

**Final Performance Report  
Self-Determination Synthesis Project  
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**Executive Summary**

The professional literature on the topic of self-determination has been growing rapidly in the last decade. Much of this writing has addressed the “why” of self-determination, including the rationale that it is a basic civil right, a legislative mandate, and a right to which citizens with disabilities are entitled and have demanded. Additional research has bolstered the rationale for self-determination by demonstrating that people with self-determination skills have a better quality of life, and that positive outcomes are associated with being self-determined. The parameters of self-determination also have been thoroughly examined through the development of definitions, conceptual models, and the categorization of self-determination skills and behaviors. The literature also includes many “recommended,” but not empirically-demonstrated, strategies for promoting self-determination.

The purpose of the Self-Determination Synthesis Project (SDSP) was to synthesize, corroborate, and communicate the professional knowledge base on the effects of self-determination and self-advocacy interventions in order to improve, expand, and accelerate the use of this knowledge by the professionals who serve children and youth with disabilities, and the parents who rear, educate, and support their children with disabilities. The SDSP used both quantitative and qualitative methods to identify effective practices in promoting SD for students with disabilities.

A comprehensive literature review and meta-analysis of SD intervention outcomes was conducted with the extant literature. The literature review yielded more than 800 resources on self-determination, including more than 450 peer-reviewed articles. Of those, only 51 studies were identified that intervened to promote one or more components of self-determination; 22 were included in meta-analyses. The median effect size across 100 group intervention comparisons (contained in 9 studies) was 1.38. In contrast, 13 single subject studies included 18 interventions and produced a median percentage of nonoverlapping data (PND) of 95% with a range of 64% to 100%. Seven of the interventions had a PND of 100%, suggesting strong effects. Although all components of self-determination were reflected in this research, most focused on teaching choice making to individuals with moderate and severe mental retardation or self-advocacy to individuals with learning disabilities or mild mental retardation.

A series of qualitative case studies were conducted in six school districts across the country that had a demonstrated history of effectively promoting self-determination for their students. These districts primarily focused on self-determination for their transition-aged students, although some districts began working with students in middle school and upper elementary grades. The districts used a variety of strategies, ranging from published curricula to teacher-made lessons to person-centered planning strategies to promote self-determination. Student participation in educational and transition planning was also emphasized. All of the sites expected students (and to varying degrees, their parents) to take responsibility for working toward their goals and following through with the decisions required to meet those goals. Common features across sites that contributed to self-determination outcomes for students

included the presence of an impetus person, and multiple, changing roles of teachers and parents. Present and past barriers included lack of administrative support, student-related factors, and the resistance of parents and professionals to changing roles.

The meta-analysis and qualitative case studies yielded complementary findings and recommendations for future research and practice (e.g., longitudinal demonstration of teaching, learning, and impact on lives). The major finding of the SDSP is that there is still much more to be done. The findings of this project have been disseminated extensively through researcher-oriented and practitioner-oriented journals, presentations, inservice trainings, and the project web site. It is our hope that these dissemination efforts will contribute to further advancement in self-determination research and practice.

## **I. Project Purpose and Goals**

The purpose of the Self-Determination Synthesis Project (SDSP) was to synthesize, corroborate, and communicate the professional knowledge base on the effects of self-determination and self-advocacy interventions in order to improve, expand, and accelerate the use of this knowledge by the professionals who serve children and youth with disabilities, and the parents who rear, educate, and support their children with disabilities. The objectives of the project were as follows:

1. To develop hypotheses with input from key stakeholders to focus the Project and enhance the usability and validity of the synthesis activities and outcomes;
2. To review, analyze, and evaluate the literature on self-determination (SD) to identify trends, areas of agreement and disagreement, unanswered questions, and gaps in the knowledge base;
3. To examine the SD practices being implemented, the environments in which SD is flourishing, and the outcomes being achieved through an in-depth analysis of four exemplar sites;
4. To communicate and develop an array of successful products and procedures for dissemination through technical assistance and information dissemination networks; and
5. To evaluate the implementation and impact of the Project.

The SDSP began in October 1998. The primary tasks for 1998-99 included refining the project objectives, beginning a literature review, and making visits to exemplar sites. The focus during 1999-2000 was the conclusion of the literature review and meta-analysis, and visits to the remaining exemplar sites. A one-year, no-cost extension that ended 9/30/01 was used to finish analyzing qualitative data from the exemplar sites and focus on dissemination of project results. The Project Activities section of this report describes progress made toward achieving the five objectives outlined above.

## **II. Context**

Over the past 30 years, considerable change has occurred in the services provided to individuals with disabilities. From primarily custodial care, designed to protect, manage, and control the lives of people with disabilities in segregated environments, the special education system is becoming proactive in efforts to provide supports necessary for full participation in family and community life. Self-determination (SD), or taking control of one's life, is becoming a hallmark of providing full and complete special education services. Evidence of this belated recognition is clearly present in key pieces of disability legislation that have been passed or re-authorized since 1990 including the Americans with Disabilities Act of 1990, the Individuals with Disabilities Education Act, 1990 and 1997, and the Rehabilitation Act Amendments of 1992. These laws have all stressed the right of individuals with disabilities to choose what jobs they want, the means to achieve their personal goals, aspirations, and dreams, and where and with whom they want to live. While self-determination has been defined by many different authors (e.g., Abery, 1994; Field, 1996; Martin & Marshall, 1995; Wehmeyer, 1992) the consensus definition offered by Field, Martin, Miller, Ward, and Wehmeyer (1998) is:

Self-determination is a combination of skills, knowledge and beliefs that enable a person to engage in goal directed, self-regulated, autonomous behavior. An understanding of one's strengths and limitations together with a belief in oneself as capable and effective are essential to self-determination. When acting on the basis of these skills and attitudes, individuals have greater ability to take control of their lives and assume the role of successful adults in our society. (p. 2)

The professional literature on the topic of self-determination has been growing rapidly in the last decade. Much of this writing has addressed the "why" of self-determination, including the rationale that it is a basic civil right, a legislative mandate, and a right to which citizens with disabilities are entitled and have demanded (cf. Brotherson, Cunconan-Lahr, & Wehmeyer, 1995; Martin, Marshall, & Maxson, 1993; Sands & Wehmeyer, 1996; Wehmeyer & Ward, 1995; Ward, 1996). Additional research has bolstered the rationale for self-determination by demonstrating that people with self-determination skills have a better quality of life (Wehmeyer & Schwartz, 1998b), and that positive outcomes are associated with being self-determined (Wehmeyer & Schwartz, 1997). The parameters of self-determination also have been thoroughly examined through the development of definitions, conceptual models (Abery, Rudrud, Arndt, Schauben, & Eggebeen, 1995; Field, 1996; Martin & Marshall, 1995; Wehmeyer, 1992; Wehmeyer, Palmer, Agran, Mithaug, & Martin, 2000), and the categorization of self-determination skills and behaviors (Field & Hoffman, 1994; Wehmeyer, Kelchner, & Richards, 1996).

The literature also includes many "recommended," but not empirically-demonstrated, strategies for promoting self-determination. Some of the most commonly suggested interventions are student involvement in IEP planning (Gillespie & Turnbull, 1983; Martin et al., 1993; Van Reusen & Bos, 1994), transition planning (Wehmeyer & Lawrence, 1995; Wehmeyer, & Schwartz, 1997), person centered planning practices (Vandercook, York, & Forest, 1989), and directly teaching self-determination skills (Hoffman & Field, 1995; Wehmeyer et al., 1998; West, Taymans, & Gopal, 1997).

While this overall literature on self-determination is extensive, it is not necessarily empirically-based. Most of the professional writing on self-determination has been devoted to position papers and conceptual work addressing why specific skills for making their own decisions should be taught to individuals with disabilities and how it should happen. While a few studies have explored the degree to which self-determination strategies have or have not been adopted by the field in the form of curricular changes and/or self-determination related IEP goals (Wehmeyer et al., 1999; Wehmeyer & Schwartz, 1998), research on the outcomes of self-determination interventions has been sparse. The purpose of the SDSP was to determine what the published research says about the effectiveness of interventions to promote self-determination, as well as what practices undocumented in the literature are used by schools demonstrating positive SD outcomes for their students.

### **III. Project Activities**

#### **Project planning and development**

The first objective of the SDSP was to develop hypotheses with input from key stakeholders to focus the Project and enhance the usability and validity of the synthesis activities and outcomes. Toward this objective, the Project Team comprised of the two Co-Directors, two Research Associates, and Project Coordinator, developed preliminary research goals, protocols,

and data collection methods for both the quantitative and qualitative components of the study. These materials were brought to the Project Advisory Committee (PAC), which was comprised of consumers and self-advocates; parents of students with disabilities; educators; and researchers with extensive knowledge about self-determination practices. (Appendix A contains a list of PAC members.) The PAC convened for a two-day meeting in January of 1999. During this time, the group refined the initial research questions, narrowed the scope of the study, revised the research protocols for both the quantitative and qualitative components of the study, developed preliminary ideas for dissemination plans, and provided feedback about the web site. At this preliminary meeting the PAC also decided that their subsequent participation should take the form of mail and email updates, with members providing feedback on specific issues as requested by the Project Team. The Project Coordinator had periodic contact with PAC members through October 2001, when a final mailing of the project's products was sent to all PAC members.

In addition to the Project Team and the PAC, the work of the SDSP also was conducted by a total of five graduate assistants who assisted with the literature search; web site and lesson plan development; qualitative data management; and presentation preparation. The project web site was managed by an individual who worked on a contractual basis. A part-time secretary also provided clerical support to the project activities. Finally, the exemplar site studies were coordinated with a designated liaison at each site. These liaisons assisted with scheduling and logistical issues during each weeklong site visit.

*Conceptual Framework.* Before the literature review and case studies were initiated, the first phase of the project involved refining the scope of the studies. Self-determination has been described as an intervention and as an outcome (Algozzine, Browder, Karvonen, Test, & Wood, 2001). Given our focus on both characterizations, we defined the specific components of self-determination to be identified in the intervention literature. To define these, we reviewed definitions of self-determination published between 1972 and 2000 and listed all components identified by two or more sources. Concurrently, we examined conceptual models of self-determination and concluded that Wehmeyer's (1998) model contained the most definitional concepts and was based on research on these concepts (Wehmeyer, Kelchner & Richards, 1996).

Three concepts from Wehmeyer's (1998) model were excluded from the literature review and meta-analysis portion of the SDSP. Self-management and independent living skills were excluded because of the broad base of existing research, including major literature reviews, on these subjects (e.g., Quinn, Kavale, Mathur, Rutherford, & Forness, 1999; Snell, 1997). Incorporating either of these concepts in the current review would have over-emphasized their importance in the self-determination literature because of the proliferation of research on these topics. A third component, internal locus of control, was excluded due to concerns about construct validity (Lefcourt, 1984). The remaining components included in the literature review and meta-analysis were: (a) choice-making, (b) decision-making, (c) problem-solving, (d) goal setting and attainment, (e) self-advocacy, (f) self-efficacy, (g) self-awareness and understanding, and (h) self-observation, evaluation, and reinforcement. Based on the review of definitions and focus on self-determination as both an intervention and outcome, (a) person-centered planning, (b) preference assessment, and (c) relationships with others were also considered in finding and coding the literature. For consistency between the case studies and the literature review, the same components and methods were used to describe the findings from the exemplar site case studies.

The SDSPP used both quantitative and qualitative methods to identify effective practices in promoting SD for students with disabilities. A literature review and meta-analysis of SD intervention outcomes was conducted with the extant literature. A series of qualitative case studies were conducted in six school districts across the country. While the overall purpose of each component of the study was to determine “what works” in promoting SD for students with disabilities, the research questions differed slightly for the two studies.

#### Research questions and methodology: Literature review and meta-analysis

The purpose of the literature review and meta-analysis was to summarize the research on self-determination across all disability groups to glean from this prolific literature specific, empirically validated practices for promoting self-determination with people with disabilities. The following research questions were of interest:

- (1) What interventions have been studied to promote self-determination?
- (2) What groups of individuals with disabilities have been taught strategies to promote self-determination?
- (3) What outcomes of interventions to promote self-determination have been demonstrated?

The literature review and meta-analysis involved the following steps: (a) locating studies using replicable search procedure, (b) coding studies, (c) describing studies using demographic features and a common outcome scale, and (d) using statistical methods to find relations between study features and study outcomes.

*Literature Search Procedures.* A wide variety of electronic and print resources were screened to identify articles (published or in press) for possible inclusion in this study, including ERIC, EBSCOHost, PsycInfo, Dissertation Abstracts International, and the Council for Exceptional Children databases. Twenty-nine search terms (e.g., self-advocacy, problem solving, student-directed learning) were each used in conjunction with the word “disabilities” to narrow the search. Recent issues of relevant journals (e.g., Exceptional Children, Career Development for Exceptional Individuals, Learning Disabilities Research and Practice) were searched manually to identify references not yet included in electronic databases. In addition, the reference sections of included articles as well as position papers, chapters, and books on self-determination were reviewed to identify potentially relevant research. Finally, nearly 200 researchers and practitioners widely recognized as active in the field of special education were asked to identify and submit additional studies, including those recently submitted or accepted for publication. More than 800 resources on SD, including over 450 published articles, were identified through this literature search.

*Inclusion Criteria.* Abstracts, method, and results sections of potential articles were reviewed by two researchers knowledgeable in self-determination and research to ascertain appropriateness for inclusion and further consideration and inclusion according to six criteria:

- (1) The article had to be published or “in-press” in a peer-reviewed journal between 1972 and 2000 (The year 1972 was selected because this was the date of the earliest definition found for self-determination.)
- (2) The subjects had to be individuals classified with one of the disabilities recognized by IDEA or non-specified “developmental disabilities.”
- (3) Studies involving individuals from age 3 to adulthood were included.
- (4) The article had to report the results of a data-based intervention. The article did not have to demonstrate experimental control and could be a report of a teaching intervention or a qualitative study.
- (5) The intervention had to be one in which participants learned new skills or acquired new opportunities (for example studies that only identified preference patterns or existing self-determination skills were excluded).
- (6) The intervention had to focus on a component of self-determination as a dependent variable.

Excluded from this study were reviews, position papers, or expository articles that did not report first-hand data, and research that did not involve direct interventions to promote self-determination (e.g., correlational and descriptive studies). The application of these criteria narrowed the pool of identified literature from 450 articles to **just 51 studies** for inclusion in the literature review. Twenty-two of these studies met the criteria for inclusion in the meta-analyses.

Each source identified through the literature search was screened to determine its potential for this study using the inclusion criteria described above. Each article that met the inclusion criteria was marked for further analysis. A coding form was developed, piloted, and revised for use in recording characteristics of the research that would be meaningful in subsequent analysis. Training on the use of the form was conducted in order to insure standardization of coding. A sample of 27% of identified articles was coded independently by two researchers to obtain an estimate of overall inter-rater agreement for the project. Average inter-rater reliability was .93. Results of systematic analysis of the included research literature were transferred from coding forms to an electronic spreadsheet and checked for accuracy with item-by-item, line-by-line examination by two researchers. The metric used to estimate and describe the effects of self-determination *group* interventions was the standardized mean difference (d-index) effect size (cf. Cohen, 1988). Effect sizes for single subject studies were calculated using Percentage of Nonoverlapping Data (PND). For the computation of PNDs, reliability was determined by having a graduate student recompute 8 of the 18 PNDs. Reliability was computed by doing an exact comparison of each numerator and denominator in the PND computation and found to be 100%.

### Results of the literature review and meta-analysis

Following is a brief summary of the results of the literature review and meta-analysis. A complete description may be found in the Algozzine et al. (2001) manuscript, in Appendix B.

Most research has focused on choice making (38%), self-advocacy (37%), decision-making (20%), and problem solving (20%). In addition, we found that most studies targeted transition-aged students (ages 14-21) or adults (80.3%). Although all components of self-determination were reflected in this research, most focused on teaching choice-making to

individuals with moderate and severe mental retardation or self-advocacy to individuals with learning disabilities or mild mental retardation. The average effect size across 100 group intervention comparisons (contained in 9 studies) was 1.34, with a standard deviation of 3.69 and a standard error of 0.36. The distribution of ES measurements was positively skewed, indicating that most studies produced small changes in outcome measures. In contrast, 13 single subject studies included 18 interventions and produced a median Percentage of Nonoverlapping Data (PND) of 95% with a range of 64% to 100%. Seven of the interventions had a PND of 100% suggesting strong effects.. We also found that the majority of SD research (55%) has not included any longitudinal follow-up data (i.e., 12% collected follow-up data from 0-2 months, 27% collected data for 3 to 6 months, only 6% collected follow-up data for one year, no studies examined adult outcomes for students who participated in SD interventions). Further, SD intervention studies typically demonstrated improvement in SD skills, but data on student ability to apply skills to non-training environments was limited.

#### Research questions and methodology: Qualitative case studies of exemplar sites

The purpose of the exemplar site case studies was to determine what practices exist that may be undocumented in the literature, yet are effective in advancing self-determination for students with disabilities. The questions used in the qualitative case studies of exemplar sites were:

- (1) What are the promising practices for implementing strategies that promote SD?
- (2) What conditions support effective implementation of SD strategies?
- (3) What barriers exist that prevent SD outcomes from occurring at sites with demonstrated successful SD practices?

Nominations for exemplar sites were solicited by two methods. First, direct mailings were sent to nearly 200 experts, including researchers, self-advocates, and practitioners in the fields of self-determination, transition, and special education. Second, an announcement calling for exemplar site nominations was also published in the *TASH Newsletter*, the *APSE Advance*, the *CEC Newsletter*, and on the project's web site ([www.uncc.edu/sdsp](http://www.uncc.edu/sdsp)). From 18 nominated sites, six sites were identified as "exemplary" using a purposeful sampling procedure known as "reputational case sampling" (Schumacher & McMillan, 1993). The selection process included telephone interviews conducted with the site liaison and at least one parent whose son or daughter participated in the nominated program. Each site also submitted one student's IEP for review. Sites were selected based on the extent of evidence of self-determination practices in the nomination materials and anecdotal descriptions of student outcomes. An effort was also made to select sites that were diverse in terms of geographic location, size of program, demographic characteristics of the population, approaches to promoting SD, and the range of needs of the students receiving special education services.

Once each site was selected, a site liaison worked with the SDSP staff to identify individual participants and schedule interviews and observations. Participants at each site included teachers, administrators, human service agency representatives, family members, and program students and graduates. Data collection took place primarily during intensive site visits conducted by three members of the Project Team. Data were collected from each site through individual and focus group interviews; observations of classrooms, IEP meetings, and other settings; and document review and analysis. Follow-up data collection, usually for the purpose of clarifying or expanding data collected during the site visits, took place via telephone, mail, and email. A total of 190 hours were spent collecting data in the field.

Protocols for data collection methods were developed with input from the PAC. Individual and focus group interviews were semi-structured and lasted between one and two hours each. Classroom and IEP meeting observations lasted between 30 and 120 minutes and were documented using both unstructured field notes and a protocol form to ensure consistency of data collection across observations.

Data were analyzed after each site visit. Four researchers, including three who visited each site and one who was an investigator on the project but who did not visit the site, independently reviewed transcripts and field notes to identify emergent themes. The group then met to discuss themes and reach consensus on the elements of the program that contributed to student SD, as well as the factors that served as barriers to student SD. As the site visits spanned 16 months, unique or unexpected findings from each site were incorporated into data collection at subsequent sites. Cross-case analyses (Miles & Huberman, 1994) were conducted as data from each site were analyzed. Finally, findings from each site, as well as transcripts from the cross-case discussion meetings, were analyzed.

Trustworthiness of the data was insured in several ways (Lincoln & Guba, 1985). Participants were given the opportunity to review, correct, and clarify transcripts from their interviews prior to analysis. The use of multiple data collection methods, obtaining information from a variety of informants at each site, and having three researchers collect data at each site are methods of triangulation that lend credibility to the data. Finally, the cross-site analysis promotes generalizability of findings to other districts.

#### Results of the research: Qualitative case studies

A total of six sites participated in the case studies, including two in Colorado, two in Illinois, one in Kansas, and one in New York. Brief descriptions of the promising practices in each of the programs are provided below. Complete descriptions of each site are featured on the project web site ([www.uncc.edu/sdsp](http://www.uncc.edu/sdsp)).

***Fountain-Fort Carson.*** The program at Fountain-Fort Carson High School serves high school students with disabilities, including learning disabilities, mental retardation, hearing impairment, serious emotional disturbance, and orthopedic impairment. The program includes opportunities for students to learn and apply self-advocacy, goal-setting, problem-solving, self-awareness, and decision making skills through direct instruction in classes, participation in Individualized Educational Program (IEP) planning, vocational and post-secondary exploration, and application of skills in other settings. Students enroll in a Self-Advocacy course as a freshman or sophomore, and then in a Transition Issues course in their junior or senior year. A major focus of the Transition Issues class is a life issues simulation game called "Get a Life" in which students apply decision-making, self-management, problem-solving, goal setting and attainment, and other self-determination skills to issues such as independent living, post-secondary education, and career planning. Self-determination skills also are embedded in other classes, both in self-contained settings and in general education environments. Students enrolled in Fountain-Fort Carson School District typically begin attending their IEP meetings and providing input into their IEP goals and objectives by ninth grade, and as seniors are expected to lead their IEP meeting. Students have the option to participate in vocational exploration through a partnership with the School-to-Work Alliance Program (SWAP), and in community-based activities provided by Fountain-Fort Carson High School.

***Cheyenne Mountain.*** Cheyenne Mountain High School offers a program called Learning and Educating About Disabilities, commonly called the LEAD Group. The mission of

the LEAD Group is "to educate ourselves and others with respect to dealing with the social, academic, and emotional aspects of learning disabilities." While the group was originally designed for students with learning disabilities, it has included students with other mild disabilities (e.g., hearing impairment) and those with 504 plans. LEAD group students participate in a one-credit course that includes education about their disabilities and coaching on the use of self-advocacy skills. The class also acts as a support group for members as they practice their self-advocacy skills (e.g., by discussing their needed educational accommodations with general education teachers). Students also make presentations to a wide variety of groups including teachers, students in other schools, the business community, and future teachers, about what it means to have a learning disability and how people can cope with their disability in educational or work settings. One unique feature of the LEAD Group is that students are in charge of designing the course and planning activities. LEAD group members also mentor students with learning disabilities who are in upper elementary and middle school grades. A recent addition to the self-determination practices at Cheyenne Mountain High School is a class for freshmen that features a curriculum designed to increase students' knowledge about their disabilities and potential learning accommodations.

**James B. Conant High School.** Self-determination was infused into the special education programs at Conant High School beginning in the early 1990s through a federally funded transition systems change grant that included interventions for students and parents. Since then, self-determination also has been incorporated into a self-contained setting for students with severe behavioral and emotional problems, and a half-day self-contained setting for students at risk for dropping out of school (called LifeWorks). While no special self-determination curriculum is currently used at Conant, everyday practices contribute to students' self-determination. Students are presented with their options and staff allows them to make their own choices. Even if students make choices that result in negative outcomes, the staff waits until students have experienced failure and are motivated to succeed before helping the student re-evaluate options. Teachers and other staff members emphasize mutual respect and support for the students, without taking responsibility for students' decisions or the outcomes from those decisions. Teachers infuse principles of self-determination into existing academic curricula. The school's mission statement includes themes of problem-solving, personal responsibility, and citizenship

**UIC Advocacy and Empowerment for Minority Youth with Disabilities Program.** The purpose of the Empowering Choices Project is to prepare youth (grades 11-12) with disabilities for competitive employment after graduating from high school. The goal of the Empowering Transitions Project is to develop students' (grades 9-10) competencies to assume a proactive role in their education and vocational development. Both Projects emphasize goal setting and attainment, empowerment, and self-advocacy. The Projects also help students learn to recruit mentors who can help them achieve their personal goals. Both projects include a classroom-based curriculum and case management services. Empowering Choices emphasizes parent support and education, while Empowering Transitions emphasizes vocational guidance and exploration. A case manager assigned to each school conducts biweekly sessions with participating students at the school. Lessons are taken from *A road-map for success: Setting goals and recruiting mentors* (Balcazar, Garate-Serafini, & Keys, 1999) and include group discussion, role play, and other activities to teach self-awareness, self-advocacy, goal setting and attainment, and job seeking and maintenance skills. Some of the activities allow for peer modeling as well as modeling by the case manager. Each student in the project works intensively

with one of the case managers on personal goals and vocational exploration. The case manager may engage in a wide range of activities, such as arranging for tutoring or mentoring, providing transportation to job interviews, or talking with the families about students' progress in school or in seeking a job. The case manager also often assumes the role of a job developer and an informal counselor, attending IEP meetings with the student. Parent education is also a component of the program.

**Blue Valley.** Blue Valley Schools has several programs that effectively promote self-determination for students with disabilities, including resource and self-contained classrooms at the middle and high school levels, the semi-independent learner programs at the high school level, and the Adult Cooperative Community Education Services and Support (ACCESS) program for students ages 18 to 21. Students in grades 6-12 in resource settings benefit from extensive instruction using learning strategies, including *The Self-Advocacy Strategy* (Van Reusen, Bos, Schumaker, & Deschler, 1994). At the middle school level, resource teachers plan with grade-level planning teams to monitor student progress and develop strategies to help the students be successful in their academic classes. Several special education teachers at Blue Valley are trained in Learning Strategies techniques; they often model the techniques for classroom teachers to use with all of their students. The ACCESS program, designed as a transitional program for students with moderate and severe disabilities, is based in a house that serves as a training facility for independent living skills. Students in the ACCESS program develop self-determination skills through participation in community activities, such as recreational and continuing education classes at a local community college. Blue Valley has a strong culture in which student self-determination is the expectation, rather than the exception, for all students with disabilities.

**Monroe BOCES Circles of Support Program.** The Circles of Support program began with a grant from the New York Developmental Disabilities Council. The purpose of the project is to use person-centered planning to help students and their families achieve desired transition outcomes. Students who participate in Circles of Support have developmental disabilities and multiple impairments, including moderate and severe mental retardation, autism, speech and language impairment, orthopedic impairment, and traumatic brain injury. Students between the ages of 18 and 22 years, and their families, participate in the project. A Transition Coordinator and a Parent Partner, who is a parent of a child with a severe disability, staff the project. Students, with their families, use MAPS to develop their goals, and then a Parent Partner helps families identify and access services to help students meet their goals. Parent Partners also link students with agencies and arrange job try-outs and other experiential opportunities so students can make informed choices about their future. After students have completed a job try-out, the student or Parent Partner takes pictures of the student at the job site. The pictures are then used at future meetings to help the student identify features they liked and disliked about the job. Monroe BOCES has strong collaborative relationships with local advocacy organizations and other service agencies, which also use a range of practices to promote self-determination for consumers. Monroe BOCES has demonstrated creativity in developing opportunities for students to experience interests and make informed choices about their futures.

As mentioned in the methodology section of this report, a cross-site analysis was conducted to examine commonalities and differences across the six sites. Following is a brief summary of the findings from the cross-site analysis. A more comprehensive description will be available in a manuscript currently in preparation (Wood, Test, Karvonen, Browder, & Algozzine, 2001).

*Strategies and Practices.* Each of the exemplar sites used a variety of practices to promote student self-determination. Many of the practices were unique to each site and developed as creative responses to student needs. Consistent with the literature review and meta-analysis findings, most sites included some kind of teacher-made or published curriculum to teach self-determination skills to their students. The teaching sequence often included providing information, modeling, role play, and generalization (e.g., asking another teacher for an accommodation). Student participation in planning was expected at all of the sites, although the type of planning (e.g., IEP writing versus personal goal statements) and the extent of coaching varied. All of the sites expected students (and to varying degrees, their parents) to take responsibility for working toward their goals and following through with the decisions required to meet those goals. While teachers often described situations in which they disagreed with the students' choices, they did not interfere with the choice-making process and in fact honored students' choices across the board. Several sites emphasized the need for students to experience the consequences of their decisions in order for students to learn from past decisions and make future decisions that would help them attain their goals.

*Conditions that support effective implementation of SD interventions.* Perhaps one of the most common conditions seen in the exemplar sites was the presence of an "impetus person;" that is, an individual with a philosophy, and the accompanying motivation, to see SD-enhancing practices implemented in his or her school or district. This person's role varied at each site, from classroom teacher to guidance counselor to transition coordinator to student services coordinator for the district. Whether intentionally or not, this person influenced other educators by sharing their philosophy, or demonstrating practices (e.g., coaching students on IEP participation) that enhanced student self-determination. At some sites, general education teachers saw the outcomes for students who were taking greater responsibility for their learning and began working with the impetus person to incorporate similar strategies into their own teaching practices. This impetus person was often the primary force in creating a culture within the school or district that supports, and expects, self-determined student behavior. In many cases, this impetus person had close linkages to a local university with a special education teacher training program. Despite the range of barriers that existed at each of the sites, this impetus person maintained a "can-do" attitude that had a profound influence on the self-determination practices at their school or district.

The roles of the teacher and parent also shared some common features across the sites. The teachers often assumed multiple roles, as mentor, counselor, instructor, and case manager. In at least two sites, teachers enhanced their role as mentor by choosing to disclose their own disabilities to their students. A wide range of participants at the sites, including educators, parents, and students, described behavior of the teachers that signaled consistent, high expectations for all of their students. These expectations were sometimes made explicit, but were also implicit within informal conversations, classroom lessons, discussions with parents, and interactions with other teachers. Parents at the sites also assumed the roles of coach, role model, and advocate. However, one element to student self-determination perceived as critical by most sites was that parents' roles needed to change as the student aged and was able to assume more responsibility for his or her own life. Even for students with more severe disabilities, parents described a process by which their sons and daughters expressed their preferences and had those preferences honored by the parents and service providers.

*Barriers to self-determination.* Several barriers to self-determination were common to all of the sites. While some sites, especially those with long established programs, had surpassed

their hurdles, others were still working to overcome some barriers. Inadequate administrative support, whether past or current, may have been the most common barrier across all of the sites. Those sites with strong administrative support had programs that were successful in spreading throughout schools and districts, while those programs in districts without administrative support for student self-determination were limited to small pockets of classrooms and teachers who were dedicated to doing as much as they could to further their students' self-determination with what limited resources they had available.

Student characteristics were also sometimes perceived as barriers. Descriptions of students who simply “refused to grow up,” or who had reached a stage of learned helplessness after years of academic failure, or who lacked the ability to express their preferences – verbally or nonverbally –had difficulty becoming more self-determined. Even those students who eventually became self-determination exemplars themselves admitted that they did not like self-determination at first.

As much as students sometimes had difficulty changing their roles, sometimes professionals and parents also were described as clinging to their old roles. For example, some professionals were described as having difficulty with the idea of allowing a student to run his or her own IEP meeting. The persistence of old roles created a state of environmental non-responsiveness to students who may have been tentatively trying to act in a more self-determined manner, only to find that they were discouraged from making those changes.

#### Implications for practice, policy and future research

The primary purpose of the SDSP was to synthesize what is known about effective methods to promote self-determination for students with disabilities, in order to disseminate the information to those who can improve educational practice. The review of all existing materials on self-determination revealed that, while much has been written about the subject, very little of the literature describes the efficacy of self-determination interventions. While the 51 studies in the literature review contained examples of all the self-determination components, most focused on either teaching choice-making to individuals with mental retardation or self-advocacy to individuals with learning disabilities or mild mental retardation. Fewer studies exist on self-determination components like goal setting and attainment, self-regulation, self-evaluation, and problem solving outside the literature on changing staff-identified behavior. Most of this research also has focused on enhancing self-determination for adolescents or adults. In contrast, the research to date provides only a few examples of how to teach these skills to younger students. This literature also lacks diversity across disability groups. Most applications have employed participants with mental retardation or learning disabilities. Research on self-determination for individuals with autism, emotional disturbance, and sensory impairments may replicate some of the current procedures or identify alternatives that are more appropriate to these disability groups.

Another shortcoming in the self-determination literature is that most studies have focused on improving one or two self-determination skills like choice-making, problem-solving, and/or self-advocacy. What does not yet exist are many examples of how to help students make longitudinal progress in a comprehensive self-determination curriculum; however, a number of the group studies included several foci. There is some support that focusing on more components will yield more results—either because there is a synergistic effect, or because there is a great deal of overlap between some of these skills (e.g., problem-solving and decision-making). The need exists to demonstrate how to teach students to have a broad range of skills in self-determination.

For example, a future challenge like maintaining employment may require using decision making, problem solving, goal attainment, self regulation, and self-advocacy and being able to discriminate which skills are appropriate in a given context. The exemplar sites have demonstrated how some clusters of skills can be enhanced with a variety of interventions.

Promoting self-determination for school-aged students not only involves teaching new skills, but also creating environments in which students can be encouraged to use these skills. Some of the studies in the literature review used ecological interventions in addition to, or in lieu of, skill instruction. The importance of a culture that supports self-determination was also made evident in the exemplar site studies. A question for future research is the extent to which this staff training generalizes to providing multiple opportunities for a broad range of self-determined behaviors. For example, do staff who learn to teach a self-determination curriculum create opportunities for students to make their own decisions in the typical classroom routine? Do staff who learn to offer more classroom choices also create opportunities for choice-making in other school or community settings? Also, how might interventions to increase administrative and general educator support for SD influence students' opportunities to act self-determined throughout the school?

The emerging literature provides an important foundation for promoting self-determination for students with disabilities in current school contexts. The research illustrates most clearly how to teach choice-making to individuals with moderate and severe disabilities and self-advocacy to individuals with learning disabilities or mild mental retardation. In contrast, much more research is needed to:

- (1) *Demonstrate self-determination can be taught.* The current literature demonstrates that a few self-determination skills can be taught to a subset of individuals with disabilities. We do not yet have information on how to teach more complex self-determination skills (e.g., self-advocacy, goal attainment) to individuals with severe disabilities. We have minimal information on how to individualize this instruction for students with sensory impairments, autism, or emotional disturbance. We have no examples of how to plan and implement a comprehensive self-determination curriculum in which students progress across grade levels. We have only begun to consider ways to promote self-determination through redesigning the classroom and school climate. With those interventions and populations that we currently know less about working with, we also need to know more specifics about best intervention practices. For example, are there benefits of providing instruction over a series of sessions vs. several longer ones, or providing interventions that target the individual or the support system?
- (2) *Demonstrate self-determination can be learned.* We have strong evidence that individuals with mental retardation can learn to make choices and solve problems (single subject literature). We have more modest evidence that individuals with mild mental retardation and learning disabilities can learn to self-advocate (group literature). We have only a small amount of information about children acquiring self-determination skills and this is limited to choice-making. In the growing popularity of the concept of self-determination that is reflected in both the expanding literature and development of curricula, it is essential to demonstrate that students can master and use these skills. In the absence of such demonstrations, self-determination may become no more than a professional buzzword.

- (3) *Demonstrate self-determination makes a difference in the lives of individuals with disabilities.* Only a small number of studies (13%) have included any measures of outcomes of self-determination interventions in the lives of participants such as new opportunities for school, employment or leisure activities. To return to one of the earliest definitions of self-determination, Deci (1975) described a “life filled with rising expectations, dignity, responsibility, and opportunity.” The risks exist of teaching students a few skills such as choosing between two food items or stating goals at an IEP meeting and missing the “big picture” of the expanding life opportunities. Future research needs to include outcome indicators to determine how specific interventions influence the quality of the lives of people with disabilities.

The exemplar site case studies offer a range of effective strategies, as well as recommendations to other schools that may be planning to implement self-determination interventions:

- (1) *Begin earlier.* Self-determination within the educational context originated in the transition movement for students ages 14-21. Most of the exemplar sites continue to work with students in that age range in order to prepare them for adult life. However, repeated recommendations from educators, parents, and program graduates included the suggestion that self-determination instruction begin before high school. A couple of the exemplar sites work with students in middle school and even upper elementary grades on developing self-awareness and goal setting. However, site participants suggested that more systematic efforts could begin at even younger ages. This recommendation is consistent with published recommendations for self-determination instruction (Sands & Wehmeyer, 1996).
- (2) *Parents and teachers need to agree about the course of self-determination instruction.* While parents may be willing to leave day-to-day self-determination instructional decisions to teachers, it is important that parents and teachers have general agreement about topics of student decision-making, consequences, and the level of risk that is acceptable for students.
- (3) *Teachers continue to need opportunities to learn how to effectively promote self-determination for their students.* As mentioned above, one commonality among the exemplar sites was the presence of an “impetus person” who had a leadership role in implementing self-determination practices and creating an environment that supported self-determined students in their district. While each impetus person played a significant role in his or her district, the fact that the leadership base was not very broad speaks to the fragility of the system. Without the presence of the impetus person, it is uncertain what might happen to the existing self-determination instruction. To broaden the base of self-determination knowledge and practice, it will be important to include self-determination in all levels of personnel preparation programs, including preservice and inservice for special educators and general educators. Administrators should also receive training about self-determination so they are able to support the efforts of their teachers.

### Dissemination

Dissemination of the SDSP findings and products began within six months of the beginning of the project and continues at the date of this report (December, 2001). To date, six

manuscripts have been published or accepted for publication in peer-reviewed journals. One more practitioner-oriented article has been submitted for publication, and one more manuscript is in preparation with anticipated submission by February 1, 2001. Also, 13 presentations on the SDSP have been conducted at national conferences such as the Association for Persons with Severe Handicaps (TASH), Council for Exceptional Children (CEC), and the CEC Division on Career Development and Transition (DCDT). Two more presentations will be conducted, one at the CEC convention in April, 2002 and one at the NC Association for Behavior Analysis in February, 2002. Copies of published articles, in press manuscripts, and an example presentation are included in Appendix B.

Guest lectures and half-day workshops have also been conducted with practitioners, including teachers in two North Carolina school districts, graduate students in a transition certificate program at UNC Charlotte, and teachers employed by the North Carolina Department of Corrections, Division of Prisons. A complete list of dissemination products is included in Appendix C.

A project web site (<http://www.uncc.edu/sdsp>) contains a summary of project objectives as well as a number of practitioner-oriented products (e.g., a comprehensive database of more than 800 SD-related materials, a list of SD curricula, research-to-practice lesson plans, descriptions of the programs at the exemplar sites, and a list of manuscripts and articles from the SDSP). This site has logged more than 2,300 hits since March 1998. Because several articles about the SDSP refer the reader to the project web site for more information, project products will continue to be made available on the site indefinitely. This Bobby-approved web site will continue to be the primary vehicle for dissemination. A link to the Project Co-Director's email address and a phone number and mailing address are available on the web site for individuals seeking additional information. Copies of this final performance report will also be sent to the National Transition Alliance and the ERIC Clearinghouse on Disabilities and Gifted Education, where they will be made available upon request.

#### Project evaluation

Evaluation of the SDSP consisted of a comparison of actual implementation to planned implementation in order to determine if discrepancies existed, why they existed, and what was done to address any discrepancies. An implementation timeline (Appendix D) provides a summary of intended objectives and actual progress through September, 2001.

#### **IV. Conclusions**

The major finding of the SDSP is that there is still much more to be done. In some ways it may have been premature to conduct a synthesis of what works, since only 51 studies were found. However, the vast number of other published materials made it seem like it was time. What this synthesis should do is provide an impetus for more intense, future research on the areas described earlier (e.g., longitudinal demonstration of teaching, learning, and impact on lives).

Another important lesson learned from the SDSP is that in order to understand the complete picture of existing resources and what works in promoting self-determination, one cannot simply look at the peer-reviewed intervention literature. Information about effectiveness of interventions exists in other places (e.g., field test results in curriculum manuals that are not published, unpublished dissertations). Our project collected information from monographs,

videos, curricula, project reports, presentations, and dissertations. While none of these were included in the meta-analysis, they provided an important context for both the literature review and the case studies. Also, having a list of these resources available on the web site may be one of the most effective ways to move the project findings into practice. Email requests for information from the project coordinator during the past three years have focused on self-determination assessment instruments, curricula, lesson plans, and articles about specific aspects of self-determination. The web site, which contains information about these issues, provides a unique resource that may be more accessible to practitioners than search engines that are often available only through university libraries.

A final lesson of the SDSP is that two years is an insufficient period of time to conduct an intensive case study of six exemplar sites. While the original proposal specified four exemplar sites, the fact that two geographic locations each had two very different (and very successful) programs meant that we were not going to bypass the opportunity to collect data from additional sites. While 190 hours were spent in the field collecting data, a tremendous amount of additional time was spent managing, coding, analyzing, and synthesizing the data from the exemplar sites. Because qualitative studies are very staff intensive, one recommendation for future OSEP projects is that reviewers carefully consider the personnel commitments specified in grant proposals to insure that they are consistent with the amount of work that will be required for a rigorous qualitative study.

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## **Appendices**

- A List of Project Advisory Committee members
- B Articles, in press manuscripts, and a sample presentation
- C Summary of dissemination activities
- D Implementation timeline