

THE VIRTUAL SCHOOL GATE: STORYPARK AN ONLINE MEETING PLACE FOR FAMILIES, TEACHERS, AND THERAPIST.

James Sutherland & Dave Speden

INTRODUCTION

Conventional definitions of place and community have been challenged over the past 20 years as humans have replaced, or augmented, occupation in physical place with online activity. This research used a qualitative methodology to examine how therapists, teachers, parents, and family members perceive the use of an e-portfolio platform (Storypark) to support the Kimi Ora School community. Kimi Ora is a special needs school located in Wellington, New Zealand. It is a school that caters for a diverse range of students with high, and very high complex special needs. Kimi Ora students come from a large geographical catchment area. Contact between school and home is reliant on use of student communication journals, emails, phone calls, and the use of Storypark. Storypark is a secure social media platform that enables education providers and families to share photos, videos and text about students learning activities. Although labeled an e-portfolio, Storypark enables virtual community through the engagement of multiple parties with a shared interest. A literature review of e-portfolio use in special needs schools did not produce significant results, indicating a gap in research. The benefits of e-portfolio use in mainstream schooling has been researched in a number of empirical studies, indicating e-portfolio use compliments current teaching practices while also engaging students and the wider family network in classroom activities. Nine semi-structured qualitative interviews constituted the primary form of data collection, with contextual information about the setting and Storypark gathered from secondary sources. Findings indicate the e-portfolios platform is the 'right fit' for the context.

Background

Humans' comprehension of place and community is a process of continuous evolution. Change in communal life is consequently echoed in change in society (Prodnik, 2012). Change impacts on people, place and occupation. Until recent human history definition of community has been geographically circumscribed (Castree, Kitchin, & Rogers, 2013). Community was sustained by regular connection in physical place, where the proximity of place both enabled, and directed our occupational interactions with one another. Humans have, and continue to, connect most often with those whom we share physical place, those who are in close proximity. These conventional definitions of place and community have been challenged over the past 20 years as we have replaced, or augmented, our occupation in physical place with occupation in online place, community, and domain.

One of the most momentous developments that has accompanied the widespread acceptance of the internet is the emergence of virtual communities with attributes that are not bound to share geography. An ability to engage with others online has impacted on how humans work, learn, play, create, communicate, and manage daily occupations. Our online exchanges have intertwined with our real world interactions in place. Virtual community can be defined as a community of people sharing common interests, ideas, and feelings over the internet (Virtual Community, 2017). There is a broad scope to what fits under this definition including, but not limited to, chatrooms, social

networking site, and virtual worlds. Although not constrained to a specific physical setting, virtual communities still possess distinction between their members and non-members, having specific purposes which delineate them as communities in their own right (Pears, 1998).

Kimi Ora School's use of an e-portfolio platform (Storypark) to sustain and benefit their community, complimenting real world interactions between teachers, therapists, and school families for the benefit of students' health, wellbeing, and education. Within the literature there is no universally agreed definition of what an e-portfolio is. E-portfolios have been widely adopted in the field of education from preschool to tertiary education however the differing nature and scope of e-portfolio use has resulted in varying understandings and definitions. In its simplest form an e-portfolio is a collection of electronic evidence assembled and managed by a user, or users. Storypark is a platform that allows the engagement of multiple users who all hold a shared interest in a student who attends Kimi Ora. Although Storypark is labelled as, and broadly fits under the definition of an e-portfolio, the engagement of multiple parties with shared interest also fits the criteria of a virtual community.

The conclusions in this paper are based on collaborative qualitative research conducted in 2016 between The Otago Polytechnics School of Occupational Therapy and Kimi Ora School. Relevant literature is reviewed and background information is provided on Kimi Ora School and Storypark. The research structure is outlined and findings are presented and discussed with implications noted for Kimi Ora School, occupational therapy, and other health professions.

Kimi Ora School

Kimi Ora School is a special needs school located in Wellington, New Zealand. It caters for a diverse range of students, aged from five to twenty-one years, with high, and very high complex special needs. Special educational needs are defined as any need that cannot be met within a regular, school, home or family setting without extra support. Students may have learning or communication delay, social, emotional or behavioral difficulty, physical and mobility restrictions, or a combination of these factors. Extra support in a learning environment is required to address student needs (Valentine, 2017).

Kimi Ora means, "seeking wellbeing in health". The school offers an holistic approach to education, working with the family to achieve the best outcomes for students. Occupational therapy, speech language therapy, physiotherapy, and music therapy are offered on site (<http://www.kimiora.school.nz>). Kimi Ora students come from the wider Wellington region. The vast majority of students are transported to and from school by a specialized taxi services. As a result, parents and family members do not have routine contact with the physical setting of Kimi Ora School and the staff that come with pick-ups and drop offs. 'School Gate' communications around pick up and drop off are recognized as being an important form of information exchange between teachers and families, even though they are often unstructured and happen at a demanding time for teachers (Zellman & Perlman, 2006; Stonehouse & Gonzalez-Mena, 2004). Considerable literature exists in relation to teacher-parent communication, and the importance of parental engagement in the success of a student's education (Olmstead, 2013). In New Zealand, the National Education Guidelines and National Administrative Guidelines mandate parental involvement in schools. These provisions are governed by section 60A of the Education Act 1989.

At Kimi Ora School regular contact between school and home is reliant on the use of written communication journals, emails, phone calls, formal parent teacher events, school events and for the past two years the use of Storypark (<https://www.storypark.com>). Kimi Ora has a history of trying to improve school and home communications via the use of technology. They subscribe to the theory that as access to technology continues to expand, the capabilities for connecting parents to schools will continue to grow (Olmstead, 2013). In the early stages of the schools investigation of technology Blogger, an online blogging tool, was identified as having potential. Its use was trialed at the school but issues related to usability, access, and reliability resulted in limited long term adoption in the functions of the school community. Storypark replaced Blogger, as a learning platform three years ago and it is now integrated into the schools operations.

Storypark

Storypark is a secure social media platform that enables education providers and families to share photos, videos, audio and text related to students learning activities. It was developed in New Zealand to be used in preschool education, where shared information contributes to a student's e-portfolio. An e-portfolio (electronic portfolio) refers to online spaces personalised to individuals through the presentation and collaboration of digital artifacts of achievement and learning to a selected audience (Ministry of Education, 2011; Becta, 2007; Goldsmith, 2007).

Storypark is accessible across multiple platforms (computer, tablet, smartphone), requiring an account to be set up. There is a subscription cost to maintain the service. Families and education providers make decisions about who has access to individual student's accounts, which are password protected. Families can invite significant others allowing them to view and contribute to content. Essentially they can create online communities focused around an individual student. Therapist and teachers can add content to individual sites as well as posting messages and information across multiple student sites.

Though Kimi Ora does not match Storyparks original target market, being a special needs school and not a mainstream preschool, the platform was trialed and found to have merit. StoryPark appealed due to its simplicity and ease of use. Prior to conducting our research incidental feedback from therapists, teachers, and families indicated Storypark was well regarded and widely used at Kimi Ora.

LITERATURE REVIEW

Prior to conducting this research the authors reviewed literature related to e-portfolio use in 'main stream' education, as well as e-portfolio use in 'special needs' education. In addition to this a wider review of e-portfolio use in therapy settings was undertaken (physiotherapy, occupational therapy, and speech and language therapy). This is in line with the therapy services offered at Kimi Ora. Key studies of virtual community were also appraised.

The benefits of e-portfolio use in mainstream schooling has been examined in a number of empirical studies, indicating e-portfolio use compliments contemporary teaching practices (Theodosiadou & Konstantinidis, 2015; Nicolaidou, 2013; Meyer & Latham, 2008; Buzzetto-More & Alade, 2006), while also engaging students and the wider family network in classroom activities (Papp, 2014; Ministry of Education, 2011; Strudler & Wetzels, 2008; Wade, Abrami & Sclater, 2005).

A search for literature of e-portfolio use in special needs schools did not produce significant results, indicating a gap in research. In regards e-portfolio use and students with disabilities there are some emerging studies that looked at use of e-portfolios in assisting students with disabilities in transitioning from high school to post-secondary learning environments (McBurney, Eaton, & Torunski, 2017). Occupational therapy and physiotherapy research on e-portfolios does exist but is focused on implementation in the training of therapists and not the use of e-portfolios in practice as a therapeutic tool or as a client record (Cordier, et al., 2015).

In relation to online learning communities, Booth's (2011) multiple case study of professional learning communities found that online communities had a greater chance of success if the following dimension were present: collective identity and clear purpose; leadership and effective moderation; opportunities for sharing knowledge, expertise, and experiences; governance structures and guidelines for participation, community sociability and usability; and the ability to measure success. When there is a balance of power across the various parties engaging, terms such as reciprocal engagement, shared decision-making, and participation are used to describe relationships (Hedges, 2010), and there are better outcomes for all involved (Stonehouse & Gonzalez-Mena, 2004).

Aims of the research

Research aimed to capture the perceptions of families, teachers and therapists in regards Storyparks use in the Kimi Ora community. More specifically the research was interested in how Storypark facilitated communication between therapist, teacher and families; what types of communication is fostered; how Storyparks use influenced teacher, therapist, parent relationships, and in turn the benefits to students on-going learning and therapy. In a broader sense we wanted to understand if Storypark has complimented and strengthened the Kimi Ora community, providing a 'virtual school gate' where regular and routine connections can be made between home and school. This would be true to Kimi Ora offering a holistic approach to education, working with the family to achieve the best outcomes for students.

METHODOLOGY

A qualitative research methodology was adopted for this study. Qualitative research is focused on understanding meaning and the lived experiences of those researched. Qualitative researchers are interested in the knowing of truth or what is considered to be true in the studied community (Creswell, 2008; Rubin & Rubin 2005; Snape & Spencer, 2003).

Data collection

Nine qualitative interviews were conducted at Kimi Ora, three with parents of students, three with teachers, and the remaining three with therapists (occupational therapy, physiotherapy and speech language therapy). An interview guide, topical approach, was used. This entailed a set of questions based on themes informed by the literature review and knowledge of the setting. Research participants were supplied with the interview guide one week in advance of their interviews.

Data analysis

Interview transcripts were subjected to an analytical phase using the 'Framework' matrix tool. Developed by the Qualitative Research Unit at the National Centre for Social Research in the United Kingdom Framework requires the organisation of data into a series of matrices from which a thematic analysis is conducted (Smith & Firth, 2011).

Ethics approval

Ethical approval for this research was granted by the Otago Polytechnic Ethics Committee in 2015.

RESULTS

Findings indicate Storypark is the 'right fit' for the context. For those interviewed the expression of 'right fit' was based on comparison with previously used platforms, notably Blogger. All interviewed parties perceived Storypark as a highly valued, if not essential tool that supports the Kimi Ora community, specifically the learning and health and wellbeing needs of students. All participants felt the use of Storypark had improved connections between home and school and in turn the wider Kimi Ora community. Storypark is a regular, routine, and relied upon communication tool, complementing, written journals, emails and irregular face-to-face meetings. These findings relate to Booth's (2011) identification of usability and clear purpose as dimensions of successful virtual communities.

Further to the identification of usability, ease of use and the simplicity of the platform were commonly cited reasons for the wide spread adoption of Storypark. Therapists and teachers perceived Storypark as a tool, which required limited initial training, with support readily available if needed by phone and email. Staff also supported each other in the use of the platform. Parents and family members appreciated the ability to access Storypark across multiple platforms (phones, iPads, laptops). They noted that limited time was required to pick up the basics of using Storypark. All parents and families interviewed were able to invite participants and communicate with them and teachers and therapists.

Therapist, and teachers, felt Storypark had significant value in regards to sharing and recording students learning. This was due to recorded information being more dynamic (multiple media) and easier to distribute to parents and families. Each student's e-portfolio provides a record of learning and treatment, which was seen as being superior to traditional note taking. Progress can be seen, teaching and therapy reinforced, and information is easy to retrieve and analyse. This archive of retrievable information allowed for measurement of Storyparks use by participants as well as measurement of student progress in learning, communication and other occupations (Booth, 2011).

Storypark was seen to provide opportunities for repetition and reinforcement of therapy exercises. Sharing knowledge, expertise and experiences (Booth, 2011). For example the speech language therapists post videos for the sign of the day, while the physiotherapist and occupational therapist would post regular videos of activities and treatment sessions. The availability of Storypark across multiple platforms meant content for student's individual accounts can be premeditated alongside lesson and therapy planning sessions, as well as being spontaneous. The physiotherapist shared an example of capturing a student's walking gait over an uneven surface when on a beach trip. Having the Storypark App on her phone meant she could capture the event via video and post content within five minutes, receiving a reply from parents within 20 minutes.

Type of communication fostered

All therapists felt their use of Storypark helped affirm their practice, enabling a feedback loop with families, where feedback was regular and prompt. Feedback is not only encouragement for the students but is also recognition of the hard work being done by teachers and therapists. In addition to family feedback, therapists placed value on seeing what other therapists and teachers were doing with individual students. Although therapists and teachers work closely in the physical setting, content posted to Storypark provided an overview that emphasised different professional approaches while reinforcing the connection between the different professional approaches. Storypark is seen to assist the definition of teaching and therapy roles while also showing how each party collaborates (Booth, 2011).

Three respondents (two therapists and one teacher) were conscious that the platform had the potential to be focused on the celebration of student achievements rather than a fuller clinical/educational picture of the student's progress. This view was based on the limited regulation of how Storypark is used in the setting compared to traditional note taking, as well as the possibilities provided by a multimedia platform versus a text account. There was awareness that Storypark was used in an unregulated way, informally guided by the professional practices of teachers and therapists. Storypark was seen as an adjunct to clinical notes.

Family members felt Storypark provided a valuable link to Kimi Ora, affording details about day-to-day school life and their child's progress. Families regularly responded to posts often supplying text-based feedback. They valued the control they have over individualised accounts, allowing them to make choices about sharing information with others. They noted that those they have invited to contribute to their child's Storypark account are now more engaged with their children. They are able to post comments to Storypark, or follow up on what they have seen online with real world conversations and interactions. Families value the capability to involve those geographically distant to Wellington with the Kimi Ora community. This links with Booths (2011) identification that successful virtual communities have dimensions that enable knowledge/information sharing and governance of who has access to this information.

While Storypark has undoubtedly benefited the Kimi OraSchool community its use is not yet viewed as being reciprocal, being weighted towards school-based posts over posts from home. Therapists and teachers noted that posts from home, although prompt and regular, are often limited to text. They were unsure why families and parents were not making fuller use of the platform, with some speculating that limitations could relate to time restrictions and the need for more training, support and encouragement. All therapists and teachers said they would value more multimedia posts from the home environments of students. Both families, therapists, and teachers agreed that any additions to shared knowledge of what a student can and cannot achieve at home and at school is an important factor in consistency of approach between school and home ultimately benefiting the students' education, health and well-being. Parents and families noted they regularly responded to posts from teachers and therapists, acknowledging text only postings were due to lack of knowledge, as well as time limitations. All families stated they would value additional training and guidance. This inequity in use and the desire for more reciprocal information sharing links with Booths (2011) identification of the balance of power, where reciprocal engagement leads to better outcomes for all (Stonehouse & Gonzalez-Mena, 2004).

Therapists felt their professional practice helped to set boundaries around what was recorded and how it was shared. They felt practising true to their profession enabled trust in the materials they posted. Although all teachers, therapists and parents monitor what they posted to StoryPark there is provision for moderating and enforcing

boundaries around content posted. This provision exist within the schools hierarchy as well as the avenues through which parents can express their concerns. Interviews with participants highlighted limited concerns about content posted and the security of information. The School hierarchy was trusted, if needed, to provide effective moderation and leadership (Booth, 2011).

DISCUSSION

In line with Prodnik's (2012) quote at the beginning of this article Kimi Ora School is a community in transition, where the interactions of home and school are effected by technology. Storypark supports and enhances the real world Kimi Ora community, which exists in the physical school as place. Storypark provides knowledge and sustains relationships between school and home, augmenting real world interactions at formal and informal school events and meetings. Storypark use has strengthened connections between families, teachers, and therapist, benefiting the education, health and wellbeing of students. It has enabled regular and reliable interactions between parties addressing geographic and transportation barriers specific to Kimi Ora as a special needs school.

The value of Storypark to the school community is evident in the research findings. Therapist, teachers and families value what it has provided. Storypark is a tool that has been accepted because of ease of use, affordability, and the dynamic nature of multimedia recording possibilities. Each students account is not only a repository of rich information about their learning, therapy, and daily life at school, it is also a 'place' where invited members can visits and contribute. Storybook accounts are virtual communities where the purpose and identity of the community is centred on the student. The results of this research evidence positive association to Booth's identified dimensions of successful virtual communities collective identity and clear purpose; leadership and effective moderation; opportunities for sharing knowledge, expertise, and experiences; governance structures and guidelines for participation, community sociability and usability; and the ability to measure success.

Although Storypark has proven effective in the setting there are identified issues in relation to the reciprocal nature of information sharing between home and school. As noted in the findings there are disparities in the use of Storypark within the community. Therapist and teachers are more active in posting information in multiple media formats. Although replies are regular from the home environment they are often text based. This research indicated a misunderstanding between therapist, teachers and families about the sharing of information. Therapist and teachers would value more photos and videos from home but have not made this explicit to families. Although time restriction was stated as a factor for contributions from home this was only one factor. Families would be willing to contribute photos and videos to Storypark if teachers and therapist encouraged them. To do so they would appreciate further training. At the time of writing the school was addressing this issue in partnership with Storypark. Storypark also released a support and training App in early 2017 which is being utilised as this community continues to develop their use of Storypark, and potentially other online platforms. There are some unique possibilities around a more reciprocal approach to information sharing which in theory will be of benefit to all parties particularly students. When there is a balance of power across the various parties there is potential for better outcomes for all involved (Hedges, 2010; Stonehouse & Gonzalez-Mena, 2004). Kimi Ora will continue to develop as a community and as such the use and fit of platforms like Storypark needs to be monitored so benefits are maximized and problem are addressed. Tools, like Storypark, will continue to evolve to meet needs or be surpassed by other programs. Assessment of the 'right tool for the job' is an ongoing process for communities.

In this setting therapists (speech language, occupational therapy, physiotherapy) all acknowledged the benefits and possibilities of using e-portfolios as their main recording platform, however they are required to practice note taking in a traditional sense. This poses a challenge to these professionals in regards to how opportunities are realised and integrated and the formal acceptability of Storypark as a professional record. If Storypark or any other e-portfolio platform were to be adopted as an official note taking repository questions would be raised about the security of information and who has access to specific areas. Therapists have professional guidelines and competencies they must adhere to. Any change in recording platforms from traditional note taking would challenge conventions especially if others (clients and families) had control over the sharing of information. Professional adoption platforms like Storypark would require professional bodies to create new policies and guidelines for recording and sharing information. However given the potential of tools like e-portfolios further investigation is warranted.

It should be noted that this research is narrow in scale and hence any claims of application or implication for similar setting are limited. Given that lack of other research in this area there is potential for larger scale research on the use of virtual community to support home and school connections in special needs schooling.

CONCLUSION

Through the active use of Storypark Kimi Ora has enhanced communication and interaction between the home and the school environments, in turn strengthening their community. Kimi Ora School is a community that is not just fixed to a physical place. Storypark is an 'online place' which has enabled this community to overcome geographic and transportation barriers to communication. This platform has provided more than a replication of traditional school gate connections, it has provided a place of convenience where a large resource of information can be accessed and easily shared across multiple parties. The interactions on Story park impact real-world interactions in place, both at school and at home. In mainstream media it is often the case that we hear about social media tools when they don't work, or when they disrupt our daily lives, forcing us to change and adapt. Storypark is a platform that has positively enhanced a community providing a 'virtual school gate' that not only compliments but enhances connections in physical place.

James Sunderland MOT, NZROT is a senior lecturer at the Otago Polytechnic School of Occupational Therapy. He teaches across all three years of the undergraduate degree, facilitating courses that examine human occupation and promote occupation-based practice. His previous practice was in the field of traumatic brain injury. He completed an ethnographic study of the Men's Shed movement for his Master's Thesis, and has research interests in occupation-based practice and the use of digital technology.

Dave Speden Occupational Therapist at Kimi Ora School and Head of therapies, Wellington

Correspondence to James Sutherland, School of Occupational Therapy, Otago Polytechnic, Private Bag 1910, Dunedin, New Zealand. Email: james.sutherland@op.ac.nz

REFERENCES

- Becta. (2007). *The impact of e-portfolios on learning*. Coventry UK: Becta.
- Booth, S. (2011). *Cultivating knowledge sharing and trust in online communities for educators: A multiple case study*. Unpublished doctoral dissertation, North Carolina State University, Raleigh.
- Buzzetto-More, N.A. & Alade, J.A. (2006). Best practices in e-assessment. *Journal of Information Technology Education*, 5, 251-269.
- Castree, N., Kitchin, R. & Rogers, A. (2013). *A dictionary of human geography*. Oxford: Oxford University Press.
- Cordier, R., McAuliffe, T., Wilson, N., Totino, R., Dender, A., Smith, C. & Stephens, M. (2015). The appropriateness and feasibility of an online e-Portfolio for assessment of undergraduate allied health students. *Australian Occupational Therapy Journal*, 63(3), 154-163. doi: 10.1111/1440-1630.12226
- Creswell, J. (2008). *Research design: Qualitative, quantitative, and mixed methods approaches*. Thousand Oaks, CA: Sage.
- Goldsmith, D.J. (2007). Enhancing learning and assessment through e-portfolios: A collaborative effort in Connecticut. *New Directions for Student Services*, 119, 31-42. doi:10.1002/ss.247
- Hedges, H. (2010). Through the kaleidoscope: Relationships and communication with parents. *The First Years*, 12(1), 27-34.
- Meyer, B. & Latham, N. (2008). Implementing electronic portfolios: Benefits, challenges and suggestions. *Educause Quarterly*, 31(1), 34-41.
- Ministry of Education. (2011). *Digital Portfolios: Guidelines for beginners*. Wellington NZ: Ministry of Education.
- McBurney, H., Eaton, S.E. & Torunski, E. (2017). A meta-analysis of tools to assist students with disabilities through the transition from high school to post-secondary learning environments, *Werklund School of Education Working Papers #2017-002*. Calgary, Canada: University of Calgary.
- Nicolaidou, I. (2013). E-portfolios supporting primary students' writing performance and peer feedback. *Computers & Education*, 68, 404-415. doi.org/10.1016/j.compedu.2013.06.004
- Olmstead. (2013). Using technology to increase parent involvement in schools. *TechTrends: For leaders in Education and Training*, 57(6), 28-37.
- Papp, R. (2014). Assessment and assurance of learning using e-portfolios. *Journal of Case Studies in Accreditation and Assessment*, 3, 1-6.

Pears, I. (1998). *An instance of the fingerpost*. London: Jonathan Cape.

Prodnik, J. (2012). Post-Fordist communities and cyberspace. In H. Breslow and A. Mousoutzanis (Eds). *Cybercultures: Mediations of community, culture, politics* (pp. 75–100). Rodopi: Amsterdam, New York.

Rubin, J. & Rubin, S. (2005). *Qualitative interviewing: The art of hearing data* (2nd ed). Thousand Oaks, CA: Sage.

Snape, D. & Spencer, L. (2003). The foundations of qualitative research. In J. Ritchie, & J. Lewis (Eds) (pp. 1-23). *Qualitative research methods: A guide for social science students and researchers*. London: Sage.

Stonehouse, A. & Gonzalez Mena, J. (2004). *Making links: A collaborative approach to planning and practice in early childhood services*. New South Wales: Pademelon Press.

Strudler, N. & Wetzel, K. (2008). Costs and benefits of electronic portfolios in teacher education: Faculty perspectives. *Journal of Computing in Teacher Education*, 24 (4), 135-142. doi:10.1080/10402454.2008.10784599

Theodosiadou, D. & Konstantinidis, A. (2015). Introducing e-portfolio use to primary school pupils: Re- sponse, benefits and challenges. *Journal of Information Technology Education: Innovations in Practice*, 14, 17-38. Retrieved from <http://www.jite.org/documents/Vol14/JITEv14IIPp017-038Theodosiadou0669.pdf>

Valentine, K. (2017). Special education overview. Retrieved from Kiwi families for passionate parents website. <https://www.kiwifamilies.co.nz/articles/special-education-overview/>

Virtual Community. (2017). In *Oxford living dictionaries*. Retrieved from https://en.oxforddictionaries.com/definition/us/virtual_community

Wade, A., Abrami, P. C. & Sclater, J. (2005). An electronic portfolio to support learning. *Canadian Journal of Learning and Technology/La Revue Canadienne de L'apprentissage et de la Technologie*, 31 (3).

Zellman, G. & Perlman, M. (2006). Parent involvement in childcare settings: Conceptual and measurement issues. *Early Child Development and Care*, 176(5), 521-538.