program packages it is worth noting the problems that may arise in their interpretation.

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SIR: We regret that we may indeed have inadvertently misled our readers over one relatively minor matter. The figures quoted in our paper as "percentage variance accounted" are for unrotated vectors, and were presented simply to give a measure of the progressive removal of the total variability by the five principle axes. The values for the *rotated* vectors are indeed as given by Dr Iwata.

The main thrust of our paper was of course the consistency of the factor structure over randomly selected samples, and the figures for the percentage variance accounted for by the rotated first factors were 17.3, 15.8, 16.9, 21.9, 18.6, 21.2, 22.2, 18.3, 17.9 and 19.6 for the 10 random samples. providing yet further evidence of this consistency.

We are very grateful to Dr Iwata for raising this matter, and presenting us with the opportunity of clarifying the point.

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Behaviour disorders in mentally handicapped adults

SIR: We were interested to read the paper by Lund (Journal, September 1989, 155, 377-383). We would question the assumption that measuring the frequencies of types of behaviour and determining a significant cut-off point provides information about an underlying 'behaviour disorder'. What the index

behaviours do seem to have in common is that they have come to the attention of the parents or carers, presumably because of their impact on the observers.

The author also states that there was an association between the 'behaviour disorder' and the setting in which the individual lived. It is important to elucidate the influence of such environmental factors on people with mental handicap, as they may have a powerful influence and might be more easily altered to produce an improvement.

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Violence in hospital

SIR: The report by Noble & Rodgers (Journal, September 1989, 155, 384–390) concerning the Bethlem Royal and Maudsley Hospital violent incident register has important implications for management.

A gradual increase in violence by psychiatric inpatients, documented by this and other studies, is a worrying development (Tardiff & Sweillam, 1980; Mullen, 1988). Other authors have noted that violence registers tend to underestimate assaults on staff, particularly those of lesser severity (Haller & Deluty, 1988). The two- to threefold increase in violence found by Drs Noble & Rodgers is therefore even greater cause for concern.

The authors do not comment on the relevance of their findings for staff training or planning policy. Medical and nursing staff require training in early recognition and management of potentially violent patients and situations. One study showed nursing staff to be at greatest risk during physical restraint of the patient (Carmel & Hunter, 1989). Rapid and safe sedation of the patient would seem to be a priority, yet a survey of medical staff's familiarity with these techniques revealed gaps in knowledge and education (Ring et al, in preparation).

Research into the causes of violence on staff should continue, but every effort should be made to apply the findings to the clinical situation to minimise risk to staff and patient.

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Asian patients and the HAD scale

Sir: Salim Nayani (Journal, October 1989, 155, 545-547) has been a victim of a common misunderstanding in using an instrument for a purpose other than for which it was devised or intended. Somehow, a number of researchers in transcultural psychiatry have the impression that mere translation of an instrument is sufficient to make it applicable for use in populations from different ethnic or linguistic backgrounds. This leads to unjustified interpretations of the data.

For use of an instrument like the HADS in an Asian sample, it is necessary to suitably modify and adapt the scale for the Asian subjects, not just translate or backtranslate it. The adapted version then needs to be validated and standardised before it can be put into use. The modification should take into consideration the content of items, number of items, or the necessity for some other items to be included. The items in the HADS are far from constituting a 'suitable interrogation' to elicit depression in Asian subjects. A number of items in the HADS are not reported by Asians, at least in the form in which they have been presented in the scale. Similarly, there are a number of items which are reported by depressed Asian patients which are obviously not included in the HADS but would be of more discriminatory value. Dr Nayani's findings in fact confirm that the HADS in its present form is not really applicable to Asian subjects. The poor correlation between somatic symptoms and HADS depression is quite expected, since the items may not be measuring depression. Studying correlation between somatic symptoms and another measure of depression standardised for Asian subjects would confirm

Researchers on transcultural aspects should refrain from reporting data based on plain translated instruments. My criticisms are not directed towards the HADS, but towards the inappropriate method by which its utility has been investigated on Asian subjects, amounting to its abuse.

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Jarman indices and 'new chronic' in-patients

SIR: McCreadie & McCannell (Journal, September 1989, 155, 348-351) found a wide variation in the numbers of 'new chronic' in-patients between hospitals relative to catchment area size. This was in keeping with the findings of their previous survey (McCreadie et al, 1983) and has been attributed in part to staff attitudes. The adequacy of rehabilitation services in the hospitals concerned did not account for the variation in the in-patient numbers of chronic patients (McCreadie et al, 1985). The catchment areas have been described as urban, rural or mixed, but no detailed evaluation of their sociodemographic characteristics has been made.

There is a strong association between indices of social deprivation and both psychiatric morbidity and demand for psychiatric services (Royal College of Psychiatrists, 1988). The accumulation of 'new chronic' in-patients would also appear to vary in accordance with this factor (Inter-Register Technical Committee, 1984).

It may be the case that the division of catchment areas into urban, rural, or mixed is insufficient to show the influence of social deprivation. The Jarman data on indices of social deprivation in the health districts of England and Wales shows that prosperous urban areas such as Oxford and Worcester have low scores on these indices in comparison with relatively underprivileged semi-rural areas such as some districts of Lancashire (Jarman, 1984). Some indices of social deprivation may be high in agricultural areas, such as high rates of unemployment, unskilled workers, and the elderly.

A more detailed analysis of the sociodemographic characteristics of the catchment areas in the Scottish studies may reveal that social deprivation is a factor contributing towards the wide variation in numbers of 'new chronic' in-patients.

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