This is the peer reviewed version of the following article:


which has been published in final form at

DOI: http://dx.doi.org/10.1071/AH15028

‘Two heads are better than one’: Tobacco control experts’ and mental health change champions’ consensus on addressing the problem of high smoking rates among people with mental illness

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Abstract

Objective: To explore the beliefs of Australian experts in tobacco control and change champions working in mental health and tobacco cessation, and to identify measures for addressing the problem of high smoking rates for people with mental illness.

Methods: Qualitative interviews to explore participants’ views, and the Delphi technique was used for achieving consensus on ways in which the problem would be best addressed.

Results: This consensus centred on the need for leadership within the mental health system. The problem was reconceptualised from being solely the responsibility of the mental health sector into an issue that requires the combined resources of a partnership and shared leadership between government and non-government services, public health leaders, policy makers and people with mental illness and their families.

Conclusion: Collaboration would raise the priority of the issue, reduce the debilitating effect of stigma and discrimination within the mental health sector and would place smoking reduction firmly on the political and public agenda. A recovery orientated focus would increase the skill base and be inclusive of workers, families and carers of people with mental illness who face smoking issues on a daily basis. Reconceptualising this as an issue that would benefit from cooperation and partnerships would disrupt the notion that the problem is solely the responsibility of the mental health sector.

What is known about the topic? Rates of smoking have remained high for people with mental illness despite population wide public health strategies successfully reducing smoking rates in the general population. For people with mental illness, the benefits of quitting
smoking for both their mental and physical health are overshadowed by concerns about the complexity of their needs. There is a lack of knowledge about how smoking cessation support can be improved to increase success rates in smokers with mental illness.

**What does this paper add?** This is the first study to bring a cross sector lens of public health and mental health ‘experts’ together to discuss the reasons for the high rates of smoking among people with mental illness and to obtain their shared agreement on solutions. This Australian specific study analyses participants’ responses in relation to the problem representation and reveals what the issue is considered to be, where action should occur and how the problem should be resolved.

**What are the implications for practitioners?** For the Australian context there is a need for leadership and a consistent smoke-free message about the benefits of not smoking. Staff working in mental health require training in providing brief interventions, motivational interviewing and pharmacological support. Joining together as a partnership of government and non-government services, including public health leaders and policy makers and involving people with mental illness and their families, would benefit all concerned.
Introduction

In Australia, people with a more prevalent mental illness (depression and anxiety) are twice as likely to smoke as those without a history of mental health.\textsuperscript{1, 2, 3} Australian data for 2010 show 32% of smokers report a mental illness\textsuperscript{4} compared to a national daily smoking rate of 15.1% for the whole population.\textsuperscript{5} Among people with low prevalence mental illness (for example, psychotic conditions like schizophrenia, or severe depression or bipolar disorder) smoking rates are even higher and have barely changed in the last 12 years.\textsuperscript{6} Australians with a psychotic illness smoked 68.9% in 1997-98 and 67.2% in 2010\textsuperscript{6} while over this same time period smokers with no history of mental illness smoked at 26% in 1998 and 20% in 2010.\textsuperscript{7}

In Australia, smoking accounts for 12\% of the disease burden, with $31 billion in social costs per annum\textsuperscript{8}. These costs are even greater for people with mental illness. Smoking related illness remains the main contributor to a 25 year reduced life expectancy for people with mental illness compared to the general population.\textsuperscript{9, 10} Population wide cessation measures have not produced a decline in smoking in this community nor has any clear direction emerged from targeted measures. Smoking has been ‘taken for granted’ in mental health care for decades with a limited response to this problem, despite evidence that people with mental illness want to quit and can quit when encouraged and supported.\textsuperscript{11-13} In Australia, people with mental illness on government provided benefits and pensions are able to obtain nicotine replacement therapy and other smoking cessation aides (champix and zyban) by prescription from their general practitioner at substantially reduced costs.\textsuperscript{14} While there have been promising results for cessation from intensive community based mental health smoking cessation programs, these measures have not been widely implemented.\textsuperscript{15, 16}

There are three main knowledge gaps regarding options for action for reducing smoking among people with mental illness. Firstly, there are uncertainties about why people with mental illness are more likely to become smokers.\textsuperscript{1} Secondly, it is not known how to systematically integrate smoke-free policies and health promotion strategies throughout the mental health system.
for best advantage.  

Thirdly, it remains unclear how smoking cessation support can be improved to increase success rates in this population, from a broad public health policy, health systems and community perspective.  

This study was undertaken to help address the third knowledge gap, by asking Australian tobacco control experts and change champions within the mental health sector to develop recommendations for overall structural changes that might achieve improvements in smoking cessation for people with mental illness.

Proposed explanations for why people with mental illness are more likely to become smokers are drawn from a range of perspectives, the differences of which may have led to a siloed and largely unsuccessful response to the issue. The environmental perspective considers that the tobacco industry has specifically targeted psychologically vulnerable people.  

The sociological perspective draws a strong association between low socio-economic status and mental illness, with socio-economic status being a risk factor for the uptake and continued use of tobacco. A socio-historical perspective argues that the cause is the pro-smoking culture and environment in mental health services.  

The medical (biological and psychological) perspective considers tobacco is used to self-medicate psychological distress, may be an antecedent to depression or anxiety or, conversely, that mental illness plays a role in causing smoking due to a common genetic predisposition.  

The combined biopsychosocial perspective considers causation to be a combination of genetic and environmental predispositions contributing to both smoking and mental illness.  

This complex set of potential reasons for continued high rates of smoking by this population calls for a fresh intersectorial examination of this problem, one that brings experts from each of these perspectives together to look at potential solutions to this problem.

In response to these purported causes, a number of measures have been tried, from smoking bans in places where people with mental illness are likely to attend, eg clinics and hospitals, to specifically targeted group cessation activities. However, there does not appear to be any consensus as to what might be the most beneficial public health measures.
In determining which public health measures might be most successful to increase smoking cessation success rates in smokers with mental illness, this research explored the beliefs of people renowned for their experience and depth of knowledge of this area. The objective was to seek out people with a breadth of expertise in tobacco cessation, public health and/or mental health and to explore their beliefs about these high smoking rates and their recommendations for addressing this problem.

Methods

This study used mixed methods (interviews and Delphi) sequentially with the two methods being complementary to each other. Exploratory qualitative interviews were undertaken to understand the perspectives of Australian experts and professionals with the consensus development process of the Delphi technique being confirmatory.\textsuperscript{30-32} This research sought practical solutions to a difficult problem so the Delphi technique was subsequently used to confirm ideas and bring different perspectives towards consensus. The use of mixed methodology added credibility, increased generalisability and enhanced usability.\textsuperscript{33}

Flinders University of South Australia Social and Behavioural Ethics Committee and the South Australian Health Human Research Ethics Committee approved the study.

Participants

Ten experts (academics and researchers) and 11 change champions (practitioners) were chosen because of their understanding of the area and their demonstrated consideration of the challenges. The experts were purposefully selected having won international or Australian awards or fellowships for their notable work in tobacco control. An initial group of forty-one change champions were identified from the researchers’ knowledge of innovative work and publications in tobacco control and mental health and this was reduced to 11 to include representatives from the categories researcher, policy, peer worker, and government and non-government practitioners. Change champions were considered: ‘charismatic individuals who throw his or her weight behind
an innovation, thus overcoming indifference or resistance that the new idea may provoke in an organization’. 34, p.414

The Participants

<table>
<thead>
<tr>
<th>Experts (award or fellowship winners)</th>
<th>Innovators (change champions)</th>
</tr>
</thead>
<tbody>
<tr>
<td>E1: health advocate</td>
<td>C1: policy/clinician (government)</td>
</tr>
<tr>
<td>E2: academic/researcher</td>
<td>C2: practitioner/researcher (government)</td>
</tr>
<tr>
<td>E3: academic/researcher, medical</td>
<td>C3: practitioner/policy (government)</td>
</tr>
<tr>
<td>E4: practitioner (government)</td>
<td>C4: mental health peer worker (government)</td>
</tr>
<tr>
<td>E5: academic/researcher</td>
<td>C5: practitioner/manager (government)</td>
</tr>
<tr>
<td>E6: health consultant</td>
<td>C6: mental health peer worker (government)</td>
</tr>
<tr>
<td>E7: academic/researcher</td>
<td>C7: practitioner/manager (non-government)</td>
</tr>
<tr>
<td>E8: researcher/policy (non-government)</td>
<td>C8: practitioner/researcher (non-government)</td>
</tr>
<tr>
<td>E9: academic/researcher/advocate</td>
<td>C9: practitioner/manager (non-government)</td>
</tr>
<tr>
<td>E10: academic/researcher/advocate</td>
<td>C10: practitioner (non-government)</td>
</tr>
<tr>
<td></td>
<td>C11: health consultant, medical</td>
</tr>
</tbody>
</table>

Twenty one interviews, averaging an hour each, were conducted with participants by telephone or in person. Participants were located across four Australian states and two territories, making telephone interviews more convenient, flexible and less costly. Interviews were open ended, with semi-structured questions allowing for exploration of particular areas of interest and unique experiences. This encouraged new information to emerge rather than the researchers imposing their structure on the interviews. 31

Framework

Carol Bacchi’s framework of questions was used to analyse participants’ responses in relation to the problem representation.35,36 This framework of questions has been used before in public health 37 but not to consider smoking and mental illness. The questions assist with the process of examining belief systems behind policies and problems or ‘What’s the problem represented to be?’35 Bacchi’s proposition is that policy is informed by problematisations and we need to critically understand the problem rather than accepting representations without reflecting on their origins, purposes and effects; to examine how it could be questioned, disrupted and replaced.35
This was seen as useful to apply to the problem of smoking and mental illness because of this problem’s complex and entrenched nature.

**Bacchi’s framework of questions:**

<table>
<thead>
<tr>
<th>Question</th>
<th>Adapted from Bacchi 35, p.2</th>
</tr>
</thead>
<tbody>
<tr>
<td>What’s the problem represented to be?</td>
<td></td>
</tr>
<tr>
<td>What assumptions underlie this representation of the problem?</td>
<td></td>
</tr>
<tr>
<td>How has this representation of the problem come about?</td>
<td></td>
</tr>
<tr>
<td>What is left unproblematic in the problem representation? Where are the silences?</td>
<td></td>
</tr>
<tr>
<td>Could the problem be thought about in a different way?</td>
<td></td>
</tr>
</tbody>
</table>

Experts and change champions were interviewed by the principal researcher with a view to developing a critical understanding of the problem, and how such understandings determined the responses and precluded other responses to the problem. Content analysis of the discourse within the transcripts was assisted by Bacchi’s framework of questions, and by using NVivo 10 qualitative data analysis software. The initial transcripts were analysed and coded using a descriptive approach of extended phrases that identified the meaning of units of data. By this method of systematic coding and categorizing the interviews, trends and patterns emerged as well as their frequency and relationship to each other. These codes became emergent themes which were debated, discussed and confirmed by all three researchers to enhance rigour, ensure reflexivity and improve trustworthiness within the data analysis process.

The Delphi process was then used to further analyse the policy issues and to achieve consensus on the problem and proposed solutions. This process allows participants to remain anonymous, avoiding domineering opinions and ensuring that all opinions have equal value. The intention was to define and prioritise the best alternatives to the current situation and simulate a focused decision making approach.

The researchers agreed on 11 potential policy solution categories arising from the themes that would form the Delphi survey sent by email to the same participants previously interviewed.
Participants in this Delphi first round were asked to rank their top five priorities (from one: most important to five: least important). One hundred per cent response rate was achieved. In a second round participants were sent the group ranking, determined by calculating the mean score for each statement, shown against their own responses. Participants were asked to reconsider and re-rank the statements from the list of 11 statements which had been re-ordered according to the first round results. Again, 100% response rate was achieved with six participants confirming they would make no changes to their original ranking.

Results

The results are displayed in the following two tables, in the relevant question sections, using Bacchi’s framework, with direct quotes from participants to demonstrate each aspect identified by participants.

[Table 1 here]

[Table 2 here]

In summary, the interviews supported the consideration that the pro-smoking culture of mental health services coupled with socio-economic disadvantage were causing the higher rates of smoking. While there are low expectations of service users and beliefs that smoking has some benefits for people with mental illness, attention to the physical harms of smoking can be ignored. Mental health services and physical health services have become segregated from each other and the expertise of people who do effective work in tobacco cessation has not been sought by the mental health sector. As a consequence of these processes, both mental health services and tobacco cessation services are avoiding their responsibility to resolve the high rates of smoking among people with mental illness. Participants did not raise the issue of smoking and stigma.

How should the problem be resolved?

The researchers established an understanding of what is the problem and who or what are considered responsible for exacerbating the problem and any apparent silences and potential ways that the problem can be thought about differently. This led to considering how the problem should
be resolved. Such an analysis provides further insight into the assumptions that underlie the representation of the problem or where action was needed.

Fourteen themes arose from analysing the interviews (see Figure 1) with some themes closely aligned and able to be combined. An example of this was the theme ‘Belief that they do not want to quit and cannot quit’ and the theme ‘Provide nicotine replacement therapy’ which were combined into the category, ‘Quitting in this population is too hard and needs greater use of nicotine replacement therapies’. These themes informed the 11 policy solution statements that were used in the Delphi survey process and are shown in Table 3 in the random order that was sent to participants.

[Table 3 here]

Figure 1 shows the emergence of What’s the Problem represented to be? with themes from experts and change champions. The first column shows the 14 main themes from the interviews, with the final 11 statements to which they align provided in brackets. These were then refined according to Bacchi’s framework of domains of ‘What is the problem?’, ‘Where should action occur?’, and ‘How should the problem be resolved’. The emergence of the problem representation was then the synthesis of these processes.

[Figure 1 here]

The results in Figure 2 show the final ranked order from the Delphi process. These statements have been abbreviated to: Leadership, Training, Partnership, Physical/mental, Staff cessation, Addiction, System consistency, Nicotine replacement, Testimonials, Awareness and Social networks.

[Figure 2 here]

Overall the scores for leadership and awareness increased considerably in the second round while those for partnership and system consistency increased slightly and all other scores decreased. After two rounds of Delphi ranking, leadership scored the highest, followed by awareness, partnership, system consistency and training.
Discussion

Participants considered the high smoking rates among people with mental illness to be primarily associated with the pro-smoking culture in mental health, the low socio-economic status of people with mental illness and the tobacco industry targeting vulnerable people. The Delphi study revealed agreement on five dominant solutions: leadership, awareness, partnership, system consistency and training.

Participants agreed that the mental health sector needs to lead the process but, while the whole sector suffers stigma and discrimination, there is a need to form partnerships with others and to be strongly supported by skilled people in tobacco control. Comments from participants show that stigma with its elements of ignorance, prejudice and discrimination may not have been sufficiently considered in relation to the issue of smoking and might be responsible for the lack of action on smoking among people with mental illness.\textsuperscript{51} Negative stereotyping affects self-esteem and also impacts families and carers. People experiencing stigma are known to delay admitting their illness, to be less willing to begin treatment and quicker to drop out. Stigma emanating from mental health professionals can mean that they do not hold very optimistic opinions about treatment outcomes.\textsuperscript{48} In the second Australian national survey of psychotic illness, 38\% of the 1,825 participants said they had experienced stigma or discrimination in the past year as a result of their mental illness.\textsuperscript{6} Stigma affects self-esteem for people with mental illness, their families and carers and also effects mental health workers, with the consequences of stigma experienced in areas of planning, service delivery and funding allocation.\textsuperscript{59}

A partnership of government and non-government services, public health leaders, policy makers, people with mental illness, their families and carers would also fit with a recovery orientation. A recovery orientation includes self-determination, choice and a focus on service users’ strengths, hopes and dreams.\textsuperscript{50} Such an orientation emphasises collaborative partnerships, especially with service users and carers and belief in the capacity to recover from mental illness and to have influence over their own life.\textsuperscript{51-53} This is precisely the place to encourage tobacco cessation
activities as people with mental illness regain their membership of a community that is now primarily non-smoking and are supported to function as citizens. In order to systematically integrate smoke-free policies and health promotion strategies throughout the mental health system, there is a need for a fundamental change in attitudes and a shift of power among service providers which is a key element of recovery orientation and is a requirement for successful tobacco cessation. Reconceptualising this as an issue that is not solely the responsibility of the mental health sector would serve to disrupt longstanding views of the problem and would bring together a partnership with skills, knowledge and capability to make a difference. A reaction of such magnitude to this long term problem might even gain a place on the political agenda because, ‘the greatest policy changes grow out of that coupling of problems, policy proposals and politics’. A robust and equal partnership between these groups could undertake the following measures:

- Funding models and targets could be reconfigured to boost cessation and include incentive payments for cessation results and awards for progress.
- Targeted community awareness-raising about the value of quitting for improved mental and physical health.
- Staff and community training for managing nicotine addiction, ranging from encouraging positive attitudes towards smoke-free areas to focussing on opportunities for smoking cessation, including paying attention to their own smoking.
- Mandatory health prompts asking about smoking status on all forms across all sectors of health care delivery.
- More assertive targeting of youth, family and staff smoking and consistent anti-smoking messages.
- Change staffing profiles within organisations to add health promotion and the employment of peer workers who have quit smoking.
One of the strengths of the tobacco control movement has been consensus about what is needed to reduce smoking rates. There is general agreement on evidence based population-wide tobacco control strategies to reduce smoking which have resulted in an all-time low in daily tobacco smoking among Australians aged 14 years and older (12.8% in 2013).\textsuperscript{57} It is time now to focus on the devastating effects of smoking among people with mental illness and to form a strong and collaborative recovery-oriented partnership based on hope and determination.

**Strengths and limitations of this study**

As a mixed methods study bound by size, context, time and place, the results of this study must be used with caution when generalising outside these parameters. However, the methodological rigor applied in this study, and the robust use of Bacchi’s *What’s the Problem represented to be?* framework provide some confidence that the results are likely to be reproducible. This is the first cross-sector analysis that combines the opinions of Australian tobacco control experts working in public health and tobacco policy and change champions working in both mental health and tobacco control. The use of mixed methodology added credibility and enhanced usability for the benefit of the field. Case studies of cross-sector partnerships to reduce the dual stigmas of mental illness and smoking would further assist the field.

**Conclusions**

This paper shifts the debate around smoking and mental illness by revealing the ‘taken for granted’ knowledge and understandings of the problem representation. There was a clear theme that the culture and attitudes held by the mental health sector have led to the avoidance of responsibility for reducing smoking among people with mental illness. It would appear to be an issue ripe for the formation of a partnership which would raise the priority of the issue, reduce the debilitating effect of stigma and discrimination within the mental health sector and place smoking reduction firmly on the public agenda. A recovery-orientated focus would increase the skill base and be inclusive of workers, families and carers of people with mental illness who face smoking issues on a daily basis. A partnership with the strength of a consistent cross-sector voice would provide much needed
impetus for this intractable problem and might even gain political attention and additional resources.

**Conflict of interest**

The authors declare they have no conflict of interest.
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Figure 1: The emergence of 'What's the problem represented to be?'

- Pre-smoking culture in mental health (1, 5, 10)
- Silo between mental health & public health (3, 4)
- Stigma (9, 10)
- Staff smoking (5)
- Heavy addiction (6)
- Belief they do not want to quit & cannot quit (8, 10)

**WHAT is the problem?**

- Led by mental health sector (1)
- Partnership of health system & mental health community (3)

**WHERE should action occur?**

- Provide nicotine replacement therapy (8)
- Consistency of message (7)
- Raise awareness of benefits (9, 10)
- Train staff (2)
- Join with physical health issues (3, 4)
- Use social networks (11)

**HOW should the problem be resolved?**

- The emergence of the problem representation.
  Culture and attitudes held by the mental health sector has led to the avoidance of responsibility for reducing smoking among people with mental illness.