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**Detoxification in Rehabilitation in England: Effective continuity of care
or unhappy bedfellows?**

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Abstract

There is evidence that residential detoxification alone does not provide good treatment outcomes [1] and that outcomes are significantly enhanced when clients completing residential detoxification attend rehabilitation services [2]. One way of increasing the likelihood of this continuity of treatment is by providing detoxification and rehabilitation within the same treatment facility. The current study compares self-reported treatment provision in 87 residential rehabilitation services in England, 34 of whom (39.1%) reported that they offered detoxification services within their treatment programmes. Although there were no differences in treatment philosophies, residential rehabilitation services that offered detoxification were typically of shorter duration, had significantly more beds and reported offering more group work than residential rehabilitation services that did not offer detoxification. Outcomes were also different with twice as many admissions discharged on disciplinary grounds from residential rehabilitation services without detox facilities. The paper questions the UK classification of residential drug treatment services as either detoxification or rehabilitation and suggests greater clarification of function and aims in the classification of residential drug treatment.

Introduction

The history of residential rehabilitative drug treatment in England was heavily influenced by the US Minnesota Model and was originally established in 1974, in a centre called Broadway Lodge to provide residential treatment for British alcoholics [3]. The original model expected recovery to be a process, in which natural support systems were engaged, but in which the drinker (and subsequently drug user) had full responsibility for their cure [4]. Leighton and Barton argue that the current incarnation of residential treatment allows a safe and controlled environment of sufficiently short duration to prevent institutionalisation [3].

Two recent publications by the National Treatment Agency [5,6] have emphasised the variability in provision of residential drug treatment services in England. Day et al expressed concerns about the variability in the length and method of detoxification, the variability in the range and type of psychosocial provision and the inconsistency of provision of harm reduction and health services for those attending in-patient detoxification. However, one of the key grouping variables identified was the type of facility in which detoxification from drugs occurred, with a differentiation made between three broad groups of settings – general psychiatry units, specialist addiction detoxification services and residential rehabilitation provision that provide ‘front end’ detoxification. The problems identified in the review varied across settings, with the greatest concern about detoxification in residential rehabilitation (RR) services relating to the adequacy and quality of medical care, the suitability of the facilities and the number of appropriately trained medical staff available.

Best et al examined residential treatment needs in England and found that rehabilitation services were particularly concerned with the suitability of the clients who were referred into their services and about the continuity of care that was available. In an editorial, Best, Day and Keaney [7] concluded that “There are major structural problems to be overcome in improving the quality and effectiveness of residential drug treatment, and these require more flexible provision, better planning and integration with other aspects of care, improved monitoring, evaluation and research” (Best, Day and Keaney, 2005).

The notion of integration derives from UK evidence that shows significantly better outcomes when in-patient detoxification is followed up with residential rehabilitation. Ghodse et al [2] reported significantly lower rates of relapse in clients completing detoxification when this was immediately followed by residential rehabilitation treatment than when this was not available.

Therefore, there are grounds for assuming that, if it were possible to provide detoxification and rehabilitation within the same treatment context and to a satisfactory level of clinical care, it would reduce the likelihood of treatment drop-out between services and increase the continuity of care. However, little is known about the provision of detoxification services within residential rehabilitation facilities, and what form this takes. The current investigation seeks to assess the extent to which RR services in England offer detoxification and what other facilities are offered in services that do so.

Method

The current study builds on a survey investigating retention in RR services [8]. The survey reports on the treatment available in residential rehabilitation services, with the method of recruitment and survey outlined in the earlier paper. A total of 95 residential rehabilitation services for drug users were identified. Eight services were later excluded as they did not meet inclusion criteria, leaving a final study sample of 87 services.

A 5-page questionnaire was designed to gather information on a range of treatment and service characteristics (see 6), and was piloted with the managers of a therapeutic community (TC) and a 12-step programme. The instrument measured rates of treatment completion, dropouts and disciplinary discharges, treatment philosophy (12-step, 12-step based, TC, TC-based, eclectic/faith-based/other), planned duration of treatment, number of beds, variables relating to admission, to staffing, to the treatment programme, and to the physical environment. Data from a second source, the National

Treatment Agency online residential services directory (www.nta.nhs.uk) was used to validate and augment the available data.

Results

Of the 87 services, 34 (39.1%) reported that they provided drug detoxification, with the remaining 53 services providing rehabilitation only, ie treatment programmes did not include any formal treatment for any physical dependency experienced by the client.

Of the 34 services that provided detoxification, 15 described their treatment philosophy as either '12-step' or 'modified 12-step', ten as 'therapeutic communities' or 'modified therapeutic communities', four as 'psychotherapy oriented' and five as 'eclectic or other'. There was no significant difference in therapeutic philosophy between those that offered detoxification and those that did not ($\chi^2 = 5.48$, $p=0.36$, ns).

The most striking difference between the facilities was in the levels of medical care provided. When asked whether medical care was provided, all 34 services that offered detoxification reported that they provided medical services (100%), compared to only 30 of the 53 RR services where detoxification was not provided (56.6%, $\chi^2 = 20.06$, $p<0.001$). Perhaps surprisingly, there was no difference by treatment philosophy in the availability of medical provision, with 79.4% of 12-step or modified 12-step services reporting that medical provision was available (27/34) compared with 73.5% of therapeutic communities or modified TCs (25/34) and 63.2% of other philosophies (12/19; $\chi^2 = 3.26$; $p = 0.66$).

Whether services saw more primary drug or primary alcohol users did not vary according to detoxification status ($\chi^2 = 0.15$, $p=0.90$, ns). There was also no difference in whether the service was willing to accept clients referred from criminal justice settings (90.9% compared to 96.1% in services where detoxification was not available, $\chi^2 = 0.96$, $p=0.33$, ns) but services offering detoxification were significantly more likely to take clients with a dual diagnosis (81.8% compared with 52.9%, $\chi^2 = 7.28$, $p<0.01$).

Programme characteristics and activities

It is in terms of programme characteristics that the most striking differences were observed between RR services that offered detoxification and those that did not (see Table 1 below). Where detoxification was provided the mean scheduled programme length was markedly shorter (15.5 weeks versus 26.9 weeks, $t=3.89$, $p<0.001$) and the services typically contained more beds (detoxification included, mean = 31.6 beds; no detoxification, mean = 18.1 beds; $t=3.34$, $p<0.01$). The number of admissions in 2004 was also significantly higher for services that offered detoxification (144.1 compared to 44.6, $t=4.13$, $p<0.001$). There was no difference in the mean bed occupancy rate in 2004.

Insert Table 1 about here

The questionnaire also assessed the activities undertaken by clients in a typical week, assessing the average amounts of time spent in individual and group therapeutic work, in domestic activities, in structured leisure time, in educational activities and that was free (see Meier and Best, in press). There were some notable differences in terms of the programme characteristics between the services as shown in Table 2 below, as a function of whether the services included a detoxification component. Individuals attending RR services that included detoxification spent significantly more time in group counselling each week over the period of their stay (937.5 minutes compared to 606.8 minutes, $t=2.67$, $p<0.05$) but significantly less time involved housekeeping work each week (328.2 minutes compared to 489.9 minutes, $t=2.08$, $p<0.05$). There were no significant differences in the time spent in individual counselling sessions, lectures, or organised leisure time.

Insert Table 2 about here

Unit staffing

There were significantly more therapeutic staff working in RR services that provided detoxification than in those that did not (mean = 10.7, compared to 5.5, $t=3.63$, $p<0.01$). However, when this is re-calculated as a ratio of clients to each member of therapeutic staff, this difference disappears – in RR services that provide detoxification, there are 3.5 beds to every member of therapeutic staff and in services where no detoxification is provided, there are 3.7 beds to every member of therapeutic staff ($t=0.54$, $p=0.59$, ns).

Similarly, there is a higher mean number of all staff in services where detoxification is provided (35.6 members of staff on average compared to 10.1 in services where no detoxification is provided; $t=4.42$, $p<0.001$). This difference remains significant even when this is re-calculated as a ratio of staff to beds. In RR services that provided detoxification, there is a ratio of 1.1 beds for every member of staff working on the unit compared to a ratio of 1.9 beds to each member of staff where no detoxification is provided ($t=4.50$, $p<0.001$).

Retention

Programme retention rates varied between programmes that included detoxification compared to those not including detoxification, with programmes with detoxification having higher completion rates (51.3% compared with 46.4%). However, the difference in completion rate failed to reach statistical significance ($t=0.93$, $p=0.36$). Given their shorter average duration, it is perhaps surprising that RR services with detoxification also had a slightly higher proportion of clients dropping out of treatment (again this difference was not significant: 35.1% compared with 29.9%, $t=0.79$, $p=0.44$). The seeming contradiction in the above is accounted for by the fact that the proportion of admissions disciplinarily discharged was significantly higher in services without a detoxification facility (23.2% compared to 11.7%, $t=3.28$, $p<0.01$). This difference is illustrated in Table 3 below, with the number of days to departure given, on average, for those clients who completed treatment, who dropped out of treatment and for those who were discharged on disciplinary grounds. While clients attending RR services without detoxification had longer mean stays when completing or discharging

themselves, this picture was reversed for disciplinary discharges. Those who are discharged on disciplinary grounds in RR services without detoxification are typically discharged within the first ten days, while those discharged from RR services with detoxification are typically discharged after 19 days, possibly around the time of the completion of the physical detoxification.

Insert Table 3 about here

Discussion

As in many other countries, British residential programmes in particular have grown out of very different non-professional and ideological systems. They tend to offer an array of treatment options which are often insufficiently evidence based and consequently residential services vary widely in programme structure, provision of psychosocial services and detoxification, staffing levels and treatment goals. The distinction between residential rehabilitation and detoxification has never been clear-cut, with many specialist detoxification services offering a psychosocial programme that attempts to prepare the client for a drug-free lifestyle and which may also involve preparation for rehabilitation either in residential settings or in the community (Day et al, 2004). However, the current study shows not only that a substantial proportion of residential rehabilitation services are offering detoxification provision, but that those who do so differ markedly from those that do not.

This may reflect a 'pragmatic' approach to in-patient provision to address possible attrition between the two forms of residential provision and to compensate for the limited availability of specialist in-patient detoxification in England (Day et al, 2004). Although we should not assume a consistent treatment process across these facilities, they are typically of shorter duration and involve a larger number of beds. Thus, although there were missing data in some cases, we can extrapolate that around 4,800 individuals went through the combined detoxification and rehabilitation process in the 34 participating

services in the study, compared to 2,014 individuals admitted to the 53 rehabilitation-only services in the study.

Furthermore, this difference does not appear to be predicated on the services' own report of their treatment philosophy with 12-step and TC-based rehabilitations as likely to provide this combined 'pragmatic' provision as eclectic or psychosocially based services. However, the distinction is important for both clients and for commissioners as what is offered appears to differ as a function of the availability of detoxification. Although this term was not defined in the study, all of those that reported that detoxification was available also reported some level of medical provision, yet this was not available in just under half of the non-detoxification services. This may have significant implications for the selection of services depending on the physical and psychological health of the client.

Similarly, whether RR services offer detoxification also appears to have implications for the therapeutic package provided and the likely outcomes. Clients attending services with detoxification appear to be less involved in the running of the facility (in the form of less housework), yet they receive, on average, more group sessions per week over the course of the treatment. There are also higher ratios of staff to each client in services that offer detoxification, although this difference does not result from differing levels of therapeutic staff.

However, and perhaps most intriguingly, the services vary markedly in the likely reason for departure. Although clients who completed the treatment programme in services not including detoxification typically stayed longer, they were also twice as likely to be asked to leave, with one in four admissions to RR services that did not provide detoxification being discharged on disciplinary grounds compared to around one in nine clients admitted to residential rehab services with front-end detoxification. Those who were discharged on disciplinary grounds in RR services with detoxification available were also likely to stay twice as long, possibly as a result of reluctance to discharge individuals during the physical detoxification process.

These findings are limited by the self-report nature of the study, with programme managers interpreting and then reporting on such complex questions as treatment philosophy, the treatment programme and the question of what constitutes 'medical provision'. Moreover, only limited information on the characteristics of services' caseloads was available. Similarly, there was no way to validate any of the responses provided. Nonetheless, the data provide compelling evidence for a more sophisticated understanding of what residential drug treatment involves, and for a greater differentiation between services according to the provision of services.

Specifically, policy makers, commissioners as well as clients and family members should be offered a far more differentiated concept of what it is they are buying into and where each facility falls within the client's treatment journey. One inference that can be made from this analysis is that attempting to promote continuity of treatment by providing detoxification and rehabilitation within the same package is only partially successful. That those who were discharged from treatment either on voluntary grounds or on disciplinary ones only stayed for an average of between 19 and 27 days suggests that a proportion of people attending these 'mixed' residential services are leaving as soon as detoxification is complete. However, more detailed research is required to address this issue satisfactorily.

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	Detox provided (n=34)	No detox provided (n=53)	t, significance
Scheduled programme length (weeks)	15.5	26.9	3.89***
Number of beds	31.6	18.1	3.34**
% of primary drug users	41.0	46.9	0.67
Bed occupancy rate (2004)	76.4	70.7	0.96
Admissions in 2004	141.1	44.6	4.13***

Table 1: Differences in programme characteristics - RR services that do or do not provide detoxification

Time spent per week in	Detox provided (n=34)	No detox provided (n=53)	t, significance
Group sessions	937.5	606.8	2.67*
Housekeeping	328.2	489.9	2.08*
Counselling	174.3	139.5	0.94
Lectures / education	434.1	312.1	1.96
Organised leisure	498.4	433.8	0.70

Table 2: Differences in time spent in activities between RR services that provide detoxification and those that do not

Mean number of days stayed prior to	Detox provided (n=34)	No detox provided (n=53)	t, significance
Completers	128.3	212.0	1.73
Voluntary discharge	27.5	55.9	2.67*
Disciplinary discharge	19.1	9.5	2.14*

Table 3: Length of stay for completers, voluntary discharges and disciplinary discharges in RR services