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# Evaluation of School-based Arts Education Programmes in Australian Schools



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## EXECUTIVE SUMMARY

This is a report of evaluations of four Australian school-based arts programmes. The study addressed the following questions:

- What is the impact of each arts programme on participating students' academic progress, engagement with learning and attendance at school?
- Are empirical or anecdotal examples of improved learning outcomes substantiated?
- What are the attributes of arts programmes that are of particular benefit to the students?

The study was initiated following a national seminar conducted by the Australia Council in February 2002 and funded by the Australian Government through the Department of Education, Science and Training, the Australia Council and the Department of Communications, Information Technology and the Arts. The sites to be investigated were selected as a result of this seminar. They were seen as examples of good practice that might substantiate claims, from overseas studies and anecdotal evidence from Australian programmes, that exposure to the arts provides positive general learning outcomes, particularly for young people who are Indigenous, in remote or regional communities or from disadvantaged backgrounds. The selected sites offered a variety of arts programmes with a focus on drama (at two sites, Youth Arts with an Edge and Arts@Direk) and music (at two sites in the Northern Territory, *Boys' Business* and the *Indigenous Music Education Programme*). There was a range of ages from Year 4 (primary) to Year 10 (secondary) and a diverse range of backgrounds amongst the participating students.

The diversity of sites necessitated a variety of evaluation strategies. Field visits involving observation and interviews with staff and students were undertaken at all four sites. At two schools involved with Youth Arts with an Edge (*SCRAYP*), participating students and a control group undertook pre- and post- narrative writing tasks and a student questionnaire that measured attitudes to school and reading engagement. At Direk and three schools offering the *Boys' Business* music programme, participating students and a control group were compared on their system level results in literacy, numeracy, and writing and in an assessment of the generic Key Competencies of problem solving, communication, planning and organising and working with others.

The outcomes from the study substantiate evidence that involvement in arts programmes has a positive impact on students' engagement with learning and, for students from Indigenous communities, leads to improved attendance at school (attendance was not seen as an issue at other schools). Attempts to derive hard data for evidence of improvement in academic progress did not produce many significant results. In one case, at Direk, a Year 4 'arts rich' group scored significantly higher than a matched 'non arts rich' group on the generic competencies of problem solving, planning and organising, communication and working with others. The small amount of hard evidence relating to academic progress may be because of:

- the relatively brief time-span of this project,
- the fact that some students had participated in an arts programme for only a short time, and
- the diversity of arts programmes and age groups under consideration.

Moreover, the complex and diverse nature of the arts themselves suggests that it is difficult to capture adequately the positive outcomes of arts programmes through conventional correlational studies (Eisner, 1999).

The research showed that the arts programmes which were investigated did enhance students' potential to engage in learning in the following ways:

- Students' self-esteem is increased. The programmes help students to feel more confident about themselves and the contribution they can make and this in turn helps them to feel more positive about themselves as learners. In several cases the arts programme provided an environment in which it was safe for both students and teachers to take risks – a precedent for development of initiative and creativity. Related to this, arts programmes often provided students with exposure to positive role models. Of particular note was the remote Northern Territory site where students acknowledged that an Indigenous teacher/musician provided them with an inspirational model. The contribution of the arts to students' self-esteem was seen to be of particular significance for students from dysfunctional backgrounds and those who suffered from particular disabilities such as attention deficit disorder and autism.
- Students are better able to work co-operatively with others. This involves working together as a team to mount a production (musical or dramatic), learning that each person (including oneself) is an integral member of the team, and learning various social (emotional control/behaviour management) and communication skills needed to contribute to the team.
- Students learn to plan and set goals and at two sites (*SCRAYP* and *Arts@Direk*) recognition of the need for persistence was noted. Students learned that working hard over a relatively long time can be more rewarding than obtaining immediate results. This was summed up by a Year 4 student at Direk who said of drama: 'It was hard, but it was fun'.

Observations from the literature that successful school arts programmes tend to have strong support from management and tend to be led by a charismatic and inspirational practitioner were borne out by the programmes investigated in this study.

Evidence from the four programmes evaluated suggests that arts programmes that enhance students' learning have the following attributes:

- Plenty of *positive reinforcement*: wherever possible, negative behaviour is ignored (unless it interferes with the work of the group). Some kind of 'time out' during activities is accepted – students are not forced to join in all the time.
- Students are engaged in '*authentic*' activities in that they are often working towards a public presentation.
- *Consistent procedures and processes* (such as use of the drama circle), so that although the content of a lesson might be unfamiliar, the procedure remains constant and therefore familiar.
- Provision of a '*safe*' environment where risk taking is acceptable and everyone's contribution is valued. In some cases teachers are taking risks too and openly acknowledge that they are learning along with the students.

The extent to which skills and approaches acquired in arts programmes are transferred to other areas of the curriculum seems to depend to some degree on the school itself. Teachers in *SCRAYP* schools were doubtful about transferability, whereas at Direk, where there was a 'whole school' approach to the arts and the schools were caught up in a process of innovation, there was clear evidence of transferability of processes (for example, use of the disciplined approach of the drama circle in other classes) and skills (for example, students acknowledged that they used planning and goal setting in various contexts). Much of this successful transfer seems to be related to the fact that the mentoring programme at Direk was an integral part of the school programme rather than an 'add on', with the 'mentor' being a senior member of school staff who could work closely and frequently with those being mentored. Also, the school was particularly receptive to change, being caught up in a surge of interest in the arts and metacognition.

It is difficult to argue that particular features of programmes are unique to the arts, because ‘the arts’ encapsulates such a diverse range of activities. The following features emerged from this study. It could be argued that some of these features might be attributes of other (non arts) school programmes. With this in mind, it can be argued that the arts can provide:

- learning opportunities for students who do not fit the conventional mould of institutional learning. In particular, the opportunities highlight strengths and intelligences that often do not receive a lot of emphasis in other curriculum areas. Weak literacy skills can provide a seemingly insurmountable barrier to learning (a ‘cycle of failure’ was mentioned). The arts provide opportunities for students to start to learn and enjoy learning without experiencing the initial discouragement of having to display weak reading and writing skills.
- particularly tangible experiences of working in a team.
- an opportunity for reflection and constructive criticism. For example, after a performance students can consider: ‘What went well? How could we have done it better?’
- a ‘levelling’ effect – not only what is termed ‘inclusivity’, whereby students who have disabilities or who are socially ostracised for various reasons can be included. In addition to this, the arts provide opportunities for students, parents and teachers to work together on an ‘equal’ level; one does not need to be fully grown or to ‘know’ a lot to participate in arts activities.
- particularly helpful ways of expressing and exploring emotions.

The research reported here is a starting-point for exploring the impact of arts programmes on students’ learning and the attributes of arts programmes that are of particular benefit to students. There are various directions in which this research could be developed. These are outlined more fully in the conclusion, where it is suggested that the following areas might be investigated:

- the arts as a vehicle for learning in Indigenous communities;
- the conditions needed for transfer of learning processes in the arts to the general curriculum;
- the extent to which involvement in arts programmes may enhance students’ generic competencies and/or employability skills;
- a longitudinal study of the school and career paths of students who have participated in arts programmes that have the positive attributes identified by this study.



# 1 INTRODUCTION

## Background

An agreement was reached at the Cultural Ministers Council in August 2000 on the need for all Governments to be pro-active in strengthening the relationship between education and the arts as part of the Australian Government's ongoing commitment to ensuring high quality schooling for all Australians.

In response to this agreement a national seminar was conducted by the Australia Council in February 2002. This seminar was attended by representatives of the Australian Government, State and Territory education authorities and arts ministries, and senior arts education academics.

A significant outcome of the seminar was agreement on the need for new Australian research into current arts education practices in schools and their impact on the broader learning outcomes of students. A growing body of overseas research demonstrates the positive impact that exposure to the arts can have in the lives of young people. A pertinent example of this research is *Champions of Change: The Impact of the Arts in Learning* (Fiske, 1999).

A number of arts education programmes currently offered in Australian schools suggest that positive outcomes from exposure to the arts may be experienced by young Australians, particularly those who are Indigenous, in remote or regional communities, or from disadvantaged backgrounds. At the time of the seminar it was agreed that further investigation of this possibility was needed, in particular research to produce hard evaluative data.

This study examines four key 'best practice' arts education programmes which currently operate (or recently operated) in Australian schools to measure their impact on participating students' academic progress both in terms of learning in the arts, and the wider impact on learning across other areas of the curriculum.

## Research questions

The major research questions addressed are:

- What is the impact of each arts programme on participating students' academic progress, engagement with learning, and attendance at school?
- Are empirical or anecdotal examples of improved learning outcomes substantiated?
- What are the attributes of arts programmes that are of particular benefit to the students?

## Approach

The research consists of two main components:

1. a literature review of existing local and overseas research on the effectiveness of arts education on student achievement; and
  2. the conduct of a series of evaluations of 'best practice' arts education programmes in Australian schools to measure the impact that arts education has on both learning in the arts and the wider learning across other areas of the curriculum for the students involved.
-

Four programmes were selected as a result of the February 2002 seminar. These were:

- *Learning to learn* through the *Arts@Direk* Primary School, South Australia
- *SCRAYP – Youth Arts With an Edge*: Footscray Community Arts Centre, Victoria
- The Northern Territory *Indigenous Music Education Programme*
- The Northern Territory *Boys’ Business Music Programme*

The four programmes that were evaluated are diverse in their attributes and settings. They target groups that vary in age, cultural background and social characteristics. They involve different strands of the arts and different approaches to the arts. The priority was to select methodologies that would best capture the contribution and character of each programme using, wherever possible, objective evaluative data.

## Sources of data

A brief overview indicated that there was a need to use a variety of data collection sources for this study. Data were taken from a range of sources, including administrative records, interviews, observations, questionnaires and tests and other assessments administered as part of the study.

### *Learning to learn through the Arts@Direk*

This programme was evaluated by taking a case study approach that included interviews with teachers and students and observation of arts and non arts classes. The study also used system-level test scores measuring students’ literacy, numeracy and writing ability, and an assessment of students’ performance on a set of generic cross curricular competencies measured using the ACER developed Key Competencies Assessment tool [see Appendix II].

### *SCRAYP*

Four strategies were used to investigate the impact of *SCRAYP* on participating students’ progress in the arts and in other learning areas. First, *SCRAYP* workshops were observed at the four schools participating in the programme in 2003. Second, members of the *SCRAYP* team and teachers and administrators within the schools were interviewed. Third, *SCRAYP* students and control groups of Not-*SCRAYP* students in two schools were administered a narrative writing task at the beginning of the *SCRAYP* programme and another after it had ended. Fourth, participants in *SCRAYP* in two schools were asked to complete a small set of items from the Programme for International Student Assessment (PISA) student questionnaire which ask about attitudes to school and about reading habits and attitudes. The responses of *SCRAYP* participants around 15 years of age (the same age as those school students completing the PISA survey in 2000) were contrasted with responses of PISA participants with similar backgrounds.

### *The Northern Territory Indigenous Music Education Programme and the Northern Territory School Boys’ Business Music Programme*

For each of the *Indigenous Music Education Programme* and the *Boys’ Business Music Programme* a small sample of schools was researched using case study techniques. For three schools offering *Boys’ Business*, system-level achievement measures of the literacy and numeracy performance of programme participants were compared with similar students (boys in the same schools at the same year levels) who were not participating in the programme. Teachers were also asked to evaluate boys’ generic skills using the ACER Key Competencies Assessment tool [see Appendix II]. The competencies of problem solving, communication, planning and organising and working with others were assessed using this tool. At two schools

that offered the *Indigenous Music Education Programme*, and two schools offering *Boys' Business*, a sample of teachers who have been involved in teaching the students who participate in the music programme was interviewed. There was also one focus group discussion with students held in each school and music lessons were observed.

## Structure of the report

This report consists of six main chapters. These are:

- a literature review;
- an evaluation of the *Learning to learn through the Arts@Direk*;
- an evaluation of the Northern Territory programme – Boys Business Music Programme;
- an evaluation of the Northern Territory programme – Indigenous Music Education Programme;
- an evaluation of *SCRAYP*; and
- a conclusion.

The literature review helps to establish the context of the study. It also shows that previous research studies have not produced much hard-edged data about the impact of arts education programmes on student outcomes.

Each chapter dealing with an evaluation describes the methods used, their limitations and strengths, the findings and a discussion of the findings. Each of these chapters thus stands alone and can be read independently of the others.

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## 2 LITERATURE REVIEW

The Curriculum Corporation's *Statement of the Arts for Australian Schools* (1994) distinguishes five strands of arts: dance, drama, media, music and visual arts. This literature review is concerned with programmes covering any of these five strands, as well as programmes where one or more of the arts are delivered in an integrated fashion. Its purpose is to report on existing research on the effects of arts education in areas other than the arts.

According to a model of arts education outcomes posited by Harland et al. (2000), effects on students range from the most intrinsic and immediate, such as enjoyment and achievement in the arts, to less direct effects such as development of creativity and thinking skills, and finally to their extrinsic transfer effects to other areas of intellectual endeavour. The effects that are the focus of this review are those in the intermediate and extrinsic categories. They are presented here in the reverse order to that in which Harland's model proposes them, that is, academic outcomes are discussed first, followed by effects on 'enabling' or 'mediating' abilities and attitudes. The final section deals briefly with features of effective programmes.

The brevity of the final section should not be taken to imply that arts education is justifiable only or even primarily because of its influence on other fields of endeavour. In Britain, the National Advisory Committee on Creative and Cultural Education considers broad implications for the important role that the arts can play in creative and cultural education (NACCCE, 1999). The report recognises that 'intelligence' is multi-faceted, embracing more than traditional constructs of verbal and mathematical reasoning. The report does not down-play the importance of 'academic' areas, such as literacy and numeracy. (Indeed, in Australia there is compelling evidence of the importance of achievement in these areas, see Rothman & McMillan, 2003.) But whilst academic subjects are vitally important, the report argues that it is irresponsible to judge children's performance on academic subjects alone. Performance should be considered across a far broader range of areas. This approach is thus inclusive of young people who previously may have been deterred from school because of weak performance in academic subjects, and it highlights the importance of skills gained through creative and cultural education, such as imaginative activity and persistence. The approach to learning encourages the development of partnerships between schools and outside agencies, recognising that learning takes place all of the time, in many different contexts. The report interprets creativity as essential to development in both the arts and sciences, and it places importance on the role of arts programmes in helping young people develop these areas, thus confirming the role of the arts per se in education.

The unique contribution of the arts per se is not in question. However, the possible transfer effects of arts education are of important to educators searching for a solution to the problems of underachievement and poor motivation in learning more generally.

Discussion of outcomes is preceded by some comments on the extent and diversity of research undertaken in this area and on constraints on interpreting it.

### The array of research

The volume of quantitative and qualitative research investigating the relationship of arts programmes to academic achievement is enormous. One review (Hetland & Winner, 2001) located 11,467 publications and unpublished papers of this kind.

All but a tiny percentage of truly experimental studies have been American. This review has located only four relevant Australian studies (Bahr, 1997; Cheong-Clinch, 1999; McMahan, 1976, Schaffner, 1984) and one British (Harland et al, 2000). Australian studies are usually small-scale examinations of relationships between music study or achievement, and reading or mathematics skills.



No studies were found to focus specifically on the relationship between Media Studies or Film and achievement. This may be because Media Studies and Film are not considered to be arts programmes within the American educational context, where most of the arts education research is undertaken.

Many of the American studies are concerned with very young children, often in relation to reading readiness. Studies of this type have not been included in this review.

Undoubtedly the most prominent publications in the area have been *Champions of Change* (Fiske, 1999), *Reviewing Education and the Arts Project (REAP)* (Hetland & Winner, 2001) and *Critical Links* (Deasy, 2002). *Champions of Change* brings together several reports of different types on various arts programmes in the US, and their impact on students. Unlike *Champions of Change*, *REAP* and *Critical Links* are syntheses of existing reports. *REAP*, which was published as a whole issue of the *Journal of Aesthetic Education* (Volume 34, 3-4), offers statistical syntheses of the findings of 188 quantitative studies into the effects of arts education on academic achievement. *Critical Links* presents qualitative commentary on 62 studies, and in interpretive essays draws together threads for each of five areas of dance, drama, multi-arts, music and visual arts.

As a way of maximising coverage and representing the large and diverse field properly, this review draws heavily on the three publications cited above. Individual studies are discussed separately when warranted by their size, investigative power or particular pertinence.

This review, and the syntheses and studies considered in it, generally focus on the relationships between arts programmes and their outcomes rather than on the features of successful programmes. Nonetheless, a brief summary of characteristics of successful programmes is provided towards the end of the review. This information is derived where possible from the studies, and also to some extent from reports such as *Gaining the Arts Advantage* (President's Committee on the Arts & Humanities and Arts Education Partnership, 1999) and *Coming Up Taller* (Americans for the Arts, 1996) which are purely descriptive accounts documenting the practices of communities and school districts in providing effective arts programmes.

## Interpreting the studies

Although the array of existing studies is vast, the possibility of comparing and synthesising results is limited by the wide range of approaches adopted. Conclusions should be drawn with caution.

Naturally the technical design of studies varies. Certain writers (for example, Eisner, 1999) reject correlational studies as unconvincing, and require that full experimental designs be used. This review reports on both kinds of study. The overwhelming majority of studies are correlational, and we take the view that the large body of the correlational evidence, although unable to establish causality, does contribute to the general picture. Qualitative research is also an important source of information, different in kind and, as Wolf (1999, p.98) points out, especially useful in helping us to understanding why certain kinds of programmes are successful.

The arts programmes themselves vary greatly. They sometimes, but not always, add to existing arts programmes in the schools; that is to say, the programme being studied may or may not supplement ongoing arts programmes within the usual school curriculum. Most studies investigate stand-alone arts courses, but some are concerned with arts-infused curriculum delivery. Some arts programmes are conducted within school hours, and others outside them. The span of the programme may be as much as several years, or as little as a few days. The activities labelled 'drama', 'music' and 'arts' vary from study to study. Music

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variously encompasses choral music, instrumental music, 'taster' courses, and the study of musical notation. 'Drama' covers an even wider range: attending performances, imaginative play, classroom enactment of reading texts, improvisation, reading aloud from scripts, the writing of scripts, theatre arts, the mounting of a full production, performance of one's own poetry or script, and so on. General 'arts' programmes may involve theory of art or art making, or both, and may or may not be integrated into the wider curriculum. They usually, but not always, involve a combination of music, visual art and drama. Some studies of unspecified arts programmes are concerned with programmes that span a variety of arts, and others with various programmes each focusing on one of several possible art forms.

## Achievement in academic subjects

The literature most often uses the umbrella term 'academic subjects' or 'academics' when referring to recognised school subjects such as mathematics and language arts, and components of these, such as spatial-temporal abilities. For simplicity the term 'academic subjects' is used in this review.

Perhaps the most noted study of relationships between arts programmes and achievement in academic subjects is that by Catterall, Capleau & Iwanaga (1999), reported in *Critical Links*. The researchers analysed National Educational Longitudinal Survey (NELS) data on a cohort of over 25,000 students from Grade 8 to Grade 12. 'High-arts' students – those involved in arts-related courses in or out of school, and those involved in extracurricular arts activities at school – performed better than 'low-arts students' on every measure reported, including those for English, reading and history/geography/citizenship. The effects were more significant for students of low than high socioeconomic background. Building on research such as that by Rauscher et al. (1997), Catterall et al (1999) used the NELS data further, to investigate the relationship between training in instrumental Music and mathematics. They found that students with high involvement in instrumental music from middle school onwards did better than the average student in Year 12 mathematics. In the Australian context this result is consistent with the findings of a small-scale study by Bahr (1997). The results for Music as well as for the more general arts programmes were independent of socio-economic background, and in both cases, the advantage to high-arts students increased as the students progressed through the school.

Catterall, leading another research team (Catterall & Waldorf, 1999) for *Critical Links*, evaluated the Chicago Arts Partnerships in Education (CAPE) programme, where local artists and arts agencies work with schools to integrate one of the arts into the curriculum of schools in poor areas. Student achievement on the Iowa Test of Basic Skills over a six year period improved more for CAPE than for non-CAPE schools. The effects were strong at both elementary and high school level, but were not statistically significant at high school level, possibly because only a small number of high schools were involved. Catterall and Waldorf (1999) do not claim to have established causality in these studies, but such strong levels of association cannot be disregarded.

One project that did examine causality was Harvard Project Zero's *Reviewing Education and the Arts Project* (REAP) (Hetland & Winner, 2001). The project synthesised 188 reports on the effect of the arts (music, drama, dance and arts-rich education) on academic achievement. Their results were controversial and unpopular (Bumgarner Gee, 2001). In ten meta-analyses, causal links were established in only three areas: listening to Music and spatial-temporal reasoning (deemed to be a temporary effect); learning to play music and spatial-temporal achievement, for both the general population and the population at risk of dropping out or failing at school (the result was stronger when instruction included music notation); and classroom Drama and a variety of verbal skills. Causal relationships were also observed for learning to play a musical instrument and mathematics, and for Dance and non-verbal reasoning, but these results were based on a small number of studies. No causal links were

found for arts-rich education and verbal or mathematics scores, or creative thinking; or for visual arts, dance or learning to play music, and reading.

It is worth observing that, although the *REAP* studies were usually not able to establish causality, neither did they disprove it, and in fact often pointed to high levels of association of some kind. This was true for music performance classes and reading (Butzlaff, 2000), for music and mathematics (Vaughn, 2000), and for arts classes generally and summed verbal and mathematics scores (Vaughn & Winner, 2000; Winner & Cooper, 2000). While recognising the possibility that the associations might be influenced by factors such as student self-selection for arts classes, the high degree of association found in these and in other studies merits further thought.

The *REAP* findings for Drama (Podlozny, 2000) are particularly interesting. In this study, Podlozny conducted a series of meta-analyses of a large number of existing studies. Moderate relationships were found to exist between Drama instruction and a variety of verbal skills including reading achievement (Years 1 to 11), oral language development (Pre-school to Year 7) and writing skills.

Bemoaning the state of research in arts education, Podlozny says that there is 'very little conversation among researchers, replication of studies is rare, consistency of measures is almost nonexistent, methodology and reporting of results span the range from 'excellent' to 'poor', and the labels used for 'drama' (e.g. sociodrama, creative dramatics, thematic fantasy play) have no set definitions' (2000, p. 239). From the perspective of this review, another shortcoming of the available research for Drama is that it tends to focus on pre-schoolers and very young primary school students.

Another study with disputed results was Luftig's (1994) second-year evaluation of the SPECTRA+ project. (See Eisner, 1999, for an example of criticism.) In the SPECTRA+ programme, involving elementary students from four schools, individuals were integrated into the curriculum. Despite methodological problems, in a complex set of results this study is sometimes said to provide evidence that arts programmes have important effects in non-arts academic areas. See for example Murfee (1996).

*Transforming Education Through the Arts Challenge* (TETAC, National Arts Education Consortium 2002) is another evaluation of a large-scale project in which arts were integrated into the curriculum. This project operated in 35 schools across the United States over a five-year period. TETAC adopted a Comprehensive Arts Education (CAE) approach, based on the 'arts as a discipline' theories of Manuel Barkan, whereby arts are integrated with other subjects and treated with at least equal rigour. Unlike many of the arts projects discussed in this review, CAE does not favour performance or creation of art over the historical or the critical. CAE is delivered using inquiry-based practices that are considered to allow for the diverse learning styles of students, and to be particularly suitable for students who are at risk of failure.

Although the four-year evaluation found no hard evidence to indicate that Comprehensive Arts Education caused improvements in academic subject scores or even attendance rates, the teachers in the programme were strongly of the opinion that CAE 'had a broad impact on students' thinking'. (National Arts Education Consortium, 2002, p. 65).

An important British review of arts education and its effectiveness (Harland et al., 2000) combined case-study and survey methodologies with analysis of General Certificate of Secondary Education examination data on 27,000 students. Students and teachers in case-study schools (selected for their strong arts programmes) believed that school arts programmes had positive effects on achievement in other subjects, but this was not corroborated by the surveys of over 2000 students. Analysis of the test data found no

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significant relationships between study of the arts and English, mathematics, science or average scores for non-arts subjects.

Despite the Harland report, the evidence for transfer to academic subjects seems most convincing for Music, particularly when musical notation forms part of the programme. Little can be said about the effects of Dance, because it is often subsumed under a more general heading of 'arts'. See, for example, Oreck, Baum, & McCartney (1999). Studies specifically concerned with Dance tend to deal with pre-schoolers or very young primary schoolers. Of those that do deal with older students, few look closely at academic outcomes. For example, in their review of Arts Connection's *Young Talent Programme*, Schmitz, N. B., Mazzulla, D., & Hyatt (2000, p. 77) limit themselves to a statement that 'it seems clear that for most students the Young Talent experience did not adversely effect (sic) their academic performance.'

No studies were identified which isolated the effect of the visual arts programmes on non-arts outcomes.

### Enabling skills and attitudes

The outcomes discussed in the previous two sections can be thought of as ends in themselves. This section deals with outcomes whose value is partly instrumental, in the sense that they are necessary for, or at least can enhance, academic and competency outcomes.

Primary among these facilitating outcomes is motivation or engagement. Fullarton (2002, p. 3) notes that several Australian studies have established that engagement is positively related to 'academic achievement, and ... other educational outcomes, including better attendance and aspirations to higher levels of education'.

Severe disaffection with school can lead to early drop out. About nine per cent of Australian students leave school before the start of Year 11 (Marks & Fleming, 1999), and the proportion is higher for Aboriginal and Torres Strait Islander students.

It has been claimed (Bamford, 2002, p. 18) that in our 'rich global aesthetic environment' of animation, video and computer games it may be that the arts can engage middle school students in a way that other disciplines cannot.

An American study (Barry, Taylor, & Walls, 1990) investigating the possible impact of arts education on drop-out rates included a small survey of students who had been considered at risk of dropping out of school. Twenty-two of the 36 students answered 'yes' when asked whether something about the arts had kept them at school. Despite the small sample and other limitations of the study, it does indicate something of the motivating potential of arts programmes.

Burton et al. (1999), in their study of over 2000 upper primary and lower secondary students, found significant relationships between exposure to arts-rich school curricula and 'creative, cognitive, and personal competencies needed for academic success' (p. 36), namely fluency, creativity, originality, elaboration and resistance to closure. Students in arts-rich environments were also more confident of their academic abilities than other students, and more likely to have good rapport with their teachers.

As with Burton et al, fluency was one of the areas in which teachers noted improvement in TETAC (National Arts Education Consortium, 2002). Others were general motivation, the ability to make connections across subject and content areas, to think more creatively and to ask better questions.

Heath & Roach (1999) investigated self-esteem, this time in the context of community programmes for disadvantaged youth. When compared with a cohort from the National Educational Longitudinal Survey, these students rated significantly higher on the four different self-report indicators of self-esteem used. According to Schmitz et al (2000, p. 76), participants in YoungTalent's Dance programme as well as their teachers and parents note improvements not only in self-esteem, but also in positive attitude, increased sense of responsibility towards others, and discipline.

Catterall et al's (1999) analysis of NELS data found that students involved in the arts were less likely to leave school early, and were more likely to have attitudes and behaviours conducive to school achievement, regardless of socio-economic status. These included improved self-concept and motivation, empathy, tolerance, interest in school.

Earlier in this review, language achievement was treated as an academic outcome, usually in the form of English or reading. However, linguistic competence can be thought of as an enabling skill. In a Tasmanian study (Schaffner, Little, & Felton, 1984) language samples were collected from about 300 Grade 5 and 6 students during improvisational Drama sessions over two terms. When the language samples were compared with samples of ten-year-olds' language gathered for an earlier study, it was found that Drama sessions extended the range of purposes for which students used language in class. Whereas standard classroom language tended to be informational, in the Drama sessions the language was more often of an expressive type (for imagining, reflecting, predicting, speculating and reasoning) considered by the authors to be essential for further development of abstract thought and for academic progress.

Heath & Roach (1999) pursued a related line in their *Critical Links* study of community-based after-school arts programmes for underprivileged youth. According to Heath & Roach, arts programmes offer much needed opportunities for students to converse with adults and to hear and use the language of planning, decision-making and developing strategies, which is essential for effective adult life.

## Features of successful programmes

It is appropriate to make some comment about the qualities of successful programmes. Only a small minority of reports document the practices of effective programmes, either in the context of students who are at risk of dropping out of school or more generally. Leaving aside the question of how one might define success in this context, the identification of the characteristics associated with success is bedevilled by the fact that, as noted before, there is not a great deal of commonality between arts programmes in the range of published studies and reports.

Nonetheless, some themes do emerge, namely:

- *Supportive administration* (Burton et al, 1999; Catterall & Waldorf, 1999; Harland et al, 2000; National Arts Education Consortium, 2002). This feature can usefully be considered in the light of school or curriculum reform as an intended or unintended outcome of arts education programmes (Arts Education Partnership, 1999; Fowler & McMullan, 1991; Luftig, 1994; National Arts Education Consortium, 2002; Harland et al, 2000)
  - *Quality provision and expectations of excellence* (Americans for the Arts, 1996; Barry et al, 1990).
  - *Recognition of progress and accomplishment* (Americans for the Arts, 1996; Barry et al, 1990)
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- *Opportunities for individualised instruction* (Americans for the Arts, 1996; Barry et al, 1990)
- *Risk taking*. Students (and teachers) are encouraged to take risks, and the environment supports them, making their risk-taking safe and giving permission to make mistakes (Barry et al, 1990; Seidel, 1999; Heath and Roach, 1999).
- *Innovative teaching techniques* (Americans for the Arts, 1996; Burton et al, 1990).

Of the features listed here, it may be that arts education, by the nature of its content, is particularly well placed to provide opportunities for programmes characterised by the last three qualities in this list.

## Conclusion

The picture offered by the literature is a very mixed one, in part because of the variety of approaches taken in the arts programmes and the studies themselves. There is not a great deal of hard evidence that arts programmes cause improvements in academic outcomes. However, the strength of the associations between some of the arts, notably Music and Drama, and particular academic areas, cannot be disregarded.

The absence of direct evidence may partly be the result of poor methodology and lack of consistency in approach. It may also be that the relationships between arts programmes and outcomes are more complex than our current paradigms allow. In the words of Aprill (2001):

‘The problem...is not whether the content areas are actually connected or not (they are), but rather the assumption that that connection is linear – that is, that learning in the arts is a little lever that you press, and out pops a little knowledge pellet in science or math or social studies. It is the interaction of and the translation between the arts and language and mathematics as symbol systems, the mediating between different domains of knowledge which generates the learning as authentic intellectual works.’

### 3 ARTS@DIREK IN SOUTH AUSTRALIA

#### Overview

The combined campus of Direk Schools is an environment rich in the arts. The particular programme to be evaluated involved drama mentoring. This was part of a collaborative teacher research programme: Mentoring to enhance professional understanding of literacy learning through the expressive Arts. It was funded by the Spencer Foundation and resulted in a substantial series of reports published in 2002 (Spencer Foundation, 2002). This research tied in closely with the school's involvement in the *Learning to Learn* project (Department of Education and Children's Services, South Australia, [www.learningtolearn.sa.edu.au](http://www.learningtolearn.sa.edu.au)). Drama mentoring was one focus of the Spencer programme research, taken up by five staff. Other areas included the teaching of thinking skills and developing a curriculum in emotional intelligence.

The Spencer Foundation research commenced in May 2001 and ran for 15 school weeks. Extensive work was completed by the teachers during this time. There were 'research mentors' from the University of South Australia, who met with the staff involved in this programme who provided assistance with documentation and methodology. Much of the programme focused on enhancing teacher and student self confidence. At the end of 2002, the drama mentor who was a senior staff member at Direk received a promotion that took her outside the school. The programme did not continue in a formal sense after her departure.

The timing of this research study meant that the programme was evaluated retrospectively. The programme had not been running for long enough to have impetus to continue without the inspiration of the drama mentor who had been promoted, but evidence of its influence was nevertheless apparent in classroom observation. Teachers who had participated were aware of ways that they had been influenced, and students who had participated were able to remember their experiences.

The evaluation included two site visits where general classes were observed, arts programmes were observed, teachers were interviewed, and students participated in a discussion. The performances of two groups of students were compared on system level tests (Literacy, Numeracy and Writing) and Key Competencies (problem solving, communication, planning and organising and working with others). One of these groups was described as 'arts rich'. They had participated in the drama programme and had a high level of 'extra' arts involvement (such as instrumental music lessons and dancing lessons) a second group was described as 'non arts rich'. This group had not participated in the drama programme and did not have as high a level of arts involvement as the 'arts rich' group. All students in the school are exposed to some arts education – particularly visual arts.

In trying to discern ways that the drama programme may have affected students' learning, the researchers had to be mindful of effects from the *Learning to Learn* programme running in the school. For this reason it would have been inappropriate to make comparisons with a group outside Direk as it would be impossible to know whether differences observed were attributable to drama mentoring (and enhanced arts) or the *Learning to Learn* programme.

This chapter reports on the evaluation of the drama mentoring programme at Direk Primary School. It considers the extent to which the programme has enhanced students' learning outcomes. In doing this, it addresses the overall aims of this study, namely:

- To measure the impact arts education has on learning in the arts and wider learning across other areas of the curriculum; and
  - To identify particular attributes of programmes that benefit students' learning.
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## Background

### *The School*

Direk Schools is a combined campus of three school sectors: preschool (aged 3 – 5 years), junior primary (aged 5 – 8 years) and primary (aged 8 – 13 years). Facilities are shared and the sections operate as one school.

In this report we refer to Direk as one school. All three sectors were observed, but most attention was directed to the primary level.

The staff team of 34 teachers and 19 administrative officers operates in a collaborative way. There are 650 students from a range of backgrounds: primarily white Anglo Celtic. The school is classified as ‘disadvantaged’.

### *Arts in the school*

In addition to Drama, the school has a lively arts programme with strong participation in the visual arts, music and dance. Parents strongly support arts activities in the school.

The year 2000 was one of whole school involvement in the arts. It was viewed by the Deputy Principal as a ‘watershed’. She described it as ‘an incredible surge of energy around the arts’. Coupled with this there was an intense interest in aspects of metacognition. The school became involved in the *Learning to Learn* Project (L2L), which aims to support schools as they try to transform the learning for staff and students so that it is compatible with the diverse needs of the 21st Century. One of the aims most consistent with the interests at Direk was ‘to involve curriculum leaders in . . . developing new capacities to work in a consistent flux of theory and practice to support the co-construction of curriculum’ (<http://www.learningtolearn.sa.edu.au>). There was also a strong interest in helping students to construct their own learning and in developing their confidence as learners. These experiences provided a backdrop for the Drama mentoring, which started in 2001.

In 2002 the school produced a video, ‘*Arts in the Curriculum*’. This encapsulates the school’s approach to the arts where they are integrated into the teaching of verbal/ language/ thinking skills, and other metacognitive skills such as reflection and evaluation. All of the senses are seen as important means of learning. This approach is premised on the view that the arts are for everyone and everyone is artistic.

## Data

Two site visits were undertaken. The first in March 2003 included:

- a general introduction to the school;
- gathering of background information on the Drama mentoring programme;
- provision, at a staff meeting, of an introductory seminar on generic competencies assessment;
- interviews with staff who were involved in the Drama mentoring programme; and
- classroom observation.

The second visit, in June, included:

- interviews with teachers of the ‘arts rich’ and ‘non arts rich’ Year 4 students;



- interview with the deputy principal;
- discussion with a selected group of five ‘arts rich’ students;
- observation of lessons and preparation for the school musical (involving approximately ninety students);
- assistance with generic competencies assessment; and
- reading of reports (for further background) on the Drama mentoring programme.

Initially there was some concern about the feasibility of gathering data that would enable comparisons of outcomes for students who had participated in Drama and those who had not. This was because we understood the Drama programme to be ‘whole school’ and expected that there would be no group of students in the school who had not participated in Drama. However, given that the Drama mentoring was no longer operating in any formal sense, the researcher could work with one group of students, described as ‘arts rich’, who had participated in Drama mentoring and, from school records, had been involved in enhanced arts activities (such as music and dancing lessons) in the school, and with a second group labelled ‘non arts rich’ who had not undertaken Drama and who had less arts experience.

The school agreed to make State-wide testing data available to the study.

The impact of the arts education programme on learning in the arts and wider learning across other areas of the curriculum was investigated by comparing the achievements of the two groups of students described above. The background characteristics of the two groups were reported by members of the school staff as similar. This suggests that differences between the two groups may be explained by their different levels of exposure to the arts, in particular, the drama programme. However, it is important to note that this design is quasi-experimental and that since the groups were pre-existing, the researchers were unable to randomly allocate students to either group over an extended period of time. It is impossible, therefore, to establish the probability of an unidentified set of factors systematically influencing the results.

The following variables were measured for the assessment of the impact of the arts programme at Direk:

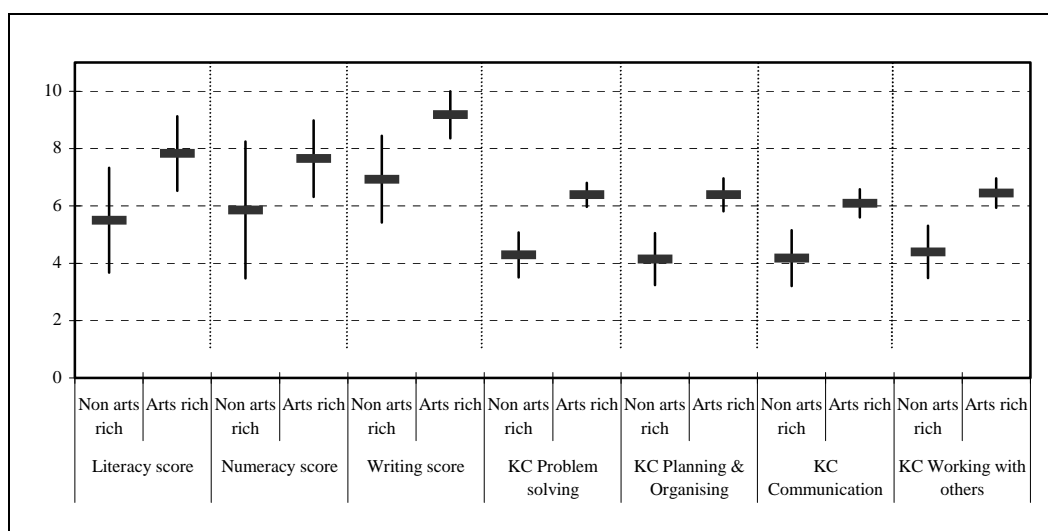
- writing, literacy, numeracy – these scores were obtained from the state-wide assessments undertaken by the South Australian Department of Education
  - the Key Competencies of problem solving, planning and organising, communication and working with others – these data were collected as part of this study using the *Key Competencies Assessment* tool, developed by ACER (see Appendix II, McCurry & Bryce, 1997; McCurry, Macaskill & Bryce, 2003)
  - student attendance figures were examined and there were no significant differences between ‘arts rich’ and ‘non arts rich’ groups. (Whereas initially, attendance was expected to be an important indicator of engagement in learning, all schools in this study except those for the *Indigenous Music Education Programme* considered that attendance was not an important issue.)
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## Outcomes

### *The impact arts education has on learning in the arts and wider learning across other areas of the curriculum*

Figure 1 below shows the mean-point score estimates<sup>1</sup> bounded by their 95% confidence intervals for: literacy, numeracy and writing scores, and the four Key Competencies, for Year 4 students who had or had not participated in an ‘arts rich’ programme at Direk . The dark horizontal line marks the mean. The vertical lines indicate the confidence intervals around each mean. If these lines overlap with the lines marking the confidence limits around other means, then there is not a statistically significant difference between the means.

For the writing score, and for each of the measured Key Competencies there is a statistically significant difference between the two groups of students because the vertical lines do not overlap.. In each case, the ‘arts rich’ group of students scored higher than the ‘non arts rich’ group of students. These findings indicate that the ‘arts rich’ students, on average, wrote better, had higher problem solving, planning and organising, and communication competencies, and were better able to work with others. Given the limitations entailed by the quasi-experimental design of the study and despite the small student numbers available in each group (i.e., ‘arts rich’ n = 17, ‘non arts rich’ n = 14), these findings are of particular interest, providing strong indications of positive outcomes for those students in the ‘arts rich’ group.



**Figure 1** Mean and 95% confidence intervals for literacy, numeracy and writing scores, and Key Competencies comparing Year 4 ‘arts rich’ (N=19) versus ‘non arts rich’ (N=20) programmes

<sup>1</sup> Note that each of these scores represent ratings on an 8-point ordinal scale of increasing attribute.

### ***Attributes of programmes that benefit students' learning***

Students at Direk were observed to be resilient, resourceful and self-reliant and to have developed certain metacognitive skills that help them to be independent learners. It is not possible to confirm the extent to which these characteristics have been developed as a result of participation in the arts and the extent to which they have been gained through the school's involvement in the *Learning to Learn* project mentioned above. But the characteristics discussed below do have some direct connection with arts involvement.

The discussion below is based on the interviews, discussions and observations undertaken at the two site visits.

It is clear that Drama mentoring has influenced teaching at Direk in an informal way, even for those teachers who did not participate in it, and it has blended with the *Learning to Learn* strategies in the school. As mentioned above, there were no teachers or students participating in Drama mentoring in 2003, and some teachers had little direct knowledge of it. In spite of this, it was apparent, as discussed below, that the particular approach to Drama had made an impression still evident in the approaches to learning observed in several classrooms.

Interviews with students in the 'arts rich' group demonstrated clearly that they could describe their Drama experiences. This factor itself suggests that the experience of Drama had been powerful for these students and the learning strategies gained from the sessions had helped students to retain information. It was surprising, for example, that more than a year later, they were able to re-enact a scene about pollution.

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Table 1 below summarises the learning characteristics of students that seemed to be attributable to involvement in the drama programme at Direk. These data were gathered from the field visits, from observation, interviews and discussions.

**Table 1 Outline of Enabling Skills and Attitudes Observed at Direk Primary School**

Skills and Attitudes	Source
Students reflect on their learning by using a 'learning log'	<ul style="list-style-type: none"> <li>• Discussion with Year 4 students reflecting on Year 2 Drama. They were aware that they had transferred these skills, as they are using them now, for example in Science &amp; Technology: 'We were allowed to write down what we learned – what we thought we learned'. (One student remembered this as 'too much writing'!)</li> <li>• Children as young as five (in Reception), were encouraged to reflect on their learning and could articulate what they had learned, although they were too young to keep a written log. The researcher observed them stopping an activity and reflecting on what they had learned. Their teacher had been actively involved in Drama mentoring.</li> <li>• A teacher commented on how Drama developed students' reflection and self evaluation. 'If something didn't work well, it would be – rethink it. And they would do it again.'</li> </ul>
Students become used to a disciplined approach to learning	<ul style="list-style-type: none"> <li>• The 'Drama circle' used in the Drama mentoring approach had been transferred to the idea of a 'Learning Zone'. Most classrooms observed had a 'Learning Zone'. When students are ready to learn, they go to this zone. In this zone they must be learners (cannot disturb others, etc.).</li> <li>• The researcher observed this in action in classrooms (several of which were open plan – eg four Year 6 classes in the one large room, each class with its 'Learning Zone'), and teachers commented on how well students responded to the structure in Drama – even if they did not know the topic, they knew what to expect, and developed a process for learning.</li> </ul>
Students learn how to plan	<ul style="list-style-type: none"> <li>• In Drama, students were engaged in discussions such as: how can we get this result? They had to focus on a task at a given time. 'When they go off to rehearse (during a Drama session) they only have, literally, about three minutes. So it puts pressure on them to be on task.' (teacher interview).</li> <li>• The Researcher observed six and seven year olds planning what activity they needed (for their learning sequence) and independently undertaking the activity, asking for help only if required.</li> </ul>
Students develop confidence in themselves as learners	<ul style="list-style-type: none"> <li>• Drama elicits children's natural creative abilities (play) rather than a more traditional, institutional approach to learning. This is particularly helpful to those students who do not fit the institutional mould of a traditional school (teacher interview).</li> <li>• The Deputy Principal noted that involvement in Drama has helped students develop confidence to participate in school assemblies and on the Student Representative Council: 'I</li> </ul>

Skills and Attitudes	Source
	<p>look at students who run assemblies. I look at students who are elected to the SRC, and I know that those students have come, very largely, from the Drama programme.’</p> <ul style="list-style-type: none"> <li>• Teachers discussed examples of students gaining sufficient confidence to take risks – and thus be imaginative and creative.</li> </ul>
<p>Students who are disadvantaged or disabled gain confidence</p>	<p>All of the following were mentioned in teacher interviews:</p> <ul style="list-style-type: none"> <li>• A student with very low literacy skills was motivated to write a journal.</li> <li>• Another student with low literacy skills was moved to write and illustrate a piece, asking the teacher: ‘would you please write “wheelbarrow” for me?’. The teacher said of this: ‘It was an intrinsic message that the student felt he had succeeded.’ The student was asking for a ‘hard word’, like his peers.</li> <li>• A student with very low self esteem was accepted by others and given an important role – the class wanted ‘to see him do it again’.</li> <li>• A student with autism found Drama a very calming experience (and was thus able to participate better). The teacher suggested that this was because the boundaries were so clear and he didn’t have to be ‘himself’ in the lesson.</li> <li>• A student with ‘global delay’ (trouble relating to the outside world) had required an assistant, but after 2 drama lessons the assistant was no longer needed.</li> <li>• A student with attention deficit disorder was drawn into the formality of the Drama circle and able to participate.</li> </ul> <p>Nearly two years later, two of these students had left the school. The Drama experience was continuing to be helpful for the child with autism. Although Drama was not a ‘cure’, it did mean that, for these students, learning at school could be associated with a positive, inclusive environment.</p>
<p>Students learned how to work together</p>	<ul style="list-style-type: none"> <li>• One teacher commented: ‘So often you get students who don’t want to work with each other. [In Drama] they got used to being close and having to join up with their arms or their legs, and there was no fuss about who they were working with.’</li> <li>• Another teacher commented: The social skills were wonderful – they got a lot of confidence and they were just praising each other, which was wonderful to see as well. They loved sharing. They loved telling other people.’</li> <li>• In the Year 1 and 2 group, the children work at tables in groups of four. The class ‘brainstorms’ how to make up the groups.</li> </ul>
<p>Students learned perseverance</p>	<ul style="list-style-type: none"> <li>• Students learned that it is necessary to work hard and long to achieve a desired goal (such as a good Drama performance).</li> </ul>
<p>Skills or ‘intelligences’</p>	<ul style="list-style-type: none"> <li>• One teacher, who had participated in Drama mentoring,</li> </ul>

Skills and Attitudes	Source
other than logic/ deductive, verbal/ numeric are acknowledged	described how Year 1 and 2 students learn about shapes through movement.
Safe climate for risk-taking	<ul style="list-style-type: none"> <li>Teachers commented that drama mentoring gave them and their students confidence to take risks – an important ingredient for the development of creativity (Burton et al, 1999).</li> <li>One teacher said, ‘It’s allowed me to just have a go at stuff that I would never have done before. Especially our teaching style has changed so much. I’m not the same. A completely different approach. More constructivist.’</li> </ul>

As noted in Table 1 above, the Drama mentoring gave confidence to teachers, enabling teachers and students to take risks together. The support of risk taking is another element mentioned in Burton et al. (1999) as an ingredient of a successful arts programme.

Table 2 below sums up attributes of the drama mentoring programme that assisted students and teachers to develop essential learning characteristics.

**Table 2 Summary of the attributes of the drama mentoring programme that assisted learning**

Attribute of the programme	Source
Strong support for the programme from senior management in the school	Mentioned in staff interviews and apparent from time spent in the school.
An inspirational mentor	Mentioned in interviews/ discussions by staff and students.
All contributions from participants were valued	Student (or teacher) views were valued and made use of – mentioned in interviews/ discussions by staff and students.
Mentoring, as professional development, was an integral part of the school programme	The mentoring was not an ‘add on’ – teachers could ‘tap into’ it at any time and it was scheduled as a regular part of the school time-table – from documentation and teacher interviews.
Processes and structures were transferable (generalisable)	This is connected to the attribute of being an integral part of the school programme. The mentor was a part of the school, she had an overall impression of directions in which the learning was heading, thus processes such as using the ‘drama circle’ and learning logs were transferable to other lessons. This was observed by the researcher and mentioned in the discussion with students.

There was a real sense that the mentor’s promotion out of the school had left a gap and that there was ‘unfinished business’. Some teachers, although strongly influenced by the experience, felt that they had not gained sufficient confidence to ‘fly on their own’. The students, in particular, made frequent mention of their disappointment that the mentoring had to finish.

The drama mentoring experience had been synthesised into the rich environment of learning through the arts that was apparent in the school and that although the moving on of the mentor

was seen by participants as a 'loss', there was sufficient stimulation from other areas to keep up the momentum of change in the school. The situation was summed up by the Deputy Principal: 'I think that what is left from the Drama mentoring on its own is perhaps not as easy to determine as what's left from that as a part of a transformational change. Because I believe that for many individuals and groups working together there was significant transformational change that happened and that the Drama mentoring was part of it.'

## Discussion

Data from this study do suggest that exposure to an 'arts rich' learning environment may have an impact on learning, in terms of enhancing writing skills and the generic competencies of problem solving, planning and organising, communication and working with others. These findings need to be tempered by acknowledgement that it is very difficult to prove that it was the arts per se that have had this effect. Some confidence, however, can be drawn from the fact that all of the students in the study ('arts rich' and 'non arts rich') attended the same school (Direk) and all would have been exposed to other factors that may have affected these results, such as the *Learning to Learn* project.

Information from observation, interviews and discussion suggest that elements of the Drama mentoring programme did benefit students' learning. In particular, the formality of the process with the Drama circle, the use of metacognition, such as evaluating and rethinking followed by planning, were attributes of the Drama experience that seem to be directly related to beneficial learning practices. Also, the fact that Drama itself develops imagination and self confidence seems to have helped some students to gain social skills and to feel more comfortable about being at school. This balance of focused concentration and persistence with the pleasure of achievement and expression of feelings was summed up by one of the 'arts rich' students when he was reflecting on the Drama experience, he said: 'It was hard, but it was fun.'

What were the features of the drama programme at Direk that helped to enhance learning in the school, and which of these features were exclusive to its being an arts programme?

### *An integrated approach*

- The programme was 'whole school', not an 'add on' for teachers or students.
  - The 'mentor' was a member of school staff, so she had an intimate knowledge of the school environment.
  - Both the teachers' and students' learning was integrated into the normal school programme. For example, teachers could 'tap into' someone on the spot and try out or share their new learning over the course of an ordinary school day.
  - It was made evident that teachers were learning with the students; they were 'risk taking' together.
  - This integrated approach may have helped students to transfer metacognitive skills acquired in drama (such as reflection: What have I learnt? What do I need to know?) to other school subjects.
  - Having an integrated approach appeared to encourage transfer of the *processes* of drama to other subjects (such as a 'drama circle' idea being transferred to a 'learning zone' in other lessons). Had drama been viewed by students or teachers as 'unusual' or 'extra' (as would be the case if it were an 'add on'), they may have less readily applied the processes to other school subject areas.
-

### ***Features of a successful arts programme***

To what extent do the features of drama mentoring at Direk reflect those features of a successful arts programme outlined in the literature review (chapter 2 of this report)?

The following features of successful arts programmes were identified at Direk.

1. Supportive administration

In interviews, teachers made frequent reference to the strong support given by the Principals and Deputy Principal of the three Direk school sectors. For example, one teacher said, 'One of the best things about this school is that the senior staff value the arts . . . if you didn't have other people who believed in it, it wouldn't get off the ground'.

2. Quality provision

Because the programme had finished, the quality was difficult to judge as performances could not be observed. It was evident, however, that the quality of the mentor's interactions when working with young people and with teachers was inspirational.

3. Recognition of progress

Recognition of progress seems to have been an integral part of the way the mentoring occurred. There was constant encouragement for both teachers and students.

4. Risk taking

Risk taking was most definitely a strong feature of the programme.

5. Innovative teaching techniques

This could be said to be the 'raison d'etre' of the programme at Direk.

The features mentioned above are not necessarily exclusive to an arts programme. But they were essential ingredients of the drama mentoring at Direk. It is difficult to argue that particular features are exclusive to arts. But the following can be mentioned.

### ***Features exclusive to the arts***

- The way that drama was presented at Direk did not depend upon students being able to read or write or to be physically agile, thus it was inclusive and encouraged the participation of students with disabilities and those who had been unwilling to participate in other school activities. In this way it gave students with strengths in areas other than academic or kinaesthetic skills an opportunity to blossom and to learn various concepts (such as shape) through less conventional means.
- Students were involved in authentic activities, such as mounting a production that was potentially a public performance. This helps to make learning 'relevant' for many students. It can be argued that other subject areas also provide authentic activities. This is so, but for arts subjects at Direk, the *purpose* was seen as authentic.



## Conclusion

### ***Evidence that arts involvement at Direk was associated with improved learning***

Comparing an 'arts rich' and a 'non arts rich' group of Year 4 students suggests that the 'arts rich' students, on average, wrote better, had higher problem solving, planning and organising, and communications competencies, and were better able to work with others.

### ***Enabling skills and attitudes acquired by students that appeared to be related to the experience of drama mentoring in the school***

The following enabling skills and attitudes acquired by students were observed during the fieldwork:

- Students reflecting on their learning;
- Students becoming used to a disciplined approach to learning;
- Students learning how to plan;
- Students developing confidence in themselves as learners;
- Students who are disadvantaged or disabled gaining confidence;
- Students learning how to work together;
- Students learning perseverance;
- Skills or 'intelligences' in addition to the traditional logico/ deductive, verbal/ numeric being acknowledged; and
- The classroom being a safe climate for students and teachers to take risks.

### ***Attributes of the drama mentoring programme that appeared to assist students' learning***

- Because there was a 'whole school' approach to drama mentoring – it was integrated into the school curriculum, rather than being an 'add on' – this may have assisted the ready transfer of features and processes to other subject areas.
- There was strong support for the programme from senior management in the school, thus it was acknowledged as important by teachers, students and their parents. This was further enhanced by an inspirational 'champion' (the mentor) driving the programme.
- All contributions from participants were valued. The general view was that the arts are for everyone and everyone is artistic. This particularly helped to enhance students' self esteem.

### ***Attributes of the drama mentoring programme that appeared to be exclusive to an arts programme***

- Participation and success in the programme was not dependent upon academic or kinaesthetic skills. This made it a very inclusive experience.
  - Students were working towards something authentic – a public performance. Students could see all aspects of the drama as having authenticity.
-

## 4 NORTHERN TERRITORY MUSIC PROGRAMMES – BOYS' BUSINESS PROGRAMME

### Overview

*Boys' Business* is an experimental programme based in the Northern Territory that incorporates music as a focus. It was an initiative to encourage male students in the middle primary years, in the first instance, to engage positively with education and life. The programme is based on several physiological and psychological premises regarding boys. The first relates to differences between boys and girls regarding left and right brain learning patterns. These differences indicate that there are issues relating to learning areas such as language acquisition that ought to be addressed in the middle schooling years as boys reach and pass through puberty. A second is the commonly-held belief that girls (and women) can multi-task more competently than boys (and men). To a considerable extent, the programme is driven by these premises.

The programme was evaluated by one-day field visits to schools where the researcher observed the programme in action and spoke to Music teachers, class teachers and groups of participating students. She also interviewed the programme co-ordinator who is a music advisor based at the Northern Territory Music School. The academic progress (system level literacy, numeracy and writing scores) of students who participate in the programme was compared with a matched group who do not participate and teachers undertook an assessment of these students' generic competencies, using an ACER package developed to assess the Mayer Key Competencies (see Appendix II, McCurry & Bryce 1997; McCurry, Macaskill & Bryce, 2003).

This section reports on the evaluation of the school-based arts programme, *Boys' Business*. It considers the extent to which the programme has enhanced students' learning outcomes. In doing this, it addresses the overall aims of this study:

- To measure the impact arts education has on learning in the arts and wider learning across other areas of the curriculum;
- To identify particular attributes of programmes that benefit students' learning

### Background

Students who participate in *Boys' Business* are from diverse backgrounds, including Indigenous and ESL. They range from those whose school performance is exemplary, through to students challenged by education and life. The programme involves the students in strategies designed to encourage their positive participation. The students' involvement incorporates the following:

- No audition for selection in programme;
- Participation with other male students;
- Sessions during school hours;
- Mixed ability grouping;
- Atmosphere of camaraderie with teacher and other students;
- Energetic enjoyment and fun;
- Games and movement; and
- Variety of types of music

The *Boys' Business* programme aims at outcomes that focus on developing learning skills and enhancing self esteem, which are congruent with the Northern Territory Curriculum Frameworks Essential Learnings and Music Strands (see Appendix V).

Although *Boys' Business* has a focus on music and movement, its influence is considered to extend beyond Music. Music and movement are used as possible vehicles for the process of teaching and learning. The programme is intended to assist young men to feel good about themselves, who they are, and what they do. In particular, there is plenty of time for talking together, which enhances the boys' ability to articulate their feelings and needs. As class teachers are also learners in the process, the programme encourages them to reflect on their own strengths and to utilise these in their interactions with the boys. In this sense the programme intends to demonstrate exemplary practice.

Critical to the programme is the identification in each participating school of a teacher who enjoys working with male students, who is prepared to share the investigation of strategies which work for them and who, in the final analysis, is prepared to make changes in their own beliefs and practices to embrace these strategies philosophically.

## Data

Data were gathered from the following:

- a visit to the co-ordinating school and interview with the programme co-ordinator;
- visits to two participating schools that included
  - observation of *Boys' Business* music sessions;
  - interviews with the Music teacher (who conducted *Boys' Business* in the school);
  - interviews with class teachers and other staff involved in the programme;
  - focus group discussions with students participating in the programme.
- system level data from two groups participating in *Boys' Business* were compared with two matched groups who were not participating in the programme.
- generic competencies assessment data from three groups participating in *Boys' Business* were compared with three matched groups who were not participating in the programme.

### ***Interview with programme co-ordinator***

The *Boys' Business* Programme is conducted and coordinated by Dr Robert Smith (known as 'Dr Bob') who is a Music-in-School Adviser at the Northern Territory Music School located at the Jingili Primary School in Darwin. In the interview, Dr Smith described some of the presentations – both local and interstate – in which the students have participated. The programme has also been publicised on ABC television (ABC, 2003). From Dr Smith's perspective, the *Boys' Business* Programme is effective in terms of encouraging boys' active participation in the programme through the focus on music and worthwhile in terms of providing opportunities for boys to be themselves, to function more collaboratively within the classroom situation, and to be challenged in an affirming way. In terms of evolving strategies for working with boys, Dr Smith suggests that this will involve ongoing learning for the students and adults in the programme and will need to incorporate the following:

- A range of activities for skill, concept and content acquisition;
  - The valuing of boys' opinions in making decisions about items for performance level;
-

- Opportunities for boys to participate in the planning process for presentation of items to audiences;
- A disciplined approach to the preparation of music for performance;
- A balance between ‘control’ by teachers and individual freedom which is critical;
- The presentation and communication of what the boys have achieved to audiences;
- Boys being affirmed by their participation and feelings that they are worthwhile; and
- Sessions being presented in an atmosphere of camaraderie.

### *School visits*

School 1 is located approximately 15-20 km from the centre of Darwin. In the 2002 Staff Handbook, staff are advised that it ‘is a challenging school. Students come from a wide range of socioeconomic and ethnic backgrounds. Over half our student population has ESL needs’. A significant percentage of the school population is Indigenous. The nature of the school is reflected in the school staff, which includes a Special Education Teacher, ESL Teacher, Home Liaison Officer, Inclusion Support Assistants, Aboriginal and Islander Education Worker and an Aboriginal Resource Officer. The school has a School Council, an Aboriginal Student Support and Parent Awareness (ASSPA) Committee, and a Grandparents Programme.

School 2 is located a few kilometres from the first and is considered to be more middle class and Anglo-Celtic, with a significantly lower percentage of special needs students. . In the Parent Information Handbook parents are advised that the school ‘exists for one main purpose – to provide the very best education possible for each student’. The school has an enrolment of 12 Indigenous students and has recently employed 4 ATAS tutors. There is a special focus on Computer Education. This school withdrew from the programme later in the year. At the time of writing this report, reasons for the withdrawal had not been articulated.

### *Observation of Boys’ Business Music sessions*

At both schools, sessions were conducted by Dr Smith with the assistance of a class teacher. Each session included singing, dancing, listening and games requiring movement. During the lessons students often worked in groups and there was plenty of opportunity for discussion. The researcher noted that students showed obvious enthusiasm and enjoyment of these activities and the teacher praised and encouraged whenever possible. Some of the discipline in the games could be compared to the processes in drama at Direk and the *SCRAYP* programme, as outlined elsewhere in this report. The researcher described the classroom environment as ‘safe, supportive and non-punitive’.

The responsibility for participating in sessions and demonstrating positive and appropriate behaviour was placed on the students. It was evident that Dr Smith considered the students as having the ability to think, to cooperate and collaborate, to express themselves, to be themselves and to exercise an appropriate level of self-discipline. Overall there was a sense of connection, camaraderie, and empathy strongly evident between most of the students and the teacher, who provides a strong and positive male role model, as well as a role model of a skilled and experienced musician.

Sessions appeared to be based on the premise that repetition and familiarity of songs and games are key components for the encouragement of students’ interest, participation and success in music. The songs and games were mostly action oriented. They incorporated literacy through listening to, speaking and reading the words of songs, and numeracy through maths embedded in the games.

*Interviews with staff at Schools 1 and 2*

Interviews were semi-structured, using a questionnaire developed by ACER (see Appendix IV). The following teachers were interviewed:

- the teachers responsible for co-ordination of *Boys' Business* in the schools;
- class teachers of male students participating in the *Boys' Business* programme
- an ESL teacher;
- a senior teacher.

Areas discussed were factors affecting students' learning and school attendance, the impact of the music programme on students' learning, the attributes of the music programme and ways that the music programme links to other areas of the curriculum.

1. *Factors affecting student learning in school (including student health, peer pressure, family mobility, family dysfunction, students' self confidence)*

The following factors were mentioned:

- transience of some Indigenous students;
- family pressure and responsibilities which prevent consistent attendance by some students;
- for some students, fear of failure and shame, including awareness of academic deficits;
- some cultures have little regard for the education system.

2. *Factors affecting school attendance or that deter students from attending school*

Issues such as transience, and fear of failure mentioned above, are relevant here, but most teachers interviewed considered that student attendance is very regular. The ESL teacher commented: 'The demands made of them are not realistic for their capability. The formality of the academic focused learning and the school routines do not give enough consideration of the variety of the students' learning styles.' Another teacher mentioned the 'cycle of non attendance', referring to the fact that if you do not attend, you get behind in your work, which leads to low achievement and fear of failure.

Factors affecting school attendance included illnesses and discipline factors. Some students do not attend on days when unpopular programmes are run – for example, some dislike physical education. Work with computers is popular, so on the computer course days, students will attend.

3. *Evidence of the impact of the music programme on students (eg engaging students in learning, maximising students' strengths, etc)*

The following were mentioned:

- positive personal relationships developed through the programme (both between students and students with the co-ordinator);
  - working with an experienced musician – students respect this;
  - an example of one boy where the music programme 'turned him right around into more positive behaviour in school';
-

- boys learn to take on leadership roles and develop organising skills as they teach the other students in the class;
- boys share the knowledge they gain from Music with their peers who do not participate in the programme – this assists communication and development of self esteem.

There was also frequent mention of the development of self-confidence.

4. *Particular attributes (or strengths) of the music programme*

One teacher summed it up by saying: ‘Students are encouraged to have a go, to use their energy, and to utilise who and what they are.’

The following were mentioned:

- exposure to a range of music;
- a positive male role model;
- experience of a safe environment that is not punitive;
- students develop self control and tolerance of others;
- students lose self-consciousness about their bodies and how they perform (the benefit of an all male environment).

5. *Ways of linking the learning in the music programme with other areas of the curriculum*

The following were identified:

- development of oral language through singing;
- students are encouraged to reflect on their feelings;
- links with numeracy through spatial awareness (in games);
- health: emotional development;
- encouragement of collaborative learning.

6. *Other comments*

All comments were positive, for example:

‘Boys are passionate about it.’

‘I hope it continues. I feel the boys in my class have derived huge benefits from attending the sessions.’

In terms of how the *Boys’ Business Music* programme affects teachers, they perceive that it is worthwhile for teachers in terms of:

- Stimulation of teachers’ thinking about the teaching of music for male students;
- Developing teacher’s understanding of more appropriate strategies for teaching music to male students;
- Providing support systems for the teaching of literacy and numeracy in innovative ways;
- Changing teachers’ attitudes towards male students as successful learners in class.

Teachers' comments on the areas for improvement in the *Boys' Business* programme indicate there is a need for professional development on the programme for a number of reasons. One is to develop knowledge and understanding of the programme for class teachers with participating students. A second is to develop an awareness of the programme for other school staff and parents for the purpose of providing the positive benefits for participating students and the school as a whole. A third is to train school music teachers on the philosophy and approach of the programme for the purpose of linking more thoroughly the *Boys' Business* to the school music programme. It will also encourage an innovative approach to the school music programme which incorporates the specific needs of both boys and girls within a class and the school programme.

#### *Focus group discussions with students*

One of the case study strategies was a focus group discussion with representatives of the male students participating in the *Boys' Business* Programme, using a set of questions developed by ACER. The researcher conducted face to face discussions with the students who provided collective responses. Questions were based on a form developed by ACER (see Appendix IV). Focus group discussions were held with 12 students in Years 4 – 6 at the first school and 6 students in Years 5 – 7 at the second school.

Students were asked what they liked about the programme, what they thought they learnt from the programme, whether it encourages them to attend school and what non music skills they thought they learnt from the programme.

#### *1. What students liked most about the music programme*

The following were mentioned:

- Dr Bob as leader, both as a good role model and a good musician;
- 'We like working together and getting along with each other, and being boys together.'
- 'No writing on the blackboard' (This could be interpreted as liking freedom from an academic approach.);
- enjoy freedom and being able to move around;
- 'We feel good about ourselves and can do things';
- appreciation of a 'safe' classroom environment, so that mistakes can be made without embarrassment.

#### *2. The best thing done (in Music)*

The following were mentioned:

- 'Come to school, especially on Mondays' (the day of *Boys' Business*);
- 'Singing together and helping each other';
- participating in performances outside the school

#### *3. What students learn from the music programme*

The following were mentioned:

- 'Following instructions';
  - 'Expressing ourselves';
-

- ‘Writing about the music programme in our journals’;
- ‘How to remember songs and games. Use our mind’;
- ‘Trust, fun, discipline and timing’;
- ‘Learn that life doesn’t revolve around sports’;
- ‘Learn that you can do what you want if you put your mind to it’.

#### 4. *Consideration of whether the music programme encourages students to attend school*

Comments were favourable although no one suggested that they attend school purely because of the Music programme. One said ‘We feel important being in the music programme’. One said that they attend on Music days, on other days ‘it depends what’s on’.

#### 5. *Non music skills learnt from the music programme*

The following were mentioned:

- Counting. Learning our times table, ‘Maths in the games’;
- Learning songs from overseas;
- Getting on with other boys. Learn how to have fun without being naughty;
- How to be helpful. How to organise and how things go together;
- Learn how to listen to others.

#### 6. *Other comments about the music programme*

All comments were positive, including requests to extend the time of the programme. One said, ‘teachers are not on your back all the time’ and another said, ‘we are encouraged to learn’. They were grateful to ‘Dr Bob’.

### ***System level and generic competencies data***

In three schools participating in the *Boys’ Business* Music programme, a study was undertaken whereby students’ scores on system level tests and generic competencies were compared for a class of students involved in *Boys’ Business* and a matching class of students in the school not involved in *Boys’ Business*. The aim was to examine effects on academic and generic competencies performance that may be attributable to participation in the *Boys’ Business* programme. System level ‘MAP’ test results on Literacy, Numeracy and Writing were made available by the Northern Territory Department of Education, Employment and Training. Testing is carried out in Years 3, 5, and 7. For students in Years 5 and 7, 2003 results were available. For students in Years 4 and 6, Year 2002 results were used. Teachers were asked to assess students generic (or ‘Key’) competencies in Communication, Solving Problems, Planning and Organising and Working with Others, using a programme developed by ACER (see Appendix II; McCurry & Bryce, 1997; McCurry, Macaskill & Bryce, 2003).

### **Outcomes**

*The impact arts education has on learning in the arts and wider learning across other areas of the curriculum*

One way of measuring the impact that participation in the *Boys’ Business* programme has on students’ learning was to compare the system level results for Literacy, Numeracy and Writing of a sample of boys who participate in the programme and another sample who do not, as

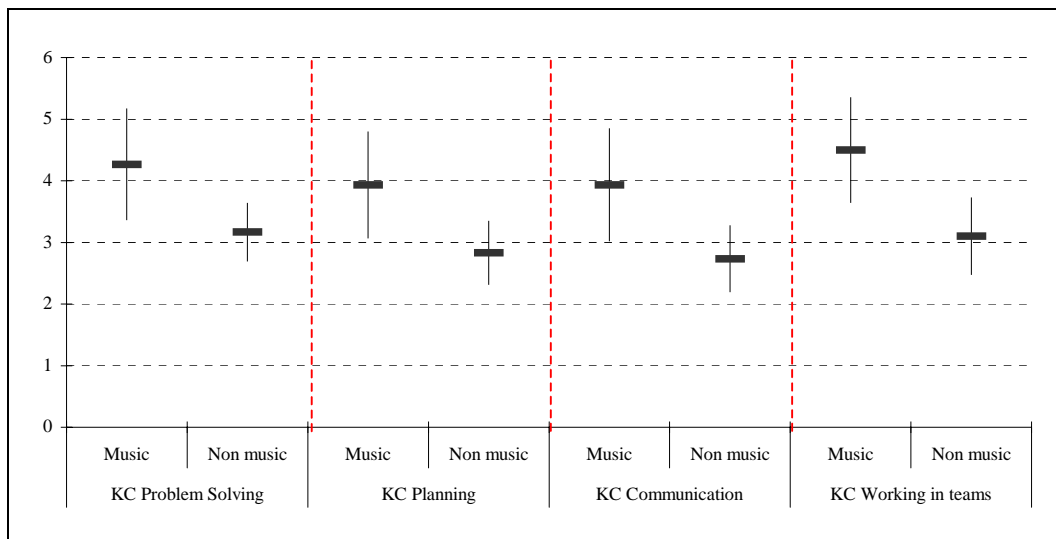


outlined above. The first school to be considered is one that participated in the fieldwork discussed above. As can be seen from Table 3 below, too few system level results were available to undertake the comparison and provide meaningful data. However, all 30 students (15 in the *Boys' Business* programme and 15 matched students who were not) participated in the assessment of generic 'key' competencies.

**Table 3 Numbers of students from School 1 NT for whom data were available for each of the MAPS tests and for all of the measures of Key Competencies**

	Music	Non Music
MAPS numeracy	3	3
MAPS writing	2	3
MAPS Reading	2	3
Key Competencies	15	15
All students	15	15

Table 3 shows that of these 30, 15 had participated in the music programme and 15 had not. For each of the Key Competencies, there were measures on all 30 students. MAPS results were available for very few students, accordingly, only the results from the Key Competencies data are shown here.



**Figure 2 Mean and 95% confidence intervals for Key Competencies comparing students in School 1 participating and not participating in the music programme**

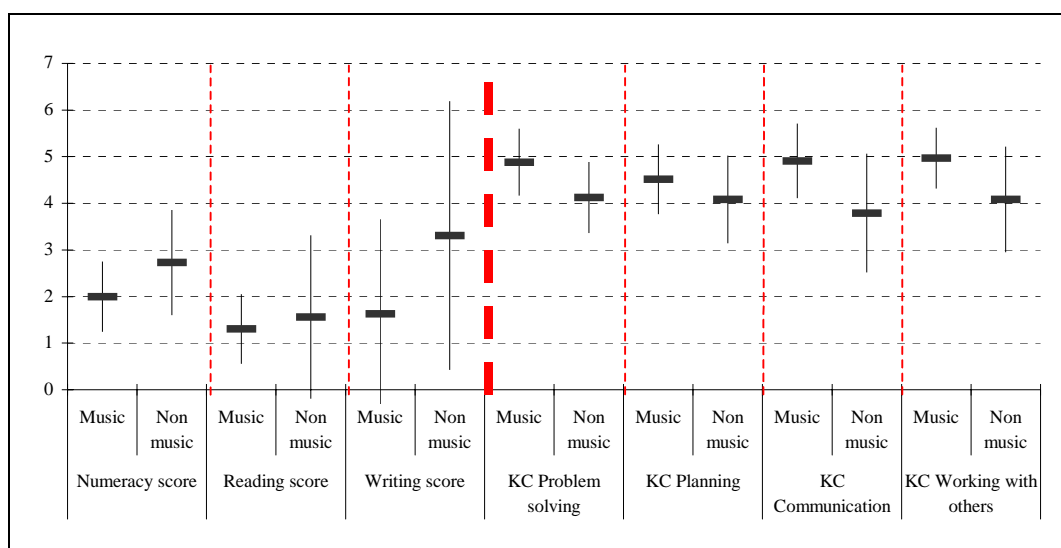
Figure 2 shows the mean scores for four Key Competencies – Problem Solving, Planning, Communication and Working in Teams – for students participating and not participating in the music programme. In Figure 2, the dark horizontal line marks the mean. The vertical lines indicate the confidence intervals around each mean. If these lines overlap with the lines marking the confidence limits around other means, then there is not a statistically significant difference between the means. It can be seen that in Figure 2 there are no statistically significant differences between any pair of means. While the mean differences suggest that students in the music programme have done better than those who were not in the programme; we cannot be confident that this is not due to chance.

As statistical significance is in part a function of the sample size, and given that the samples used for this study were small the lack of significance is not surprising.

The second school had been involved in the *Boys' Business* Programme for only three months. There were 23 students for whom data were available. Table 4 shows the numbers of students for whom data were available for each of the MAPS tests. All students had measures on each of the Key Competencies.

**Table 4** Numbers of students from School 2 NT for whom data were available for each of the MAPS tests and for all of the measures of Key Competencies

	Music	Non Music
MAPS numeracy	12	9
MAPS writing	11	9
MAPS Reading	12	8
Key Competencies	12	11
All students	12	11



**Figure 3** Mean and 95% confidence intervals for MAPS scores and Key Competencies comparing students in School 2 participating and not participating in the music programme

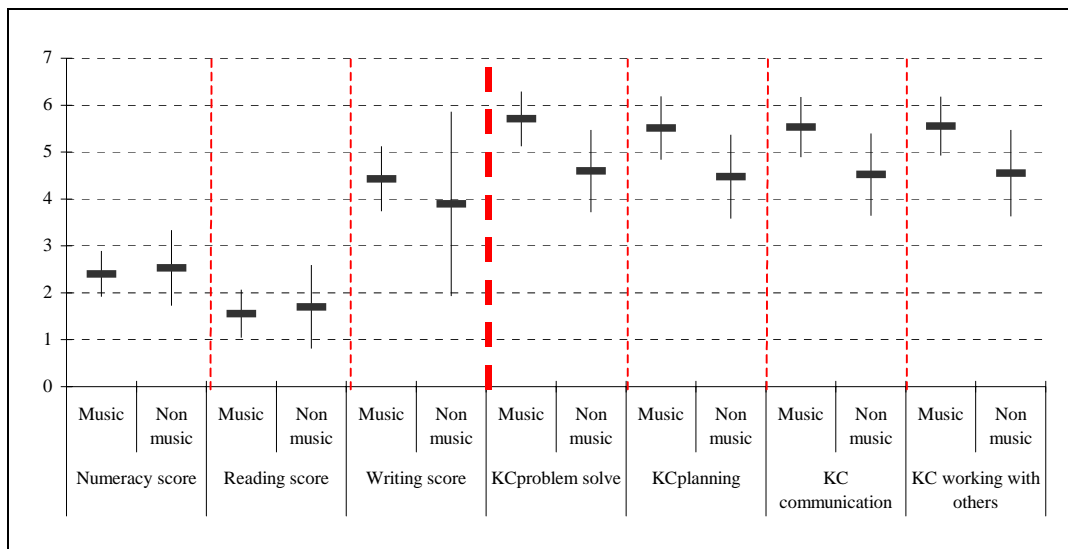
Figure 3 shows the mean scores for the MAPS tests and for four Key Competencies – Problem Solving, Planning, Communication and Working in Teams – for students participating and not participating in the music programme. It can be seen that in Figure 3 there is no statistically significant difference between any pair of means.

There is no evidence in these data that music programme has had an impact on the numeracy, reading or writing skills or the learning of Key Competencies of the students at this school. As statistical significance is in part a function of the sample size, and given that the samples used for this study were small these results are not surprising.

There were 34 students from the third school on whom data were available. Table 5 shows the numbers of students for whom data were available for each of the MAPS tests. All students had measures on each of the Key Competencies.

**Table 5** Numbers of students from School 3 NT for whom data were available for each of the MAPS tests and for all of the measures of Key Competencies

	Music	Non Music
MAPS numeracy	15	14
MAPS writing	15	14
MAPS Reading	15	14
Key Competencies	17	17
All students	17	17



**Figure 4** Mean and 95% confidence intervals for MAPS scores and Key Competencies comparing students in School 3 participating and not participating in the music programme

Figure 4 shows the mean scores for the MAPS tests and for four Key Competencies – Problem Solving, Planning, Communication and Working in Teams – for students participating and not participating in the music programme. It can be seen that in Figure 4 there are no statistically significant differences between any pair of means. On the Key Competencies, the mean differences suggest that students in the music programme have done better than those who were not in the programme, however we cannot be confident that this is not due to chance.

There is no evidence in these data that music programme has had an impact on the numeracy, reading or writing skills or the learning of Key Competencies of the students at this school. As statistical significance is in part a function of the sample size, and given that the samples used for this study were small these results are not surprising.

Given that scores suggest that students participating in the *Boys' Business* music programme have done better, but not statistically significantly better, than other students on the generic competencies assessed it would be interesting to see whether over time these differences increase and whether with larger samples there is a significant result.

From observation and interviews with staff and students there was a general positive sense that the *Boys' Business* programme does help students to engage with learning and to develop social skills that will encourage them to learn and to interact with their peers at school. The following particular 'enabling' skills and attitudes have been distilled from the fieldwork data outlined above.

**Table 6 Outline of Enabling Skills and Attitudes Derived from Fieldwork Observations and Interviews**

Skills and Attitudes	Source
Development of oral communication skills	Observation of Music sessions where students were encouraged to discuss and express their opinions about the music (and other matters). Students said that they 'Learn how to listen to others'.
Ability to work with others and development of social skills that enhance learning	Observation of Music sessions where there was an emphasis on group work particularly in dances and games. Co-operation and collaboration observed in games such as 'Freeze', where students practise self-discipline and work as a team.
Students are encouraged to feel good about being at school	From observation, positive aspects were reinforced and wherever possible negative aspects were overlooked. Overall this would help students to feel that school is a 'good' place to be.
Development of self esteem and self confidence	In lessons students are encouraged to feel good about themselves. This was summed up by the student who said: 'We feel good about ourselves and can do things'. There is emphasis on praise. It was clear, particularly from teacher interviews, that some students are deterred from attending school because of fear of failure, or perceiving themselves as academically poor. In Music sessions they can achieve success and experience a safe classroom environment.
Development of literacy and numeracy skills	There was some suggestion by teachers that students incidentally develop literacy and numeracy skills through participation in Music – for example reading songs and counting beats.
Development of planning and organising skills	The students themselves acknowledged that they learn how to plan when participating in the lessons.
Awareness of a role model or mentor	From interviews, students respected working with a talented musician – something they could aspire to.
Encouraged to reflect	From observation and interviews it is evident that thinking and reflection are seen as worthwhile. Students can consider and analyse their feelings.

### *Attributes of the programme that benefit students' learning*

The *Boys' Business* programme is not selective. Given its overall aim to encourage students 'to engage positively with education and life' it seemed from fieldwork visits that sometimes students who were having particular difficulty were encouraged to participate in the programme. Indeed, one of the school co-ordinators interviewed by phone said that the school 'initially

invited boys who, it was thought, would benefit from the programme – particularly those with problems in social skills, such as bullies, or those who are bullied, and those who need to work on anger management’. She also commented that the ‘more academic are not enthusiastic to join’. It is interesting to view the above data in light of these comments and to contemplate the possibility of how much worse off these students may have been had they not participated in the programme. With this approach, students can learn self-regulation, which is particularly beneficial for ‘underachievers’ (Baum, et al, 1997).

## Discussion

The *Boys’ Business* Music programme provides hundreds of middle school boys with positive experiences of music and schooling. For some, it is evidently a new experience to enjoy something provided by school and this in itself is important. There is no hard evidence from this study that *Boys’ Business* enhances students’ learning in Literacy, Numeracy or Writing, but samples were unavoidably small and it should also be remembered that the students who participate in *Boys’ Business* are quite often encouraged to do so because they have poor social skills and are reluctant learners. There is also no statistically significant evidence that *Boys’ Business* enhances students’ problem solving, communication, planning or skills in working with others. Anecdotally, the children suggest that they do learn some of these skills (particularly oral communication, planning and working with others) in the programme. It is also intriguing that they did score better, although not significantly better, than their peers who are not in the programme.

It is evident from observation and talking to teachers and students that participation in the programme does help to develop ‘enabling’ skills and attitudes that are essential to learning both within and outside of school (Fullarton, 2002, Bryce & Withers, 2003). In particular, enhancing confidence and self esteem will help many of these students to view themselves as learners and encourage them to continue learning.

What were the features of the *Boys’ Business* programme that helped to enhance learning and which of these features were exclusive to its being an arts programme?

### *An enjoyable experience*

Although there was no measurable evidence that *Boys’ Business* consistently helps to boost attendance at this level (overall attendance itself was not seen as a problem, school drop out is more likely to happen at secondary school level) but participants did say that they make a point of coming to school on music days. Interview data and observation indicated that many of the participants find the activities enjoyable. Comments such as letting ‘boys be boys’ suggest that there is less restraint than in conventional classrooms. This means that some students who usually find school foreign and uninviting have a positive experience of learning when they attend *Boys’ Business* classes.

It could be argued that the ‘enjoyable’ features mentioned above could apply to, say, a physical education programme. As with the drama programme at Direk, it is difficult to argue that particular features of the programme are exclusive to the arts, but the following can be mentioned.

### *Features of a successful arts programme*

To what extent do the features of *Boys’ Business* reflect those features of a successful arts programme outlined in the literature review (chapter 2 of this report)?

#### *1. Supportive administration*

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There is most certainly supportive administration from the Northern Territory Music School. It seemed that support from individual school administrators varied. Compared to the integrated drama mentoring at Direk, *Boys' Business* was an 'add on'. It would probably benefit from more support and more integration into school programmes.

2. *Quality provision*

From observation there was very high quality provision.

3. *Recognition of progress*

This was a feature of the programme. Students were praised whenever possible.

4. *Opportunities for individualised instruction*

This was difficult to assess and may not have been appropriate with the emphasis on group work.

5. Risk taking

The level of risk taking was not acknowledged as readily as in some programmes, but was apparent.

6. Innovative teaching techniques

The inspiration for the programme is innovative.

***Features exclusive to the arts***

These features were also mentioned in relation to the programme at Direk.

- It was very important to some students that it is not essential to read and write in order to participate in *Boys' Business*. The programme is seen as a means of *encouraging* the boys to read (eg by reading song sheets) but this is not a requirement. In an early conversation, prior to the organisation of field visits, 'Dr Bob' stressed that for some students the idea of having to read or write would be a strong deterrent to participation. This is similar to the Direk programme in that it encourages learning by using senses and skills other than the traditional 'logico-deductive' approaches. But with *Boys' Business* there seems to be a stronger need to show students that there is something they can enjoy and achieve in a school environment.
- As with Direk, the boys were engaged in an authentic activity. Much of the time they were preparing for public performances. As one student said, it makes them 'feel important'.

## Conclusion

'Dr Bob' sees music as a vehicle for all learning (pre-fieldwork phone discussion). There are signs that it has the potential to play this role for the participants in *Boys' Business*. The conception of the programme is quite different from the drama mentoring at Direk and thus there is a sense that it is not integrated in the participating schools in the way that drama at Direk was a 'whole school' approach. Some teachers interviewed at *Boys' Business* schools viewed the programme as an 'extra' activity and did not know a great deal about it. One important task is to find ways of transferring the features summarised below to other areas of learning. These are outlined under the next four sub-headings.

***Evidence that involvement in Boys' Business was associated with improved learning***

Results from comparisons between students who participate in *Boys' Business* and students who do not, did not yield significant differences between the two groups although there is an indication that *Boys' Business* participants are better at the generic competencies that were tested (problem solving, planning and organising, communication and working with others). In particular, discussion in interviews and observation of sessions indicated the use of planning, communication and working with others.

***Enabling skills and attitudes of students that appeared to be related to participation in Boys' Business***

- improved self-confidence;
- students 'feel good' about being at school;
- development of literacy and numeracy skills (such as reluctant learners learning to read song sheets);
- development of metacognitive skills such as reflection.

***Attributes of Boys' Business that appeared to assist students' learning***

- having a positive role model ('Dr Bob');
- participating in an environment that was non threatening and where all students' views were respected, where tolerance and self control were fostered;
- there was less constraint than in a conventional classroom.

***Attributes of Boys' Business that appeared to be exclusive to an arts programme***

- not having to read or write;
  - engaged in an activity with a purpose that is authentic.
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## 5 NORTHERN TERRITORY MUSIC PROGRAMME - INDIGENOUS MUSIC EDUCATION PROGRAMME

### Overview

The *Indigenous Music Education Programme* was established by the Northern Territory Music School as a secondary level Indigenous instrumental music delivery programme for remote community schools. The current model of the programme has involved 5 years of development. The main objective of the programme is to provide literacy and life-skills development through music education. The programme is based on a specialist music teacher placement process, with each participating school receiving specialist music teaching on a rotational basis each ten weeks. Specialist music teachers are attached to the Northern Territory Music School and implement a weekly or project style teaching programme along with the school's professional team.

One visit to the Northern Territory was undertaken. The co-ordinator of the programme was interviewed. As with the co-ordinator of *Boys' Business*, he is based at the Northern Territory Music School. Two schools that participate in the Indigenous instrumental programme were visited. Classes were observed and teachers and participating students were interviewed. It was very difficult to find a way of measuring whether the programme has affected students' academic achievement. Firstly, this kind of learning and assessment is not necessarily a central focus for some of the people in these schools (Harvey & McGinty, 1988). Secondly, there seemed to exist a culture that does not favour ranking or other activities that might make some students feel failures. System level testing results were not available for most students. Thus the evaluation of this programme rests on the field visits.

This section reports on the evaluation of the school-based Indigenous Instrumental Programme. It considers the extent to which the programme has enhanced students' learning outcomes. In doing this, it addresses the overall aims of this study:

- To measure the impact arts education has on learning in the arts and wider learning across other areas of the curriculum;
- To identify particular attributes of programmes that benefit students' learning.

### Background

The placement teacher programme was trialed in the Arnhem Region at the Yirrkala Community Education Centre and Maningrida School. A survey study produced by Graham Chadwick, the Coordinator of the *Indigenous Music Education Programme*, highlighted the need to establish or strengthen music programmes for Indigenous students in remote community schools.

As a result of a successful funding grant through the Indigenous Education Division of the Northern Territory Department of Education, Employment and Training (DEET), the programme has been extended to secondary and upper primary Indigenous students in other schools. These include schools in the Arnhem, Groote Eylandt, Katherine, Tennant Creek, Alice Springs and Darwin City Regions.

In addition to the placement teacher programme, extension instrumental services are available to schools participating in the *Indigenous Music Education Programme* from the Northern Territory Music School. These include:

- Guitar and percussion teachers on request.



- Professional development and classroom music visits outside of the scheduled term visitation programme on request and dependent on availability.

As well as providing opportunities for Indigenous students to develop musical skills, literacy and life skills, the programme incorporates formal accreditation and assessment through the Vocational Education and Training (VET) certification process. A joint agreement has been made with the Northern Territory Open Education Centre (NTOEC) for the delivery of a nationally approved training Certification I and II in Music (Industry Foundation) to the secondary students. The NTOEC will act as the Registered Training Organisation (RTO) for participating students. Links have also been established with the Northern Territory University (NTU) towards the development of an ongoing learning programme for adult students through the delivery of a Certificate III.

In terms of the VET Industry Training Programmes, the NTOEC is currently supporting enrolment and assessment for students undertaking lessons in the *Indigenous Music Education Programme* in eight locations.

The anticipated outcomes for the *Indigenous Music Education Programme* are described as follows:

- Increased school attendance and retention rates as a result of motivation through music making.
- Development of practical skills through high interest music activities.
- Ensemble activities that develop student self-confidence and participation.
- Developmental teaching practices and programmes which are relevant to Indigenous students' needs.
- Provision of open-ended musical activities that allow students to respond to tasks according to their level of ability.
- Establishment of collaborative programming processes with NTOEC to ensure continuity between performance and assessment.
- Achievement of music industry outcomes through performances outside school, and recordings.
- Development of the ability to work collaboratively within the complex dynamics of an ensemble setting.

## Data

One fieldwork visit was made to the Northern Territory. This included:

- a visit to the co-ordinating school and interview with the programme co-ordinator;
  - visits to two participating schools that included
    - observation of Indigenous Music Education Programme sessions;
    - interviews with the Music teacher who conducted the programme in the schools;
    - interviews with class teachers and other staff involved in the programme;
    - focus group discussions with students participating in the programme.
  - There was an attempt to gather 'academic' results and generic competencies assessments as for the *Boys' Business* programme, but, as mentioned above, this approach seemed to
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conflict with the general culture in which learning takes place and appropriate data were not available.

### ***Interview with programme co-ordinator***

From the co-ordinator's perspective, the *Indigenous Music Education Programme* is effective in a number of ways. It encourages Indigenous students from remote and country communities to come to school and is helping to improve the regularity of their attendance in the classroom. It provides students with an opportunity to participate in an instrumental music programme and gain music industry skills and accreditation. It allows for the integration of numeracy and literacy skill development into the music activities. It increases the level of students' self-confidence and self-esteem. It provides employment for Indigenous musicians as teachers within their communities and allows them to pursue their musical careers within their homeland.

### ***School visits***

Two schools were visited. The first school, a primary school that also takes post primary students up to 15 years of age, is located in the city of Darwin. All students are integrated into classroom learning with provision for special needs offered in a supportive environment. The students benefit from the smaller groupings and intensive teaching. A significant percentage of the school population is Indigenous.

The second school is located in an Indigenous Community approximately 20 kilometres from Nhulunbuy, also known as Gove, in the Arnhem region of the Northern Territory. About 700 people reside in the community, which has a high incidence of social problems including substance abuse and family violence. The school caters for the Indigenous students from pre-school to Year 10 who reside in the community and employs a number of Aboriginal Assistant Teachers and Islander Education Workers. A majority of the students have English as their second language and they are socialised into a culturally more 'traditional oriented' lifestyle although the influence of the Western, particularly American television programmes and films is evident. The school generally has a high turnover of staff some of whom are unfamiliar with the culture and lifestyles of their students.

### ***Data from school visits – observation***

*Indigenous Music Education Programme* sessions are of two categories. One is a music lesson in which the students are taught the basic rudiments of playing a musical instrument within a collective group. The other is a rehearsal session in which students practise the songs and music already learned. In the first category, the session is mostly teacher-directed with the students following the instructions of the teacher. In the second category, the session is mostly conducted by the music teacher assisted by the class teacher and/or music tutor, and in collaboration with the students. For both sessions, most of the students are active participants who follow the instructions or directions of the teacher. A sense of purpose and rapport is strongly evident between the majority of the students and the music and class teacher, who provide positive role models. As well the music teacher and/or music tutor provide a positive role model of a skilled and experienced musician. At the remote school, the students talked with each other in their own language and most of them seemed to understand the directions of the music teacher who spoke in English. Where this was not the case, it was evident that bi-lingual students were acting as interpreters for the other students.

Sessions appear to be based on the premise that repetition and familiarity of songs and adequate skills with musical instruments are key components for the encouragement of students' interest, participation and success in music. The songs learnt focus on a range within the students' realm of understanding, including songs composed by students and others of a contemporary

Indigenous nature. In addition to the rudiments of music, the sessions incorporate other learning areas such as literacy through the listening, speaking and reading of the words of songs; numeracy through the counting of beats, the shape, size and weight of the instruments and other equipment; and science, through the vibrations of sound.

Sessions have a focus on encouraging the active and enthusiastic participation of the students through allowing them to be themselves and displaying their talents and skills through the music. Within this context there is opportunity for students to develop higher levels of self-esteem and self-confidence in themselves as musicians and vocalists, as well as becoming more competent learners generally.

In the sessions, there is an expectation placed on the students by the teacher that they take responsibility for their participation and their behaviour. In this regard, there is acknowledgement by the teacher of positive behaviour displayed by the students, and non-attention to unacceptable behaviour displayed by individual students (unless this affects others).

### ***Data from school visits – interviews with staff members***

Members of school staffs were interviewed, using a questionnaire developed by ACER (see Appendix IV). People interviewed included the music teacher for the programme, class teachers of Aboriginal students participating in the programme, and Aboriginal Education Workers who had involvement with the classes in the music programme. Altogether the interviews involved five teachers from the school in Darwin and four teachers from the remote school.

Discussion explored the factors that affect students' learning and school attendance, the impact of the music programme on students, attributes of the music programme, and links between the music programme and other areas of the curriculum.

The following is a summary of responses.

#### ***1. Factors that affect student learning in school (including student health, peer pressure, family mobility, family dysfunction, students' self confidence)***

A high proportion of the students at the Darwin school were seen as coming from a 'disillusioned and dysfunctional' community. This description includes 'poor living conditions' and financial problems, poor role models, negative self-perceptions and a view that there is 'no value for education'. These factors, it was thought, have a particularly strong effect on female students. There is a lot of 'family mobility'. High absenteeism was mentioned. There are insufficient Aboriginal role models and a lot of teachers do not understand the needs of Aboriginal students. As one teacher said, 'Aboriginal students who don't come regularly to school are treated differently – the teachers give up on them'. There is a 'cycle of non-attendance' where students often fall behind with their work, they feel 'shame', so they stop attending. Lack of self-confidence was mentioned frequently in relation to students at both schools. Health factors were mentioned frequently by staff at the remote school – lack of healthy food and sufficient sleep. All of the students at the remote school were said to have English as their second language.

#### ***2. Factors that affect school attendance or deter students from attending school***

In addition to factors mentioned in 1 above, one teacher at the Darwin school mentioned gender. Girls are likely to be absent. It is particularly difficult to engage them. Many parents do not provide adequate support and encouragement for their children (related to their having a different cultural background that does not value Western style education).

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One teacher at the remote school said that music, sport and cooking encourage the girls to come to school. During the music workshops, the number of students attending school increases.

3. *Impact that the music programme is having on students (eg engaging students in learning, maximising students' strengths, etc)*

There was frequent reference to ways that the music programme helps to build students' self-esteem and self-confidence, and ability to work with others. Teachers had observed students' improved ability to communicate with other students and new people. Improved grooming was also seen as evidence of increased self-confidence.

The programme is also providing students with a pre-vocational course. The music teacher pointed out that as well as performing music, the students create promotional materials such as posters and T-shirts. They write their own music and they work collaboratively. Another teacher at the Darwin school said 'The programme gives students real life situations to focus on. They are learning life skills, which is related to the inner and collaborative learner in the curriculum framework. This is evident through their body language, their health and how they conduct themselves'. Another teacher noted that students learn discipline through the programme because they have to care for the musical instruments.

Two teachers at the remote school noted that Aboriginal students have a natural talent for music, which the programme helps to bring out. The students are 'wanting to be' in music lessons. Also, with an Aboriginal musician running the programme, the students see a strong role model. As the teacher said, 'They show respect for me as an Indigenous teacher and want to be part of what I do'.

Students' oral English skills are improved through songwriting and singing.

4. *Particular attributes (or strengths) of the music programme*

The following were outlined:

- Flexibility in the programme and the processes;
- Focus on students needs and levels (including their own cultural levels and experiences);
- Recognition of cultural differences (eg in terms of timetables, management);
- Aboriginal-focused pedagogy (at the remote school, the programme has been approved by the Yolngu staff action group as a way of Western learning that is acceptable);
- Students learn how to be organised (eg get up in time to give a performance);
- Students learn goal-setting;
- Students learn the importance of co-operation through working as a team;
- Focus on small group learning, which is less threatening and encourages ownership of learning;
- Learning useful musical skills – rhythm and beat, chords, patterns of chords;
- Can sing in their own language and English, which enhances their English skills;
- There was frequent reference to the increased attendance on music days.

5. *Ways of making links between learning in the music programme and other areas of the curriculum*

Links are being made to the VET Certificate I and the programme uses the VET competencies informally. The primary focus of the programme is to educate musicians.

Several teachers mentioned the use of printed texts such as lyric sheets with chords which the students who attend regularly understand. Also making posters for publicity and concert programmes. One teacher said: 'There's singing, listening, speaking and the interplay between silence and sound which leads to literacy. The students also learn about authorship through the lyric sheets and about copyright and intellectual property'. Students use maths when making budgets for the band and also when counting beats and timing the music. The programme is seen as having strong links with the 'Essential Learnings' of the NT Curriculum Framework, particularly with collaborative and creative 'learnings'.

6. *Other comments about the music programme*

All comments were positive, for example: 'The programme should have been here 20 years ago'. Words such as 'sensational' and 'fantastic' were used. There were hopes that it would continue and be extended.

***Data from school visits – student focus group discussions***

The researcher conducted discussions with Aboriginal students participating in the Indigenous Instrumental Music Programme. There were discussions with Year 6 – 7 students from the Darwin school and separate groups of male and female students at the remote school. The following is a summary of responses to the semi-structured interview questions (see Appendix IV). Students were asked what they liked about the programme, what they had learnt from the programme, whether the programme encouraged them to attend school and what non-musical skills they had learnt from the programme.

1. *What students liked most about the music programme*

The following were mentioned:

- enjoyment;
- being able to use the instruments/ equipment;
- social aspects: 'being together'/ 'meeting new people';
- (from the remote school): travelling to Darwin/ touring around and performing.

2. *The best thing you have done (in Music)*

The students mentioned putting on performances and learning technical skills related to performing; also being happy in school.

3. *What students learn from the music programme*

The responses fell into four categories. The first was to do with acquiring musical skills such as 'playing instruments', 'using sound systems'; the second was concerned with acquiring literacy, such as 'writing our own songs', 'reading songs'. A third category could be described as acquiring skills and attitudes that enable learning; for example 'confidence building', 'feeling good about ourselves'; and the fourth category was concerned with social skills and understanding: 'two-way cultures like Bagot and other communities' and 'reconciliation through two-way learning'.

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4. *Reponses to: Does the music programme encourage you to attend school?*

All responses were favourable; for example: ‘We would come every day if we had music lessons’.

5. *Non-music skills learnt from the music programme*

Students had mentioned non-music skills in response to 3 above, in addition they mentioned skills such as maths, literacy, ‘thinking’, social skills – such as ‘working in a group’ and ‘how to get on with people’. Students also mentioned some technical skills such as ‘using equipment and taking care of equipment’ and ‘learning about copyright’.

6. *Other comments*

Some responses that had not already been covered were:

- The music programme should have been in primary school instead of recorders
- We’re using skills we have like playing the guitar
- Really like the music programme and singing in our own language

## Outcomes

*The impact arts education has on learning in the arts and wider learning across other areas of the curriculum*

As noted above, it was not possible to gather ‘hard’ data to provide evidence of the programme’s impact on students’ other learning from the *Indigenous Music Education Programme*. The field visits, however, do provide considerable evidence that the *Indigenous Music Education Programme* is having a very powerful effect on students’ learning. This is summarised below in terms of music learning and ‘wider’ learning.

**Table 7 Outline of Evidence of the Impact of the *Indigenous Music Education Programme* on Students’ Music Learning, Derived from Fieldwork Observations and Interviews**

Area of Music Learning	Source
Students are able to perform on several instruments and vocals. (For some this includes knowing how to tune a guitar.)	<ul style="list-style-type: none"> <li>• Observed in all lessons. Performance on a variety of instruments was particularly evident in the first and fourth lessons observed. Noted in student focus group discussions.</li> </ul>
Understanding of musical techniques such as volume control and tempo variation	<ul style="list-style-type: none"> <li>• Observed in the first lesson, and counting in third lesson (playing on the beat). Discussion of tempo variation in fourth lesson observed. Mentioned in staff interviews and in student focus group discussions.</li> </ul>

Knowledge of various chord constructions and patterns	<ul style="list-style-type: none"> <li>• Observed in the first lesson – learning chords at the keyboard.</li> <li>• In the second and third lessons observed, students were made aware of chord construction of songs and learnt to finger these chords on guitars.</li> <li>• Mentioned in staff interviews and in student focus group discussions.</li> </ul>
Knowledge of rhythms	<ul style="list-style-type: none"> <li>• Mentioned in staff interviews</li> </ul>
Knowledge of how to set up a sound system	<ul style="list-style-type: none"> <li>• Mentioned in student focus group discussions.</li> </ul>

It is evident that many students in the programme are gaining sophisticated musical skills and are becoming versatile musicians – able to write and arrange their own songs and perform on several instruments as well as performing vocals. As a result, some students will attain the Vocational Certificate I. Staff noted that Indigenous students are naturally musical and that this programme helps to develop these qualities. It appears that musical skills gained are put to use in a practical way in a variety of public performances making the learning very relevant to students' interests and aspirations acquired from observing teacher role models. A minority of students just observed the lessons (or rehearsals) although it seems that no one was there under duress. We therefore cannot claim that all students in the programme have these skills.

Table 8 below outlines areas of wider learning that students gain from the programme.

**Table 8 Outline of Evidence of the Impact of the *Indigenous Music Education Programme* on Students' 'Wider' (ie non-music) Learning, Derived from Fieldwork Observations and Interviews**

Area of Wider Learning	Source
Development of literacy skills	Reading song/lyric sheets – observed in first and second lessons. Following verbal directions (in English) observed in all lessons. Teachers interviewed mentioned improvement of oral English skills through song-writing and singing and that students who attend regularly can read from the song sheets. In the focus group discussions, students mentioned that they learn how to read in music.
Development of numeracy skills	Some students work out budgets – mentioned in teacher interviews. There was observation of students counting (beats) and this was mentioned in teacher interviews.
Vocational qualification	The programme provides students with a pre-vocational qualification (VET Certificate 1).
Development of life skills	Noted in teacher interviews – reference to the vocational nature of the programme.
Knowledge of issues such as copyright and intellectual property	Mentioned in teacher interviews and student focus group discussions.
Knowledge of aspects of science related to sound	Mentioned in teacher interviews and student focus group discussions.

In addition to the musical skills already discussed, it is evident that the programme helps students to acquire other ‘non-musical’ skills that relate to the wider curriculum. There seems to be a strong suggestion that the programme helps students to acquire skills in literacy, particularly oral skills. This ranges from being able to read ‘out aloud’ from song sheets to being able to articulate their views and tell other members of their community about their music experiences. To a lesser extent, it seems, students also acquire some skills in numeracy and some scientific knowledge relating to aspects of sound and how it is produced by instruments. Other skills are acquired from the vocational orientation of the programme – in particular, life skills that relate to the Northern Territory Curriculum Framework.

### ***Attributes of the programme that benefit students’ learning***

Particular attributes of the *Indigenous Music Education Programme* that benefit students’ learning are outlined below.

**Table 9 Outline of Enabling Skills and Attitudes of the *Indigenous Music Education Programme* Derived from Fieldwork Observations and Interviews**

<b>Skills and Attitudes</b>	<b>Source</b>
Attendance at school	Frequent reference to increased attendance on music days (particularly at the remote school). Noted in teacher interviews and focus group discussions with students.
Ability to work collaboratively – as a team (including oral communication skills)	Observed in the first and fourth lessons. Importance of collaboration and not letting the team down mentioned in staff interviews. Students refer to learning how to work in a group.
Development of self-esteem	In all lessons observed, students were praised for performing. In the fourth lesson observed, a student was helped privately until he was confident about performing in front of others (rather than being placed in an embarrassing situation). In interviews, teachers made frequent reference to students’ increased self-esteem (noted students’ improved grooming). For several students the ‘best thing’ they have done in music involves public performance – indicating confidence. This was mentioned in the student focus group discussions.
Enjoyment of learning	Reference in teacher interviews that students ‘want to be’ in music lessons. Also observation of students’ enjoyment in the lessons. Students mentioned their enjoyment in focus group discussions.
Provision of positive role models	Noted in teacher interviews and student focus discussions – in particular positive models of Indigenous musicians.
An approved Aboriginal-focused pedagogy	Noted in teacher interview that the Yolngu staff action group has approved the programme as a Western way of learning that is acceptable.
Development of self-organisational skills	Mentioned in staff interview. Goal-setting skills are also mentioned. In focus group discussions, students mention decision-making and planning.



Development of socio-cultural skills	In focus discussions students mention Reconciliation and the (positive) interaction of cultures. Their references to being able to tell their families about the programme may refer to a cultural issue – being able to talk about school when at home – where there has been little interest in the Western way of learning.
Development of thinking skills	This is mentioned by students in focus group discussions.

## Discussion

It is clear that there are attributes of the *Indigenous Music Education Programme* that have a significant impact on students' learning. Firstly, it is thought to have the potential to form a bridge between traditional Indigenous cultures and more Western approaches to learning. The Yolngu group have approved the programme and the students mention that it is a means of interacting between the two cultures.

It was not possible to gather 'hard' data on attendance records, but both teachers and students suggest that the *Indigenous Music Education Programme* encourages students to attend the education centre. At present it seems that students come because they want to participate in music. Maybe when there has been time for the other 'enabling' skills and attitudes to have a more far-reaching effect, students will attend the education centre on non-music days as well – but this will need further investigation when the programme has been running for longer.

Another outcome that is clearly apparent is the extent to which the programme helps to develop students' self esteem. This was noted in classroom observations and discussions with both teachers and students. Having confidence in oneself is a very important characteristic that enhances learning (Fullarton 2002; Bryce & Withers 2003).

Having a focus on life skills and helping students to gain skills in self-organisation and decision making will be particularly beneficial in light of the teachers' accounts of factors that impinge on students' learning at present.

Teachers' comments on the areas for improvement in the *Indigenous Music Education Programme* indicate there is a need for professional development on the programme for a number of reasons. One is to develop knowledge and understanding of the programme for those class teachers whose students participate in the programme. A second is to develop an awareness of the programme for other staff in the education centre and parents, for the purpose of providing the positive benefits for participating Indigenous students and the education centre as a whole. A third is to train music teachers in mainstream schools on the philosophy and approach of the programme for the purpose of linking it to all music programmes in schools in the NT with Indigenous students. This will encourage an innovative approach to the mainstream school music programme that will incorporate the specific needs of both Indigenous boys and girls within a class and school programme in remote community, rural and metropolitan locations. The aim is to ensure that the cultural identity of all Indigenous students in the NT is recognised and that equitable access and participation to more innovative educational programmes in Indigenous education is offered to all Indigenous students in the NT as a matter of choice.

### *Features of a successful arts programme*

Where does the *Indigenous Music Education Programme* sit in relation to the features of a successful arts programme outlined in the literature review (chapter 2 of this report)?

1. *Supportive administration*

As with the *Boys' Business* programme, there is a high level of support from the Northern Territory Music School, but support in individual schools may vary.

2. *Quality provision*

From observation it seemed that the provision was of a very high standard, providing young people with role models of successful musicians. Indigenous role models are particularly important.

3. *Recognition of progress*

Students are praised whenever possible and the frequent public performances provide public recognition.

4. *Opportunities for individualised instruction*

Resources may limit the possibility for this, but the researcher observed several instances of students receiving individual assistance.

5. *Risk taking*

This occurs in the classroom and in performance.

6. *Innovative teaching techniques*

As with *Boys' Business*, the programme itself is innovative.

## Conclusion

The outcomes from this study need to be interpreted in light of the socio-economic and cultural contexts of the schools, one of which was described as located in a 'disillusioned and dysfunctional' community. It was evident that many parents in both school communities do not value a Western kind of education and therefore do not provide support or encouragement for their children's learning at school. Outcomes from this early evaluation of the programme suggest that the programme has the potential to address some of the 'deficits' for students caused by this situation. In particular, some students are provided with positive Indigenous role models and the programme helps them to develop self-esteem.

### ***Evidence that involvement in the Indigenous Music Education Programme was associated with improved learning***

As noted, it was inappropriate to gather test results or other hard data that could provide evidence of the kind observed for Direk and the *Boys' Business* programme. In the future, results of students obtaining Vocational Certificates through participation in the this programme will be evidence of the programme's impact on their learning. Evidence observed through the fieldwork included:

- Musical skills and knowledge – such as performance on instruments and vocal performance and the ability to control volume and vary tempo, knowledge of chords and technical knowledge regarding care of instruments and setting up sound systems;
- Literacy and numeracy skills;
- Life skills associated with the vocational qualification.

***Enabling skills and attitudes acquired by students that appeared to be related to the experience of participating in the Indigenous Music Education Programme***

- Students experience enjoyment of learning and can associate school attendance with positive experiences;
- Ability to work with others in a collaborative manner and development of other social and communication skills;
- Ability to plan and organise;
- Development of self-confidence.

***Attributes of the Indigenous Music Education Programme that appeared to assist students' learning***

- The approach is approved of by the Yolngu group
- The teachers provide positive role models.
- All students' views are valued and respected
- Positive behaviour is commended, but students are not forced to join in activities.

***Attributes of the Indigenous Music Education Programme that appeared to be exclusive to an arts programme***

As has been noted in discussions of Direk and *Boys' Business*, it is difficult to claim that particular attributes are exclusive to the arts. In the case of the *Indigenous Music Education Programme*, being concerned with music, it builds on a natural ability of many of the young Indigenous participants. Working within an arts context was acceptable to the Yolngu group – this context includes both the content and the processes followed. As with the other programmes discussed, the *Indigenous Music Education Programme* focused very much on authentic activities – many of the lessons observed were rehearsals for public performances. Particularly at the school in the Arnhem region, it did seem that the music programme was becoming integrated with other learning activities at the education centre.

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## 6 SCRAYP – YOUTH ARTS WITH AN EDGE

### Overview

This chapter reports on the evaluation of the school-based arts programme, *SCRAYP* (Youth Arts with an Edge). It considers the extent to which the programme has enhanced students' learning outcomes. In doing this, it addresses the overall aims of this study:

- To measure the impact arts education has on learning in the arts and wider learning across other areas of the curriculum;
- To identify particular attributes of programmes that benefit students' learning.

*SCRAYP* is a youth arts programme based in the western suburbs of Melbourne that aims to engage all young people, particularly high-risk young people, in schools and the wider community. *SCRAYP* conducts drama programmes in primary and secondary schools in the Western Metropolitan Region of Melbourne. *SCRAYP*'s management team works alongside young artists, who are employed on a casual basis, to offer weekly workshops to students at selected schools over two terms. At the end of the programme, students in each school present a performance to the local school and community.

In this study the impact of *SCRAYP* on the learning of students in the four schools involved in *SCRAYP* programmes in 2003 was investigated. At all four schools, workshops were observed and teaching and administrative staff at the schools were interviewed about their perceptions of *SCRAYP* and its impact on the students involved and on the school more widely. In two of the schools, narrative writing tasks were administered to the *SCRAYP* participants and to a control group, both before and after implementation of the *SCRAYP* programme. This was an attempt to measure any effect of the programme on students' ability to communicate ideas and feelings, organise their thoughts, and use language expressively and coherently. In two of the schools *SCRAYP* students were administered a student questionnaire based on the Organisation for Economic Cooperation and Development (OECD) Programme for International Student Assessment's (PISA's) 2000 student survey. The *SCRAYP* students were matched on background characteristics to students from the Australian database for PISA, and measures of attitudes to school and of reading engagement were compared.

The qualitative evidence from this study (based on observation and interview) strongly suggests that *SCRAYP* has a positive impact on the affective development of participants. *SCRAYP* contributes to students' self-esteem, to their persistence, ability to cooperate with others and to control their emotions, and to a strengthening of their relationships with adults and peers. An important contribution of the *SCRAYP* programme, at sites where it deals with at-risk young people, is in providing them with a reason to stay at school. In terms of quantifiable measurement of outcomes, derived from the narrative writing assessment and the student questionnaire, this study found no evidence that the *SCRAYP* programme has a positive impact on students' learning. The features of the programme associated with its success in enabling student learning include:

- responsibility and commitment demanded of students, and appreciation of their successes;
- thematic content of the drama, deriving from the students' own social and personal experiences and allowing them to express and explore ideas and feelings;
- the strong organisational structure of the programme;
- support from within the school;
- charismatic leadership; and

- role models provided by the young artists who conduct the programme in schools.

## Background

Information in this section is drawn from published sources including the *SCRAYP* website (<http://www.viep.org.au/SCRAYP>), various documents and correspondence provided by the executive director, and an evaluation of the *SCRAYP* programme conducted in 2002 by the University of Melbourne (Stokes, 2002). It also draws on interviews with *SCRAYP* staff and school personnel, and observations of the *SCRAYP* programme in action.

### *The SCRAYP project*

*SCRAYP* is a youth arts programme based in the Western suburbs of Melbourne that aims to engage all young people, particularly high-risk young people, in schools and the wider community. It has been in existence as an arts education provider since the mid 1990s, its structure and the particular shape of its programmes evolving over the period. It uses a mentoring and training programme that enables young people to access the arts and connects them to the world of work.

*SCRAYP* provides programmes after hours and at weekends for young unemployed and TAFE students aged 18-25. *SCRAYP* is a prominent presence in the Melbourne arts education scene. During the year of this research study, *SCRAYP* was instrumental in bringing to Australia Arnie Aprill, the director of the Chicago Arts Programme, CAPE, which is the subject of one of the studies in *Champions of Change* (Fiske, 1999) for a series of seminars. *SCRAYP* also mounted a number of public performances by the artists, in 2003, as well as public performances of each school's production. *SCRAYP* promotes research interest in its activities. During the 2002-3 period, as well as being involved in the present study, *SCRAYP* has been the subject of a University of Melbourne study completed for the Maribyrnong City Council and the Victorian Department of Justice (Stokes, 2002), and of a doctoral study by the training and project manager, David Kelman. In 2003 schools participated in *SCRAYP* on condition that they would cooperate with these research projects.

Given the aims of this study, most of the following discussion focuses on *SCRAYP*'s school-based programmes. It should be noted however that the wider engagement described above contributes to the vitality of the organisation and hence, undoubtedly, to the enthusiasm and commitment of participating schools and students.

### *Staff and funding*

*SCRAYP* works out of the Footscray Community Arts Centre (FCAC), which more broadly serves the western suburbs' arts community. *SCRAYP* has a full-time Executive Director, a part-time Training and Project Manager and a part time cultural community development manager. A number of local young artists are also employed on a casual basis: these individuals, all from the local community and some emerging out of the school-based programmes, train as facilitators for the programme and then work with students in schools alongside the two part-time managers.

Funding for *SCRAYP* is provided from a number of sources. The salary of the Executive Director is paid by the Victorian Department of Education (DET). Each participating school pays an annual fee (\$3000 in 2003). *SCRAYP* also receives funding from a number of other government and local government agencies, and from several private foundations and companies. Ensuring *SCRAYP*'s financial viability is a major preoccupation of the Executive Director.

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### ***Selection of schools***

In previous years *SCRAYP* provided 10-week long programmes each year to seven or eight schools in the region. Schools applied for inclusion and were then selected on the basis of their own commitment and the availability of resources from *SCRAYP*. In 2003, however, it was decided to narrow and deepen the focus: to work with a smaller number of schools and to provide a programme that lasted for 20 weeks or two terms at each site. Four schools that had participated in the programme in previous years were selected. The criteria for selection are provided in Appendix V.

### ***Aims and objectives***

The aims and objectives of the *SCRAYP* programme (Kelman, 2002), are:

#### *Aims*

To empower young people to express their thoughts and feelings through art and, by doing so, deepen their understanding of themselves and society.

#### *Objectives*

- Increase self-esteem and self-awareness;
- Explore issues relevant to the young people;
- Make coherent artistic statements about society ;
- Challenge prejudices, stereotypes and destructive behaviours;
- Give young people a platform for their thoughts and feelings to be heard by their wider community;
- Develop a greater understanding of art - its forms and the skills associated with them;
- Develop emotional intelligence, language use and conceptual thought.

### ***Content of the programme***

While there was some variation in the development of the programmes in each of the four schools, the basic structure was similar.

A *SCRAYP* team led by the Training and Project Manager, and including two or three young artists, worked with students over the two terms of the programme to develop a piece based on the students' own experiences and using their own language. Each piece took the form of a narrative about issues that concern young people: family relationships, drug abuse, friendship, love, migration, and so on. An aim of the process, though not a necessary condition, was a performance to be presented to family, friends and the local community. In fact, the work in all four schools in 2003 did culminate in a production at the end of term 3 or in term 4.

The performance pieces were more or less structured by the young people themselves. In the case of the three secondary school programmes, the emerging theatre pieces were episodic narratives of contemporary life that evolved out of several sessions of workshopping. The primary school group had less input to the overall structure of the piece: the story of Beowulf was established as a framing device by the Training and Project Manager.

Each school group generated a script. There was variation in the degree to which the students actually wrote the script themselves: a working group of students in one school met during the

holidays to write up the script; elsewhere, the *SCRAYP* team used the students' thoughts and language to write a first draft of the script, with student input invited for review and feedback.

*SCRAYP* sessions were conducted at a regular time each week and lasted one to two hours. In the case of three of the four schools the programme was conducted during school hours; in the fourth it was an after-school activity. One school group met at the Footscray Community Arts Centre, while the others used school facilities.

Sessions started with warm-ups – games and physical and mental focusing exercises – to stimulate concentration and cooperation. These were followed by role-play and group activities working on aspects of the central piece. The sessions typically ended with small groups presenting to the others as an audience, and then a debriefing including an evaluation by the leader of the session, and foreshadowing of what would be accomplished in the next.

### ***The schools and SCRAYP students***

The four schools selected for the *SCRAYP* project in 2003 were all government schools in the Western Metropolitan Region of Melbourne. All four schools had participated in the project in previous years, though not all had been involved continuously.

School 1 is a government primary school in a traditional working class area of Melbourne, about 5 kilometres from the city centre. There are students from 53 language backgrounds attending the school. The Year 5 and 6 students participating in *SCRAYP* were initially nominated by the teaching staff from two groups: children who were considered at-risk – socially, in terms of behaviour, or because of family circumstances; and high achieving or 'quiet' students. The attempt was to have about an equal number from these two groups, and an equal number of boys and girls. The nominated students were then invited to participate in the *SCRAYP* programme. Two or three nominated students (from the high achieving/quiet group) had declined to participate; the rest had signed on. Towards the end of term 2 an additional group of sixteen Year 3 and 4 students was invited into the programme, and joined the Year 5 and 6 students in their weekly sessions.

School 2 is a government secondary school in the same suburb as School 1. It has a strong reputation for supporting students both academically and socially. The *SCRAYP* team 'recruited' students in Years 9 and 10 by putting on a performance towards the end of the previous school year, and then inviting interested students to sign up. In addition, the teacher in charge 'head hunted', inviting students who were considered suitable to join in. 'Suitable', according to the principal, meant 'kids on the periphery, who've got a mind, but would not be likely to put themselves forward'. It was not, then, a deliberate policy to involve 'at-risk' students. Twenty three students from Years 9 to 12 participated in the programme in 2003, which was offered as an after-school activity. A number of the students had participated in the *SCRAYP* programme in previous years.

School 3 sits on the volcanic plains of western Melbourne, in an industrial area with new housing estates sprouting along the new freeways. Part of a government secondary school, it is one of four junior campuses (Years 7 to 10) that feed into a senior campus for Year 11 and 12 students on another site. The *SCRAYP* team worked with a group of twenty Year 10 students. There were slightly more girls than boys in the group. The students were described by a teacher as having a range of abilities. Some students were described as having 'learning disabilities'. None of the students was selected to participate; rather, the students had chosen to participate in the *SCRAYP* programme as an elective subject within the drama department of the school.

School 4 is a government secondary school located in an inner north-western suburb of Melbourne. It provides for students who have not succeeded at, and often those who have been

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rejected by, other schools. The school offers a traditional curriculum but there is a high teacher-student ratio and a very strong emphasis on pastoral care. All students at School 4 are encouraged to take part in *SCRAYP*, but ultimately they elect to participate or not. During 2003 there had been some instability in the group of students attending the *SCRAYP* sessions – there is a good deal of instability in the school population in general – and although the course was supposed to finish at the end of term 3 it was continued into term 4 to allow a core group of participants to see their work through to a finished stage. The school reported that 12 students maintained involvement in the programme.

## Data

### *Method*

Given the differences between the four schools, the variety of structures under which *SCRAYP* operated (primary, secondary and community school; within curriculum and co-curricular programmes) and the disparities between the groups of students involved at each school, different sets of research strategies were adopted for each school, though as much consistency as practicable was maintained.

Table 10 summarises the strategies applied in the four schools.

**Table 10 Research strategies adopted for *SCRAYP* study**

School	Site visit	Narrative writing task	Student questionnaire	Interview with school personnel
1	x	x		x
2	x		x	x
3	x	x	x	x
4	x			x

The site visit was regarded as an essential component of each school-based strategy, in order to observe at first-hand the programme in action. In each school one researcher from ACER arranged the visit directly with the school Principal or their representative and ascertained from the *SCRAYP* Training and Project Manager the date for a visit that would cause minimal disruption. (This was particularly sensitive at School 4.) On arrival at the session the researcher was introduced to the students and the purpose of the visit explained. Observations of the *SCRAYP* session were made by the researcher sitting to one side of the room, taking notes.

Interviews with school personnel, like the site visits, were regarded as essential to an insight into the way the *SCRAYP* programme was perceived within the school. All four schools provided interviews with school personnel. They were of two kinds: meetings with principals and coordinators during the site visits, and separately scheduled interview sessions with the coordinator and, where possible, with other teachers who would be able to provide insight into the *SCRAYP* programme's workings in the school, and comment on its effects on students and their learning.



The interviews were conducted in an informal manner, incorporating four questions:

1. *What are the outcomes of the students' involvement with SCRAYP?*
2. *Which aspect(s) of the SCRAYP programme produce these outcomes?*
3. *Does SCRAYP have an impact on other curriculum areas?*
4. *Is there any attempt by the school to integrate the SCRAYP activities or style into other parts of the curriculum?*

The aim of the narrative writing task was to investigate a possible relationship between drama programmes and the development of students' communicative capacity, in particular the development of skills in narrative writing. A number of studies have suggested that narrative writing is improved by drama programmes, in particular, 'thought-organising activities' (see Moore and Caldwell in a 1993 study cited in *Critical Links*, Deasy, 2002, pp.32-33); and the development of expressive language in a 1984 Tasmanian study (see Schaffner, Little and Felton, cited in *Critical Links*, pp.50-51, Deasy, 2002). In *SCRAYP*, this strategy was an attempt to measure through the narrative writing responses any effect of the programme on students' ability to communicate ideas and feelings, organise their thoughts, and use language expressively and coherently.

School 1 and School 3 were suitable for conducting an investigation of narrative writing development. In School 1 all Year 5 and 6 students, and in School 3 all Year 10 students, were administered two narrative writing tasks: one near the commencement of the *SCRAYP* programme, at the beginning of term 2, and the second after the end of the programme, at the end of term 3. (The Year 3 and 4 students at School 1 were not able to be included in this strategy because of their late entrance to the programme.) Thus data from students participating in *SCRAYP* ('*SCRAYP* students') and a control group of other students in the same year levels at each school ('Not *SCRAYP* students') were obtained.

The narrative tasks and the marking guides used for this strategy were developed by ACER for use in assessments of writing for year 3, 5, 7 and 10 students. Classroom teachers administered the tasks during normal class-time, following an administration script prepared by ACER. The students' responses were then collected from the school by ACER. The responses of students from both schools, and to both the first and second tasks were randomised, and each response marked by two independent markers, one a member of ACER's standing marking panel for writing, and the other an ACER literacy test developer. A third marker – another ACER test developer – adjudicated in the case of any discrepancy between the first two sets of marks. The responses were marked on three criteria: content, language and spelling.

The aim of the strategy was to determine whether the *SCRAYP* students' narrative writing proficiency had developed significantly more than the Not-*SCRAYP* students'. If such a development was observed, then it could be hypothesised that the *SCRAYP* programme had improved the students' learning outcomes in this particular respect.

The student questionnaire was used to measure the impact of the *SCRAYP* programme on students' attitude to learning and, by extension, their learning achievement.

The Organisation for Economic Cooperation and Development (OECD) conducts the Programme for International Student Assessment (PISA) on a three yearly cycle to measure the learning outcomes of students at the end of compulsory schooling in the three core domains of reading literacy, mathematical literacy and scientific literacy. The study was conducted for the first time in 2000. Along with the cognitive instruments, each of the 250,000 participating 15-year-olds across 32 countries, including more than 6000 students across Australia, was

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administered a twenty-minute questionnaire which asked them about their family background and school experiences. A subset of questions investigated their engagement (interest and practices) in reading: A report on the PISA 2000 reading literacy study, *Reading for Change: Achievement and Engagement. Results from PISA 2000* (Kirsch, 2003) found that there was a strong association between engagement in reading and reading proficiency – stronger, in fact, than the known association between reading proficiency and socio-economic background.

For the purposes of the present study, a short survey was constructed from extracts of the PISA student survey. It included the questions on family background and attitudes to school, and on reading engagement. Two new questions were appended asking students to comment on the impact of the *SCRAYP* programme on themselves individually and on the school more generally. The instrument used for the *SCRAYP* study is attached as Appendix VI.

The questionnaire was administered to *SCRAYP* students in Schools 2 and 3, who were judged to be sufficiently similar to the PISA population in age. Twenty eight students who had participated in the *SCRAYP* programme completed the ‘cut-down’ version of the PISA student questionnaire. These students were matched to students who had completed the PISA 2000 student questionnaire as part of the PISA study. The students were matched on the socio-economic status of the father, the educational level of the mother, whether they spoke English at home and whether they were born in Australia or overseas. Only students from Victoria were selected for this matching process. A total of 78 students was matched.

### ***Results – Site Visits***

The *SCRAYP* Training and Project Manager led three of the four sessions observed; at School 4 one of the young artists led the session.

The salient features of the four sessions observed are summarised below.

#### *Consistent structuring of the session*

Sessions started with warm-ups – games and physical and mental focusing exercises – to stimulate concentration and cooperation. These were followed by role-plays and other group activities working on aspects of the performance piece. The sessions typically ended with small groups presenting to the others as an audience, and then a debriefing including an evaluation by the leader of the session, and foreshadowing of what would be accomplished in the next.

This structure provided students with a clear framework of activities and an implicit set of rules, within which risk-taking and exploration could take place.

#### *Explanation of activities: what would happen in the session and why it was being done*

Explicit unpacking of what the students could expect within each session was a notable feature of the training and project manager’s pedagogical style. Again, this practice provided students with framework and structure. More remarkable were the explanations he offered to the students, at strategic intervals, as to why activities were being undertaken. This provided students with a metacognitive perspective on the sessions, and at the very least offered a model for reasoning about behaviour.

#### *Continuous evaluation of the students’ performance*

Sessions were punctuated by short plenaries in which the Training and Project Manager provided feedback on the activities just accomplished. Encouragement was usually offered, but the students were not spared negative commentary, be it about performance quality, conceptualisation or concentration.

*Explicit emphasis on student ownership and responsibility for their work*

There was regular explicit iteration of the idea that the students were responsible for the work they were producing; that they could determine what was to be included and what not; and that the performance they were preparing would be using their language and their ideas. Student responsibility and autonomy were enacted in the way students managed small group activities. They were encouraged to make suggestions to each other and to the wider group. At the same time there was authoritative input from the Training and Project Manager and from the artists. The ongoing evaluations (see previous paragraph) also had a strong influence on outcomes.

*Use of a variety of registers of language.*

The Training and Project Manager talked to the students in language that was laced with technical terms, often repeating the concept in more idiomatic language afterwards. This technique introduced students (unconsciously or not) to a range of vocabulary they might not otherwise have encountered. For example, he reminded the primary school group that the play performed the previous week had been about two things, both to do with monsters: old monsters, from the story of Beowulf, and new monsters, everyday monsters, ‘a problem that someone might have – a monster in families ... It’s a metaphor.’ The language of emotion was prominent. In the same session, a character was described as ‘a young mother with a family. She wants to feel like she’s free again. She spends a lot of time spending money she hasn’t got.... Her monster is a desire for pleasure, for example: that’s her monster.’ The Training and Project Manager and the young artists also used idiomatic ‘kid-language’ unselfconsciously, in a way that seemed to promote rapport with the students. SCRAYP personnel did not utter any obscenities; however, such language was freely used by secondary school students in two of the observed visits. It was carefully ‘placed’ for the students, during one of the short plenaries, by the Training and Project Manager: ‘We’re chill about language in these sessions. But it will be a language-free play.’ What was meant (and clearly understood and accepted by the students) was that they could use provocative language in these rehearsals, but it would not be acceptable in a public performance. The mixture of language registers used in the sessions, and the explicit comments on the appropriate use of different registers for different contexts, provided students with a meaningful occasion for developing understandings about language and culture.

*Encouragement of collaborative and supportive behaviour amongst the students*

All of the activities required cooperation between students, so that collaborative and supportive behaviour was implicitly demanded overall. In addition, students were explicitly encouraged to support each other. In the case of the primary school session that was observed, in which Year 3 and 4 students were attending for the first time, most of the activities required the Year 5 and 6 students to act as models or to lead small groups with the younger students. The ethos of SCRAYP in general is to provide role models from within the community (the young artists programme is on-going evidence) and this ethos permeates the micro-setting of the school session.

*Focus on content; ignoring of individual misbehaviour*

In two of the four sessions observed, considerable management of misbehaving students was required. This was effected in two ways: first, by drawing the misbehaving students’ attention to the content of what they were supposed to be doing, with comment only on the content of the activity (not on the student’s misbehaviour); secondly, by ‘not noticing’ the misbehaviour. No student was observed being told to ‘stop doing’ something by the SCRAYP staff, even though occasionally behaviour became even physically intrusive. Interestingly a small group of Year 5 and 6 students was observed adopting the same tactic as the leaders: when a boy in the group became disruptive, the other group members simply turned away from him and continued their rehearsal; the boy shortly after withdrew to the side of the room, where he remained quietly

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until the next activity began. Apparently this negative attention to disruptive behaviour is effective in this context at least.

*A high degree of student engagement*

The absolute degree of engagement varied between schools, but in all four school sessions observed there were stretches of intense concentration by all the participants. This was especially during role-plays when taking on a role outside the self seemed to allow complete immersion.

*Charismatic leadership of sessions by the training and project manager*

In the three sessions observed at which the Training and Project Manager was present he exerted a powerful influence on both the students and on the artists. He has a physically commanding presence, and he emanated a sense of impersonal commitment to the students and to the perfection of their performance. The force of this influence on the success of the *SCRAYP* programmes in schools is considerable. The management team is conscious of the obvious disadvantages of so much depending on one individual, and is making attempts to train others and thus widen the pool of authority and talent. The one session observed at which the Training and Project Manager was not present was at School 4, certainly the group of students most readily describable as ‘at risk’, and the most disruptive. The session required a very high level of student management from the three staff present (two artists and one teacher); however, the same ethos as that practiced by the training and project manager, of encouragement, support and concentration on the work at hand, was impressively maintained.

**Results – Interviews with school personnel**

The number and type of interviews conducted, and the school personnel involved from each school are summarised in the Table below.

**Table 11 School-based staff interviews for *SCRAYP***

School	Interview type	Interviewees*
1	observation site visit	Principal
1	scheduled interview session (off-site)	Acting principal*; Year 6 classroom teacher
2	observation site visit	Principal
2	scheduled interview session (on-site)	Welfare coordinator*; classroom drama teacher
3	observation site visit	Managed Individual Pathways (MIPS) co-ordinator/English teacher*
3	scheduled interview session (off-site)	Managed Individual Pathways (MIPS) co-ordinator/English teacher*; Drama teacher; TEACHER'S AIDE WHO WORKS WITH ONE STUDENT IN THE <i>SCRAYP</i> PROGRAMME
4	scheduled interview session (off-site)	Classroom teacher and welfare co-ordinator *

\* *SCRAYP* coordinator for the school

Responses from the school personnel are organised according to the four interview questions.

*What are the outcomes of the students' involvement with SCRAYP?(heading 5)*

This question inspired a wide range of positive responses, all of which affirmed SCRAYP's value for the participating students and often also for the teachers and the wider school. They can be categorised as follows:

Improved interpersonal intelligence or skills

All the teachers interviewed commented on the SCRAYP programme's contribution to students' cooperative behaviour –

*They learned to work co-operatively.*

*They learned to listen to each other.*

*It gave them an opportunity to meet new people, and develop a team spirit.*

– and to other aspects of relating to others:

*It provides the opportunity for the development of leadership skills.*

*It helps them to develop conflict resolution skills.*

*It provided them with better understandings of human relationships.*

Improved intrapersonal intelligence or skills

Several comments were made about the development of such faculties as perseverance, a sense of responsibility or commitment, and a willingness to take risks:

*It encourages students 'to have a go', which is important for learning how to learn.*

*It requires them to make a commitment knowing that others are dependent upon this commitment.*

One of the strongest threads in teacher commentary was their perception that SCRAYP built students' self esteem, providing them with opportunities for success at school when school might otherwise generally be associated with failure.

*The programme is run so that students were not set up for failure, but could only experience some form of genuine success.*

*It gives students who may not be academically strong a chance to succeed at something at school.*

The teachers from one school described a student with learning difficulties – as a result of a relatively recent head injury – who is participating in the SCRAYP class as well as only one other (cooking). The teacher's aide who worked with this student said that, although this student had limited capacity and memory loss, SCRAYP particularly allowed him to participate, and to be involved, in a unique way. To the teachers' surprise this student had been one of the first to learn his lines for the SCRAYP performance.

Stronger connections to peers and the wider school, leading to sustained attendance at school

Teachers commented that SCRAYP prompted students to feel connected to the school, through working closely with other students in an alternative context to the areas that would traditionally serve that purpose, such as sport:

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*It developed a cohesive group who worked together and trusted each other.*

*Something different to the traditional sporting programmes.*

Because students were interested in and committed to SCRAYP they attended school when otherwise they might not. This was an especially strong theme in School 4: One anecdote concerned a student who had trouble managing his anger. On one occasion,

*he was asked to go home because he would get himself into trouble if he stayed at school. Consequently, he decided to up-end a table and chair in the courtyard. The teacher said it was **really** a good idea to go home; however this would be done without a formal suspension. 'Go home and come back to tomorrow and start afresh.' So the student walked down the driveway and there is a dumpster. He up-ended the dumpster. Everything was spilt out onto the driveway. He was spoken to and it was explained that it would have to be a formal suspension. He headed out the driveway, walked around to the back of the school, hopped onto the bus and went to SCRAYP. He had to be suspended for a second day because he failed to go home. But, he had a very productive session with SCRAYP!*

Other stories concerned students at risk of leaving school altogether who were anchored by SCRAYP:

*[Her] mother had a history of mental illness, and she recently died of cancer. This student only came to school – and to do so required travelling some 30 kilometres – in order to participate in SCRAYP. This attendance gave staff an opportunity to get the student engaged in other areas of school.*

And again:

*We had two girls who came from a violent neighbourhood and who used illegal drugs. These girls came to every rehearsal, organised their own costumes, and came, outside school hours, to the performance. They have subsequently gone on to study VCAL at another institution. Without SCRAYP these students would have completely disengaged from school.*

Widening horizons

SCRAYP was regarded as opening avenues for thought and discussion, and allowing students to develop an understanding of personal and social issues from other points of view. This was integral to the content of the programme, in order to make the performance work.

*They were able to consider issues that were not always amenable to discussion or consideration in a classroom setting.*

*It provided a forum for them to raise and consider health issues.*

More specifically, SCRAYP increased students' awareness of and involvement in the arts beyond school.

*SCRAYP provides links to other community arts programmes which offered further opportunities to students, especially those interested in the performing arts.*

*Some students who participated in SCRAYP in previous years went on to do drama workshops outside school.*

*Which aspect(s) of the SCRAYP programme produce these outcomes?(heading 5)*

Answers to this question revolved around the ethos of dedication and success cultivated by the SCRAYP team, and around the sense of ownership that the students felt for the work they did in SCRAYP:

*Students are applauded for their success.*

*The SCRAYP artists are remarkably persistent: as in 'never giving up ... no matter what'.*

*The approach of the facilitators to the students: putting the onus on them to make it work.*

*Their focus on developing student ideas and implementing what students want to do.*

The above are marks of successful pedagogical style in a general way, but some features of SCRAYP are, if not unique, more specific to drama and to this particular kind of drama, to do with the thematic and emotional focus of the sessions and with the fact that it is active rather than based on pencil and paper:

*You do have a different relationship with the kids in drama, than in other classes... It's more relaxed in drama, it's just the nature of the subject; and that's why the SCRAYP project is so wonderful.*

*The students don't have to write (though there are opportunities to write, in creating the scripts).*

*The issues raised during the SCRAYP sessions provided staff with an opportunity to develop a better understanding of the issues that students have to deal with in their lives outside of school.*

A third special feature of SCRAYP identified by teachers is to do with who delivers the programme. The artist-facilitators are young, and they are from the world outside school:

*The facilitators are close to the students in age so they have the best time together.*

*SCRAYP has credibility with the students because the students are not working with teachers, but with artists, off-site so it is not seen as a school activity but as an opportunity to engage in 'real' activities.*

*Does SCRAYP have an impact on other curriculum areas?*

The answer to this question from teachers at all four schools was, 'No, not in academic areas, but ...' The riders focused on student retention and attendance, on expanding their interests, and on providing opportunities for improved communication between teachers and students. The following give the flavour of these comments:

*SCRAYP did not necessarily have a direct impact on academic results. However, were it not for SCRAYP, some students who will be struggling to pass their VCE [Victorian Certificate of Education, the year 11-12 certificate] would have left the school and not even attempted the VCE.*

*SCRAYP gives the teacher something to talk about to the students, especially to more difficult students, and allows the teachers to see such students in a positive light.*

*Because it is important to students, it provides leverage with students who may be misbehaving elsewhere.*

*No, not on academic areas, but it provided an opportunity to identify issues of concern to students that could be raised in some classes.*

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*Is there any attempt by the school to integrate the SCRAYP activities or style into other parts of the curriculum?*

SCRAYP was linked to other performing arts activities in two of the schools. On the whole, though, this question tended to produce somewhat apologetic responses: ‘We ought to integrate SCRAYP, but it hasn’t happened ... yet.’ Enthusiasm about SCRAYP did not necessarily translate into confidence that its methods were transferable:

*It is difficult for SCRAYP activities and approaches to be integrated into classroom teaching practices.*

*No SCRAYP activities and approaches are unlikely to have changed classroom teaching practices of teachers in the school.*

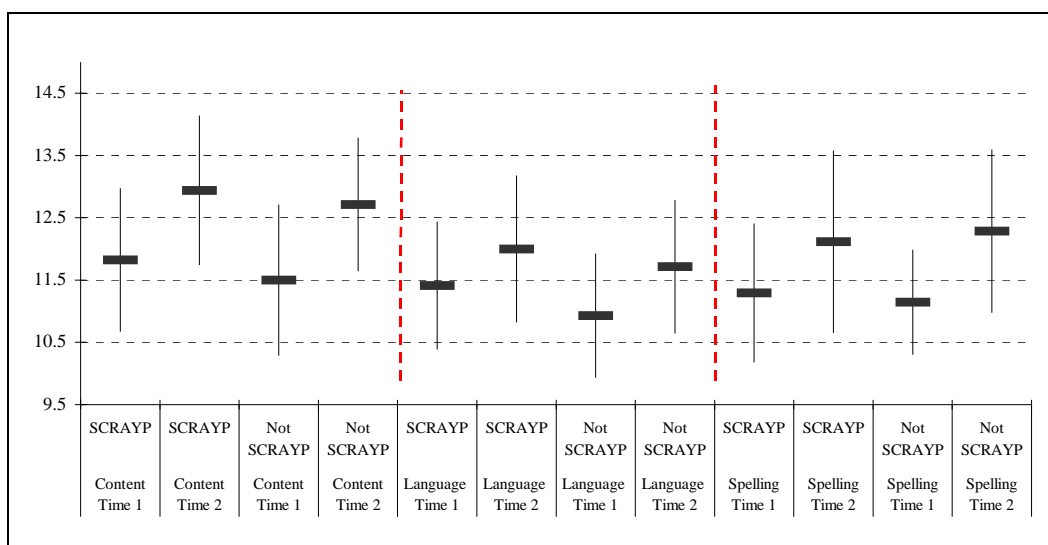
### Results - Narrative Writing Tasks

Table 12 below shows the number of students of each type included in the narrative writing task study.

**Table 12** Number of respondents by year level and participation in SCRAYP

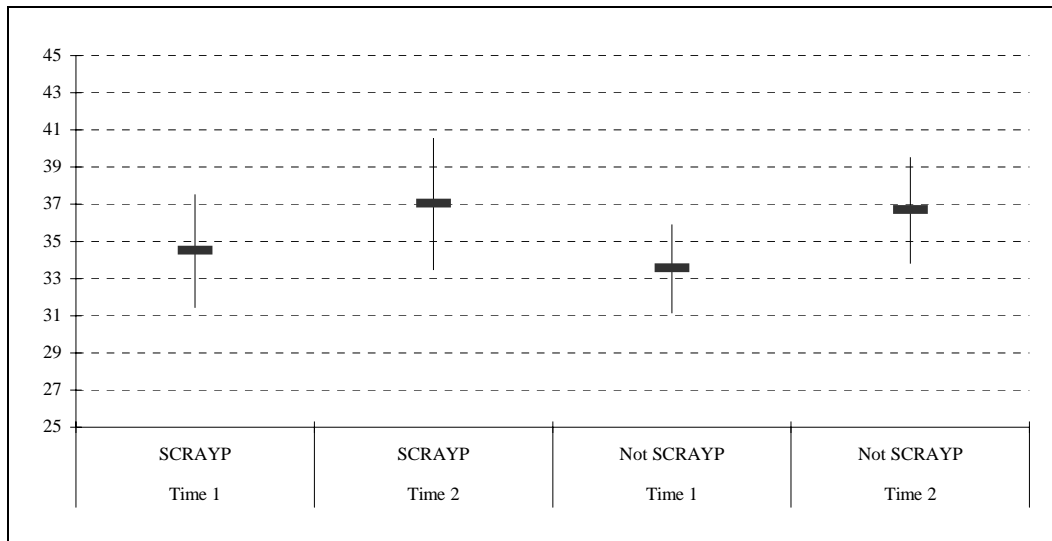
Year level	Not SCRAYP	SCRAYP	TOTAL
Primary 5	9	8	17
Primary 6	6	9	15
Total primary	15	17	32
Secondary 10	63	20	83

Figure 5 shows the mean score for primary students for each of content, language and spelling for Time 1 and Time 2, for those students who participated in SCRAYP and those who did not. Figure 6 shows the total (aggregated) mean score for primary students, for Time 1 and Time 2. In Figures 5 and 6 [1 and 2] the dark horizontal lines mark the mean. The vertical lines indicate the 95 percent confidence intervals around each mean. If these vertical lines overlap with the lines marking the confidence limits around other means, then there is not a statistically significant difference between the means.





**Figure 5 Mean and 95% confidence intervals for Time 1 and Time 2 content, language and spelling for primary school students participating and not participating in SCRAYP**



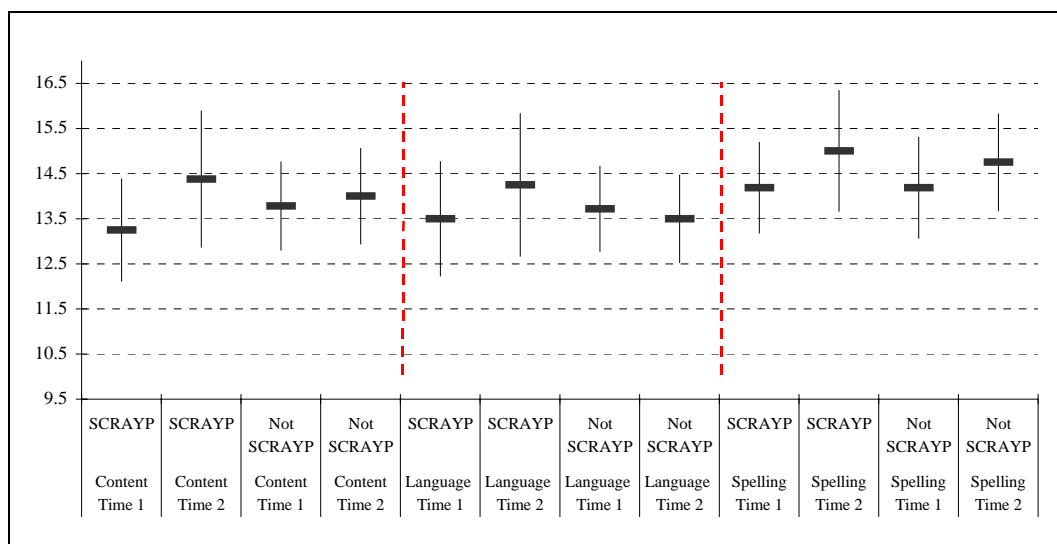
**Figure 6 Mean and 95% confidence intervals for Time 1 and Time 2 writing scores for primary school students participating and not participating in SCRAYP**

It can be seen that in Figure 5 there are no statistically significant differences between any of the means. While the means suggest that all students have improved in content, language and spelling (Time 2 scores are on average higher than Time 1 scores), we cannot be confident that this is not due to chance.

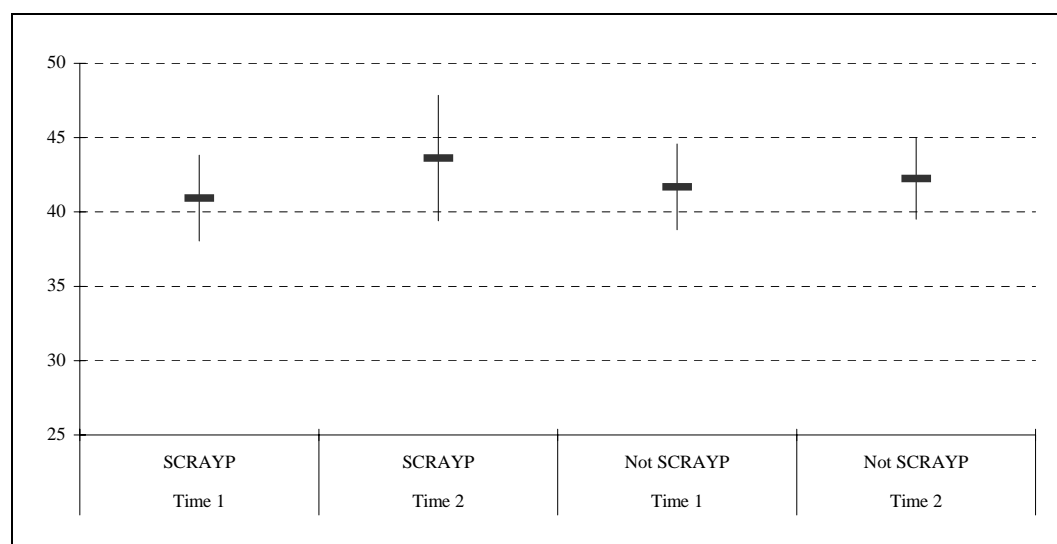
There is no evidence in these data that *SCRAYP* has had an impact on the content, language and spelling of primary school students. Students participating in *SCRAYP* do not have statistically different scores from non participants at either Time 1 or Time 2. The total writing score for primary students, shown in Figure 6, confirms these findings.

As statistical significance is in part a function of the sample size, and given that the samples used for this study were small, these results are not surprising. Although based on this evidence we cannot be confident that students’ narrative writing proficiency improved over the approximately six month period between Time 1 and Time 2, there is a trend in each of the three criteria (content, language and spelling), as well as in the Total, that indicates improvement in both the *SCRAYP* and Not *SCRAYP* groups. There is no indication, however, that the *SCRAYP* group improved more than the Not *SCRAYP* group.

Figures 7 and 8 show the results for the secondary school (Year 10) students who were administered the two narrative writing tasks, one at the beginning of the *SCRAYP* programme and the second after its completion. Figure 7 shows the mean scores for content, language and spelling and Figure 8 shows the mean total (aggregate) for narrative writing.



**Figure 7** Mean and 95% confidence intervals for Time 1 and Time 2 content, language and spelling for secondary school students participating and not participating in *SCRAYP*



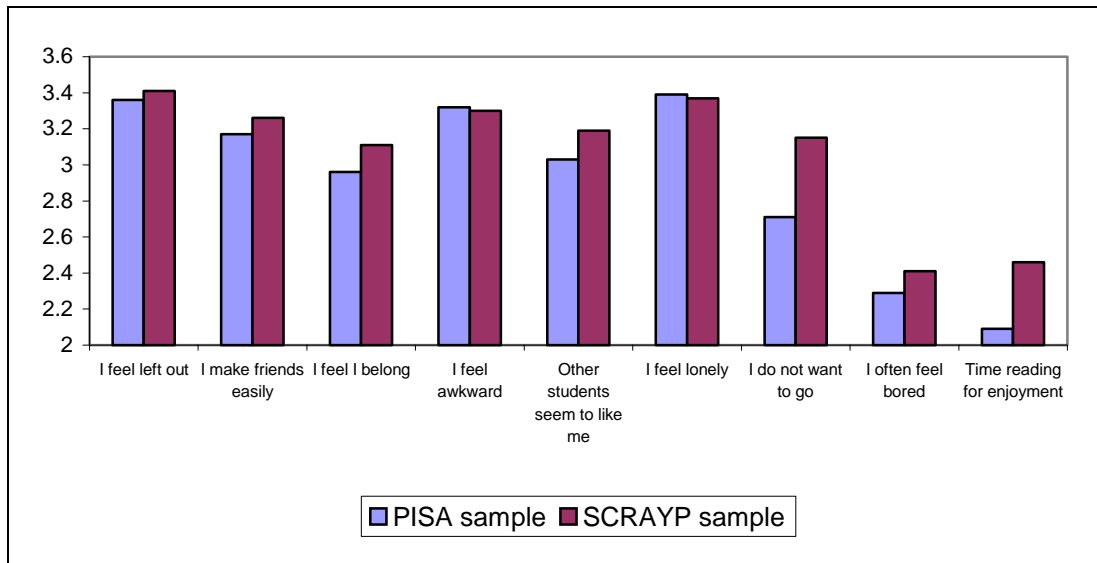
**Figure 8** Mean and 95% confidence intervals for Time 1 and Time 2 writing scores for primary school students participating and not participating in *SCRAYP*

Figures 7 and 8 indicate that there are no statistically significant differences between any of the means – either over time, or between ‘*SCRAYP*’ and ‘Not *SCRAYP*’ students. It is interesting to note that there is discernible improvement on all three criteria and on the total score for ‘*SCRAYP*’ students’ across the two assessment occasions, while the ‘Not-*SCRAYP*’ cohort improved only marginally in content and spelling, and appeared to decline in performance on the language criterion. Nevertheless, we cannot be confident that this difference between ‘*SCRAYP*’ and ‘Not-*SCRAYP*’ students is anything but a chance effect.

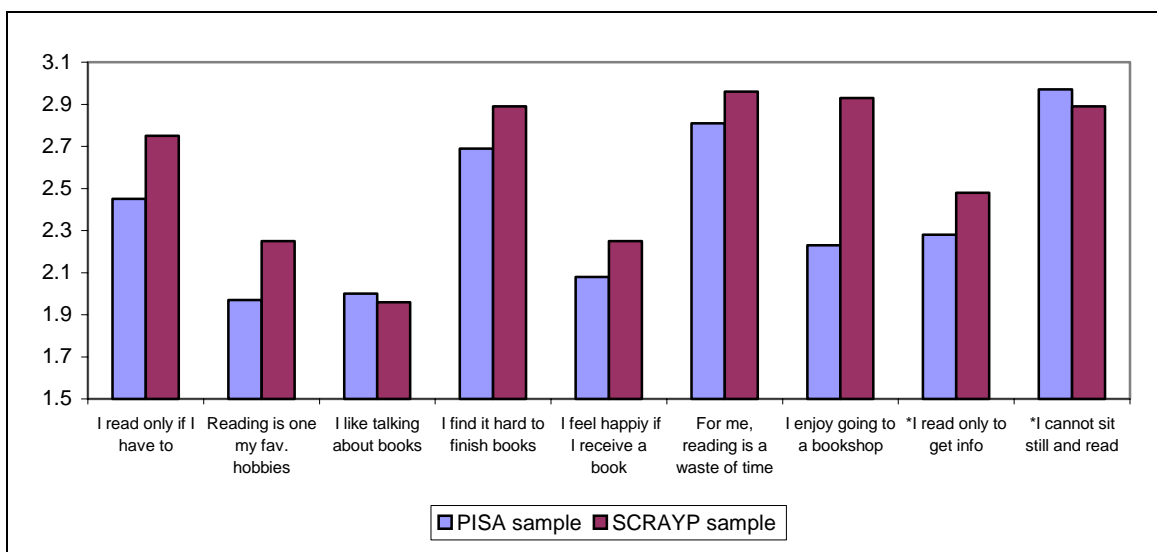
Overall, these data from both primary and secondary cohorts do not support the hypothesis that participation in the *SCRAYP* drama programme had a positive impact on students’ narrative writing proficiency.

**Results - Student questionnaire**

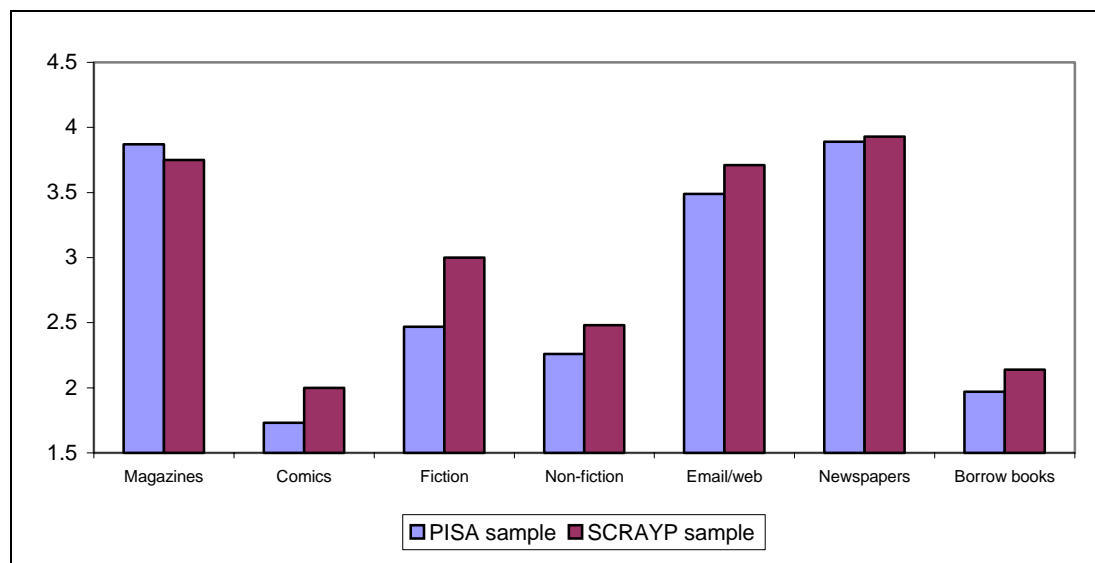
Twenty eight students who participated in the *SCRAYP* programme completed a ‘cut-down’ version of the PISA student questionnaire. These students were matched to students who had completed the PISA 2000 student questionnaire as part of the PISA study. In the figures below the mean scores of the two groups are displayed. To make the interpretation of the data easier, the negatively worded items such as I feel left out, have been reverse scored. This means that the higher a score, the more positive the outcome being measured. In Figures 9 and 10, a Likert scale is used with ‘strongly disagree’ coded as 1 and ‘strongly agree’ coded as 4. In Figure 11, a scale of 1 to 5 is used, with 1 meaning ‘never or hardly ever’ and 5 meaning ‘several times a week’. Figures 9 to 11 show the mean scores for each item, and Figure 12 shows the differences based upon scale scores derived from the items shown in the preceding figures. The scales were calculated by summing the data.



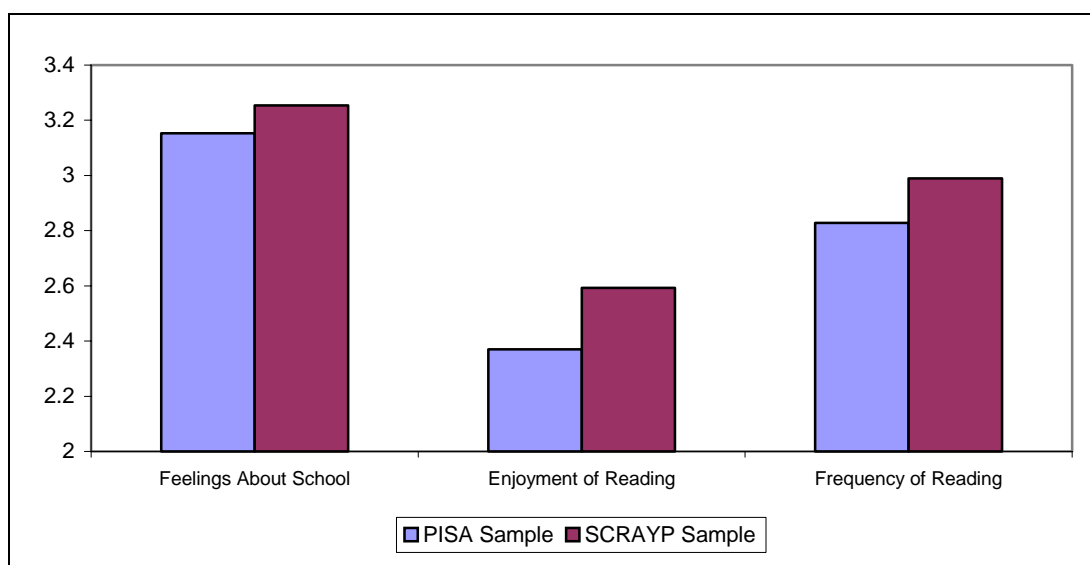
**Figure 9 Mean score on items tapping feelings about school – PISA sample versus *SCRAYP* students. (Negative items reverse scored.)**



**Figure 10 Mean score on items tapping enjoyment of reading – PISA sample versus *SCRAYP* students. (\*Negative items, reverse scored.)**



**Figure 11** Mean score on frequency of reading different types of materials – PISA sample versus *SCRAYP* students.



**Figure 12** Mean score on scales measuring feelings about school, enjoyment and frequency of reading – PISA sample versus *SCRAYP* students. (*Negative items reversed scored.*)

None of the differences seen in any of the figures is statistically significant. However, it is noteworthy that in Figure 9 on all variables, the *SCRAYP* students did have a higher mean score. In

Figure 10 and in Figure 11, on all but one variable, the *SCRAYP* students had a higher mean score than the sample of PISA students.

While these results do not provide results that support the view that *SCRAYP* has had an impact upon attitudes to school, enjoyment or frequency of reading, they are suggestive. One of the difficulties confronting the analysis was that the matching of PISA and *SCRAYP* students was done without a measure of reading ability, and without being able to identify government,

Melbourne-based students in the PISA sample. Thus the match may not be as good as desired contributing to the failure to identify any statistically significant results.

## Outcomes

This study set out with the following general aims:

- To measure the impact arts education has on learning in the arts and wider learning across other areas of the curriculum; and
- To identify particular attributes of programmes that benefit students' learning .

The findings with regard to *SCRAYP* are summarised below.

### ***The impact arts education has on learning in the arts and wider learning across other areas of the curriculum***

In terms of quantifiable measurement of outcomes this segment of the study found no clear evidence that the *SCRAYP* programme has a positive impact on students' learning. While it appeared that both *SCRAYP* and Not-*SCRAYP* students improved in narrative writing proficiency between the pre- and post- writing tests, the improvement was not statistically significant. There was no discernible difference in the degree of improvement between the *SCRAYP* and Not *SCRAYP* groups in the primary group (Years 5 and 6). There was, however, apparently a greater improvement in the *SCRAYP* group than the Not *SCRAYP* group in the secondary school (Year 10). Similarly suggestive data was generated from the student survey of *SCRAYP* participants who were matched with students from the PISA data set: that is, the *SCRAYP* students tended to show greater engagement in reading and more positive attitudes towards school.

Table 13 below summarises data gathered from observation and interviews with personnel involved with the *SCRAYP* programme that indicate development of 'enabling' skills and attitudes.

**Table 13 Outline of Enabling Skills and Attitudes Observed in the *SCRAYP* Programme.**

Skills and Attitudes	Source
Improved interpersonal skills	<p>Teacher interviews, for example 'it provided them with better understandings of human relationships'.</p> <p>These enhanced interpersonal skills were also thought to encourage students to attend school – they feel more connected to school, for example 'It developed a cohesive group who worked together and trusted each other'.</p> <p>Description of student who was suspended from school and chose to go to <i>SCRAYP</i> (see discussion in 'results' above), and students who were engaged with school through <i>SCRAYP</i> and went on to do VCAL (Year 11/12 certificate).</p>
Improved intrapersonal skills	<p>Teacher interviews, for example 'it requires them to make a commitment knowing that others are dependent upon this commitment'.</p>

Enhanced self esteem	Teacher interviews, for example 'it gives students who may not be academically very strong a chance to succeed at something at school'. Observation: students are applauded for their success
Widening horizons – understanding of personal and social issues	Teacher interviews – examples of opportunity for discussion and consideration of issues not normally discussed at school and of links to 'outside' facilities such as community arts programmes.

The qualitative evidence from this study emphatically endorses *SCRAYP*'s positive impact on the affective development of participants. *SCRAYP* contributes to students' self-esteem, to their persistence, ability to cooperate with others and control their emotions, and to a strengthening of their sense of relationship with adults and their peers. Any development of such characteristics is likely to influence students not only in the drama session and other areas of the curriculum, but beyond the classroom walls. An important contribution of the *SCRAYP* programme, at sites where it deals with at-risk young people, is in providing them with a reason to stay at school. In terms of cognitive development, teacher interviews and observation suggests that *SCRAYP* provides participating students with valuable models of language use and models of a metacognitive and evaluative perspective on their activities. These are, however, observations of input rather than of outcomes.

### ***Attributes of programmes that benefit students' learning***

Given the circumspection of the commentary in the previous paragraphs (and Appendix VIII), the following appear to be attributes that potentially benefit students' learning from the *SCRAYP* programme in schools:

- the content of the programme drawing on the students' own experiences and language;
- encouragement of student effort, commitment and ownership;
- practical as well as moral support from the school administration and individual teachers;
- young artists (facilitators) as role models, close to the students in terms of age and background;
- charismatic leadership;
- explicit and stable organisational structure: planning and articulation of sessions, outlining of goals to students, evaluation and review;
- focus on a specific and tangible outcome -- the performance; and
- appreciation of the programme as something from beyond school: part of the wider ('real') world.

Although the teachers interviewed were not confident that *SCRAYP* was being integrated with other parts of school activities in a deliberate way, it was clear from their comments that its impact was evident in more subtle and organic ways, through personal development in students and through improved relationships between students and the school.

### **Concluding comments**

*SCRAYP* has offered drama education to hundreds of young people in the western suburbs of Melbourne, both through school programmes and through projects for young people outside school. *SCRAYP* is widely and enthusiastically appreciated by the teachers and students encountered during this research study. It is described as promoting confidence and cooperative

behaviour, and enhancing social understandings. It provides students with models of language use, and occasions for using types of language, that they might not otherwise experience. According to the teachers interviewed at all four of the schools involved in the programme in 2003, *SCRAYP* provides the experience of success and achievement to students who rarely if ever have such experiences elsewhere at school, and in at least one school it is regarded as the single thing offered that prevents some students from dropping out of school.

On the other hand, this study found no measurable or quantitative evidence that the *SCRAYP* programme has an impact on student learning outcomes in the area of narrative writing, nor in attitudes to schooling or engagement in reading. Perhaps it goes without saying that the focus was very limited – narrative writing and reading engagement – and it may be that a different focus and different tools might have produced clearly positive results.

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## 7 CONCLUSION

This study set out to investigate four Australian school-based arts programmes in relation to the following research questions:

- What is the impact of each arts programme on participating students' academic progress, engagement with learning and attendance at school?
- Are empirical or anecdotal examples of improved learning outcomes substantiated?
- What are the attributes of arts programmes that are of particular benefit to the students?

As well as providing concluding comments to the above questions, there is a brief discussion concerning:

- how the attributes of arts programmes that enhance students' learning might be integrated into the general school curriculum; and
- suggestions of the extent to which these attributes may be unique to arts programmes.

Finally there are suggestions for further research.

### The impact of the arts programmes on students' academic progress, engagement with learning and attendance at school

None of the studies was able to produce hard evidence that participation in the arts programme enhanced students' academic progress. Although this could be partly because of the short period of investigation, it also reflects the bulk of the studies discussed in the literature review and is a reminder of the inherent difficulty of proving causation (Horowitz & Webb-Dempsey, 2001). Another factor is, no doubt, the diverse and complex nature of arts programmes. System-level results in literacy, numeracy and writing were compared for students involved in two of the programmes with students in the same schools who were not involved in the arts programmes. In all cases there was no significant difference between performances of the two groups. For assessment of the generic competencies of problem solving, communication, planning and organising and working with others there was a significant difference for one group only. In this one case, the 'arts rich' group scored significantly better than the 'non arts rich group'. In other cases, students in arts groups scored better, but not significantly better, than 'non arts' participants. It would be interesting in the future to study this phenomenon to see whether, with larger groups and a longer period of time, students from arts rich environments do perform better at generic competencies.

Narrative writing tasks and a questionnaire to measure attitudes to school and reading engagement administered pre- and post- exposure to the *SCRAYP* programme also did not produce significant differences between participants and non participants.

The fieldwork did substantiate other research (Barry, et al, 1990; Catterall, et al, 1999) that suggests that arts programmes enhance students' engagement with learning. The arts programmes are seen as helping students to develop characteristics that are associated with good learning. The development of self-esteem was noted, consistent with Heath and Roach (1999). This is particularly important for students from dysfunctional or disadvantaged backgrounds, some of whom have had few positive learning experiences at school until their involvement in an arts programme.

Table 14 below summarises the 'enabling' skills and attitudes enhanced by the arts programmes and indicates the programmes where these were noted as outcomes of the fieldwork. (Lack of a



cross against a particular programme does not mean that the characteristic was not developed in the programme, but indicates that it was not mentioned spontaneously in fieldwork discussions.)

**Table 14 Enabling Skills and Attitudes Enhanced by the Arts Programmes**

Skills and Attitudes	<i>Arts @ Direk</i>	<i>Boys' Business</i>	<i>Indigenous Music Programme</i>	<i>SCRAYP</i>
Development of self-esteem *	X	X	X	X
Encouragement of thinking/ reflection	X	X	X	
Development of planning skills	X	X	X	
Learn how to work collaboratively/ co-operatively/as a team	X	X	X	X
Development of perseverance/ persistence	X			X
Development of social skills (including emotional control and oral communication)		X	X	X
Development/ use of literacy and numeracy skills with students who are reluctant learners (in the Western tradition)		X	X	

\*At Direk and *SCRAYP* there was particular recognition of skills or 'intelligences' in addition to the traditional logico-deductive/ verbal-numeric. This can be seen as helping to enhance students' self-esteem in that less 'academic' skills are valued.

School attendance was not seen as an issue at most of the sites (ie there was not a problem with students attending school). For *Arts@Direk*, attendance figures were examined and there were no significant differences in absences of 'arts rich' and 'non arts rich' students. For the schools participating in the *Indigenous Music Education Programme*, formal attendance records were not available, but staff and students agreed that the music programme encouraged students to attend school or the education centre.

### The impact of arts programmes on students' learning outcomes

As noted above, the research did not yield statistically significant differences in outcomes for students in arts programmes compared to those who were not in arts programmes. The one instance of significant difference in generic competencies scores (mentioned above) is noteworthy. The fieldwork suggests that the arts programmes help students to enjoy learning and help to develop skills and attitudes that will enhance students' learning. A longer time-frame is probably needed to see if there are any strong statistically significant results.

### Attributes of arts programmes that are of particular benefit to the students

A number of attributes of the programmes studied clearly benefited students and encouraged them to learn. It is pertinent to consider the extent to which these attributes may be exclusive to arts programmes, and to what extent they might also be present in other programmes. It was clear that some students (who would normally be labelled 'low achieving') appreciated the fact that in music programmes (*Boys' Business* and *Indigenous Music Education Programme*) they could express themselves without having to read or write. Another important attribute seems to be the voluntary participation of students who can choose to be onlookers.

Table 15 below summarises the attributes of programmes seen as of particular benefit to students and indicates the programmes where these were identified as outcomes of the fieldwork.

**Table 15 Attributes of arts programmes considered to be of particular benefit to students**

Attribute of programme	<i>Arts @ Direk</i>	<i>Boys' Business</i>	<i>Indigenous Music Programme</i>	<i>SCRAYP</i>
A charismatic/ inspirational role model for students (in the case of Direk, also for teachers)	X	X	X	X
Positive reinforcement of students' achievements (ignoring negative behaviour unless it disrupts the work of the group)		X	X	X
Authentic activities – working towards public presentation		X	X	X
Familiar/ negotiated procedures	X	X	X	X
'Safe' environment for risk taking	X	X	X	X

### Transferability of attributes of arts programmes to the general curriculum

To what extent can the attributes of arts programmes that help to enhance students' learning be transferred to the curriculum in general? Of the programmes studied, the Direk drama mentoring seemed to provide a model where transfer of 'enabling' skills and attitudes and processes was occurring. This appears to have been because there was a 'whole school' approach and thus the drama mentoring programme was integrated into the school's process of change. Significantly, the professional development for teachers was provided by one of their peers, on site, so that they could seek assistance on the spot. It was a collaborative procedure even to the extent that students were aware that teachers were learning and taking risks. The mentor had an intimate knowledge of the school environment.

A lot of the transfer that was observed at Direk appears to have been the result of teachers taking up ideas that came from the drama mentoring. For example, encouraging their students to keep learning logs and setting aside class time for students to reflect on their learning. This would have been facilitated by the 'whole school' approach – observing what other teachers did, team-teaching and staff room discussion. Direk was experiencing what the deputy principal described as a 'watershed' – a period of innovation that centred on the arts and metacognition.

### To what extent are the attributes identified unique to arts programmes?

It is difficult to argue that particular features of programmes are unique to the arts, because 'the arts' encapsulates such a diverse range of activities. The following features that emerged from this study suggest that the arts can provide:

- learning opportunities for students who do not fit the conventional mould of institutional learning. In particular, they highlight strengths and intelligences that often do not receive a lot of emphasis in other curriculum areas. Weak literacy skills can provide a seemingly insurmountable barrier to learning (a 'cycle of failure' was mentioned). The arts provide opportunities for students to start to learn and enjoy learning without experiencing the initial discouragement of having to display weak reading and writing skills.
- particularly tangible experiences of working in a team.

- an object for reflection and constructive criticism. For example, after a performance students can consider: what went well? How could we have done it better?
- a ‘levelling’ effect – not only what is termed ‘inclusivity’, whereby students who have disabilities or who are socially ostracised for various reasons can be included, but in addition to this, the arts provide opportunities for students, parents and teachers to work together on an ‘equal’ level; one does not need to be fully grown or to ‘know’ a lot to participate in arts activities.
- particularly helpful ways of expressing and exploring emotions. They are thus dealing with what is central to everyone’s existence.

Finally, it should be noted that while the evaluation has not been able to provide much hard evidence that students’ academic or learning outcomes are enhanced by involvement in arts programmes there is consistent evidence across the four sites investigated that the programmes do encourage students to engage with school and with learning.

The nature of the arts programmes varied considerably as did the backgrounds of the students participating in them but the study has been able to articulate some of the ways that the arts programmes investigated enhanced students’ learning. This suggests that in addition to having intrinsic value, the arts can be an important medium for developing the ‘enabling’ metacognitive skills and attitudes that have been outlined. It could be argued that some of these might be attributes of other (non arts) school programmes, but the arts seem to provide an especially appropriate vehicle for enhancing learning

Overall there was a sense that these arts programmes were providing the participants with very valuable, positive learning experiences. It is exciting to see that the Yolngu people approve of the approach to learning in the *Indigenous Music Education Programme* and that the young participants see it as a way of bridging some cultural barriers. It was good to see in *Arts@Direk* that some young people with severe disabilities were gaining acceptance and some sense of achievement and that for others the intense concentration and hard work required was found to be rewarding.

This work is seen as a starting-point in exploring the impact of arts programmes on students’ learning and the attributes of arts programmes that are of particular benefit to students. There are various directions in which this research could be developed. The following areas for further research have emerged from this study:

- The arts as a vehicle for learning in Indigenous communities. To what extent can the arts provide a bridge between cultures of learning?
  - What are the necessary conditions for transferring the learning processes in the arts to other areas of the curriculum? (If the experience of *Arts@Direk* were taken as a model, which ingredients of the ‘whole school’ approach are essential for this transfer to occur?)
  - To what extent does involvement in the arts enhance students’ generic competencies/employability skills? In the present study there was an indication that students involved in arts programmes scored better in the generic competencies of problem solving, planning, communication and working with others, than students who were not involved in arts programmes. It would be useful to look at this phenomenon more intensively, using a larger sample and possibly assessing the more recently developed ‘employability skills’ (Australian Chamber of Commerce and Industry, 2002). The generic competencies assessed for this study happen to be included in the more recent ‘employability skills’.
  - Working from the attributes of arts programmes that enhance learning derived from the present study, it would be useful to consolidate the present research with a more longitudinal study. For example, take cohorts of students involved in arts programmes that
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can demonstrate positive role models, positive reinforcement of achievements, 'authentic' activities, negotiated procedures and safe environments for risk-taking, and track the progress of these students over, say, three years (longer if feasible), noting in particular school completion, post school study and employment pathways.

## REFERENCES

- Australian Broadcasting Commission. (2003). *George Negus Tonight*, discussion with Dr Bob Smith on the *Boys' Business* Music Programme, 15.10.2003 <http://www.abc.net.au/gnt/>
- Americans for the Arts. (1996). *Coming Up Taller*. Available: [http://www.cominguptaller.org/report\\_pp.html](http://www.cominguptaller.org/report_pp.html).
- Aprill, A. (2001). Toward a Finer Description of the Connection between Arts Education and Student Achievement. *Arts Education Policy Review*, 102(5).
- Arts Education Partnership (1999) Learning Partnerships - Improving Learning in Schools with Arts Partners in the Community. Washington DC, Arts Education Partnership
- Australian Chamber of Commerce and Industry (ACCI) and Business Council of Australia (BCA). (2002). *Employability Skills for the Future*. Canberra: Department of Education, Science and Training.
- Bahr, N. (1997). Relationships between musicianship and mathematical skill. In M. Goos & K. Moni & J. Knight (Eds.), *Scholars in context: prospects and transitions* (pp. 28-34). Mt Gravatt Qld: Post Pressed.
- Bamford, A. (2002). Making middle school cool. *EQ Australia* (3), 16-18.
- Barry, N., Taylor, J., & Walls, K. (1990). *The role of the fine and performing arts in high school dropout prevention*: Center for Music Research, Florida State University, Tallahassee, FL.
- Baum, S, Owen, S & Oreck, B (1997). Transferring Individual Self-Regulation Processes from Arts to Academics. *Arts Education Policy Review*, 98(4), 323-38.
- Bentley, D. & Shaw, N. (2002). *Arts in the Curriculum*. Video. Direk Schools.
- Bryce, J. & Withers, G. (2003). *Engaging secondary school students in lifelong learning*. Camberwell: Australian Council for Educational Research.
- Bumgarner Gee, C. (2001). The Perils and Parables of Research on Research. *Arts Education Policy Review*, 102(5).
- Burton, J., Horowitz, R., & Abeles, H. (1999). Learning In and Through the Arts: Curriculum Implications. In E. Fiske (Ed.), *Champions of Change: The Impact of the Arts on Learning. USA*. Washington DC: The Arts Partnership and the President's Committee on the Arts and Humanities (pp. 36-46).
- Butzlaff, R. (2000). Can music be used to teach reading? *Journal of Aesthetic Education*, 34 (3-4), 167-178.
- Catterall, J. S., Capleau, R., & Iwanaga, J. (1999). Involvement in the Arts and Human Development: General Involvement and Intensive Involvement in Music and Theater Arts. In E. Fiske (Ed.), *Champions of Change: The Impact of the Arts on Learning USA*. Washington DC: The Arts Partnership and the President's Committee on the Arts and Humanities (pp. 1-18).

- Catterall, J. S., & Waldorf, L. (1999). Chicago Arts Partnerships in Education: Summary Evaluation. In E. Fiske (Ed.), *Champions of Change: The Impact of the Arts on Learning USA.* Washington DC: The Arts Partnership and the President's Committee on the Arts and Humanities (pp. 48-62).
- Chadwick, G. (2002). *Partners in a learning culture*. Australian Indigenous Training Advisory Council Conference, Gold Coast, Queensland, 2002.
- Cheong-Clinch, C. (1999). *An investigation of relationships between music literacy and textual literacy in young children*. Unpublished Masters thesis, Southern Cross University, Lismore.
- Curriculum Corporation. (1994). *A statement on the arts for Australian schools: A joint project of the States, Territories and the Commonwealth of Australia initiated by the Australian Education Council*. Carlton: Curriculum Corporation.
- Deasy, R. E. (2002). *Critical Links: Learning in the Arts and Student Academic and Social Development: Arts Education Partnership*.
- Department of Education and Children's Services, Government of South Australia, *Learning to Learn* Programme. [www.learningtolearn.sa.edu.au](http://www.learningtolearn.sa.edu.au)
- Eisner, E. W. (1999). Does experience in the arts boost academic achievement? *Clearing House*, 72, 143-149.
- Fiske, E. (1999). *Champions of Change: The Impact of the Arts on Learning*. In E. Fiske (Ed.). Washington DC: The Arts Partnership and the President's Committee on the Arts and Humanities. Washington D.C.: Arts Education Partnership
- Fowler, C., & McMullan, B. (1991). *Understanding how the arts contribute to excellent education*. Washington DC: National Endowment for the Arts.
- Fullarton, S. (2002). Student Engagement with School: Individual and School Level Influences. Longitudinal Surveys of Australian Youth. (Research report 27). Camberwell: ACER.
- Gardner, H. (1984). *Frames of Mind: the Theory of Multiple Intelligences*. London :Fontana Press.
- Harland, J., Kinder, K., Lord, P., Stott, A., Schagen, I., & Haynes, J. (2000). *Arts Education in Secondary Schools: Effects and Effectiveness*. Slough: National Foundation for Educational Research.
- Heath, S. B., & Roach, A. (1999). Imaginative Actuality: Learning in the Arts during the Nonschool Hours. In E. Fiske (Ed.), *Champions of Change: The Impact of the Arts on Learning*. Washington D.C.:The Arts Partnership and the President's Committee on the Arts and Humanities.
- Hetland, L., & Winner, E. (2001). The Arts and Academic Achievement: What the Evidence Shows. Executive summary. *Arts Education Policy Review*, 102 (5).
- Horowitz, R., & Webb-Dempsey, J. (2001). Promising signs of positive effects: lessons from the multi-arts studies. In R. J. Deasy (Ed.), *Critical Links: Learning in the Arts and*

- 
- Student Academic and Social Development* (pp. 98-100). Washington DC: Arts Education Partnership.
- Kelman, D. (2002). *SCRAYP Youth Arts With An Edge Methodology and Guiding Principles* (unpublished)
- Kirsch, I., de Jong, J., Lafontaine, D., McQueen, J., Mendelovits, J., Monseur, C. (2003) *Reading for change: Achievement and Engagement Across Countries. Results from PISA 2000* Paris :OECD.
- Luftig, R. L. (1994). *The Schooled Mind: Do the Arts Make a Difference? Year 2: An Empirical Evaluation of the Hamilton Fairfield SPECTRA+ Programme*. Available: [www.fittoncenter.org/pdf/SchooledMind.PDF](http://www.fittoncenter.org/pdf/SchooledMind.PDF).
- McCurry, D. & Bryce, J. (1997). *The School Based Key Competencies Levels Assessment Project*. Final Report, April 1997. Camberwell: Australian Council for Educational Research.
- McCurry, D. Macaskill, G. & Bryce, J. (2003). *The Whole School Assessment Process and Software for the Assessment and Reporting of Key Competencies and Other Cross Curricular Competencies*. Overview and Installation Handbook, June 2003. Camberwell: Australian Council for Educational Research.
- McMahon, O. (1976). The relationship of music discrimination training to reading and associated auditory skills. Unpublished MEd(SpEd) empirical project report. Townsville: James Cook University.
- Marks, G. N., & Fleming, N. (1999). *Early School Leaving in Australia: Findings from the 1995 Year 9 LSAY Cohort* (LSAY research report 21). Camberwell: ACER.
- Murfee, E. (1996). *Eloquent evidence: Arts at the core of learning*. Washington DC: President's Committee on the Arts and the Humanities.
- National Advisory Committee on Creative and Cultural Education (NACCCE). (1999). *All Our Futures: Creativity, Culture and Education*. Sudbury UK: Department for Education and Employment.
- National Arts Education Consortium, Department of Art Education (2002). *Transforming Education Through the Arts Challenge*. Final report. Columbus, Ohio
- Oreck, B., Baum, S., & McCartney, H. (1999). Artistic Talent Development for Urban Youth: The Promise and the Challenge. In E. Fiske (Ed.), *Champions of Change: The Impact of the Arts on Learning. USA*. Washington DC: The Arts Partnership and the President's Committee on the Arts and Humanities. (pp. 64-78).
- Podlozny, A. (2000). Strengthening verbal skills through the use of classroom drama: a clear link. *Journal of Aesthetic Education*, **34** (3-4), 239-275.
- President's Committee on the Arts, & Humanities and Arts Education Partnership. (1999). *Gaining the Arts advantage: Lessons from the school districts that value arts education*, [web page]. Available: [www.PCAH.gov](http://www.PCAH.gov).
-

- Rauscher, F., Shaw, G., Levine, L., Wright, E., W, D., & Newcomb, R. (1997). Music training causes long-term enhancement of preschool children's spatial-temporal reasoning. *Neurological Research*, 19(2-8).
- Rothman, S. & McMillan, J. (2003). Influences on Achievement in Literacy and Numeracy, *Longitudinal Surveys of Australian Youth, Research Report 36*. Camberwell: Australian Council for Educational Research.
- Schaffner, M., Little, G., & Felton, H. (1984). *NADIE papers No. 1, Drama, Language research project no. 1. Reports of the Drama and Language Research Project*. Hobart: Speech and Drama Centre, Tasmania Department of Education.
- Schmitz, N. B., Mazzulla, D., & Hyatt, J. (2000). Young Talent case study: An analysis of the effect of arts in education programming on the motivation, academic performance and personal development of inner city youth involved in the Young Talent programme. In N. Brooks Schmitz, L. Overby & J. H. Humphrey (Eds.), *Dance: Current selected research IV*.
- Seidel, S. (1999). 'Stand and Unfold Yourself': A Monograph on the Shakespeare & Company Research Study. In E. Fiske (Ed.), *Champions of Change: The Impact of the Arts on Learning*. Washington DC: The Arts Partnership and the President's Committee on the Arts and Humanities. (pp. 80-90).
- Smith, R. (2001). *Boys' Business: Ongoing Project Involving Middle Years' Boys Engagement with Music – Darwin & Top End Schools*. Discussion paper.  
[Http://www.octa4.net.au/bobsmith/boysbus.htm](http://www.octa4.net.au/bobsmith/boysbus.htm)
- Smith, R. (2003). Boys are okay. *EQ Australia*, Winter, 2003
- Spencer Foundation Practitioner Research Communication and Mentoring Programme (2002). *Research Reports Prepared by the Staff of Direk Schools 2001 -- 2002*. Direk Schools and University of South Australia
- Stokes, H. (2002). Engaging Young People in School Through the Arts: Evaluation of SCRAYP Youth Arts with an Edge. Report completed for Maribyrnong City Council and Crime Prevention Victoria. University of Melbourne, December 2002.
- Vaughn, K. (2000). Music and mathematics: modest support for the oft-claimed relationship. *Journal of Aesthetic Education*, 34(3-4), 149-166.
- Vaughn, K., & Winner, E. (2000). SAT scores of students who study the arts: what we can and cannot conclude about the association. *Journal of Aesthetic Education*, 34(3-4), 77-89.
- Winner, E., & Cooper, M. (2000). Mute those claims: no evidence (yet) for a causal link between arts study and academic achievement. *Journal of Aesthetic Education*, 34(3-4), 11-75.
- Wolf, P. (1999). Why the Arts Matter in Education or Just What Do Children Learn When They Create an Opera. In E. Fiske (Ed.), *Champions of Change: The Impact of the Arts on Learning*. Washington DC: The Arts Partnership and the President's Committee on the Arts and Humanities. (pp. 92-98).



Zagorskis, L. & Capper, C. (nd). *Arts and Education in the Northern Territory*. Presentation prepared for the Northern Territory Department of Employment, Education and Training and the Department of Community Development. Sport and Cultural Affairs.

## APPENDIX I: SUMMARY OF STUDIES ON NON-ARTS OUTCOMES OF ARTS PROGRAMMES

Author / year	Domain	Level	Nature of study	Results
Bahr 1997	Music	1. Graduates 2. Secondary	Australian. 1. 61 subjects rate musicianship and maths skill. 2. 85 students compared on musicianship and maths tasks	1. Significant positive relationship between musicianship and maths skill 2. Significant positive relationship between musicianship and maths skill.
Barry et al. 1990	Arts	Secondary	Effect of arts on dropout prevention. Qualitative. Questionnaires and observation. Some sampling problems.	At-risk students indicated that they stayed because of arts. Observations showed at-risk students on task more often in arts classes.
BrooksSchmitz et al. 2000	Dance	Primary	3 yr evaluation of YoungTalent dance programme. Qualitative.	Increased competencies and improved attitudes.
Burton et al. 1999	Arts	Middle school	Over 2000 Effects of arts-rich in-school programmes on enabling skills.	Increased creativity, fluency, originality, elaboration, resistance to closure.
Butzlaff 2000	Music	Various	REAP meta-analysis of 30 studies of music study and reading	Strong correlation found between study of music and academic achievement. Causal link investigated but not found.
Catterall & Waldorf 1999	Arts: music & dance	Primary, secondary	Evaluation of neighbourhood-based arts programme.	Strong and significant relationship found between reading and mathematics, especially by 6 <sup>th</sup> grade. Results for high school not significant because of the small number of cases.
Catterall et al. 1999	Music, drama	Secondary	Longitudinal. Analysis of 25000 students from NELS database. Performance and attitudes.	High-arts students outperform others on almost every measure of growth form Years 8-10 and 10-12. High correlation for maths and reading, and significant association of instrumental music in middle and high school, with Year 12 maths.
Harland et al. 2000	Arts	Secondary	School-level case studies, surveys and analysis of national test data. Longitudinal and large-scale.	No relationship between arts and English, maths, science or average scores on non-arts subjects.
Heath & Roach 1999	Arts	Secondary?	Qualitative study of after-school programmes for disadvantaged youth.	All 4 measures of self-esteem higher for non-arts group. Opportunities to use language for a wider range of purposes.
Hetland 2000	Music	Various	Meta-analysis of 15 studies of relationship between instrumental or vocal music and spatial skills. One of the REAP studies.	Dramatic improvement in spatial-temporal reasoning after 2 or more years of participation. Individual lessons had more effect on spatial-temporal reasoning than group lessons. Effect increased if musical notation included in programme. Small but not significant relationship with general intelligence. Causal relationship between active music learning and spatial reasoning.
Hetland & Winner 2001	Arts Dance Drama Music	Various	Synthesis of 188 reports, looking for causal links between arts courses and non-arts outcomes such as spatial-temporal reasoning, verbal skills, mathematics, reading. This is the summary of the REAP studies, some of which appear separately in this table.	Reliable causal links found for listening to music and spatial-temporal reasoning (temporary effect); learning to play music and spatial-temporal reasoning (a large causal relationship); classroom drama (enactment) and a variety of verbal skills 'Equivocal support', ie reliable causal links based on very few studies. Learning to play music and mathematics; dance and nonverbal reasoning. No reliable/generalisable causal links found for arts-rich education and

				combined verbal and maths scores; arts-rich education and creative thinking; learning to play music and reading; visual arts and reading; dance and reading
Luftig 1994	Arts	Primary	Evaluation of SPECTRA+. 615 students Yr 1, 320 Yr 2. Schools compared for achievement, self-esteem, locus of control, creative thinking.	Very complex results in two phases and over several groups. No convincing effects shown.
National Arts Education Consortium 2002	Arts	Mostly primary	Evaluation of Transforming Education Through the Arts Challenge project. 35 schools across the USA. Standardised testing of academic subjects.	No evidence of transfer or improved attendance, but strong teacher opinion that the project had improved students' enabling skills (eg fluency of writing, ability to make connections) and motivation.
Oreck et al. 1999	Arts: music & drama	Secondary and follow-up	Longitudinal 2-yr case studies of Young Talent programme. Large % at-risk or low SES. Interviews, observations, test data, exam records & awards.	Increased competencies reported
Podlozny 2000	Drama	Various	Metaanalysis of 80 studies of classroom drama and verbal skills	Reading achievement. 1st-11th grade. Moderate relationship between drama instruction. Reading readiness. young children. moderate effect Drama instruction and oral language development. Pre-K - 7th grade. Small effect size. Larger effect for studies with older participants tended to have larger effect sizes'. Vocabulary. No reliable relationship. Writing. Moderate relationship. More effective with younger children.
Schaffner et al. 1984	Drama	Upper primary	Australian. 11 classes selected on basis of teacher interest. Compares language use in drama (improvisation) and other classes.	Increased opportunities to use language for a variety of purposes, especially expressive
Vaughn 2000	Music	Various	Metaanalysis of 25 studies of music study and mathematics (REAP study)	Equivocal results
Vaughn & Winner 2000	Arts	Secondary	Study of relationship between study of arts at school and Scholastic Aptitude Test results. (REAP study).	Higher maths, verbal and composite SAT scores for students with arts subjects. Strongest effect sizes for math scores for students with four or more years of arts classes. Effect sizes for math scores are consistently smaller than those for verbal scores. Acting classes had the strongest correlation with verbal SAT scores. Acting classes and music history, theory or appreciation had the strongest relationship with math SAT scores. All classification of arts classes were found to have significant relationships with both verbal and math scores.
Winner & Cooper 2000	Arts	Various	Three meta-analyses on 3 types of correlational studies. 1-5 studies considering composite maths or verbal scores. 2- verbal skills. 3-math. Two meta-analyses on experimental studies. 1-math, 2-verbal. (REAP study)	All 3 metaanalyses of correlational studies found significant associations. Meta-analyses of experimental studies yielded no verbal link.

## APPENDIX II

### GENERIC COMPETENCIES ASSESSMENT EXERCISE

#### Australian Council for Educational Research Evaluation of School-Based Arts Programmes

#### *Explanation to teachers*

#### **Why?**

As a part of the evaluation of the arts programme in your school we ask you to assess specified students' generic competencies. These are cross-curricular skills that are learned to some extent in all school subjects and in students' life outside school. The assessment uses teachers' global impression judgement of students' skills in these areas. This is based on the assumption that teachers, as professionals, know a lot about their students and observe students' competencies during their day-to-day work.

#### **What is involved?**

Each participating teacher will be given a list of students to assess. Some students will be involved in the arts programme, some will not be involved in it. It is essential that each student is assessed by a minimum of three teachers. The completed assessment forms are to be sent to the Australian Council for Educational Research (ACER) where they will undergo analysis using a software package that generates a report for each student similar to the example below:

Competencies	Not Yet Adequate		Adequate		Better than Adequate, but not Excellent		Excellent/ Outstanding	
	1	2	3	4	5	6	7	8
<b>Communicating ideas and information</b>								
<b>Level mean</b>				■				
<b>Planning &amp; organising</b>								
<b>Level mean</b>					■			
<b>Solving problems</b>								
<b>Level mean</b>				■				
<b>Working with others and in teams</b>								
<b>Level mean</b>					■			



Student's level of achievement



Mean, or average score of the Year level assessed

In the example above, there is firm agreement that the student is 'Better than Adequate but not Excellent' for 'Communicating ideas and information' and at 'Better than Adequate but not Excellent' for 'Planning and Organising'. The student is exceptionally good ('Excellent') at 'Working with others', where the score is well above the mean for the rest of the year level.

**What will be assessed?**

We would like you to assess students' performance on four of the Mayer Key Competencies. As noted above, these are generic cross-curricular skills that students learn through various school subjects and activities outside of formal school work. Some students have strengths in particular aspects, or facets of the competencies. The competencies to be assessed are described below, together with 'facet descriptors' –different aspects of a competency. These facet descriptors are not hierarchical (one is no 'better' than another) but we would like you to indicate which facet is strongest for each student you assess.

The competencies outlined below are seen as a mixture of the knowledge, skills and attitudes that young people will need to participate effectively at school and in work beyond school.

**Communicating ideas and information in speech and writing**

The capacity to communicate with others through speech and/or writing.

Facets:

- shows empathy to audience or focus of communication, adapting ideas and information as necessary;
- shows clarity and coherence when communicating;
- communicates accurately with attention to detail.

**Solving problems**

The capacity and the attitude needed to apply problem-solving strategies in purposeful ways, both in situations where the problem and desired solution are clearly evident and in situations requiring critical thinking and a creative approach to achieve an outcome.

Facets:

- shows focus and persistence;
- shows independence and responsibility;
- shows initiative and creativity.

**Planning and organising**

The capacity and the attitude needed to plan and organise one's own work activities, including making good use of time and resources, sorting out priorities and monitoring one's own performance.

Facets:

- identifies goals, priorities and strategies;
- can implement plans and strategies;
- seeks planning and organisational challenges and experiences.

**Working with others and in teams**

The capacity and the attitude needed to interact effectively with other people both on a one-to-one basis and in groups, including working effectively as a member of a team to achieve a shared goal.

Facets:

- is adaptable and flexible, in keeping with the purpose of the group;
- leads or facilitates group processes;
- assists and supports others.

**How to assess?**

Teachers are asked to assess each student (using the form provided) using the following eight-point scale from 'Not Yet Adequate' to 'Excellent/ Outstanding'.

<b>Not Yet Adequate</b>	1
(almost – but not quite -- Adequate)	2
<b>Adequate Achievement</b>	3
	4
<b>Better than Adequate, but not Excellent</b>	5
(almost – but not quite – Excellent)	6
<b>Excellent</b>	7
<b>Outstanding</b>	8

Teachers are encouraged to make their judgements by thinking of how some students stand out, either because they succeed or do not meet usual and reasonable expectations for students at the year level. Students who do not meet basic expectations are judged to be less than Adequate, and those who clearly distinguish themselves as high level performers are Excellent or Outstanding. Most students will probably fall in the 'Adequate' or 'Better than Adequate . .' levels on a particular competency because they meet basic expectations but are not clearly distinguished.

For example:

- If a teacher is tempted to think a student is particularly strong or particularly weak in a Key Competency they are faced with a decision between 'Excellent/ Outstanding' and 'Better than Adequate . .' in the first example and 'Not Yet Adequate' and 'Adequate' in the second example.
- If a student is not clearly distinguished then the teacher is deciding between 'Adequate' and 'Better than Adequate, but not Excellent'
- In deciding between 'Adequate' and 'Better than Adequate, but not Excellent', teachers are looking for signs of strength that raise students above the basic expectation.

Please make these judgements on the basis of your expectations of a student at the particular year level being assessed (for example, Grade 5). Please use the attached forms.

If you have any queries at all about this process please contact Jennifer Bryce at ACER: phone 03 9277 5564, fax 03 9277 5500, email: [bryce@acer.edu.au](mailto:bryce@acer.edu.au)

An arrangement will be made for forms to be returned to ACER by a specified date.

**Thank you very much indeed for your assistance.**

**APPENDIX III**  
**BROAD QUESTIONS FOR STAFF INTERVIEWS**  
**AT DIREK: 19.03.03**

Give outline of research programme and answer queries.

In general, what are the main factors that deter student learning in this school?

What are the particular strengths of students in this school? How are these strengths maximised?

What have been some of the most successful ways of engaging students in learning? [Special interest in this school in metacognition? Ways you help to develop students' metacognitive skills?]

Are there ways that involvement in the arts has helped students in their learning? If so, what are some of the particular attributes of arts programmes (in the school) that are helpful?

Are there some examples you can recall where particular students have been helped by involvement with the arts? These can be anonymous – but can you outline what happened?

Re the drama mentoring programme:

- Was there support from the principal/ senior administration? Could the programme have run without this?
- Did Drama mentoring having an impact (a) on students in the arts programme? (b) on other students? What evidence do you have of this?
- What are the particular attributes of Drama mentoring that seem to promote this impact?
- Do you deliberately make links between Drama mentoring and your work in the classroom? If so, what do you do?
- To what extent was there recognition of teachers' accomplishments?
- In what ways were there opportunities for students to have individualised instruction? Was this important?
- To what extent was it OK to take risks – was risk taking supported by the learning environment?
- Particular innovative teaching techniques?
- The main things students gained from the programme?
- The main things teachers gained from the programme?

Other questions?

Thank you very much.

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## APPENDIX IV

### **FRAMEWORK OF QUESTIONS FOR INTERVIEWS AND FOCUS GROUP DISCUSSIONS IN THE NORTHERN TERRITORY: *BOYS' BUSINESS AND INDIGENOUS MUSIC EDUCATION PROGRAMME***

#### Interviews with teachers

- factors affecting student learning (including student health, peer pressure, family mobility, family dysfunction, students' self confidence)
- factors affecting school attendance -- What are the main factors that deter students from attending school?
- What do these teachers (both Music and non music) see as the main strengths of the music programme? Any weaknesses?
- What have been some of the most successful ways of engaging students in learning?
- What are particular attributes of the Music programme that help to engage students in learning?
- What are the particular strengths and weaknesses of these students? How are the strengths maximised?
- it may be possible to gather some anonymous examples of the effect participation in the music programme has had on certain students

#### Focus group discussions with students

- What do they like most about the Music programme?
- What is the best thing they have done (in Music)?
- What do they learn from the Music programme?
- Does the Music programme encourage them to attend school?
- Are there some non-Music skills they have learnt from the Music programme? What are these skills?



## APPENDIX V

### Outcomes for Boys' Business Music Programme

The intended general outcomes for Boys' Business include:

- Provision of positive affirming role models through skilled practitioners in music making activities;
- Affirmation as males in a masculine context;
- Increased willingness to participate in other gender-mixed music-making activities across schools;
- Increased motivation to participate in school generally indicated by improved attendance, engagement and learning outcomes across the curriculum;
- Provision of opportunities for increased pride in their own performance as social, cultural and educated beings, and their self-esteem;
- Allowed opportunities for engagement with valid learning settings unhindered by 'gateways' to learning such as 'reading' and 'writing';
- Given opportunities for short and long term success in rehearsal and performance;
- Increased collaboration and cohesiveness within group activities, encouraging teamwork and cooperation in other areas of the school, both curricular and social;
- Increased self-esteem through awareness that participants' input is valued by their peers, other students, staff and ultimately the community;
- Increased appreciation of the rewards of tasks well completed and presented;
- Affirmed rewarded self-management behaviour;
- Increased musicality in skills such as vocal timbre, rhythm maintenance, expressiveness, confidence in performance, self-discipline in rehearsal;
- Recognition that effort in music making and rehearsals leads to public acclaim and status; and
- Recognition of and preparedness to abide by the need for operating rules where the function of a group as a cohesive unit is essential.

### Outcomes for Boys' Business related to the Northern Territory Curriculum Frameworks Essential Learnings and Music Strands

In Essential Learnings the programme will enhance boys as:

- Inner learners – supporting them as self-directed and reflective thinkers;
- Collaborative learners – supporting their development as effective communicators and group members;
- Constructive learners – in encouraging the boys to be thoughtful producers and contributors; and
- Creative learners – developing the boys as persevering and resourceful innovators.

In Music Strands the programme will enhance boys in their engagement with

- Creating Music – by providing ongoing opportunities to explore ways of using music to communicate ideas and feelings;
- Music Skills and Processes – by providing ongoing opportunities for discovering and applying the skills, techniques, processes, conventions and technologies of music;
- Music Responses and Analysis – by providing ongoing opportunities for using knowledge, skills and aesthetic understanding to respond to, reflect on and evaluate music; and
- Music in Context – by providing ongoing opportunities in repertoire, for developing an understanding of the diverse social, cultural and historical settings of music works.

## **APPENDIX VI**

### **SCRAYP CRITERIA 2003**

The *SCRAYP* Management Team has developed a qualitative criteria to guide the selection of schools. This includes:

- Being located in the Western Metropolitan Region of Melbourne;
  - Working in a partnership with *SCRAYP* to include an intensive planning period and a 20 week project period;
  - Where possible, to work with students from previous years;
  - Developing an active and participatory partnership between artists and teachers;
  - Encouraging changed learning experiences for students;
  - Supporting cultural diversity in artistic content and representation;
  - A willingness to participate in the evaluation process;
  - A willingness to supplement *SCRAYP* projects through the allocation of in-kind support, staff and time and/or financial contributions.
-

## APPENDIX VII

### SCRAYP ARTS EVALUATION STUDY STUDENT QUESTIONNAIRE

In this booklet you will find questions about:

- you and your family;
- your experience of your school;
- what you plan to do in the future; and
- your ideas about *SCRAYP*.

Please read each question carefully and answer as accurately as you can.

You will normally answer by ticking a box. For a few questions you will need to write in a short answer.

If you make a mistake when ticking a box, cross out your error and mark the correct box. If you make an error when writing in an answer, simply cross it out and write the correct answer next to it.

In this questionnaire, there are no 'right' or 'wrong' answers. Your answers should be the ones that are 'right' for you.

Please ask for help if you do not understand something or are not sure how to answer a question.

**Q 1 On what date were you born?**

*(Please write in the day (date), month and year you were born.)*

\_\_\_\_\_ 19 \_\_\_\_  
*Day Month Year*

**Q 2 What year level are you in?** Year \_\_\_\_\_

**Q 3 Are you female or male?** Female <sub>1</sub> Male <sub>2</sub>

**Q 4 Are you of Aboriginal or Torres Strait Islander origin?**

*(If both, please tick both 'Yes' boxes.)*

- a) No ..... <sub>1</sub>  
 b) Yes, Aboriginal ..... <sub>1</sub>  
 c) Yes, Torres Strait Islander ..... <sub>1</sub>

Some of the following questions are about your mother and father (or those person(s) who are like a mother or father to you — for example, guardians, step-parents, foster parents, etc.).

If you share your time with more than one set of parents or guardians, please answer the following questions for those parents/step-parents/guardians you spend the most time with.

**Q 5 What is your mother's main job? (e.g., School teacher, nurse, cleaner)**

*If she is not working now, please tell us her last main job.*

*Please write in the job title.* \_\_\_\_\_

*(If she has **never** worked, tick here  and go to **Question 7**.)*

**Q 6 What does your mother do in her main job? (e.g., Teaches high school students, cares for patients, cleans offices after hours)**

*If she is not working now, please tell us her last main job. Please use a sentence to describe the kind of work she does or did in that job.*

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**Q 7 What is your father's main job? (e.g., School teacher, carpenter, factory worker)**

*If he is not working now, please tell us his last main job.*

*Please write in the job title. \_\_\_\_\_*

*(If he has **never** worked, tick here  and go to **Question 9**.)*

**Q 8 What does your father do in his main job? (e.g., Teaches high school students, builds houses, works on an assembly line at a car factory)**

*If he is not working now, please tell us his last main job. Please use a sentence to describe the kind of work he does or did in that job.*

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**Q 9 Did your mother complete secondary school (Year 12)?**

*(Please tick only one box.)*

No, she did not go to school. .... <sub>1</sub>

No, she completed primary school only. .... <sub>2</sub>

No, she completed some secondary school, but not more than Year 10 <sub>3</sub>

No, she completed Year 10 or Year 11 and then did some training courses (e.g. business studies, apprenticeship, nursing)..... <sub>4</sub>

Yes, she completed Year 12 ..... <sub>5</sub>

**Q 10 Did your father complete secondary school (Year 12)?***(Please tick only one box.)*No, he did not go to school..... <sub>1</sub>No, he completed primary school only..... <sub>2</sub>No, he completed some secondary school, but not more than Year 10.  
<sub>3</sub>No, he completed Year 10 or Year 11 and then did some training  
courses (e.g. business studies, apprenticeship, nursing). ..... <sub>4</sub>Yes, he completed Year 12..... <sub>5</sub>**Q 11 Did your mother complete a university degree?***(Please tick only one box.)*

Yes                      No

<sub>1</sub>                      <sub>2</sub>**Q 12 Did your father complete a university degree?***(Please tick only one box.)*

Yes                      No

<sub>1</sub>                      <sub>2</sub>

**Q 13 Do you speak a language other than English at home most of the time?**

*(Please tick only one box. If you speak more than one language, indicate the one you speak most often.)*

- No, English only ..... <sub>01</sub> ⇒ *Go to Q 15*
- Yes, an Indigenous Australian language ... <sub>02</sub>
- Yes, Italian ..... <sub>03</sub>
- Yes, Greek ..... <sub>04</sub>
- Yes, Cantonese..... <sub>05</sub>
- Yes, Mandarin..... <sub>06</sub>
- Yes, Arabic ..... <sub>07</sub>
- Yes, Vietnamese ..... <sub>08</sub>
- Yes, German ..... <sub>09</sub>
- Yes, Spanish..... <sub>10</sub>
- Yes, Tagalog (Filipino)..... <sub>11</sub>
- Yes, Other (*please specify*) .....

**Q 14 How well do you speak English?**

*(Please tick only one box.)*

- Not at all ..... <sub>1</sub>
- Not well ..... <sub>2</sub>
- Well ..... <sub>3</sub>
- Very well ..... <sub>4</sub>



**Q 15 My school is a place where:***(Please tick only one box on each row.)*

	Strongly disagree	Disagree	Agree	Strongly agree
a) I feel left out of things. . . . .	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
b) I make friends easily. . . . .	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
c) I feel like I belong. . . . .	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
d) I feel awkward and out of place. . . . .	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
e) other students seem to like me. . . . .	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
f) I feel lonely. . . . .	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
g) I do not want to go. . . . .	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
h) I often feel bored. . . . .	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>

**Q 16 Each day, about how much time do you usually spend reading for enjoyment?***(Please tick only one box.)*

I do not read for enjoyment. . . . .	<input type="checkbox"/> <sub>1</sub>
Half an hour or less each day. . . . .	<input type="checkbox"/> <sub>2</sub>
More than half an hour but not as much as an hour each day	<input type="checkbox"/> <sub>3</sub>
1 to 2 hours each day . . . . .	<input type="checkbox"/> <sub>4</sub>
More than 2 hours each day. . . . .	<input type="checkbox"/> <sub>5</sub>

**Q 17 How much do you disagree or agree with these statements about reading?***(Please tick only one box on each row.)*

Strongly				Strongly
	disagree	Disagree	Agree	agree
a) I read only if I have to. ....	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
b) Reading is one of my favourite hobbies. ....	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
c) I like talking about books with other people.	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
d) I find it hard to finish books. ....	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
e) I feel happy if I receive a book as a present.	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
f) For me, reading is a waste of time. ....	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
g) I enjoy going to a bookshop or a library. ....	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
h) I read only to get information that I need. ...	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>
i) I cannot sit still and read for more than a few minutes. ....	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>

**Q 18 How often do you read these materials because you want to?***(Please tick only one box on each row.)*

	Never or hardly ever	A few times a year	About once a month	Several times a month	Several times a week
a) Magazines .....	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>	<input type="checkbox"/> <sub>5</sub>
b) Comic books .....	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>	<input type="checkbox"/> <sub>5</sub>
c) Fiction (novels, narratives, stories).....	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>	<input type="checkbox"/> <sub>5</sub>
d) Non-fiction books .....	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>	<input type="checkbox"/> <sub>5</sub>
e) Emails and Web pages.....	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>	<input type="checkbox"/> <sub>5</sub>
f) Newspapers.....	<input type="checkbox"/> <sub>1</sub>	<input type="checkbox"/> <sub>2</sub>	<input type="checkbox"/> <sub>3</sub>	<input type="checkbox"/> <sub>4</sub>	<input type="checkbox"/> <sub>5</sub>

**Q 19 How often do you borrow books to read for pleasure from a public or school library?**

*(Please tick only one box.)*

- Never or hardly ever ..... <sub>1</sub>  
A few times per year ..... <sub>2</sub>  
About once a month ..... <sub>3</sub>  
Several times a month ..... <sub>4</sub>

**Q 20 What is the highest level of education you plan to have?**

*(Please tick only one box)*

- a) I don't plan to get any more education after I leave school. <sub>1</sub>  
b) Finish an apprenticeship ..... <sub>2</sub>  
c) Finish a TAFE certificate or diploma ..... <sub>3</sub>  
d) Finish a 3- or 4-year university degree ..... <sub>4</sub>  
e) Finish a 5- or 6-year degree (e.g., architecture, dentistry, law, medicine, veterinary science) ..... <sub>5</sub>  
f) Finish a Masters or a PhD degree ..... <sub>6</sub>

**Q 21 What kind of job do you expect to have when you are about 30 years old?**

*Write the name of the job:*

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The last two questions ask for your opinions and ideas about the *SCRAYP* programme

**Q 22 Do you think that *SCRAYP* is a good programme to have at your school?  
Why or why not?**

**Q 23 What have you personally got out of *SCRAYP* this year?**

**Thank you completing this questionnaire.**