Engaging with 12-Step and Other Mutual Aid Groups During and After Treatment: Addressing Workers' Negative Beliefs and Attitudes through Training

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Abstract

While attending Alcoholics Anonymous (AA) meetings is associated with improvements in alcohol consumption and related problems, barriers to engagement persist, including negative perceptions by addiction professionals. The current project examined clinician (n=64) attitudes to AA and other mutual aid (MA) groups before and after training. Following training, there were increases in knowledge and willingness to refer clients. A follow-up of 38 clinicians identified moderate increases in referrals to MA groups over the following month. Referral to mutual aid groups was predicted by how important clinicians perceived 12-step groups to be, their satisfaction with the training and support from their agency.

Introduction

It has been estimated that, in 2000, 4% of the global burden of disease, as measured in disability adjusted life years was attributable to alcohol consumption and about 0.8% to illicit drugs (Rehm et al, 2006). After tobacco, alcohol is the second largest cause of drug-related morbidity and mortality in Australia (AIHW, 2005), and is the most common reason for seeking treatment in Australia (AIHW, 2013). International outcome studies consistently identify that engaging in specialist AOD treatment alone is typically insufficient for sustained positive changes (White, 2009). Participation in mutual aid (MA) groups such as Alcoholics Anonymous (AA), Narcotics Anonymous (NA) and non-12 step groups such as SMART Recovery, Secular Organization for Recovery and Life Ring Secular Recovery in conjunction with specialist treatment, has been found to enhance long-term recovery rates and improve overall functioning, as well as reduce drug-related costs to society (Kelly & Yeterian, 2008; White, 2009; Kaskutas, 2009). Not only do MA groups provide support for the maintenance of abstinence, but also offer a safe space to share coping strategies and life skills and receive social support (Laudet, Magura, Vogel, & Knight, 2000). The period immediately after leaving AOD treatment is a particularly high-risk time for relapse, and there are substantial benefits from strong linkages between treatment facilities and peer-supported recovery groups (Best et al., 2010).

Clinicians working in specialist AOD services are well placed to link clients in to MA groups and facilitate engagement with other community groups. However, Day et al. (2005) have found, in a UK setting, that clinicians expressed ambivalent attitudes towards mutual aid, with fewer than half reporting that they would recommend their clients attend a mutual aid group. Also in the UK, Gaston-Lopez et al. (2010) reported that negative clinician attitudes to mutual aid groups can shape client attitudes and so deter engagement and attendance. Similarly, Verdehus et al. (2009) found low referral rates to mutual aid groups, and argue that this needs to be addressed through education and training to raise awareness and knowledge

amongst clinicians. However, there has been little research on interventions to increase clinicians awareness and knowledge, although Timko et al. (2006) have shown that assertive linkage to AA significantly enhanced not only attendance but also post-treatment alcohol-related outcomes, and that this model should be more widely promoted through specialist treatment services.

In a UK randomised trial, Manning et al. (2012) compared the merits of standard referral processes, doctor referral and peer assertive linkage among residential treatment patients attending for detoxification. Although the doctor referral was more effective than standard referral, the greatest impact – in the form of greater meeting attendance on the ward and after departure, and in terms of reduced substance use – was a consequence of intensive peer referral to treatment. This resulted in greater meeting attendance during treatment and in the three months post-treatment, with post-treatment attendance at meetings associated with greater reductions in substance use.

The aims of the paper are:

1. To assess attitudes to mutual aid groups among alcohol and drug professionals in Melbourne and perceived barriers to referring clients to AA and to other MA groups.

2. To assess the extent to which such attitudes were amenable to change following training designed to raise awareness of mutual aid and dispel myths about AA and about other MA groups.

3. To assess the impact of training in AA and other MA awareness on referral practices.

4. To examine predictors of referral practices to AA and to other MA groups among AOD clinicians in the month following the training

Method

Five free AA and other MA awareness training sessions were provided to clinicians in specialist AOD services in metropolitan Melbourne. Clinician awareness, attitudes and experiences of AA and other MA groups before and after the training were assessed using a self-administered survey. An online survey was conducted one-month following the training to assess changes in engagement and client referral practices to AA specifically, as well as other MA groups.

MA awareness training and surveys

Sixty four clinicians attended the MA awareness training, with an average of 12.8 clinicians. in each session (range 7-18).The 2-hour training sessions incorporated (i) a pre-intervention survey (15 minutes); (ii) an overview of recovery models and related literature, as well as evidence for mutual aid groups and assertive linkage (30 minutes); (iii) AA speakers providing a personal account of their experience of AA and addressing common questions about AA (30 minutes); (iv) a question and answer session (30 minutes); and (v) a post-intervention survey (15 minutes).

Data were collected from training participants at three time points: at the start of the training (i.e., pre-training), at the completion of the training (i.e., post-training) and approximately one month post-training (i.e. follow-up). The pre- and post-training surveys were conducted on the same day of the training and the follow-up survey was completed online, with alerts provided by the research team. In total, 64 participants completed the pre-training and post training surveys, and 38 participants completed the follow-up survey (59%).

Instruments: The perceived helpfulness and importance of attending 12-step groups was assessed using three items from a scale developed by Laudet and White (2005), using a 0-10 ruler[1]; knowledge of AA was measured using the 12-Step Group Knowledge Scale

[1] "In your professional judgement, how helpful/harmful are mutual aid groups?"; "How important a role do you believe 12 step groups can play in a comprehensive treatment system?"; "How important a role do you believe 12-step groups play in the recovery process?"

(Verdehus et al, 2009); incorporation of 12-steps into treatment was assessed using a single item developed by Day et al (2005)[2]; attitudes towards recovery was assessed using the Addiction Recovery Attitudes Questionnaire (ARAQ; Best and McCluskey, 2012); and satisfaction with training was assessed using the Workshop Evaluation instrument (Texas Christian University, 2011). Additional demographic information was gathered from participants, and included age, gender, ethnicity and professional background as well as work-related factors such as length of time in post and type of role performed.

Data analysis

Quantitative data from the four surveys were analysed with SPSS (version 20)[3]. Descriptive statistics (mean (M); standard deviations (SD)) were used to describe the characteristics of the participants and key measures. The relationship between categorical measures were assessed using Pearson's correlation and paired-samples t-tests were used to examine changes in the variables of interest pre-training and post-training. Repeated measures analyses of variance were used to report changes in perceptions and attitudes from baseline to post-training to one-month follow-up. A logistic regression was conducted to examine factors associated with clinicians' practices in referring clients to MA groups at the follow-up point.

Ethics approval

Ethics approval was obtained from the Eastern Health Research and Ethics Committee (approval number: LR14/1213).

Results

The mean age of participants attending the training was 41.3 years (SD 10.3). The majority were female (n=45, 65.6%); 80.3% (n=49) were based in urban settings, 19.7% (n=12) in

[2] "In your opinion, how open is your agency to collaborating with AA including starting groups at the program?"

[3] SPSS (Statistical Product and Service Solutions) is software package used for statistical analysis. SPSS is an IMB (International Business Machines Corp.) product.

rural regions and three did not specify their location. Approximately 80% (n=49) of participants were involved in service delivery with a further nine involved in service management. On average, participants had been in their current position for 3.3 years (SD=3.1 years; range of 0-13 years) and had worked in the AOD field for an average of 8.5 years (SD=7.5 years; range of 0-30 years). A wide diversity of professional backgrounds were reported, including AOD counselling (n=25, 39.7%), social work (n=12, 19.0%), mental health nursing (n=12, 19.0%), general nursing (n=5, 7.9%) and AOD (alcohol and other drug) support work (n=4. 6.3%). Sixteen (23.0%) were qualified to post-graduate level; 19 (29.0%) to undergraduate or Honours level; 22 (34.4%) had a diploma or a graduate diploma and six had other qualifications (data missing for one participant). The average (mean) case load size reported was 17.0 (SD=10.6).

Attitudes to 12-step groups at baseline: Baseline attitudes to 12-step groups (assessed with three items using a 'measurement ruler' out of 10, with higher scores indicating positive attitudes), with mean ratings of 7.1 (±1.7) for 'how helpful are 12-step groups?'; 7.0 (±1.9) for 'how important a role do you think 12-step groups play in a comprehensive treatment system?' and 6.9 (±1.9) for 'how important a role do you think 12-step groups play in the recovery process?'

Ratings were generally positive and consistent in how important participants reported 12-step groups to be in the treatment system, in recovery journeys and their helpfulness. On the Twelve Step Group obstacle scale, the mean score was 23.6 (SD=3.6; range from 9-36 with higher scores representing more perceived barriers to engaging in 12-step groups) suggesting high perceived obstacles to engagement. On a scale of 1-10, participants rated openness of their agency to working with AA at a mean of 7.2 (SD=2.2), but an openness to other mutual aid groups rated higher at 7.8 (SD=2.2), with this difference statistically significant ($t=2.84$, $p<0.01$).

AA knowledge and awareness: On average, participants scored 7.7 out of 14 (SD=2.5), suggesting an intermediate level of knowledge. Higher knowledge scores on 12-step knowledge were associated with being older ($r=0.35$, $p<0.01$), having worked in the AOD field for longer ($r=0.26$, $p<0.05$), rating 12-step groups as more helpful ($r=0.33$, $p<0.01$), perceiving more strongly that 12-step groups play an important role in treatment systems ($r=0.30$, $p<0.05$), and identifying fewer barriers to engaging in 12-step groups ($r=-0.28$, $p<0.05$). In addition, participants who had worked in the AOD field for longer perceived 12-step groups as more helpful ($r=0.26$, $p<0.05$), and were more likely to perceive fewer obstacles to 12-step involvement ($r=0.32$, $p<0.01$).

Personal experiences and referral practices: 45.3% of participants reported that they had ever attended an AA meeting, 12.5% in the past year and 4.8% in the past month. For any MA group, lifetime attendance was 67.2%, with 34.4% having attended in the last year and 15.9% in the last month. Nine participants (14.1%) considered themselves to be members of a mutual aid group.

Participants were asked to rate on a scale of 1-10 how prepared they felt about making referrals to mutual aid groups, with higher scores indicating higher preparedness. The mean score was 6.7 (SD=2.5), with the equivalent score slightly higher at 7.0 (SD=2.1) for referral to other mutual aid groups. Forty-eight participants (75.0%) reported that they did refer clients to AA groups, with 11 (17.2%) saying that they did not and five participants not responding to this question. This was slightly higher than the 45 respondents (70.3%) who reported that they referred clients to other mutual aid groups.

In relation to clinician referral practices to AA and to other MA groups in the past month, there was considerable variability, with 39.1% (n=25) referring no-one to AA in the past month and 45.3% (n=29) making no referrals to other mutual aid groups. On average, workers referred 2.0 (±2.76) people to AA of the 3.5 (±4.19) they perceived to be suitable (a

referral rate of 57.1%), compared to 2.0 (±3.48) referrals of 4.3 (±4.2; 46.5%) perceived to be suitable to other MA groups.

None of the attitudinal variables collected were associated with referral practices. Those who reported that they had ever attended an AA meeting themselves reported referring more clients to AA meetings in the last month (2.9 compared to 1.4), but while there was a trend, this difference was not statistically significant (t=1.91, p=0.06).

Impact of training: Satisfaction with training was assessed using the Workshop Evaluation (WEVAL) form (scales scored between 10 and 50, with higher scores representing stronger agreement). Ratings were extremely positive for utilisation of the training, satisfaction with the training and support and commitment to the content of the training. In contrast, very few perceived obstacles to implementing the training were reported.

There were significant improvements following training in positive attitudes about the helpfulness of 12-step groups (baseline mean = 7.1; follow-up mean = 8.1; t=6.41, p<0.001); in the importance 12-step groups can play in treatment systems (baseline mean = 7.0; follow-up mean = 8.0; t=6.28, p<0.001) and what an important role 12-step groups play in the recovery process (baseline mean = 6.9; follow-up mean = 7.9; t=5.85, p<0.001). Similarly, perceived obstacles to 12-step involvement reduced from 22.4 to 21.0 (t=2.99, p<0.01), and involved significant reductions in perceptions of barriers around all three sub-scales – religion and powerlessness, risks for participation, and lack of professionally trained staff. This was also reflected in changes in openness to referral following the training. Prior to training, the mean rating of preparedness was 6.7 (±2.5), which increased to 8.4 (±1.3) post-training (t=6.19, p<0.001), while willingness to refer to other mutual aid groups increased from a mean of 7.1 (±2.1) to 8.4 (±1.3; t=5.81, p<0.001).

Changes in 12-step knowledge following training: There were also positive changes in total scores from baseline to post-training for 12-step knowledge as well as the two sub-scales. Overall knowledge increased from a baseline score of 7.7 (±2.5) to a mean of 9.0 (±2.1;

t=5.42, p<0.01), while there were significant increases in the knowledge sub-scales on 'organisational practices' (baseline mean = 3.7; ±1.7; follow-up mean = 4.3; ±1.4; t=3.20, p<0.01) and in perceptions around 'contact and participation'(baseline mean = 4.2; ±1.0; follow-up mean = 4.9; ±0.8; t=4.62, p<0.001).

Impact on recovery perceptions: The training had a broader impact on perceptions of recovery more generally. Clinicians' estimated percentage of those with a lifetime dependence who were likely to recover increased from 45.1% (SD=24.8) to 58.4% (SD=10.9; t=4.20, p<0.001).

One-month follow-up data: Of the 64 participants in the original survey, 38 (59.4%) completed the follow-up survey. These workers had an average caseload of 18.0 (SD=10.5). Comparison of the followed up group (n=38) with the non-followed up group (n=26) showed that the groups did not differ in length of time in the field or in current post, in caseload size nor in baseline knowledge or perceptions of barriers to referral.

Ratings of the training remained positive. On the Workshop Evaluation follow-up measure (Texas Christian University, 2011) based on a scale of 10-50, with higher scores indicating more positive ratings of the adoption of training materials into practice, the mean scores for quality and utilisation was 40.3 (±4.4); for training satisfaction, 40.0 (±5.5); for support and commitment, 38.5 (±6.4), and for obstacles to implementing 20.5 (±5.8). Participants continued to be positive about the training experience and quality of the training, and about their capacity to implement the training content, with low ratings on barriers to implementation.

Changes in attitudes in the follow-up period: Table 1 shows the participants' overall attitudes to 12-step groups at each of the three time points for the followed up group, with repeated measures analyses of variance assessing change over time. Scores increased from baseline to follow-up for all three items relating to how helpful 12-step groups are and how useful in treatment and recovery, but at follow-up these increases were largely lost with significant

reductions in mean scores on each of the measures from post-training to follow-up. Similarly, there was a significant reduction in perceived obstacles from baseline to post-training (mean decrease from 23.0 (±4.66) to 21.4 (±3.54)(a significant drop) and an increase to follow-up to a mean of 22.4 (±4.21); however, the increase was non-significant in the repeated measures ANOVA. Analysis of knowledge scores at the three time points for the followed up sample showed a significant increase from baseline score of 8.1 (±1.79) to 9.2 (±1.78), but on this occasion there was a further increase in knowledge to a mean of 9.5 (±1.67) at the one-month follow-up. Repeated measures analysis of variance showed significant increases from baseline to post-training, and from baseline to follow-up, but no significant difference from post-training to follow-up.

INSERT TABLE 1 ABOUT HERE

Optimism about the proportion of people who would achieve lifetime recovery were retained at follow-up, these change were non-significant amongst those completing (n=28) the scales at both time-points (see Figure 1).

INSERT FIGURE 1 ABOUT HERE

Changes in behaviour and referral practice: Two of the follow-up sample (5.3%) had attended a 12-step meeting in the last month, with five (13.5%) reporting they had attended a mutual aid meeting in the last month (ie in the month between the training and follow-up interviews). There was much greater engagement with 12-step literature, with 20 of the follow-up group (52.6%) reporting that they had read 12-step literature at least once in the last month, while 20 (54.1%) reported that they incorporated the work of 12-steps into their day-to-day clinical work.

There were increases in the number of clients perceived suitable for referral to both AA (from a mean of 3.3 to 4.6) and other MA groups (from a mean of 4.2 to 4.8) and who were actually referred to AA (mean of 2.3 to 3.6) and to other MA groups (mean of 2.2 to 3.4) from baseline to follow-up, although these increases did not achieve statistical significance (see Table 2).

INSERT TABLE 2 ABOUT HERE

There was a strong correlation between the number of clients referred to AA and to other mutual aid groups in the past month ($r=0.90$, $p<0.001$), and referral was also linked to satisfaction with the training quality and implementation ($r=0.37$, $p<0.05$) as well as the rating for support and commitment for implementing training ($r=0.40$, $p<0.05$). In contrast, fewer referrals were associated with perceived barriers to referral ($r=-0.36$, $p<0.05$).

The optimal model for predicting the number of clients referred to AA in the last month (using a backwards elimination linear regression analysis), using variables significant in the above correlations, was strongly predictive (Adjusted R^2 of 0.646; $F=6.87$, $p<0.001$). Significant variables in the final model were (i) believing that 12-steps play an important role in a comprehensive treatment system; (ii) perceiving there to be fewer obstacles to referral; (iii) higher ratings for the training; and (iv) higher ratings for support and commitment from the worker's organisation about implementing the training.

In answer to a categorical question about whether workers referred people to AA (of 35 valid answers at both baseline and follow-up), the number of people who referred increased from 30 to 33, and no workers changed from a referring to a no-referral group ($X^2 = 12.73$, $p<0.05$). Similarly, while 27 of those successfully followed-up had referred people to mutual aid groups at baseline, this had increased to 30 by follow-up ($X^2 = 10.25$, $p<0.01$).

Discussion

Consistent with previous findings from UK studies of addiction workers attitudes to referral to 12-step and other mutual aid groups (Day et al, 2005; Gaston-Lopez et al, 2010), this Australian study showed low levels of knowledge at baseline and significant perceived barriers to referral. Levels of lifetime and recent meeting attendance among workers was also low, and this did not change notably by follow-up. Participants had a wide range of views about both AA and other mutual aid groups. Nonetheless, most workers reported generally positive attitudes about how helpful 12-step groups were, how important they were to the overall treatment system and about the importance of 12-step groups to the recovery process. More experienced workers typically reported more positive attitudes towards 12-step groups. Although baseline attitudes were generally positive, referral rates were typically low, with only two clients per worker on average referred to AA or other mutual aid groups in the past month at baseline (although this had increased in the follow-up sample), and a significant number making no referrals.

The training, consisting of brief presentations by one researcher (DB) and two AA representatives, was rated positively by workers and led to short-term increases in positive attitudes to mutual aid (and 12-step specifically) and a greater openness to referring clients. However, although the sample followed up one month later did report modest increases in mutual aid referral, attitudes had largely reverted to pre-training levels. Nevertheless, worker attitudes did not appear to be fixed, with considerable change noted post-training, suggesting the importance of including recovery and mutual aid training within professional development schemes.

Those who referred to AA were largely the same people who referred to other mutual aid groups, suggesting the issue in practice is around referral to community groups rather than AA in particular. It also suggests that workers do not have a fixed view about AA or other MA groups, suggesting that mutual aid group referral is more based on worker factors (including their own prior engagement with and membership of mutual aid groups), but that these

attitudes are influence by organisational culture and expectations within their workplace. Factors most strongly predictive of AA referrals in the past month were positive training ratings, perceiving fewer obstacles to engagement, and regarding 12-step groups as a key component of an effective treatment system. This last point is crucial in that there is existing evidence of an additive effect of formal treatment and 12-step programs (Kaskutas et al., 2009), and that 12-step groups should not be regarded either as an alternative to formal treatment or as only a free form of aftercare.

Although there was some attrition in the gains made in attitudes about AA and other MA groups following training, the findings suggest that many addiction professionals are open to revising their views on 12-step groups and recovery. This is supported by baseline attitude ratings, which showed surprisingly high levels of 'don't know' answers to questions about recovery and 12-step, suggesting that poor literacy around these issues is likely to influence clinician attitudes. This is a concern, as there is a growing evidence base (Manning et al., 2012; Timko et al., 2006) indicating assertive linkage to mutual aid groups by specialist AOD workers improves rates of referral as well as subsequent substance use behaviour. Thus, countering negative worker attitudes poor literacy, and increasing their active referral processes to mutual aid is likely to result in improved client outcomes and wellbeing.

There are a number of limitations to the current study that are worthy of comment. The most significant of these relate to representativeness – the relatively small samples of agencies and workers at baseline, and the relatively high drop-out rate at follow-up, also resulting in concerns about the adequacy of statistical power for a number of the comparison analyses conducted in the study. This means that we need to exercise caution in interpreting or extrapolating from these findings. Similarly, ratings were self-reported and there were no objective measures of behaviour. Nonetheless, informal communication from the AA service board in Victoria would suggest that they had experienced an increased number of referrals during the study, some of which were linked to the training offered. While AA were highly

supportive of the project, it may not necessarily be the case that in all areas such unreserved support and engagement would occur.

Overall, findings from this study indicate that workers both appreciate and benefit from training in AA and recovery, and that it has an impact on attitudes and behaviour, that is not restricted to AA. Indeed, workers generally became more positive about other mutual aid groups, with the number of referrals increasing as a result. Given the evidence base around 12 step groups as both adjunctive support for formal treatment and as aftercare, training in this area should be a core part of professional development activities.. Future research will need to consider how the initial changes identified following training can be sustained in the longer term, particularly in terms of referral to mutual aid and subsequent client outcomes.

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Table 1: Repeated measures ratings of 12-step at baseline, post-training and follow-up

	Baseline (1)	**Post-training (2)**	**Follow-up (3)**
N	**N = 38**	**N = 38**	**N = 38**
How helpful are 12-step groups?	7.0 (±1.6)[1,2]	8.1 (±1.5)[1,2; 2,3]	7.4 (±1.9), [2,3]
How important a role do you think 12 step groups play in a comprehensive treatment system?	6.8 (±2.0) [1,2]	8.0 (±1.6) [1,2; 2,3]	7.2 (±1.6) [2,3]
How important a role do you think 12 step groups play in the recovery process?	6.8 (±2.0) [1,2]	7.8 (±1.6) [1,2; 2,3]	7.2 (±1.7) [2,3]

Table 2: Repeated measures ratings of 12-step and other MA client suitability and referral practices at baseline and follow-up

	Baseline	One month follow-up	T, significance
How many of your clients did you think were suitable for AA referral in the last month?	3.3 (±4.21)	4.6 (±4.36)	1.34, p = 0.19
In the last month, how many clients have you referred to AA?	2.3 (±3.04)	3.6 (±4.40)	1,78, p = 0.08
How many of your clients did you think were suitable for other MA referral in the last month?	4.2 (±4.62)	4.8 (±4.82)	0.60, p=0.55
In the last month, how many clients did you refer to other MA groups?	2.2 (±3.93)	3.4 (±4.57)	1.41, p= 0.17

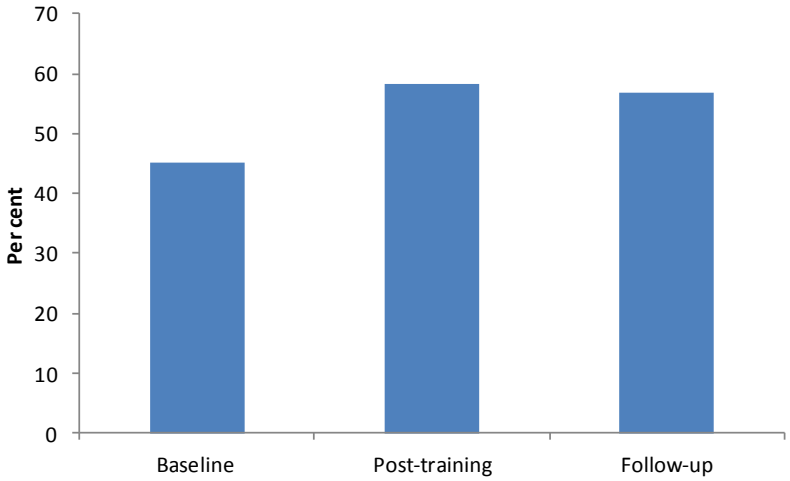

Figure 1: Perceived proportion of those with a lifetime dependence who will achieved sustained recovery