

International Journal of Education & the Arts

Editors

Tom Barone

Arizona State University, U.S.A

Liora Bresler

University of Illinois at Urbana—Champaign, U.S.A.

Margaret Macintyre Latta

University of Nebraska-Lincoln, U.S.A.

<http://ijea.asu.edu>

ISBN 1529-8094

Volume 8 Number 5

May 4, 2007

Examining Preservice Teachers' Preparedness for Teaching Art

Peter Hudson

Sue Hudson

Queensland University of Technology

Australia

Citation: Hudson, P., & Hudson, S. (2007). Examining preservice teachers' preparedness for teaching art. *International Journal of Education & the Arts*, 8(5). Retrieved [date] from <http://ijea.asu.edu/v8n5/>.

Abstract

The Australian Federal Government's call for another teacher education inquiry aims to investigate preservice teacher preparedness for teaching. Art education was selected for this study as the teaching of art education in primary schools occurs in less than ideal conditions and may often be avoided by generalist primary teachers (Russell-Bowie, 2002). Eighty-seven final-year preservice teachers were surveyed on their perceptions of their preparedness for teaching primary art education at the conclusion of their Bachelor of Education program. The 39 survey items were derived from the New South Wales' Creative Arts K-6 State Syllabus (Board of Studies, 2000) across four stage levels (i.e., early stage 1, stage 1, stage 2, and stage 3). Percentages and mean scale scores suggested that these final-year preservice teachers believed they were generally prepared to teach art education in primary schools as a result of a preservice teacher education visual arts unit. Nevertheless, more than 10% of preservice teachers indicated they could not agree or strongly agree that they could provide 20 of the 39 teaching practices advocated by the syllabus and 20% indicated this for 7 of the 39 teaching practices. Tertiary education institutions need to be proactive in responding to the challenge of determining preservice teachers' preparedness for teaching. Surveys linked to a state syllabus may assist

in assessing preservice teachers' perceptions of their preparedness for teaching and may provide valuable information for further development of tertiary education coursework.

Introduction

As teachers are required to teach to a broad range of student abilities and within different contexts, there is concern about the adequacies of preservice teacher education. These concerns include perceptions of decline in preservice teachers' classroom management and lesson preparedness, and the excessive academic nature of education for teaching (Vinson, 2001). The Australian House of Representatives' Standing Committee on Education and Vocational Training has devised a Terms of Reference for an Australian national inquiry into teacher education. The inquiry's key focus is, "To examine the preparedness of graduates to meet the current and future demands of teaching in Australia's schools" (Parliament of Australia, 2004). In particular for tertiary education is the reference to, "Examine the educational philosophy underpinning the teacher training courses (including the teaching methods used, course structure and materials, and methods for assessment and evaluation) and assess the extent to which it is informed by research" (Parliament of Australia, 2004).

Teaching Art in the Classroom

Teaching art education is part of an education system's requirements (e.g., Board of Studies, 2000), yet competing curriculum demands and the quality of teacher preparation may effect the implementation of art education in the primary school (Russell-Bowie, 2002). In addition, "many elementary generalists feel that if they can't draw, they can't teach art. Instead, they explore numerous materials, or one material in numerous ways" (Duncum, 1999, p. 33). Duncum reports that there are few long-term gains for implementing art education regardless of the quality of teacher education and argues that art educators (i.e., tertiary educators) need to work with consideration of the conditions in which general primary teachers operate. Australian primary teachers are not specialist teachers as they are expected to teach across all curriculum areas, unless internal school arrangements have been made to distribute the teaching load. Hence, primary teachers and preservice teachers need to learn effective teaching strategies to cope with general primary teaching conditions (Duncum, 1999).

Development of teaching strategies and a wider view of culture may assist the teaching of art in the primary classroom. Preservice teachers need to experience a broad range of art education practices that "will help preservice teachers to examine their decisions about art education in conjunction with the values about subject matter knowledge and practical applications expressed in the field" (Grauer, 1999, p. 22). They

need a wide view of culture, as “teachers experienced in only one culture are ill-prepared for teaching in multicultural classrooms” (McFee, 1995, p. 190). The role of the art educator may be prominent for developing preservice teachers’ concepts about effective art education in the primary school. Apart from essential content knowledge and pedagogical knowledge, the role of the art educator is to inspire preservice teachers to teach art, to consider it as a rewarding, life-long process, and to formulate concepts on effective art teaching (Kowalchuk, 2000). Furthermore, art educators need to provide preservice teachers with art education units that focus on “instructional strategies that connect to students’ interests and lives outside of the art classroom” (Kowalchuk, 2000, p. 23). It is the practical application of art teaching where preservice teachers can develop further teaching strategies and cultural views. Even though the classroom context can aid in forming art knowledge and skills, preservice teachers need to have a variety of teaching strategies before entering the classroom.

Teaching strategies can vary according to the classroom context and particular content to be taught. Researchers (Burton, Horowitz, & Abeles, 1999; Duncum, 1999, 2002; Eisner, 2001, 2004) agree that teachers need to select strategies relevant to students’ requirements. For example, strategies that focus on student engagement with contemporary culture can have an impact on students’ learning about art (Walker, 2006). Contexts such as social and political perspectives can reveal insights through artforms that can enrich and improve social life (Freedman, 2000), and issues of gender and identity within growing multicultural societies can be explored through art education (Caruso, 2005). Experienced primary teachers develop teaching strategies to suit specific circumstances in order to facilitate quality art education programs, and preservice teachers need to be equipped with a repertoire of effective teaching strategies for enacting art education.

Art education appears undervalued and has received minimal attention (Eisner, 1991, 2004). Even though the teaching of art occurs in less than ideal conditions (Russell-Bowie, 2002), there is a trend towards linking the arts to other key learning areas, particularly as art education is considered a frill subject and, consequently, can be given little consideration (Leshnoff, 1999). Yet, one of the strongest platforms for art education may be the integration of art with other key learning areas, which can be noted in teachers and preservice teachers’ practices (Hudson & Hudson, 2001; Richards & Gipe, 2000). Integrating art education can develop students’ communication and problem solving skills (Mason, Steedly, & Thormann, 2005). It can also encourage active participation and provide a medium for self expression and self assessment (Corbett, Wilson, & Morse, 2002). Evidence is mounting that art education can make a difference to a student’s academic achievement (Rabkin & Redmond, 2006), particularly when integrating art to support learning in other subject areas (Rabkin & Redmond, 2004). Indeed, art education is not only supportive of other curriculum areas but can provide intuitive, creative, descriptive, and purposeful insights for communicating concepts

(Arnstine, 1995; Bamford, 2005; Collins, 1995; Efland, 1995; Harste, 1994; Rabkin & Redmond, 2004; Welch & Greene, 1995).

Connection Between Beliefs and Preparedness for Teaching

Developing beliefs and self-efficacy appear fundamental for advancing primary teaching practices. The “importance of teacher beliefs is undeniable” (Cheung & Ng, 2000, p. 370). What preservice teachers believe about art and its value may affect whether it is taught or not (e.g., see Efland, 1995). Although negative experiences may have preservice teachers believe they are incapable or not confident with specific tasks (e.g., Cameron, Mills, & Heinzen, 1995), and this includes art education (Luehrman, 2002), positive experiences may instill self-confidence for teaching practices (Bandura, 1997). For example, Pajares (1992) found a “strong relationship between teachers’ educational beliefs and their planning, instructional decisions, and classroom practices” (p. 326) and that “educational beliefs of preservice teachers play a pivotal role in their acquisition and interpretation of knowledge and subsequent teaching behavior” (p. 328). It seems that “beliefs are far more influential than knowledge in determining how individuals organize and define tasks and problems and are stronger predictors of behavior” (p. 311).

Beliefs on how to teach and what to teach will affect the teaching processes, and therefore the quality of learning. Kagan (1992) suspects that teacher belief and “personal knowledge lies at the very heart of teaching” (p. 85). Mellado (1997) concurs that “there are certain traditions and beliefs concerning the best way to teach and learn any given subject matter” (p. 332). It seems that preservice teachers who confront their beliefs develop a deeper understanding of teaching (Abell & Bryan, 1999; Pajares & Schunk, 2002; Schoon & Boone, 1998), which is of particular importance if such beliefs shape a preservice teacher’s preparedness for effective teaching and learning. Therefore, tertiary education has a significant role in developing beliefs and positive attitudes about teaching art in the primary school. Teachers’ beliefs and attitudes about art education appear to exhibit more influence than any other personal characteristic (Oreck, 2004). Studies show (e.g., Darling-Hammond, 2000) that effective preparation for teaching increases positive attitudes, confidence and success for classroom practices. However, little is known about preservice teacher beliefs toward art education for the potential implementation of practice.

Even though the translation of beliefs to knowledge and skills for teaching art has a pedagogical focus (e.g., Deasy, 2002), this study aims to understand preservice teachers’ perceptions of their preparedness for teaching art education in primary schools at the conclusion of their four-year Bachelor of Education degree. In particular, the NSW Creative Arts K-6 Syllabus (Board of Studies, 2000) was used to guide the construction of a survey instrument to examine preservice teachers’ perceptions of their preparedness for teaching art education in schools associated with this syllabus.

Context of this Study

Eighty-seven final-year preservice teachers from an Australian university were involved in an art education unit, which was taught by one of the co-researchers. This unit consisted of two-hour weekly workshops using a variety of instructional modes and focused on the standards and stages advocated within the NSW Creative Arts K-6 State Syllabus (Board of Studies, 2000). For example, at Stage 1 (S1), the preparation for these preservice teachers included art education workshops that aimed to enhance their knowledge and skills for: extending the students' understanding of the concept of the artist; discussing how artists make artworks for different reasons; questioning students about what they do in their art making; extending students' opportunities with different media, tools and techniques; using examples of artworks and discuss abstract representations; providing opportunities to observe characteristics through art; demonstrating different viewpoints in artworks; and, providing opportunities for students to talk and write about their artworks. These standards and stages were used for devising the survey instrument (Appendix 1).

Data Collection and Analysis

The survey instrument gathered data from 87 final-year preservice teachers at the conclusion of their Bachelor of Education program (and the final week of their art education unit) to determine their preparedness for teaching art education in New South Wales (NSW) primary schools. This survey was administered during the final lecture by a staff member not involved in this study and took approximately 15 to 20 minutes to complete. The NSW Creative Arts K-6 Syllabus (Board of Studies, 2000) provided the basis for constructing the survey, which was organised across four stages of development for primary students (i.e., Early Stage 1 [ES1], Stage 1 [S1], Stage 2 [S2], and Stage 3[S3]). The 39 survey items had a five-part Likert scale, namely, "strongly disagree", "disagree", "uncertain", "agree", and "strongly agree". Scoring was accomplished by assigning a score of one to items receiving a "strongly disagree" response, a score of two for "disagree" and so on through the five response categories. Multiple indicators from the syllabus were used to reflect the stages of development. These indicators formed items on the survey instrument (Appendix 1), which were used to provide an indication of the preservice teachers' preparedness for teaching art education in NSW primary schools. To further substantiate the instrument's validity, two primary art educators not involved in the research examined the items on the proposed survey.

Descriptive statistics were derived using SPSS12. Survey responses were anonymous to safeguard identities and maintain a degree of data reliability. Data with missing or improbable values were deleted (Hittleman & Simon, 2002). Data analysis included: frequencies for each survey item linked to associated stages, mean scores (*M*),

and standard deviations (*SD*, see Hittleman & Simon, 2002). Analysing individual items (i.e., with percentages) aimed to provide further insight into preservice teachers' perceptions of their preparedness to teach art within each of these stage levels (i.e., ES1, S1, S2, and S3). Ninety percent and above was an arbitrary demarcation in order to provide a clearer analysis of the data within each stage, hence, histograms were coded to aid this analysis (i.e., dark<90% and light≥90%).

Results and Discussion

The 87 completed survey responses (68 female, 19 male) represented 84% of the total cohort of final-year preservice teachers at one NSW regional university. The demographics for this study were provided from the preservice teachers' responses on the first section of this survey (Appendix 1). The following are key descriptors of the sample ($n=87$). Although 46% of these preservice teachers were less than 22 years of age and 32% were between 22 and 29 years of age, there were 22% who were older than 30 years of age. Seventeen percent of the preservice teachers completed art education units in years 11 and 12 at high school. Including the teaching methodology unit relating to the NSW syllabus that this research focused on, only 6% had completed one unit in art education while 94% had completed two or more units. In addition, 98% indicated that their three or more practicum experiences influenced their learning to teach art education and 82% claimed that other tertiary units influenced their learning to teach art education.

An exploratory factor analysis (EFA) was conducted on each of the stage levels to provide some preliminary indication of the uni-dimensionality of the four stages. Although Cronbach alpha scores of internal consistency were acceptable for the four stages (.90, .89, .89, .90, respectively; Table 1), item analysis suggested inconsistencies. Further exploratory factor analysis will need to be conducted to determine communalities for each item associated with particular stage levels using a wider survey sample. Mean scale scores on each of the four stages suggested general agreement that these 87 final-year preservice teachers perceived they were prepared for teaching primary art education (i.e., ES1=4.22, S1=4.16, S2=4.09, S3=4.15; Table 1). The low standard deviation for each of the four stages indicated little variation in the responses assigned to the mean scale scores. Hence, most of the 87 preservice teachers believed they were adequately prepared to teach art education in NSW primary schools. Analysis of individual items associated with the respective stages provided insight into these final-year preservice teachers' perceptions of their preparedness for teaching art education.

Table 1

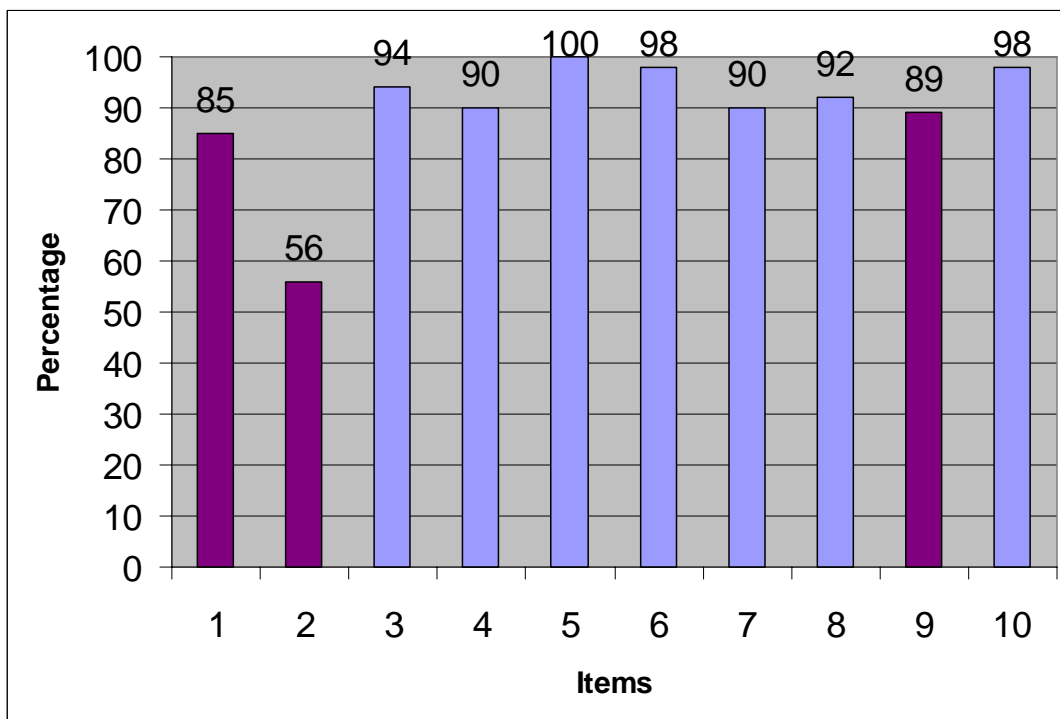
MEAN SCALE SCORES, SD, AND CRONBACH ALPHA SCORES FOR EACH OF THE FOUR STAGES (N=87)

Stage level	Mean scale score	SD	Cronbach alpha scores
Early stage 1 (ES1)	4.22	0.47	.90
Stage 1 (S1)	4.16	0.50	.89
Stage 2 (S2)	4.09	0.50	.89
Stage 3 (S3)	4.15	0.44	.90

Ninety percent or more final-year preservice teachers indicated preparedness to teach art education for seven out of ten items at the early stage 1 (ES1) level (Graph 1). Item numbers on the x axis in each of the following graphs are aligned with the item numbers listed on the survey (Appendix 1). Surprisingly, 100% of these final-year preservice teachers indicated a preparedness to provide opportunities for students to make artworks. Ninety percent or more agreed or strongly agreed that they could discuss artworks and their properties, discuss the ways in which the world is represented in artworks, provide opportunities to explore different media, tools and techniques, demonstrate various visual effects, assist students to experiment with different effects and techniques, and provide opportunities for students to talk about different artworks (Graph 1; also see Appendix 2 for mean scores and SD).

Graph 1:

Percentages on Preservice Teachers’ Perceptions of their Preparedness for Teaching Early Stage 1 (n=87) Percentage of final-year preservice teachers who either “agreed” or “strongly agreed” they believed they could facilitate that specific teaching practice.

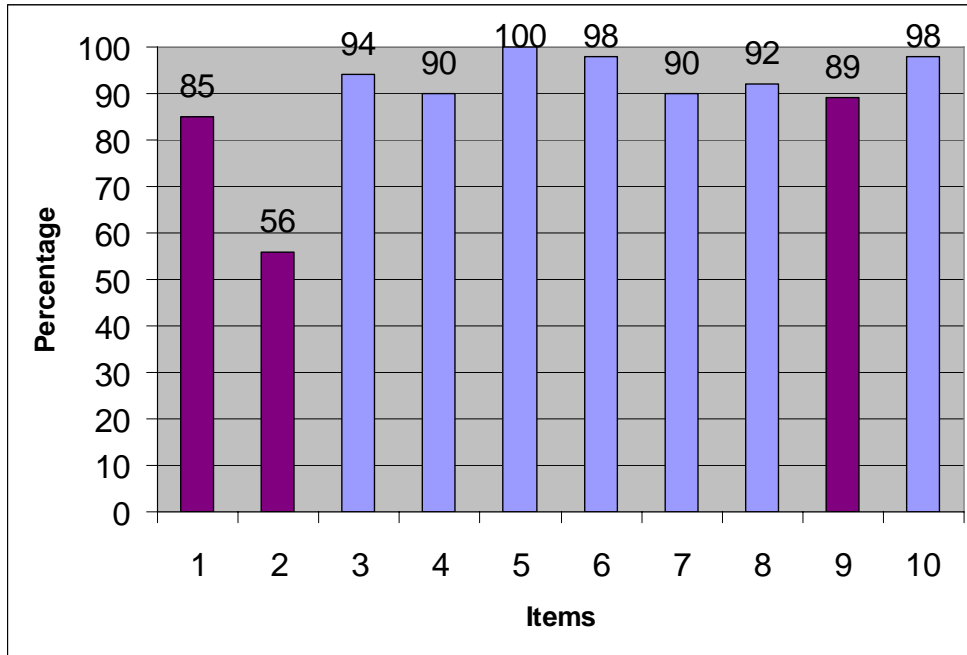


Eighty-nine percent claimed that they could discuss who an audience may be and where audiences view art and 85% could discuss art and artists with their students. Only 56% claimed they could provide opportunities to meet and talk with artists (Graph 2). However, if these preservice teachers considered possible employment locations, such as remote country areas, then opportunities to meet and talk with artists may prove to be difficult to organise. Organising to meet and talk with artists in urban areas may also become a difficulty, particularly in the identification of artists and the possible costs artists may require for talking to primary students. The syllabus standard that advocates opportunities to meet and talk with artists may not be in line with reality.

More than 10% of these preservice teachers believed they were unprepared to provide six of the eight practices listed for Stage 1 (items 11, 12, 14-17; Graph 2). However, nearly all these preservice teachers ($n=87$) believed that they could provide opportunities for students to talk and write about their artworks (99%) and most believed they could question students about what the students do in their artmaking (93%). Although mean scores and standard deviations (Appendix 3) indicated general agreement with the teaching practices associated with a stage one level, 24% could not agree or strongly agree they could extend the students' understanding of the concept of the artist. Hence, even though percentages were high, a significant number of preservice teachers in this study may not be prepared for teaching these standard requirements in NSW primary schools at the S1 level.

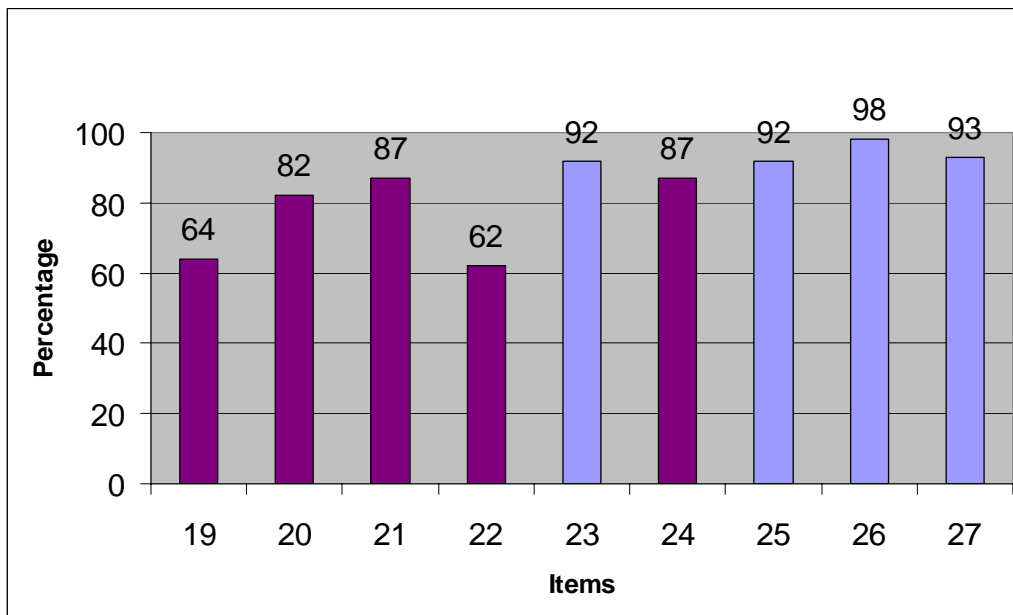
Graph 2:

Percentages on Preservice Teachers' Perceptions of their Preparedness for Teaching Stage 1 (n=87) (Percentage of final-year preservice teachers who either "agreed" or "strongly agreed" they believed they could facilitate that specific teaching practice.)



Graph 3:

Percentages on Preservice Teachers' Perceptions of their Preparedness for Teaching Stage 2 (n=87)

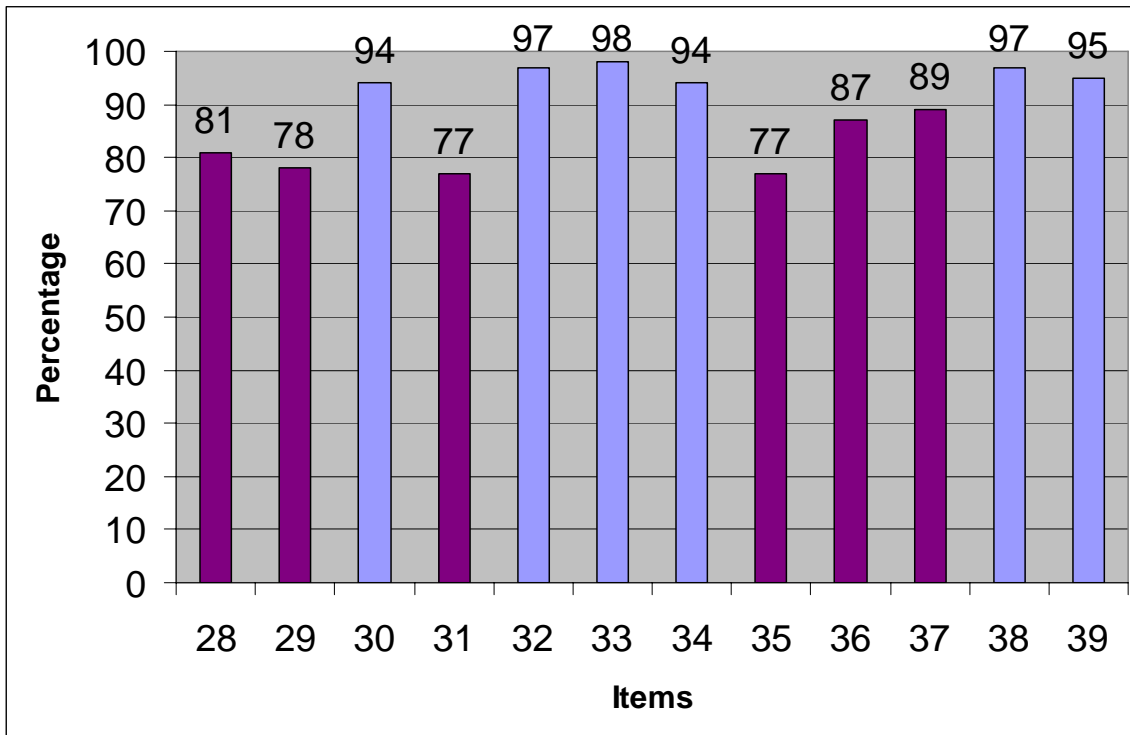


At the S2 level, over 90% of these preservice teachers agreed or strongly agreed they could provide opportunities for students to: view different kinds of artworks, make artworks about real experiences, explore different traditions and techniques in art making, and compare their interpretations of artworks with those of others (Graph 3). However, only 64% indicated that they could discuss how artistic intentions affect the choices artists make and 62% claimed they could provide opportunities for students to meet and talk with artists about their art interests. Five of the nine items associated with S2 had 13% or more preservice teachers indicating they were unprepared for teaching art (items 19-22, 24, Appendix 4). Of interest was the 6% increase from ES1 to S2 for these preservice teachers to provide opportunities to meet and talk with artists, yet preservice teachers registered relatively lower percentages on this item for both these stages. Preservice teachers may consider providing this opportunity for primary students not essential for learning about art education.

Finally, most preservice teachers indicated a level of preparedness for teaching art education at the S3 level (Graph 4). Standard deviations continued to be relatively low (*SD* range: 0.54 to 0.78) with mean scores that may be considered in the upper ranges (*M* range: 3.87 to 4.41; Appendix 5). Furthermore, 94% or more of these preservice teachers agreed or strongly agreed with half of the items (items 30, 32-34, 38, 39). However, more than 20% of these preservice teachers were uncertain, disagreed or strongly disagreed that they could: extend the range of opportunities that students have to investigate and use various media, techniques and tools in relation to the investigation of subject matter; use a range of construction techniques when using clay and other three dimensional materials; and, discuss how artworks may be ambiguous in their form, content and meaning, and subject to different interpretations (Graph 4).

Graph 4:

Percentages on Preservice Teachers' Perceptions of their Preparedness for Teaching Stage3 (n=87)



The overall statistics showed that a significant majority of preservice teachers believed they were prepared for teaching art in NSW primary schools; however item analysis presented an indication of preservice teachers who may not be prepared for their future roles as teachers of art education as aligned with specific practices advocated by the presiding syllabus. For example, more than 10% of preservice teachers could not agree or strongly agree that they could provide 20 of the 39 teaching practices advocated by the NSW Creative Arts K-6 syllabus (Board of Studies, 2000). Furthermore, 7 items (i.e., 2, 11, 19, 22, 29, 31, and 35) had more than 20% of preservice teachers indicating they may not be able to facilitate these teaching practices even though this specific tertiary education unit (and their previous unit) focused on developing these practices.

Further Discussion

Any federal inquiry into the quality of preservice teacher education must consider key influences on preservice teacher development. Tertiary art education programs and state syllabus documents have key roles for which both need to be scrutinised carefully through well-informed research. Although tertiary education must not be limited by a

state syllabus, and should educate with current trends and literature to extend past the presiding syllabus, information from this study can be used to enhance tertiary practices for developing preservice teachers' preparedness for teaching art education. For example, this particular tertiary program needs to include ways for preservice teachers to organise opportunities to meet and talk with artists towards understanding the concept of the artist. Inviting different artists (e.g., painter, sculptor, architect, graphic designer, printmaker, digital artist, video artist, weaver, ceramic artist) to talk with the preservice teachers may provide further preparedness to meet the syllabus directives. Yet, there is no research to indicate whether primary students who meet artists are more developed in their art education. How much influence did meeting artists have on today's world-renowned artists? The preservice teachers in this study also needed to be involved in hands-on art activities with various media such as clay and other three-dimensional materials. This suggested that art appreciation and interpretation needed to be addressed more thoroughly within this particular tertiary art education program; however further research is required to determine how to educate preservice teachers who believe they are not prepared for teaching art in primary schools.

Syllabus documents require closer scrutiny for cohesiveness of items (i.e., teaching practices) associated with stage levels. This paper indicated that some of the art teaching expectations advocated by the NSW Creative Arts syllabus (Board of Studies, 2000) will require revision. For example, meeting and talking with artists was directed for ES1, S2 and S3 levels but not for S1. Similarly, expectations of teachers to demonstrate artworks were directed at the ES1 and S1 levels only. Theoretical underpinnings for the construction of sequential teaching and learning practices must be more consistent and explicit in the syllabus. Why are teachers not expected to meet and talk with artists at S1? Why is it supposedly not important for teachers to demonstrate artworks in the upper primary grades? More research is required to provide a stronger theoretical basis for allocating teaching practices to specific grades. In addition, syllabus requirements need to be realistic and equitable and not just for typical situations. Advocating involvement with artists as a requirement may be impracticable as this will depend on the location of schools, the identification and availability of artists, and costs associated with such interactions. Even within well-located areas, artists' availability and costs may limit or eliminate this opportunity for students to meet and talk with artists. It is also possible these preservice teachers may not know who artists are; indeed how do we determine who are the artists (Jeffers, 1999)?

In general, preservice teachers in this study perceived they were prepared for teaching art in NSW primary schools. However, further research is required in order to provide more evidence for refining syllabus directives. For example, qualitative data may assist the analysis of preservice teachers' perceptions of particular teaching expectations. Greater collaboration between universities can assist data collection on key art education

issues involving preservice teachers in a much larger study, and further collaboration between researchers and current practices employed in schools may determine realistic expectations for devising syllabus requirements. In addition, researchers need to compare and analyse preservice teachers' perceptions of their preparedness for teaching with the reality of their classroom practices. Such research can begin with classroom practices during practicum but should extend to first-year out teaching practices. Statistical interpretation using exploratory and confirmatory factor analysis can further substantiate items associated with the four stage levels.

Conclusion

This study aimed to examine final-year preservice teachers' perceptions of their preparedness for teaching art education in primary schools by reporting on findings from a survey based on the presiding state art syllabus. Despite tertiary art education focusing on syllabus requirements for teaching art, there will be some preservice teachers unprepared for art teaching. Just as any typical primary classroom has a range of learners so too will tertiary education classrooms. Reaching the ultimate goal of 100% for each of the items associated with each stage level for every preservice teacher may prove to be an impossible task. Other contributing factors that need to be explored include the preservice teachers' propensity for either becoming teachers or becoming art teachers, that is, consideration of intellectual and creative capabilities, demonstration of the affective domains, organisational abilities, and how (or if) the preservice teachers' confidence for teaching art may influence the preservice teachers' perceptions of their preparedness for teaching art.

Although syllabus directions should not be considered unproblematic, research on such requirements can aid in developing more realistic and coherent guidelines. Indeed, Federal Government calls for inquiries into the quality of preservice teacher education must also include investigations into related syllabus documents, as these documents are generally referenced during university curriculum coursework. A survey linked to a syllabus can gather data on preservice teachers' perceptions of their preparedness for teaching and identify issues for the development of future tertiary art education coursework. The limitations on surveying preservice teachers in this study includes: the possibility that individuals may have different interpretations about each survey item, and that preservice teachers' perceptions of their preparedness may not coincide with their future teaching practices. Nevertheless, the arbitrary benchmark of 90% provided a way to commence distinguishing a level of preparedness for teaching art in order to address key issues and may provide directions for developing tertiary art education programs. Lower item percentages identified from the survey can also aid in targeting key issues for refining tertiary teaching programs in line with state directions. These results may be taken as benchmarks for interpreting data when surveying other cohorts of preservice

teachers in similar art education programs to understand the effectiveness of program iterations.

National inquiries into preservice teacher education need to be embraced by tertiary institutions as a way forward for developing practices. Proactive engagement from educators and researchers can assist in addressing inquiries into preservice teacher preparation. Such inquiries can lead to healthy debate for changing tertiary art education practices, refining syllabus documents, and promoting collaboration between schools and universities to prepare preservice teachers for their professional roles in schools. The development of art syllabus documents and tertiary art education programs must be an ongoing concern that involves all key stakeholders, particularly for facilitating the transition from preservice teacher to practitioner.

References

- Abell, S. K., & Bryan, L. A. (1999). Development of professional knowledge in learning to teach elementary science. *Journal of Research in Science Teaching*, 36(2), 121-139.
- Albers, P. M. (1999). Art education and the possibility of social change. *Art Education*, 52(4), 6-11.
- Arnstine, D. (1990). Art, aesthetics, and the pitfalls of discipline-based art education. *Educational Theory*, 40(4), 415-422.
- Bamford, A. (2005). *The WOW factor: Global research compendium on the impact of the art in education*. Munster, Germany: Waxmann Verlag GmbH.
- Bandura, A. (1997). *Self-efficacy: The exercise of control*. New York: Freeman.
- Board of Studies (2000). *Creative arts k-6 syllabus*. Sydney, NSW: Board of Studies.
- Burton, J., Horowitz, R., & Abeles, H. (1999). *Learning in and through the arts: Curriculum implications*. New York: Teachers College, Columbia University.
- Cameron, P. A., Mills, C. J., & Heinzen, T. E. (1995). The social context and development patterns of crystallizing experiences among academically talented youth. *Roeper Review*, 17(3), 197-200.
- Caruso, H. Y. C. (2005). Expression of cultural identity, self-identity, and gender by Suk Nam Yun and Yong Soon Min. *The Journal of Aesthetic Education*, 39(3), 71-87.
- Cheung, D., & Ng, P. (2000). Science teacher's beliefs about curriculum design. *Research in Science Education*, 30(4), 357-375.
- Collins, G. (1995). Art education as a negative example of gender-enriching curriculum. In J. Gaskell & J. Willinsky (Eds.), *Gender in/forms curriculum: From enrichment to transformation* (pp. 43-58). NY: Teachers College Press.
- Corbett, D., Wilson, B., & Morse, D. (2002). *The arts are an "R" too*. Jackson, MS: Mississippi ARTS Commission.
- Darling-Hammond, L. (2000). How teacher education matters. *Journal of Teacher Education*, 51(3), 166-173.
- Deasy, R. J. (Ed.). (2002). Critical links: Learning in the arts and student academic and social development. *International Journal of Education and the Arts*, 3, 3. Retrieved 10 February, 2006, from <http://ijea.asu.edu/v3r3/>
- Duncum, P. (1999). What elementary generalist teachers need to know to teach art well. *Art Education*, 52(6), 33-37.
- Duncum, P. (2002). Clarifying visual culture art education. *Art Education*, 55(3), 6-11.
- Efland, A. D. (1995). Change in the conceptions of art teaching. In R. Neperud (Ed.), *Context, content, and community in art education beyond postmodernism* (pp. 25-40). New York, NY: Teachers College Press.

- Eisner, E. W. (1991). What the arts taught me about education. In G. Willis & W. H. Schubert (Eds.), *Reflections from the heart of educational inquiry: Understanding curriculum and teaching through the arts* (pp. 34-48). Albany, NY: SUNY.
- Eisner, E. W. (2001). Should we create new aims for art education? *Art Education* 54(5), 6-10.
- Eisner, E. W. (2004). What can education learn from the arts about the practice of education? *International Journal of Education & the Arts*, 5(4). Retrieved 2 August, 2006, from <http://ijea.asu.edu/v5n4/>.
- Freedman, F. (2000). Social perspectives on art education in the US: Teaching visual culture in a democracy. *Studies in Art Education*, 41(4), 314-329.
- Grauer, K. (1999). The art of teaching art teachers. *Australian Art Education*, 22(2), 19-24.
- Harste, J. C. (1994). Literacy as curricular conversations about knowledge, inquiry and morality. In R. B. Ruddell, M. R. Ruddell, & H. Singer (Eds.), *Theoretical models and processes of reading* (pp. 1220-1242). Newark, DE: International Reading Association.
- Hittleman, D. R., & Simon, A. J. (2002). *Interpreting educational research: An introduction for consumers of research*. Upper Saddle River, NJ: Prentice-Hall.
- Hudson, P., & Hudson, S. (2001). Linking visual arts with science and technology in the primary classroom. *Investigating: Australian Primary and Junior Science Journal*, 17(4), 26-29.
- Jeffers, C. S. (1999). What happens when we ask, "what is art?" *Art Education*, 52(1), 40-44.
- Kagan, D. (1992). Implications of research on teacher belief. *Educational Psychologist* 27(1), 65-90.
- Kowalchuk, E. A. (2000). In their own words: What student art teachers say they learn and need. *Art Education*, 53(3), 18-23.
- Leshnoff, S. K. (1999). What is going on in elementary art classrooms? *Art Education*, 52(6), 6-12.
- Luehrman, M. (2002). Art experiences and attitude toward art education: A descriptive study of Missouri public school principals. *Studies in Art Education*, 43(3), 197-218.
- Mason, C., Steedly, K., & Thormann, M. (2005). Arts integration: How do the arts impact social, cognitive, and academic skills? Retrieved 2 August, 2006, from http://www.vsarts.org/documents/resources/research/lessons_rubics_arts05.pdf.
- McFee, J. (1995). Change and the cultural dimensions of art education. In R. Neperud (Ed.), *Context, content, and community in art education: Beyond postmodernism* (pp. 171-192). New York: Teachers College Press, Columbia University.
- Mellado, V. (1998). The classroom practice of preservice teachers and their conceptions of teaching and learning science. *Science Teacher Education*, 82(2), 197-213.

- National Committee for Standards in the Arts. (1994). *National standards for arts education: What every young American should know and be able to do in the arts*. Reston, VA: Music Educators National Conference Publications.
- Oreck, B. (2004). The artistic and professional development of teachers. *Journal of Teacher Education*, 55(1), 55-69.
- Pajares, F., & Schunk, D. H. (2002). Self and self-belief in psychology and education: A historical perspective. In J. Aronson (Ed.), *Improving academic achievement: Impact of psychological factors on education* (pp. 3-21). San Diego, CA: Academic Press.
- Pajares, M. F. (1992). Teachers' beliefs and educational research: Cleaning up a messy construct. *Review of Educational Research*, 62, 307-332.
- Parliament of Australia, House of Representatives. (2004). Retrieved 2 August, 2006 from <http://www.aph.gov.au/house/committee/evt/teachereduc/tor.htm>
- Rabkin, N., & Redmond, R. (2004). *Putting the arts in the picture: Reframing education in the 21st century*. Chicago: Columbia College Chicago.
- Rabkin, N., & Redmond, R. (2006). The arts make a difference. *Educational Leadership*, 63(5), 60-64.
- Richards, J., & Gipe, J. (2000). *Elementary literacy lessons: Cases and commentaries from the field*. Mahwah, NJ: Lawrence Erlbaum, Associates.
- Russell-Bowie, D. (2002, December). *Gender issues in visual arts education*. Paper presented at the Australian Association for Research in Education conference. Brisbane, Australia.
- Schoon, K. J., & Boone, W. J. (1998). Self-efficacy and alternative conceptions of science of preservice elementary teachers. *Science Education*, 82, 553-568.
- Vinson, T. (2001). *Public Education Inquiry, New South Wales*. Retrieved 2 August, 2006, from http://www.pub-ed-inquiry.org/reports/final_reports/04/Ch11_52.html
- Walker, S. (2006). How shall we teach? Rethinking artmaking instruction. *Teaching Artist Journal*, 4(3), 190-197.
- Welch, N., & Greene, A. (1995). *Schools, communities and the arts: A research compendium*. Tempe, AZ: Morrison Institute for Public Policy, Arizona State University.

About the Authors

Peter Hudson (PhD, MEd, BEd, TESOL, Dip Teach) has 28 years in education including 10 years as a school principal. He currently lectures at Queensland University of Technology in the Faculty of Education. His research interests include mentoring, primary science education, TESOL education, and leadership and management. **Sue Hudson** (MEd, BEd, TESOL, Dip Teach) has taught in primary education for 27 years including 17 years at universities. She is currently the Academic Coordinator for QUT's Caboolture campus. Her research interests include visual arts, drama, and English as a second language.

Appendix 1:

Preparedness for Teaching Art Education

The following statements are concerned with your preparedness for teaching art education across four stage levels. Please indicate the degree to which you disagree or agree with each statement below by circling the appropriate response linked to each statement.

KEY: SD = Strongly Disagree D = Disagree U = Uncertain A = Agree SA = Strongly Agree

For teaching art education, I believe that I am able to:

Part A: Early Stage 1

- 1) discuss art with students (e.g., Who are artists? What do they do? What do they make?)
SD D U A SA
- 2) provide opportunities for students to meet and talk with artists
SD D U A SA
- 3) provide opportunities for students to look at and discuss artworks and their properties (e.g., paintings, drawings, sculptures, digital artworks, photographs)
SD D U A SA
- 4) discuss the ways in which the world is represented in artworks and the features of things depicted in artworks
SD D U A SA
- 5) provide opportunities for students to make artworks about things of interest to them
SD D U A SA
- 6) provide opportunities for students to explore the qualities of different media, tools and techniques (e.g., in drawing: pencils, paints, crayons, fibre tip pens, computer applications)
SD D U A SA
- 7) demonstrate various visual effects with different techniques, media and tools
SD D U A SA
- 8) assist students to experiment with different effects and techniques
SD D U A SA
- 9) discuss who an audience may be and consider where audiences view art
SD D U A SA
- 10) provide opportunities for students to talk about what is of interest to them in different artworks
SD D U A SA

Part B: Stage 1

- 11) extend the students' understanding of the concept of the artist to include different types of artists (e.g., painter, sculptor, architect, graphic designer, printmaker, digital artist, video artist, weaver, ceramic artist)
- SD D U A SA
- 12) consider how artists make artworks for different reasons
- SD D U A SA
- 13) question students about what they do in their artmaking
- SD D U A SA
- 14) extend students' opportunities with different media, tools and techniques and assist them
- SD D U A SA
- 15) use examples of artworks, and discuss abstract representations
- SD D U A SA
- 16) provide opportunities for students to observe the characteristics of interesting things through art
- SD D U A SA
- 17) demonstrate different viewpoints in artworks
- SD D U A SA
- 18) provide opportunities for students to talk and write about their artworks
- SD D U A SA

Part C: Stage 2

- 19) discuss how artistic intentions affect the choices that artists make
- SD D U A SA
- 20) assist students to reflect on their own representational activity through questioning
- SD D U A SA
- 21) have students talk about their own reasons and others' reasons for making art
- SD D U A SA
- 22) provide opportunities for students to meet and talk with artists about their art interests
- SD D U A SA
- 23) provide opportunities for students to view different kinds of artworks
- SD D U A SA
- 24) discuss the ways in which subject matter and concepts are given a particular emphasis in artworks
- SD D U A SA
- 25) provide opportunities for students to explore different traditions and techniques in artmaking
- SD D U A SA
- 26) provide opportunities for students to make artworks about real experiences
- SD D U A SA

27) compare their interpretations of artworks with those of others

SD D U A SA

Part D: Stage 3

28) provide opportunities for students to analyse and interpret the qualities and details of selected subject matter

SD D U A SA

29) extend the range of opportunities that students have to investigate and use various media, techniques and tools in relation to the investigation of subject matter

SD D U A SA

30) extend the range of opportunities that students have to explore and discuss concepts and subject matter that is of interest to them in visual arts

SD D U A SA

31) use a range of construction techniques when using clay and other three dimensional materials

SD D U A SA

32) provide opportunities for students to critically reflect on their artmaking

SD D U A SA

33) provide opportunities for students to make artworks that involve working in groups

SD D U A SA

34) discuss different ways of valuing students' artworks and other artworks

SD D U A SA

35) discuss how artworks may be ambiguous in their form, content and meaning, and subject to different interpretations

SD D U A SA

36) discuss with students the contribution of artists, designers, craftspeople, architects in different times and places

SD D U A SA

37) present ways for students to undertake research about particular artists, their work, artistic styles and exhibitions they have visited

SD D U A SA

38) arrange excursions for students, as audience members, to exhibitions in galleries, museums and urban precincts

SD D U A SA

39) ensure that students are able to visit relevant internet sites to investigate relationships between artists, the world, artworks and audiences

SD D U A SA

Overall, I am confident I will be an effective art teacher
SA SD D U A

Appendix 2:

Table 2:

Percentages, Mean Scores and Standard Deviations on Preservice Teachers' Perceptions of their Preparedness for Teaching Early Stage 1 (n=87)

Teaching practice	%*	<i>M</i>	<i>SD</i>
1. Discuss art and artists	85	4.14	0.77
2. Provide opportunities to meet and talk with artists	56	3.59	0.77
3. Discuss artworks and their properties	94	4.29	0.61
4. Discuss the ways in which the world is represented in artworks	90	4.16	0.70
5. Provide opportunities for making artworks	100	4.56	0.50
6. Provide opportunities to explore different media, tools and techniques	98	4.49	0.59
7. Demonstrate various visual effects	90	4.19	0.64
8. Assist students to experiment with different effects and techniques	92	4.18	0.56
9. Discuss who an audience may be and consider where audiences view art	89	4.17	0.65
10. Provide opportunities for students to talk about different artworks	98	4.42	0.58

* %=Percentage of final-year preservice teachers who either "agreed" or "strongly agreed" they believed they could facilitate that specific teaching practice.

Appendix 3:**Table 3:**

Percentages, Mean Scores and Standard Deviations on Preservice Teachers' Perceptions of their Preparedness for Teaching Stage 1 (n=87)

Teaching practice	%*	<i>M</i>	<i>SD</i>
11. Extend the students' understanding of the concept of the artist	76	4.00	0.70
12. Discuss how artists make artworks for different reasons	85	4.09	0.66
13. Question students about what they do in their artmaking	93	4.23	0.56
14. Extend students' opportunities with different media, tools and techniques	89	4.14	0.67
15. Use examples of artworks and discuss abstract representations	87	4.17	0.75
16. Provide opportunities to observe characteristics through art	89	4.18	0.66
17. Demonstrate different viewpoints in artworks	86	4.05	0.73
18. Provide opportunities for students to talk and write about their artworks	99	4.44	0.52

* %=Percentage of final-year preservice teachers who either "agreed" or "strongly agreed" they believed they could facilitate that specific teaching practice.

Appendix 4:**Table 4:**

Percentages, Mean Scores and Standard Deviations on Preservice Teachers' Perceptions of their Preparedness for Teaching Stage 2 (n=87)

Teaching practice	%*	<i>M</i>	<i>SD</i>
19. Discuss how artistic intentions affect the choices artists make	64	3.74	0.80
20. Assist students to reflect on their own representational activity through questioning	82	4.08	0.77
21. Facilitate discussion about reasons for making art	87	4.14	0.66
22. Provide opportunities for students to meet and talk with artists about their art interests	62	3.70	0.72
23. Provide opportunities for students to view different kinds of artworks	92	4.26	0.64
24. Discuss ways in which subject matter and concepts are emphasised in artworks	87	4.01	0.66
25. Provide opportunities to explore different traditions and techniques in artmaking	92	4.22	0.62
26. Provide opportunities for students to make artworks about real experiences	98	4.39	0.64
27. Compare their interpretations of artworks with those of others	93	4.30	0.59

* %=Percentage of final-year preservice teachers who either "agreed" or "strongly agreed" they believed they could facilitate that specific teaching practice.

Appendix 5:**Table 5:**

Percentages, Mean Scores and Standard Deviations on Preservice Teachers' Perceptions of their Preparedness for Teaching Stage 3 (n=87)

Teaching practice	%*	<i>M</i>	<i>SD</i>
28. Provide opportunities to analyse and interpret subject matter	81	3.87	0.59
29. Extend opportunities to investigate and use various media, techniques and tools	78	3.90	0.67
30. Extend opportunities to explore and discuss concepts and subject matter	94	4.21	0.57
31. Use a range of construction techniques using clay and other three dimensional materials	77	3.94	0.78
32. Provide opportunities for students to critically reflect on their artmaking	97	4.31	0.58
33. Provide opportunities to make artworks that involve working in groups	98	4.41	0.54
34. Discuss different ways of valuing students' artworks and other artworks	94	4.26	0.60
35. Discuss how artworks may be ambiguous in their form, content and meaning	77	3.95	0.75
36. Discuss the contribution of artists, designers, craftspeople, architects in different times and places	87	4.08	0.61
37. Present ways to undertake research about particular artists, their work, and artistic styles	89	4.13	0.63
38. Arrange excursions for students, as audience members	97	4.36	0.59
39. Ensure students visit internet sites to investigate relationships between artists, the world, artworks and audiences, artworks and audiences	95	4.34	0.61

* %=Percentage of final-year preservice teachers who either "agreed" or "strongly agreed" they believed they could facilitate that specific teaching practice.

International Journal of Education & the Arts

Editors

Tom Barone
Arizona State University, U.S.A

Liora Bresler
University of Illinois at Urbana-Champaign, U.S.A.

Margaret Macintyre Latta
University of Nebraska-Lincoln, U.S.A.

Executive Editor
Gene V Glass
Arizona State University, U.S.A.

Associate Editors

David G. Hebert
Boston University, U.S.A.

Pauline Sameshima
Washington State University, U.S.A

Editorial Board

Peter F. Abbs	University of Sussex, U.K.
Eunice Boardman	University of Illinois at Urbana-Champaign, U.S.A.
Norman Denzin	University of Illinois at Urbana-Champaign, U.S.A.
Kieran Egan	Simon Fraser University, Canada
Elliot Eisner	Stanford University, U.S.A.
Magne Espeland	Stord/Haugesund University College, Norway
Rita Irwin	University of British Columbia, Canada
Gary McPherson	University of New South Wales, Australia
Julian Sefton-Green	University of South Australia, Australia
Robert Stake	University of Illinois at Urbana-Champaign, U.S.A.
Susan Stinson	University of North Carolina—Greensboro , U.S.A.
Graeme Sullivan	Teachers College, Columbia University, U.S.A.
Christine Thompson	Pennsylvania State University, U.S.A.
Elizabeth (Beau) Valence	Indiana University, Bloomington, U.S.A.
Peter Webster	Northwestern University, U.S.A.