Art Therapy: Journal of the American Art Therapy Association, 23(4) pp. 191-196 © AATA, Inc. 2006

Technology Training for Future Art Therapists: Is There a Need?

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Abstract

The focus of this study was art therapy students' and professionals' perceptions of their preparedness to understand and deal with technology as an art media and work tool within the practice of art therapy. To study the need for training in technology, surveys were sent to 177 current art therapy students and practicing art therapists resulting in a 32.2% return rate. The survey targeted American Art Therapy Association (AATA) members who were either current students or practicing art therapists. Credentialed professionals and students were randomly selected from the AATA membership directory. Questions focused on current use of technology (defined as computers and accessories, the internet, and digital-based tools) within art therapy practice, current and past training in technology use, the quality of that training, ideas about training needs, and demographic data. The findings of the questionnaire showed that those who responded had little formal training but in general were using technology in their practices. This points to a need for looking further at what types of training would best meet art therapists' needs and how best to accomplish this.

Introduction

As the field of art therapy grows and develops, it is constantly integrating new tools to meet the needs of clients. Technology is one such tool that has received increased attention recently. For example, Malchiodi (2000) wrote a book about technology and art therapy in which she stated, "As much as art therapists may cry that technology is cumbersome, difficult, or even counterproductive to therapeutic interactions, computer, electronic, and digital technology have become a part of daily life, both personal and professional" (p. 9). In her text, Malchiodi discussed the contributions by many people who had written, researched, or presented on art and technology up to the time of publication. Canter (1989), Collie and Cubranic (1999), Gussak and Nyce (1999), McLeod (1999), McNiff (1999), Parker-Bell (1999), and Weinberg (1985) were all mentioned as art therapists who have worked with and attempted to understand technology within the field of art therapy.

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Interest in the uses of technology within art therapy is justified by looking at current trends for its use among the general population and within general counseling practice. Today's youth (particularly teens and young adults) find it difficult to live without newer technologies such as compact discs, graphic-based video games, MP3 players, high-powered computers, cell phones, and digital assistants, some of which were not available even five years ago. As a result of the rapid growth in computer and digital-based technologies, a gap has opened between the tools that art therapists understand and are able to employ in their practices for accessing information and creating art and those the general public, particularly children, teens, and young adults, are using at home for the similar purposes. An example of this phenomenon is revealed in a survey administered to middle school students by Harrell (2000). The students were asked how often and in what manner they used the internet outside of school. Harrell found that most students in the study at that time were very familiar with the internet and considered themselves either intermediate or advanced in their level of understanding and experience. In fact, 84% of the students surveyed spent at least an hour or more on the internet each week. The current generation of students in our society is grounded in a visual culture that requires an understanding of technology-based multisensory communication with multiple truths and interpretations (Carpenter, 2003; Freedman, 2003).

Due to these changes in communication processes and styles, the general practice of counselors has been changing in an attempt to meet client needs. The counseling field has met these changes by providing a variety of technology-based services, which include e-mail, text-chat and group text-chat, telephone- and video-conferencing, online assessment materials, bulletin boards, online audio-conferencing, and online journaling (Tyler & Guth, 2004). Sabella (1998) discussed how information technologies have become essential tools for manipulating ideas and images and for communicating effectively with others—all of which are central components of a counselor's job.

There is a need for art therapy graduate programs to look at the issue of technology use within art therapy to best prepare current and future art therapists to work with such media in the field. The focus of this study is art therapy students' and practicing professionals' perceptions of their preparedness to understand and deal with this new issue within the practice of art therapy. To study the need for training in technology and to evaluate how well current programs

Table 1
Overview of Technology Training (N = 43)

Availability and quality	At Work (percent)	At school (percent)	
		As an art tool	As a presentation tool
No available training	66.7	71.4	38.1
Available training quality			
Very good	0.0	0.0	4.8
Good	9.5	9.5	4.8
Adequate	21.4	11.9	28.6
Poor	2.4	7.1	23.8

are meeting these needs, a sample of current art therapy students and practicing art therapists were surveyed.

Method

Sample Selection

The survey targeted 250 American Art Therapy Association (AATA) members who were either current students or practicing art therapists. E-mail addresses of credentialed professionals (50% of sample) and students (50% of sample) were randomly selected from the AATA membership directory. However, 128 of those e-mail addresses turned out to be invalid when attempts were made to transmit requests to participate. An additional 128 e-mail addresses were obtained with 73 of those also proving invalid. The final count of successfully transmitted requests was 177. Of those, 12 surveys were returned but due to technical difficulties were unreadable, and 45 were successfully filled out and returned. This resulted in a 32.2% response rate.

Questionnaire Design and Procedure

The questionnaire had 16 questions consisting of nine multiple-choice or single-answer questions and seven open-ended questions. Questions focused on current use of technology (defined as computers and accessories, internet, and digital-based tools) within art therapy practice, current and past training in technology for art therapy, the quality of that training, ideas about future technology training needed by art therapists, and demographic data.

E-mails were sent asking those selected to fill out the questionnaire, which could be found online at a separate web site. By having participants go to a web site to fill out the survey, greater confidentiality was ensured in that the submitted results could not be traced back to individual e-mail addresses. However, the online survey ran into some compatibility difficulties, which limited the results. Some participants asked that the survey be e-mailed directly to them; their responses were then printed out and identifying information removed. As is standard for survey research, each person was contacted three times and requested to participate (Nardi, 2003).

Results

The respondents were mostly Caucasian (73%) women (92.5%) between the ages of 25 and 45 years (75%) who had or were working on their master's degree in art therapy (78.9%). The majority of participants had graduated after 1994 or were planning to graduate by 2004 (83%). Of these respondents, 66.7% did not have technology training available to them at their work sites, 2.4% had access to training but felt it was of poor quality, and 30.9% had access to training that they felt was adequate or met their needs well (see Table 1).

One important differentiation made in the survey questions was between technology used as a presentation or teaching tool and technology used as an artmaking tool during sessions. This differentiation was made to determine what types of technology training were being provided to current and recent graduate students (see Table 1). Of the respondents, 38.1% indicated that they did not receive any training in the use of technology for presentation or teaching, and 23.8% indicated that they did get training in this area but that training was of a poor quality. Another 28.6% responded that the training was adequate, whereas only 9.6% responded that they received training that met their needs well or very well. When asked about the quality of the training provided for using technology as an artmaking tool, 71.4% responded that they did not receive any training in this area. Another 7.1% indicated that they did have some training but it was of poor quality, and 11.9% indicated that training was adequate for their needs in this area. Only 9.5% reported that training in using technology to create art met their needs well, and none felt it met their needs very well. When these statistics are cross tabulated to determine the influence of the years in which the participants were in school with the quality of training in these areas, the statistics show a trend for a slight increase in the perceived quality from 2000 to 2004. Prior to 2000, the participants marked that their training ranged from adequate to poor to nonexistent.

The survey also contained a question asking if participants use technology as part of their art therapy practice and, if so, how they use it (see Table 2). The results showed that 11.9% of respondents never use technology as part of their practice whereas 88.1% do use technology. Of those who use technology, the largest number use for word pro-

Table 2
Use of Technology in Art Therapy Practice (N = 45)

Type	Percent
	Ancillary to treatment
Word processing	71.4
E-mail	71.4
Photo/picture archiving	57.1
Lecture/presentations	57.1
Research	45.2
Treatment planning	42.9
Do not use technology	11.9
	Within treatment
Client-conducted research/education	33.3
Digital artmaking	19.0
Web camera communication	2.4

cessing and e-mail (71.4% each), and a majority use it for lectures or presentations and photo or picture archiving (57.1%, each). A significant number of respondents use it for therapist research (45.2%) and for treatment planning (42.9%), but only 19% use it for creating digitally based artwork. These statistics show that a high percentage of art therapist respondents are using technology as part of their practice, usually for word processing, e-mail, research, archiving, and presentations. However, less than 20% of the responding art therapists use technology as an artmaking tool during sessions.

Half of the questions in the survey were open-ended in nature and were broken down into three categories. These three categories were chosen to determine what was provided in the way of training in technology, how technology was currently being used, and how art therapists envision it being used in the future. The first category asked about types of training available in art therapy education programs and at work sites. Consistent with the information gathered in the first section of the survey, the open-ended questions showed a majority of respondents had not had technology training in their art therapy education programs or at their work sites (see Table 3). Of the 28 who responded that they did have training in technology available to them, 17 received it as part of their art therapy program, 4 received it at work site, and 7 received it at both sites. The training that was offered as part of art therapy education programs consisted of mostly PowerPoint, research methods, some video and digital camera techniques, and phototherapy. One person mentioned that "Computer Assisted Art Therapy" was an elective that was offered at her university, but that she had not chosen to take it. At work sites, art therapists indicated that they had access to site-specific programs (Star Payroll, Chipper, and Sunrise Clinical Manager) and basic office programs (Word and PowerPoint). Seventeen respondents to this

Table 3
Available Training in Specific Technology (N = 43)

Types of technology	Number of responses	
	In education program	At work
None	19	32
PowerPoint	4	1
Video camera	3	0
Digital camera	1	1
Phototherapy	1	0
Research	1	0
Computer Assisted Art Therapy (course)	1	0
Word	0	1
Sunrise Clinical Manager	0	1
Chipper	0	1
Star Payroll	0	1
Photoshop	0	1
Illustrator	0	1
Graphics	0	1
Lotus	0	1
Linux	0	1
MS Server	0	1

question stated that they had training available in the general community, at local colleges, from friends, and online.

The questionnaire asked how technology was being used by art therapists in practice in two different ways: (a) through a checklist format with given lists of uses, as was reported earlier, and (b) in an open-ended question to provide an in-depth description of usage and to allow for alternative ways of thinking about technology use. The respondents answered this question in a variety of ways. Many listed uses similar to those in the preceding checklist and others gave fuller descriptions of ways they used technology as part of art therapy practice. Eleven respondents used this question as an opportunity to discuss why they don't use technology. Some art therapists reported that they use digital photography to document work in progress and to allow the client to view and understand how their work has developed over time. One respondent stated this process was particularly helpful with "clay work and other long-term pieces or pieces that are deconstructed and reconstructed." Another respondent stated that she has been able to "include cultural artwork in her sessions because of digital photography."

Even though some art therapists were using technology in creative ways to enhance their sessions, there was a large portion of respondents who stated that they do not use technology at all in their practice. Their reasons for not using technology included the high cost of equipment, a lack of value for technology and artmaking in their agencies, limited time for use and training, not being comfort-

able with the media, and feeling that technology does not meet the sensory needs of clients.

When participants were asked to describe technology training that would be necessary for future art therapists, 9 answered that they had no idea (see Table 4). The numerous responses (125) to this question exhibited the broad and ever-changing nature of current and future technology that could be used in art therapy practice. The main areas in which participants felt future art therapists needed training were marketing and presentation programs, digital photo and video techniques and programs, and web- and art-design programs. One participant wrote that a reason art therapists need training for using computers to do art therapy is that "larger hospitals have lots of computers that kids love to use while they are staying in the hospital—this is a missed opportunity." Along this line of thought, another therapist stated that training should be provided for "using the computer as a tool to reach [clients with an] age-appropriate interest in technology."

Several art therapists pointed to the need for training in using technology as an adaptive and accessible tool for clients with disabilities. One respondent pointed out that technology-based artmaking might appeal to "clients who may be hesitant because they are not confident in their artmaking skills." Some respondents described specific programs such as "Star" created by Steven Spielberg for use with cancer patients and existing interactive web sites by art therapists as examples of resources available that could be taught in educational programs geared specifically to art therapists.

Table 4
Technology Training Needed for Art Therapy Students (N = 43)

Types of technology	Number of responses
Digital imagery/Photo archiving	19
Digital artmaking	16
PowerPoint	14
Photoshop	11
Don't know	9
Presentations	8
Research	7
Web design	6
Excel	5
Charting	4
Word	4
Phototherapy	3
Quark	3
Illustrator	2
Online PPAT	2
SPSS	2
E-mail	2
Adaptive/accessible technologies	2
Age-Appropriate technologies	2
Firewalls/ Security	2
Assessment	1
Digital sound recording	1
Laptop use in hospitals	1
Digital portfolios	1
Chat Rooms	1
Scanners	1
QuickBooks	1
Star	1
KidPix/Mac Paint	1

Discussion

There were several limitations to this study. The first was that because the questionnaire was done via e-mail, those art therapists who responded were biased toward technology in that they already use it as a form of communication. Secondly and ironically, due to technical difficulties with the transmittal of the questionnaire, the response rate was hampered. Finally, considering the moderate return rate, there may be a large portion of the population surveyed who have different views from those who responded. All of these limitations probably caused skewing of the results in the same direction. The direction of the skew is one in which art therapists who are opposed to, do not use, or have not had training in technology are those who are underrepresented in this study. This assumption is made based on two facts. First, the questionnaire was delivered by e-mail, which means that participants were already using technology, and second, the subject heading of the e-mail was identified as "art therapy and technology." Art therapists who are not comfortable with, do not like, or do not know much about technology probably were the majority of those who did not respond. If they had responded, the findings would have been even stronger.

When one combines the finding that 88.1% of respondents do use technology in some aspect within their profession as art therapists with the low number of training opportunities within art therapy education programs (71.4% had none available) and the numerous suggestions for what "future art therapists will need," it is evident that training geared toward art therapy practice is a topic of interest and is needed within the field. Because the questionnaire was administered via technology, there was bias in this study in favor of art therapists who use technology. Even though this sample was biased, the direction of the bias reinforces the responses that indicate a strong need for training in technology. Due to this bias, a study administered via traditional mail is planned and will further explore some of the ideas generated in this preliminary research.

It is interesting to note that the issues raised by survey respondents concerning barriers to and qualities of technology used as an art tool within art therapy are many of the same issues raised in the literature of art education. For

many art therapists who are using technology within their practices, the same barriers are present as those found by art educators in public school settings: the high cost of equipment, the lack of valuing technology and artmaking in agencies, limited time for use and training, not being comfortable with this medium, and feeling that technology does not meet sensory needs of the clients (Anderson et al., 2000; Byers, 1996; Cumming, 1998; Dooling, 2000; Guha, 2001; Harvey & Purnell, 1995; Miller, 1999; O'Neil, 1995; Orr, 2003; Ostler, 1996; Peha, 1995; Rogers, 1997; Stankiewicz & Garber, 2000; Strommen & Lincoln, 1992; West, 1998).

The most interesting of these barriers is the therapists' or educators' feelings that technology-based artmaking is cold, isolating, and nonsensory oriented. According to the survey results, the distant, nontactile nature of technology-based artmaking tools appears to leave some therapists with doubts about whether what is created with this tool is actually art and whether it has therapeutic qualities. There is also a sense in the responses that "traditional" artmaking media is more therapeutic than technology-based tools. One therapist stated, "Clients need the sensory elements of traditional art materials for recovery," and another said, "Don't forget the art!"

The art education field has been grappling with related issues and seems to have concluded that technology-based artmaking is simply a new tool—like a new type of clay—with which to create art; artists have to learn the unique qualities it has to offer. Dilger and Roland (1993) explained that artists have always used the technology of their times. When photography was first introduced to the art world, issues were raised about its artistic substance and nature with many of the same opposing arguments now directed at technology-based artmaking tools (Betrus & Molenda, 2002). The use of computers, scanners, digital cameras, and other digital media does not replace traditional art forms but rather adds to the list of media available for artmaking. O'Neil (1995) also found that instead of technology replacing current resources, it has expanded the repertoire of what works for teachers by giving them access to more resources.

Articles have been written about possible uses of technology within art therapy (Malchiodi, 2000; McNiff, 1999; Parker-Bell, 1999) and have discussed potential benefits and drawbacks for technology use. As a field, art therapy is also in the process of exploring the unique nature of technology-based art tools and is trying to determine its therapeutic components (Hartwich & Brandecker, 1993; Johnson, 1987; McLeod, 1999). The present study was an attempt to explore whether art therapists in general are using technology, have had training in its use, and detect a need for more training. The finding that respondents were generally using technology within their practices but had very little training points to a need to investigate further what types of training would best meet art therapists' needs and how best to accomplish this. The results of this survey contribute to the understanding of art therapists' thoughts on technology and technology training within the field, but it is evident that much more study in this area is desirable.

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Calendar of Events

November 14-17, 2007
American Art Therapy Association, Inc. (AATA)
38th Annual Conference
Hyatt Regency, Albuquerque, NM
Contact: 1-888-290-0878 or e-mail: info@arttherapy.org

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