CRIME PREVENTION

New South Wales Government Attorney General's Department

Crime Prevention Division Level 5, Justice Precinct Offices 160 Marsden Street, Parramatta 2150 T: 02 8688 3277 F: 02 8688 9627 E: cpd_unit@agd.nsw.gov.au W: www.crimeprevention.nsw.gov.au

June 09

Women and the MERIT program

Martire, K. A., & Larney, S.

National Drug and Alcohol Research Centre

Executive Summary

Between 2004 and 2008, over 4,000 participants successfully completed the drug treatment intervention offered by the MERIT program. Over this period, female defendants were referred to MERIT in proportion to their rate of appearance in NSW Courts and were as likely as males to be accepted onto the program. However, women were less likely than men to complete the program once accepted. The difference in completion rates by gender was small but statistically significant (61% v. 66% respectively). Women presented with higher levels of drug dependence and poorer health and were also significantly more likely than men to be unwilling to take up the offer of participating in MERIT. Despite these differences, both female and male participants who completed the program showed equivalent gains over time. This includes significant improvements in dependence and psychological distress as well as general and mental health. Given the considerable gains associated with MERIT completion, focusing on ways to attract and retain female participants should be a priority for ongoing program development.

Background

The Magistrates Early Referral Into Treatment (MERIT) program is a pre-sentence diversion scheme operating through sixty-one New South Wales Local Courts [1, 2]. Specifically, MERIT seeks to intervene in the cycle of drug use and crime for adult defendants with a demonstrable illicit drug use problem. In doing so MERIT is one of a number of diversion initiatives in Australia [3, 4], which operate during the pre-plea phase of a court matter. This means that defendants willing and eligible to enter the MERIT program are able to access drug treatment and auxiliary support through the program prior to any admission of guilt. Previous analysis has found Aboriginality, age, previous gaol time, accommodation arrangements, principal income type, education level and principal drug of concern to be significantly related to MERIT program completion¹ [5].

Examination of the literature reveals that little previous research has focused specifically on the relative experiences of men versus women in drug diversion programs. This report aims to add to existing knowledge by investigating gender differences among clients accessing MERIT.

Outside the drug diversion context, international research has repeatedly documented the existence

1 Please note that the number of MERIT episodes, Aboriginality, and having served time in gaol are negative predictors of program completion, while age, cannabis as principal drug, full- or part-time employment and education are positive predictors of program completion.

of a disparity in rates of problematic substance use among males as compared to females [6]. This is also the case in NSW where in August 2006 the Australian Institute of Health and Welfare published a report from the National Minimum Dataset for Drug and Alcohol treatment indicating that males were significantly over-represented in NSW drug rehabilitation services [7]. This helps to explain why drug treatment and rehabilitation research has also traditionally focused on the outcomes for men rather than women. As a consequence of this, less is known about the female experience of such interventions in general. Yet, where comparisons have been made between men and women, differences in the antecedents to. and outcomes of, treatment have been identified [8]. For example, when compared to men, women with substance use problems have generally been found to have fewer opportunities to use drugs [9-11] and, to exhibit more rapid increases in the problematic use of alcohol, cannabis, opioids and cocaine [12]. Women are also more likely to seek [13] and engage with treatment [14], but are less likely to remain in treatment when compared to men [15-18]. While the precise factors which underpin these observed gender differences remain unclear, research has implicated the quality of family relationships and comorbid mental disorders (such as depression and antisocial personality disorder) in treatment participation [19].

Data

Sources

Program and health outcomes data from a cohort of MERIT participants with referral dates between August 2004 and June 2008 have been analysed for the purposes of this report. The data were extracted from NSW Health's MERIT Information Management System (MIMS), a database designed specifically to facilitate the monitoring and evaluation of the MERIT program. Program data includes client demographic information, as well as court dates, program entry and exit dates, and treatments received. Participants' health status was also assessed at program entry and again at program exit using the Severity of Dependence Scale (SDS) as a measure of drug dependence and the SF-36 Health Survey (SF-36) and the Kessler-10 Psychological Distress Scale (K-10) as indicators of physical and psychological well-being.

To assist in determining MERIT participants' rate of reoffending after leaving the program, data pertaining to offences and criminal justice outcomes were provided by the NSW Bureau of Crime Statistics and Research from its Reoffending Database (ROD). MERIT clients participating between January 1st 2004 and December 31st 2005 were included in this cohort to allow for a standard two year follow-up period.

Focus groups were conducted with MERIT teams from five Area Health Services² as a way to expand upon and interpret the findings from the empirical analysis. These interviews were conducted on-site between September 29th and October 14th 2008 with the Greater Murray, North Sydney, South Eastern Sydney, Central Sydney, Wentworth and Western Sydney teams. It is important to note that the state-wide trends documented in this report are not necessarily observed in each individual MERIT site due to regional variations in clients' demographic, substance use and offending characteristics as well as treatment resources.

Analysis

Where the sample size was large, i.e., more than 1,500 participants, categorical data were analysed using the chi-square (χ^2) statistic and a significance level of .01 (rather than the conventional .05 level) in order to minimize the reporting of statistically significant effects with limited clinical significance. In instances where there were fewer than 1,500 participants in the analysis, the .05 criterion was adopted to increase the statistical power. For multidimensional chi-squares,

2 Focus groups were conducted with MERIT teams from the Greater Southern, North Sydney/Central Coast, South Eastern Sydney/Illawarra, Sydney South West and Sydney West Area Health Services.

adjusted standardised residuals (ASR) were analysed to identify factors contributing significantly to observed differences, with ASR of greater than \pm 2 taken as significant. Continuous, normally distributed data were analysed using t-tests (t) and mixed ANOVA (F). Mann-Whitney U was used to analyse non-normally distributed data. χ^2 was used to assess categorical data and logistic regression was used to identify predictors of drug convictions post-MERIT.

Given the varied cohorts used, participant flow diagrams documenting the sample source and size have been included for each set of analyses to assist with interpretation of results.

Limitations

Program attrition, the necessity to leave a two-year follow-up for the reoffending analysis, and the focus on a minority group, serves to substantially reduce the size of the sample for analysis. It should also be noted that when conducting the reoffending analysis the MIMS and BoCSAR cohorts differ considerably in size (6,626 and 1,315 cases respectively). Moreover, it is also likely that a strong selection bias is in place with regard to the health outcomes information, as only clients who completed the MERIT program provided health information post-participation. Thus, it is likely that changes observed between pre- and post-participation measures for program completers may be significantly larger than those likely to be observed for all MERIT clients. This limits the extent to which inferences made from these analyses generalise across contexts.

It should be noted that any changes associated with program completion may reflect an effect of time, treatment in general, or the MERIT program specifically. This study does not contain the "no-treatment" control group necessary to disentangle these possible interpretations.

Program Activity

Of the 10,484 program referrals with gender information available (Figure 1), one-fifth (n=2,124) were women. The number of women referred to MERIT is proportionally similar to the number of women convicted in NSW Local Courts in 2006 and 2007³.

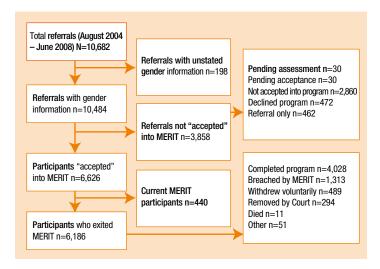


Figure 1: Participant flow diagram for program activity

There was no significant difference in program acceptance rates for males and females; 65% (n=1,372) of female referrals and 63% (n=5,254) of male referrals were accepted into MERIT.

However, *reasons* for non-acceptance to the program did differ by gender^a with women more likely to indicate that they were not willing to participate in MERIT, while men were more likely to be ruled ineligible after referral (Figure 2). MERIT team members reported that, in their experience, women were at times less willing than men to participate in the program because they were more likely to have family responsibilities, and consequently to be more concerned regarding the mandatory child protection obligations of the MERIT team [20].

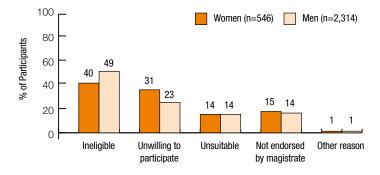


Figure 2: Reasons for non-acceptance to MERIT program, by gender (n=2,860)⁴

Gender differences are also evident in relation to program exit status^b. As shown in Figure 3, women were significantly less likely than men to complete the MERIT program. Breach of program rules was the most common reason for non-completion for both men and women; however, women were significantly more likely to exit the program for this reason.

MERIT team members indicated that female participants were most frequently breached from the program due to non-attendance. Across multiple sites these breaches were attributed to perceptions that whilst almost all MERIT participants led chaotic lifestyles, women often had an even more complex range of commitments. MERIT staff also suggested that the rates of co-morbid chronic mental health disorders and trauma were noticeably higher among female clients and that this would negatively impact upon participation in the program⁵. Taken together with the findings that women are less willing to participate in, and less likely to complete MERIT, team feedback suggests that complex social responsibilities and mental health disorders pose a significant barrier to female participation.

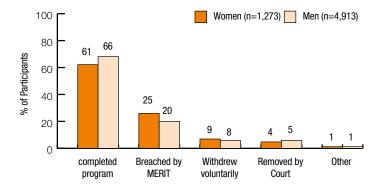


Figure 3: Program exit status, by gender (n=6,186)

³ According to the NSW Criminal Court Statistics 2007 reported by the NSW Bureau of Crime Statistics and Research in 2008, female defendants represented approximately 19% of all persons convicted in NSW in 2006 and 2007.

⁴ Category 'ineligible' includes those not eligible for bail, those with no demonstrable drug problem, juveniles and those charged with strictly indictable offences.

⁵ This finding differs from previous analyses presented in MERIT annual reports where gender was not found to be significantly associated with program completion. This variation may result from differences in the sample sizes used.

Demographic Characteristics

Complete case-files were available for 5,024 "accepted" MERIT participants (Figure 4)⁶.

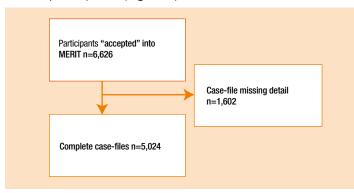


Figure 4: Participant flow diagram for demographic characteristics

On average female participants in the MERIT program were one year older than male participants (median 29 years vs. 28 years respectively); although small, this difference was statistically significant and consistent with MERIT staff perceptions that female participants were older than the males.

Female participants were more likely to identify as Aboriginal (22% of women vs. 13% of men)^d. There were no significant differences between men and women with regards to educational attainment; however, men were more likely than women to report having been incarcerated (38% vs. 30%)^e.

There were significant differences between men and women in terms of their main source of income^f. Men were more likely than women to report being in full-time employment, to be receiving a temporary benefit, or to report no income. Women were more likely than men to report receiving a pension (see Figure 5); MERIT teams indicated that these were most likely to be either disability or single parent subsidies.

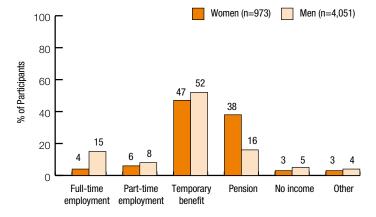


Figure 5: Main income source, by gender (n=5,024)

Women had more dependent children than men (mean 1.3 vs. 0.8)^g. The majority of both women and men reported living in rental accommodation. However, a greater percentage of men (28%) were living in privately owned homes (either their own or someone else's) compared to women (20%). Moreover, women were more likely to be living with children and men were more likely to be living with their parents. See Figure 6 below for a comparison of living arrangements by gender.

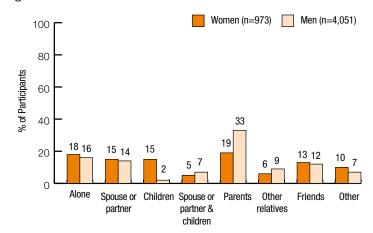


Figure 6: Living arrangements, by gender (n=5,024

Service Provision

Of the 6,186 participants who exited MERIT in the study period (Figure 7), women spent significantly fewer days in the MERIT program than men (77 days vs. 80 days)^h.

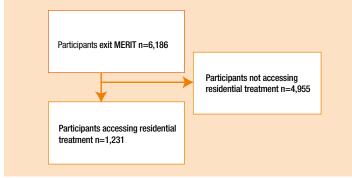


Figure 7: Participant flow diagram for service provision

4

^{6 1,602} case-files did not include data regarding participant age or the number of dependent children.

While in the program participants receive support and case management from MERIT caseworkers. In addition, participants may be referred to external treatment providers. Data on external treatment access were available only for residential treatments (e.g. inpatient detoxification and residential rehabilitation). Men were significantly more likely than women to access residential treatment (19.1% vs. 16.6%)ⁱ. However, there were no gender differences in the *types* of residential treatments accessed (Figure 8) or in the total number of days women and men spent in these programs (31 days vs. 36 days).

MERIT staff attributed gender differences in the rate of participation in residential treatments to numerous factors including the complex presentation of female clients (e.g., high rates of trauma, suicidal ideation, self harm, and eating and personality disorders), their large numbers of competing responsibilities (children, family and spouse/partner), the stricter more complex entry requirements associated with detoxification and rehabilitation programs for those drugs principally used by women (c.f. cannabis, See Figure 10), delays associated with securing places at facilities catering for women and children, and pressures to maintain public housing tenancies particularly where children are involved.

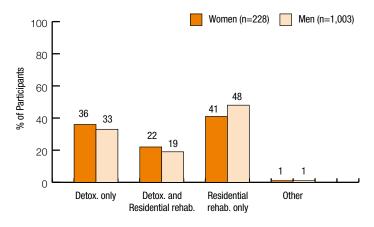


Figure 8: Residential treatment accessed, by gender (n=1,231)

Health Outcomes

Drug use

Data on principal drug of concern were available for 6.617 participants (99.8%) in the cohort (Figure 9).

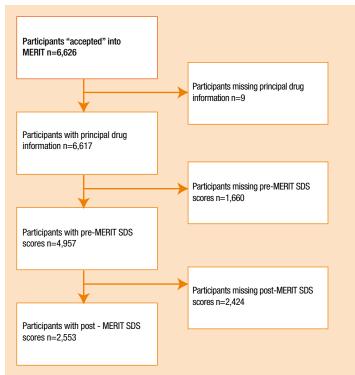


Figure 9: Participant flow diagram for drug use

There were significant gender differences among principal drug used by program participants (see Figure 10)⁷. Women were more likely to cite meth/amphetamine, heroin or benzodiazepines as their principal drug, while men were more likely to nominate cannabis as their principal drugⁱ.

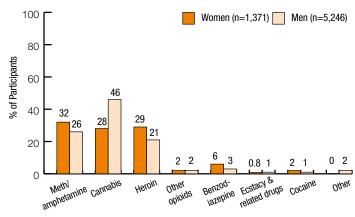


Figure 10: Principal drug, by gender (n=6,617)

⁷ For the purposes of analyzing principal drug use, methamphetamine and amphetamine were coded as "meth/amphetamine". Non-heroin opioids such as methadone, codeine and morphine were coded as "other opioids". Ecstasy, GHB and Ketamine are included in the category "ecstasy and related drugs".

Among both women and men, the mean number of days of principal drug use per month decreased significantly from pre-MERIT to post-MERIT for most drug classes measured^k, for example meth/amphetamine use decreased from 10 days of use pre-MERIT to 3 days use post-MERIT participation. The only exceptions were other opioid and cocaine use among women, although it is emphasised that few women reported these as their principal drug and hence it is difficult to identify a significant decrease in use.

Program participants completed the Severity of Dependence (SDS) scale, with higher scores indicating a greater level of drug dependence [21]. Pre-MERIT, women had higher SDS scores than men¹ (Figure 11), however, given that both men and women had SDS scores well above established cut-offs for dependence, this difference is unlikely to be clinically important. Post-MERIT, there was no significant gender difference in SDS scores. Of those participants who completed both pre- and post-measures the decrease in SDS scores over time was statistically significant for both men and women^m.

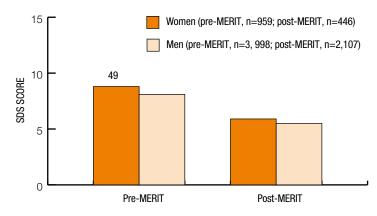


Figure 11: SDS scores pre- and post-MERIT, by gender (pre-MERIT, n=4,957; post-MERIT, n=2,553)

The mean number of drug classes used by participants decreased from 3.3 to 2.5 after MERIT participationⁿ. There were no gender differences in polydrug use.

Health status

Health status of participants was assessed using the Kessler-10 Psychological Distress Scale (K-10) [22] and the SF-36 Health Survey (Figure 12) [23].

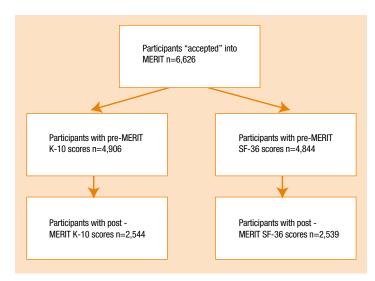
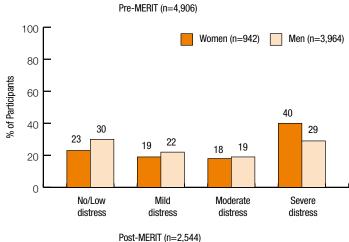


Figure 12: Participant flow diagram for health status data

As shown in Figure 13, women were significantly more likely than men to be experiencing severe psychological distress at program entry and exit^o. Although K-10 scores decreased significantly over time for both men and women who completed the pre- and post-measures^o, there remained a minority of participants experiencing mild to severe psychological distress at program exit. Proportionally more of these were women.



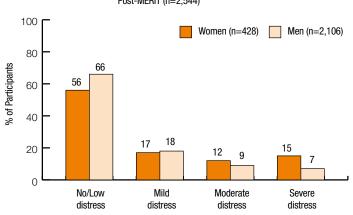


Figure 13: Distribution of K10 scores, by gender

The SF-36 assesses a range of health status measures, including general health, mental health, bodily pain and physical functioning, with lower scores indicating poorer health. At program entry and exit, women had significantly poorer general^q and mental^r health scores than men (Figure 144). At program exit, men, but not women, were approaching the same level of general and mental health as reported in the broader Australian population [24]. Among participants with pre- and post-MERIT SF-36 scores, both general health and mental health significantly improved over time, regardless of gender⁸.

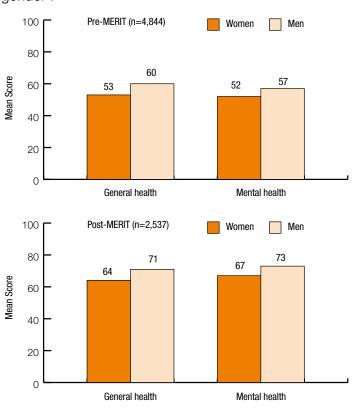


Figure 14: Mean SF-36 General Health and Mental Health subscale scores, by gender

Together, these self-report measures of drug dependence and well-being support staff suggestions that female clients participating in MERIT experience poorer general and mental health than male participants.

Criminal Justice Outcomes

Criminal justice outcomes data were sought for all MERIT participants exiting the program from August 2004 until December 2005 (see Figure 15).

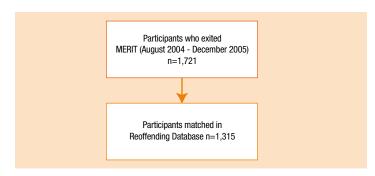


Figure 15: Participant flow diagram for criminal justice outcomes

Among the criminal justice subsample, data were available on the number of conviction episodes⁹ a participant had in the nine years prior to entering the MERIT program. Men had a median of five prior conviction episodes, compared to four among women. Both women and men had a median of two prior custodial sentences even though Australia-wide the rate of incarceration for males is 13.4 times greater than that for women [25].

There were significant differences between women and men with regards to the index offence for which they had been referred to the MERIT program, with women more likely than men to be referred for theft offences^t (Figure 16).

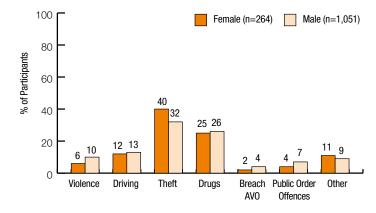


Figure 16: Index offence, by gender (n=1,315)

After exiting the MERIT program (e.g. completing or being removed from the program), participants who are found guilty of the index offence are sentenced; there were no gender differences in the types of penalties imposed for the index offence.

Sixty per cent of participants (n=786) were convicted of a new offence between the index offence finalisation date and the 31st December 2007. Men and women were equally likely to be convicted of a new offence (58% v 60%) however there were differences in the types of offences for which convictions were received. Women were significantly more likely than men to be

^{9 &}quot;Conviction episode" refers to the number of Court appearances at which a conviction on one or more charges was recorded.

⁸ See Sources under the Data subheading for more information on this subsample.

convicted of a theft offence^v. Men were significantly more likely than women to be convicted of a violent offence¹⁰ or breach of an apprehended violence order^x (Figure 17). Statistically, women and men took an equivalent length of time to reoffend (average of 547.6 v 519.3 days respectively)^y.

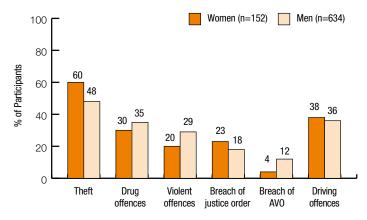


Figure 17: Convictions between index offence finalisation and 31st Dec 2007, by gender (n=786)¹¹

Particular attention was given to assessing a limited set of predictors of conviction for a new drug offence using regression analysis¹². Whilst the focus of this analysis was to investigate the role of gender in recidivism, a select number of other predictors were also included to increase the validity of the inferences made. Univariate relationships between convictions for new drug offences and demographic, prior conviction and MERIT program completion variables were assessed using logistic regression. Program completion and fewer previous conviction episodes were significantly associated with decreased odds of a new drug offence conviction. These variables were entered into a multivariate logistic regression model. Only the number of prior conviction episodes remained a significant predictor of new drug offence convictions (Table 1), with a greater number of prior convictions associated with increased odds of being convicted for a drug offence post-MERIT.

Table 1: Predictors of post-MERIT convictions for drug offences

	Univariate logistic regression		Multivariate logistic regression	
Predictors Analysed	р	OR (95%CI)	р	AOR (95%CI)
Gender (male=0, female=1)	.2	1.3 (0.9-1.8)		
Age	.8	1.0 (0.9-1.01)		
Number of conviction episodes	<.0001	1.09 (1.05-1.1)	<.0001	1.09 (1.05-1.1)
Program completion (completers = 0, non-completers =1)	.03	1.4 (1.0-1.8)	.2	1.2 (0.9-1.7)

Focus Group Feedback

In addition to responding to the results of empirical analyses, MERIT team members were asked to talk about the steps taken when responding to the needs of female clients and to outline any recommendations they would implement to further facilitate female participation in MERIT.

Responsitivity

Although team members across sites aspired to be responsive to the needs of *all* of their clients, differences in the services offered to female clients were noted. Specifically various teams indicated that they would offer females:

- A more detailed/sensitive explanation of the requirements of mandatory reporting.
- A gender choice in clinician where possible.
- The option not to participate in psycho-educational groups where the gender composition of the group was unbalanced.
- Access to female-only therapeutic groups e.g., anger management.
- Referrals to local women's health centres, sexual health services and refuges.

Recommendations

Team members suggested that female participation in the MERIT program could be improved by:

- Greater availability of detoxification and rehabilitation services specifically for women i.e., with capacity and willingness to deal with more complex client presentations.
- Greater availability of general detoxification and rehabilitation places for females.
- More resources (i.e., referral networks) for female clients with children.
- Improved access to, and cooperation with, noncrisis mental health networks and services.

8

¹⁰ Offences classified as violent offences were assault and sexual assault. Defendants charged with offences involving significant violence are ineligible for the MERIT program [26].

¹¹ It is important to note that Figures 16 and 17 are not directly comparable; Figure 16 reports one index offence per participant, while Figure 17 reports all subsequent types of offences participants were convicted of after their index offence.

¹² Offences classified as drug offences were drug dealing, cultivation of controlled substances, drug possession and use and possession of drug use implements.

Discussion

Overall, the data suggests that female participants in the MERIT program differ from male participants in a number of significant ways. Women are less likely to accept a place in MERIT when it is offered to them, and are also less likely to successfully complete the program or to access residential treatment. In addition, females are more likely to be referred to the service with problematic meth/amphetamine, heroin or benzodiazepine use, to have a greater number of dependent children, and to present with significantly lower levels of general and mental health. They also enter the program reporting significantly higher levels of drug dependence than their male counterparts. Feedback from MERIT team members suggests that, notwithstanding the serious health and social challenges facing male participants, the results of the analyses are consistent with their experience of female participants as a more entrenched, complex and chaotic group when compared to men. Staff cite parental and family demands, co-morbid chronic mental health disorders, and frequent trauma as key barriers to full involvement in, and compliance with, the MERIT program among women.

Differences aside it is important to note, however, that program completion appears to be associated with equal benefits for men and women. Specifically, although women entered the program with significantly poorer presentations than men in terms of dependence level, psychological distress, general and mental health, female participants were found to improve in these domains as much as men across the course of the program. Moreover, gender was not found to be a significant predictor of drug related reoffending amongst the cohort even though female participants left MERIT with higher levels of dependence than men. Instead, analysis revealed that program completion was a significant univariate protective factor, with only the number of previous conviction episodes reducing the likelihood of future drug offences in multivariate analyses. Despite the absence of gender differences on these measures, it does appear that drug diversionary schemes have scope to be more responsive to the needs of female clients if they intend to provide equitable and effective service to all participants. In particular, steps need to be taken to attract and retain more females in the program, as the evidence suggests that there are gains to be made in the domains of substance dependence, health and reoffending for those who are able to complete the program¹³.

Acknowledgements

The authors of this report would like to thank Kevin Roberts and Peter Didcott from NSW Health for the provision of MIMS and health outcomes data. Their support and assistance throughout data receipt and interpretation made this report possible.

The authors would also like to thank the Assistant Director General, Crime Prevention and Community Programs and staff of the Crime Prevention Division of the NSW Attorney General's Department, and, in particular, Bruce Flaherty and Karen Patterson. Thanks also to Craig Jones from the NSW Bureau of Crime Statistics and Research for providing criminal justice outcomes data for the cohort of MERIT participants.

Finally, the authors would like to give special thanks to those MERIT managers and teams who participated in focus groups, as well as all those who reviewed earlier versions of this report. Their considered and constructive feedback throughout the drafting of this document was invaluable.

The MERIT program is funded under the Commonwealth/NSW COAG Illicit Drug Diversion Initiative.

¹³ It is important to note that changes associated with program completion may reflect an effect of time, treatment in general, or the MERIT program specifically. This study did not contain the "no-treatment" control group necessary to disentangle these possible interpretations.

References

- 1. Reilly, D., Scantleton, J., & Didcott, P. (2002). Magistrates' Early Referral into Treatment(MERIT): Preliminary findings of a 12-month court diversion trial for drug offenders. *Drug and Alcohol Review, 21*(4), 393-396.
- 2. Passey, M., Flaherty, B., & Didcott, P. (2006). The Magistrates Early Referral into Treatment (MERIT) Pilot Program: A descriptive analysis of a Court diversion program in rural Australia. *Journal of Psychoactive Drugs*, 38(4), 521-529.
- 3. Spooner, C., Hall, W., & Mattick, R.P. (2001). An overview of diversion strategies for Australian drug-related offenders. *Drug and Alcohol Review, 20*(3), 281-294.
- 4. Hughes, C., & Ritter, A. (2008). A summary of diversion programs for drug and drug-related offenders in Australia. Sydney: National Drug and Alcohol Research Centre.
- Matrugilio, T. (2008). MERIT Annual Report 2006. Sydney: Crime Prevention Division, NSW Attorney General's Department.
- Hall, W., Teesson, M., Lynskey, M., & Degenhardt, L. (1999). The 12-month prevalence of substance use and ICD-10 substance use disorders in Australian adults: findings from the National Survey of Mental Health and Well-Being. Addiction, 94(10), 1541-1550.
- AlHW. (2006). Alcohol and other drug treatment services in NSW 2004-2005: Findings from the National Minimum Dataset (NMDS). Canberra: Australian Institute of Health and Welfare.
- 8. Zickler, P. (2000). Gender differences in drug abuse risks and treatment. *NIDA Notes*, *15*(4).
- 9. Van Etten, M.L., Neumark, Y.D., & Anthony, J.C. (1999). Male-female differences in the earliest stages of drug involvement. *Addiction*, *94*, 1413–1419.
- 10. Zickler, P. (2000). Gender differences in the prevention of drug abuse traced to opportunities to use. *NIDA Notes*, *15*(4).
- Van Etten, M.L. & Anthony, J.C. (2001). Male-Female differences in transitions from first drug opportunity to first use: Searching for subgroup variation by age, race, region, and urban status. *Journal of Women's Health & Gender-Based Medicine, 10*(8), 797-804.
- 12. Becker, J.B.& Hu, M. (2008). Sex differences in drug abuse. *Frontiers in Neuroendocrinology*, 29(1), 36-47.
- Schutz, C.G., Rapiti, E., Vlahov, D., & Anthony, J.C. (1994). Suspected determinants of enrolment into detoxification and methadone maintenance treatment among injecting drug users. *Drug and Alcohol Dependence*, 36(2), 129-138.
- Fiorentine, R., Anglin, M.D., Gil-Rivas, V., & Taylor, E. (1997).
 Drug treatment: explaining the gender paradox. Substance Use & Misuse, 32(6), 653-78.
- 15. De Leon, G. (1984). Program-based evaluation research in therapeutic communities. *Drug Abuse Treatment Evaluation: Strategies, Progress, and Prospects*.
- Knight, K., & Hiller, M.L. (1997). Community-based substance abuse treatment: A 1-year outcome evaluation of the Dallas County Judicial Treatment Center. Federal Probation, 61.
- 17. Sansone, J. (1980). Retention patterns in a therapeutic community for the treatment of drug abuse. *Substance Use & Misuse*, *15*(5), 711-736.
- 18. Hanson, G.R. (2002). In drug abuse, gender matters. *NIDA Notes, 17*(2).

- Pelissier, B. (2004). Gender differences in substance use treatment entry and retention among prisoners with substance use histories. *Journal of the American Public Health Association*, 94, 1418-1424.
- Children and Young Persons (Care and Protection) Act, 1998 (NSW), s27.
- Gossop, M., Darke, S., Griffiths, P., Hando, J., Powis, B., Hall, W., & Strang, J. (1995). The Severity of Dependence Scale: Psychometric properties of the SDS in English and Australian samples of heroin, cocaine, and amphetamine users. *Addiction*, 90, 607-614.
- Kessler, R.C., Andrews, G., Colpe, L.J., Hiripi, E., Mroczek, D.K., Normand, S.L., Walters, E.E., & Zaslavsky, A.M. (2002). Short screening scales to monitor population prevalences and trends in non-specific psychological distress. *Psychological Medicine*, 32, 959-976.
- 23. Ware, J.E., Snow, K.K., & Kosinski, M. (1993). *SF-36 health survey manual and interpretations guide.* Boston: Health Institute, New England Medical Center.
- Australian Bureau of Statistics (1997). National Health Survey. SF-36 Population Norms 1995. Canberra: Commonwealth of Australia.
- 25. Dearden, J. and S. Bricknell. (2008). *Australian Crime Facts & Figures 2007*. Canberra: Australian Institute of Criminology.
- 26. Chief Magistrate of NSW (2002). Magistrates Early Referral Into Treatment (MERIT) Programme. (Local Court Practice Note No. 5). Sydney, Australia.

No.5 CRIME PREVENTION ISSUES 10

Notes

```
^{a}\chi^{2}=19.1, df=4, p=.001
^{b}\chi^{2}=17.4, df=5, p=.004
° Mann-Whitney U, Z=-4.5, p<.0001
^{d}\chi^{2}=58.6, df=2, p<.0001
^{\rm e}\chi^2=22.4, df=2, p<.0001
^{\rm f}\chi^2=283.4, df=8, p<.0001
gt=11.6, df=6,624, p<.0001
^{\text{h}} t=-2.8, df=6,183, p=.005
^{i}\chi^{2}=4.4, df=1, p=.04
<sup>j</sup>χ<sup>2</sup>=154.9, df=7, p<.0001
```

Women						
	Pre-MERIT days of use per month	Post-MERIT days of use per month	<i>t</i> , df, <i>p</i>			
Meth/amphetamine	10	3	8.1, 119, <.001			
Cannabis	20	9	11.2, 162, <.001			
Heroin	13	3	8.4, 108, <.001			
Other opiates	11	0.4	1.9, 4, .138			
Benzodiazepine	17	8	2.6, 29, .02			
Cocaine	0.5	0.3	.52, 3, .6			

Men						
	Pre-MERIT days of use per month	Post-MERIT days of use per month	t, df, p			
Meth/amphetamine	8	2	15.5, 450, <.001			
Cannabis	20	7	35.0, 1085, <.001			
Heroin	12	2	11.0, 377, <.001			
Other opiates	9	3	3.7, 33, .001			
Benzodiazepine	13	6	5.2, 63, <.001			
Cocaine	6	0.7	3.6, 29, .001			

¹*t*=5.5, df=4,955, *p*<.0001

 $^{^{}m}F$ =588.5, df=1, p<.0001

ⁿF=539.6, df=1, p<.0001

[°] Entry: χ^2 =49.4, df=3, p<.0001. Exit: χ^2 =33.1, df=3, p<.0001

^pWomen pre-MERIT mean±SD=27.2±8.4, post-MERIT mean \pm SD=20.1 \pm 8.2, paired samples t=17.5, df-426, p<.001. Men pre-MERIT mean±SD=24.4±8.4, post-MERIT

mean±SD=17.9±6.9, paired samples *t*=35.4, df=2081, *p*<.0001

^q Entry: *t*=-8.6, df=4,842, *p*<.0001. Exit *t*= -6.8, df=2,537, *p*<.0001

 $^{^{\}text{r}}t$ =-6.3, df=4,842, p<.0001. Exit t= --5.9, df=2,537, p<.0001

^s SF-36 general health F=466.1, df=1, p<.0001, SF-36 mental health F=699.9, df=1, p<.0001

 $^{^{}t}\chi^{2}=13.6$, df=6, p=.03

 $^{^{\}rm u}\chi^2=8.0$, df=6, p=.2

 $^{^{}v}\chi^{2}=6.8$, df=1, p=.009

 $^{^{\}text{w}}\chi^2=4.3$, df=1, p=.04

 $^{^{}x}\chi^{2}=8.2$, df=1, p=.004y t=1.11, df=1313, p=.265

