validation/caring, conflict resolution).

In the second study (Rose & Asher, 2004), fifth-graders responded to situations in which they could help a friend who encountered a peer stressor, such as being teased or picked on, or seek help from a friend when they encountered the stressor. Endorsing negative strategies in situations in which they could give help, such as avoiding the friend or blaming the friend for the problem, was related to having few friends and friends' reports of low positive qualities. Endorsing negative strategies in help-seeking situations, such as avoiding the friend or refusing to talk about the problem, also was related to having few friends. The results were significant even though acceptance was controlled. More positive strategies, such as talking about the problem or giving/seeking advice, and more neutral strategies, such as engag-

ing in a distracting activity with the friend or acting like the problem never happened, were unrelated to friendship success. Finally, none of the strategies were related to friends' reports of conflict.

It is important to note, however, that the studies were not longitudinal and did not speak to whether strategies predict the development of friendships. The present study makes an important contribution by testing whether help-giving and help-seeking strategies predict changes over the school year in how many friends that youth had and the quality of their best friendship. As in the prior studies (Rose & Asher, 1999, 2004), strategy ratings in response to vignettes were used as an indicator of social competence. Social information-processing models (Crick & Dodge, 1994) suggest that youths encode social situations, then interpret the situations; adopt goals; generate strategies; evaluate the strategies; and, finally, enact the chosen behavior. Perhaps it is not surprising, then, that youths' evaluation of strategies in response to vignettes are related to their real-life behavior as reported by observers (Dodge & Frame, 1982), peers (Chung & Asher, 1996; Richard & Dodge, 1982), and teachers (Lochman & Lampron, 1986; Richard & Dodge, 1982). Moreover, there also are benefits of the vignette approach. First, youths can be presented with vignettes representing situations that may occur infrequently and be difficult to capture with naturalistic observation. Second, youths can be presented with the same scenarios ensuring that varying features of the situations do not influence the responses. Third, collecting data with large samples and ample power is reasonably feasible with the vignette approach.

In regards to specific predictions, consistent with Rose and Asher (2004), endorsing negative strategies, such as avoiding or blaming the friend in the help-giving task and avoiding or refusing to disclose to the friend in the help-seeking task, were expected to predict having fewer friends and friends who reported increasingly low positive friendship quality over time. However, also consistent with Rose and Asher (2004), positive and neutral strategies were not necessarily expected to predict changes in friendship adjustment. Negative strategies may have the strongest impact on friendships if they are perceived as major transgressions.

Youths' strategies also were not expected to predict changes in friends' reports of conflict. In the Rose and Asher (1999, 2004) studies, responses to conflict tasks predicted friends' reports of conflict but not positive qualities, and responses to helping tasks predicted friends' reports of positive qualities but not conflict. This may speak to the specificity of particular social tasks and suggests that how youths handle helping tasks is especially relevant for friends' perceptions of positive qualities. It is notable that global assessments of social adjustment would not have captured the specificity in the relations with different aspects of friendship quality.

Help-Giving and Help-Seeking: Predictions From a Skill-Building Perspective

The social task approach to studying friendship competencies (Asher et al., 1996) focuses on one direction of effect (i.e., social skills as predictors of friendship adjustment). In the current study, however, having friends and high-quality friendships also were expected to predict changes in how youths responded to help-giving and help-seeking tasks. In fact, peer relationship researchers

have argued that friendships provide a context for the development of social skills (Hartup, 1996; Ladd, 1999; Selman, 1980; Youniss, 1980). This idea was put forth by Sullivan (1953) and expanded on by contemporary friendship researchers. For example, Burhmester and Furman (1986) suggested that youths' participation in relationships presses them to expand the skills required for those relationships. For example, in friendships, youths are exposed to situations in which giving and seeking help is appropriate and likely expected, thus providing a context to practice and refine these skills. Moreover, social learning and social cognitive theories (see Bandura, 1986; Nangle, Erdley, Adrian, & Fales, 2010) suggest that friends may shape youths' behavior in helping tasks by responding positively to prosocial, kind behaviors and "punishing" negative behaviors (e.g., through direct feedback or more subtle cues). In addition, at least in some cases, friends may model effective behavior themselves.

Despite the intuitive appeal of these ideas, only one longitudinal study was identified that tested whether friendships prompt the development of social skills. In this study (Howes, 1983), young children who maintained a consistent, or even sporadic, playmate over 1 year showed increases in social competencies (e.g., communication, the appropriate expression of affect). However, no studies have tested whether friendship experiences predict increases in social competencies among older youths or after controlling for peer acceptance.

Moreover, whether different aspects of youths' friendship experiences predict the development of different social competencies is unknown. The current study considers whether how many friends youths have and the degree to which their friendships are characterized by positive qualities and by conflict predict changes in help-seeking and help-giving strategies. It is notable that these indexes of friendship adjustment are not strongly correlated (e.g., Rose & Asher, 1999) and may differentially influence the development of social strategies.

Most relevant theoretical work focuses on how participating in close friendships, characterized by positive qualities (e.g., intimacy, validation), may contribute to social competence. In Sullivan's (1953) early work, he claimed that participating in intimate friendships could enhance youths' social skills but did not delineate what these skills were. Burhmester and Furman (1986) built on these ideas, speculating about what social competencies might develop as a result of close friendships. They suggested that experiencing comfort may allow youths to set aside insecurities and disclose personal feelings. If so, experiencing friendships characterized by positive qualities may predict increases in youths' disclosure and advice seeking in response to their own problems. Experiencing acceptance and trust in close friendships also was proposed to foster compassion and empathy. This suggests that high-quality friendships may predict increases in talking to a friend about the friend's problem and offering advice and reassurance. Despite these hypotheses, it is acknowledged that Rose and Asher (2004) did not find concurrent relations between positive friendship quality and these positive strategies. However, this does not necessarily mean that there are not prospective relations.

In contrast to hypotheses regarding the positive strategies, emotionally disengaged strategies, like engaging in a distracting activity with the friend or acting like the problem never happened, may be discouraged in the context of emotionally close friendships. Positive friendship quality also may predict decreases in negative

strategies, like avoiding or blaming the friend in the help-giving task and avoiding or refusing to disclose in the help-seeking task, as participating in close friendships may heighten awareness that these behaviors could be hurtful. This hypothesis is consistent with Rose and Asher's (2004) finding that positive friendship quality was concurrently related to lower endorsement of some of these negative strategies.

Less theoretical work is available to inform hypotheses regarding how the number of friends youths have might shape the development of social competence. As such, hypotheses related to youths' number of friends are more speculative. Although experiencing positive relationship quality was hypothesized to predict increases in positive, interpersonally engaged strategies, simply having more friends may not provide the emotionally rich context that would foster these strategies. However, having to spread time and energy across multiple friends may lead youths to engage in positive but less emotionally and time-intensive strategies, like engaging in distracting activities or acting like the problem never happened. Interacting with more friends also may increase youths' awareness that the more negative strategies could be perceived as major transgressions and therefore decrease youths' endorsement of these strategies.

Finally, friendship conflict was not expected to predict changes in help-giving and help-seeking strategies. As noted, experiencing friendship conflict may be tied more closely to how youths respond to conflict tasks than helping tasks. This fits with Rose and Asher's (2004) results indicating no concurrent relations between friendship conflict and strategies.

Gender and Developmental Differences

The study also explored gender and developmental differences. Based on previous research (Rose & Asher, 2004; see Rose & Rudolph, 2006), we expected girls to respond to helping tasks in a more supportive manner than boys, such as by endorsing strategies of talking about the problem and giving/seeking support. Boys were expected to be more likely to respond in a disengaged manner (e.g., endorsing strategies involving distraction or acting like the problem never happened) or a negative manner (e.g., endorsing strategies involving avoiding the friend, blaming the friend, or refusing to disclose). However, a separate question is whether the relations between strategies and friendship adjustment differ by gender. Even if girls and boys differ in their endorsement of strategies, strategies may be related to friendship adjustment similarly for girls and boys. This would be consistent with Rose and Asher (2004), which found that the relations between strategies and friendship adjustment generally did not differ by gender.

Also, whereas Rose and Asher (2004) assessed fifth-graders, the present study included youths ranging in age from middle childhood to midadolescence. Given that disclosure to friends increases with age (see Furman & Bierman, 1984; Hartup, 1996; Youniss, 1980), older youths may be most likely to endorse strategies involving disclosure and giving/seeking advice. Whether relations between strategies and friendship adjustment differ by age is also examined.

Summary

The current study makes two major contributions. First, the study provides the first test of the idea that how youths handle

particular social tasks uniquely impacts their friendships over time. Second, and perhaps more important, the study provides the first test of the well-accepted but understudied proposal that friendships promote the development of social competencies.

Method

Participants

Participants were third-, fifth-, seventh-, and ninth-graders in four Midwestern school districts. The study involved data collection in the fall (Time 1) and spring (Time 2) of the school year. Consent forms on which parents could indicate whether or not they consented were mailed to parents of the 1,383 students in these grades. Of these, 1,048 received written consent to participate in the fall (Time 1). Because of attrition, 999 participated in the spring (Time 2). To be included in analyses, youths were required to have data for friendship participation at Times 1 and 2 and at least some help-giving or help-seeking strategy data at at least one time point (as discussed later, missing strategy data were imputed). Of the 999 youths, 912 met these criteria.

The 912 youths (458 girls, 454 boys) included 243 third-, 254 fifth-, 191 seventh-, and 224 ninth-graders. The sample was 85% European American, 11% African American, and about 1% each Native American, Asian American, Hispanic American, and "other" (e.g., biracial). The youths resided in small Midwestern towns (populations ranged from 1,869 to 12,128; median incomes ranged from $28,519 to $58,300) located 10 to 30 miles from a large university.

Procedure

Measures were group administered in classrooms. Items were read aloud, and students followed along and answered questions.

At each time point (fall and spring), there were two data-collection sessions that each lasted about 1 hr and occurred 1 to 2 weeks apart. At least one return visit was made to each school to collect data with students who had been absent.

Measures

Strategy assessment. Youths responded to an adapted version of a measure developed to assess youths' help-giving and help-seeking strategies in response to hypothetical vignettes (Rose & Asher, 2004). Six vignettes assessed youths' help-giving strategies (see Appendix A for a brief description of each). Each vignette portrayed a friend encountering a stressful event with peers and ended with the class going to lunch, where the youth could give help to the friend. Below is an example of a vignette from the help-giving task:

> One day your best friend has to make a presentation in front of the class, and when she gets up in front of the class she seems to forget what she was going to say and she does very poorly at making the presentation. All during her presentation, you see a couple of students whispering and laughing at her. You see her looking at the students who are whispering and laughing at her. When she is going back to her seat after the presentation, they keep laughing and talking and start pointing at her. Then it is time to go to lunch where you usually spend time with your best friend.

After each vignette, "What would you do at lunch?" was printed followed by seven strategies. The strategy types were: initiating discussion, advice giving, reassurance giving, distraction giving, behavioral denial, avoidance, and blaming. An example of each strategy type is presented in Table 1. Youths rated each strategy on a 1 (*definitely would not do*) to 5 (*definitely would do*) Likert-type scale.

Table 1

Examples of Strategies in Response to Help-Giving Tasks and Information About Factor Loadings

Factor	Strategy in the help-giving task	Time 1		Time 2	
		M factor loading	*M* cross-loading on other factors	*M* factor loading	*M* cross-loading on other factors
Verbal support factor					
Initiating discussion	I'd ask my friend if she wanted to talk about the other students laughing at her.	.75	.10	.76	.10
Advice giving	I'd give my friend ideas about how to keep the other students from laughing at her.	.71	.03	.74	.03
Reassurance giving	I'd tell my friend not to feel bad about the other students laughing at her because things like that happen to everyone.	.48	.18	.59	.15
Distraction/behavioral denial factor					
Distraction giving	I'd purposely talk to my friend about something we like to talk about instead of talking about the other students laughing at her.	.77	.04	.78	.04
Behavioral denial	I'd act like the other students laughing at my friend never happened.	.65	.09	.64	.07
Avoidance/blaming factor					
Avoidance	I'd stay away from my friend.	.67	.02	.77	.03
Blaming	I'd tell my friend that the other students laughing at her was her own fault.	.68	.02	.75	.02

Note. The numbers in the *M* factor loading column are the mean loadings across all six vignettes used to assess the particular strategy for the factor on which the items loaded. The numbers in the *M* cross-loadings column are the mean absolute values of the loadings across all six vignettes used to assess the strategy across all other factors.

The Time 1 factor structure of the 42 help-giving strategy items (seven strategies for each of six vignettes) was examined using the 693 youths (76% of the full sample of 912) who completed every help-giving strategy item at Time 1. The Time 2 factor structure was examined with the 666 youths (73% of 912) who completed every item at Time 2. Examining the factor structures (and internal reliabilities) of the measure with youths with complete data was preferable to computing these statistics with a data set with imputed data, because one piece of information used to impute data is the pattern of interrelations among items for youths who do have the data.

At each time point, the eigenvalues from an exploratory factor analysis with an oblique (promax) rotation suggested a three-factor solution (see Table 1 for mean factor loadings and cross loadings). These were a verbal support factor that included the initiating discussion, advice giving, and reassurance giving items, a distraction giving/behavioral denial factor that included the distraction giving and behavioral denial items, and an avoidance/blaming factor that included the avoidance and blaming items. Verbal support (Time 1 α = .93; Time 2 α = .94), distraction giving/behavioral denial (Time 1 α = .92; Time 2 α = .92), and avoidance/blaming strategy scores (Time 1 α = .90; Time 2 α = .94) were the means of the relevant items.

As described later, missing strategy data were imputed. Data were imputed at the strategy score level rather than the item level (e.g., for the verbal support strategy rather than for each verbal support item). Across all study variables, if item-level data were imputed, imputation would be needed for over 200 variables. Although the method used (SAS Proc MI; SAS Institute, 2006) can accommodate many variables (up to about 100), the number of item-level variables in this dataset was prohibitively large (Graham, 2009). Therefore, if youths were missing all items for a strategy, their strategy score was imputed. However, if only some items for a strategy were missing, the score was the mean of the items that they did have. It is important to note that when youths were missing some but not all items for a strategy, they typically were missing only one or two items (for each help-giving strategy score, fewer than 4% of youths were missing more than two items).

In regards to the help-seeking strategies, six other vignettes were used (see Appendix B for a brief description of each). In each vignette, the youth encountered a stressful situation themselves and had the opportunity to seek help from a friend at lunch. Below is an example:

> All the students in your class are suppose to be working by themselves on their homework, but the two students who sit behind you are fooling around rather than doing their work. While you are working on your homework, they start throwing paper balls and eraser shavings at you. Then it is time to go to lunch where you usually spend time with your best friend. Your best friend comes over to you at lunch and asks you how things are going. What would you do?

After each vignette, the question, "What would you do at lunch?" was presented followed by six strategies. The six strategy types in the help-seeking task were self-disclosure, advice seeking, distraction seeking, behavioral denial, solitude seeking, and refusal to disclose. An example of each strategy type is presented in Table 2. Youths rated each strategy on a Likert-type scale ranging from 1 (*definitely would not do*) to 5 (*definitely would do*).

The factor structure was examined with the 670 youths (73% of 912) with all help-seeking items at Time 1 and the 726 youths (80% of 912) with all items at Time 2. At each time point, an exploratory factor analysis with an oblique (promax) rotation performed on the 36 help-seeking items (i.e., six vignettes with six strategies per vignettes) suggested a three-factor solution (see Table 2 for mean factor loadings and cross loadings). The factor patterns indicated a self-disclosure/advice-seeking factor that included the self-disclosure and advice-seeking items (Time 1 α = .92; Time 2 α = .94), a distraction seeking/behavioral denial factor that included the distraction seeking and behavioral denial items (Time 1 α = .88; Time 2 α = .91), and an excluding factor that included the solitude seeking and refusal to disclose items (Time 1 α = .90; Time 2 α = .91). Scores were the mean of the relevant items. For each strategy, data were imputed for youths with no item data for that strategy. For youths with missing data for some but not all items for a strategy, scores were the mean of the items they did have (for each help-seeking strategy score, fewer than 3% of youths were missing more than two items).

Friendship nominations. As in past research (e.g., Hoza, Molina, Bukowski, & Sippola, 1995; Parker & Asher, 1993), youths completed a friendship-nomination measure to identify reciprocal friends. Youths were given a list of classmates and circled names of their three best friends. Of these, they starred the name of their "very best friend." Third- and fifth-graders were presented with the names of all students in their self-contained classroom with consent. Because seventh- and ninth-graders switched classes and could interact with any grademate, they were presented with all students with parental consent in their grade. Youths were considered to have a reciprocal friend if a friend they circled also circled them. With this approach, youths could have between zero and three reciprocal friends. Of the 912 youth, 663 (73%) had at least one reciprocal same-sex friend at Time 1 and 675 (74%) had at least one reciprocal same-sex friend at Time 2.

Friendship quality. Youths responded to a shortened 18-item version of Parker and Asher's (1993) Friendship Quality Questionnaire (see Rose, 2002). Three items assessed each of the following qualities: validation and caring, conflict resolution, help and guidance, companionship and recreation, intimate exchange, and conflict. Each item was rated on a 5-point Likert-type scale.

As in past research (e.g., Parker & Asher, 1993), a customized questionnaire was created for each youth with his or her friend's name inserted in each item. Friendship-nomination data were used to choose each youth's highest priority friend whose name would be inserted in each item. For youths with only one reciprocal friend, that friend was highest priority. For youths with more than one reciprocal friend, the following criteria were used (see Rose, 2002; Rose & Asher, 1999, 2004). First priority was a friendship in which both youths circled and starred the other. Next priority was a friendship in which a youth circled and starred a friend who circled (but did not star) him or her. The following priority was a friendship in which a youth circled (but did not star) a friend who circled and starred him or her. Last priority was friends who circled (but did not star) each other. If youths did not have a reciprocal friend, they reported on a peer they nominated, but, as in past research (e.g., Parker & Asher, 1993), the data were not used.

This priority system was used to assign youths their highest priority friend to report on using the Friendship Quality Question-

Table 2

Examples of Strategies in Response to Help-Seeking Tasks and Information About Factor Loadings

		Time 1		Time 2	
Factor	Strategy in the help-seeking task	*M* factor loading	*M* cross-loading on other factors	*M* factor loading	*M* cross-loading on other factors
Self-disclosure/advice seeking factor					
Self-disclosure	I'd talk with my friend about the other students throwing things at me.	.66	.09	.73	.05
Advice seeking	I'd ask my friend to help me figure out how I could keep other students from throwing things at me.	.75	.07	.78	.05
Distraction/behavioral denial factor					
Distraction seeking	I'd purposely talk to my friend about something that I like to talk about instead of talking about the other students throwing things at me.	.64	.03	.73	.03
Behavioral denial	I'd act like the other students throwing things at me never happened.	.60	.03	.65	.03
Excluding factor					
Solitude seeking	I'd tell my friend that I want to be alone.	.61	.05	.64	.06
Refusal to disclose	I'd tell my friend that it was none of her business.	.68	.05	.75	.05

Note. The numbers in the *M* factor loading column are the mean loadings across all six vignettes used to assess the particular strategy for the factor on which the items loaded. The numbers in the *M* cross-loadings column are the mean absolute values of the loadings across all six vignettes used to assess the strategy across all other factors.

naire at Time 1. If youths maintained this reciprocal friendship at Time 2, they reported on this same friend at Time 2, regardless of the friendship's priority level. However, if the Time 1 friendship was not a reciprocal friendship at Time 2, youths reported on their highest priority friendship at Time 2.

Consistent with past research on the social skill correlates of friendship adjustment (Rose & Asher, 1999, 2004), friend-reported friendship-quality data were used. That is, the friendship quality data a youth provided were used as data for the friend about whom he or she completed the measure. This allowed us to test whether self-reported strategies predicted changes in friends' perception of friendship quality. The approach circumvented problems associated with shared method variance and provided a more objective assessment of whether youths' strategies contributed to their success in friendship as opposed to relying on youths' own assessment of friendship quality. Also, because we were interested in whether Time 1 strategies predicted changes in friendship quality within specific friendships, we considered friendship quality data only for youths who had the same friend at Times 1 and 2.

Of the 912 youths, 663 had a reciprocal friend at Time 1. However, only 318 maintained the same friendship from Time 1 to Time 2 and had friend-report data from that friend at at least one time point. Of the 318 youths, 290 had friend-report data from the same friend at both time points. The remaining 28 youths had the same friend at both time points but friend-report data at only one time point. The data for the missing time point were imputed. The drop in sample size from 663 to 318 was due to some friendships dissolving between Times 1 and 2 and some youths

with reciprocal friends having no one to report on them because their friends had higher priority friendships. This drop was comparable to other school-based research using friend reports of friendship quality at multiple time points (Prinstein, Borelli, Cheah, Simon, & Aikins, 2005).

Positive friendship quality scores were the mean of the 15 friend-reported items assessing validation and caring, conflict resolution, help and guidance, and companionship and recreation, and intimate exchange. Friendship conflict scores were the mean of the three friend-reported conflict items. Internal reliabilities were computed using youths with complete friendship-quality data (Time 1, $N = 289$, positive friendship quality $\alpha = .92$, friendship conflict $\alpha = .83$; Time 2, $N = 286$, positive friendship quality $\alpha = .92$, friendship conflict $\alpha = .86$).

Within the sample of 318, missing scores were imputed for youths who were missing all friend-reported positive friendship-quality or friendship-conflict items. For youths with missing data for only some positive friendship-quality or friendship-conflict items, scores were the mean of the items they did have (for positive friendship quality and for friendship conflict, fewer than 3% of the 318 youths were missing more than one item for the variable).

Peer acceptance. Youths also completed a roster and rating scale measure of peer acceptance (Singleton & Asher, 1977). The measure included the question, "How much do you like to spend time with this person?" and a roster of peers. For third- and fifth-graders, a roster of all students with parental consent in the youths' self-contained classrooms was listed. Class rosters differed for seventh- and ninth-graders, who switch classrooms throughout

the day and could interact with any of their 150–200 grademates. Because it would be impractical to ask students to rate all of their grademates, a list of 30 grademates was randomly generated and provided to each youth. A different random list was provided to each youth. Similar approaches have been used in past research with secondary school students (Hopmeyer Gorman, Kim, & Schimmelbusch, 2002; Wentzel & Caldwell, 1997). Youths rated each classmate on a 5-point Likert-type scale that ranged from 1 (*I don't like to*) to 5 (*I like to a lot*). Each youth received a peer-acceptance score that was the mean of the ratings they received standardized within class (for Grades 3 and 5) or grade (for Grades 7 and 9).

Representativeness analyses and imputation of missing data. As noted, all 912 youths had Times 1 and 2 friendship-nomination data and at least some strategy data. However, some were missing data for some strategy items. In fact, only 42% of youths (379 of 912) had data for every strategy item at both Times 1 and 2. However, for each strategy score, the percentage of youths who completed all items ranged from 80% to 91%. These patterns could coexist, because youths who missed a particular item at one time point were not necessarily the same youths who missed other items. Given these patterns, data imputation was a good choice. With listwise deletion, over half of the sample would have been lost. However, for any given strategy variable, the amount of data to be imputed was relatively minimal.

For representative analyses, we compared the 379 youths who completed every strategy item with the 533 youths with at least one missing item. Youths with at least one missing item were more likely to be boys than girls (62% of boys and 55% of girls had missing data), $\chi^2(1, N = 912) = 5.64, p < .05$, and were younger (74% of third-graders, 51% of fifth-graders, 56% of seventh-graders, and 52% of ninth-graders were missing data), $\chi^2(3, N = 912) = 36.43, p < .0001$. The 379 youths with complete data also were compared with youths missing at least one strategy item for the strategy scores. However, for each strategy, the sample of youths with missing data was limited to those with complete data for that strategy (Ns ranged from 465 to 501). In the help-giving task, youths with missing data were more likely to endorse the avoidance/blaming strategy at Times 1 and 2, $t(843) = 5.48$ and $t(833) = 5.99$, respectively, ps $< .0001$, and the distraction giving/behavioral denial strategy at Time 2, $t(846) = 2.29\ p < .05$. In the help-seeking task, youths with missing data were more likely to endorse excluding strategies at Times 1 and 2, $t(855) = 3.85$ and $t(874) = 5.46$, respectively, ps $< .001$.

Although youths with at least one missing strategy item differed from youths with complete data, this did not necessarily mean that imputing data was inappropriate. The differences between youths with and without missing data suggest that the data were not missing completely at random; however, this is not a requirement for imputing data. The data were only required to be missing at random (MAR; Little & Rubin, 2002), meaning that the distributions of scores for youths with data should not differ from what the distributions would have been for youths with missing data. Testing whether data are MAR is not possible (because the data for youths with missing data are missing; Allison, 2002). However, there is not a strong conceptual reason to expect that the distributions would differ. Moreover, there is not a clear preferable alternative to imputing the data as more traditional methods for handling missing data are argued to introduce bias (e.g., mean

substitution) or result in loss of power (e.g., listwise or pairwise deletion; see Widaman, 2006). Finally, preliminary analyses indicated that the same pattern of results emerged whether pairwise deletion methods were used or the data were imputed.

Specifically, multiple imputation was performed with Proc MI in SAS (SAS Institute, 2006). With this approach, an algorithm is used to predict a likely score for each missing data point, and a randomly generated plausible error term is added to that score. This is repeated multiple times, creating multiple imputed datasets, which are aggregated to produce final estimates of parameters of interest (Rubin, 1987; Widaman, 2006). Although sometimes as few as five datasets are imputed, 100 datasets were imputed in the current study, which is recommended for obtaining stable parameter estimates (Graham, Olchowski, & Gilreath, 2007). PROC MIANALYZE (SAS Institute, 2008) was used to aggregate the results across datasets.

Results

Descriptive Data and Correlations Among Study Variables

Means and standard deviations for all variables and correlations among all variables are presented in Table 3. Three patterns should be highlighted. First, correlations among strategies within each task at each time point were relatively low (rs ranged from –.02 to .28). Second, correlations among the different friendship adjustment variables also were relatively low at each time point (rs ranged from –.09 to .18). Finally, for each variable, the Time 1 and 2 scores were significantly correlated, suggesting stability from Time 1 to Time 2 (rs ranged from .40 to .54).

The correlations also provided information regarding relations of other variables with gender and grade. Point biserial correlations were computed for gender. In the help-giving task, being female was related to endorsing the verbal support strategies at Times 1 and 2, and being male was related to endorsing the avoidance/blaming strategies at Times 1 and 2. In the help-seeking task, being female was related to endorsing the self-disclosure/advice-seeking strategy at Times 1 and 2, and being male was related to endorsing the excluding strategies at Times 1 and 2. Being male also was related to endorsing the distraction seeking/behavioral denial strategy at Time 2. In terms of friendship, being female was related to having more reciprocal friendships at Times 1 and 2 and greater friend-reported positive quality at Times 1 and 2.

In terms of grade, in the help-giving task, younger youths were more likely to endorse the verbal support strategies at Times 1 and 2, whereas older youths were more likely to endorse the avoidance/blaming strategies at Time 2. In the help-seeking task, younger youths were more likely to endorse the self-disclosure/advice seeking at Times 1 and 2 and the excluding strategies at Time 1. Younger youths also had more reciprocal friendships at Times 1 and 2.

Prospective Relations Between Strategies and Friendship Adjustment: Preliminary Analyses

Preliminary regression analyses tested whether prospective relations of strategies with changes in friendship and prospective relations of friendship with changes in strategies were moderated

Table 3

Correlations Among Gender, Grade, Strategies, and the Friendship Variables

Variable	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21
1. Gender																					
2. Grade	.00																				
Time 1 help-giving strategies																					
3. T1 verbal support $M = 3.29$ $(SD = 0.96)$	−.18	−.21																			
4. T1 distraction giving/behavioral denial $M = 2.80$ $(SD = 1.08)$	−.05	−.05	.22																		
5. T1 avoidance/blaming $M = 1.49$ $(SD = 0.73)$	.13	.00	−.02	.17																	
Time 1 help-seeking strategies																					
6. T1 self-disclosure/advice seeking $M = 2.74$ $(SD = 1.07)$	−.28	−.24	.48	−.03	.04																
7. T1 distraction seeking/behavioral denial $M = 2.73$ $(SD = 0.96)$	.05	−.05	.07	.50	.03	−.10															
8. T1 excluding $M = 1.69$ $(SD = 0.80)$	.15	−.21	.01	.15	.39	.12	.28														
Time 1 friendship adjustment																					
9. T1 number of friends $M = 1.27$ $(SD = 0.98)$	−.12	−.14	.09	.06	−.11	.02	.02	−.05													
10. T1 positive friendship quality $M = 2.89$ $(SD = 0.74)$	−.30	−.08	.04	.08	−.09	.14	.00	−.06	.18												
11. T1 friendship conflict $M = 0.91$ $(SD = 1.14)$	−.07	.10	.05	−.01	.13	.07	−.09	.05	−.10	−.16											
12. T1 peer acceptance $M = 0.04$ $(SD = 0.96)$	.00	.00	−.01	−.08	−.07	.11	.02	.06	.42	.15	−.11										
Time 2 help-giving strategies																					
13. T2 verbal support $M = 3.18$ $(SD = 1.00)$	−.24	−.21	.48	.06	−.05	.37	−.01	−.06	.09	.15	.00	.03									
14. T2 distraction giving/behavioral denial $M = 2.68$ $(SD = 1.04)$	−.02	−.01	.01	.45	.09	−.12	.32	.10	.10	−.08	.00	.09	.22								
15. T2 avoidance/blaming $M = 1.56$ $(SD = 0.81)$	.20	.13	−.15	.03	.40	−.08	.00	.24	−.14	−.09	.03	−.03	.04	.23							
Time 2 help-seeking strategies																					
16. T2 self-disclosure/advice seeking $M = 2.65$ $(SD = 1.08)$	−.25	−.19	.40	.03	.08	.52	−.11	.02	−.05	.10	.03	−.12	.52	−.15	−.01						
17. T2 distraction seeking/behavioral denial $M = 2.70$ $(SD = 1.02)$	.07	−.06	.06	.35	.06	−.11	.40	.16	.07	−.10	.03	.08	.04	.35	.06	−.16					
18. T2 excluding $M = 1.62$ $(SD = 0.77)$	.15	−.01	−.03	.11	.34	−.03	.05	.41	−.12	.03	.00	−.05	−.08	.15	.51	.09	.22				

(table continues)

Table 3 (*continued*)

Variable	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21
Time 2 friendship adjustment																					
19. T2 number of friends $M = 1.25$ ($SD = 0.97$)	−.11	−.12	−.06	.04	−.13	.01	.04	−.08	.54	.15	−.08	.37	.07	.04	−.07	−.03	.10	−.13			
20. T2 positive friendship quality $M = 2.80$ ($SD = 0.83$)	−.29	.06	.11	−.09	−.21	.09	−.01	−.09	.21	.52	−.08	.13	.04	.05	−.15	.13	.02	−.05	.12		
21. T2 friendship conflict $M = 0.93$ ($SD = 1.07$)	−.07	.10	.05	−.07	.04	.05	−.08	−.05	−.10	−.02	.50	−.10	−.03	−.03	.02	.02	−.02	.03	−.09	.13	
22. T2 peer acceptance $M = 0.03$ ($SD = 0.96$)	.00	.04	.04	.09	−.05	−.10	.05	−.09	.44	.15	−.14	.77	−.01	.05	−.07	−.08	.02	−.09	.42	.13	−.12

Notes. Girls were coded as 0 and boys were coded as 1. Correlations are based on the full sample of 912 youths, except for correlations with positive friendship quality or friendship conflict, which were computed using the reduced sample of 318. Correlations based on the full sample of 912 youths of .07 or greater were significant ($p < .05$). Correlations based on the sample of 318 youths of .12 or greater were significant ($p < .05$).

by gender and/or grade. In these analyses, 108 interactions with gender and/or grade were tested. Only four were significant. Because fewer interactions were significant than would be expected by chance (4/108 = .037), and probing these did not produce meaningful patterns of effects, analyses were conducted for the full sample collapsed across gender and grade.

Preliminary analyses also indicated that none of the prospective relations of strategies with changes in friendship conflict were significant, and none of the prospective relations of conflict with changes in strategies were significant. To increase parsimony and conserve space, the details of analyses involving friendship conflict are not presented.

Time 1 Strategies as Predictors of Time 2 Friendship Adjustment

In this section, regression analyses tested whether Time 1 strategies predicted Time 2 friendship adjustment. For the help-seeking task, one regression examined effects on Time 2 number of friends and one examined effects on Time 2 friend-reported positive quality. In each case, the Time 2 friendship variable was the dependent variable. The Time 1 value of that friendship variable was entered on Step 1 as a control. Times 1 and 2 peer acceptance also were entered on Step 1 as controls. If Time 2 acceptance was not controlled, strategies might appear to predict Time 2 friendship adjustment because they actually predicted Time 2 acceptance, which was correlated with Time 2 friendship adjustment. Moreover, given that the Time 1 friendship variable was controlled in order to test whether the strategies predicted changes in friendship over time, Time 1 acceptance also was controlled. On Step 2, all three Time 1 help-seeking strategies (self-disclosure/advice seeking, behavioral denial/distraction seeking, excluding) were entered simultaneously. None of the help-seeking strategies predicted changes in number of friends or positive friendship quality. Details of these analyses are not presented.

Two regressions also were computed for the help-giving task. Either Time 2 number of friends or Time 2 positive friendship quality was the dependent variable. The Time 1 value of the friendship variable and Times 1 and 2 acceptance were entered on Step 1 as controls. On Step 2, all three help-giving strategies (verbal support, behavioral denial/distraction giving, avoidance/ blaming) were entered. The results are presented in Table 4. Endorsing the Time 1 avoidance/blaming strategies predicted having fewer friends at Time 2. Endorsing the Time 1 avoidance/ blaming strategies also predicted the friend reporting lower Time 2 positive friendship quality.

Additional analyses tested whether the avoidance/blaming strategy was a *unique* predictor of number of friends and positive quality. In particular, the regression in which the help-giving strategies predicted number of friends was computed again, but this time Times 1 and 2 positive friendship quality were also entered on Step 1 as controls. Likewise, the regression in which the help-giving strategies predicted positive friendship quality was computed again, but Time 1 and Time 2 number of friends were entered on Step 1 as controls. Because both number of friends and positive friendship quality were included in the same models, the smaller sample ($N = 318$) of youths with friendship quality data was used. In these analyses, the avoidance/blaming strategy remained a significant predictor of positive friendship quality when

Table 4

Summary of Regression Analyses: Time 1 Help-Giving Strategies Predicting Time 2 Friendship Adjustment

Variable	Time 2 number of friends ($N = 912$)				Time 2 positive friendship quality ($N = 318$)			
	β	t	R^2	ΔR^2	β	t	R^2	ΔR^2
Step 1								
Time 1 peer acceptance	.03	0.63			.02	0.30		
Time 2 peer acceptance	.21	4.88***			.04	0.50		
Time 1 friend variable	.46	14.28***	.334***		.56	10.21***	.273***	
Step 2								
Time 1 verbal support	.02	0.54			.01	0.23		
Time 1 distraction/behavioral denial	.02	0.51			.01	0.26		
Time 1 avoidance/blaming	−.07	2.48*	.339***	.005	−.10	2.02*	.285***	.012

Note. Because multiple imputation was used, degrees of freedom varied across analyses (Alison, 2002). For analyses involving number of friends ($N = 912$), *df* values ranged from 832.85 to 906.99. For analyses involving positive friendship quality ($N = 318$), *df* values ranged from 275.83 to 303.25.
* $p < .05$. *** $p < .0001$.

number of friends was controlled, $\beta = -.10$, $t(285.83) = 1.99$, $p < .05$. However, the avoidance/blaming strategy no longer predicted number of friends when positive friendship quality was controlled, $\beta = -.04$, $t(308.95) = 0.97$.

To test whether the effect on number of friends became non-significant because friendship quality was controlled or because the smaller sample was used, the regression was computed again with the sample of 318 without controlling for positive quality. That is, the regression that was originally tested in the sample of 912 was now tested in the sample of 318. In this subsample, the effect of the avoidance/blaming strategy again was nonsignificant, even though friendship quality was not controlled, $\beta = -.04$, $t(306.21) = 1.05$. Perhaps the effect became nonsignificant in the subsample because all friendless youths (who could not have friendship quality data) were excluded, decreasing the variance in the number of friends variable. Regardless, the analyses did not suggest that the effect became nonsignificant because the strate-

gy's effect on number of friends was overlapping with the effect on positive friendship quality.

Time 1 Friendship Adjustment Predicting Time 2 Strategies

Regression analyses next tested whether Time 1 friendship adjustment predicted the Time 2 help-giving and help-seeking strategies. Results are presented in Table 5 for the help-giving task and Table 6 for the help-seeking task. For the help-giving task, three regressions tested whether Time 1 number of friends predicted changes in strategies. One of the three Time 2 help-giving strategies (verbal support, distraction giving/behavioral denial, avoidance/blaming) served as the dependent variable in each analysis. The Time 1 value of that strategy was entered on Step 1 as a control. Time 1 acceptance also was entered on Step 1 a control. Time 1 number of friends was entered on Step 2. Controlling for

Table 5

Summary of Regression Analyses: Time 1 Friendship Adjustment Predicting Time 2 Help-Giving Strategies

Variable	Time 2 verbal support				Time 2 distraction/behavioral denial				Time 2 avoidance/blaming			
	β	t	R^2	ΔR^2	β	t	R^2	ΔR^2	β	t	R^2	ΔR^2
					($N = 912$)							
Step 1												
Time 1 peer acceptance	.02	0.79			.05	1.79			.00	0.13		
Time 1 strategy use	.48	15.54***	.231***		.43	14.08***	.209***		.40	12.24***	.161***	
Step 2												
Time 1 number of friends	.05	1.42	.233***	.002	.07	1.95*	.212***	.003*	−.11	3.18**	.171***	.010**
					($N = 318$)							
Step 1												
Time 1 peer acceptance	.02	0.36			.02	0.47			−.05	0.80		
Time 1 strategy use	.50	9.95***	.262***		.43	7.96***	.188***		.44	8.06***	.197***	
Step 2												
Time 1 positive friendship quality	.13	2.54*	.279***	.017*	−.12	2.33*	.203***	.015*	−.05	0.92	.200***	.003

Note. Because multiple imputation was used, degrees of freedom varied across analyses (Alison, 2002). For analyses involving number of friends ($N = 912$), *df* values ranged from 686.65 to 789.33. For analyses involving positive friendship quality ($N = 318$), *df* values ranged from 294.59 to 313.99.
* $p \leq .05$. ** $p < .01$. *** $p < .0001$.

Table 6

Summary of Regression Analyses: Time 1 Friendship Adjustment Predicting Time 2 Help-Seeking Strategies

Variable	Time 2 self-disclosure/advice seeking				Time 2 distraction/behavioral denial				Time 2 excluding			
	β	t	R^2	ΔR^2	β	t	R^2	ΔR^2	β	t	R^2	ΔR^2
					(N = 912)							
Step 1												
Time 1 peer acceptance	−.07	2.26*			.07	2.34*			−.02	0.77		
Time 1 strategy use	.51	17.38***	.270***		.39	12.68***	.162***		.41	12.84***	.169***	
Step 2												
Time 1 number of friends	−.04	1.29	.272***	.002	.04	1.18	.163***	.001	−.10	2.97**	.177***	.008**
					(N = 318)							
Step 1												
Time 1 peer acceptance	−.11	2.30*			.09	1.74			.00	0.04		
Time 1 strategy use	.56	11.62***	.331***		.37	6.99***	.146***		.40	7.38***	.157***	
Step 2												
Time 1 positive friendship quality	.04	0.87	.333***	.002	−.11	2.06*	.158*	.012*	.00	0.03	.158***	.001

Note. Because multiple imputation was used, degrees of freedom varied across analyses (Alison, 2002). For analyses involving number of friends (N = 912), *df* values ranged from 686.65 to 789.33. For analyses involving positive friendship quality (N = 318), *df* values ranged from 294.59 to 313.99.
* $p < .05$. ** $p < .01$. *** $p < .0001$.

Time 1 acceptance ensured that effects of the Time 1 friendship variables on strategies could not be due to Time 1 acceptance predicting the Time 2 strategies and the Time 1 friendship variables simply being correlated with Time 1 acceptance. Time 1 number of friends did not predict Time 2 verbal support strategies. However, having more friends at Time 1 predicted greater distraction giving/behavioral denial strategies at Time 2. Having more friends at Time 1 also predicted lower avoidance/blaming strategies at Time 2.

These analyses were repeated using Time 1 positive friendship quality as a predictor. Greater positive friendship quality at Time 1 predicted greater verbal support strategies at Time 2. Greater positive friendship quality at Time 1 also predicted lower distraction giving/behavioral denial strategy scores at Time 2. This was interesting given that having more Time 1 friends predicted *greater* Time 2 distraction giving/behavioral denial strategies. Time 1 positive friendship quality was not predictive of Time 2 avoidance/blaming strategies.

Next, a parallel set of analyses was conducted for the three help-seeking strategies (self-disclosure/advice seeking, distraction seeking/behavioral denial, excluding). Three regressions tested the effects of number of friends on the Time 2 strategies, with one Time 2 strategy serving as the dependent variable in each analysis. The Time 1 score for that strategy was entered on Step 1 as a control as was Time 1 peer acceptance. Time 1 number of friends was entered on Step 2. Time 1 number of friends did not predict the Time 2 self-disclosure/advice-seeking strategy or the Time 2 distraction/behavioral denial seeking strategy. However, having more friends at Time 1 predicted lower excluding strategies at Time 2.

These analyses were performed again with Time 1 positive friendship quality as a predictor. Time 1 positive friendship quality did not predict the Time 2 self-disclosure/advice-seeking strategy or the Time 2 excluding strategy. However, greater positive friendship quality predicted lower distraction seeking/behavioral denial strategy scores at Time 2.

Of additional interest was whether Time 1 number of friends and Time 1 positive friendship quality were unique predictors of changes in strategies. There was only one case in which Time 1 number of friends and Time 1 positive friendship quality predicted the same Time 2 strategy. However, in that case, Time 1 number of friends predicted *increases* in distraction giving/behavioral denial in the help-giving task, whereas positive friendship quality predicted *decreases* in the same strategy. If these effects had been in the same direction, testing whether each effect held while controlling for the other to determine whether the effects were unique or overlapping would be important. However, given that the friendship variables had *opposite* effects on the strategy, it is clear that the effects were not redundant.

Discussion

The present study is the first to our knowledge to indicate that youths' friendship experiences uniquely predict changes in their social competencies over time, while controlling for peer acceptance. Specifically, having friends and having friendships high in positive quality predicted changes in a wide variety of strategies in help-giving and help-seeking tasks.

Results also indicated that youths' strategies predicted changes in their friendship adjustment. However, fewer effects were significant with only the most negative strategies predicting changes in friendship adjustment. With these contributions, this study extends our knowledge regarding the important interplay between social competencies and adjustment in friendships.

Given the considerable literature identifying the social skills that precede peer acceptance (Coie et al., 1990; Dodge, 1983), it is surprising that a parallel literature identifying the social skills that predict friendship success never emerged. It is notable that, for the help-giving task, the current study indicates that positive strategies, such as talking with the friend and offering advice and reassurance, did not impact friendships. However, endorsing the strategy of avoiding the friend or blaming the friend for the

problem predicted having fewer friends by the end of the school year and friends who reported increasingly low positive friendship quality. These negative behaviors in response to situations in which a friend could benefit from help may be perceived as greater transgressions than simply failing to respond in a more positive manner.

Given these findings, it is interesting that no strategies in response to the help-seeking task predicted changes in friendship, suggesting that how youths give help has a greater impact on friendships than how they seek help (see also Rose & Asher, 2004). Friends may be more accepting of the ways in which youths respond to their own problems. When youths encounter peer stressors, friends may assume that they are distressed and so judge them less harshly for responding in undesirable ways, such as avoiding them or refusing to talk about the problem.

Likewise, it is notable that no help-giving or help-seeking strategies predicted changes in friendship conflict. These results speak to the utility of adopting a social task perspective for gaining a nuanced understanding of the social skills required for success in different aspects of friendship. Although youths' responses to helping tasks were associated with positive friendship quality and not conflict, youths' responses to other social tasks, such as conflicts of interests (Rose & Asher, 1999), may be more predictive of changes in friends' perceptions of conflict.

More generally, although few helping strategies predicted changes in friendships, youths' strategies in response to other tasks might be stronger predictors of adjustment across the different indicators of friendships adjustment. In the help-giving task, the most negative strategies predicted changes in friendships. As such, youths' responses to situations that are most likely to elicit aversive behaviors, such as conflict situations or other situations in which youths may feel slighted or betrayed, could be particularly robust predictors of friendship adjustment.

In addition, although relatively few significant effects emerged for this direction of effect, the results nonetheless have important implications. They suggest an approach to social skills training that would not be intuitively obvious. When adults talk with youths about helping in friendships, they likely talk about being supportive and encourage youths to talk to friends, say kind things, and help friends find solutions to problems. However, the current study suggests that such advice may not be especially useful for friendships. It simply may not occur to adults to talk with youths about what they *should not* do when interacting with a friend with a problem. The current study highlights the importance of steering youths away from negative strategies such as avoiding or blaming a friend. Such findings are important given that relatively little is known about how to promote youths' success in dyadic friendships, despite the fact that effective social skills interventions have been developed to increase peer acceptance (see Asher et al., 1996).

Perhaps the most significant contribution of the current research, however, is that it tests the understudied proposal that friendship experiences provide a context for the development of social competencies. This proposal has been well accepted by peer relations researchers (Asher et al., 1996; Berndt, 1982; Burhmester & Furman, 1986; Sullivan, 1953), and it is surprising that it has not received more empirical attention. It is interesting that, although few strategies impacted changes in friendships, friendship experi-ences had a broader impact on how youth approached help-giving and help-seeking situations.

In addition, although having friends and having friendships high in positive quality both predicted changes in strategies, these different friendship experiences impacted strategies in different ways. Experiencing high-quality friendships was hypothesized to predict increases in emotionally engaged strategies (Burhmester & Furman, 1986; Sullivan, 1953). In contrast, simply having more friends was not expected to be sufficient enough to prompt the development of emotionally engaged strategies. In the help-seeking task, positive friendship quality did not impact the self-disclosure and advice seeking strategies. However, consistent with hypotheses, in the help-giving task, experiencing high-quality friendships did predict greater verbally supportive strategies (e.g., talking about the problem, offering advice, offering reassurance). Experiencing closeness and connection in high-quality friendships may foster compassion and a desire to actively support friends. Also, friends who already perceive the relationship as high-quality may respond especially warmly to youths' verbal support, further reinforcing the behavior. In addition, as expected, having more friends did not predict changes in the self-disclosure and advice seeking strategy in the help-seeking task or the verbal support strategy in the help-giving task.

The results that best highlight the different impact of the different friendship experiences on strategies, however, involve the positive but more emotionally disengaged strategies of engaging in a distracting activity and acting like the problem never happened. If high-quality friendships instill in youths the expectation that friends should show an active interest each others' problems, these emotionally disengaged strategies may be discouraged. In fact, positive friendship quality did predict decreases in distraction giving and behavioral denial in the help-giving task and in distraction seeking and behavioral denial in the help-seeking task. In contrast, given that having multiple friendships may place a heavy demand on youths' interpersonal resources, it was proposed that having more friends might push youths toward adopting these less engaged strategies. Consistent with this idea, having more friends predicted increases in distraction giving and behavioral denial in the help-giving task. In the help-seeking task, having more friends was positively related to distraction seeking and behavioral denial, but the relation was not significant.

Finally, we hypothesized that both having friends and having high-quality friendships would predict decreases in youths' endorsement of negative strategies, such as avoiding and blaming the friend in the help-giving task and avoiding and refusing to talk to the friend in the help-seeking task. However, only having more friends predicted decreases in these strategies. Having multiple friends may offer youths a broader perspective on how friends' typically behave, increasing their awareness that avoidant and hostile behaviors are unusual in friendships and major transgressions. Having more friends also could increase the chances that at least one friend would offer truthful feedback regarding avoidant or hostile behavior, which could deter the behavior. It is not clear why high-quality friendships did not impact these strategies. However, given that youths with more friends were least likely to endorse these strategies, and youths with friendship quality data had at least one reciprocal friend at both time points, these youths may have endorsed these strategies at a very low level in the fall leaving little room for change.

To summarize, the results support the idea that different friendship experiences exert unique effects on the development of social competencies. Whereas having high-quality friendships uniquely predicted emotionally engaged help-giving strategies (i.e., talking about the problem, offering advice, offering reassurance), having more friends uniquely predicted decreases in avoidant or hostile help-giving and help-seeking strategies. Moreover, whereas positive friendship quality predicted *decreases* in strategies involving distraction and acting like the problem never happened, having more friends predicted *increases* in these strategies. Finally, friendship conflict was unrelated to changes in strategies. As noted, friendship conflict may be more closely tied to other tasks. For example, experiencing friendship conflict may lead youths to feel more justified in endorsing aggressive or hurtful strategies in response to conflict tasks in friendships. Regardless, the current null results for friendship conflict fit with the notion that different friendship experiences have unique impacts on youths' responses to helping tasks.

In addition, although we have primarily discussed the two directions of effect separately, the results also suggest a bidirectional influence between some strategies and friendship adjustment. Endorsing the help-giving strategies of avoiding the friend and blaming the friend predicted having fewer friends over time, and having fewer friends predicted increases in these strategies. Interventions that steer youths away from these strategies may break this cycle by enabling youths to make more friends, which may increase their awareness that the strategies are problematic and prompt decreases in their use.

However, in every other case in which an index of friendship adjustment predicted a change in a strategy, the strategy did not predict a change in that index of friendship adjustment. This begs the question of how it could be adaptive for friendships to promote the development of competencies that are not important for the success of friendships. One possibility is that youths acquire competencies in friendships that do not directly benefit the friendships but positively impact relationships later in life. For example, although positive friendship quality predicted increases in the verbal support strategy in the help-giving task, this strategy did not predict changes in friendship. However, being verbally supportive in response to a relationship partner's problems may be crucially important for mature adult relationships, perhaps especially romantic relationships (Gurung, Sarason, & Sarason, 1997; Verhofstadt, Buysse, Ickes, De Clercq, & Peene, 2005). This fits with the idea that youths learn skills in friendships that are necessary for relationships during the next developmental stage (Burhmester & Furman, 1986; Sullivan, 1953).

Finally, the study also explored gender and developmental differences. Some gender and grade differences emerged in the degree to which youths endorsed the strategies. In both tasks, girls were more likely than boys to endorse emotionally engaged strategies such as talking about the problem and seeking/giving advice, whereas boys were more likely to endorse strategies involving avoidant or hostile behavior. These results fit with past research regarding these tasks (Rose & Asher, 2004) and the broader literature (Rose & Rudolph, 2006). The pattern of grade effects was unexpected. Although disclosure typically increases with age (Furman & Bierman, 1984; Hartup, 1996; Youniss, 1980), younger youths were more likely to endorse the verbal support strategy in the help-giving task and the self-disclosure and advice seeking strategy in the help-seeking task. In the current study, younger youths may perceive these tasks as requiring greater help-giving and help-seeking because they have less experience with peer stressors.

In any event, despite mean-level differences, strategies predicted changes in friendships in similar ways across genders and grades, suggesting that the functional significance of the strategies in regards to promoting friendship success was similar for girls and boys and for younger and older youth. Likewise, associations between friendship experiences and changes in strategies were similar across genders and grades, suggesting that the implications of friendship experiences for the development of social competencies were similar across genders and grades. However, developmental differences may have emerged if younger or older individuals were considered. For example, as noted, in help-giving tasks, verbal support strategies may be an important predictor of adjustment in relationships among older adolescents and adults.

Although the current study makes significant contributions, there also are limitations and future directions. First, research to date has considered only a few of the social tasks that Asher et al. (1996) proposed to be important for friendships. Prospective relations between youths' strategies and their adjustment in friendship should be considered in response to a broader variety of tasks, such as forgiveness and the ability to engage friends in fun and enjoyable ways. Considering a broader range of tasks may reveal additional relations between youths' strategy responses and changes in friendship adjustment.

Second, future research also should replicate the results with other indicators of social competence. In the current study, youths' behavior in help-giving and help-seeking tasks was of interest. However, evaluations of strategies were used as a proxy for behavior. Given that youths' responses to hypothetical vignettes are related to their real-life behavior (Chung & Asher, 1996; Dodge & Frame, 1982), the current approach was likely reasonable. In addition, other assessments have drawbacks too. For instance, with naturalistic observation it would be impossible to ensure that every youth encountered a helping situation, and, even if they did, the features of the situations would vary across youth. As other examples, a drawback of adults' reports is that adults may be less aware of the nuances of youths' behavior with friends and a drawback of peers' reports is that they may be influenced by their own relationships with one another. Nevertheless, converging results across assessments like these would bolster confidence in the results.

In addition, the confound between grade and friendship assessment should be addressed. Third- and fifth-graders chose friends from a roster of peers in their self-contained classroom where they spent their days, whereas seventh- and ninth-graders who switched classes during the day could nominate any grademate. For each grade, the assessment that best fit the school social context was chosen. Still, these differences may have influenced the results, especially those indicating that older youths had fewer friends. Because older youths could interact with any grademate, they may have been friendly with more peers than were younger youths. This could make choosing only three friends difficult, creating more mismatches when assessing reciprocity. As such, replicating the results with an assessment in which youths could choose an unlimited number of friends would be helpful. This also would be useful because limiting youths to three friendship choices might

have artificially restricted the variance in this variable, making it more difficult to detect effects. In addition, replicating the results in a small school district (50–100 students per grade) in which gradewide nominations would be appropriate and comparable across all grades would be useful too. Despite the mean-level grade effects in the current study, however, it is important to reiterate that no grade differences were found in relations between strategies and friendship adjustment. Nevertheless, replicating the current results in both elementary and secondary schools with other friendship assessments would provide further support for the findings.

In closing, despite limitations, this is the first empirical study to examine the prospective associations between youths' social strategies and their friendship adjustment, after controlling for peer acceptance. The current findings suggest that some youth endorse quite negative strategies in response to situations in which their friend is in need and these strategies are damaging to friendships. The results further suggest that abstaining from these strategies is more important for friendships than whether or not youths provide active support to friends. Most important, the study provides support for the well-cited but rarely evaluated proposal that friendship experiences contribute to the development of social competencies. Finding that friendship experiences predicted changes in strategies in helping situations above and beyond any effect of peer acceptance supports the idea that friendships in particular provide a critical venue for the development of skills that may be important for success in current friendships and, perhaps, other close relationships later in life.

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(*Appendices follow*)

Appendix A

Brief Descriptions of the Hypothetical Situations in Which the Youth Could Give Help

1. Classmates are laughing and pointing at your friend when she is making a class presentation.

2. Classmates keep bothering your friend and keeping her from finishing a project due at the end of the day.

3. In gym class, classmates are keeping the ball from your friend and laughing at her.

4. Classmates are supposed to work on a class project with your friend but tell her to do the project by herself.

5. Classmates start laughing and making fun of your friend after she tripped and almost fell while walking down the hall.

6. A classmate who is sharing candy with several other students refuses to share candy with your friend.

Appendix B

Brief Descriptions of the Hypothetical Situations in Which the Youth Could Seek Help

1. A classmate tells you that you cannot sit next to her at a computer during free time.

2. Classmates make fun of you because the teacher gives out cookies to everyone but forgets to give one to you.

3. Classmates throw paper balls and eraser shaving at you while you are working on homework.

4. A classmate pulls the pencil out of your hand and will not give it back.

5. You get picked for a team for a game and classmates already picked for the team start groaning.

6. Classmates tease you by knocking papers off your desk.