

SELF-ESTEEM IN LEARNING DISABLED CHILDREN:
THE ROLE OF SOCIAL COMPETENCE

A Thesis

Presented to

The Faculty of Graduate Studies

of

Lakehead University

by

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In partial fulfillment of requirements

for the degree of

Master of Arts

May, 1995

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ISBN 0-612-09191-0

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Abstract

This study compared the self-esteem of a group of twenty-one socially and behaviourally competent learning disabled (LD) children, aged 8-12, with that of a group of fifteen socially and behaviourally competent normally achieving (NA) children. Measures used were the Self-Perception Profile for Learning Disabled Students (SPPLDS) and the Social Support Scale for Children (SSSC). The hypotheses that the two groups would not differ in the SPPLDS domains of Social Acceptance and Global Self-Esteem were supported. The hypothesis that the LD children would rate themselves lower in the academic domains was partially supported, as the LD students gave themselves lower scores than did the NA group in Reading and Spelling, but not in Math. The SPPLDS domain of Physical Appearance correlated strongly with self-esteem for both groups, as did the SSSC domain of Classmate Support. Overall, these socially competent LD children were remarkably similar to their NA counterparts in self-esteem, self-perceived competencies, and sources of social support, differing mainly in academic self-concept and abilities.

Acknowledgements

I would like to express my gratitude to my two supervisors, Dr. Fred Schmidt and Dr. Ed Rawana, for their ideas and insight and for their painstaking attention to my writing of this thesis. I would also like to thank Dr. Ed Bauman for his input as part of the thesis committee.

I am also very grateful to the participating staff, students and parents of the following Lakehead Board of Education schools: Agnew H. Johnston, Crestview, Drew Street, Edgewater Park, Kingsway Park, McKellar Park, Ogden, Prospect Avenue, Riverdale, Shuniah, Sir John A. MacDonald, Vance Chapman, and Westmount. I especially salute the many teachers who generously took time from their busy schedules to complete questionnaires for me.

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Introduction

In recent years, the importance of self-esteem, particularly in children, has been recognized by many researchers. For example, Harter (1987) claims that self-worth mediates one's affective and motivational states. Someone with high self-esteem will be cheerful and energetic, while someone who thinks poorly of him/herself will feel depressed and disinclined to expend energy in various activities. Schilling (1986) suggests that there is an interdependence between children's self-esteem and their academic and social performance. Moreover, low self-esteem in childhood may become chronic and persist into adulthood, contributing, for example, to employment problems (Searcy, 1988).

While self-esteem and self-concept have become familiar terms to many, the distinction between these two constructs is not always clear. Self-concept can be defined as "the perceptions we have of ourselves physically, intellectually, socially" (Schilling, 1986). Self-esteem is "the overall value that one places on oneself as a person, in contrast to domain-

specific evaluations of one's competence or adequacy" (Harter, 1989). In other words, self-concept is defined as a personal evaluation of one's skills, while self-esteem is a judgment about one's overall worth.

Various models have been proposed to describe and explain self-concept and self-esteem. Coopersmith (1967) emphasized self-concept, operationalizing it as a summation of self-evaluated competencies across a range of domains. He made no distinction between self-concept and self-esteem, implying that a person who feels competent also feels worthwhile. Rosenberg (1979) concentrated on overall self-esteem, but did not consider underlying self-judgments of competency in specific domains, or self-concept. He did not think that anyone could pinpoint the factors that lead to high self-esteem, although self-esteem itself could be measured. However, these unidimensional approaches mask important distinctions that adults and children make in evaluating themselves (Harter, 1989). For example, the self-concept profile of someone who excels academically but does poorly in the social arena would be much different from that of someone who possesses good social skills but is failing in school. Thus, a

multidimensional approach seems preferable.

Piers and Harris (Piers, 1984) developed a measure based on this approach, assessing self-concept in various academic and non-academic domains. An overall measure of self-esteem was then derived indirectly, by combining the different self-concept scores. However, Harter (1987) has taken the multidimensional process a step further by assessing self-concept across different domains, and then assessing self-esteem directly, as a separate construct. Self-concept questions pinpoint one's self-evaluations in different areas, such as academics or physical appearance, while questions used to assess self-esteem pertain to such things as liking oneself and being happy with one's life. Harter's model also has the advantage of being more psychometrically sound than is the Piers-Harris approach (Bogan, 1988).

Harter's Model of Self-Esteem

Harter's model is based in part on the theories of two pioneers in the field of self-esteem, William James and C.H. Cooley (Harter, 1989). She sought empirical evidence for both theories in order to derive a comprehensive model of self-worth. The basis of James'

theory is that a person's self-esteem depends on his/her degree of success in whatever domain he/she considers important (in Harter, 1989). These areas of importance differ from person to person. Searcy (1988) used the example of two children who are physically attractive, but do not do well in school. The child for whom looking good was most important would have higher self-esteem than the one for whom academic success mattered more. The person with high self-esteem, then, is one for whom there is little discrepancy between the importance of a domain, and his/her competence in that domain.

To test James' theory, Harter (1989) compared children's self-perceived competencies in various domains to the importance the children placed on success in these domains. Her subjects were school children in Grades 3 to 8. Harter's Self-Perception Profile for Children (SPPC) (1985) provided a measure of each child's perceived competence in five different domains. Overall self-esteem was measured on the same test, using a separate set of questions.

The structure of the SPPC (Appendix A) is a series of paired statements such as, "Some kids have trouble

figuring out the answers in school BUT Other kids almost always can figure out the answers." The child is to choose which group of children s/he most resembles, and to what degree ("really true for me" vs. "sort of true for me"). The child then receives a score ranging from 1 (choosing the more negative statement as really true for self) to 4 (choosing the more positive statement as really true for self) for each pair of statements. The higher the average score in each area, the higher the subject's self-perceived competence in that domain. This provides an indication of each child's self-concept in the scholastic, athletic, peer social acceptance, physical appearance and behavioural conduct domains, as well a separate measure of their overall self-esteem. Then, on a second rating scale, called "How Important are These Things to How You Feel About Yourself as a Person" (Appendix B), the children were asked to judge how important it was to them to do well in each of these domains.

Using the information collected from these two rating scales, Harter then calculated discrepancy scores (competence rating minus importance rating) for each domain, for each child. A Total Discrepancy Score

was then calculated by averaging the child's individual discrepancy scores from only the domains s/he indicated as being personally important (calculation method, Appendix C). Correlations between the Total Discrepancy Score and that of the self-esteem domain ranged from -.72 to -.55. This means that the larger the discrepancy score in the negative direction (importance rating exceeded the perceived competence), the lower the level of self-esteem. The closer the discrepancy score was to 0, the higher the level of self-esteem.

Harter (1989) also found that children with low self-esteem are unable to discount the importance of a domain in which they are not competent, while children with high self-esteem are able to downplay the importance of domains in which they are less competent.

Cooley's theory of self-esteem rests on an entirely different premise (Harter, 1989). His focus was on the social origins of the self. He postulated that one's self-esteem is derived by incorporating the attitudes that significant others show toward oneself. He used the term "looking-glass self" to explain how our self-image is a reflection of the way other people see us. As part of the same study reported above,

Harter (1989) provided empirical evidence in support of Cooley's theory. First she defined the construct of others' opinions toward the child as the degree to which the child felt that others acknowledged the child's worth as a person. This included perceived positive regard as well as the perceived emotional support received. Sources of regard/support were parents, teachers, classmates and close friends. The instrument used was Harter's Social Support Scale for Children (1985b) (SSSC) (Appendix D). Self-Esteem was measured using the global self-worth scale of the SPPC (Harter, 1985). Harter found that correlations between overall positive regard and self-esteem ranged from .50 to .56 across several samples. This means that the more a child feels that significant others have regard for him/her, the more regard he/she will have for him/herself, or the higher his/her self-esteem will be. Path analysis supported the premise that regard from others is causally related to self-esteem.

Harter (1989) found that James' and Cooley's constructs had a similar magnitude of impact on self-esteem. She concluded (Harter, 1987) that both constructs are important in determining self-esteem,

and work together in an additive fashion. The presence of one does not compensate fully for the absence of the other. Even if a child shows very little discrepancy between competence perceptions and importance ratings, s/he will suffer some loss in self-esteem if s/he does not feel the socioemotional support of significant others. Similarly, a child who feels loved and supported will still experience lower self-esteem if s/he cannot achieve competence in areas of personal importance.

Developmental Differentiation of Domains and Sources of Social Support

The domains pertinent to assessing self-concept change across the lifespan (Harter, 1989). For example, 4- to 7-year-olds are capable of making self-judgments in the areas of cognitive competence, physical competence, social acceptance, and behavioural conduct. However, while these children certainly possess a sense of their own self-worth, they cannot articulate it due to their cognitive limitations. Older children, ages 8 to 12, can differentiate among scholastic competence, athletic competence, peer social acceptance,

behavioural conduct, and physical appearance, as well as being able to make judgments about their own self-worth. As age increases, domains relevant to age groups proliferate and change. Table 1 shows the self-concept domains applicable to three periods of the lifespan.

Of all the domains important to one's feelings of self-worth, the degree of satisfaction with one's physical appearance seems to be the best predictor of self-esteem. Combining Harter's many studies of subjects between the ages of 8 and 50 years, correlations between physical appearance discrepancy scores and self-esteem measures hovered around $-.65$. That is, the larger the difference between the value a subject placed on physical appearance and their actual self-perceived physical attractiveness, the lower the level of self-esteem. For elementary (Grades 3-6) and middle-school (Grades 6-8) children, the correlations were $-.66$ and $-.57$, respectively. The second-most important domain was that of social acceptance, where correlations were $-.45$ and $-.36$ for elementary and middle-school children. The domains of scholastic competence, athletic competence, and behavioural conduct contributed least to the children's

Table 1

Domains of the Self-Concept at Each Period of the Life Span.

Early Childhood	Middle/Late Childhood	Adolescence
Cognitive competence	Scholastic competence	Scholastic competence Job competence
Physical competence	Athletic competence Physical appearance	Athletic competence Physical appearance
Peer acceptance	Peer acceptance	Peer acceptance Close friendship Romantic relationships
Behavioral conduct	Behavioral conduct Global self-worth	Conduct/morality Global self-worth

from Harter, Susan (1989). Causes, correlates, and the functional role of global self-worth: A life-span perspective. In J. Kolligan & R. Sternberg (Eds.) Perceptions of competence and incompetence across the life span (p. 73). New Haven, CT: Yale University Press.

self-esteem. For example, even a sample of intellectually gifted children in Grades 3 and 4 gave more weight to their physical appearance ($\bar{r} = -.67$) than they did to their excellent scholastic competence.

The domains of physical appearance and social acceptance continued to be of highest importance into later childhood and adolescence. By college age, the correlation between physical appearance and self-esteem jumped to $-.80$, while the correlation between peer social acceptance and self-esteem increased to $-.60$. It is interesting to note that, although the population reflected in this particular study was that of college students, the domains most indicative of level of self-esteem were not those that reflected particular skills. At the college level, one might think that skill-related competencies, such as job skills or intellectual abilities, would be more important. However, the physical self continued to play a more critical role in determining self-esteem than did the psychological self, even at this developmental stage and level of education.

In adulthood, physical appearance was again found to be the domain most highly correlated to self-esteem, but to a lesser extent than in college students

($\underline{r} = -.61$). Other predictors of self-esteem in adults shared similar correlations. These were intimate relationships ($\underline{r} = -.56$), sociability ($\underline{r} = -.50$), intelligence ($\underline{r} = .55$), and adequacy as a provider ($\underline{r} = -.53$).

Thus, it appears that physical appearance and social acceptance are the best predictors of one's self-esteem across the lifespan, with a minor variation in the social aspects of adulthood. Other researchers have also found physical and social factors to be the most important determinants of self-esteem for children in general. For example, Blechman, Tinsley, Carella, and McEnroe (1985), whose research subjects were 474 children in Grades 2-6, found that the happiest of these children, as measured by the Peer Nomination Inventory, were those who experienced both academic and social success, while the least happy were those children who were incompetent in both of these domains. However, for children who were only competent in one of these two areas, those who were socially competent were much happier than those who were only academically competent. Bear, Clever and Proctor (1991) surveyed 124 children in eight regular Grade 8 classrooms using the SPPC (Harter,

1985). They found that physical appearance was most highly correlated with overall self-esteem ($\underline{r} = .60$) for these children. The correlation between social acceptance and self-esteem was .41, and between scholastic competence and self-esteem .38.

With respect to social acceptance, the most important sources of social support among children in Grades 3-6 and 6-8 were found to be parents (correlation with self-esteem = .42 and .45, respectively) and classmates ($\underline{r} = .46$ and .42, respectively). Of lesser importance were the support of friends ($\underline{r} = .38$ and .30) and teachers ($\underline{r} = .36$ and .27) (Harter, 1987).

Harter has explored self-esteem issues in many different areas, including the effect of self-esteem on affect (mood) and motivation in children (1987) and on depression and suicidal ideation in adolescents (1989). She has also considered self-esteem in special needs groups, for example, the educable mentally retarded (Silon & Harter, 1985). Of particular importance to this study is her work with learning disabled (LD) children (Renick & Harter, 1988, 1989).

Self-Esteem in Learning Disabled Children

Self-Esteem Issues. Children with learning disabilities (LD) are, by definition, of average or above-average intelligence. They differ from normally-achieving (NA) students mainly in their inability to perform academically at the level their intelligence alone would predict (Reynolds, 1985; Renick & Harter, 1988; Sattler, 1990, p.598). Many also experience difficulty in social relationships (Stone & La Greca, 1990). It is not surprising, therefore, that some studies have shown LD children to be at a greater risk for having low self-esteem, than are NA children. For example, Black (1974) observed that self-esteem in both LD and NA children was significantly and negatively related to age, school grade and measures of achievement retardation (deficit). With greater deficits in academic achievement, the LD children in his study also scored lower in self-esteem than did the NA students. However, the lower self-esteem score could have been an artifact of using the Piers-Harris Children's Self-Concept Test because the overall self-concept score is derived using the scores of the other scales which would include an academic measure.

Rogers and Saklofske (1985) compared LD and NA children from the same classrooms on the Piers-Harris Children's Self-Concept Scale (Piers, 1984), the Student's Perception of Ability Scale and the Projected Academic Performance Scale. Compared to the NA children, LD students had lower self-esteem, lower academic self-concept, more external locus of control orientations, and lower performance expectations.

It should not be assumed, however, that all LD children have low self-esteem. Other studies have found that some LD children, despite their limitations in different areas, experience levels of self-esteem comparable to those of NA children. Kistner, Haskett, White and Robbins (1987) compared 48 LD and 48 NA middle- and elementary-school children, using the Perceived Competence Scale for Children (PCSC) (Harter, 1982) and the Teachers' Rating Scale of Child's Actual Competence (Harter, 1979). The LD children rated themselves lower than the NA children in the areas of scholastic and athletic ability. However, the groups did not rate themselves differently in terms of either social competence or overall self-esteem.

It appears that research findings in the area of

self-esteem in LD children may depend in part on the measures used. This is evident in the studies reported here, and has also been noted in a study by Clever, Bear, and Juvonen (1992). Clever et al. report that measures that derive a self-esteem score from an aggregation of self-perceived competencies across various domains usually find that the self-esteem of LD subjects is lower than that of NA children. An example of such a measure is the Piers-Harris Self-Concept Scale (Piers, 1984). However, when self-esteem is measured as a separate construct, as in Harter's Perceived Competence Scale for Children (Harter, 1982) or its revision, the Self-Perception Profile for Children (Harter, 1985), this difference is not necessarily found.

It is clear from these differences in research findings that careful consideration should be given in future studies to the measures used to assess self-esteem.

Academic Difficulties. When a child places undue emphasis on a domain in which he or she is not competent, the result is damaged self-esteem (Harter, 1989). It would be valuable then to determine which

competence domains are most highly correlated with self-esteem for learning disabled children. Renick and Harter (1989) looked at this question in a study involving 86 LD children in Grades 3-6. These children, who spent most of their school day in a regular classroom, and one hour per day in a specialized LD group, were administered the PCSC (Harter, 1982). This is a scale that predates the Self-Perception Profile for Children (Harter, 1985) and only measures self-concept in the domains of scholastic competence, athletic competence, social acceptance and global self-worth. It does not provide measures for the domains of behavioural conduct or physical appearance, while the SPPC (Harter, 1985) does. Overall, the domain of scholastic competence was most highly correlated with global self-worth for these students, ($\underline{r} = .59$, $\underline{p} < .0001$ when comparing themselves to NA students in regular class, and $\underline{r} = .42$, $\underline{p} < .0001$ when comparing themselves to other LD children). The correlation between global self-worth and social acceptance was $.34$, $\underline{p} < .0001$, and between global self-worth and athletic competence, also $.34$, $\underline{p} < .0001$.

Since children with learning disabilities are vulnerable to being described in terms of their academic

difficulty, it is perhaps not surprising that the domain of scholastic competence is so important to them. These children also make distinctions within this domain. They separate general intellectual ability (being smart) from more specific skills, such as competence in reading, writing or math. Because of these distinctions, Harter and Renick have developed a separate self-esteem instrument for use with this population, The Self-Perception Profile for Learning Disabled Students (Renick & Harter, 1988) (see Appendix E). In the SPPLDS, students rate their self-perceived competence in the domains of general intellectual ability, reading competence, writing competence, spelling competence, math competence, social acceptance, athletic competence, behavioural conduct, and physical appearance, as well as their level of global self-esteem. In the standardization sample for this instrument, Renick and Harter found the domain most highly correlated with self-esteem for both LD and NA students to be physical appearance, $\underline{r} = .75$, $\underline{p} < .001$ for LD students, and $\underline{r} = .71$, $\underline{p} < .001$ for the NA students. This is not surprising in light of other studies by Harter using the Self-Perception Profile for Students (Harter, 1985) that

have shown physical appearance to be the domain most important to the self-esteem of subjects of all ages, including NA and intellectually gifted children, college students and adults (1989). For the NA students in the standardization sample, the domain next in importance to physical appearance was social acceptance, $r = .56$, $p < .001$, followed by general intellectual ability, $r = .51$, $p < .001$. For the LD students, general intellectual ability was next in importance after the domain of physical appearance, $r = .55$, $p < .001$, followed by writing competence, $r = .45$, $p < .001$, then social acceptance and athletic competence, $r = .36$, $p < .001$ for both.

These studies point to a very important difference between LD students and normally achieving people of all ages. While the self-esteem of most of the population is largely influenced by physical appearance and social acceptance (Harter, 1989), intellectual ability ranks higher in importance to social acceptance for the LD student.

The structure of Harter's scales invites social comparison, as students are asked to compare themselves with their peers in determining their own competencies

in various domains. In Renick and Harter's (1989) study, 84% of the LD children spontaneously compared themselves with NA children, rather than their LD peers, when judging their academic competence. By comparing their academic competence to a group whose performance was by definition superior, these children unfortunately seemed to set themselves up for failure and an accompanying drop in self-esteem.

Further, a study by Bear et al. (1991) compared 341 Grade 3 LD and NA children in integrated classrooms using the Self-Perception Profile for Children (Harter, 1985). The LD children had significantly poorer self-perceptions of their scholastic competence and behavioural conduct than did the NA children, accompanied by lower self-esteem. Interestingly, NA children in integrated classrooms were found to have higher self-esteem than NA children in regular classrooms. It would appear that combining LD and NA children in a classroom may contribute to lower self-esteem in LD children, and higher self-esteem in NA children, as they compare themselves with one another.

In a study by Kistner et al. (1987), LD children who spent most of their time among NA peers rated their

competencies as lower than they really were, compared to their teachers' assessments. Other LD children who spent most of their time in special LD classes, tended to overrate their competencies compared to what their teachers reported. It would appear that social comparison factors played a part in the way in which these LD students rated themselves. That is, in a classroom containing only children with learning disabilities, a student could conceivably find other students to whom s/he compared favourably in terms of academic and other domains. However, in a classroom where there are both LD and NA children, it would be more difficult for an LD child to feel good about his/her own abilities when comparing him/herself with students who have no learning problems. The LD student's self-esteem is bolstered by comparing him/herself with others who have similar school problems, but his/her self-esteem would be diminished by comparing him/herself to others without similar handicaps.

It is evident, then, that the issue of social comparison must be considered when studying academic self-concept and self-esteem in LD children.

Social Skills and Relationships. In addition to their negative experiences in the academic arena, some researchers have also found LD children to have difficulties in their social relationships. For example, Sobol, Earn and Bennett (1983) found that LD children had low expectations of social success and a poorer social self-image when compared with NA children. Stone and La Greca (1990) examined the social status of a group of LD children, comparing them to their NA classmates in a mainstreamed classroom. Each child was given a list of his/her same-sex classmates, and asked how much s/he liked to play with each of the children on the list, using a scale of 1 "not at all" to 5 "Very, very much." Further, the children were asked to circle the names of the three classmates they liked the most, to yield a positive peer nomination rating. Negative peer nominations were inferred from the data using a procedure recommended by Asher and Dodge (1986). A Social Preference Score was then obtained by subtracting each child's Dislike score from his/her Like score. Thus, the Social Preference Score reflected how well-liked the child was. A Social Impact Score was derived by adding the child's Like and

Dislike scores. This measure reflected how much a child was considered by the other children to have some effect on them, whether positive or negative.

Relative to their NA peers, LD students received lower play ratings, lower Like scores, and higher Dislike scores. "Rejected" children were those who had a high Social Impact score, and a low Social Preference score. This means that they were noticed in the classroom, but not liked. "Neglected" children had a low Social Impact score. These were the children to whom no one paid much attention. In this study, LD children were overrepresented in both of these categories (75% of LD children vs. 45% of NA children), and underrepresented in the average and popular (high on Social Impact and Social Preference) groups (17% of LD children vs. 44% of NA children). The results may have been somewhat biased in favour of the NA children, however, due to the fact that the NA children outnumbered the LD children by more than 8:1. It was not reported whether each group (LD and NA) was more likely to nominate same-group peers. If so, the learning disabled children would have had fewer potential nominees.

The same researchers (La Greca & Stone, 1990) also compared LD children to low achieving (LA) and average achieving (AA) children to see if the LD child's lower social acceptance was due to his/her low academic achievement. Similar numbers of students comprised each group: 32 LD, 32 LA and 30 AA, from the same partially mainstreamed classrooms. They found no significant difference in peer acceptance between low achieving and average achieving students on peer rating and positive nomination measures. However, children with LD were rated significantly lower than the LA and AA groups on these measures. Similarly, using the SPPC (Harter, 1985), LD students rated themselves as less socially competent than the LA and AA children, while no significant difference was found between the LA and AA groups. The same pattern was found in examining measures of overall self-esteem. Thus, the LD children's low social competence and low self-esteem do not appear to depend entirely on their academic deficiencies. If academic achievement had been the most important factor, the LA group would have resembled the LD group more so than the AA group.

In summarizing the research on social competence

in learning disabled children, La Greca (1987) noted several social skill areas where LD children differ from their NA peers. Firstly, LD children are particularly vulnerable to peer pressure to engage in both antisocial and prosocial behaviour, as they may be overly willing to please. Secondly, while LD children exhibit positive social behaviours at the same rate as do NA children, the behaviours of the LD child are more likely to be less appropriate to the situation, or less skillful. Thirdly, LD children are less assertive verbally than are their NA counterparts, being less likely to disagree, argue, or question in conversation. This may be due in part to language processing difficulties common to many children with learning disabilities. Overall, it appears that LD children often have the necessary knowledge to make friends, but are unable to do so due to inappropriate and unassertive communication.

Hall and Richmond (1985) contend that, due to perceptual difficulties, LD children may be less adept than NA children at picking up non-verbal cues from their peers, making social interaction more difficult for them. They also observed that, because LD children

need to belong to a group and want to be included just as much as do NA children, this lack of social success can lead to lowered self-esteem.

Some researchers have concluded that the social difficulties experienced by many LD children are directly related to their learning disability. In fact, the U.S. Interagency Committee on Learning Disabilities has proposed a revision to the definition of learning disabilities, to include a social skills component. Their revised statement: "Learning disabilities is a generic term that refers to a heterogenous group of disorders manifested by significant difficulties in the acquisition and use of listening, speaking, reading, writing, reasoning, or mathematical abilities, or of social skills." (in McIntosh, Vaughn & Zaragoza, 1991, p. 451). However, some researchers have disputed the addition of social skills as a form of learning disability, and the presumption that the basis is neurological (except, possibly for certain subgroups). Gresham stated in a mini-series by several authors on LD and social functioning (La Greca & Vaughn, 1992), that while 75% of LD youth have social problems, there are likely many causes for it in this very heterogenous

group. Baum, Duffelmeyer & Geelan (1988) found a much lower incidence of social skills problems in LD students according to a poll of 299 resource teachers. Of the 3863 identified LD students represented by these teachers, nearly two-thirds did not show social skills deficits. Findings were consistent across age, school, and community (urban or rural) settings. Although the extent of social problems in LD children can be disputed, it seems evident that many do suffer to some degree from social skills deficits.

It is because children with LD are such a heterogenous group that La Greca (1987) has pointed out the importance of careful screening of LD students for research subjects. The presence of both social and behavioural problems in LD children is not uncommon. For example, Elliott & McKinnie (1994) found strong relationships between problem behaviours and social skills in children used as part of a national standardization sample for the Social Skills Rating System. Using the Problem Behavior Scale - Teacher form, which measures Internalizing Problems, Externalizing Problems, and Hyperactivity, the correlation between problem behaviours and social

skills was $-.76$ for NA students and $-.73$ for LD students. Most studies have not reported whether their LD subjects had behavioural and/or social problems in addition to their learning disability. This makes it difficult to determine whether differences in self-esteem have to do with the learning disability itself, or with other factors, such as poor social skills or behaviour problems. Given the association between self-esteem and social skills, it is possible that previous conclusions regarding the self-esteem of LD children could have been clouded by the heterogeneity of social skills and social behaviour exhibited by the LD subjects.

Conclusion

To summarize the pertinent literature, it would appear that in addition to physical appearance, academic and social competence also influence the self-esteem of learning disabled children. First, academic difficulty defines the LD student. Unfortunately, many of these children may place more emphasis on the importance of academic ability than on other domains in which success is more likely. It has been suggested that failure to achieve competence in an important

domain may detract from one's self-esteem (Harter, 1989). While not all studies have found self-esteem to be lower in LD children than in their NA peers, perhaps academic competence may play some part in lowering the self-esteem of some LD children. More in depth investigation is needed to determine how academic competence influences the self-esteem of subgroups of LD children who may differ in some important areas, such as in their social and behavioural skills.

Second, it has been determined that social competence is an important factor in the self-esteem of children in general (Harter, 1989; Boivin & Begin, 1989), whether they are LD or NA. However, many LD children do not possess good social skills. This results in problems in their social relationships, which may diminish their self-esteem. For those LD children who do possess adequate social skills, it is possible that social competence may be a protective factor in their self-esteem. Findings from the Blechman et al. (1985) study, involving a general population of children, suggest that social competence may help to improve the self-esteem of children who do poorly in academics. However, this issue has not been

specifically addressed in an LD population. Information obtained from such a study could provide valuable information to those who work with LD children, in helping these children to feel good about themselves.

The Present Study

The purpose of the present study is to examine the self-esteem of learning disabled children when important factors such as social competence and behavioural difficulties are carefully controlled. The LD children will be compared to NA children on self-concept and self-esteem using the Self-Perception Profile for Learning Disabled Students (Renick & Harter, 1988), and on self-perceived sources of social support using the Social Support Scale for Children (Harter, 1985b).

Since social comparison influences one's self-perceptions (Renick and Harter, 1989), it is important that all LD subjects be regularly exposed to both LD and NA peers. Therefore, the subjects in this study will be LD children who spend at least part of their school day in a regular classroom with NA classmates.

Harter (1989) has shown that differentiation of

competence domains changes over the lifespan (Harter, 1989), as does the importance of various sources of social support. Consequently, a narrow age range of children, between the ages of 8 and 12, will be used in this study. These children can differentiate among scholastic competence, athletic competence, peer social acceptance, behavioral conduct and physical appearance domains, in addition to making global judgments about their own self-worth (Harter, 1989).

La Greca (1987) has strongly advocated that LD children be more carefully screened for research because of the high prevalence of other difficulties such as social problems or comorbid disorders like Attention Deficit - Hyperactivity Disorder. Her warnings need to be considered seriously given the findings of Elliott and McKinnie (1994). To control for the important effect these additional factors may have on self-esteem, the children in this study will be screened using behavioural checklists and a teacher-rating social skills measure to ensure that only children who are purely LD will be used. LD children with behavioural or social difficulties will not be included in this study.

A control group of socially competent normally-achieving children, matched for age and preferably from the same integrated classrooms as the LD children, will undergo all of the same screening and testing procedures.

The self-perceptions and self-esteem of each group (LD and NA) will be compared according to the following hypotheses, based on the Self-Perception Profile for Learning Disabled Students:

1. The two groups will not differ from each other in global self-esteem. Previous studies have shown a positive relationship between social competence and self-esteem (Blechman et al., 1985; Kistner et al., 1987), and a negative relationship between behavioural problems and self-esteem (La Greca, 1987; Elliott and McKinnie, 1994). It is expected that these two socially and behaviourally competent groups will both possess high self-esteem.

2. The two groups will not differ from each other in their social acceptance self-concept scores, as only socially competent students will participate in the study.

3. The LD children will have lower academic self-

concept scores than the NA group. This will reflect the LD students' awareness of their difficulties in academic achievement.

4. The self-esteem scores for the LD children will correlate most strongly with their scores in physical appearance, followed by general intellectual ability, a prediction based on Renick and Harter (1988).

5. The self-esteem scores for NA children will correlate most strongly with their physical appearance and social acceptance scores, consistent with Harter (1989) and Bear, Clever and Proctor (1991).

6. The self-esteem of all of the children will correlate most strongly with their parent and classmate support scores from the Social Support Scale for Children. These have proven to be the SSSC subscales most important to self-esteem for children in Grades 3-8 (Harter, 1987).

*

Method

Subjects

The subjects of this study were 36 children aged 8-13, from Grades 3-7 in the public school system. Twenty-one of these students made up the Learning Disabled (LD) group; 18 were boys, 3 were girls. Their ages ranged from 8 to 13, $\bar{M} = 10.38$ ($\underline{SD} = 1.43$). Full Scale IQ, estimated by a short form of the WISC-III, ranged from 81 to 108, $\bar{M} = 95.14$ ($\underline{SD} = 8.42$). Ten of these students had been identified by the school system as LD, and all were mainstreamed to some extent, spending 50% or more of their time in a regular classroom, and some portion of their day either in a special LD class, or receiving individual help. The other 11 students, who were included in the LD group on the basis of IQ and Achievement testing by the researcher, attended regular classes but received extra help as needed either individually or in small groups. Thus, for social comparison purposes, these children were exposed to normally achieving students for a significant portion of each school day.

The Normally Achieving (NA) group contained 15

students, 7 boys and 8 girls, and was drawn from the same classrooms attended by those in the LD group. Age range for this group was 9 to 12 years, $\underline{M} = 10.73$ ($\underline{SD} = 1.22$). Full-Scale IQ ranged from 81 to 109, $\underline{M} = 96.73$ ($\underline{SD} = 8.90$).

The two groups were matched for social skills and behaviour at home and at school (measures described below). A wide range of socioeconomic conditions was represented in both groups.

Screening Measures

Wechsler Intelligence Scale for Children-III (WISC-III). The WISC-III (Wechsler, 1991) is a measure of intellectual ability. A short form of the WISC-III was used consisting of the pentad of Similarities, Arithmetic, Vocabulary, Object Assembly and Block Design subtests. Split-half reliability of these subtests ranges from .69 for Object Assembly to .87 for both Vocabulary and Block Design. The Short Form scores were converted to estimates of the Full Scale IQ using a formula provided by Sattler (1990). Validity coefficient (part-whole correlation) with the Full Scale, based on the 10 standard subtests, is .960. The

standard error of estimate is about 4 IQ points. Internal consistency reliability for the WISC-III is .960 (Sattler, 1992). For this study, an estimated Full-Scale IQ of 80-109, corresponding to the Low Average - Average Range, was required for both LD and NA children.

Wide Range Achievement Test-Revised (WRAT-R). The WRAT-R (Jastak & Wilkinson, 1984) evaluates a student's academic achievement, yielding standard scores in the areas of Reading decoding, Spelling and Arithmetic. Test-retest reliabilities are reported ranging from .79 to .90 for both levels of the three subtests (Sattler, 1990).

Child Behavior Checklist (CBCL). The CBCL (Achenbach, 1991) is a parent reported measure of observed behaviours indicating child behavioural problems in the home setting. It contains nine problem subscales which can be grouped into two overall factors, Internalizing and Externalizing. For the individual Problem Scales, the Normal Range for T-scores is 50-67. The Normal Range for Internalizing is 31-59, for Externalizing, 30-59, and for Total score, 23-59. (The lower end of this range varies by one or

two points depending on the subject's gender and age. The upper cutoff point is 59 for all.) Construct validity is demonstrated through the correlation of the Total score of the CBCL with the Total score on similar tests of behavioural problems. The correlation of the CBCL Total score with the Total score of the Quay-Peterson (1983) Revised Behavior Problem Checklist is .81 (in Achenbach, 1991). Internal consistency of the Internalizing, Externalizing and Total scores as measured by Cronbach's alpha ranges from .89 to .96 across age and gender versions of this instrument. One week Test-retest reliability ranges from .89 to .93 for the same scores.

Teacher Report Form (TRF). The TRF (Achenbach, 1991b) is the teacher's version of the CBCL and describes the child's behaviour at school. Administration, scoring and psychometric properties are comparable to that of the CBCL. The CBCL and TRF measures were used to ensure that the students in both groups did not have any behavioural or psychological problems that might have had an effect on their self-esteem apart from that of the independent variable.

Matson Evaluation of Social Skills in Youngsters (MESSY). The teacher report form of the MESSY is a 64-item scale measuring social behaviours (Matson, Rotatori & Helsel, 1983; Matson, 1990). The scale yields scores on two factors, Inappropriate Assertiveness/Impulsiveness and Appropriate Social Skills, and an overall Total score. The MESSY has adequate test-retest reliability. Internal consistency as represented by coefficient alpha, $\underline{r} = .93$. The Average T-score for each subscale is 50, with a standard deviation of 10. For the Appropriate Social Skills scale, a T-score of 40 or below was considered below average in social skills. However, the Inappropriate and Total scales are scored in the opposite direction. This is because high scores in either of these scales reflect high levels of Inappropriate Assertiveness/Impulsiveness. Therefore, a score of 60 or above on these scales was considered below average in social skills.

Dependent Measures

Self-Perception Profile for Learning Disabled Students (SPPLDS). The SPPLDS yields scores for overall self-esteem, and self-perceived general intellectual

ability, reading competence, writing competence, spelling competence, math competence, social acceptance, athletic competence, physical appearance, and behavioral conduct. The SPPLDS can be used to test both LD and NA children, as it has been standardized with both populations. The nine self-concept scales (excluding self-esteem because it measures something that is qualitatively different) form 9 distinct factors, with very few cross-loadings over .20. On the LD standardization sample, there were 2 cross-loadings of .22 and the average loading of items for each factor ranged from .53 for General Intellectual Ability to .77 for Math Competence. On the NA standardization sample, there were 4 cross-loadings ranging from .23 to .30 and factor loadings ranged from .43 for General Intellectual Ability to .82 for Math Competence. Internal consistency as measured by Cronbach's alpha ranged from .78 for Writing Competence to .89 for Spelling Competence for the LD sample, and from .80 in Reading Competence to .90 in Math Competence for the NA sample. Internal Consistency for the self-esteem scale Global Self-Worth was .83 for the LD sample and .85 for the NA sample. Subscale scores ≤ 2.0 reflect low self-

perceptions, while scores ≥ 3.75 indicate high self-perceptions.

Social Support Scale for Children (SSSC). Scores on the SSSC indicate the subject's perception of social support from parents, teachers, classmates and close friends. Scoring is similar to that of the SPPLDS.

Procedure

Recruitment of LD subjects took place in several steps. Upon obtaining ethical approval and endorsement from the Lakehead Board of Education (Appendix F), permission was asked of individual school principals to allow the researcher to recruit students from their school. In the participating schools, teachers were asked to send an information letter home with their students who were learning disabled, and/or who were receiving special education help for academic difficulties. They were asked to choose students in Grades 3-7 who were between the ages of 8 and 12, who were of average intelligence, who had not been diagnosed as having an attention deficit disorder (ADD) or behavioural problems and who were not on medication to modify their behaviour. The letter, provided by the

researcher, outlined the study and contained a tear-off section for name and phone number which the parents could send back to the school if they were willing to have their child participate. There were two versions of the letter: Appendix G contains the letter sent to parents of identified LD children, and Appendix H contains the letter to parents of children who were experiencing academic difficulties but had not as yet been identified as LD by the school board.

The researcher then visited the prospective subjects and their parents, giving them the opportunity to ask the researcher any questions they might have had regarding the study and the tests to be used. The parents and child were then asked to sign a consent form so that data collection could begin. The parents were also given the Child Behavior Checklist (CBCL) to complete at this time.

The NA subjects were similarly recruited. Teachers were asked to send a letter (Appendix I) home to the parents of average students who were not experiencing academic or behavioural problems at school. The same procedure of obtaining names, visiting, and having a consent form (Appendix J) signed, was followed.

After the LD and NA subjects were recruited and consent forms signed, arrangements were made with the principals and the subjects' teachers to conduct testing during the school day. Each subject's teacher was asked to complete the Teacher Report Form (TRF) and the Matson Evaluation of Social Skills in Youngsters (MESSY) for the child.

Thirty-five children between the ages of 8 and 12 who had either been identified as Learning Disabled (LD) by the Lakehead Board of Education, or who were receiving special education help due to academic difficulties, volunteered to participate. These children were individually screened for the LD group based on a significant discrepancy between intellectual ability as measured by a short form of the Wechsler Intelligence Scale for Children - III (WISC-III), and academic achievement as measured by the Wide Range Achievement Test - Revised (WRAT-R), according to Reynold's (1985) formula as follows:

$$z = \frac{(IQ - Achievement)}{\sqrt{2 - rIQ - rAchievement}}$$

where rIQ = internal consistency of IQ test; and

rAchievement = internal consistency of achievement test

In this formula, the IQ and achievement scores used are expressed as z-scores, as is the final discrepancy score. To be classified as learning disabled, the subject's final z-score from the equation had to be ≥ 1.96 (two-tailed test, $p = .05$).

Of this initial group of 35, 3 were rejected because their final z-score was < 1.96 meaning that they were not LD according to the criteria for this study, and 6 were rejected due to intellectual deficiency (Full-Scale IQ < 80). This left a subject pool of 26 LD children. Twenty-one of these LD students had adequate social skills as measured by the MESSY. This means they obtained a Total T score of less than 60. These 21 students made up the LD group for this study.

Twenty-nine normally-achieving (NA) children were chosen from the same integrated classrooms as the LD children, to form a control group. These children were also screened in the same way as were the LD subjects for IQ, academic achievement, and social skills. Nine were rejected because their IQ was above Average (Full-

Scale IQ > 109), 4 because the difference between their intelligence and achievement scores was in the LD range, and 1 due to social skills difficulties. This left a control group of 15 NA students.

It was important to ensure that the two groups, Learning Disabled and Normally Achieving, were as similar as possible in measures of intellectual ability, behaviour and social skills, and dissimilar in the measure of academic achievement. Therefore, several Multivariate Analyses of Variance (MANOVAs) were used to compare the groups on intellectual ability as estimated by 5 subscales of the WISC-III, on academic achievement as measured by the WRAT-R, on behaviour as measured by the problem scales of the CBCL and of the TRF, and on social skills as measured by the MESSY.

After screening, the remaining subjects were administered the SPPLDS and the SSSC either individually or in small groups. The examiner read the instructions and all of the questions for each scale as the children followed along on their own forms, marking in the answers. A MANCOVA technique was used to compare the LD and NA students on the various subscales of the SPPLDS and the SSSC, using the MESSY subscale

Appropriate Social Skills as the covariate.

Pearson product-moment correlations were then computed to determine the relationships between self-esteem and the subscales of the SPPLDS and the SSSC for both groups, LD and NA.

Results

The sole independent variable was learning ability, with two groups, Learning Disabled (LD) and Normally Achieving (NA).

Before considering the dependent measures, the results of the screening measures will be examined. To control for Type I errors, a special case of one-way MANOVA, Hotelling's T^2 , was completed on the group results for intellectual and achievement ability, on behavioural ratings, and on the social skills measure.

Table 2 shows the performance of the LD and NA groups on intelligence and achievement. There were no significant differences in the IQ measures between the two groups, $F(3,32) = .94$, $p > .05$. All of the students were in the Low Average to Average range on the WISC-III. As expected, there were overall significant differences between the two groups on measures of academic achievement, $F(3,32) = 19.45$, $p < .001$. Significance tests for individual variables revealed that reading ability was significantly lower in the LD group ($M = 77.71$) than in the NA group ($M = 102.27$), $F(1,34) = 33.401$, $p < .001$. Spelling ability was

Table 2

Performance of Learning Disabled and Normally Achieving
Students on Measures of Intellectual Ability and
Academic Achievement.

	Learning Disabled (<u>n</u> = 21)		Normally Achieving (<u>n</u> = 15)		
	<u>M</u>	<u>SD</u>	<u>M</u>	<u>SD</u>	<u>F</u> (1,34)
FIQ	95.14	8.42	96.73	8.90	.30
RDG	77.71	13.20	102.27	11.60	33.40*
SPG	73.52	10.08	94.67	8.97	42.13*
ARI	77.38	12.67	95.33	9.26	21.74*

Note. FIQ = Estimated Full-Scale IQ (WISC-III);

RDG = WRAT-R Reading Subscale; SPG = WRAT-R Spelling
Subscale; ARI = WRAT-R Arithmetic Subscale.

* $p < .001$

significantly lower in the LD group ($\underline{M} = 73.52$) than in the NA group ($\underline{M} = 94.67$), $\underline{F}(1,34) = 42.131$, $p < .001$. Finally, arithmetic ability was also significantly lower in the LD group ($\underline{M} = 77.38$) than in the NA group ($\underline{M} = 95.33$), $\underline{F}(1,34) = 21.74$, $p < .001$. This reflects the low level of achievement that characterizes the LD students, in contrast to their Average intellectual ability.

Looking at the behavioural measures as illustrated in Table 3, a one-way MANOVA indicated that there was no significant difference between the groups on the CBCL, $\underline{F}(11,24) = 1.39$, $p > .05$. However, there was a statistically significant difference between the two groups on the TRF, $\underline{F}(11,24) = 2.85$, $p < .05$. Univariate analyses revealed that on the Internalizing and Total domains of the TRF, the LD group obtained higher ratings from teachers. For Internalizing, the mean for the LD group was 53.76, while for the NA group, the mean was 41.67, $\underline{F}(1,34) = 14.768$, $p < .001$. The difference between the means for the LD group ($\underline{M} = 54.19$) and the NA group ($\underline{M} = 44.27$) on the TRF Total Score was significant, $\underline{F}(1,34) = 15.024$, $p < .001$. However, all of these means are well within the Normal range of $T \leq 59$, and well below the Problem range that begins at $T = 64$. (The Normal and Problem ranges are separated by a borderline

Table 3

Performance of Learning Disabled and Normally Achieving
Students on Parent- and Teacher-reported Behaviour Measures.

	Learning Disabled (<u>n</u> = 21)		Normally Achieving (<u>n</u> = 15)		
	<u>M</u>	<u>SD</u>	<u>M</u>	<u>SD</u>	<u>F</u> (1,34)
PIN	55.10	8.24	50.40	9.70	2.45
PEX	50.29	8.17	49.13	7.85	.18
PTL	53.71	8.71	49.47	9.66	1.90
TIN	53.76	10.52	41.67	7.24	14.77*
TEX	48.95	7.57	47.33	5.80	.48
TTL	54.19	7.78	44.27	7.27	15.02*

Note. PIN = CBCL Internalizing; PEX = CBCL Externalizing;
PTL = CBCL Total; TIN = TRF Internalizing; TEX = TRF
Externalizing; TTL = TRF Total.

* $p < .001$

range $59 < T < 64$.) Since the Normal range is very broad, it is possible to find statistically significant differences between two groups even when both scores are within acceptable limits. Finally, there were no significant differences between the LD and NA groups on the Externalizing domain of the TRF, $F(1,34) = .482, p > .05$.

The two groups were compared on the social skills measure, the MESSY, using a multivariate analysis of variance. The results appear in Table 4. A significant difference was found between the two groups, $F(3,32) = 4.403, p < .05$. Univariate analysis revealed no significant difference for the Inappropriate Assertiveness/Impulsiveness or Total subscales. However, for the subscale Appropriate Social Skills, the mean for the LD group ($M = 47.48$) was significantly lower than that of the NA group ($M = 56.67$), $F(1,34) = 9.142, p < .01$. While both means were well within in the average range of $40 < T < 60$, they were at opposite ends of this range. Therefore, the Appropriate Social Skills subscale of the MESSY will be used as a covariate in the analyses of the dependent variables in order to control for its effect on the two groups.

The dependent variables were the subscales of the SPPLDS: General Intellectual Ability, Reading Competence,

Table 4

Performance of Learning Disabled and Normally Achieving
Students on a Measure of Teacher-reported Social Skills.

Learning Disabled (<u>n</u> = 21)		Normally achieving (<u>n</u> = 15)		<u>F</u> (1, 34)	
<u>M</u>	<u>SD</u>	<u>M</u>	<u>SD</u>		
MAP	47.48	9.38	56.67	8.40	9.14*
MIN	44.10	4.48	43.20	4.23	.37
MTL	45.71	4.50	41.73	4.22	7.22

Note. MAP = MESSY Appropriate Social Skills Subscale;

MIN = MESSY Inappropriate Social Skills Subscale;

MTL = MESSY Total Score.

* $p < .01$.

Writing Competence, Spelling Competence, Math Competence, Social Acceptance, Athletic Competence, Behavioral Conduct, Physical Appearance, and Global Self-Worth, and of the SSSC: Parent Support, Classmate Support, Teacher Support and Friend Support.

The two groups, NA and LD, were compared by use of MANCOVA on the subscales of the Self-Perception Profile for Learning Disabled Students. The results are summarized in Table 5. While all of the subjects possessed social skills well within the normal range, the Appropriate Social Skills subscale of the MESSY was used as a covariate in order to control for the statistically significant difference between the groups in this area.

The MANCOVA comparison of the two groups on the SPPLDS revealed a significant overall difference, $F(10,24) = 3.581$, $p < .01$. As expected, univariate analysis of individual subscales of the SPPLDS revealed no significant differences between the groups in either Global Self-Worth (self-esteem), $F(1,33) = .068$, $p > .05$, or Social Acceptance, $F(1,33) = 1.514$, $p > .05$. While in the direction expected, the difference between the groups in their self-perceptions of General Intellectual Ability, $F(1,33) = 2.753$, $p = .10$, was not significant. The LD students did rate themselves

Table 5

Performance of Learning Disabled and Normally Achieving Students on Measures of Self-perceived Competence and Global Self-esteem.

	Learning Disabled (<u>n</u> = 21)		Normally Achieving (<u>n</u> = 15)		
	<u>M</u>	<u>SD</u>	<u>M</u>	<u>SD</u>	<u>F</u> (1,33)
GIA	2.77	.78	3.31	.61	2.75
RC	2.49	1.01	3.29	.70	9.48*
WC	2.64	.89	2.89	.76	.07
SC	2.34	.98	3.39	.62	14.15**
MC	3.01	1.00	3.45	.70	.16
SA	2.90	.64	3.21	.69	1.51
AC	3.16	.75	2.89	.79	1.65
PA	3.10	.59	3.03	.86	.07
BC	2.83	.70	3.19	.69	.15
SE	3.32	.53	3.36	.78	.07

Note. GIA = General Intellectual Ability; RC = Reading Competence; WC = Writing Competence; SC = Spelling Competence; MC = Math Competence; SA = Social Acceptance; AC = Athletic Competence; PA = Physical Appearance; BC = Behavioral Conduct; SE = Global Self-Esteem
* $p < .01$. ** $p < .001$.

lower than the NA group, however, in two Academic areas. The mean for the LD group in Reading Competence was 2.49, compared to 3.29 for the NA group, $F(1,33) = 9.477$, $p < .01$. In Spelling competence, the LD group ($M = 2.34$) was significantly lower than the NA group ($M = 3.39$), $F(1,33) = 14.147$, $p < .001$. No significant differences were found in Writing Competence or Math Competence.

Pearson product-moment correlations were used to determine which competence domains were most important to the self-esteem of the two groups. The results appear in Table 6. As hypothesized, self-esteem scores of the NA group correlated most strongly with the Social Acceptance subscale, $r = .88$, $p < .001$, and with the Physical Appearance subscale, $r = .82$, $p < .001$. The self-esteem of the LD group also correlated most strongly with Physical Appearance, $r = .64$, $p < .001$, followed closely by Writing Competence, $r = .61$, $p < .01$, and General Intellectual Ability, $r = .58$, $p < .01$.

The performance of the two groups, LD and NA, on the Social Support Scale for Children was examined using a MANCOVA technique, with the Appropriate Social

Table 6

Correlations Between Competence Domains and Overall
Self-esteem as Measured by the Self-Perception Profile
for Learning Disabled Students.

	Self-Esteem	
	LD Group	NA Group
General Intellectual Ability	.58*	.54
Reading Competence	.41	.27
Writing Competence	.61*	.42
Spelling Competence	.28	.49
Math Competence	.42	.07
Social Acceptance	.32	.88**
Athletic Competence	.54*	.67*
Physical Appearance	.64**	.82**
Behavioral Conduct	.20	.62*

* $p < .01$, one-tailed. ** $p < .001$, one-tailed

Skills subscale of the MESSY used as a covariate. No significant difference was found between the two groups, $F(4,30) = .657, p > .05$. The results follow, in Table 7.

Pearson product-moment correlations showed a significant relationship between classmate support and self-esteem for both the LD group, $r = .59, p < .01$, and for the NA group, $r = .65, p < .01$. No other significant relationships were found. These results appear in Table 8.

Table 7

Performance of Learning Disabled and Normally Achieving
Students on a Measure of Self-perceived Social Support.

	Learning Disabled (<u>n</u> = 21)		Normally Achieving (<u>n</u> = 15)		
	<u>M</u>	<u>SD</u>	<u>M</u>	<u>SD</u>	<u>F</u> (1,33)
PS	3.40	.55	3.69	.32	1.71
CS	3.06	.54	3.25	.67	.17
TS	2.87	.91	3.46	.56	.85
FS	2.98	.88	3.62	.46	2.14

Note. PS = Parent Support; CS = Classmate Support;
TS = Teacher Support; FS = Friend Support.

Table 8

Correlations Between Sources of Social Support and
Overall Self-esteem.

	Self-Esteem	
	LD Group	NA Group
Parent Support	.41	.10
Classmate Support	.59*	.65*
Teacher Support	.25	.31
Friend Support	.30	-.24

* $p < .01$. One-tailed.

Discussion

The main findings of this study are as follows: while these socially and behaviourally competent Learning Disabled (LD) children did not rate their academic competence in some areas as highly as did the Normally Achieving (NA) students, the two groups (LD and NA) did not differ in self-perceptions of social acceptance or global self-esteem. Moreover, self-esteem for both groups was closely related to physical appearance and classmate support.

As expected, the groups did not differ on the SPPLDS measures of global self-esteem or self-perceived social acceptance, results similar to those of Kistner et al. (1987). These findings are in agreement with Schilling (1986) who suggested that there is a relationship between children's social performance and self-esteem. Blechman et al. (1985) have also pointed out that, while the happiest children are those who are both academically and socially competent, the social component is more important than the academic. The reverse may also be true. La Greca and Stone (1990) found that low self-esteem in LD children was more

dependent on low social competence than on academic difficulties. As postulated, it may be that social competence acts as a protective factor in the self-esteem of socially skilled LD children.

Although they rated themselves as low in some academic areas, the LD students still considered themselves to be generally as intelligent as the NA students. This is in keeping with the observation of Renick and Harter (1988) that LD children do distinguish between their intellectual abilities and their academic achievements. These researchers have also found children's self-perceptions of their intellectual abilities to be highly related to their self-worth. Perhaps if LD children can recognize that they are still smart even if they have trouble in some academic subjects, this may be another protective factor to their self-esteem.

As predicted, these children showed that they were aware of their deficiencies in the area of language arts by rating themselves significantly lower than did their NA peers in reading and spelling competence, an accurate assessment. Harter (1989) has said that children with high self-esteem are those who are able

to recognize but downplay the importance of domains in which they are less competent. This seems to have been the case with these LD children.

While the LD students were able to accurately assess their competence in the area of language arts, they seemed to have a different perception of their math ability. No significant differences were found between the two groups in their ratings of math competence, with both fairly high within the Average range. This is an interesting finding for the LD children, as two-thirds of this group had a disability in this area.

How is it that these students appeared to recognize their limitations in the area of language arts, but not in mathematical ability? The answer may lie in the differing emphasis placed upon mathematics and language arts in the classroom, and on social comparison. If a child has a math disability, s/he will receive extra help outside the classroom, either alone or in a small group with students with similar difficulties. There would be no reason, then, for the LD student to compare his/her performance with that of NA students. Kistner et al. (1987) noted that when LD

children compare their school performance to that of other LD students rather than to NA students, they tend to overrate their academic competencies compared to what their teachers report. Thus it is possible for a child with a math disability to still feel quite comfortable with his/her progress, even though s/he is much less competent in math than are the NA students. On the other hand, while a student with reading or spelling difficulties may also receive extra help in these subjects outside the mainstream classroom, the application of these skills takes place within the classroom alongside their NA peers. This is because language permeates every other academic subject, as words are used to express ideas. Therefore, there would be opportunity for LD children to compare themselves to their NA peers in reading, spelling and writing, and find themselves to be less competent.

When looking at the relationships between self-concept domains and self-esteem, the results must be interpreted with caution due to the small sample sizes and possible intercorrelations among the self-concept domains. As expected, the self-esteem of the LD group was highly related to their self-perceptions of

physical appearance, $\underline{r} = .64$, $\underline{p} \leq .001$, and general intellectual ability, $\underline{r} = .58$, $\underline{p} \leq .01$. Also as expected, self-esteem for the NA group related most strongly to their scores on physical appearance, $\underline{r} = .82$, $\underline{p} \leq .001$, and peer social acceptance, $\underline{r} = .88$, $\underline{p} \leq .001$. It is not surprising that physical appearance was closely related to self-esteem for both groups, as physical appearance is the best predictor of self-esteem in all ages of people across the lifespan. For the NA population, social acceptance is the next best predictor (Harter, 1989).

For LD children, the domain of general intellectual ability is more closely related to their self-esteem than is social acceptance (Harter, 1989). The LD children in this study seem to have shown the same pattern, with a correlation between self-esteem and general intellectual ability of $.58$, $\underline{p} \leq .01$, and a non-significant correlation of $.32$ between self-esteem and social acceptance. A significant correlation between intellectual ability and self-esteem illustrates how important it is for LD children to see themselves as being intelligent. This may not be easy for some in light of their academic difficulties.

However, if the LD child can attribute his/her academic problems to a learning disability and not to a lack of intelligence, his/her self-esteem can be protected.

Writing competence was also an important correlate with self-esteem for the LD group ($\underline{r} = .61, p \leq .01$). Writing competence was one of the top three correlates of self-esteem for LD children mentioned by Renick and Harter (1988), along with physical appearance and general intellectual ability. A strong relationship between writing competence and self-esteem may reflect the LD student's need to express him/herself and to be understood by others. Written expression of both educational concepts and personal ideas and feelings constitutes a large part of the educational process. It would be frustrating indeed to be able to understand a concept or to have an interesting idea, but not to be able to convey one's knowledge and thoughts in writing. This is a difficulty faced by some LD children, and may explain why competence in writing would be so important to their self-esteem.

Both groups appeared to choose classmates as the source of social support most closely related to self-esteem, $\underline{r} = .59, p \leq .01$, for the LD group and $\underline{r} = .65,$

$p \leq .01$ for the NA group. Again, these correlations must be viewed cautiously due to small sample sizes. It had been expected that the support of parents would also be an important correlate to self-esteem, based on Harter (1987), who found classmate and parent support to correlate equally with self-esteem of NA children in grades 3-8, $r = .44$. However, this was not demonstrated in the present study. All of the children, regardless of their level of self-esteem, reported that their parents were supportive of them. Evidence of this support is the fact that these parents have allowed their children to participate in the study, and have agreed to provide input via the behavioural questionnaire. These parents represent only about 20% of all of the parents invited to take part in the study. It may be that the continued support of these responding parents is so familiar that it has become unremarkable to the children. They do not have to work at earning their parents' support, nor do they need to worry that they will lose it.

The support of classmates is another matter. Social relationships with peers must be won by exhibiting the right behaviour and attitudes. Thus, the

positive regard of one's peers may have more effect on a child's self-esteem because it is not unconditional, and does reflect a child's popularity.

Limitations of This Study

In applying these findings to LD children in general, it must be remembered that the LD children in this study were carefully screened to ensure that they had limited confounding behavioural or social problems. This is only one subgroup of a very heterogenous larger population. Thus the findings of healthy self-esteem and perceptions of social acceptance cannot be generalized to all children with learning disabilities. Many LD children do have social and/or behavioural problems that may change the way others relate to them, and how they feel about themselves.

The attempt was made in this study to match the NA and LD groups in as many variables as possible, rather than to use a covariate to statistically control for differences. However, in this study, the NA children obtained higher ratings than did the LD group (56.67 vs. 47.48) on Appropriate Social Skills, a subscale of the Matson Evaluation of Social Skills in Youngsters.

Although both groups were well within the average range of $40 \leq T \leq 60$, this subscale was used as a covariate in subsequent analyses because the two groups were at opposite ends of this range, and the difference between them was statistically significant. Significant differences were also found between the groups on the Internalizing and Total subscales of the Teacher Report Form. However, all of these scores were within the Normal Range, well below even the Borderline stage that separates the Normal and Problem areas of this behavioural measure. The statistically significant difference is due to the vast size of the Normal range, and does not reflect any problem behaviour in either group. Therefore, there was no need to use either of these TRF subscales as a covariate.

The absence of socially incompetent LD and NA children in this study also limits the generalizability of the findings. A few socially incompetent students were lost during the screening process. It might have been better if they had been included to increase the variability of the sample. The Total Messy score would then be used as a covariate with the dependent measures, rather than as a screening measure. This

would have provided more information on the effect of social skills on self-esteem.

The NA group had a greater proportion of female students. While no significant differences were found between the male and female students in the NA group in any area, the data would have been more reliable had the groups been better matched for gender.

Directions for Further Study

Although this study yielded some interesting results, the question of self-esteem and social factors in LD children has not yet been sufficiently explored. A similar study involving both socially competent and socially incompetent LD and NA children would give a more complete picture of the role of social competence in the self-esteem of both groups of children.

It would also be interesting to compare LD children with language disabilities to those with math disabilities, in light of the differing perceptions of LD children in this study regarding their competencies in these areas. Learning disabled children in this study recognized their deficiencies in the areas of spelling and reading, but not in math. Perhaps because

of the pervasive use of language in all school subjects in contrast to the more specialized, limited use of math, a learning disability in the area of language might be more difficult for a child to deal with than would a disability in the area of math.

References

- Achenbach, T. M. (1991). Manual for the Child Behavior Checklist/4-18 and 1991 Profile. Burlington, VT: University of Vermont Department of Psychiatry.
- Achenbach, T. M. (1991). Manual for the Teacher's Report Form and 1991 Profile. Burlington, VT: University of Vermont Department of Psychiatry.
- Asher, S., & Dodge, K. (1986). Identifying children who are rejected by their peers. Developmental Psychology, 22, 444-449.
- Baum, D., Duffelmeyer, F., & Geelan, M. (1988). Resource teacher perceptions of the prevalence of social dysfunction among students with learning disabilities. Journal of Learning Disabilities, 21(6), 380-381.
- Bear, G., Clever, A., & Proctor, W. (1991). Self-perceptions of nonhandicapped children and children with learning disabilities in integrated classes. The Journal of Special Education, 24(4), 409-426.
- Black, F. W. (1974). Self-concept as related to achievement and age in learning-disabled

- children. Child Development, 45, 1137-1140.
- Blechman, E. A., Tinsley, B., Carella, E. T., & McEnroe, M. J. (1985). Childhood competence and behavior problems. Journal of Abnormal Psychology, 94(1), 70-77.
- Bogan, J. (1988). The assessment of self-esteem: A cautionary note. Australian Psychologist, 23(3), 383-389.
- Boivin, M. & Begin, G. (1989). Peer status and self-perception among early elementary school children: The case of the rejected children. Child Development, 60, 591-596.
- Clever, A., Bear, G., & Juvonen, J. (1992). Discrepancies between competence and importance in self-perceptions of children in integrated classrooms. Journal of Special Education, 26(2), 125-138.
- Coopersmith, S. (1967). The antecedents of self-esteem. California: W.H. Freeman & Co.
- Elliott, S. N., & McKinnie, D. M. (1994). Relationships and differences among social skills, problem behaviors, and academic competence for mainstreamed learning-disabled and

- nonhandicapped students. Canadian Journal of School Psychology, 10(1), 1-14.
- Hall, C. W., & Richmond, B. O. (1985). Non-verbal communication, self-esteem and interpersonal relations of LD and non-LD students. The Exceptional Child, 32(2), 87-91.
- Harter, S. (1979). Manual for The Teachers' Rating Scale of Child's Actual Competence. Denver, CO: University of Denver.
- Harter, S. (1982). The Perceived Competence Scale for Children. Child Development, 53, 87-97.
- Harter, S. (1985). Manual for The Self-Perception Profile for Children: Revision of the Perceived Competence Scale for Children. Denver, CO: University of Denver.
- Harter, S. (1985b). Manual for The Social Support Scale for Children. Denver, CO: University of Denver.
- Harter, S. (1987). The determinants and mediational role of global self-worth in children. In N. Eisenberg (Ed.), Contemporary topics in developmental psychology. New York: John Wiley & Sons.

- Harter, S. (1989). Causes, correlates and the functional role of global self-worth: A life-span perspective. In J. Kolligan & R. Sternberg (Eds.), Perceptions of competence and incompetence across the life span (pp. 67-98). New Haven, CT.: Yale University Press.
- Jastak, S. & Wilkinson, G. S. (1984). The Wide Range Achievement Test - Revised: Administration Manual. Wilmington, DL: Jastak Associates, Inc.
- Kistner, J., Haskett, M., White, K., & Robbins, F. (1987). Perceived competence and self-worth of LD and normally achieving students. Learning Disability Quarterly, 10, 37-44.
- La Greca, A. M. (1987). Children with learning disabilities: Interpersonal skills and social competence. Journal of Reading, Writing and Learning Disabilities, 3, 167-185.
- La Greca, A. M., & Stone, W. L. (1990). LD status and achievement: Confounding variables in the study of children's social status, self-esteem, and behavioral functioning. Journal of Learning Disabilities, 23(8), 483-490.
- La Greca, A. M., & Vaughn, S. (1992). Social

functioning of individuals with learning disabilities. School Psychology Review, 21(3), 340-347.

Matson, J. L. (1990). The Matson Evaluation of Social Skills with Youngsters: Manual. Orland Park, IL: International Diagnostic Systems, Inc.

Matson, J. L., Rotatori, A. F., & Helsel, W. J. (1983). Development of a rating scale to measure social skills in children: The Matson Evaluation of Social Skills with Youngsters (MESSY). Behaviour Research and Therapy, 21(4), 335-340.

McIntosh, R., Vaughn, S., & Zaragoza, N. (1991). A review of social interventions for students with learning disabilities. Journal of Learning Disabilities, 24(8), 451-458.

Piers, E.V. (1984). Revised Manual for the Piers-Harris Children's Self-Concept Scale. Los Angeles: Western Psychological Services.

Renick, M. J., & Harter, S. (1988). Manual for The Self-Perception Profile for Learning Disabled Students. Denver, CO: University of Denver.

Renick, M. J., & Harter, S. (1989). Impact of social

- comparisons on the developing self-perceptions of learning disabled students. Journal of Educational Psychology, 81(4), 631-638.
- Reynolds, C. R. (1985). Measuring the aptitude-achievement discrepancy in learning disability diagnosis. Remedial and Special Education, 6(5), 37-55.
- Rogers, H., & Saklofske, D.H. (1985). Self-concepts, locus of control and performance expectations of learning disabled children. Journal of Learning Disabilities, 18(5), 273-278.
- Rosenberg, M. (1979). Conceiving the self. New York: Basic Books.
- Sattler, J. M. (1990). Assessment of Children. San Diego: Jerome M. Sattler.
- Sattler, J. M. (1992). Assessment of Children: WISC-III and WPPSI-R Supplement. San Diego: Jerome M. Sattler.
- Schilling, D. E. (1986). Self-esteem: Concerns, strategies, resources. Academic Therapy, 21(3), 301-307.
- Searcy, S. (1988). Developing self-esteem. Academic

Therapy, 23(5), 453-460.

Silon, E. L., & Harter, S. (1985). Assessment of perceived competence, motivational orientation, and anxiety in segregated and mainstreamed educable mentally retarded children. Journal of Educational Psychology, 77(2), 217-230.

Sobol, M. P., Earn, B. M., & Bennett, D. (1983). A categorical analysis of the social attributions of learning disabled children. Journal of Abnormal Child Psychology, 11(2), 217-228.

Stone, W. L., & La Greca, A. M. (1990). The social status of children with learning disabilities: A reexamination. Journal of Learning Disabilities, 23(1), 32-37.

Wechsler, D. (1991). Wechsler Intelligence Scale for Children - Third Edition. New York: The Psychological Corporation.

Appendix A

The Self-Perception Profile for Children What I Am Like

Name _____ Age _____ Birthday _____ Group _____
Month Day
 Boy or Girl (circle which)

SAMPLE SENTENCE

	Really True for me	Sort of True for me		BUT		Sort of True for me	Really True for me
(a)	<input type="checkbox"/>	<input type="checkbox"/>	Some kids would rather play outdoors in their spare time	BUT	Other kids would rather watch T.V.	<input type="checkbox"/>	<input type="checkbox"/>
1.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids feel that they are very good at their school work	BUT	Other kids worry about whether they can do the school work assigned to them.	<input type="checkbox"/>	<input type="checkbox"/>
2.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids find it <i>hard</i> to make friends	BUT	Other kids find it's pretty <i>easy</i> to make friends.	<input type="checkbox"/>	<input type="checkbox"/>
3.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids do very well at all kinds of sports	BUT	Other kids <i>don't</i> feel that they are very good when it comes to sports.	<input type="checkbox"/>	<input type="checkbox"/>
4.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are <i>happy</i> with the way they look	BUT	Other kids are <i>not</i> happy with the way they look.	<input type="checkbox"/>	<input type="checkbox"/>
5.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids often do <i>not</i> like the way they behave	BUT	Other kids usually <i>like</i> the way they behave.	<input type="checkbox"/>	<input type="checkbox"/>
6.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are often <i>unhappy</i> with themselves	BUT	Other kids are pretty <i>pleased</i> with themselves.	<input type="checkbox"/>	<input type="checkbox"/>
7.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids feel like they are <i>just as smart</i> as other kids their age	BUT	Other kids aren't so sure and wonder if they are as smart.	<input type="checkbox"/>	<input type="checkbox"/>
8.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have <i>alot</i> of friends	BUT	Other kids <i>don't</i> have very many friends.	<input type="checkbox"/>	<input type="checkbox"/>

	Really True for me	Sort of True for me			Sort of True for me	Really True for me	
9.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids wish they could be alot better at sports	BUT	Other kids feel they are good enough at sports.	<input type="checkbox"/>	<input type="checkbox"/>
10.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are <i>happy</i> with their height and weight	BUT	Other kids wish their height or weight were <i>different</i> .	<input type="checkbox"/>	<input type="checkbox"/>
11.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids usually do the <i>right</i> thing	BUT	Other kids often <i>don't</i> do the right thing.	<input type="checkbox"/>	<input type="checkbox"/>
12.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids <i>don't</i> like the way they are leading their life	BUT	Other kids <i>do</i> like the way they are leading their life.	<input type="checkbox"/>	<input type="checkbox"/>
13.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are pretty <i>slow</i> in finishing their school work	BUT	Other kids can do their school work <i>quickly</i> .	<input type="checkbox"/>	<input type="checkbox"/>
14.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids would like to have alot more friends	BUT	Other kids have as many friends as they want.	<input type="checkbox"/>	<input type="checkbox"/>
15.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids think they could do well at just about any new sports activily they haven't tried before	BUT	Other kids are afraid they might <i>not</i> do well at sports they haven't ever tried.	<input type="checkbox"/>	<input type="checkbox"/>
16.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids wish their body was <i>different</i>	BUT	Other kids <i>like</i> their body the way it is.	<input type="checkbox"/>	<input type="checkbox"/>
17.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids usually <i>act</i> the way they know they are <i>supposed</i> to	BUT	Other kids often <i>don't</i> act the way they are supposed to.	<input type="checkbox"/>	<input type="checkbox"/>
18.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are <i>happy</i> with themselves as a person	BUT	Other kids are often <i>not</i> happy with themselves.	<input type="checkbox"/>	<input type="checkbox"/>
19.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids often <i>forget</i> what they learn	BUT	Other kids can <i>remember</i> things <i>easily</i> .	<input type="checkbox"/>	<input type="checkbox"/>
20.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are always doing things with alot of kids	BUT	Other kids usually do things <i>by themselves</i> .	<input type="checkbox"/>	<input type="checkbox"/>

	Really True for me	Sort of True for me			Sort of True for me	Really True for me	
21.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids <i>feel</i> that they are <i>better</i> than others their age at sports	BUT	Other kids <i>don't</i> feel they can play as well.	<input type="checkbox"/>	<input type="checkbox"/>
22.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids wish their physical appearance (how they look) was <i>different</i>	BUT	Other kids <i>like</i> their physical appearance the way it is.	<input type="checkbox"/>	<input type="checkbox"/>
23.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids usually get in <i>trouble</i> because of things they do	BUT	Other kids usually <i>don't</i> do things that get them in trouble.	<input type="checkbox"/>	<input type="checkbox"/>
24.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids <i>like</i> the kind of <i>person</i> they are	BUT	Other kids often wish they were <i>someone</i> else.	<input type="checkbox"/>	<input type="checkbox"/>
25.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids do <i>very well</i> at their classwork	BUT	Other kids <i>don't</i> do very well at their classwork.	<input type="checkbox"/>	<input type="checkbox"/>
26.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids wish that more people their age liked them	BUT	Other kids feel that most people their age <i>do</i> like them.	<input type="checkbox"/>	<input type="checkbox"/>
27.	<input type="checkbox"/>	<input type="checkbox"/>	In games and sports some kids usually <i>watch</i> instead of play	BUT	Other kids usually <i>play</i> rather than just watch.	<input type="checkbox"/>	<input type="checkbox"/>
28.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids wish something about their face or hair looked <i>different</i>	BUT	Other kids <i>like</i> their face and hair the way they are.	<input type="checkbox"/>	<input type="checkbox"/>
29.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids do things they know they <i>shouldn't</i> do	BUT	Other kids <i>hardly ever</i> do things they know they shouldn't do.	<input type="checkbox"/>	<input type="checkbox"/>
30.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are very <i>happy</i> being the way they are	BUT	Other kids wish they were <i>different</i> .	<input type="checkbox"/>	<input type="checkbox"/>
31.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have <i>trouble</i> figuring out the answers in school	BUT	Other kids almost <i>always</i> can figure out the answers.	<input type="checkbox"/>	<input type="checkbox"/>
32.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are <i>popular</i> with others their age	BUT	Other kids are <i>not</i> very popular.	<input type="checkbox"/>	<input type="checkbox"/>

	Really True for me	Sort of True for me			Sort of True for me	Really True for me	
33.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids <i>don't</i> do well at new outdoor games	BUT	Other kids are good at new games right away.	<input type="checkbox"/>	<input type="checkbox"/>
34.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids think that they are good looking	BUT	Other kids think that they are not very good looking.	<input type="checkbox"/>	<input type="checkbox"/>
35.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids behave themselves very well	BUT	Other kids often find it hard to behave themselves.	<input type="checkbox"/>	<input type="checkbox"/>
36.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are not very happy with the way they do alot of things	BUT	Other kids think the way they do things is <i>fine</i> .	<input type="checkbox"/>	<input type="checkbox"/>

Susan Harter, Ph.D., University of Denver, 1985

from Harter, S. (1985). Manual for The Self-Perception Profile for Children: Revision of the Perceived Competence Scale for Children. Denver, CO: University of Denver.

Appendix B

How Important Are These Things to How You Feel About Yourself as a Person?

Name _____ Age _____ Group _____

HOW IMPORTANT ARE THESE THINGS TO HOW YOU FEEL ABOUT YOURSELF AS A PERSON?

	Really True for me	Sort of True for me		Sort of True for me	Really True for me		
1	<input type="checkbox"/>	<input type="checkbox"/>	Some kids think it is important to be smart in school in order to feel good as a person	BUT	Other kids don't think it is important to be smart in school in order to feel good about themselves.	<input type="checkbox"/>	<input type="checkbox"/>
2	<input type="checkbox"/>	<input type="checkbox"/>	Some kids don't think having a lot of friends is important to how they feel about themselves	BUT	Other kids think that having a lot of friends is important to how they feel as a person.	<input type="checkbox"/>	<input type="checkbox"/>
3	<input type="checkbox"/>	<input type="checkbox"/>	Some kids think that it is important to do well in reading in order to feel good about themselves	BUT	Other kids think it is not important to do well in reading in order to feel good as a person.	<input type="checkbox"/>	<input type="checkbox"/>
4	<input type="checkbox"/>	<input type="checkbox"/>	Some kids don't think that doing well at athletics is that important to how they feel about themselves as a person	BUT	Other kids think that doing well at athletics is important to how they feel about themselves as a person.	<input type="checkbox"/>	<input type="checkbox"/>
5	<input type="checkbox"/>	<input type="checkbox"/>	Some kids think that it is important to be able to write good stories and papers in order to feel good as a person	BUT	Other kids don't think how well they write is important to how they feel about themselves.	<input type="checkbox"/>	<input type="checkbox"/>
6	<input type="checkbox"/>	<input type="checkbox"/>	Some kids don't think that how they act is all that important to how they feel about themselves	BUT	Other kids think it is important to act the way they are supposed to act in order to feel good as a person.	<input type="checkbox"/>	<input type="checkbox"/>
7	<input type="checkbox"/>	<input type="checkbox"/>	Some kids think it is important to get good grades in math in order to like themselves as a person	BUT	Other kids don't think how well they do in math is all that important to how they feel about themselves.	<input type="checkbox"/>	<input type="checkbox"/>
8	<input type="checkbox"/>	<input type="checkbox"/>	Some kids feel that it is important to like the way they look in order to feel good as a person	BUT	Other kids don't feel that it is all that important to like the way they look in order to feel good about themselves.	<input type="checkbox"/>	<input type="checkbox"/>
9	<input type="checkbox"/>	<input type="checkbox"/>	Some kids don't think it is important to be able to spell most words correctly in order to feel good as a person	BUT	Other kids think it is important to be able to spell most words correctly in order to like themselves	<input type="checkbox"/>	<input type="checkbox"/>
10	<input type="checkbox"/>	<input type="checkbox"/>	Some kids don't think that being bright in school is all that important to how they feel about themselves	BUT	Other kids think that being bright in school is important to how they feel about themselves as a person.	<input type="checkbox"/>	<input type="checkbox"/>

	Really True for me	Sort of True for me			Sort of True for me	Really True for me	
11	<input type="checkbox"/>	<input type="checkbox"/>	Some kids think it is important to be popular in order to like themselves as a person	BUT	Other kids don't think it is important to be popular in order to like themselves.	<input type="checkbox"/>	<input type="checkbox"/>
12	<input type="checkbox"/>	<input type="checkbox"/>	Some kids think it is important to be a good reader in school in order to like themselves as a person	BUT	Other kids don't think being a good reader is all that important to how they feel about themselves.	<input type="checkbox"/>	<input type="checkbox"/>
13	<input type="checkbox"/>	<input type="checkbox"/>	Some kids think it is important to be good at sports in order to like themselves as a person	BUT	Other kids don't think how good they are at sports is that important to how they feel about themselves.	<input type="checkbox"/>	<input type="checkbox"/>
14	<input type="checkbox"/>	<input type="checkbox"/>	Some kids don't think it is important for them to be a good writer in order to feel good about themselves	BUT	Other kids think it is important for them to be a good writer in order to like themselves.	<input type="checkbox"/>	<input type="checkbox"/>
15	<input type="checkbox"/>	<input type="checkbox"/>	Some kids think it is important to behave the way they should in order to feel good as a person	BUT	Other kids don't think that how they behave is all that important to how they feel about themselves.	<input type="checkbox"/>	<input type="checkbox"/>
16	<input type="checkbox"/>	<input type="checkbox"/>	Some kids don't think it is important to do well in math in order to like themselves as a person	BUT	Other kids think it is important to do well in math in order to like themselves.	<input type="checkbox"/>	<input type="checkbox"/>
17	<input type="checkbox"/>	<input type="checkbox"/>	Some kids don't think that how they look is important to how they feel about themselves as a person	BUT	Other kids think that how they look is important to how they feel about themselves as a person.	<input type="checkbox"/>	<input type="checkbox"/>
18	<input type="checkbox"/>	<input type="checkbox"/>	Some kids think it is important to do well in spelling in order to feel good about themselves	BUT	Other kids don't think how good they are at spelling is important to how they feel about themselves.	<input type="checkbox"/>	<input type="checkbox"/>

from Renick, M. J., & Harter, S. (1988). Manual for The Self-Perception Profile for Learning Disabled Students.
 Denver, CO: University of Denver.

Appendix C

Calculation of Competence/Importance Discrepancy Score

Step 1 Name of domains in which Importance Scores are 3.0, 3.5, or 4.0.	Step 2 Competence or Adequacy Scores (from Self-Perception Profile)	Step 3 Importance Ratings of 3, 3.5, and 4 only (from Importance Rating Scale)	Step 4 Discrepancy Score	
			Sign (+ or -)	Value
(a) _____	_____ minus	_____ equals	_____	_____
(b) _____	_____ minus	_____ equals	_____	_____
(c) _____	_____ minus	_____ equals	_____	_____
(d) _____	_____ minus	_____ equals	_____	_____
(e) _____	_____ minus	_____ equals	_____	_____
(f) _____	_____ minus	_____ equals	_____	_____
(g) _____	_____ minus	_____ equals	_____	_____
(h) _____	_____ minus	_____ equals	_____	_____
(i) _____	_____ minus	_____ equals	_____	_____

Do not include domains in which importance ratings are 2.5 or lower.

In most cases this Discrepancy Score will be negative, however, it can also be zero, or assume positive values.

The larger the negative discrepancy score, the more one's importance scores exceed one's competence levels, and the lower one's self-worth score should be as a result.

Step 5
Sum of Discrepancy Scores taking sign into account:

(sign)	(score)

Step 6
Mean Discrepancy Score:

Step 7
Transfer Global Self-Worth Score from the Self-Perception Profile, in order to compare.

from Renick, M. J., & Harter, S. (1988). Manual for The Self-Perception Profile for Learning Disabled Students.

Denver, CO: University of Denver.

Appendix D

The Social Support Scale for Children

PEOPLE IN MY LIFE

Name _____
(First) (Last)

	Really True for Me	Sort of True for Me	Sample Item	Sort of True for Me	Really True for Me		
	<input type="checkbox"/>	<input type="checkbox"/>	Some kids like to do fun things with a lot of other people	BUT	Other kids like to do fun things with just a few people.	<input type="checkbox"/>	<input type="checkbox"/>
1.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have parents who <i>don't</i> really understand them	BUT	Other kids have parents who really <i>do</i> understand them.	<input type="checkbox"/>	<input type="checkbox"/>
2.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have classmates who like them the way they are	BUT	Other kids have classmates who wish they were <i>different</i> .	<input type="checkbox"/>	<input type="checkbox"/>
3.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have a teacher who <i>helps</i> them if they are <i>upset</i> and have a problem	BUT	Other kids <i>don't</i> have a teacher who helps them if they are upset and have a problem.	<input type="checkbox"/>	<input type="checkbox"/>
4.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have a close friend who they can tell <i>problems</i> to	BUT	Other kids <i>don't</i> have a close friend who they can tell problems to.	<input type="checkbox"/>	<input type="checkbox"/>
5.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have parents who <i>don't</i> seem to want to hear about their children's problems	BUT	Other kids have parents who <i>do</i> want to <i>listen</i> to their children's problems.	<input type="checkbox"/>	<input type="checkbox"/>
6.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have classmates that they can become friends with	BUT	Other kids <i>don't</i> have classmates that they can become friends with.	<input type="checkbox"/>	<input type="checkbox"/>
7.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids <i>don't</i> have a teacher who <i>helps</i> them to do their very best	BUT	Other kids <i>do</i> have a teacher who <i>helps</i> them to do their very best.	<input type="checkbox"/>	<input type="checkbox"/>
8.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have a close friend who really <i>understands</i> them	BUT	Other kids <i>don't</i> have a close friend who understands them.	<input type="checkbox"/>	<input type="checkbox"/>
9.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have parents who <i>care</i> about their feelings	BUT	Other kids have parents who <i>don't</i> seem to care very much about their children's feelings.	<input type="checkbox"/>	<input type="checkbox"/>
10.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have classmates who <i>sometimes</i> make fun of them	BUT	Other kids <i>don't</i> have classmates who <i>make</i> fun of them.	<input type="checkbox"/>	<input type="checkbox"/>
11.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids <i>do</i> have a teacher who <i>cares</i> about them	BUT	Other kids <i>don't</i> have a teacher who cares about them.	<input type="checkbox"/>	<input type="checkbox"/>

	Really True for Me	Sort of True for Me			Sort of True for Me	Really True for Me	
12.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have a close friend who they can talk to about things that bother them	BUT	Other kids <i>don't</i> have a close friend who they can talk to about things that bother them.	<input type="checkbox"/>	<input type="checkbox"/>
13.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have parents who treat their children like a <i>person</i> who really matters	BUT	Other kids have parents who <i>don't</i> usually treat their children like a person who matters.	<input type="checkbox"/>	<input type="checkbox"/>
14.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have classmates who pay attention to what they say	BUT	Other kids have classmates who usually don't pay attention to what they say.	<input type="checkbox"/>	<input type="checkbox"/>
15.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids <i>don't</i> have a teacher who is <i>fair</i> to them	BUT	Other kids <i>do</i> have a teacher who is fair to them.	<input type="checkbox"/>	<input type="checkbox"/>
16.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids <i>don't</i> have a close friend who they like to spend time with	BUT	Other kids <i>do</i> have a close friend who they like to spend time with.	<input type="checkbox"/>	<input type="checkbox"/>
17.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have parents who like them the way <i>they are</i>	BUT	Other kids have parents who wish their children were <i>different</i> .	<input type="checkbox"/>	<input type="checkbox"/>
18.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids <i>don't</i> get asked to play in games with classmates very often	BUT	Other kids <i>often</i> get asked to play in games by their classmates.	<input type="checkbox"/>	<input type="checkbox"/>
19.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids <i>don't</i> have a teacher who cares if they feel bad	BUT	Other kids <i>do</i> have a teacher who cares if they feel bad.	<input type="checkbox"/>	<input type="checkbox"/>
20.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids <i>don't</i> have a close friend who really <i>listens</i> to what they say	BUT	Other kids <i>do</i> have a close friend who really listens to what they say.	<input type="checkbox"/>	<input type="checkbox"/>
21.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have parents who <i>don't</i> act like what their children do is <i>important</i>	BUT	Other kids have parents who <i>do</i> act like what their children do is important.	<input type="checkbox"/>	<input type="checkbox"/>
22.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids often spend recess being <i>alone</i>	BUT	Other kids spend recess playing with their classmates.	<input type="checkbox"/>	<input type="checkbox"/>
23.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have a teacher who treats them like a <i>person</i>	BUT	Other kids <i>don't</i> have a teacher who treats them like a person.	<input type="checkbox"/>	<input type="checkbox"/>
24.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids <i>don't</i> have a close friend who cares about their feelings	BUT	Other kids <i>do</i> have a close friend who cares about their feelings.	<input type="checkbox"/>	<input type="checkbox"/>

Susan Harter, University of Denver, 1985

from Harter, S. (1985). Manual for The Social Support Scale for Children. Denver, CO: University of Denver.

Appendix E

Self-Perception Profile for Learning Disabled

Students **What I Am Like**

Name _____ Age _____ Birthday _____ Group _____
MonthDay

Boy or Girl (circle which)

SAMPLE SENTENCE

		Really True for me	Sort of True for me		BUT		Sort of True for me	Really True for me
(a)	<input type="checkbox"/>	<input type="checkbox"/>		Some kids would rather play outdoors in their spare time		Other kids would rather watch T.V.	<input type="checkbox"/>	<input type="checkbox"/>
1.	<input type="checkbox"/>	<input type="checkbox"/>		Some kids are sure they are pretty smart in school		Other kids are <i>not</i> so sure they are all that smart in school.	<input type="checkbox"/>	<input type="checkbox"/>
2.	<input type="checkbox"/>	<input type="checkbox"/>		Some kids find it hard to make friends		For other kids it is pretty easy.	<input type="checkbox"/>	<input type="checkbox"/>
3.	<input type="checkbox"/>	<input type="checkbox"/>		Some kids can read most stories and books pretty easily		Other kids have a <i>hard time</i> reading stories and books.	<input type="checkbox"/>	<input type="checkbox"/>
4.	<input type="checkbox"/>	<input type="checkbox"/>		Some kids <i>don't</i> do well at new outdoor games		Other kids are <i>good</i> at new games right away.	<input type="checkbox"/>	<input type="checkbox"/>
5.	<input type="checkbox"/>	<input type="checkbox"/>		Some kids can write good stories or papers pretty easily		Other kids find it <i>hard</i> to write good stories or papers.	<input type="checkbox"/>	<input type="checkbox"/>
6.	<input type="checkbox"/>	<input type="checkbox"/>		Some kids often do <i>not</i> act the way they are supposed to		Other kids usually act the way they know they are supposed to.	<input type="checkbox"/>	<input type="checkbox"/>
7.	<input type="checkbox"/>	<input type="checkbox"/>		Some kids can do their math pretty easily		Other kids have a <i>hard time</i> when it comes to math.	<input type="checkbox"/>	<input type="checkbox"/>
8.	<input type="checkbox"/>	<input type="checkbox"/>		Some kids wish that something about their face or hair looked <i>different</i>		Other kids <i>like</i> their face and hair the way they are.	<input type="checkbox"/>	<input type="checkbox"/>
9.	<input type="checkbox"/>	<input type="checkbox"/>		Some kids know how to spell most words they come across		Other kids find it <i>hard</i> to spell most words.	<input type="checkbox"/>	<input type="checkbox"/>
10.	<input type="checkbox"/>	<input type="checkbox"/>		Some kids are <i>unhappy</i> with themselves		Other kids are pretty <i>pleased</i> with themselves.	<input type="checkbox"/>	<input type="checkbox"/>

	Really True for me	Sort of True for me			Sort of True for me	Really True for me	
11.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids feel that they are just as smart as others their age	BUT	Other kids <i>aren't so sure</i> and wonder if they are as smart.	<input type="checkbox"/>	<input type="checkbox"/>
12.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids would like to have a lot more friends	BUT	Other kids have as many friends as they want.	<input type="checkbox"/>	<input type="checkbox"/>
13.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are really good readers	BUT	Other kids have a <i>hard time</i> with their reading.	<input type="checkbox"/>	<input type="checkbox"/>
14.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids wish they could be a lot better at sports	BUT	Other kids feel they are good enough at sports.	<input type="checkbox"/>	<input type="checkbox"/>
15.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids can easily write good sentences and paragraphs to make a nice story	BUT	Other kids have <i>trouble</i> writing sentences and paragraphs in order to make a good story.	<input type="checkbox"/>	<input type="checkbox"/>
16.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids usually get into trouble because of the things they do	BUT	Other kids usually <i>don't</i> do things that get them into trouble.	<input type="checkbox"/>	<input type="checkbox"/>
17.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are good at math.	BUT	Other kids have a <i>hard time</i> with math.	<input type="checkbox"/>	<input type="checkbox"/>
18.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids wish their physical appearance (how they look) was <i>different</i>	BUT	Other kids <i>like</i> their physical appearance the way it is.	<input type="checkbox"/>	<input type="checkbox"/>
19.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have <i>problems</i> with their spelling	BUT	Other kids can spell most words pretty easily.	<input type="checkbox"/>	<input type="checkbox"/>
20.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are happy with themselves as a person	BUT	Other kids are often <i>not</i> happy with themselves.	<input type="checkbox"/>	<input type="checkbox"/>
21.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are <i>not</i> very good learners in school	BUT	Other kids are good learners in school.	<input type="checkbox"/>	<input type="checkbox"/>
22.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are always doing things with a lot of kids	BUT	Other kids usually do things by themselves.	<input type="checkbox"/>	<input type="checkbox"/>
23.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have <i>trouble</i> with their reading	BUT	Other kids do <i>well</i> in reading.	<input type="checkbox"/>	<input type="checkbox"/>
24.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids do very <i>well</i> at all kinds of sports	BUT	Other kids <i>don't</i> feel that they are very good when it comes to sports.	<input type="checkbox"/>	<input type="checkbox"/>

Continued on next page...

	Really True for me	Sort of True for me			Sort of True for me	Really True for me	
25.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids find it <i>hard</i> to write good stories or papers	BUT	Other kids can write good stories or papers.	<input type="checkbox"/>	<input type="checkbox"/>
26.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids behave themselves very well	BUT	Other kids often find it <i>hard</i> to behave themselves.	<input type="checkbox"/>	<input type="checkbox"/>
27.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have <i>trouble</i> doing math problems	BUT	Other kids do <i>well</i> at their math problems.	<input type="checkbox"/>	<input type="checkbox"/>
28.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids think that they are good looking	BUT	Other kids think that they are <i>not</i> very good looking.	<input type="checkbox"/>	<input type="checkbox"/>
29.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have <i>trouble</i> spelling a lot of words	BUT	Other kids can spell a lot of words pretty easily.	<input type="checkbox"/>	<input type="checkbox"/>
30.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids <i>like</i> the kind of person they are	BUT	Other kids often wish they were someone else.	<input type="checkbox"/>	<input type="checkbox"/>
31.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids sometimes feel kind of <i>dumb</i> when it comes to doing their schoolwork	BUT	Other kids feel that are pretty <i>bright</i> when it comes to doing their schoolwork.	<input type="checkbox"/>	<input type="checkbox"/>
32.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are <i>popular</i> with others their age	BUT	Other kids are <i>not</i> very popular.	<input type="checkbox"/>	<input type="checkbox"/>
33.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids read pretty <i>fast</i>	BUT	Other kids are pretty <i>slow</i> readers.	<input type="checkbox"/>	<input type="checkbox"/>
34.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids think they could do <i>well</i> at just about any new athletic activity	BUT	Other kids are afraid they might <i>not</i> do well at a new athletic activity.	<input type="checkbox"/>	<input type="checkbox"/>
35.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have a <i>hard time</i> writing good sentences and paragraphs	BUT	Other kids <i>can</i> write good sentences and paragraphs.	<input type="checkbox"/>	<input type="checkbox"/>
36.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids usually follow rules about how they are to behave	BUT	Other kids find it <i>hard</i> to follow these rules.	<input type="checkbox"/>	<input type="checkbox"/>
37.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids find it <i>hard</i> to understand math.	BUT	Other kids can understand math pretty <i>easily</i> .	<input type="checkbox"/>	<input type="checkbox"/>
38.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are <i>not</i> happy with the way they look	BUT	Other kids <i>are</i> happy with the way they look.	<input type="checkbox"/>	<input type="checkbox"/>

Continued on next page...

	Really True for me	Sort of True for me			Sort of True for me	Really True for me
39.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have a <i>hard</i> time with their spelling	BUT	Other kids do <i>well</i> in spelling.	<input type="checkbox"/> <input type="checkbox"/>
40.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are very <i>happy</i> being the way they are	BUT	Other kids wish they were <i>different</i> .	<input type="checkbox"/> <input type="checkbox"/>
41.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids feel that they are very <i>good</i> at their schoolwork	BUT	Other kids <i>worry</i> about whether they can do the schoolwork assigned to them.	<input type="checkbox"/> <input type="checkbox"/>
42.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids have a <i>lot</i> of friends	BUT	Other kids <i>don't</i> have very many friends.	<input type="checkbox"/> <input type="checkbox"/>
43.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids feel that they are <i>better</i> than others their age at sports	BUT	Other kids <i>don't</i> feel they can play as well.	<input type="checkbox"/> <input type="checkbox"/>
44.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids do <i>not</i> like the way they behave	BUT	Other kids usually <i>like</i> the way they behave.	<input type="checkbox"/> <input type="checkbox"/>
45.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids like their body the way it is	BUT	Other kids wish their body was <i>different</i> .	<input type="checkbox"/> <input type="checkbox"/>
46.	<input type="checkbox"/>	<input type="checkbox"/>	Some kids are <i>not</i> very happy with the way they do a lot of things	BUT	Other kids think the way they do things is <i>fine</i> .	<input type="checkbox"/> <input type="checkbox"/>

from Renick, M. J., & Harter, S. (1988). Manual for The Self-Perception Profile for Learning Disabled Students.
Denver, CO: University of Denver.

Appendix G
Information Letter for Parents of Identified
Learning Disabled Children

Dear Parent/Guardian,

My name is Tamara Austin Milne and I am in the Master of Arts program in Psychology at Lakehead University. I am conducting a research study entitled "Self-Esteem in Learning Disabled Children: The Role of Social Competence", supervised by Dr. Fred Schmidt, Lakehead Regional Family Centre, and Dr. Ed Rawana, Lakehead University and Lakehead Regional Family Centre. Children with learning disabilities (LD) sometimes do not feel very good about themselves because they have problems in school. I would like to see if having good social skills, that is, being friendly and getting along with others, can help such children develop higher self-esteem.

My research plan has been examined by the Ethics committee of Lakehead University and by the Lakehead Board of Education, who find that it is ethical and safe for the participants involved. They have granted me permission to contact children and parents to invite

them to take part in this study. I am enclosing a letter of permission from your principal as well.

I am planning to do a screening assessment of intellectual and academic abilities for children who have been identified by the school board as having some academic difficulties. This testing is for research purposes only, and will not affect the board's designation of these children as being Learning Disabled. I will also ask you to complete a short checklist regarding behaviours you have observed in your child at home. His/her teacher will be asked to fill out a similar checklist regarding the child's behaviour at school, and a questionnaire about how he/she gets along with others. The children will then be given a number of paper-and-pencil tests regarding how they feel about themselves, which will take about one hour to complete. I will read the questions one at a time, so that those with reading problems will be able to follow along. With your agreement, and the school's permission, I would like to administer these tests to small groups of students at school. Otherwise, the testing can be done at another time suitable to you. The testing process will not entail any

anticipated risk or direct benefit to you or your child, but we hope, with your help, that we can come to a better understanding of self-esteem issues for children with learning disabilities.

As voluntary participants, you or your child can decide at any time to withdraw from this study. You will also be provided at your request with information regarding your child's performance at any time during the testing process, or afterward. When the study is completed, I will send you a summary of the overall findings. All individual test results, and the names of you and your child, will be kept confidential.

If you are interested in having your child participate, please fill out and return the tear-off section at the bottom of this form. I will collect it from the teacher and telephone you within the next few weeks. If you agree to help, I would like to meet you and your child at a time convenient to you. You will be welcome to ask me any questions you may have about the research and the tests at that time, as well as to read and sign a consent form and receive the questionnaire to fill out. If you have any questions or concerns at present regarding this study, please contact myself,

Tamara Austin Milne, at 622-4744, or my supervisor(s),

Dr. Schmidt at 343-5016 or Dr. Rawana at 346-7751.

Thank you.

Sincerely,

Tamara Austin Milne, H.B.A.

I agree to be contacted regarding the self-esteem study.

Parent/Guardian's Name _____

Child's Name _____

Phone _____

Appendix H

Information Letter for Parents of Children with Academic Difficulties

Dear Parent/Guardian,

My name is Tamara Austin Milne and I am in the Master of Arts program in Psychology at Lakehead University. I am conducting a research study dealing with self-esteem in children with academic problems. My supervisors are Dr. Fred Schmidt, Lakehead Regional Family Centre, and Dr. Ed Rawana, Lakehead University and Lakehead Regional Family Centre. My research plan has been examined by the Ethics committee of Lakehead University and by the Lakehead Board of Education, who find that it is ethical and safe for the participants involved. They have granted me permission to contact children and parents to invite them to take part in this study.

Some children have trouble doing their schoolwork and receive additional support to help them keep up academically. Many (but not all) of these children do not feel very good about themselves. I would like to see if having good social skills, that is, being

friendly and getting along with others, can help such children develop higher self-esteem. With your permission, I would like to invite your child to participate in this study.

I will first do a screening assessment of intellectual and academic abilities if necessary, for each child. Those who have received such tests within the last year need not be retested. This testing is for research purposes only. I will also ask you to complete a short checklist regarding behaviours you have observed in your child at home. His/her teacher will be asked to fill out a similar checklist regarding the child's behaviour at school, and a questionnaire about how he/she gets along with others. The children will then be given a number of paper-and-pencil tests regarding how they feel about themselves, which will take about one hour to complete. I will read the questions one at a time, so that those with reading problems will be able to follow along. With your agreement, and the school's permission, I would like to administer these tests at school. Otherwise, the testing can be done at another time suitable to you. The testing process will not entail any anticipated

risk or direct benefit to you or your child, but we hope, with your help, that we can come to a better understanding of self-esteem issues for children with learning problems.

As voluntary participants, you or your child can decide at any time to withdraw from this study. You will also be provided at your request with information regarding your child's performance at any time during the testing process, or afterward. When the study is completed, I will send you a summary of the overall findings. All individual test results, and the names of you and your child, will be kept confidential.

If you are interested in having your child participate, please fill out and return the tear-off section at the bottom of this form. I will collect it from the teacher and telephone you within the next few weeks. If you agree to help, I would like to meet you and your child at a time convenient to you. You will be welcome to ask me any questions you may have about the research and the tests at that time, as well as to read and sign a consent form and receive the questionnaire to fill out. If you have any questions or concerns at present regarding this study, please contact myself,

Tamara Austin Milne, at 622-4744, or my supervisor(s),

Dr. Schmidt at 343-5016 or Dr. Rawana at 346-7751.

Thank you.

Sincerely,

Tamara Austin Milne, H.B.A.

I agree to be contacted regarding the self-esteem study.

Parent/Guardian's Name _____

Child's Name _____

Phone _____

Appendix I

Information Letter for Parents of Normally Achieving Children

Dear Parent/Guardian,

My name is Tamara Austin Milne and I am in the Master of Arts program in Psychology at Lakehead University. I am conducting a research study entitled "Self-Esteem in Learning Disabled Children: The Role of Social Competence", supervised by Dr. Fred Schmidt, Lakehead Regional Family Centre, and Dr. Ed Rawana, Lakehead University and Lakehead Regional Family Centre. Children with learning disabilities (LD) sometimes do not feel very good about themselves because they have problems in school. I would like to see if having good social skills, that is, being friendly and getting along with others, can help such children develop higher self-esteem. In addition to the learning disabled children who will take part in this study, I also require some average, normally-achieving (NA) children with whom to compare the LD students. This will help me to discover some of the ways in which LD children differ from NA students. I would like to

invite your child to be part of this normally-achieving comparison, or control, group.

My research plan has been examined by the Ethics committee of Lakehead University and by the Lakehead Board of Education, who find that it is ethical and safe for the participants involved. They have granted me permission to contact children and parents to invite them to take part in this study.

I am planning to do a screening assessment of intellectual and academic abilities for all of the children who participate, both the learning disabled children, and the normally-achieving children. This testing is for research purposes only, and will not affect the school board's academic classification of any of the children. I will also ask you to complete a short checklist regarding behaviours you have observed in your child at home. His/her teacher will be asked to fill out a similar checklist regarding the child's behaviour at school, and a social skills questionnaire. The children will then be given a number of paper-and-pencil tests regarding how they feel about themselves, which will take half an hour to an hour to complete. With your agreement, and the school's permission, I

would like to administer these tests to small groups of students at school. Otherwise, the testing can be done at another time suitable to you. The testing process will not entail any anticipated risk or direct benefit to you or your child, but we hope, with your help, that we can come to a better understanding of self-esteem issues for children with learning disabilities.

As voluntary participants, you or your child can decide at any time to withdraw from this study. You will also be provided at your request with information regarding your child's performance at any time during the testing process, or afterward. All individual test results, and the names of you and your child, will be kept confidential.

If you are interested in having your child participate, please fill out and return the tear-off section at the bottom of this form. I will collect it from the teacher and telephone you within the next few weeks. If you agree to help, I would like to meet you and your child at a time convenient to you. You will be welcome to ask me any questions you may have about the research and the tests at that time, as well as to read and sign a consent form and receive the questionnaire

to fill out. If you have any questions or concerns at present regarding this study, please contact myself, Tamara Austin Milne, at 622-4744, or my supervisor(s), Dr. Schmidt at 343-5016 or Dr. Rawana at 346-7751.

Thank you.

Sincerely,

Tamara Austin Milne, H.B.A.

I agree to be contacted regarding the self-esteem study.

Parent/Guardian's Name _____

Child's Name _____

Phone _____

NA Control Group

Appendix J

Parent/Guardian Consent Form

I _____ agree
to allow my son/daughter _____ to
(Full Name)
participate in the study entitled "Self-Esteem in
Learning Disabled Children: The Role of Social
Competence", conducted by Tamara Austin Milne, graduate
student in Psychology at Lakehead University,
supervised by Dr. Fred Schmidt and Dr. Ed Rawana.

I understand that my son/daughter's participation
will consist of a one hour, individual screening
session, and a one hour group session, filling out
questionnaires. This research will not entail any
direct benefit or foreseeable risk to my child.

I understand that all information will be
confidential and that my son/daughter may withdraw from
participation in this research project at any time.

Signature _____ Date _____

Witness _____

This study has been explained to me and I understand what I am to do, confidentiality, and that I may withdraw whenever I wish.

Child's Assent _____ Date _____

Witness _____