the outside community, in which the therapeutic ward produces significant change. The authors say that this was not due merely to ward policy but that the degree of interaction in the ward community suggested that this was the appropriate move. Since the latter has not been demonstrated, one can only assume that there has been some degree of bias in discharge decisions.

Finally, the authors say that many other statistical calculations were computed but none proved significant, suggesting that they have selected the choicest of their results for publication. Perhaps if these had been reported, a fuller picture of the therapeutic inefficacy of the community ward might have emerged.

J. G. GREENE.
Psychology Department,
Gartnavel Royal Hospital,
Glasgow, G12 oXH.

MMPI PERFORMANCE IN CHRONIC MEDICAL ILLNESS

DEAR SIR,

Goldstein and Reznikoff in their recent article in the *Journal* (February 1972, **120**, 157–8) report significantly higher mean scores on the neurotic triad of the MMPI for haemodialysis patients as compared to general medical patients convalescing from minor medical conditions. Elsewhere their report states: 'The finding of significant elevations of Scales 1, 2 and 3, the neurotic triad, confirms results of other studies on haemodialysis patients employing the MMPI' (p. 157). Apparently the authors have equated 'significantly higher mean scores' with 'significant elevations' although the latter expression in MMPI parlance has the specific meaning of 'Scale elevations at or above T-score 70', i.e. scores significantly above the MMPI standard population mean (T-score 50). They do not say how they are warranted in making this equation.

The distinction is important, because only when T-scores reach or exceed the T-score 70 level does conservative interpretation indicate the possible presence of psychiatric illness.

Failing to state unequivocally that all or most of the haemodialysis patients obtained scores at or above the T-score 70 level, Goldstein and Reznikoff have left open the possibility that although the haemodialysis patients as a group obtained higher mean T-scores than the controls, none or only some of the individuals in the haemodialysis group obtained triad scores of significant elevations.

That haemodialysis patients would show *some* elevation on the neurotic triad (particularly on Scales 1 and 2) is of course to be expected: such non-critical elevations would accurately reflect the physical and psychological stress effects of their condition, without suggesting at the same time the presence of a neurotic condition. Alternatively, it is possible that the unpublished data of Goldstein and Reznikoff show that *some* of the haemodialysis *and some* of the control patients obtained significant neurotic triad elevations. Subject to the outcome of individual psychiatric evaluation one would have to assume that those individuals, whether haemodialysis or control patients, were in fact true neurotics. Obviously, neither the presence of kidney disease nor that of any other medical condition bestows immunity from neurotic illness.

Only if it were shown that neurotic triad elevations at or above T-score 70 were significantly more common amongst haemodialysis patients than amongst their matched controls would one have to face the possibility of mislabelling.

With reference to the computer statement frequencies presented by Goldstein and Reznikoff in Table I (p. 158), Fisher exact probabilities show that only three of the statements occur more frequently (at or beyond the 5 per cent level) in the computer-derived MMPI interpretations of the haemodialysis groups than in the control group: 'Normal male interest pattern for work, hobbies, etc.' ($p = \cdot0345$); 'Moderately depressed, worrying and pessimistic' ($p = \cdot0153$); Considerable number of physical complaints. Prominent concern with bodily functions' ($p = \cdot0442$). In view of the haemodialysis patients' objective condition, the latter two statements appear to have at least face validity. They give little support to Goldstein and Reznikoff's contention that 'Computer-derived statements may erroneously label patients as 'hypochondriacs' when in fact they are chronically physically ill' (p. 158).

As for the first statement, it seems more parsimonious to look for reasons why so few of the controls are said to have normal male interest patterns than to speculate, as Goldstein and Reznikoff do, about denial of physical weakness and reduction in sexual potency on the part of the haemodialysis patients.

T. J. P. VERBERNE.
Parkville Psychiatric Unit,
35–37 Poplar Road,
Parkville,
Victoria 3052,
Australia.

OXAZEPAM (SERENID D) DEPENDENCE

DEAR SIR,

I would refer to Dr. S. M. Hanna's article in the *Journal* (1) concerning oxazepam (Serenid-D) dependence. This occurrence is sufficiently uncommon (2) to indicate an alternative explanation.

Drug dependence may be defined as a state, psychic and sometimes also physical, resulting from the interaction between a living organism and a drug, characterized by behavioural and other responses that always include a compulsion to take the drug on a continuous or periodic basis in order to experience its psychic effects and sometimes also to avoid the discomfort of its withdrawal.

This report of a case of oxazepam dependence described a 29-year-old male technician who had had periods of depression for the past nine years. His own doctor put him on oxazepam, 15 mg. t.d.s., later increased to 30 mg. t.d.s., and for some reason the patient was maintained on this dosage for approximately a year and a half before being sent, for the first time, to a psychiatrist.

The oxazepam was stopped and a small dose of amitriptyline was substituted. His depression continued, the worsening possibly arising from the exacerbation of the anxiety component of his depressive illness. There followed then a period of some months during which he was treated with a variety of medications, including an oxazepam placebo, all to little avail, until finally phenelzine was given with rapid and apparently lasting effect.

There are aspects to this case which merit attention, the first referring to the signs of withdrawal of oxazepam. Withdrawal manifestations as quoted in the report include agitation, restlessness, and depression, which symptoms were present before he was given Serenid-D initially. Secondly, the patient was allegedly on a high dose of oxazepam, yet the signs quoted in the article as associated with withdrawal after high doses, namely hallucinations, delirium and convulsions, are not described. Thirdly, in all cases of affective disorder, anxiety and depression are inextricably entwined (3): to damp one down may undoubtedly confer some temporary stability but the imbalance will eventually result in either the necessity for increasing dosages or overt signs of the presence of the untreated factor. The quoted withdrawal signs are evidence of the anxiety accompanying the patient's depressive illness, allowed to burst forth once the oxazepam was discontinued.

I would suggest that the patient was suffering from a recurrent depressive illness for which he was treated by oxazepam which was only partially successful by virtue of its anxiolytic properties. When eventually he was treated with the antidepressant, phenelzine, his depression was lifted together with his anxiety, rapidly removing the need and desire for any other medication. The phenelzine in fact did not affect the so-called withdrawal symptoms as such but effectively treated the responsible depressive illness. In my view there is no evidence of dependence produced by oxazepam in this case.

T. V. A. HARRY.

John Wyeth & Brother Limited,
Huntercombe Lane South,
Taplow,
Maidenhead, Berks, SL6 OPH.

REFERENCES

1. HANNA, S. M. (1972). 'A case of oxazepam (Serenid-D) dependence.' *Brit. J. Psychiat.*, **120**, 443–5.
2. SELIG, J. W. (1966). A possible oxazepam abstinence syndrome.' *J. Amer. med. Ass.*, **198**, 951–2.
3. AYD, J. J. (1961). *Recognising the Depressed Patient.* New York: Grune and Stratton.

MANIC-DEPRESSIVE PSYCHOSIS AND URINARY EXCRETION OF CYCLIC AMP

DEAR SIR,

With reference to the paper by Brown, Salway, Albano, Hullin and Ekins (1972 **120**, pp. 405–8) we too have made a number of studies on urinary cyclic AMP excretion using their saturation assay, after preliminary $ZnSO_4Ba(OH)_2$ treatment. Samples were analysed in triplicate at each of two dilutions (usually 1 : 5 and 1 : 25) and close agreement was generally obtained, but in a few cases the higher dilution consistently gave higher results which could be explained if a factor occurs in the concentrated urine which can enhance the protein binding of cyclic AMP. In such cases we have taken the result from the higher dilution as more likely to be accurate. Recoveries were monitored by the inclusion of internal standards. Very similar values to those of Brown *et al.* were found for the 24 hr. excretion by normal volunteers (mean $3 \cdot 25 \pm \cdot 21$ s.e.m., $n = 10$, range $2 \cdot 03$–$4 \cdot 36$ μmoles/24 hr.). We have measured the daily excretion by a number of depressed and manic-depressive patients over periods covering several mood changes without being able to establish any consistent correlation between cyclic AMP excretion and mood, so in general we endorse the findings of Brown *et al.*

However, in one ususual case we have found a very marked correlation. This patient has a very regular 48-hour cycle of mood, and has been extensively studied by us (see, for example, Hanna, Jenner, Pearson, Sampson and Thompson (1972)). Urine was collected in 4 hr. periods except for the overnight sample, which was 8 hr., and the mood was noted during the collection periods by staff familiar with the patient. At this time, after being well for three years while taking lithium carbonate, he had relapsed on placebo tablets. The results as shown in Fig. 1 for cyclic AMP are expressed in n moles/mg. creatinine to compensate for changes in volume. Very regular swings coincident with mood changes can be