ORIGINAL ARTICLE



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"Building strength in coming together": A mixed methods study using the arts to explore smoking with staff working in Indigenous tobacco control

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Abstract

Issue addressed: Tobacco is a major risk factor contributing to Indigenous health disparities. Art may be a powerful and transformative tool to enable health providers to develop targeted messages for tobacco control.

Methods: Indigenous and non-Indigenous staff, working in Indigenous tobacco control, attended a 2-hour workshop, and were led through a process to create individual artworks. Participants completed surveys before and after the workshop. Scales compared understandings of how art can be used in tobacco control, and the likelihood of utilising arts in future programs. Three pairs of Indigenous and non-Indigenous researchers analysed the artworks, using the Four Frames (New South Wales Board of Studies), explored themes, and developed a model.

Results: Nineteen participants completed both surveys; 17 artworks were analysed. Pre- to post-workshop increases in "understanding" about the use of arts (P < 0.00001) for tobacco control, and "likelihood" of use of arts in the next 6 months (P < 0.006) were significant. Participants expressed personal and professional benefits from the workshop. Artworks demonstrated themes of optimism, the strength of family and culture, smoking as a barrier, resilience, recovery and urgency.

Conclusions: The workshop increased the understanding and likelihood of using the arts for tobacco control. Artworks revealed contemporary challenges impacting on equity; health staff expressed optimism for being engaged in their work.

So what? The Framework Convention for Tobacco Control supports novel techniques to increase the reach and relevance of health messages for diverse populations. This study successfully demonstrated how a novel, positively framed artbased technique proved to be advantageous for health professionals, working in an area of Indigenous tobacco control, where behavioural change can be complex.

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KEYWORDS

arts-based research, health education, Indigenous populations, tobacco control, tobacco smoking

1 | INTRODUCTION

A large body of evidence, both in community arts and in arts therapies, demonstrates the links between arts activities and improved physical and mental wellbeing, and improved social cohesion and inclusion. A health–arts framework has been found to be of value to researchers to build an evidence base: for health professionals interested in understanding the health–arts relationship. It is especially useful for those who use health promotion, in teaching health professionals, and for artists and health professionals in the development of policy and programs. ^{2–5}

Indigenous participation in arts activities is relatively high, and was reported as 31% by Arts Victoria, Australia.⁶ Participation in arts activities can be a protective factor against substance abuse and self-harm for Indigenous peoples.⁶ Art can be transformative, and can be important for empowerment, self-expression and building social, cognitive and emotional skills.⁶ Art-based programs can also attract participants to other health services.⁶ An art-health program was reported to induce a deep sense of healing in a remote Indigenous community.⁷ Indigenous communities and organisations commonly use the arts for health promotion and knowledge translation.^{8,9} A national survey of Australian organisations however found there are often cultural challenges in accessing suitable artworks, finding suitable role models to promote messages, and addressing the diversity of Indigenous target groups for tobacco control messages. 9,10 In a high school setting, art-based techniques have been successfully used to help Indigenous youth understand, and express, the impact that tobacco smoking has on their family and community.¹¹ Concerns about the threat of smoking on their family and future was a theme selected by the majority.11

Tobacco is the main preventable risk factor contributing to the burden of noncommunicable diseases in Indigenous peoples. Prevalence in these populations is higher than in the general population: for example in Indigenous Australians, smoking rates are 43% compared to 13% in the general population, and similarly in New Zealand Maori people (39%),¹² American Indians and Alaska Native peoples (40.1%)¹³ and Canadian First Nations people living off reserve, Inuit and Metis (30%-39%).¹⁴

Indigenous peoples generally prefer culturally targeted tobacco control messages. Although it is likely that the arts and media are being used to deliver tobacco control and smoking cessation messages to Indigenous Australians, few studies that incorporate arts and media messages have reported details on how these have been developed, or evaluated outcomes. 11,16-22

The World Health Organization's Framework Convention for Tobacco Control (FCTC) is an international treaty developed in response to the globalisation of the tobacco epidemic, which expressed in its preamble, a deep concern "about the high levels of smoking and other forms of tobacco consumption by Indigenous peoples".²³ In article 12d, the FCTC recommended "effective and appropriate training or sensitisation and awareness programs on tobacco control addressed to persons such as health workers, community workers, social workers, media professionals, educators, decision-makers, administrators and other concerned persons."²⁴ Novel approaches are recommended to be integrated into training programs to suit the needs of the target groups.²⁵

The overall aim of this study was to introduce health professionals, who work with Indigenous communities, to the idea of using arts within their tobacco control work although a short (2-hour) experiential workshop. Specific aims included: (i) to analyse pre to post measures of knowledge and attitudes related to the use of arts in their routine practices and (ii) to qualitatively explore artworks produced during a preconference workshop of staff working in areas related to Indigenous smoking. It was recognised that a 2-hour workshop would not give a complete training, but only an introduction to the topic.

2 | METHODS

This was a mixed methods study to evaluate a 2-hour experiential arts workshop to explore tobacco smoking.

2.1 | Recruitment

Participants who registered for a pre-conference day on Indigenous smoking, at the Oceania Tobacco Control Conference in 2015, were invited to partake in a pre- and post-survey to evaluate a 2-hour afternoon workshop. The invitation was emailed to all registrants of the Indigenous pre-conference day. An information statement about the study was sent as an attachment to the email, and also available on the day, in paper form. The information statement was also included at the start of the pre- and post-surveys.

Informed consent for the on-line survey was obtained electronically, or completed at the commencement of the workshop on paper. Additional options for consent for the artworks themselves included: allowing their artwork to be analysed; allowing the artwork to be published; being named as the creator of the artwork, or remaining anonymous. The participant could write a microstory to explain their artwork and choose whether this would be analysed and/or published.

Participants were told they could withdraw at any time from the study without consequences, prior to the data being de-identified and analysed. Names were taken only to match the pre-test with the post-test survey, and then data was de-identified. Anyone not wishing to participate in the research could attend the workshop without prejudice.

Ethics approvals were from Western Australia Aboriginal Health Ethics Committee (reference 666) and the University of Newcastle Human Research Ethics Committee (reference H-2015-0386).

2.2 Measures

The measures for the study comprised a pretest survey, a post-test survey, and the artworks themselves, several open-ended questions and an optional microstory about the artwork. Table 1 details the survey auestions.

The artworks were a unit of analysis, provided permissions were given.

Procedures 2.3

An on-line link to the pre-test survey was provided in the invitation email and could be completed until the workshop commenced, or on paper at the workshop. Participants could complete the post-test immediately after the workshop, or up until 2 weeks later. At the end of the workshop participants could have their artwork photographed by an assistant.

TABLE 1 Pre and post-test survey questions

Pre-test: A 13-item on-line or paper survey (5 minutes).

Demographic data: Name, gender, age, country (Australia, New Zealand, Pacific Islands, Asia), geographic location (urban, rural, remote), ethnicity (open text response), work role (Indigenous Health Worker, Administrative, Academic or Researcher, Other Health Professional, Other, please specify), organisation type (Health Service, Non-Government Organisation, University/Tertiary Institute Government Organisation, Research Organisation, Other, please specify), organisation orientation (mainly for Indigenous people, for the general population), smoking status - do you smoke tobacco? (Yes, current smoker, No, ex-smoker, No, never smoked), and Likert scales to measure attitudes and practices about the use of arts for health.

Questions about the arts:

How much do you currently use the arts in your work? Likert 4 point (none, a little, some, a lot), followed by two blocks of questions.

Block A: "Understanding" use of the arts scale. Likert 5-points (strongly disagree, disagree, neither, agree, strongly agree). A 6-item scale comprising:

- a) I am interested in using the arts as part of my work with tobacco
- b) I am confident in using the arts as part of my work with tobacco
- c) I understand how to use the arts to support behaviour change
- d) I am motivated to use the arts as part of my work with tobacco
- e) Arts for health is important for my community
- f) The arts are a way of gaining insight into health and illness

Block B: "Likelihood" of use of the arts scale. Likert 5-point (very unlikely, unlikely, undecided, likely, very likely) A 4-item scale. Please rate how likely you are to use the arts:

- a) In your work over the next 6 months
- b) To disseminate information about tobacco smoking
- c) To explore community responses to issues about smoking
- d) To develop new understandings about tobacco use

Post-test: A 22-item on-line or paper survey (10 minutes) collected the demographic information, used the above scales, an evaluation of the workshop with open-ended questions about insights gained, and a 5-item satisfaction scale.

Open-ended questions. Participants could make free text responses. Their artwork could be uploaded onto the post-survey form, giving permission for the image to be published, crediting their name, or anonymously.

Added auestions:

1) Satisfaction. Likert scales 4 point (very dissatisfied, dissatisfied, satisfied, very satisfied).

How would you rate your satisfaction of being involved in the group experiential arts today?

- a) As a creative activity
- b) To understand how art can improve the health of my community
- c) To connect with colleagues
- d) Expertise of the presenters
- e) Ability to get feedback on my art
- 2) Open-ended questions:
- a) What were the main things you personally got from participating in the arts workshop today?
- b) What did you learn today for your professional work at the arts workshop?
- c) Please describe, if any, negative effects or challenges were experienced during the workshop today?
- d) Describe any challenges you foresee for using group experiential arts in your community?
- e) Can you please write or dictate a microstory about your artwork and what it means to you?



2.4 Intervention

A two-hour workshop was provided during a pre-conference day on Indigenous smoking at the 2015 Oceania Tobacco Control Conference, Perth. GG who is a non-Indigenous General Practitioner researcher and Tobacco Treatment Specialist, with qualifications in Arts Therapy, ran the workshop, which she designed in consultation with Indigenous (MG, MB) and non-Indigenous (DO, LS) co-authors. Indigenous and non-Indigenous colleagues working in health promotion, clinical psychology, Indigenous research, or for organisations serving the Indigenous population, assisted with the workshop. The workshop included participants being led through a six-stage process (i) Access; (ii) Yarning; (iii) Representation; (iv) Keywords; (v) Responding; and (vi) Essence, explained using a slide presentation (see Table 2).

As the topic might upset some participants, a distress strategy was put in place. A clinical psychologist would spend time privately with the person to comfort them if needed. Participants were told if they needed to leave the room to indicate to the facilitators whether they needed support or not.

2.5 | Analysis

Analyses included three components:

1. Quantitative analyses were performed by LS and checked by GG, with SPSS v20,²⁶ of pre-post survey using descriptive statistics, assessing frequencies and proportions, and changes in knowledge and attitudes pre- to post-intervention, using Wilcoxin signed rank tests. Pre-tests and post-tests were matched using names and date of birth, and then de-identified prior to analysis. Three scales were tested for internal consistency using Cronbach's Alpha coefficient.²⁷ Composite scores for "understanding" and "likelihood" of use of arts were made from questions in Block A ("understanding" of the use of arts), and Block B ("likelihood" of use of the arts), respectively, using the pretest data (Table 1). We

- compared pre to post scores for "understanding" and "likelihood" with Wilcoxin signed rank tests.
- 2. Qualitative analysis of open text responses on the survey, was conducted by GG using an Excel spreadsheet. Responses were grouped by assembling the text under pre-determined headings, categorised by the four open-ended questions (Questions 2a-d on Table 1). As responses to two of the questions (Questions 2c and 2d on Table 1) were very closely aligned, responses to these two were merged. Representative quotes were extracted by selecting those that were illustrative of the theme, or unique. Findings were discussed with other authors.
- 3. Artwork Analysis used "The Four Frames" from the NSW Board of Studies.²⁸ Each Frame has a series of questions that can be used to inquire about the artwork, from four perspectives (Figure 1 illustrates the four frames, and a sample of the questions for each frame). For details refer to the NSW Four Frames Syllabus.²⁹

Analysis of artworks was conducted sensitively privileging the voices of participants, including the Indigenous participants. Cultural interpretations were offered by the three Indigenous researchers. Researchers in three pairs (one Indigenous and one non-Indigenous) analysed five to six artworks. Pairs analysed each artwork independently using the questions in the Four Frames to conduct their own inquiry, and making their own notes. They then came together to discuss their findings, and came to a consensus about interpretation. As an example, the notes made by researchers, after discussion on the cultural frame used for the artwork in Figure 3B were as follows:

Deliberately created by participant to share his experience with smoking.

Native/Culture: Representing his own environment, society – his own social, emotional and spiritual circle.

TABLE 2 Stages of the workshop

- 1. Access each participant was asked to choose one or more postcards from many cards spread out on a couple of large tables at the back of the room. This became a visual stimulus to access thoughts and feelings about how smoking has touched their personal or professional life. 10 minutes
- 2. Yarning participants then paired off to discuss their chosen images and why they picked them and what the images brought to mind about the issues of smoking. 10 minutes
- 3. Representation each participant made an artwork or piece of writing to represent that experience. Participants were seated banquet style round tables. Art materials were available, such as crayons, paper, and pencils. 20 minutes
- 4. Keywords participants were asked to then view their artwork as a whole and write keywords on the drawing (or underline key words for a piece of writing). 5 minutes
- 5. Responding the participants were asked to pair up again with the same person as before (or in threes), at the table, share their work and discuss or respond to the other's work through a dialogue. They were instructed to respectfully give something back of what they saw or felt about the other's work. 15 minutes
- 6. Essence participants were then asked again to pick a "strength card" laid out on the tables at the back of the room, and come to sit in a large circle of chairs. The participants took turns to briefly speak to the large group about their experiences, insights, and meanings from the workshop, hold up and discuss their artwork if they were comfortable to do so, and say why they picked the strength card they were holding. They were also asked to state what they were taking away with them from the session that day, and how they thought they may use this work in their own communities. The aim of using the strength card was so participants completed the day on a positive note. 20 minutes

Subjective

Cultural

shared beliefs? What beliefs-secular or spiritual? Postmodern

Cultural:

represented?

Structural: Describe visual language. What style, or period, or art movement? What materials + processes are used? What symbolic value do the above

convey?

Structural

Frames Postmodern: Is it mainstream/outside mainstream? What is appropriated/quoted from

another source? Explain source + meaning added. What is omitted or disregarded?

FIGURE 1 The Four Frames and examples of questions to guide analysis

Religion: Word "Religion" represented at the same level of family, community, work and friends. Self-centred and wings portraying "freedom". Religion of same level of importance as family friends. Religion important

Mirror: reflection of himself and his society/circle of comfort.

Some Indigenous icons and colours used. Christianity? Use of angel wings.

Each pair then were asked to consider the artworks as a whole that were allocated to them. They discussed emergent themes across their group of five to six artworks. Discussions included issues about reflexivity and trans-cultural interpretations. The group of six researchers met to discuss emergent themes, across all the artworks. GG and MG proposed a model to link themes, presented to the group for discussion, and a consensus was reached. The findings were considered together, to reach a synthesis of the mixed methods.

3 **RESULTS**

Table 3 shows the demographic characteristics of the 19 participants who completed both the pre-test and post-test surveys. N = 5others completed post-test survey only (not shown).

3.1 | Internal reliability of scales

Question Block A "understanding" the use of experiential arts, had an acceptable Cronbach's Alpha of 0.774. Question Block B "likelihood" of using the arts for tobacco control, had an excellent internal

TABLE 3 Demographic characteristics of N = 19 workshop participants

Four

Variable	Responses N = 19
Country	17 Australia 1 NZ 1 Asia
Rurality	10 Urban 5 Rural 4 Remote
Gender	4 Male 15 Female
Ethnicity	6 Aboriginal Australian (no Torres Strait Islanders)
	1 New Zealand Maori
	1 Indian
	11 Caucasian/non-Indigenous
Smoking status	8 ex-smoker
	11 never smoked
Work Role	8 Indigenous health worker
	2 Administrative or academic
	11 – Other health profession or "other"
Organisation type	10 – Health Service
	5 – Research
	3 – NGO
	1 – Indigenous Peak Body
Orientation of organisation	18 – mainly for Indigenous people
	1 – for general population

consistency with a Cronbach's Alpha of 0.954. Cronbach's Alpha for the satisfaction scale was good at 0.868. In each scale removal of a question resulted in very minimal changes to the Alpha level, so we used the scales as originally defined.

3.2 | Pre-post survey analysis

Nineteen participants undertook both pre and post-surveys. A before and after analysis of the rankings from two composite scales was undertaken for each participant. A Wilcoxon signed-ranks test indicated a highly significant increase in the median pre (median of 17; IQR = 6, range 12-27) to post-test (median 21; IQR=4, range 15-27) ranks of "understanding" the use of experiential arts (z=-3.537, P<0.00001, exact 2-tailed). There was also a significant increase in pre (median 13; IQR= 4, range 4-18,) to post (median 16; IQR= 7, range 4-20) workshop scale scores for "likelihood" of using the arts for tobacco control (z=-2.76, P=0.006, exact 2-tailed). The post-test satisfaction scale had a median of 17 (IQR=15, 19.75; range 11-20).

3.3 | Qualitative analysis of open text responses

Open text responses were grouped into three themes: professional learnings, personal learnings, and negatives or challenges. The open text responses were brief, but often poetic.

3.3.1 | Professional learnings

Centred around creativity in the workplace, communication with others, the utility or preferences of arts for Indigenous people, and how the method enabled a bridging across roles, extending from professional to other more personal spheres. It was observed that expression is important in the work sphere, and the arts can be used to aid the telling of stories and tobacco experiences, in a less confrontational way. The workshop was stated to increase confidence and provide a new, fresh way of looking at things. Sample quotes are:

- Using art was a way to think of new ideas and be creative in the way that I do my work
- Good method for maintaining difference but building strength in coming together
- Aboriginal people like to draw (do art) so it's a good way to express how they see themselves/tobacco/family
- I think it will be a great hit up here
- Sharing a journey family, community and professional
- How to encourage a conversation through art, offering a less confronting way of expression, how to tell tobacco experience stories

3.3.2 | Personal learnings

Expressed the benefit of the workshop to feed the person's own creativity, explore their own journey, communing with their inner self, the therapeutic nature of the experience, and the opportunity to engage in something different from usual. Learnings included a reminder of the power of art, an opening out of options, and an observation that it appeared to work for the whole group.

Sample quotes are:

- Creativity, connecting people, open heart and feelings
- Conversation with inner self
- It was very therapeutic and relaxing and a good way to reflect and a good idea to take back to my community
- Not an arty person, so was an eye-opener. Makes you think more indepth

- I enjoyed looking at and hearing everyone's interpretations of their experience with smoking and the effects that smoking has had in their lives
- It's a way of expression even for shy people
- Understanding how creative interventions can provide a vehicle to express an individual's understanding of health

3.3.3 Negatives and challenges

These questions elicited similar answers, so the theme was combined. Participants recognised a potential for the workshop to be emotionally provocative. (However, there were no incidents of this happening as far as we were aware during this workshop with professionals.) It was recognised that art would not appeal to everyone, and there may be negative responses from potential participants and other staff, especially if they did not understand the cultural context. Barriers such as time constraints were raised by several respondents, and also included funding concerns. Sample quotes are:

- Needing to make sure that the right supports are there if people feel upset
- Getting people to participate when they don't want to
- Time restrictions

3.4 | Artwork analysis

N = 17 artworks were analysed. Eight themes emerged and one question. Emergent themes included: optimism, working together for better health, strengthening family and culture, weathering the cycle of storms through time and journeys, smoking as a health barrier, isolation of smoking, recovery and freedom, and urgency and workload. Some artworks fitted into more than one category. Figure 2 depicts how the themes connected together into a model. Several artworks were around optimism, so this was chosen as an overarching theme. Urgency and workload were strongly represented by one artwork, but struck a chord with the group. We felt it to be an under-expressed, under-arching theme that needs consideration. Central to the model is a sense that Indigenous peoples are weathering the storm of tobacco smoking through time and space. However, this can also lead to recovery and freedom.

On the right side of the model are themes related to the challenges of smoking being a barrier to health, and potentially causing isolation. Alternately, it was recognised that isolation may also occur for those who have quit smoking, if the majority are still smoking. On the left side, themes cover how professionals and community can work together for better health of Indigenous peoples, and the importance of strengthening family and culture, contributing to recovery and freedom.

A question was posed: does tobacco discriminate? This was put into the model as a reminder: we did not know from viewing the artworks and the analysis, whether tobacco harms everyone equally, or disproportionately harms Indigenous people. Both were hinted at in the artworks.

FIGURE 2 Model and links between emergent themes from N = 17 artworks

3.5 Individual themes

Figure 3 is a collage demonstrating several individual artworks designated A to I, and described below under the respective themes.

3.6 Weathering the cycle

Some of the works under this theme showed the potential to go through a dark episode or cycle, but emerge again into the light with references to weather, clouds, rain, and storms. The artwork in Figure 3A shows a stick figure starting off happy under the bright sun, but then as clouds gather and with the "changing seasons" gets engulfed and progressively bent over and unhappy "as time progresses", with the other key words of "illness", and "worse influences". Yet there are also arrows pointing back to the sunshine, implying a potential cycle of regeneration and betterment. Another artwork (not shown) illustrated a storm clouded hanging over a dark period of history of death, bloodshed, and health challenges, and a brighter time in the future of fruitful life. Several other images depicting weather were of a positive nature, with the sun emerging from clouds, and overlapped with the theme optimism. Weathering (survival) can lead also to recovery and freedom.

3.7 Recovery and freedom

Figure 3B shows another weather scene with a microstory that explains how the clouds part, and the need to rise above negative circumstances, and keeping strength from family (overlaps with familv and culture). Another artist (not shown) on the theme of recovery and freedom shows the freedom to breathe, and clean air after quitting smoking.

Smoking as a health barrier and isolation of smoking

A simple yet powerful image, to illustrate a health barrier (not shown), portrays a colourful clown next to another clown, whose colour has disappeared due to smoking. Figure 3C explicitly demonstrates a brick barrier and a smokescreen between a single black circle (a person alone), and a colourful group of circles (people in a meeting circle). Figure 3D shows a stick figure squeezing into a narrow space beneath "insurmountable" rocky barriers with key words "no choice", "burden", "obstacle", and a hint of green grass out of reach at the top.

Working together for better health 3.9

Several artworks in this theme were brightly coloured, with swirling lines connecting people and key words. For example, in Figure 3E, the artist representing their role in the health sector and interaction with colleagues and partners, and the need for continued learning and support. The words include "growing, learning together" and "difficulty". There is a sense that in coming together more can be achieved. Similarly, other artworks show the dual nature of the work, but "trust" and "same direction" are key words that spell out the need to collaborate to achieve goals.

FIGURE 3 Collage of nine artworks illustrating the themes. Legend, authorship and micro-stories: A, Anonymous. B, Cameron Taylor. Microstory "Clouds above drawing from family to keep moving forward, being balanced and knowing who you are, what you can do and how you can do things will help yourself power yourself. Negativity will come but just spread your wings and rise above the circumstances." C, Anonymous. D, Stacey van Dongen. E, Anonymous. Microstory "Me and my culture joining and working alongside each other. Individual strengths, but stronger together." F, Louise DeBusca. Microstory "My family grew up sitting around the campfire, yarning, telling stories, without alcohol and drugs/smoking. Now that we have grown up my siblings all smoke. Can we all come back to the campfire, telling stories with humour to reach our people?" G, Juli Coffin. Microstory "Canaries are small and sometimes insignificant, but they sing a beautiful song. We are going to hear negativity but we must also listen to the positive. The positive keeps us going, it must not be drowned out. This represents that while we have the struggle of words our people are still dying, younger, more often. We must not stop singing. Just watch us because actions speak louder than words." H, Sachin Khera. Microstory "It shows HOPE. Whatever mistakes/bad choices we made in the past can be changed. Hence all life force energy/elements will help you to be positive in life." (I) Anonymous. Microstory "The picture is a drawing of my work station. It represents the pressure of tasks to implement national tobacco control policies as well as contribute to the global tobacco control dialogue."

3.10 | Strengthening family and culture

The artwork and microstory in Figure 3F reflects back to old times around the campfire, when perhaps life was simpler and more supportive, and poses the question: "can we sit around the campfire again, yarning, telling stories, without alcohol and drugs/smoking — can we reach our people this way?" Another art work showing cultural images and a tree with one side losing its leaves and the other

side flourishing with key words of "connection", "growth" and "renewal", also fitting the theme of recovery and freedom.

3.11 Optimism

Optimism was an overarching theme demonstrated in several artworks. Figure 3G and microstory are lyrical and strong in calling for optimism, with reference to a canary – fragile although it may be, it

of use; OA articles are

sings a beautiful song: "The positive keeps us going, it must not be drowned out". Her work calls for working together and forging beyond words to action, as the row of coffins warn us otherwise that the consequences of smoking are dire. Another work, Figure 3H has a microstory which says: "It shows HOPE. Whatever mistakes/bad choices we made in the past can be changed. Hence all life force energy/elements will help you to be positive in life."

3.12 Urgency and workload

Lastly, Figure 3I shows the picture of a person's work station covered in post-it notes. The accompanying microstory reveals the pressure of tasks not only on a local, but a global level. The person in the foreground has his or her head somewhat bowed, under the pressure. The work is urgent, and we drive ourselves forward with dedication.

3.13 | Synthesis of findings

The findings were considered together to reach a synthesis of the mixed methods. In summary, we found three main results:

- Statistically significant increase in understanding and likelihood of use of the arts
- Personal and professional learnings point to the benefit of the arts in a broad context, with some cautions about potential challenges for its use
- Visual representation of key strength-based themes of optimism and strengthening culture, and resilience; yet a recognition also that the urgency and importance of the work can sometimes seem daunting

Overall these analyses taken together demonstrate mostly positive outcomes from a relatively short (2-hour workshop) to improve understanding and the likelihood of workers, in Indigenous settings, to use the arts for tobacco control and health promotion. The findings demonstrate the specific strengthening effects of the workshop, and the elicitation of contemporary tobacco-related themes. This workshop had value and meaning for health professionals working in a challenging area among Indigenous smokers who are experiencing multiple health disparities. This optimism of health professionals is heartening, and something that can be built on to give personal and professional therapeutic benefits. Finding new ways to engage and learn from Indigenous people is of import. Especially considering the potential demands of working in this area.

4 | DISCUSSION

Nineteen participants attended a 2-hour interactive workshop and completed a pre-post survey about using the arts to understand and express their professional and/or personal experiences of working with Indigenous communities, and smoking and quitting. Out of these attendees, 17 allowed their artworks to be analysed using the

Four Frames. Participants reported personal as well as professional benefits. Knowledge creation and translation were potentially important aspects of the themes elicited from an analysis of the visual images produced. A 2-hour workshop can significantly increase skill and knowledge about using experiential arts for tobacco control.

A review of the benefits of the arts on the health and wellbeing of Indigenous communities concluded that the effects of arts programs can be powerful and transformative.⁶ Linking arts programs with other services (eg, health services or counselling, which could include tobacco-related services) improves the uptake of other services required to improve health and wellbeing outcomes, or behavioural change.⁶ Art-based methodologies to understand tobacco smoking have previously been successfully used with Indigenous Australian participants in a high school setting, enabling youth to demonstrate a broad understanding about how smoking affects their communities and families. 11 However, there was a contrast, the predominant messages in the youth artworks were fear-based and concern for family, while here messages were more diverse, reflecting the adult participants, and the increased knowledge base of health professionals. These messages were more about working through challenges, and holding out hope, which is something that youth would not necessarily have the maturity yet to see.

Learning new positively framed techniques to support health professionals is advantageous, especially those working in an area where behaviour change can be complex. The arts-based approach is promising to help keep momentum and engage in fresh approaches, and potentially draw on Indigenous participants' knowledge and world view to improve approaches to designing health messages. Novel techniques are supported by the FCTC to increase the reach and relevance of health messages for diverse populations, and empowerment approaches to enable people to make voluntary decisions, modify their behaviour and change their social conditions, in ways that enhance health.²⁵ The arts-based approaches described here are broad enough to engage health professionals in these considerations.

A strength of the study was the level of engagement with a face-to-face, highly interactive workshop. However, this study is limited by being conducted at one site, and numbers were small. There was a potential for social desirability bias, in participants mainly reporting positive outcomes post-workshop. However, we believe that as a pilot study this methodology of training and evaluating arts-based messages warrants further exploration, and a longer workshop over 1-2 days could be trialled.

4.1 | Recommendations for practice and research

Health promotion practices could be improved by more of a grass-roots approach to guide and develop health messages especially in tobacco control, as recommended by article 12d of the World Health Organization FCTC.²⁴ To successfully implement article 12d, we recommend that art-based activities can be confidently applied, and then integrated into training programs, to suit the needs of different target groups.²⁵

Arts-based research, such as we conducted here, is in its infancy for tobacco control, so there were few comparable studies. We could have conducted a workshop without putting the process through an ethics committee, but then we would have lost the extremely valuable opportunity of documenting the process, and following a rigorous procedure to analyse our findings, determining the effectiveness of our approach, and publishing the results. By making this not only an interactive learning experience, but a research project, we were able to establish a baseline for use of the arts to understand tobacco use, including use which may disproportionately affect Indigenous communities, and transparently describe the process of coming to shared meanings about the artworks produced. This is in the true spirit of knowledge genesis and translation.

5 | CONCLUSION

Nineteen health professionals, working with Indigenous communities, were introduced to the use of arts for their tobacco control work, although a two-hour workshop. There was a significant change pre to post workshop of understanding the use of arts, and likelihood of using them for this purpose, in the following 6 months. Artworks developed during the workshop revealed contemporary challenges impacting on equity, yet health staff expressed positives, and optimism for being engaged in their work.

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CONFLICT OF INTEREST

The authors declare that there are no conflicts of interest in connection with this article.

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