

# **Strategies for Success**

## **Research Results**

June 2003

**LITERACYWORKS Inc.**



EACH ONE TEACH ONE

*25 years helping adults and youth  
with reading and writing  
1978 - 2003*



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**Conducted by:**

**LITERACYWORKS Inc.**

**Cheryl Nicholson  
Shirley Stone  
Lorraine Kaczor**

**With thanks to the National Literacy Secretariat for their  
financial support**

“If all literacy programs had training in helping people with LD, our programs would have an even greater impact.”

“We are very pleased that this huge gap in services is being identified and addressed.”

“The need to assist literacy programs is great. As practitioners we need tools to help adult learners participate more meaningfully.”

- Manitoba Literacy Practitioners

## RESEARCHER'S NOTE

I would like to thank Shirley Stone and Lorraine Kaczor, of *LITERACYWORKS*, for giving me the opportunity to work with them on this research project. The task was straightforward from the onset, as the research proposal they had developed was concise. The clarity of their proposal took any potential confusion out of the survey questionnaire development, which can be a difficult task if the research objectives are not clearly defined.

I have appreciated the opportunity to work on this project, as learning disabilities is an area of both personal and academic interest for me. I have worked during both my undergraduate and graduate studies in the area of learning disabilities, exploring the impact learning disabilities have for children and youth. Working on this project provided the occasion to work in my area of interest with others who have practical experience working with individuals affected by learning disabilities.

Working on this research endeavor has been an educational experience. I had the opportunity to attend workshops with literacy practitioners that focused on a variety of information for working with adults in the field of literacy and additional information about learning disabilities. Attending these workshops gave me the opportunity to interact with literacy practitioners, whom I quickly recognized as individuals who are passionate and creative educators that are dedicated to making a difference in the lives of the adults with whom they work.

I had an opportunity to take part as a presenter in a workshop that focused on learning disabilities and teaching strategies that Shirley Stone and Lorraine Kaczor provided to literacy practitioners, a Learning Disability Association of Manitoba representative, and a representative from the Adult Learning and Literacy branch. This was an educational experience as any of my previous presentations were limited to the academic domain among colleagues and professors with whom I have become comfortable.

I appreciate the time Shirley and Lorraine spent editing the documents developed as tools for integrating the quantitative and qualitative data for the interpretation of research findings. They provided insight into the readability of the research findings interpretation for general understanding and clarity. Their insight was appreciated and added to the quality of the ongoing document development, finding interpretations, and the final report.

I have come to know Shirley as an encyclopedia of knowledge in the area of specialized strategies based on an individual's learning strengths and weaknesses that are appropriate for the task-at-hand (reading, writing, spelling). Lorraine's editing skills bring clarity to my writing along with a softness not often found in academic report writing. Lorraine shared her artistic expertise at manipulating the many tools within the word processing software. The experience of working on this project has provided me with knowledge, personal

insights, and skills that I will bring to my academic writing experiences and my new research endeavors.

Most importantly, thank you, for giving me the opportunity to work on a project that is directing its efforts at taking research past the information gathering stage and directing the findings into the practical realm of literacy programming for adults with learning disabilities.

Finally, for introducing me to the world of adult literacy, special thanks, as I have come to hold the individuals working within this field with high regard.

Cheryl Nicholson

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## ACKNOWLEDGEMENTS

This research project, funded by the National Literacy Secretariat, was conducted by LITERACYWORKS in partnership with the Learning Disabilities Association of Manitoba (LDAM) and Literacy Partners of Manitoba (LPM). We extend our thanks to Marilyn MacKinnon of LDAM and Linda Taylor formerly of LPM for their collaboration and knowledge sharing at the onset of this project.

Our appreciation is also extended to Robin Millar, educational research consultant, for her invaluable advice, knowledge and concrete assistance with this research endeavor.

We also want to extend our thanks to Judy Baker and Barbara Wynes of the province's Adult Learning and Literacy branch for their ongoing support and encouragement to expand on our expertise and to explore the possibility of specializing in the field of learning disabilities. Their encouragement played a major part in our deciding to delve into this research.

Cheryl Nicholson, Masters Student in Sociology at the University of Manitoba, primarily conducted the research. We are especially grateful for her expertise and hard work in the development of the survey questionnaire, database, data analysis, interpretation and final report writing. Our project could not have been a success without Cheryl's participation.

Our warmest and special thanks to literacy program practitioners from 38 programs who took the time to share their unique experiences and expertise of working with adults with learning disabilities in the field of literacy. We know first-hand what it is like to drop everything to complete yet another survey. We truly appreciate your input!

This report has been prepared for distribution to all participating program practitioners. We anticipate that these research findings will promote a better understanding within the literacy community of the common struggles practitioners face when working with adults who have learning disabilities and hope it will lead to increased knowledge of the most effective resources and approaches for teaching these learners.

Shirley Stone

Lorraine Kaczor

June 27, 2003



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## EXECUTIVE SUMMARY

We often hear of the need for specific learning disability programming from other adult literacy practitioners. They express frustration with trying to effectively assist their learners with learning disabilities and the need for screening/assessment techniques and specialized learning strategies to help them.

The initial research concept and proposal were developed in the fall of 2002 with the goal to develop and test a literacy programming model between September 2003 and June 2004 that will deliver services based on the expressed needs of literacy practitioners.

Identifying and quantifying the needs of practitioners was the first step in making decisions on the development and implementation of an innovative programming approach. So, a survey was developed and distributed to most adult literacy programs in the province in the last quarter of 2002. We experienced an astounding return rate on this survey of 88%, which we believe is an indicator of how strongly practitioners feel about the need for information and supports in the area of learning disabilities.

Survey findings show that practitioners overwhelmingly agree on the services they believe would be helpful for promoting learning success among their students.

A quick summary of some of the major quantitative findings indicate:

- 100% of respondents reported a need for a diagnostic service in Manitoba
- 97% reported interest in screening/assessment training workshops
- 94% reported interest in specialized learning strategies workshops
- 91% reported learner interest in having access to short-term workshops for specialized learning strategies
- The preference of most practitioners is for flexibility in terms of the location for service delivery for all of the above, i.e. whether the service is provided at their facilities or at another location

Practitioners want to learn about: how to develop and use screening/assessment checklists, the screening/assessment process and how and where to make referrals for screening/assessments. They reported a limited number of agencies currently available for screening/assessments for learning disabilities.

*“...it would be extremely useful to be able to identify if someone has an LD”*

The researcher made telephone inquiries to these agencies to determine the type of services offered. Referrals were made either to professional psychologists for a formal assessment or for informal assessments. In all cases related to informal assessment, the researcher was either directly or indirectly referred to LITERACYWORKS.

Practitioners indicated they “need to know how to tackle these disabilities.” They need information about setting up individual strategies plans for their learners once assessment results have been obtained.

Many practitioners feel so ill-equipped, “any information would be appreciated.” Generally, they would like training in adaptive strategies and learning styles, specifically in reference to reading and writing strategies.

They would also like to have access to better resources.

*“I think being familiar with as many learning strategies as possible is helpful to all learners.”*

Overall, practitioners held positive attitudes about participating in a future pilot project that would provide services to help them better understand learning disabilities and provide them with methods for working with learners with learning disabilities. They indicated participation would provide needed access to assessment tools, result in a better diagnostic approach for identifying students with learning disabilities and lead to new resources for accommodating these students. Practitioners viewed participation to be potentially beneficial also in terms of sharing their ideas and experiences through discussions with other literacy programs.

This survey is part of a larger project called “Strategies for Success”. See “What is this project and why are we doing it?” on page 14 for information on the overall project.

Please note that all quotes in grey boxes are from Manitoba literacy practitioners unless otherwise noted.

## INTRODUCTION

This report summarizes the findings of the survey questionnaire from phase I of our “Strategies for Success” project. These findings overwhelmingly support the view that learning disabilities focused literacy programming is needed in the province.

This research focuses exclusively on the experience of working with adults with learning disabilities. It does not include learning difficulties that may be a consequence of cultural differences, second language acquisition, social disadvantage or intellectual deficiency. We have screened out these factors as they present a different type of barrier to learning.

Learning disabilities in the context of this research are processing barriers experienced by individuals with average to above-average intelligence who, despite adequate exposure to a structured educational setting, struggle to learn to read, write, spell or do mathematical calculations. Although many individuals with learning disabilities studying in literacy programs may be socially disadvantaged, this disadvantage was not the primary barrier to learning, but rather the end result because of the continuous struggle they face to learn basic literacy skills.

It is estimated that 50%-80% of students in adult basic education and literacy programs are affected by learning disabilities (National Adult Literacy and Learning Disabilities Center, 1995).

There has been little research published about adults who have learning disabilities, leaving literacy practitioners with limited information on the manifestations of learning disabilities in adults and/or the most appropriate teaching/learning approaches that promote learning success.

Literacy practitioners are not always equipped to tackle the exceptional needs of learners with learning disabilities (NALLD, 1995). Our survey results also indicated this need, as can be seen throughout this report.

Further research in this area is important for raising awareness among literacy practitioners, policy makers, researchers and adult learners about the nature of learning disabilities and their impact on the provision of literacy services.

### Who are we?

LITERACYWORKS is a non-profit, charitable, literacy organization providing adults with the opportunity to develop and improve basic reading and writing skills. This is accomplished through training volunteers as tutors and matching them with students to work together one-on-one. We are unique as the only organization in the province that exclusively provides one-on-one tutoring. We are also unique in that we provide assessments for individuals who come to us on their own or by referral. Assessments can determine whether an individual may have learning disabilities and are provided on a sliding fee scale.

LITERACYWORKS is the oldest adult literacy program in Winnipeg, if not the province, having been in operation since 1978. We are looking forward to celebrating 25 years of continuous service this fall 2003. We serve the entire Winnipeg area and our target student population is adults and youth 16 and over who have been out of school for at least a year.

Students are referred to us through: the Learn Line (a referral service operated by Literacy Partners of Manitoba), Employment and Income Assistance, the Worker's Compensation

*“Sixty percent of adults with severe literacy problems have undetected or untreated learning disabilities”*  
(NALLD Center, 1995)

Board, the province's Adult Learning and Literacy branch, the province's Adult Language Training branch, the International Centre, social service agencies, other literacy programs and adult learning centres. They also find us through the telephone directory and by word of mouth.

### What is this project and why are we doing it?

When we attended various literacy-related functions over the years, other literacy practitioners have lamented the limited resources available to enable them to effectively work with their learners with learning disabilities. Literacy practitioners at LITERACYWORKS have taken courses about learning disabilities, conducted several research projects related to learning disabilities and developed a comprehensive assessment questionnaire to screen for learning disabilities. We felt we would like to expand more on that expertise and provide additional supports to Manitoba literacy practitioners to help them in areas they either do not feel they have expertise or do not have time or funding to do themselves.

As a result, we applied to the National Literacy Secretariat for funding for this project, "Strategies for Success", to research the types of supports practitioners feel they need and to develop model programming (we have called this a "learning disabilities literacy-programming model") to provide some of these supports, if possible.

We began with this survey to identify practitioners' needs. We also looked at any existing models of learning disabilities-focused literacy programming that provides specific learning strategies as a routine part of their instruction. We thought existing models might provide a guide for us in developing the new programming model. However, we were not surprised to find that this is not a predominant model in the field. Educational models with this focus were found mostly in the private sector and were directed at children or youth, at fee-based institutions, usually secondary and post-secondary educational institutions.

The goals of the learning disabilities literacy-programming model in phase II of the project will be to provide some of the supports to literacy programs in direct response to their expressed needs, as indicated in the survey responses.

*"There is a great need for literacy programs to have this (diagnostic) service for learners. Learners will have increased success & teachers will be able to identify needs and respond well to them"*

## LITERATURE REVIEW

We have conducted an extensive review of the literacy field on a variety of topics related to learning disabilities. These can be found in Appendix A.

Topics include:

- definitions of literacy, a look at literacy in Canada, and adult basic education and literacy programs
- definitions of learning disabilities, characteristics of adults with learning disabilities, the prevalence of learning disabilities and the effect of learning disabilities and low literacy on individuals,
- assessment of learning disabilities, physical learning styles, specialized learning strategies and assistive technology

For the purposes of this survey, we assumed all practitioners in Manitoba share a common understanding of literacy based on the Stages of learning, developed by the province's Adult Learning and Literacy branch.

Also, for the purposes of this survey, we adopted the definition of learning disabilities as developed by the Learning Disabilities of Canada in 2002. See Appendix B for full definition.

## METHODOLOGY

### Sample

A survey questionnaire was developed to capture the experience of practitioners in working with adult learners with learning disabilities. The goal of this research was to capture practitioner opinions on a number of issues. These included opinions on the need for access to diagnostic/screening assessments for learning disabilities, resources and learning strategies being used to assist these learners and the type of training practitioners think is required to help them help their learners with learning disabilities.

The target sample of this survey was adult literacy programs within the province of Manitoba. These programs included both community based literacy programs and literacy

programs within correctional institutions in the province. The sample consisted of 43 programs. Literacy practitioners working at these programs were asked to complete the survey. The Directory of Adult Learning Centres and Literacy Programs in Manitoba (fall 2003) was used to identify the programs and the practitioners working in each program.

The survey was mailed to each identified practitioner for completion and consisted of 66 mixed closed and open-ended questions.

- N=43
- 38/43 surveys were returned resulting in an 88% return rate
- Of these programs 36 are based in the community and 7 within correctional institutions
- The return rate for community based literacy programs was 32/36 or 88%
- The return rate for literacy programs based in correctional institutions was 6/7 or 85%

### Data Collection

A database was developed using the SPSS statistical analysis program for the quantitative data collected in the closed-ended survey questions. The data was entered into a database and frequency tables were run to determine the overall percentage response rates for each question.

The qualitative data collected in the open-ended survey questions was organized into common response themes for each question. The qualitative data report will highlight these themes that emerged from the aggregate responses. The qualitative data will be used to substantiate and clarify the quantitative findings.

See Appendix C for Cover Letter, Appendix D for Consent Form and Appendix E for Survey Questionnaire.

## **FINDINGS**

Practitioners reported unanimously that they had learners with learning disabilities in their programs. It became apparent that a general difficulty existed for practitioners to estimate how many learners experienced learning difficulties specifically due to an underlying learning disability. This was evident in the numerous side notes that practitioners wrote beside this closed ended question that asked for their estimates.

The question, “Have you had learners with either diagnosed or undiagnosed learning disabilities in your program?” was framed so those estimates of learning disabilities could be obtained in two ways. Firstly, overall estimates of learners with learning disabilities were obtained for each program. Secondly, estimates of specific learning disability typologies were obtained for each program. The specific learning disability estimates focus on five common conditions that potentially affect an individual’s abilities to learn reading, writing, spelling and math skills. The five common conditions that potentially affect learning, outlined in the survey were learning disability exclusively, attention deficit disorder, attention deficit hyperactive disorder (as these two conditions often occur comorbid with learning disabilities), fetal alcohol syndrome and intellectual disability.

The overall estimates of learners with learning disabilities are reported as follows:

- 97% of practitioners reported they had learners with learning disabilities in their program. Of these:
- 32% reported they had 1-5 learners with some form of learning disability
- 23% reported they had 6-10 learners with some form of learning disability
- 16% reported they had 11+ learners with some form of learning disability
- 29% reported difficulty estimating the number of learners with learning disabilities

## DIAGNOSTIC

Information obtained in this section focused on determining if diagnostic materials are in use for screening/assessments for learners at risk of having learning disabilities in adult literacy programs and if so, what. In addition, we were interested in developing a better understanding of how programs identify students with learning disabilities, if learners identified themselves and if this information is based on previous screening/assessments for learning disabilities. The purpose of gathering this information was to help determine the need for literacy programming that could take referrals for assessments of learning disabilities and/or provide training for literacy practitioners in the screening/assessment process. We were also interested in determining practitioners’ preferences about how an outside agency could be accessed to best meet their needs, if made available.

Findings in this section showed that:

- The majority of programs (73%) identify learners with learning disabilities
- 27% do not

- 73% of respondents indicated their learners identify themselves as having learning disabilities
- 27% do not

We wanted to determine how literacy programs screen and assess students for learning disabilities. We asked, “Does your program use a screening tool to identify students with learning disabilities?”

- 81% do not

Since 81% of practitioners reported not using a screening/assessment tool yet 73% of practitioners say their programs do identify learners with learning disabilities; the question is, therefore, raised of how students with learning disabilities are identified within programs. This unexpected result shows a huge need in the Manitoba literacy community for effective methods to screen their students for learning disabilities.

It is reported by LDAC (2001) that often adults with learning disabilities are not aware of this difficulty before they enroll in a literacy or adult education program. Seventy-three percent of practitioners indicated that learners self identify as having a learning disability and of these, 94% indicated that these individuals’ reports are based on previous screening/assessments. However, it is important to stress that only 42% of the sample indicated either “yes” or “no” and another 32% indicated they “don’t know” whether students who self identify having a learning disability are doing so based on previous screening/assessments. It also should be noted that this question was not applicable to 24% of respondents because they stated that students in their program do not self identify as having a learning disability.

These findings help identify the difficulty practitioners have making estimates about the proportion of learners in their program that have learning disabilities. They also lend support for the need for effective screening/assessment methods for learning disabilities. The above findings are difficult to make causal assumptions about and would warrant further investigation.

However, practitioner comments captured in the qualitative data highlight some informal methods that they use to identify students with learning disabilities. These informal methods were usually based on observation and demonstrated varied levels of training to identify learning disabilities. One program used a “diagnosis made through informal means (watching students work and asking questions of students), matching student information to information from library, internet”. Another watched for “some common signs and characteristic awareness such as poor or uneven academic achievement, difficulty with language usage, poor organizational skills and or sequencing skills.” Yet, another mentioned “if I see an individual can’t focus or is easily distracted, I’ll put him in another room.”

We also wanted to know if the screening/assessment tools that are being used had been developed in-house. The findings suggest that most were, as 14% of the respondents (19% who reported using a screening/assessment tool indicated it was developed in-house.

We asked practitioners if they would be interested in developing an in-house screening/assessment tool.

- 79% of respondents showed interest for developing such a tool

The percentage of practitioners that showed interest in developing an in-house screening/assessment tool (79%) corresponds well with the 81% of practitioners that stated they did not currently use one. Only one program that does not currently use a tool is also not interested in using one.

Practitioners were asked if they would like outside assistance to develop a screening/assessment tool.

- 84% indicated they would

The remaining 16% is consistent with the proportion of practitioners (19%) that reported their program currently had a screening/assessment tool in use.

It is interesting to note that although 14% of practitioners currently use an in-house screening tool, 97% of practitioners indicate they would also like to have a checklist that identify students at risk of having a learning disability.

Practitioners were asked if a diagnostic screening/assessment service is needed in the Province of Manitoba. The response was virtually unanimous, as 100% of those who responded reported such a need with only one practitioner not responding to the question.

The degree that responses complement each other across various questions in this section validates practitioner responses. The other possible responses such as “don’t know”, “not applicable” or “no response” were so low for all the questions in this section, other than those specified, that they were not significant.

We also wanted to determine how many programs have referred students to other services for screening/assessments. The findings show that only 40% of programs have. The high percentage of programs that do not refer students to other services (60%) may be indicative of the limited services available within the province. It is important to recognize that screening/assessments tend to be costly within the private practice sector (\$600-\$1200) and wait times for screening/assessment using regional hospital psychological services are lengthy. When asked if learners have gone on their own for screening/assessment, only 31% of practitioners indicated they had (69% had not).

We also asked practitioners if they would make referrals to a diagnostic service outside of their program if one were available to them. Practitioners were positive about potentially making use of such a service, as 94% indicated they would make referrals for this purpose.

Practitioners were asked to list the referral agencies they direct students to for learning disability screenings/assessments. Practitioners provided a limited number of agencies available for screening/assessments, including: the Society for Manitoba with Disabilities, Provincial Building Public Health, Education and Employment Preparation Services and the Adult Learning and Literacy Branch of the Province's Advanced Education and Training.

The researcher made telephone inquiries to these agencies to determine the type of services offered. In most cases, the result was the researcher was given another agency to contact before being directed to either LITERACYWORKS or The Learning Disabilities Association of Manitoba (LDAM). The LDAM does not provide a screening/assessment service; therefore, individuals contacting them or any of the other agencies listed above are ultimately directed to LITERACYWORKS.

This question was not applicable to a little over half (60%) of respondents because they reported they do not refer students out for screening/assessments in a previous question.

We asked practitioners if they would make referrals to a diagnostic service outside of their program if one were available to them.

- 94% indicated they would make referrals for this purpose

## SUPPORTS AND LEARNING STRATEGIES

There are a number of specialized learning strategies that help promote learning success when teaching individuals with learning disabilities. The purpose of this section of the survey was to determine what strategies practitioners use and if they were interested in learning more about specialized learning strategies for students with learning disabilities.

These strategies range from giving extra time to complete tasks, one-on-one tutoring, curriculum adaptations, use of various technical supports and teaching/learning strategies compatible with learning styles and individual learning strengths.

We asked practitioners, "Do you have experience instructing individuals that exhibit the characteristics associated with having a learning disability?"

- 78% of respondents indicated they have experience instructing students with learning disabilities

Qualitative information obtained in the survey describes the various experiences practitioners have instructing students with learning disabilities. The predominant themes

that emerged from the qualitative data reflect both negative and positive aspects of having learners with learning disabilities in their programs. Practitioners highlighted the supports required by the students, teaching strategies, programming considerations, time considerations and practitioners' concerns related to incorporating these adjustments into the classroom environment.

Practitioners commented on programming and instructional adjustments needed for these students. Practitioners said teaching the student with learning disabilities “requires attention to learning styles and use of a variety of techniques and assessment tools” and “often aids are needed.” “Learning disabilities students take more instruction time than other students,” “more individualized instruction” and/or “extra time to accommodate learning.” “Often separate programming is required”, there is a “need for instructional repetition” or “these students require shorter assignments with task breakdown”. One practitioner remarked: “It slows down the class as a whole.”

The central concerns practitioners have about the necessary adaptive approaches described above refer to extra practitioner energy and time required, the allocation of tutor resources and staffing limitations.

- Extra practitioner energy and time required  
“Because of the need for more individualized attention we need more coordination time on the part of the teacher and the coordinator. extra time preparing lessons”, “requires extra energy”, “teacher can only give so much time in a multi-level classroom” and “manpower is the key”
- Allocation of tutor resources  
“affects allocation of tutor time”
- Staffing limitations  
“instructor spends a disproportionate amount of time helping these students” and “extra planning and instruction time would be easier with more staff”

Practitioners expressed concerns for both students with learning disabilities and those without learning disabilities in the classroom setting. Practitioners were concerned about the emotional needs of students with learning disabilities. Issues identified were “sensitivity to laughter”, “internalizing negative feelings associated with having a learning disability”, “bursts of anger” or “crying” because of their difficulty learning. The rest of the class “are not sure how to react to acquired behaviors of learning disabilities students, interpreting, wanting to be the first”. A practitioner expressed concern their “learners without learning disabilities get less attention”.

Some practitioners (24%) indicated having learners with learning disabilities does not affect the classroom environment. They commented on a variety of approaches that appear to create an environment successful for multi-level learning.

- “We make an effort to use a variety of learning technologies therefore, it doesn't affect the overall class instruction”
- “Students work at own pace”

- “All students work at their own individualized program”
- “Our program provides one to one instruction specifically developed for individual learners”
- “Groups small and large interaction, one-on-one tutoring, peer tutoring and individualized instructional activities”
- “On the positive side students feel comfortable with each other when they see there are others who might face the same challenges”
- “The group is always patient and supportive of these individuals”
- “Very rewarding when progress is made”

### Special Support

We asked if programs were able to provide extra help to students and who it is that gives students this extra help.

- 95% of programs are able to provide some amount of one-on-one help
- 32% reported volunteers as the exclusive source of one-on-one help to learners
- Volunteers are reported as a combined source of help with: practitioners by 17% of respondents, teachers’ assistants by 5% of respondents and tutors by 8% of respondents
- Tutors are the next most common source of one-on-one help reported at a rate of 11% exclusively and in combination with volunteers by 8% as noted above.
- Practitioners reported they are the least likely to provide students with one-on-one help, as only 3.7% of respondents reported being the exclusive source of extra help and in combination with teachers assistants by 11%
- Exclusive teacher assistant one-on-one help equivalent to that of practitioners and in combination with the other persons providing one-on-one as in the reported proportions noted above

Other common accommodations used are extra task completion time (95%) and curriculum adaptations to assist students with learning difficulties (92%).

Adjustments to curriculum was another form of support mentioned, provided by way of “having students work at own pace”, “adaptation of course” or “curriculum adaptations to an extent”.

Use of technology such as “computers”, “computer assisted instruction”, “the integration of technology into instruction-web-based” and “on-line learning resources” are additional teaching approaches.

Other supports related to time, materials and instruction were much the same as previous comments about classroom experiences. Some used:

- “flexible resources/lots of class time”
- “self paced approach rather than curriculum adaptations”
- “same curriculum but need more time and various teaching strategies”
- “differential instruction-oral instruction and assessment”
- “hands on manipulation”
- “suitable materials and practical reading situations”
- “experience of working with these students has shown that learners with learning disabilities need more task reminders and prompts to focus on the issues”

Practitioners addressed the emotional supports learners required because of their learning difficulties. Practitioners must give “a lot of encouragement and self-esteem building” or provide “demystification of learning problems.” Practitioners were sometimes “...counseling with families and individuals regarding their personal problems or providing “consultations with learners about learning and coping strategies”, “parent training and support” or even providing “emergency transportation”.

## VIEWED LIMITATIONS

Comments that touched on the limitations of students with learning disabilities and educational or literacy programming in the province were reflected in these statements:

- “The availability for accommodation for LD individuals wanting to write the G.E.D., as it stands permission for accommodation must be obtained through Washington”
- “Adult learners should be aware of their difficulties and have some idea of how to deal with them”
- “Presently LD students are frustrated and disillusioned-they do not know how or where to go for help”
- “Limitations experienced by students with LD’s raises the need for active lobbying of government and recognition of the definition in legislation”

Practitioners indicated other supports their programs provide in a limited way in addition to those listed above; these comments clarify how supports were provided and draw attention to the creativity practitioners use to promote learning success. Programs incorporate “extra tutoring whenever possible”, “matching learner to appropriate tutor” or “peer tutoring”. Limitations pertaining to the provision of tutors were expressed. “We have one tutor split

between two classes” and “we provide a tutor to a limited extent.” Another limitation expressed was “we are able to provide these supports on a restricted basis, in that if we put too much into these supports we also hurt the overall viability of the program.”

Other commonly held views are reflected in the following statements:

- “We would like to be able to use computer software targeted for people with learning disabilities”
- “It would be good if we had strategies that integrated computers and tutorials to help teach disabled students to be more independent.”
- It was also clear practitioners would like “More content appropriate reading material” and “strategies for reading (dyslexia).”

Practitioners are well aware of what supports and materials are needed in the field to promote learning success. Practitioners expressed these needs before being prompted for the information in later sections of the survey.

### Specialized Learning Strategies

Forty-two percent of program practitioner’s use specialized learning strategies to accommodate learners with learning disabilities. Practitioners use multiple strategies, including some combination of strategies in reading, writing, etc. Of those who reported using some form of specialized learning strategies:

- 37% use strategies to promote reading
- 34% use writing strategies
- 32% use strategies for spelling
- 34% use strategies for math
- 26% use strategies for developing organizational skills
- 8% use specialized learning strategies in other areas

Practitioners were asked to comment on other specialized learning strategies being used. A number of themes emerged that touched on teaching to learners strengths, multi-modal strategies, use of technology, adapted resource materials, learning environment considerations and organizational skill development. Their comments make transparent the creative approaches taken by practitioners in teaching adult learners with learning difficulties.

Teaching to an individual learner’s strength using preferred learning style is one form of specialized learning strategy mentioned by practitioners. One practitioner stated “our strategies are individually based on learning style” and another mentioned they incorporate “activities that represent a variety of learning styles.”

Other approaches that tackle the learning difficulty through developing student strengths that a practitioner mentioned were “phonemic awareness training and writing strategies.” Other forms of specialized learning strategies practitioners identified were use of multi-modal

strategies, specialized reading strategies and materials such as hands on learning, use of metacognitive strategies, visualization, subvocalizing, mnemonics and other memory aids, reading assisted activities and use of appropriate materials.

Use of technological devices was cited as a means of supporting learners such as electronic devices such as “electronic dictionaries” and “tape recorders.”

Specific organizational skills, life skill development and environmental adaptations were mentioned such as the use of checklists, structured routines, teaching of prioritization skills and the setting of realistic goals. Fostering an inclusive learning environment was also mentioned along with provisions for alternative testing arrangements, setting environments so that distractions are minimized and asking learners what accommodations they need to promote learning success.

Practitioners were asked to list the types of specialized learning strategies their program would like to be able to provide for learners with learning disabilities. The majority of practitioners commented on the need for more information about strategies to promote successful learning among students.

Some practitioners experienced some confusion about how to apply specialized learning strategies and said things like “I try out different resources but sometimes I’m still not sure if they are the right ones” and “as a practitioner, I am able to use some strategies in each subject however they are limited”. Another uses an “informal trial and error approach.” Still another practitioner stated, “I’m not sure what is meant by specialized learning strategies.”

In addition to strategies, themes that emerged related to greater awareness of how to access particular resources. Practitioners also indicated their need for better knowledge or learning material resources and technology.

“We need to know how to tackle these disabilities.” They need to be “more informed about the strategies available”, to “have access to new strategies and research on remedial techniques”, “more help with making strategies individualized”, “better resources”, “activities that would not ostracize individuals”, “specific strategies for teaching reading, writing and math”, “reading, writing and math resources” “training for our tutors to better able to help our learners with learning disabilities”.

Perhaps the need could best be summarized with one practitioner’s comment, “any information would be appreciated.”

Other comments show the interest practitioners have for increasing their personal knowledge base. “I think being familiar with as many learning strategies as possible is helpful to all learners.” Several of the comments revealed practitioners feel they have an inadequate knowledge of what specialized learning strategies are and/or how to acquire them.

- “Not even sure of what is accessible in terms of specialized learning strategies”
- “First I need to know what the strategies are before I can list them”
- “not aware of what learning strategies there are, would very much like to have more information”

We asked practitioners if learners with learning disabilities in their programs would be interested in short term workshops to develop specialized learning strategies if these were available. We also asked if there is a need for a service that distributes information about specialized learning strategies.

- 91% thought students would be interested in taking part in workshops
- 91% stated they would refer students to workshops
- 97% indicated a need for the service

## ASSISTIVE TECHNOLOGY

Assistive technology is a way of building on the strengths of individuals with learning disabilities rather than having an exclusive focus on learning weaknesses. It often is also a way of bypassing individuals’ learning weaknesses associated with their learning disabilities. We were interested in determining what forms of assistive technology are currently being used throughout the province and if practitioners are interested in learning more about available assistive technologies.

We asked practitioners if they currently use assistive technology within their programs and, if so, what types of technologies are being used.

- 51% reported using assistive technology, while 49% do not

Of those practitioners who reported using assistive technology:

- 24% record lessons on tapes
- 55% use computers
- 11% use electronic dictionaries
- 21% use particular software programs
- 31% use taped books
- 8% use other forms of assistive technology

Practitioners were asked to list the additional assistive technologies not listed in the closed-ended question on technological devices. Practitioners mentioned low technology items

such as sticky notes, chart systems, calendars, check list day planner, graph paper, organized lists and steps to follow.

Practitioners noted that they found a range of computer software programs. Items mentioned consisted of computers with good word processors, language and math programs, such as “Success Maker Software” and the “Columbia Curriculum Corporation Computer Program for Reading and Math.”

We also wanted to know the level of interest for learning more about available assistive technologies.

- 68% of respondents stated interest in learning more in this area

## TRAINING

The purpose of this section was to determine what type of training practitioners believe would be helpful for assisting adults with learning disabilities to successfully complete their learning goals. We felt practitioners would have a clear vision of the type of training that would be most beneficial for themselves, tutors and learners to promote successful learning experiences.

### Recognition and Screening

We asked practitioners if they or their tutors had received training to recognize learners with learning disabilities.

- 61% of practitioners and 29% of tutors had received training in this area
- 39% of practitioners and 71% of tutors had not

Practitioners were asked about the types of screening/assessment training anyone in their program has previously received for screening/assessment of learning disabilities. Previous formal training in this area was limited to 3 of 38, or 7%, of respondents. Two of these respondents indicated university training and the other reported completing a special education degree and formal diagnostic training in administration of the Woodcock Johnson standardized test for identifying learning disabilities.

Workshops were the most common source of information about learning disabilities and how to recognize students at risk for learning disabilities. The highest proportion of practitioners mentioned the Screening for Success workshop offered by the Learning

Disabilities Association Manitoba. This workshop was offered just prior to the distribution of our survey. The next most commonly mentioned workshop identified was First Nations Students with FAS/FAE, however the respondents indicated, “this workshop skimmed over some assessment and (covered) strategies to a limited degree”. A few practitioners referred to a workshop sponsored by Adult Learning and Literacy called Learning Differently-An Introduction to Learning Disabilities and Adult Literacy.

A number of practitioners mention they had not received any training in this area and expressed a need to know more about the screening/assessment process.

We also wanted to know if practitioners and tutors had received training for using screening/assessment tools.

- 29% of practitioners and 15% of tutors had received some training in the use of screening assessment tools
- 71% of practitioners and 85% of tutors had not

We were interested in determining the level of interest in receiving training in screening/assessment for learning disabilities.

- 97% of practitioners reported interest in this type of training
- 82% suggested tutors would be interested

The reported need for training in this area is consistent with the response patterns found in the diagnostic section that showed a high proportion of programs identify learners with learning disabilities, yet only 19% of respondents reported making use of a screening assessment tool of any kind.

This discrepancy and the previously reported low occurrence of referring students out for screening/assessments also corroborates our assumption that most identification of learning disabilities is made informally, rooted in practitioner experience of working with adults in the literacy field. It seems that experience is more often the teacher for literacy practitioners than formal training. Practitioners themselves, however, recognize this gap in their knowledge base and express the desire to learn more about screening and assessment.

Practitioners were asked to list the types of further training they or tutors in their program would like to receive regarding screening/assessment for learning disabilities. Practitioners stated, “I think it would be extremely useful to be able to identify if someone has a (learning disability)”, more information about referral resources available was also mentioned “how to make referrals and where to make referrals to.” Responses to this question ran the gamut of important issues associated with learning disabilities. Practitioners stressed interest in understanding how and where to make referrals for student screening/assessments, how to develop and use screening/assessment checklists and information about types of learning disabilities. It was also found that some practitioners were not familiar with the types of training available for understanding the screening/assessment process itself and indicated any type of training would be beneficial.

The type of further training practitioners and tutors would like to receive relates to the development of screening/assessment checklists and better knowledge about the types of learning disabilities. Practitioners want screening/assessment tools such as “quick checklist assessment on all learning functional disabilities”. They also expressed interest in “options for practitioners and learners once screening and assessment is complete”, along with better knowledge of the “types of learning disabilities and specific teaching approaches” and “how to interview students in learning issues.”

### Specialized Learning Strategies

We were interested in determining the amount of training practitioners and tutors had in the area of specialized learning strategies for teaching students with learning disabilities.

- 74% of practitioners had not received training in this area
- 85% of the tutors did not have training in this area

It can be assumed from practitioner comments that the lack of training in specialized learning strategies is not because of a lack of interest, but rather a shortage of available training. A high ratio of practitioners report interest in this type of training for practitioners (94%), tutors (93%) and students (91%).

As can be seen from the statistics, few practitioners (27%) and even fewer tutors (15%) have been trained to use specialized learning strategies. This is reinforced in the comments made by practitioners collected in the qualitative data.

Practitioners were asked about the types of training in specialized learning strategies anyone in their programs had received. A few practitioners mentioned having previous training that aided in the recognition of the common manifestations of learning disabilities such as the “Canadian Adult Reading Assessment (CARA).” “Behr-reading recovery strategies” and “training in working with multi-level groups.”

Practitioners were asked to list the types of further training they or their tutors would be interested in receiving in the area of specialized learning strategies. Again, responses ran the gamut of related concerns for promoting learning success for students with learning disabilities. The predominant responses made reference to wanting strategies for specific areas of learning. They also want to develop a better understanding of learning styles and teaching techniques. A proportion of practitioners (37%) mentioned the need to become familiar with the various types of strategies and expressed interest in any type of training in this area that would be available. Practitioners stated they are interested in learning about:

- “Types of learning disabilities and teaching approaches to use”
- “Learning styles and how they effect learning”
- “Strategies, methods, resources to provide learners with disabilities individualized specialized instruction to meet needs and facilitate learner goals”
- “Ways to facilitate the learner’s progress in learning, coping and developing a positive self-image”

- “Specific strategies for: visual learning disabilities, auditory learning disabilities, conceptual learning disabilities”
- “Reading, spelling, writing, math and organizational skill development”

Uncertainty about the type of training available was reflected in a number of practitioners’ comments:

- “I first need to know the strategies available before I can list them”
- “not familiar with further training types”
- “what is available?”
- “Any thing would be of interest”
- “need to know as much as we can”
- “any training would be helpful.”

If this training was made available, the preference of most practitioners is for flexibility in terms of the location; for the ability to choose whether to have service delivery on or off their program site as indicated by 67% of respondents.

In addition, 22% preferred off-site delivery of workshops exclusively and 11% preferred workshops to be delivered exclusively at their literacy program site.

### Learner Workshops

Practitioners were asked if they would be interested in a service that provides short-term workshops for learners with learning disabilities for assistance in developing specialized learning strategies. Ninety-one percent of practitioners were supportive of students having access to this type of service.

The preference of most practitioners (56%) is for flexibility in terms of the delivery location for this service. Thirty-eight percent preferred workshops to be delivered exclusively at their literacy program sites and 6% preferred off-site delivery of workshops exclusively.

Practitioners show a greater interest for workshop delivery directed to learners at their site than for workshops directed to practitioners and/or tutors. This difference in preference for learner workshops at their site is likely viewed as better suited for accommodating students.

## WORKING TOGETHER TO PROMOTE LITERACY

The purpose of this section of the survey was to determine the degree of interest literacy practitioners had in participating in a potential future pilot project to be developed out of results from the initial research project. Overall, practitioners held positive attitudes about participating in a pilot project that provided services for better understanding of learning disabilities and methods for working with learners with learning disabilities.

Practitioners were asked if they would be interested in taking part in a pilot project. Interest in participating in this type of pilot project was high at 74%.

Although 26% stated they would not be interested, the qualitative information brought forward their concerns regarding participating in such a project. Practitioners listed reasons like “I would like to participate but I am literally swamped with work already” and “we don’t have the time or the staff to do a great deal.” They suggested things that might help them fit it in, like “if there was funding offered to pilot the project” and it “must be reasonably easy to integrate into our program”.

Practitioners were asked under what conditions they would be interested in taking part in a pilot project. A number of practitioners mentioned the importance of having flexibility in terms of how (“if the trainer were to come to the region (ideally) and teach the practitioners” or to “come to the center and work with students” and where (“flexibility of location”) this project participation would occur) and that further discussion with staff and/or instructors would be needed prior to participating. The importance of “flexibility of time” was also a consideration practitioners mentioned.

Practitioners were asked what they viewed the potential benefits of this participation to be. These fell into three themes: for programs, practitioners and students.

Program benefits raised by practitioners were:

- “Our teachers would be better resources and therefore better able to identify and program plan for LD students”
- “We would be able to help an support anyone who came through the doors to be able to learn, increase their literacy level and they would feel successful”
- “Participation might result in knowledge of better teaching strategies leading to more effective programming for practitioners”
- “More relevant and higher quality programming”
- “More efficient use of instructor time”
- “Our practitioners, tutors and students would all have knowledge of how to work on learners with LD’s”

Practitioners suggested potential personal benefits, such as:

- “It should give us a better chance to help students with disabilities to move ahead, experience measurable success and set new, teachable goals”
- “Better understanding of both the learners underlying learning difficulty and knowledge of specialized learning strategies that build on learner strengths and facilitate learner needs”
- “Increased expertise and helping abilities”
- “Better teacher ability to identify and program plan for learners with learning disabilities”
- “Would enable practitioners to help a greater number of students”
- “It would allow us to better help learners who may be struggling because their LD have gone unrecognized”

Practitioners suggested a number of potential positive effects for learners:

- “The shared knowledge would potentially increase the pace of learning among learners with learning disabilities and decrease learner frustration”
- “Better coping strategies for learners that would increase their self-esteem”
- “The potential of helping adult learners with learning disabilities to become more successful in their learning and life”
- “More efficient use of learner time”

Practitioners commented on other potential benefits to participating in a pilot project that relate to availability of new services and tools that help identify learners with learning disabilities, the importance of sharing information and better knowledge of the necessary resources or methods for accommodating these learners.

Practitioners commented on the potential for participation to “lead to new resources for accommodating these students” and “better resources, strategies and materials.” One practitioner thought participating would contribute to a “feeling of support/community for staff.” Others thought “participation would result in a better diagnostic approach for identifying students with learning disabilities” and would, “provide access to assessment tools”.

*“If I had more information about teaching strategies and learning disability assessments, I believe student success rates would double”*

We asked practitioners if there were any areas not covered in the survey relating to learning disabilities that could help their program. Practitioners mentioned other themes not covered in the survey, like:

- “prevent(ative) literacy programs for children and adolescents”, “how to help learners with learning disabilities beyond the classroom into the workplace such as employment skills training for learners with learning disabilities” and “the need to provide workshops for French literacy programs in French”.

Overall, practitioners felt that the survey covered the relevant areas on the topic of the needs of the literacy community pertaining to learners with learning disabilities and that the survey was looking at important concerns and limitations of literacy programming in the province. This becomes evident in these comments:

- “I feel you have hit on a very important aspect of programming”
- “We were happy to see this survey because support is needed in these areas”
- “We were very pleased that this huge gap in services is being identified and addressed”

We also asked for general comments about literacy programming issues for individuals with learning disabilities in Manitoba. Comments referred to areas previously addressed in the survey, such as the importance of access to diagnostic services and learning disabilities-related teaching strategies.

These comments reflect practitioner views of the importance of knowledge of learning disabilities:

“The need to assist literacy program is great. We do see individuals more so who have struggled in the system – this in turn impacts on workplace. As practitioners, we need tools to help adult learners participate more meaningfully.”

and

“Programs like ours are really not well equipped – resource-wise, materials, people, etc., to realistically provide the significant level of help necessary to meet the needs of those with LD.”

Practitioners also commented on the limitations for learners with learning disabilities, noted limitations of educational or literacy programming in the province and the importance of knowledge of learning disabilities and organizational coordination.

The following comments highlight the general attitudes and concerns of literacy practitioners.

Comments that linked diagnostic services and training for learning disabilities:

- “If all literacy programs had training in helping people with LD, our programs would have an even greater impact”
- “The provision of training to diagnose or possibility of having an outside resource to diagnose learning disabilities would be great”
- “Teachers would be able to identify needs and respond to them”
- “There is a great need for literacy programs to have access to this service for learners”
- “I think its definitely needed in Manitoba”

Other comments that made reference to learning disability teaching strategy training were highlighted in these statements:

- “to me, this is one of the greatest challenges for a practitioner in literacy”

- “If I had more information about teaching strategies and learning disability assessments, I believe student success rates would double.”

Substantial literacy program limitations were viewed as “the limited time spent with adult learners, which makes for slow progress” and the “task of differentiating low academic achievement due to private and cultural factors and low achievement due to learning disabilities”.

Practitioners also mentioned the “need to raise awareness of programs available for adults to help them with literacy and the workforce” and “social limitations experienced by students with learning disabilities.”

Practitioners strongly voiced the need for the availability of services and resources that would better enable them to meet the needs of this group of learners in literacy programs as much needed in the province. Practitioners held positive attitudes about having access to information on specialized learning strategy information and workshops, indicating that knowledge in this area would have positive effects for learners.

Practitioner attitudes toward this research, the specific areas it touched on and the intended goals to take this research project to the next stage, based on the findings, are that it is a positive first step in the right direction. Many commented on how this research and the future intended goals fill in some of the service delivery and support gaps for teaching students with learning disabilities in the province.

## CONCLUSION

During the first phase of this research project, we consulted with practitioners, the experts working in the field of literacy, to gather an overview of the literacy programming needs for adult learners with learning disabilities. It was found they hold similar views about what services, resources and materials are needed in the field to maximize learning success among adult learners with learning disabilities. The high degree of commitment practitioners have toward their students became very apparent, as did the abundance of creativity used within the field to improve these individuals’ literacy skills.

Practitioner responses reflect a group of individuals who are highly motivated, creative, compassionate and passionate about the service they provide in helping people improve their literacy skills. They are knowledgeable about the gaps in the services and supports available for learners. They also confront everyday the gaps in information about

screening/assessments for adults with learning disabilities and effective learning strategies. They perceive the availability of these services and supports to help adults with learning disabilities enhance learning success.

The high response rate to this survey questionnaire (88%) and the many comments made by practitioners are an indication of the needed development within the field of programming directed at adults with learning disabilities. Practitioners welcomed the idea of a pilot project that would take this research beyond the initial information-gathering stage and would actually follow through with developing programming that addressed their stated needs. All too often in the past practitioners have found that little has come of the research they provided input to.

From these research findings, *LITERACYWORKS* will develop and implement, in cooperation with other literacy programs, a learning disabilities focussed literacy programming model based on the reported needs of practitioners.

This programming model will involve equipping practitioners with the means to identify students with learning disabilities and specialized learning strategies to practitioners, tutors and their learners with learning disabilities. It will also serve to increase communication between literacy programs throughout the province, which will undoubtedly result in a more unified approach for meeting the needs of adult learners with learning disabilities.

The findings of this research project have been inspiring. They highlight gaps in knowledge about adults with learning disabilities and the diagnostic screening/assessments process. Further research endeavors into these gaps could benefit these unique learners and enhance the abilities of professionals working with these individuals to promote learning success.

## RECOMMENDATIONS

Findings of this research have resulted in the following programming recommendations in the form of a “Learning Disabilities Focused Literacy Model.” This programming is part of Phase II of Strategies for Success that will be undertaken by LITERACYWORKS commencing in the fall of 2003 if approved by the NLS.

This programming will be directed at enhancing the success of adult learners with learning disabilities in the province and should be comprised of two parts.

The first part is to incorporate into the learning disabilities focussed programming a diagnostic screening/assessment service to literacy practitioners.

The second part is to incorporate a service that will provide information about specialized learning strategies to students, practitioners and tutors.

This two-part learning disabilities focussed programming model should be tested with learners with learning disabilities from a representative sampling of adult literacy programs across the province.

Feedback from participating practitioners, tutors and other experts in the field of adult literacy, as well as adult learners themselves, should be used to steer the refinement and development of the “Learning Disabilities Focused Literacy Model.” This ongoing process of effectiveness evaluation and continuous adjustments will demonstrate that professional development in all aspects of this programming model is in progress.

The ongoing benefits to programs, practitioners and learners will be evaluated to determine if sustainability and expansion of the model would meet the needs of practitioners and learners not currently being met in the province.

The recommended programming model is well in line with recommendations made by the Manitoba Task Force on Literacy appointed by the Minister of Education, in 1988. The mandate of this Task Force was to determine the magnitude of the literacy issue among affected groups and to recommend a strategy for continuous programming in literacy to meet the needs of Manitobans.

Several of the recommendations outlined by the Task Force are addressed in the proposed model such as:

- the development of criteria for literacy programming,
- support for information exchange and networking among literacy programs to promote the development of effective literacy models,
- support for and dissemination of literacy research in Manitoba,

- support for the development and dissemination of adult literacy materials responsive to the needs and interests of learners and learner communities,
- support for and dissemination of alternative literacy teaching/learning methods and technologies,
- assessment of particular requirements and
- the development of effective responses for special needs learners.

We have heard the voices of literacy practitioners through their survey responses. Discussion groups incorporated into the model will give not only practitioners another chance to be heard, but also adult learners with learning disabilities. These learners will have a stake in the programming process. It is hoped that the participation of these learners will provide them with a sense of ownership in their learning process. It is hoped a by-product of their participation will also be a feeling of empowerment through the recognition of the important role they will play in the programming process and enhanced self-esteem and commitment to learning.

“I think that being familiar with as many learning strategies as possible is helpful to all learners. Thank you and good luck in this pilot project! I think it is important for literacy programs to share ideas, experiences, concerns etc. with other programs. I will try to be as helpful as possible if there are any questions you may have throughout this pilot project.”

- A Manitoba literacy practitioner

## REFERENCES

- Adult Learning and Literacy. (2002). Directory of Adult Learning Centres and Literacy Programs in Manitoba. Winnipeg, MB.
- American Psychiatric Association. (2000). Statistical Manual of Mental Disorders. Fourth Edition, Text Revision. Washington, DC.
- Bingman, M. (1989). Learning Differently: Meeting the Needs of Adults with Learning Disabilities. Center for Literacy Studies, The University of Tennessee, Knoxville: TN.
- Burt, P. (1998). How Does Literacy Affect the Health of Canadians? A Profile Paper, Policy Development and Coordination Division health Promotion and Programs Branch Health Canada.
- Burt, P. (1990). Research Report: Literacy and Health Project Phases One. Toronto: Ontario Public Health Association (OPHA). Summary of report found in Literacy and Health: Making the Connection. Health Promotion. Vol. 28, No. 1. Summer (1989).
- Centre for Education and Work (to be released in 2004). Facilitator Guide - Stages.
- Campbell, P. & Brokop, F. (2000). Canadian Adult Reading Assessment. University of Alberta, Grass Roots Press.
- Doherty (1997). Zero to Six: The Basis for School Readiness. Conference Paper. Human Resources Development Canada.
- Hunter, C.S.J., & Harman, D. (1979). Adult literacy in the United States. New York: McGraw-Hill.
- Kirsh, L.S., & Gurthies, J.T. (1977:1978). The concept and measurement of functional literacy. Reading Research Quarterly, vol. 13, 485-507.
- Knox, A.B. (1987). International perspectives on adult education. Columbus, OH: ERIC Clearinghouse on Adult, Career and Vocational Education.
- Kozol, J. (1985). Illiterate America. New York: Anchor/Doubleday.
- Learning Disabilities Association Canada. (2001). Screening For Success: Training Manual, Developed as a result of Destination Literacy: Identifying and Teaching Adults with Learning Disabilities (1999).

- Learning Disabilities Association Canada. (2002). The New Definition of Learning Disabilities. Ottawa: ON.
- Learning Disabilities Association of Manitoba. (2003). A Different Way of Learning CAN Lead to Success! LDAM Family Picnic: Back to School Info Pack.
- MacKeracher, Dr. Dorothy. (1996). Making Sense of Adult Learning, Toronto, Culture Concepts.
- Manitoba Education and Training. (1989). Pathways for the Learner: A strategy for Literacy for Manitobans, The Report of the Manitoba Task Force on Literacy, Winnipeg, MB.
- Murray, D.A. (1976). The Link Between Learning Disabilities and Juvenile Delinquency: Current Theory and Knowledge, Washington, US Government Printing Office.
- National Adult Literacy and Learning Disabilities Center. (1995). Adults with Learning Disabilities: Definitions and Issues. [www.nifl.gov/gov/nifl/ld/archive/definiti.htm](http://www.nifl.gov/gov/nifl/ld/archive/definiti.htm).
- National Literacy Secretariat. (1997). Human Resources Development Canada and the Organization for Economic Cooperation and Development.
- Nosek, K. (1997). Dyslexia in Adults: Taking Charge of Your Life. Taylor Publishing Company. Dallas, Texas.
- Ontario Public Health Association (OPAH). (1989). Research reports Literacy and Health Toronto: Ontario Public Health Association. Ottawa: ON.
- Quigley, B.A. (1990). Hidden logic: Reproduction and resistance in adult literacy and adult basic education. Adult Education Quarterly, vol. 40 (2), 103-115.
- Radencich, M.C. (1994). Adult Literacy. A Compendium of Articles. Journal of Reading. International Reading Association, Newark, DE.
- Peck (1985). Crisis Intervention Treatment with Chronically and Acutely Suicidal Adolescents, Youth Suicide, New York. P. 112-122.
- Readence, J.E., & Moore, D. (1979). Coping with minimal reading requirements: Suggestions for the reading teacher. Reading World, vol. 19, 139-148.
- Sarginson, R. (1997). Literacy and Health: A Manitoba Perspective. Literacy Partners of Manitoba, Winnipeg, MB.
- Southam News. (1987). Literacy in Canada. Toronto: ON, Creative Research Group.

Statistics Canada. (1996). Reading the Future: A Portrait of Literacy in Canada. Ottawa: ON.

\_\_\_\_\_. (1996). Federal, Provincial and Territorial Advisory Committee on Population Health for the Meeting of the Ministers of Health. Ottawa: ON.

\_\_\_\_\_. (1996). Report on the Health of Canadians and Report of the Health of Canadians-Technical National Literacy and Health Program of Canadian Public Health Association, Health Canada. Ottawa: ON.

Statistics Canada and the NLS. (1995). A Portrait of People with Disabilities, Target Group Project. Human Resources and Development Canada. Ottawa: ON.

(1994) Strategies for Population Health-Investing in the Health of Canadians Report of the Adult Education and Training Survey. Ottawa: ON.

Stone, S. & Gerwin, E. (1996). Learning Strategies for Auditory, Visual and Tactile Learning Styles. Winnipeg Volunteer Reading Aides. Winnipeg, MB.

Washington Summit on Learning Disabilities. (1994).

## APPENDIX A – LITERATURE REVIEW

### What is Literacy?

Literacy is defined in a number of ways. The most commonly-used definitions refer to what is known as competency-based or functional literacy. This relates to an individual's ability to read real life materials.

Functional literacy is a term that is difficult to define. No single definition will fit every situation. Hunter and Harman (1979 p. 7) define functional literacy as “the possession of skills perceived as necessary by particular persons and groups to fulfill their own self-determined objectives as family and community members or other associations of their choosing. According to Kirsh and Gurthries (1977, 1978) functional literacy refers to the level of skills needed by an individual to be able to complete a real world reading task. Readence and Moore (1979) list functional skills under five major categories: forms and applications, advertisements, pictorial materials, consumer information and directions and information and information sources.

*“Sixty percent of adults with severe literacy problems have undetected or untreated learning disabilities” (NALLD Center, 1995)*

It is agreed that the term “literacy” refers to a particular skill, namely the ability to understand and use printed information in day-to day activities, at home, at work and in the community. People face a variety of written information every day that requires them to perform different tasks. In order to measure proficiency levels in the processing of information, the International Adult Literacy Survey (IALS) examined three literacy domains: prose (knowledge and skills needed to understand and use information from texts), document (knowledge and skills required to locate and use information contained in various formats, including job applications, payroll forms, transportation schedules, maps, tables and graphics) and quantitative (knowledge and skills required to apply arithmetic operations either alone or sequentially, to numbers embedded in printed materials).

Adult literacy practitioners in Manitoba share a common understanding of literacy based on the Stages of learning, developed by the province's Adult Learning and Literacy branch. The branch developed this portfolio approach to recognize the learning achievements of students. “In 1992, this portfolio approach was formalized as the Certificates in Literacy and Learning (Stages One, Two and Three). They have become informally referred to as the ‘Stages’.”<sup>1</sup>

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<sup>1</sup> Quotes from the soon-to-be-released “Facilitator Guide” for the Stages curriculum. This Guide is being written by the Centre for Education and Work.

### Literacy in Canada

Important research information about literacy in Canada is derived from the IALS conducted by Statistics Canada in cooperation with the National Literacy Secretariat (NLS) in 1994-95. The IALS developed a scale for the purpose of measuring five broad literacy levels for use in a comparative analysis of literacy skills in twelve Organizations for Economic Co-operation and Development (OECD) countries.

- Level 1 literacy indicates very low literacy skills, where the individual may, for example, have difficulty identifying the correct amount of medicine to give to a child from the label information.
- Level 2 literacy identifies people who may have adapted their lower literacy skills to everyday life, but would have difficulty learning new job skills requiring a higher level of literacy. They can deal only with simple material, clearly laid out and not too complex.
- Level 3 is considered as the minimum desirable threshold in many countries but some occupations require higher skills.
- Levels 4 and 5 show increasingly higher literacy skills requiring the ability to integrate several sources of information or solve problems that are more complex.<sup>2</sup>

The IALS research provides important insights into issues related to literacy. For instance, this study found that 22% of Canadians possess level 1 literacy skills and 26% have literacy skills consistent with level 2 (Statistics Canada and NLS, 1994:1995). The proportion of Canadians with literacy skills at the lowest functional literacy levels is overwhelming, as virtually half of Canadians have difficulty with reading materials encountered in everyday life. They avoid reading except for materials that are relatively simple and familiar to them.

Perrin (1998) outlines some of the major IALS findings about literacy among Canadians:

- Literacy is a moving target. The Second IALS report indicates: “While most people can read, the real question is whether their reading and writing skills meet the challenge of living and working in today’s...society.” As the demands of society change, so do the necessary literacy skills required to function (NLS, 1997).
- Literacy involves comprehension and under-standing, not only of the written word, but also of the spoken word. Literacy is the ability to

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<sup>2</sup> “In Manitoba, adult literacy programming is learner-centred. Curriculum is developed through individual goal setting. A learning program is therefore not driven by fixed outcomes. The learner, in collaboration with tutors and literacy instructors, determines outcomes. At the same time, literacy programs are not organized on grade levels (like school learning). Rather, students are identified through informal assessment as developmentally at stages of learning commensurate with the International Adult Literacy Survey complexity scales.” (emphasis added) (Quotes from the soon-to-be-released “Facilitator Guide” for the Stages curriculum. This Guide is being written by the Centre for Education and Work.)

- understand and to be able to act upon verbal directions from health professionals. (NLS, 1997).
- Literacy skills enhance flexibility. They enable people to deal with change and with unfamiliar contexts (NLS, 1997).
  - Literacy is not an either-or, but represents a continuum of different skill levels. Very few people are completely unable to read or write anything, but very high proportion of Canadians have literacy skills which are sufficiently limited and affect their ability to function in society. These people are especially vulnerable to changes in circumstances or contexts, such as changes in their job requirements or employment situation (Statistics Canada, 1994; NLS, 1995).
  - Prior knowledge and the familiarity of context have an important impact on the ability of people to understand written and oral information. For example, the ability to understand health communications can depend in part on one's previous acquaintance with the topic and the extent to which the information is related to what one already knows (Statistics Canada, 1994; NLS, 1995).
  - The above findings are not well-recognized or accepted by the public at large, by health professionals or by individuals about their own literacy skills. Among Canadians with low literacy skills, only a small proportion acknowledges this limitation or go on to participate in literacy or adult upgrading courses (Statistics Canada, 1994; NLS, 1995).

In Canadian research, the Southam Literacy Survey (1987) found the following links to literacy in the Canadian context:

- No or low literacy is higher among Francophone Canadians
- 50% of the 4.5 million persons identified as "functionally" illiterate are 55 years of age and older
- One in twelve of those identified as functionally illiterate are university graduates
- Poverty and education are highly significant in deciding whether no or low literacy is transmitted from one generation to the next

#### Adult Basic Education and Literacy Programs

Adult basic education and literacy programs provide invaluable services to learners and the communities in which they live. These programs provide learners with supports that go beyond learning how to decode and comprehend written language. According to Knox (1987), adult basic education and literacy instruction serve four potential purposes: to promote economic productivity, to

*"Several of us sought help in various adult basic education programs that had differing attitudes and beliefs. Something was still missing; the pieces were not falling into place as they should" (Nosek, 1997)*

underwrite political change, to effect social equity or to enhance quality of life. The goal of promoting social equality is a troublesome challenge, as the Nation's poorest citizens are the least likely to participate in programs (Quigley, 1990). While these literacy goals may be the manifest objectives of literacy programming, others such as Kozol (1985) argue literacy is a worthy end in itself. Literacy from this perspective is viewed as the birthright of all humans for cultivating their human potential. Radencich (1994) suggests that all political, economic and social improvements depend on universal literacy.

Literacy programs are as diverse as the clientele they serve. While some programs are learner-centered, others are competency-based or job-centered. The needs of adult learners are as diverse as the available programming and each individual learner seeks out a program with unique goals, interests and needs. Literacy practitioners must be versatile to meet the diverse needs of the learners for whom they provide services. Literacy practitioners are faced with limited funding and scarce resources to meet the needs of their diverse clientele.

The task of meeting learner needs is compounded when learners are adults with learning disabilities. Individuals' learning differences are as unique as their personal goals, interests and needs. A better understanding of adults with learning disabilities is fundamental for equipping practitioners with the knowledge and tools they need to enhance success among these learners and ultimately meet the goals of the adult basic education and literacy program organization.

### What are Learning Disabilities?

A new definition of learning disabilities was adopted by Learning Disabilities Association of Canada (LDAC), January 30, 2002. (See Appendix E for the complete definition.) This definition is based on solid scientific research across Canada over a six-year period involving specialists from neuropsychological, educational psychology, law, special education, nursing and genetics. The purpose of this new definition is to generate a more educated and research-based understanding of learning disabilities. It is hoped that widespread adoption of this new definition will open doors to earlier and more appropriate interventions, lead to more equitable and appropriate treatment in schools, post secondary institutions and the workplace that will prevent individuals with learning disabilities from living on the margins of society.

*"There is a great need for literacy programs to have this (diagnostic) service for learners. Learners will have increased success & teachers will be able to identify needs and respond well to them"*

Some important factors of the research associated with this new definition are that learning disabilities are life-long; they are neurologically- and genetically-based and they affect all areas of life, not just education (LDAC, 2002).

"Learning Disabilities" refer to a number of disorders, which may interfere with the acquisition and use of oral language (listening, speaking, understanding); reading (decoding,

phonetic knowledge, word recognition, comprehension); written language (spelling and written expression); mathematics (computation, problem solving) and may also affect organizational skills, social perception, social interaction and perspective taking (LDAC, 2002).

These disorders affect learning in individuals who otherwise demonstrate average to above-average thinking and/or reasoning abilities. As such, learning disabilities are distinct from global intellectual disability.

The LDAC (2002) definition states learning disabilities result from impairment in one or more processes related to perceiving, thinking, remembering or learning. These include, but are not limited to: language processing, phonological processing, visual spatial processing, processing speed, memory and attention and executive functions (e.g. planning and decision-making).

Learning disabilities are life-long. The way in which they are expressed may vary over an individual's lifetime, depending on the interaction between the demands of the environment and the individual's strengths and needs. Learning disabilities are suggested by unexpected academic underachievement or achievement that is maintained only by unusually high levels of effort and support (LDAC, 2002).

Learning disabilities have been difficult to define in school-age children and, generally, the label refers to what children are not. They are not intellectually, hearing or visually impaired, nor do they have any identifiable neurological problem such as cerebral palsy (LDAC, 2002).

### Characteristics of Adults with Learning Disabilities

*"I remember how it feels to be put down, over and over again, because I could not spell-and I hated to write. I also remember how it feels to fail, although hard work in school and constant help from tutors gradually brought me success in learning" (adult learner Nosek, 1997)*

There is greater recognition and acceptance of learning disabilities in most Canadian provinces in school-aged children than there has been in the past. However, many adults are undiagnosed and their learning disability unidentified. Challenges faced by adults are often considered to be related to other characteristics such as lack of intelligence, poor attitudes and in some cases psychiatric problems, rather than the disability itself (LDAC, 2001).

Adults with learning disabilities are often clients of literacy programs. LDAC (2001) reports that frequently adults are not aware of the learning disability they may have or, in contrast, they may be the only ones who are. Enrollment in an adult literacy program often provides the first hint that they may have some problems beyond

inadequate education. Many have developed extraordinary coping strategies to mask their disability and assist functioning in areas they experience difficulties. Still others simply cannot cope.

Characteristics of learning disabilities may show up as difficulties with social skills, attention span, impulsivity, hyper- or hypo-activity, memory skills, organizational and/or time/spatial skills, gross or fine motor coordination, academic difficulties and self-esteem.

### Prevalence of Learning Disabilities

It is estimated that 10 to 15% of the general population have some form of learning disability. Learning disabilities are thought to occur more often in males than females at a ratio of 1.5:1.0 (LDAC, 2001). Other estimates suggest a male to female ratio of 4:1 (American Psychiatric Association, 2000). However, it has been suggested that gender difference estimates of learning disabilities may be biased, as they are undetected more frequently among females because of gender differences in behavioral responses.

LDAC (2001) outlines the following additional prevalence rates about the impact of learning disabilities:

- 80% of individuals with learning disabilities have difficulty learning to read
- 30% of adults with severe literacy problems were found to have undetected or untreated learning disabilities (NLD, 1994).
- 30% to 70% of young offenders have experienced learning problems (Murray, 1976).
- 50% of incarcerated adults have learning disabilities
- Almost 50% of adolescent suicides had previously been diagnosed as having learning disabilities (Peck, 1985)

The drop-out rate of school-aged students with learning disabilities is higher than the general population and this has a significant financial impact on society:

- 35% of students identified with learning disabilities drop out of school. While, twice the rate of non-disabled students, this does not include those who are not identified and drop out (Washington Summit on Learning Disabilities, 1994)
- The Conference Board of Canada determined that dropouts from the high school class of 1987 would cost society more than \$1.7 billion in lost taxes

### The Effect of Learning Disabilities and Low Literacy on Individuals

Individuals with learning disabilities can be found in all walks of life. “Many adults with learning disabilities lead productive and successful lives” (LDAC, 2001). However, success does not come easy for many others. Success will depend on many factors such as the severity of the disability, early identification, remediation, career choice and support networks such as family, friends, teachers and employers. Adults with learning disabilities are often not aware that the persistent difficulties they have encountered in school, their

*“In my adult years, dyslexia has meant facing adult responsibilities as an illiterate person. It has meant struggling with joblessness, underemployment and sometimes poverty” (Adult Learner in Nosek, 1997)*

relationships or their jobs are due to learning disabilities. The defeated efforts these adults often experience result in frustration, disappointment and poor self-esteem, persistent experiences of failure and may lead to a negative self-concept that they are stupid and lazy.

This is not to say that all individuals with learning disabilities will have negative life experiences and personal difficulties, nor will low literacy levels have a negative health impact for all. This is also not to say that all individuals with learning disabilities will have low literacy skills nor will all individuals with low literacy skills have learning disabilities. However, research suggests that low literacy is a risk factor for

many of the intervening factors that have been found to lead to life difficulties such as level of education, income, employability, poverty and stress. Other research suggests that the impact of learning disabilities may compound with age (NALLD, 1995), which leaves adults with learning disabilities at risk for these negative life experiences and health consequences.

### Assessment of Learning Disabilities

Since learning disabilities are the result of neurological dysfunction, formal diagnosis can only be made by a qualified psychologist or an appropriately qualified medical practitioner, such as a psychiatrist or neurologist (LDAC, 2001). There are however, several screening tools available for practitioner use, which can help identify persons at risk for a learning disability.

An important first step for developing a program plan that will promote learning success for these individuals that build on learning strengths is identifying individuals who are at risk.

There are several tests used for diagnosing learning disabilities. “It is important to determine why the individual wishes to be assessed” (LDAC, 2001). The

*“Being diagnosed as dyslexic was enormously important to all of us. It freed us psychologically and emotionally from the shame and guilt we had felt for years” (Adult Learner in Nosek, 1997)*

current problems and challenges should be discussed along with individual expectations of what an assessment will accomplish. As outlined by LDAC (2001) the assessment should consist of:

- An initial interview
- A measure of intellectual functioning
- A measure of academic achievement levels
- Social and emotional evaluations
- Feedback interview

There are a number of benefits to individuals with learning disabilities from obtaining an assessment. Awareness that there is a specific reason for the persistent difficulty often brings emotional relief. Individuals no longer attribute personal inadequacies to the underlying problem. Personal knowledge of why individuals have experienced definable weaknesses often has an immediate impact on how they perceive themselves, (LDAC, 2001). Better understanding of the underlying problem also leads to a better understanding of personal strengths, which is a first step towards building self-esteem and developing coping and learning strategies.

*“I think when you overcome something like [dyslexia], you learn what it takes to be successful and how to approach problems” (Nolan Ryan in Nosek, 1997)*

### What are Learning Styles?

Learning styles are approaches to assessment or instruction emphasizing the variations in temperament, attitude and preferred manner of tackling a task (NALLD, 1995).

“According to MacKeracher (1996), learning styles may be thought of as the way in which people:

- Take in information
- Select certain information for further processing
- Use meaning, values, skills, strategies to solve problems, make decisions and create new meanings
- Change any or all of the processes or structures described in this list

“There has been a growth of research into the subject of learning styles in the last decade or so. The result has been numerous ways of categorizing learning styles ...these have been broadly grouped into four categories:

- Physical domain – visual, auditory and motor styles
- Cognitive domain – concrete, abstract, sequential, random styles
- Affective domain – internal and external psychological and physiological factors that affect how we feel
- Culture and learning

“Most of us have a preferred learning domain and within that domain, a preferred learning style.”<sup>3</sup>

It is important to recognize that teaching styles will be a natural reflection of an individual’s own learning style. What may seem like an obvious and natural way to teach may not meet the needs of the learner. It may be necessary to present new materials in a variety of ways. The challenge is to integrate all the learning modes into lesson plans. (Source unknown.)

### What are Specialized Learning Strategies?

Learning strategy approaches focus on efficient ways to learn that include specific techniques for organizing, actively interacting with material, memorizing and monitoring any content or subject (NALLD, 1995). Specialized learning strategies are ways of teaching to an individual’s learning strengths or preferred learning styles. There are three overall ways that experts who have worked with learners with learning disabilities teach to the learner’s strengths (LDAC, 2001).

#### Use of accommodations

- The use of accommodations is “working around the learner’s problem areas.” Making use of accommodations is knowing what compensatory strategies and techniques help particular learners according to their learning style and personal strengths. Two examples of accommodation would be using a tape recorder in class or having a scribe take notes.

#### Building up a weak area

- There is evidence that some types of learning difficulties can be reduced through intensive exercises using specialized techniques. For some people, these exercises help to “rewire” the brain. This is, for the most part, impractical in the field of literacy because it is time intensive and costly and time spent with the learner is limited. A way of building up the weak areas in a literacy program would be intensive work in phonics for an individual with auditory processing difficulties.

#### Building on strengths

- Building on strengths is therefore the most accessible and easiest method of working with the learner with learning disabilities in the field of literacy. Working with the learner’s strengths involves working with his/her favoured learning styles to ease the task of learning and lead to the development of strategies that promote success.

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<sup>3</sup> Learning Styles and Strategies. Adult Learning and Literacy, Manitoba Advanced Education and Training. 1999.

Shirley Stone and the late Elma Gerwin, both of LITERACYWORKS, began using specialized approaches a number of years ago with adult learners who exhibited characteristics of learning disabilities to enhance ease of learning and learning success. They compiled a document titled “Learning Strategies” for auditory, visual and tactile, learning styles. This was developed under a grant from the NLS and distributed to literacy programs in 1996. These compiled approaches consisted of strategies for learners with varying learning styles associated with auditory, visual or tactile learning for promoting learning success in the areas of spelling, writing and reading.

In addition to direct instruction in skills, adults with learning disabilities and probably all literacy students need to “learn about learning” (Bingman, 1989). Efficient learners actively employ various strategies to assist them to organize and store incoming information while people with learning difficulties use insufficient and ineffective strategies for learning.

Metacognitive processes are employed by efficient learners that involves the awareness of the purpose of reading, ability to construct meaning from what is read, distinguish the important parts of text by knowing where to focus attention, ability to monitor comprehension and have internalized strategies for adjusting pace and attention level, (Bingman, 1989).

Individuals with learning difficulties often employ the wrong strategy for a given task therefore it is important to determine what strategic approaches individuals apply when working at a task. Assessment procedures that focus on how someone is attempting to recall information (what strategies are being used) and not simply on how much is remembered will give important clues to why the individual is experiencing difficulties.

These approaches for determining the most effective individual specific specialized strategies based on learning styles have been used at LITERACYWORKS with success while working with adult learners whose learning styles are most receptive to these particular approaches.

### What is Assistive Technology?

Assistive technology includes a whole area of high and low technology devices designed to increase the independence of learners with learning disabilities by enabling them to compensate for deficits and enhance self-confidence.

High tech devices are usually electronically sophisticated and mainly computer based. Some examples of assistive devices are:

- Word processors, which have features such as spell check, dictionaries, thesauruses and grammar checks. Word processors also have the outline mode that helps learners set out major ideas and add sub-categories

- Laptop computers, portable keyboards and tape recorders for taking notes during classes to support learners with written language problems (note: portable keyboards have very small viewing areas unlike a full-sized computer monitor)
- Software program options that enable users to change background, text colors, style of font or font size
- Talking, large print browsers that allow users with visual processing problems to search the Internet
- Special scanning software that scans, enlarges and reads back material to the user with voice input

## **APPENDIX B – Definition of Learning Disabilities**

### **Learning Disabilities Defined**

The following definition of Learning Disabilities was adopted by the Learning Disabilities Association of Canada, January 30, 2002, and comes from their website:

“Learning Disabilities” refer to a number of disorders, which may affect the acquisition, organization, retention, understanding or use of verbal or nonverbal information. These disorders affect learning in individuals who otherwise demonstrate at least average abilities essential for thinking and/or reasoning. As such, learning disabilities are distinct from global intellectual deficiency.

Learning disabilities result from impairments in one or more processes related to perceiving, thinking, remembering or learning. These include, but are not limited to: language processing; phonological processing; visual spatial processing; processing speed; memory and attention; and executive functions (e.g. planning and decision-making).

Learning disabilities range in severity and may interfere with the acquisition and use of one or more of the following:

- Oral language (e.g. listening, speaking, understanding);
- Reading (e.g. decoding, phonetic knowledge, word recognition, comprehension);
- Written language (e.g. spelling and written expression); and
- Mathematics (e.g. computation, problem solving).

Learning disabilities may also involve difficulties with organizational skills, social perception, social interaction and perspective taking.

Learning disabilities are life long. The way in which they are expressed may vary over an individual's lifetime, depending on the interaction between the demands of the environment and the individual's strengths and needs. Learning disabilities are suggested by unexpected academic under-achievement or achievement, which is maintained only by unusually high levels of effort and support.

Learning disabilities are due to genetic and/or neurobiological factors or injury that alters brain functioning in a manner, which affects one or more processes, related to learning. These disorders are not due primarily to hearing and/or vision problems, socio-economic factors, cultural or linguistic differences, lack of motivation or ineffective teaching, although these factors may further complicate the challenges faced by individuals with learning disabilities. Learning disabilities may co-exist with various conditions including attention, behavioral and emotional disorders, sensory impairments or other medical conditions.

For success, individuals with learning disabilities require early identification and timely specialized assessments and interventions involving home, school, and community and workplace settings. The interventions need to be appropriate for each individual's learning disability subtype and, at a minimum, include the provision of:

- Specific skill instruction;
- Accommodations;
- Compensatory strategies; and
- Self-advocacy skills.

*“When I am reading, I only hear it and am unable to remember what the written word looks like” (Albert Einstein, in Nosek, 1997)*

**APPENDIX C - Survey Cover Letter**

LITERACYWORKS  
230-500 Portage Avenue  
Winnipeg MB R3C 3X1  
Phone (204) 786-1212 Fax (204) 786-1249  
E-mail [litworks@shawbiz.ca](mailto:litworks@shawbiz.ca)  
November 18, 2002

Dear «Name»,

LITERACYWORKS is undertaking “Strategies for Success”, a research and development project involving a survey of the literacy community in Manitoba to determine the need for new Manitoba-based literacy programming focused on adults with learning disabilities. From this research we will be determining the extent and type of needs and supports other literacy programs require to help them serve their learning disabled learners. We will also be determining the future programming of LITERACYWORKS to develop more extensive training for literacy practitioners throughout the province.

This project, funded by National Literacy Secretariat, is a partnership of Learning Disabilities of Manitoba, Literacy Partners of Manitoba, and LITERACYWORKS, in consultation with Robin Millar, Centre for Education and Work.

We would like to invite you to participate in this research project. Attached please find a copy of our survey and consent form. Please expect a follow up telephone call to confirm its receipt and your participation. We have included a small thank you honorarium of \$5 for your participation. As well, all programs that have returned surveys by December 15, 2002 will be entered in a draw to win an expandable, electronic Merriam-Webster Bookman. Besides a dictionary and thesaurus, features include automatic spelling correction and definitions of sound-alike words.

Any questions can be answered at the time of our follow up telephone call or if you wish you may contact us or our research assistant, Cheryl Nicholson, at LITERACYWORKS (204) 786-1212. The survey takes about 30-45 minutes to complete. We would appreciate if you could return it to us in the enclosed self-addressed envelope as soon as possible. Thank you for your time and attention to this matter.

Sincerely,

Shirley Stone  
Program Manager

Lorraine Kaczor  
Program Coordinator

**APPENDIX D - Consent Form****Consent Form****LITERACYWORKS****Strategies for Success****Research and Development Project**

This consent form is to verify your voluntary participation in this research project. All information, which could identify either your program or persons involved with your program, will remain strictly confidential. The final report will consist of aggregate information associated with the identified needs of literacy programs and adults with learning disabilities in the province. As a participant in this research, you will also receive a copy of the final report. I agree to let my information conveyed in this research be used in the aggregate report of the study findings.

Program Name: \_\_\_\_\_

Your Name: \_\_\_\_\_

Signature: \_\_\_\_\_

Date: \_\_\_\_\_

**APPENDIX E - Survey Questionnaire****LITERACYWORKS Survey Questionnaire****Strategies for Success****Research and Development Project**

“Strategies for Success” is a research and development project involving a survey of the literacy community in Manitoba to determine the need for new Manitoba-based literacy programming focused on adults with learning disabilities. The goal of this project, funded by the National Literacy Secretariat, is to determine what the unique needs are in the province for comprehensive literacy programming that provides services to adults with learning disabilities and their educators. We are also interested in determining what type of programming should be provided to meet the needs of learners and their educators. Please be assured that all information obtained through this survey will be strictly confidential. Information about the findings of this survey will be compiled and made available to the literacy programs participating in this study.

**Learning Disabilities Defined**

Before you proceed, please take a moment to read the following definition of learning disabilities that we have summarized from the definition developed by the Learning Disabilities Association of Canada (2002). If you would like to read the complete definition, we have included it at the back of this survey. Feel free to detach it from the survey if you would like to keep a copy.

“Learning Disabilities” refer to a number of disorders, which may interfere with the acquisition, and use of oral language, reading, written language, mathematics and may also affect organizational skills, social perception, social interaction and perspective taking.

These disorders affect learning in individuals whom otherwise demonstrate average to above-average thinking and/or reasoning abilities. Learning disabilities are distinct from intellectual disabilities (formerly known as “mentally challenged”).

Learning disabilities result from impairment in one or more processes related to perceiving, thinking, remembering or learning.

### Introduction Section

The purpose of this section is to determine the level of awareness about learning disabilities and learners in your program. We are interested in learning what types of learning disorders practitioners find to be common among learners and the prevalence of learning disabilities of adult learners without any additional disorder associated to the learning difficulty.

1. Have you had learners with either diagnosed or undiagnosed learning disabilities in your program?

Yes   
No   
Not sure

2. Can you estimate how many students have learning difficulties as a result of one of the following conditions?

Learning Disability Exclusively \_\_\_\_\_  
ADD \_\_\_\_\_  
ADHD \_\_\_\_\_  
Fetal Alcohol Syndrome \_\_\_\_\_  
Intellectual Disability \_\_\_\_\_

3. Has the staff at your program looked for more information on learning disabilities? (If no: go to Q6)

Yes   
No

4. What resources were used to locate this information?

Libraries   
Internet   
Other   
N/A

5. Would they be willing to share their findings?

Yes   
No   
Not sure   
N/A

### Diagnosis Section

The purpose of this section is to determine if diagnostic materials are used to assess learning disabilities in adult literacy programs and the types of materials in use. This will help determine the need for literacy programming that can take referrals for assessments of learning disabilities, and/or provide training for literacy practitioners in the assessment process. We are also interested in discovering what your preference would be in terms of having an outside agency provide the following services:

- To receive referrals for student learning disability screening and assessments,
- To visit your facility for the purpose of screening and assessing students for learning disabilities,
- To assist you in setting up an in-house screening/assessment program for learning disabilities.

6. Does your program identify students with learning disabilities?

- Yes   
No

7. Do students within your program identify themselves as having a learning disability? (If no: go to Q9)

- Yes   
No

8. Are these self-assessments based on previous screening/assessments for learning disabilities?

- Yes   
No   
Not sure

9. Does your program use a screening tool to identify students with learning disabilities? (If no: go to Q11)

- Yes   
No

10. Was this screening/assessment tool developed within your program?

- Yes   
No   
Not sure

11. Would you like to develop an in-house screening/assessment tool?

- Yes   
No

12. Would outside professional assistance be needed to help you set up this tool?
- Yes
- No
13. Would it be helpful to have a checklist that would help you identify those at risk of having a learning disability to refer for further screening/assessments?
- Yes
- No
14. Is there a need for a service in Manitoba that does diagnostic screening/assessments for learning disabilities?
- Yes
- No
15. How helpful would it be for your program to make use of such a diagnostic support service?
- Extremely helpful
- Very Helpful
- Helpful
- Somewhat helpful
- Not helpful at all
16. Which type of diagnostic service would you prefer?
- A service that comes to your program to assess students
- An outside service you can refer students for assessments
- A flexible service that can come to your site and/or an outside service you can refer students as needed
17. Have you referred learners to other places for assessments?
- Yes
- No
18. Have learners gone out on their own for learning disability screening/assessments?
- Yes
- No
19. Would you list the agencies students from your program use for learning disability screenings/assessments? (If yes: to Q17 or Q18)
20. Would you make a referral to a literacy program that specializes in learning disability screening/assessments if one was available?
- Yes
- No

### Supports and Learning Strategies Section

There are a number of specialized learning strategies often used when teaching individuals with learning disabilities that help promote learning success. These strategies range from giving extra time to complete tasks, use of tutors, adaptations made to the curriculum, and the use of various technical supports. The purpose of this section is to determine: what strategies practitioners are currently using for teaching individuals with learning disabilities and if practitioners would like additional training in specialized learning strategies.

21. Do you have experience instructing individuals that exhibit the characteristics associated with having a learning disability?

- Yes   
No

22. If so, would you please share some information about your experience?

23. How does having learners with learning disabilities in a class affect the overall classroom instruction?

#### Special Support:

24. Students with learning disabilities often require extra tutoring. Is your program able to provide tutoring?

- Yes   
No

25. Who does this extra tutoring?

- Practitioners   
Teacher assistants   
Tutors   
Volunteers

26. Students with learning disabilities often require extra time to complete tasks. Is your program able to provide this extra time?

- Yes   
No

27. Students with learning disabilities often require curriculum adaptations. Is your program able to provide this type of individualized support?

- Yes   
No

28. Please comment on other supports your program is able to provide...

29. How helpful would it be for your program to be able to provide extra supports for individuals with learning disabilities beyond what you are currently able to provide?

- |                    |                          |
|--------------------|--------------------------|
| Extremely helpful  | <input type="checkbox"/> |
| Very Helpful       | <input type="checkbox"/> |
| Helpful            | <input type="checkbox"/> |
| Somewhat helpful   | <input type="checkbox"/> |
| Not helpful at all | <input type="checkbox"/> |

Specialized Learning Strategies:

30. Is your program able to provide specialized learning strategies to individuals with learning disabilities? (If no: go to Q33)

- |     |                          |
|-----|--------------------------|
| Yes | <input type="checkbox"/> |
| No  | <input type="checkbox"/> |

31. In what areas are specialized learning strategies being used?

- |                       |                          |
|-----------------------|--------------------------|
| Reading               | <input type="checkbox"/> |
| Writing               | <input type="checkbox"/> |
| Spelling              | <input type="checkbox"/> |
| Math                  | <input type="checkbox"/> |
| Organizational skills | <input type="checkbox"/> |
| Other                 | <input type="checkbox"/> |
| N/A                   | <input type="checkbox"/> |

32. Please comment on the specialized learning strategies being used...

33. How helpful would it be for your program to be able to provide specialized learning strategies for individuals with learning disabilities beyond what you are able to currently provide?

- |                    |                          |
|--------------------|--------------------------|
| Extremely helpful  | <input type="checkbox"/> |
| Very Helpful       | <input type="checkbox"/> |
| Helpful            | <input type="checkbox"/> |
| Somewhat helpful   | <input type="checkbox"/> |
| Not helpful at all | <input type="checkbox"/> |

34. Please list the types of specialized learning strategies your program would like to be able to provide for learners with learning disabilities...

35. Do you think learners within your program would be interested in receiving specialized workshops in learning strategies?

- |     |                          |
|-----|--------------------------|
| Yes | <input type="checkbox"/> |
| No  | <input type="checkbox"/> |

36. Is there a need for a service in Manitoba that could provide short-term assistance to learners with learning disabilities in developing their own specialized learning strategies?

Yes

No

37. Would you make a referral to a literacy program that could provide short-term assistance to learners with learning disabilities in developing their own specialized learning strategies?

Yes

No

### Assistive Technology Section

Assistive technology is a way of building on the strengths of individuals with learning disabilities rather than having an exclusive focus on learning weaknesses. We are interested in determining what forms of assistive technology are currently being used throughout the province, and if practitioners are interested in learning more about the assistive technologies available. Assistive technologies could include, but are not limited to, the technologies indicated within this section.

38. Is there use of assistive learning technologies for students with learning difficulties in your program? (If no: go to Q41)

Yes

No

39. What assistive learning technologies are in use?

Recording lessons on tapes

Computer assisted

Electronic Dictionaries

Software programs (SARAW)

Taped books

Other

N/A

40. Please list other technologies being used...

41. Would anyone for your program be interested in learning more about the assistive technologies available?

Yes

No

### Training Section

The purpose of this section is to determine what type of training practitioners believe would be helpful for assisting adults with learning disabilities to successfully complete their learning goals. We feel that as practitioners you have a clear vision of the type of training that would be most beneficial for practitioners, tutors, and learners to promote successful learning experiences.

#### Recognition and Screening:

42. Have any of your **practitioners** received training to recognize learning disabilities?

Yes   
No

43. Have any of your **tutors** received training to recognize learning disabilities?

Yes   
No

44. Have any of your **practitioners** received training to use screening/assessment tools for learning disabilities?

Yes   
No

45. Have any of your **tutors** received training to use screening/assessment tools for learning disabilities?

Yes   
No

46. Would your **practitioners** be interested in receiving training/further training in using learning disability screening/assessment tools?

Yes   
No

47. Would your **tutors** be interested in receiving training/further training to learn to use learning disability screening/assessment tools?

Yes   
No

48. Please list the types of training anyone in your program has previously received for screening/assessment of learning disabilities?

49. Please list the type of further training practitioners or tutors in your program would like to receive regarding screening/assessment of learning disabilities?

50. How helpful would it be for your program to have access to a service that provides screening/assessment-training workshops to practitioners and/or tutors?

- Extremely helpful   
Very Helpful   
Helpful   
Somewhat helpful   
Not helpful at all

Learning Strategies:

51. Have any of your **practitioners** received training in specialized learning strategies for learners with learning disabilities?

- Yes   
No

52. Have any of your **tutors** received training in specialized learning strategies for learners with learning disabilities?

- Yes   
No

53. Would your **practitioners** be interested in receiving further specialized learning strategies training?

- Yes   
No

54. Would your **tutors** be interested in receiving further specialized learning strategy training?

- Yes   
No

55. Please list the types of training in specialized learning strategies anyone in your program has received?

56. Please list the type of further training practitioners or tutors in your program would like to receive regarding specialized learning strategies for learning disabilities?

57. How helpful would it be for your program to have access to a service that provides specialized learning strategies workshops to practitioners and/or tutors?

- Extremely helpful   
Very Helpful   
Helpful   
Somewhat helpful   
Not helpful at all

58. Which type of training workshop would you prefer?

- A service that comes to your program to deliver training workshops
- An outside service to refer practitioners for training workshops
- A flexible service that can come to your site and/or provide an outside facility for training workshops

Learner Workshops:

59. Would your program be interested in having learners with learning disabilities attend short-term workshops for assistance in developing specialized learning strategies?

- Yes   
No

60. How helpful do you think it would be for your learners with learning disabilities to have access to a service that provides specialized learning strategies workshops?

- Extremely helpful   
Very Helpful   
Helpful   
Somewhat helpful   
Not helpful at all

61. Which type of workshop do you think your learners would prefer?

- A service that comes to your program to deliver workshops
- An outside service to send learners for workshops
- A flexible service that can come to your site and/or provide an outside facility for workshops

### **Working Together to Promote Literacy**

Our goal for next year is to pilot specialized learning disabilities programming aimed at meeting the needs of literacy programs within the province. This programming will be based on the compiled recommendations of literacy practitioners throughout the province collected in this survey...

62. Would your program be interested in taking part in this pilot project in any capacity?

- Yes   
No

63. Under what conditions would you take part?

64. What do you think the potential benefits of this participation would be for your program?

65. Are there any areas not covered in this survey relating to learning disabilities that could help your program?

66. Is there anything in general you would like to add about literacy programming issues for individuals with learning disabilities in Manitoba?