

Research Proposal:

A podcast summer program and children's literacy skill assessment

Craig Todd-Langille (207)
961191120
FIS 1240 – Prof. Cherry
August 15, 2006

Abstract

This research investigates the effect a podcast summer literacy support program has on the literacy skill acquisition and retention of students in the summer between fifth and sixth grade. ICT skills and literacy links need to be a focus in research to support the complex work environment that faces young people expected to function in an economic information society. A range of literacy skills will be tested, but Ontario provincial standardized testing assessment will be central to the research. Additional quantitative and qualitative data will be collected from sources surrounding participants. A null hypotheses is declared to the central question of whether any literacy assessment changes will be measurable. This project can inform a broad array of issues currently discussed amongst information academics and professionals.

Introduction

This research project proposes to observe the effect, if any, children's participation in a public library style podcasting summer program has on their acquisition and retention of literacy skills. Attitudes, awareness, and behaviours connected to the program, learning and literacy will also be monitored. The goal is to begin to determine means by which information and communication technologies (ICTs) can be incorporated into library and literacy programming. Specifically, an oral communication medium - *podcasting* - will be explored via ICTs, and the multi-faceted literacy effect of this intervention will be reviewed.

The subjects of the research will be children in the Greater Toronto Area, who are completing their fifth grade of elementary schooling and will be entering the sixth grade the coming fall at the same school. 40 Toronto District School Board (TDSB) or Toronto Catholic District School Board (TCDSB) students will be recruited for investigation in a recreational summer literacy support program: twenty comprising the treatment group, divided equally between two podcast sessions; the other twenty serving as control, divided equally between two free voluntary reading sessions. Reading and writing levels will be twice tested by the research staff, administering evaluations modeled upon sample questions offered by the Education Quality and Accountability Office (EQAO) (2005). The children's subsequent performance on the actual Ontario provincial standardized tests during the sixth grade will also be utilized. The students' previous performance on the third grade EQAO examination, as well as school environment comparison data available from the corresponding board websites (TCDSB, 2006; TDSB, 2006), will be used for contextual purposes. Information and media literacy levels will be assessed and ICT skill levels self-assessed by participants, before and after the program. Each participant will be measured via a target age modified version of the Library Anxiety Scale (Bostick, 1992) and re-measured following the program. Further data will be collected from parent, teacher and child interviews by questionnaire pre and post study. The podcast output will allow for another method of observation, and will be transcribed, coded for recurring genres, themes and content, and analyzed in terms of development and participation.

The terrain explored by this research needs to be investigated because it is relevant to the emerging economic information society today's children are expected to participate in, while acknowledging the present complex literacy environment. The United Nations' *World Youth Report 2003* presented a chapter on young people and ICTs, one of five new priorities for youth identified. The report emphasizes how young people have become the central targets

of ICT marketing, the new qualifications that need to be developed for children to become skilled workers, and the expanded literacy requirements to be able to maneuver in the new ICT context (United Nations, 2004). The recently completed World Summit on the Information Society (WSIS) opened with pledges to empower children and youth with ICT skills and access, as investments in the future workforce and against illiteracy (WSIS, 2003a; WSIS, 2003b). A participant of WSIS, Canada has highlighted youth as key stakeholders in its commitment to transforming to an information society (Marchi, 2003).

Background

ICT media is already a significant factor in the lives of Canadian young people. Research into children and youth's use of ICT can offer new perspectives on the issue and are of interest to mainstream media (D. Girard, 2005). Because of their association with Ipods, podcasting has earned a social cachet amongst young people, and the personalized radio it offers is increasing in popularity. It seems an ideal avenue of ICT research to address as a conduit of discussion and self-expression. Moreover, it is uniquely situated at the current time, as an oral medium, to inform rapidly consolidating spheres of communication. The advent of systems facilitating speech over Internet connections such as Voice over Internet Protocol (VoiP) compounded with Internet features on existing mobile phones indicates a significant portion of the digital landscape will comprised of two-way audio media.

A nationally representative survey of 945 Finnish children between the ages of 8-10 showed 29% owned and 72% used a mobile phone (Suoranta & Lehtimaki, 2004). Though we cannot apply these findings to Canadian children, we can note they are the present in a country routinely cited as a global leader in positioning to benefit from ICTs (World Bank, 2005; World Economic Forum, 2005). The ubiquity of ICTs for children in Finland could be viewed as a characteristic indicative of transforming into an information society. In this Finnish context, regardless, mobile phones have already become a varied instrument used for a variety of purposes: both boys and girls used them more frequently for gaming than for calling purposes, and overall, messaging (36%) and ringtone composition (31%) were used by close to a third of respondents. The phones were also found to be used for purchasing additional add-on features. Computer use is also dominated by gaming, but a wide array of uses is also reported (Suoranta & Lehtimaki, 2004).

The podcasting question is a new one with a broad range of roots. It has not yet appeared on the radar of peer-reviewed journals. Radio itself sees surprisingly little coverage,

with only older anecdotal evidence available of significant undertakings. These include the implementation of communication summer camps in Finland for children (Härkönen, 1995), and an interactive radio drama series aimed at improving adult literacy (Reynolds & Reynolds, 1988). While interesting, neither offer a documented conclusive link between radio and literacy.

The two concepts have perhaps been assumed to be mutually exclusive, yet we must consider that no is also no evidence in support of this. Academic discussion about communication and radio often centre on developing nations. Bruce Girard, who recently co-edited a United Nations book on information society communication (B. Girard & Siochrâu, 2003), had earlier collected works for a volume on community radio projects. While featuring poorer nations, that work presents radio in a globalized context, and reveals cases within North America of creating information access and a bridge to participation (B. Girard, 1992). Given its worldwide value, it is pertinent that radio becomes a target of research, without ignoring its application within developed nations. Podcasting has now made this more of a practical possibility.

The term the 'digital divide' is commonly used to describe those lacking the skills or tools (or both) to benefit from ICT. Access through institutions such as public libraries and skill development are areas of concern for many parents of children in Canada. Association of recreational ICTs with literacy may begin to provide insight into methods of alleviating such concerns. The Finnish survey indicates that ICT use does not appear to curb reading habits. 94% of at least once a week computer users, and 95% of gamers, indicated they read a book at least once a week (as opposed to 74% of daily television viewers). Furthermore, more children picked reading a book as an activity done once a week than computer use or gaming, although by gender, this trend was found to be exceedingly true only for girls - with boys reading coming in second, slightly ahead of computer use (Suoranta & Lehtimaki, 2004).

The research by Suoranta & Lehtimaki (2004) demonstrates that a leading information economy nation can still have many children reporting no weekly book reading (20%) or computer use (36%). We can speculate that this may be true in Canada as well. Research into efforts to bridge the gap for such children may help to inform strategies to be adopted. It is consistent with and can contribute to the multiple current discussions in the literature surrounding children, ICT and public libraries. It can respond to the lack of general information-centred research with children, particularly in regards to the public library, as flagged by Walter (2003). It coincides with recent Canadian government public policy that has

appointed libraries the role of facilitators of access to information technology, the success of which has been recently studied (Anderson & Julien, 2003). Library 2.0 has become a hot topic (Abram, 2006), and this research is specifically suited to the subject, as podcasting falls under the rubric of the collaborative ICT that constitutes Web 2.0 (The enzyme that won, 2006). Finally, this study can perpetuate the pairing of reading with information society goals (Eyre, 2003), and comment on the types of skills professionals working in the field need to be cognizant of (Adkins & Esser, 2004).

Literature Review

The lack of direct predecessors to the research subject has led the author to consult a varied range of works. Peer-reviewed published journal research was sought that was deemed to offer useful input to the factors involved in the podcasting scenario. Situations that specifically concerned interventions involving children and literacy were found from a broad range of sources and with quantitative, qualitative and mixed methodology approaches. There was found to be less research in the literature on late elementary school aged students as opposed to early elementary. An overwhelming focus on preschool early years and university undergraduates led to the rejection of many studies. While none present a tradition that this study can directly be attached to, they converge as a group to offer a rich canvas of knowledge to draw upon.

This study is duly influenced by Krashen's arguments in favour of free voluntary reading (FVR). He defines FVR as "reading because you want to...FVR means putting down a book you don't like and choosing another one instead (Krashen, 2004, p. x). Free voluntary reading is intertwined with access to an enriched literacy environment. More access to home, school and public libraries leads to increased literacy achievement. Krashen presents his and others' research and finds that FVR is overwhelmingly superior to direct instruction when testing for reading comprehension, vocabulary, writing and grammar skills (2004). Literacy competence acquired by conscious learning, even when testing well post-intervention, is found to lack longevity (Krashen, 2003). The ability to subconsciously acquire language is described by Krashen (2003) as being due to the input/comprehension hypothesis. This model proposes that language acquisition occurs via the comprehension of messages: "all we have to do is give students comprehensible messages that they will pay attention to, and they will pay attention if the messages are interesting (p. 4)."

FVR is not envisioned as a replacement of instruction itself or curriculum based learning. It is instead offered as a preferred complement, innately qualified to achieve the goal of language arts programs - to result in increased free voluntary reading (Krashen, 2004). Perhaps because of its simple philosophy, FVR interventions are not the subject of a great deal of recent research. When it is a component, it is often considered a supplementary variable as opposed to a central one. Friedland & Truscott (2005) studied 13 seventh and eighth grade students participating in voluntary free period tutoring sessions. These struggling readers and their tutors were monitored over fall and winter semesters and data was collected: tutors maintained post-session reflection logbooks, and, at the end of the year, tutees were administered an eight question Likert-style survey and were asked to respond to a 15 question interview. The authors found the sessions developed an awareness of learning and improved reading attitudes. While it is acknowledged that free voluntary reading could have played a role in the outcome - in order to solicit ownership and engagement, selection of reading material was the decision of the tutee - the focus of success is placed on individualized tutoring (Friedland & Truscott, 2005).

It is not that individualized tutoring is not enviable. The flexible, relationship building style of instruction adopted in that program is a perfect match for FVR. Krashen reports that direct encouragement is beneficial as long as the available input is comprehensible and interesting (2004). However, given the mentioned missed sessions and tutor-tutee scheduling difficulties, one might speculate that the one-to-one model was a barrier for students who could not be matched. In fact, all eighth and two seventh grade students left after the fall session due to scheduling conflicts. With the focus on access to a wide variety of materials (the study was in partnership with another project that supplies literature to schools in need) it is difficult to know if the gains could not be simply attributed to the introduction of these students to a more attractive reading environment (Friedland & Truscott, 2005). It would be desirable to know if students allowed continued access to the materials without a tutor would have remained in the program, and what impact such continued involvement may have had.

The independence offered by ICT interventions in literacy is one aspect highlighted in the research. The evidence of literacy improvement, however, is generally mediocre in these cases. Wood (2005) investigated an unsupervised "teaching surrogate" - a talking book software program - and found no significant differences between its use and a control group in one-to-one adult tutoring (p. 172). 40 five year olds and 40 six year olds were studied in two groups, and were measured for changes in vocabulary, phonological awareness and reading

strategies. Each group was split in half, with one section placed in treatment and one in control. Similarity amongst the groups was found after pre and post testing, with the only exception being that the younger students were found less likely to mispronounce words. Users of one function of the program were found less likely to mispronounce or refuse to say a word, and more likely to employ a word substitution strategy. While Wood (2005) mentions the usefulness of the software in contexts where adult aid is not possible, she cautiously asserts the need for more research. We should also consider that neither the intervention nor control group was shown to be superior in this regard to, as one example, small group instruction; therefore, an equation between the talking book software and a specific instructor should not be considered. This would diminish the appeal of Wood's findings, as there would be less of a dire need for surrogate technology to replicate the one to one experience.

A study on the popular Accelerated Reader (AR) software compared its mandated daily one hour use in one school district against a traditional novel centred literature class curriculum (that had AR available for voluntary free-time use) in one school in another matched district. Fourth and fifth grade students were measured by reading attitude and self-perception instruments. A MANOVA procedure and corresponding univariate F-tests and separate ANCOVA procedures both showed AR improved academic reading attitudes (but was similar to control for recreational attitudes) across groups, gender, grade level and reading ability. There was also a discrepancy between genders in regards to self-perception. The authors highlight the negative influence on two types of self-perception of AR for low-achieving males, and rightly note the doubling marginalization effect this could have. Low achieving females, however, were found to be negatively influenced for the same two types of self-perception in the control group, and females in this group on the whole reported lower self-perceptions for another self-perception indicator. Since the control group (N=123) was roughly half the size of the treatment group (N=235) and only was drawn from one school, the data on female self-perception is less reliable (Mallette, Henk, & Melnick, 2004). Nonetheless, if there is an aspect to ICT use that alleviates negative literacy self-perception amongst females it bears further scrutiny.

Another study claimed to find AR positively influenced reading comprehension, but did not feature a control group. Literal comprehension results were based on AR score measures. Higher level comprehension was based on a four question test, and two of the four questions were universally answered correctly by the 11 research subjects. The other two questions merely improved from 7 to 10 and 2 to 7 participants in a span of four summer weeks (AR was

used for 30 to 40 minutes three days a week). The size and simplistic method of this study makes its claim for AR ungrounded (Cuddeback & Ceprano, 2002). While all 11 students indicated AR was one of their top two favorite activities at the camp, it is likely due to its prize generating function. In the previously mentioned study, students in the control school “regarded AR primarily as an opportunity to acquire points to purchase items from the school store (Mallette et al., 2004, p. 78).” Krashen (2004) finds offering rewards for reading is not supported by research, may damage attitudes towards recreational reading, and is rarely suggested by students themselves as a manner to induce reading.

A New York state team studying the introduction of integrated learning system software in schools argues for a research approach involving mixed methods. 8 treatment and 8 control classrooms in one school district were investigated in order to test the effectiveness of the commercial Waterford Early Reading Program. Quantitative reading assessments were paired with observation and teacher input strategies. Only 120 students were tested for reading and writing achievement; unfortunately, the screening model used to ensure a distribution of low, middle and high literacy potential scores was abandoned in several instances and random selection used. Despite obtaining quantitative statistical evidence that the Waterford program overall had little effect on literacy development, the researchers express their belief that qualitative methods contributed greatly to the interpretation of the results. Researcher observation and teacher survey and interviews allowed the introduction of teacher variables, which indicated significant positive results for facilitative versus directive classrooms (Paterson, Henry, O’Quin, Ceprano, & Blue, 2003).

Fu and Lamme (2002) make a strong case for including teachers, parents and children in qualitative portfolio assessment. This documentation serves to balance the power allotted to standardized evaluations, which only capture one moment in a person’s literacy development (Fu & Lamme, 2002). Dialogue with the surrounding elements of a child’s literacy achievement can lead to new perspectives, such as Paterson’s (2003) discovery of the impact of teacher instructional method. Boudreau (2005) found that children’s reading performance as assessed by parent questionnaire strongly corresponded to research examination results. Two recent studies using a parent survey and a questionnaire incorporated parental involvement in the literacy program. Key factors found as a result of these collaborations were that parental involvement was a positive influence on program attendance (Borman, Benson, & Overman, 2005), and that parental involvement and encouragement supported improvements in writing (Saint-Laurent & Giasson, 2005).

Many voices have called for the production of creative output of children as a means of inducing participation in their own learning strategy. One group found children's authoring to be the most substantial remediation technique for at risk children (Leal, Johanson, Toth, & Huang, 2004). Riley and Reedy (2005) found 5-7 year old children were able to develop clear arguments related to current events in written texts after participation in a writing program. However, children cannot always write on command, and flexible approaches to support their own choices of output is encouraged (Fu & Lamme, 2002).

Krashen (2003) proposed free voluntary reading works because it is comprehensible input produced in a low-anxiety situation. Alternatively, comprehensible output is claimed to have limited effect on language acquisition, as it produces a reduced vocabulary as opposed to input, and can be anxiety inducing (Krashen, 2003). While it may not directly aid reading development, writing is found to be able to develop thinking skills, promoting preparation, reflection and self-structure of time (Krashen, 2003; Krashen, 2004; Riley & Reedy, 2005). One studies' results prompted the authors to conclude that more research was desirable that gathered prolonged "naturalistic writing samples, where students have had time for concept development and revision (Hobbs & Frost, 2003, p. 352)." Elsewhere, the instructor guided construction of "literacy events that employ high levels of student engagement in speaking, reading, and writing" is asserted to be a crucial factor in children's literacy self-development (Paterson et al., 2003, p. 200-1). Krashen (2003) notes that "interaction can be a good source of comprehensible input" (p. 64) and praises Smith's literacy support via "enterprise" approach: "real, not realistic, problems which students genuinely want to solve, problems that naturally entail reading, writing and discussion (p. 78)." A report of a Canadian study tracking the embracement of multimedia authoring unfortunately does not produce any evidence to support its claims of improvements in testing, but observed that the method highly increased student motivation and confidence (Larose-Kuzenko, 2000).

Research Questions and Hypotheses

It is somewhat difficult to amalgamate the vortex of issues associated with podcasting. The desire for this study is to attempt to remain simple and grounded as possible. A broad range of data can combine to inform further study on some key questions:

1. Does involvement in a podcasting program influence the subsequent literacy assessment of late elementary aged children?
2. What portion of the children's time in each program was spent on reading, listening, writing, and speaking?

3. How do participants, parents and teachers evaluate their literacy skill progress during the time span of the research?
4. What genres, themes and issues recur in participants' podcast output?
5. Does the data collected appear to be equivalently distributed amongst genders?

In addition to these questions, it is the author's intention to consider several hypotheses that have been encountered through reading. Krashen's (2003; 2004) views on comprehensible input and output can be examined by comparison of the activity and assessment by treatment and control programs. Program evaluation data will test Krashen's (2004) pleasure hypothesis - "if an activity promotes language acquisition, it is enjoyable (p. 28)." The "participation hypothesis" considers access to ICT as a positive influence on young peoples' development:

First, the new opportunities for participation created by ICT may strengthen the civic engagement of those youth who are already active in this respect. Second, ICT may serve to mobilize young people not previously interested in any form of political or social engagement. Similarly, young people who do not read newspapers or follow the news on television may be attracted by the opportunity to participate in societal debate through the Internet (United Nations, 2004, p. 17).

While this study will be too limited to fully address this question, it will be interesting to see if program results sway in favour of this argument.

The author does not expect significant results from either program, and proposes a null hypothesis, that reading assessment levels in either program will not measurably change, nor will either program significantly outperform the other. It is possible we may be measuring a reading loss as students will be out of school during the program span. It is expected that the FVR program will be observed to allot more time to student input (reading, listening) while the podcasting program will be observed to allot more time to student output (writing, speaking), although to be considered a substantial difference either outcome would have to double the observed quantity of the other. No bias is declared in regards to outcomes from participant, parent and teacher interviews, nor are there any expectations as to the nature of the children's podcast productions.

It is hoped that beginning to answer these questions can serve to instruct the incorporation of ICTs, specifically, podcasting, into public library programming. For the purposes of this study, *podcasting* is defined simply as a digital audio medium of communication. It remains to be determined if this medium is suitably equipped to assist public library goals of literacy acquisition.

Methodology

A mixed method sequential transformative strategy will be employed in this study. The data collection will be primarily quantitative, drawn from a range of literacy assessments. Further quantitative data will be gathered via participant, parent and teacher interviews administered by questionnaire, a process that will contain some open enough questions to produce qualitative data that will be coded for repetition amongst respondents. Additional qualitative data will be produced during the program via instructor limited note taking on input versus output activities, mandatory post session journaling of observances, and participants' podcast output. This strategy is being used in order to provide means to balance the acquisition of objective assessment data with recognition of the participants' role in the process of voluntary learning.

Two sets of two groups of no less than 9 and no more than 10 students each will be involved in a summer literacy support intervention. One set will be enrolled in the treatment podcasting program, the other set in a FVR centred program. 40 spots will be held and participants will be recruited via partnerships with local schools. Criteria for recommendation will be deferred to the discretion of the education liaisons consulted for the project. A commitment to full participation and completion of both the programs and the study will be solicited from parents or guardians. Inquiries will be accepted to the program option of their own choosing on a first come, first serve basis, alternating amongst groups a and b until filled, with four slots in each group held for gender type. Participants are required to reside in the Greater Toronto Area and be entering the sixth grade in the same school in which he or she completed the previous year's study. It is also necessary that the students in the study have previously completed the third grade EQAO assessment. The school must be affiliated with either the TDSB or TCDSB.

All groups will be administered and by the author and a co-instructor, supported by two voluntary program assistants. Both programs will be offered in the same room, two nights of the week with one representative of each type of program each night. The room will be a comfortable, if spartan, dedicated space without outside disruption during the session period. The principle difference in program room layout will involve a three walled, cubicle-style structure at the end of one room, in order to facilitate quality sound for podcast recording. All other activities for both groups will occur at tables, one per group. The order of the programs will be reversed for each of the two nights. Groups are expected to form along gender lines, into either two groups of five or three groups of five, three and three. If mixed grouping is

requested by participants it will be permitted, but in this case will be alternated weekly if it is thought to be in the best interests of all participants.

Both programs will contain elements of free voluntary reading, as (a lesser amount of) print materials directly related to the program podcasting theme will be made available to the podcast groups. The FVR group will be allotted the same amount of time for reading as the podcast group receives for reading, broadcast, and computer time. Other segments will be matched as follows - writing and preparation time allotted for the podcast group will be represented in the FVR as free voluntary writing segments where open ended writing and drawing is encouraged. Equivalent listening time will be allotted to both groups. The treatment group will have a wide variety of podcasts available to them and will be instructed on how to find, access and subscribe to podcasts. The control group will have access to only selected podcasts as well as a variety of audio books, but no computer access. Reading will be allowed at any time as a substitute activity, for either group, if so desired. Discussion amongst peers will be mostly unrestrained other than during small group instructional periods.

Representative background information on the living environments of participants will be retrieved using 2001 census tract data (*Census of Canada, 2001*). Comparative statistical analysis will be used to determine if there is variance amongst the groups in terms of combined census tracts. The mean determinants of variables such as household value and language will be compared to those of the entire Greater Toronto Area. Some data such as household income and ethnic affiliation will be compared to responses during parent interviews to inform on representativeness.

The programs will run weekly for 11 weeks beginning the third full week of June. The summer period is known to be a time of potential literacy loss. This is termed the 'summer slide' and may accumulate over time to effectively impair reading achievement (Borman et al., 2005; Schacter & Jo, 2005). Summer is also an ideal time for study as the participants will not be influenced by the school curriculum. Participation in other outside concurrent programs can not be controlled for but will be discovered through parent interviews. Each individual class will run two and one half hours. The schedule will follow this format:

Half hour program time - 15 minute break - Half hour program time - 15 minute break -

Half hour program time - 10 minute break - Half hour program time - End.

The podcast program will be scheduled to consist of the following portions: 25% reading, 25% listening, 25% print and verbal composition and preparation and 25% recording and editing computer time. The FVR program will thus be scheduled to contain: 50% reading, 25%

listening, and 25% print free composition. The podcast groups will have to rotate tasks to allow for maximum distribution of computer access, and each participant will have the opportunity each session to contribute to a 6 minute group podcast and perform a 2 minute individual improv-cast. Podcasts will only be edited by instructors in order to voluntarily concede to CRTC broadcast regulations. Podcast participants will be given both written transcripts of their own work and copies of the complete groups' podcast output on their parents indicated choice of mp3 file, burned CD-R, or recorded cassette.

Assessment of participant literacy levels will be accessed in the following ways, prior to the commencement of programs. First, reading and writing skills will be tested using an instrument modeled by an education specialist on the reading and writing portion of the EQAO sample test. The test will also be administered and graded by the education specialist. In order to uncover a broad range of information on our participants, other 'literacies' will also need to be assessed. Media literacy will be investigated by adapting the procedure used by Hobbs and Frost (2003). The print portion of their assessment will be discarded, but the other two elements of the testing - evaluation of public radio and television newscast - will be conducted. Comprehension skill results are based on student response to open-ended questions that are coded to measure ability to identify purpose, target audience, construction techniques, point of view, omissions, and comparison-contrast. This assessment is felt to be valuable because it will allow for the consideration of the transferability of literacy skills across formats (Hobbs & Frost, 2003). We are mostly interested in the audio, listening, component, but feel the television component should remain for comparison purposes.

Participants will also be assessed for information literacy, ICT skill levels and library anxiety. Information literacy will be assessed using a model modified for this age group. A satisfactory test for these skills, however, has yet to be discovered. ICT skill levels will be self-assessed by students during interviews using some questions derived from McLelland and Crawford (2004). Library anxiety will be investigated using an age appropriate approximation of the Bostick's (1992) Library Anxiety Scale. While this model has primarily been used on undergraduates, its connection to reading ability has interested this author. The scale will also be attempted to be improved, in account of findings that appeared to cause users not as in need of library services to report negatively (Jiao & Onwuegbuzie, 2003).

Initial interviews will also take place before the programs begin. The parent interview will be conducted using a version of the questionnaire supplied by (Boudreau, 2005). Thirty to forty questions will be asked, using a five point scale for most answer but with roughly a

quarter of all questions open-ended (i.e. can you give some examples of literacy growth you have noticed in your child?) This will require tailoring to fit an older age group, and will include queries about family audio listening habits. In addition, some background and demographic data will be solicited from parents. Teachers will be subject to shorter interviews with approximately ten literacy skill assessments on a five point scale, preceded and ended by open-ended questions addressing the child's literacy potential. One area of interest that teachers will be able to inform on concerns a participant child's willingness to read aloud.

Children will be interviewed using an adapted, expanded version of Suoranta & Lehtimäki (2004)'s (twenty-seven question) questionnaire. The instrument covers children's involvement with literacy, media and technology, and is primarily composed of yes/no, multiple choice, and true/maybe/not true questions, with six final open-ended questions concerning interests, activities and outlook. We would add questions concerning audio listening habits, as well as inquiries to uncover favourite genres and themes.

Podcasts will be interpreted both in audio and transcribed paper form. The episodes will be coded by genre (news, storytelling, personality, politics, comedy, music, reviews, sports, shut-outs, technology, theatre, variety) and themes (to be determined). The author will interpret the participants output in a manner influenced by Dyson (2001)'s "emphasis...on literacy learning as a process of text appropriation and recontextualization (p. 35)." References to popular media and current events will be highlighted, and special attention will be made to look for the ways in which these children have revealed their own expanding social spheres through their work. Quantitative analysis of the podcasts will also look at factors such as episode length and individual participant airtime.

The program will also be monitored via a still-in progress method of recording instructor observances of participant input versus output. It is essential that this be done in a way that does not disrupt program flow and distract the children. As well, all four instructors and research assistants will be required to reflect post-session for fifteen minutes in notebooks, which will be examined for recurring ideas, coded and analyzed.

Children and parents will be re-interviewed prior to the final session, which will comprise a party with parents invited to attend. These interviews will be shorter than the initial interviews, and focus on evaluation of the program and on participants' experience of reading or podcasting. Following completion of the program, all tests will be re-administered to participants. While these will be based on the same models and geared for the same age level as the original tests, they will be either entirely new material (in the case of the EQAO and

media literacy assessments) or reordered/restructured in order to prevent influence of memory (information literacy, ICT skill levels). The participants' scores on the subsequent school year's EQAO sixth grade assessment will be obtained. Interviews will be conducted with the child's sixth grade teacher after the official test has taken place but before the results have been obtained. These interviews will be done using questionnaires that closely match those used to initially interview the fifth grade teachers.

The assessment data will be used to measure the difference between the participants and groups prior to and following the interventions. ANOVA statistical techniques will be used to determine if there were significant differences amongst the four groups in terms of performance on each test. This will be employed to account for variation of levels of ability amongst groups, a factor that may require additional statistical analysis to account for. Pearson correlation will be used to determine if there are significant differences amongst pre and post tests, and it would be prudent to also use correlation to determine relationships between skills tested (for example, library anxiety score versus EQAO performance). Gender, language (first, home), home literacy and ICT environment, and income levels are to be considered as variables. Interview data and qualitative information gathered will be used to supplement and advise the assessments. Observations on program time spent on input versus output activities will be compiled to determine the actual breakdown and differentiation of these activities between the FVR and podcast modules. A comparison will be made between the literacy attitudes and outlook of participants, parents and teachers against the test results and podcast output. Finally, the podcast output will be analyzed in terms of recurrence, social recontextualization and quantitative output.

Conclusion

As is perhaps clear, this proposal is still in the process of preparation. The author is aware of many limitations that need to be addressed. Foremost of all, it is declared that the author has no education specialist background and is not an expert on literacy. The interest here is based on the role of public libraries to support literacy in all its forms. The methodology should not be viewed as an endorsement or lack thereof of standardized testing, nor is any firm knowledge claimed surrounding the issues of standardized testing. EQAO and EQAO styled assessment are given central emphasis here because it is believed that the public library must support the actual situation facing our patrons. Since children in the Greater Toronto Area, and by extension, their parents and teachers, are subjected to this manner of

testing it is believed that it must form a part of the study. This research could not be performed adequately without a partnership with researchers with an educational specialist background, preferably with interest and experience in literacy acquisition and assessment.

It should also be clear that much work needs to be done defining, refining, pre-testing and, as in the case of information literacy assessment, choosing the exact methodology of collecting and analyzing assessment, interview, observational and podcast data. Permission for use of all instruments, for research with children, and school board cooperation must be acquired. The study needs to be informed by further reading in areas touched upon, such as Library 2.0; some ideas, such as videotaping the programs for observation, has been omitted due to the need for input surrounding best practices. The use of census tract data to benchmark representativeness is speculative at this point (it is assumed more recent data will become available) and requires consultation. A frame has been constructed in order to develop a clearer view of the overall goals and direction the study, but it is understood that, as constituted, the proposal in place would have a difficult time managing the complexity of the topic, let alone the rigor of academic scrutiny.

There will not be a significant enough sample size to produce results that can be deemed reliable and externally applicable. This is unavoidable in this situation. Research literature with children, and particularly in regards to interventions, appears to often be restricted to manageable numbers. The particular situation in place specifically requires small group sizes to adequately function. It is hoped that employing a range of strategies will lead to some insight to the intervention effect, or lack thereof, on participants. While true random sampling may lead to more representative groupings of participants, it is felt that the inclusion process needs to reflect somewhat the principles of public library service. Participant switching amongst groups may be explored if significant variation is determined after initial testing, but only if it is deemed to be not overly disruptive. A non-participatory control group was not included because it was felt to be unrealistic to expect such a degree of cooperation for no return, and because it is thought that available school data can suffice. It is admitted that participation involves some self-selection (Borman et al., 2005; Friedland & Truscott, 2005). The research criteria may restrict children without an adult to solicit for them; as well, the recommendation process may deliver a sample of children struggling with literacy. Allowing choice of program may entice parents with bias in either direction, but parental commitment to the program goals requires this choice.

It is acknowledged that there is a budget discrepancy between the treatment and control groups which may affect the outcomes. While it is felt that the technological component is one that public libraries will need to invest in regardless, and will be usable for purposes other than podcasting, for a start-up program, there is a fairly substantial initial outlay. This will hopefully be mitigated by seeking donated, used and base-line equipment. The program is such that the best technology is not necessary, and podcasting is generally viewed as a scalable ICT activity (Herrington, 2005). Nonetheless, it has been observed that only a portion of the investment in technology could provide a broad range of interesting materials to support FVR. In order to attempt to ensure fairness and transparency, the FVR program will be allotted at least half of the podcast budget. Further research will be undertaken to find out if this will be adequate. Final expenditures for each program will be given, and budgets for print materials used for both programs will be applied evenly.

This study can contribute to a wide variety of academic and professional discussions. A broad spectrum of issues converge here that would extend the work to popular interest. Gaps in the literature featuring this age group, the pairing of ICT and literacy, and research in public libraries can be addressed. It would also signal a shift away from research focused on commercial products to ICTs that have out of school significance. It is believed that journals featuring young people, public and school library settings, and literacy would be particularly interested in the findings. As well, the project would transfer well to lecture and conference settings, and workshops could be used to interactively involve interested parties. Given governmental emphasis on this type of skill development, acquiring funding seems a reasonable possibility.

While limited in sample size, the scope of this study could be expanded to include larger numbers or be conducted longitudinally. The project model could also be applied to other library programming featuring other forms of ICTs. It would be particularly interesting to see mixed programming in future replications, with treatment and control groups each receiving opposite proportions of ICT and FVR time. Different grade levels or degrees of autonomy could be explored. In all, this could present an opportunity to begin a new direction in information research for children.

References

- The enzyme that won; web 2.0. (2006). *The Economist (US)*, 379(8477), 80US.
- Census of Canada, 2001: Profile Files: CMA Toronto Subset* [Computer File]. (2001). University of Toronto, Data Library Service. Retrieved June 30, 2006 from http://prod.library.utoronto.ca:8090/datalib/datar/cc01/profile/495/to_ctprof01.ivt
- Abram, S. (2006). *Web 2.0 and library 2.0 - the librarian 2.0 in your future* [Presentation June 15, 2006]. CLA 2006 - libraries build communities. Ottawa, Ontario. June 14-17, 2006. Retrieved August 08, 2006 from <http://www.cla.ca/conference/2006/program-technology.html>
- Adkins, D., & Esser, L. (2004). Literature and technology skills for entry-level children's librarians: What employers want. *Children and Libraries: The Journal of the Association for Library Service to Children*, 2(3), 14-18, 21.
- Anderson, S., & Julien, H. (2003). The public library in "Connecting Canadians". *Canadian Journal of Information and Library Science*, 27(4), 5-29.
- Borman, G. D., Benson, J., & Overman, L. T. (2005). Families, schools, and summer learning. *Elementary School Journal*, 106(2), 131-150.
- Bostick, S. L. (1992). *The development and validation of the library anxiety scale* [Thesis]. Wayne State University.
- Boudreau, D. (2005). Use of a parent questionnaire in emergent and early literacy assessment of preschool children. *Language, Speech, and Hearing Services in Schools*, 36(1), 33-47.
- Cuddeback, M. J., & Cetrano, M. A. (2002). The use of accelerated reader with emergent readers. *Reading Improvement*, 39(2), 89-96.
- Dyson, A. H. (2001). Where are the childhoods in childhood literacy? An exploration in outer (school) space. *Journal of Early Childhood Literacy*, 1(1), 9-39.
- Education Quality and Accountability Office (EQAO). (2005). *Educator resources: Grade 3 and grade 6 assessments of reading, writing and mathematics*. Retrieved August 08, 2006 from <http://www.eqao.com/Educators/Elementary/036/036.aspx?Lang=E&gr=036&Aud=Educators&App=Educators>
- Eyre, G. (2003). Back to basics: The role of reading in preparing young people for the information society. *Reference Services Review*, 31(3), 219-226.
- Friedland, E. S., & Truscott, D. M. (2005). Building awareness and commitment of middle school students through literacy tutoring. *Journal of Adolescent and Adult Literacy*, 48(7), 550-562.

- Fu, D., & Lamme, L. L. (2002). Assessment through conversation. *Language Arts*, 79(3), 241-250.
- Girard, B. (Ed.). (1992). *A passion for radio: Radio waves and community*. Montreal PQ: Black Rose Books.
- Girard, D. (August 02, 2005). Texting doesn't hurt grammar. *Toronto Star*. Retrieved August 06, 2006 from http://www.thestar.com/NASApp/cs/ContentServer?pagename=thestar/Layout/Article_Type1&call_pageid=971358637177&c=Article&cid=1154470209972
- Girard, B., & Siochr au, S., United Nations Research Institute for Social Development., & World Summit on the Information Society. (Eds.). (2003). *Communicating in the information society*. Geneva: United Nations Research Institute for Social Development.
- H rk nen, R. (1995). Building the future: Communication camps--the real utopia! *Computers in Human Services*, 12(1-2), 133-140.
- Herrington, J. D. (2005). *Podcasting hacks*. Beijing: O'Reilly.
- Hobbs, R., & Frost, R. (2003). Measuring the acquisition of media-literacy skills. *Reading Research Quarterly*, 38(3), 330-355.
- Jiao, Q. G., & Onwuegbuzie, A. J. (2003). Reading ability as a predictor of library anxiety. *Library Review*, 52(4), 159-169.
- Krashen, S. D. (2004). *The power of reading : Insights from the research* (2nd ed.). Westport, Conn.: Libraries Unlimited.
- Krashen, S. D. (2003). *Explorations in language acquisition and use: The Taipei lectures*. Portsmouth, N.H.: Heinemann.
- Larose-Kuzenko, M. (2000). We've done research, now what? Multimedia authoring as a report tool. *Teacher Librarian : The Journal for School Library Professionals*, 27(3), 12-16.
- Leal, D., Johanson, G., Toth, A., & Huang, C. (2004). Increasing at-risk students' literacy skills: Fostering success for children and their preservice reading endorsement tutors. *Reading Improvement*, 41(1), 51-72.
- Mallette, M. H., Henk, W. A., & Melnick, S. A. (2004). The influence of accelerated reader on the affective literacy orientations of intermediate grade students. *Journal of Literacy Research*, 36(1), 73-84.
- Marchi, S. (2003). *Canadian statement to the world summit on the information society*. Retrieved August 04, 2006 from <http://www.wsis-smsi.gc.ca/act/en/docs/CanadianStatement.pdf>

- McLelland, D., & Crawford, J. (2004). The Drumchapel project: A study of ICT usage by school pupils and teachers in a secondary school in a deprived area of Glasgow. *Journal of Librarianship and Information Science*, 36(2), 55-67.
- Paterson, W. A., Henry, J. J., O'Quin, K., Ceprano, M. A., & Blue, E. V. (2003). Investigating the effectiveness of an integrated learning system on early emergent readers. *Reading Research Quarterly*, 38(2), 172-207.
- Reynolds, B. A., & Reynolds, W. A. (1988). The Siskiyou County READ project: A success story in rural adult literacy. *Library Journal*, 113(19), 43-45.
- Riley, J., & Reedy, D. (2005). Developing young children's thinking through learning to write argument. *Journal of Early Childhood Literacy*, 5(1), 29-51.
- Saint-Laurent, L., & Giasson, J. (2005). Effects of a family literacy program adapting parental intervention to first graders' evolution of reading and writing abilities. *Journal of Early Childhood Literacy*, 5(3), 253-278.
- Schacter, J., & Jo, B. (2005). Learning when school is not in session: A reading summer day-camp intervention to improve the achievement of exiting first-grade students who are economically disadvantaged. *Journal of Research in Reading*, 28(2), 158-169.
- Suoranta, J., & Lehtimäki, H. (2004). *Children in the information society : The case of Finland*. New York: P. Lang.
- Toronto Catholic District School Board (TCDSB). *Alphabetical school directory*. Retrieved August 04, 2006 from <http://www.tcdsb.org/schools/alphabetical%20school%20directory.html>
- Toronto District School Board (TDSB). *School profiles*. Retrieved August 04, 2006 from http://www.tdsb.on.ca/schools/school_profiles.htm
- United Nations. Department of Economic and Social Affairs. (2004). *World youth report 2003: The global situation of young people*. Retrieved August 04, 2006 from <http://www.un.org/esa/socdev/unyin/documents/worldyouthreport.pdf>
- Walter, V. A. (2003). Public library service to children and teens: A research agenda. *Library Trends*, 51(4), 571-589.
- Wood, C. (2005). Beginning readers' use of "talking books" software can affect their reading strategies. *Journal of Research in Reading*, 28(2), 170-182.
- World Bank. (2005). *Global ranking: Knowledge economic index (KEI): 2003-2004*. Retrieved August 06, 2006 from http://info.worldbank.org/etools/kam/kei_table.asp
- World Economic Forum (WEF). (2005). *The networked readiness index rankings: 2004-2005*. Retrieved August 06, 2006 from

http://www.weforum.org/pdf/Global_Competitiveness_Reports/Reports/GITR_2004_2005/Networked_Readiness_Index_Rankings.pdf

World Summit on the Information Society (WSIS). (2003a). *Geneva Declaration of Principles*. First phase of the WSIS (10-12 December 2003, Geneva). Retrieved August 04, 2006 from http://www.itu.int/dms_pub/itu-s/md/03/wsis/doc/S03-WSIS-DOC-0004!!PDF-E.pdf

World Summit on the Information Society (WSIS). (2003b). *Geneva Plan of Action*. . First phase of the WSIS (10-12 December 2003, Geneva). Retrieved August 04, 2006 from http://www.itu.int/dms_pub/itu-s/md/03/wsis/doc/S03-WSIS-DOC-0005!!PDF-E.pdf