

Depression: Inside and Outside the Hospital Setting

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Twenty general practice patients selected for treatment with tricyclic antidepressants were matched with an equal number of psychiatric in-patients who had been admitted to hospital for depressive illnesses. In order to assess their depressive status, the Levine-Pilowsky (LPD) questionnaire was administered to both groups. It was found that although patients from each setting reported the same degree of depressive severity, the pattern of their LPD responses differed significantly. Twice as many hospital patients were assigned to either Class A ('non-endogenous depression') or Class B ('endogenous depression') compared to the general practice patients, most of whom were classified as Class C ('non depressed'). These results indicate the importance of distinguishing between depressive severity and depressive classification when comparing patients encountered outside the hospital setting with those who are in-patients.

Introduction

In view of the invariable flow of psychopharmacological data from the laboratory to hospital to general practice, it is clearly important to establish whether or not the psychiatric syndromes treated in community settings resemble those encountered in hospitals, since any consideration of the use of psychotropic agents in general practice must acknowledge the possibility that identical terms may be used to describe states that are in fact significantly different.

Of the psychiatric syndromes encountered in general practice, depression appears to be one of the most common (Popoff, 1969). Studies by Fry (1954) and Watts (1956) indicate that approximately one-third of patients attending their doctor with psychiatric problems are depressed. It is obviously important to ask in what ways, if any, the depressive symptoms presented by these general practice patients differ to those seen in patients who are admitted to hospital for depression. The purpose of the present paper is to report the results of an attempt, using a depression questionnaire

(Pilowsky *et al*, 1969), to compare patients being managed for 'depression' both inside and outside the hospital setting. It was expected that differences would be found between setting, in that hospital patients would manifest a significantly greater degree of depression than general practice patients, and would also be more likely to present depressive symptoms which constituted an 'endogenous' pattern.

Method

Subjects for this study were 40 patients, all of whom had recently sought medical advice for psychological distress. Half of these individuals had presented to a suburban general practitioner and had been deemed depressed and suitable for treatment with a tricyclic antidepressant, while the other half were in-patients in the psychiatric ward of a general hospital and diagnosed as suffering from a depressive illness. Both groups were matched exactly for sex and marital status and as closely as possible for age. The mean age of the general practice and hospital groups were 38.4 years and 37.8 years respectively.

All patients completed the Levine-Pilowsky depression (LPD) questionnaire (Pilowsky *et al.*, 1969; Pilowsky and Boulton, 1970; Pilowsky and McGrath, 1970; Pilowsky and Spalding, 1972), a self-administered instrument consisting of 57 Yes-No items. On the basis of his responses to the LPD questionnaire, plus his age, a patient can be classified as either 'non-endogenously depressed' (Class A), 'endogenously depressed' (Class B), or 'non-depressed' (Class C).

The responses characterizing Class A suggest a non-specific stress reaction of a depressive type. This includes patients who would probably be classed as reactively or neurotically depressed unless the presence of other clinical features (e.g. personality disorder, psychotic decompensation) made an alternative diagnosis preferable. On the other hand, Class B corresponds to the pattern commonly described as 'endogenous' depression. These patients report such symptoms as constant depression, retardation, loss of libido, loss of appetite, poor concentration, general insomnia, dry mouth, and loss of interest. Class C represents a non-depressed category which includes not only individuals who show little affective disturbance but also those depressed patients whose responses to the questionnaire resemble neither of the traditional patterns associated with Classes A or B.

Finally, the LPD can be used to allocate a score out of 20 for severity of depression (Pilowsky and Spalding, 1972). Since the items that make up the severity scale are not at all used in the classification procedure, it is possible for some subjects to obtain a high severity score but to be classified as non-depressed (Class C), or to obtain a low severity score but to be classified as depressed (Class A or B). Thus class membership is an indication of depressive pattern rather than intensity.

Results

When the distribution of the severity of depression scores for general practice and hospital patients are compared the hospital group obtains a mean score of 10.7 (SD 3.7), only slightly higher ($t = 0.74$; $P > .05$) than the general practice mean score of 9.8 (SD 4.0).

The outcome of the LPD classification procedure for patients in the two settings is presented in Table I. As can be seen, differences emerge between the general practice and hospital patients in the allocation of class membership. Most general practice patients are assigned to Class C (non-depressed), whereas most hospital patients are classified as Class B (endogenous depression). Combining Class A and B, exactly twice as many hospital patients as general practice patients are assigned to this 'depressive syndrome' category.

TABLE I
Distribution of LPD class membership for 'depressed' general practice and hospital patients

LPD class membership	General practice	Hospital
Class A (Nonendogenous depression)	3	5
Class B (Endogenous depression)	4	9
Class C (Non depressed)	13	9
N	20	20

Combining Classes A and B, $\chi^2 = 4.91$; $P < .05$

Discussion

Responses to the LPD questionnaire indicate that 'depressed' general practice and hospital patients (matched for age, sex, and marital status) report similar levels, but not similar patterns, of affective disturbance. It is interesting to compare these results with those reported by Blashki (1972), who found that depressed patients from the same settings obtained similar scores on the Zung rating scale but not on the Hamilton rating scale.

In the light of the findings of the present study, it appears possible that the self-rated Zung scale used by Blashki failed to find any difference between general practice and hospital patients because it is predominantly a measure of depressive intensity. Its results were comparable to those produced by the LPD severity of depression score in the present study and are in keeping with Byrne's (1975) finding that the Zung and LPD measures of depression correlate significantly.

The observer-rated Hamilton scale, on the other hand, has been found not to correlate with the LPD severity scale (Levine, 1975), and it is possible that this is due to the former instrument's sensitivity to qualitative aspects of the depressed patient's condition, particularly those associated with psychotic depression (Hamilton and White, 1959). Any attempt to relate Blashki's results to those of the present study points to the importance of the conceptual distinction between depressive severity and depressive classification. The LPD questionnaire, which reflects this distinction, has been found to provide measures of class membership that share little common variance with patients' scores on several scales that assess degree of depression (Costello *et al.*, 1974).

The implications of not distinguishing between depressive severity and depressive pattern can be readily appreciated; particularly as it has frequently been observed that depressions of the 'endogenous' type are more likely to respond to tricyclic agents (Ball and Kiloh, 1959; Raskin *et al.*, 1970; Paykel, 1972; Deykin and Dimascio, 1972). In the present study, this distinction was derived from patients' responses to the LPD questionnaire. Although some misclassification is inevitable whether either clinical or psychometric methods are used the findings of Pilowsky and McGrath (1970) and Byrne (1975) support the validity of the LPD classification procedure described by Pilowsky and Boulton (1970). In the present study the class allocation of hospital, as opposed to general practice patients, was consistent with these results.

The differences found suggest that as long as prevailing methods of depression are based on the study of psychiatric in-patients, doctors operating in other settings will be forced to adopt a somewhat biased and restrictive diagnostic 'set'. To the extent that the prescription of antidepressants is based on the perceived severity of depression, the problem of inappropriate psychotropic intervention is more likely to arise where there is a greater frequency of Class C patients who report feeling depressed, but whose pattern of depression does not correspond to any traditional syndrome. The present marginal status of such patients indicates the importance of further elucidating

the dimensions of the experience of 'depression' (Izard, 1972; Shapiro, 1975) and revising diagnostic categories to take account of the heterogeneity of depressive disorders, especially those currently subsumed under the term 'neurotic' (Paykel, 1971).

References

- BALL, J. R. B. & KILOH, L. G. (1959) A controlled trial of imipramine in treatment of depressive states. *British Medical Journal*, *ii*, 1052-5.
- BLASHKI, T. G. (1972) Depressive disorders in hospital and general practice. In *Depressive Illness: Some Research Studies* (eds B. Davies, B. Carroll and R. Mowbray). Charles Thomas.
- BYRNE, D. G. (1975) Some preliminary observations on a questionnaire technique for classifying depressive illness: its relationship with clinical diagnosis and a biological technique for depressive classification. *Australian and New Zealand Journal of Psychiatry*, *9*, 25-9.
- COSTELLO, C. G., CHRISTENSEN, S. J. & ROGERS, T. B. (1974) The relationships between measures of general depression and the endogenous versus reactive classification. *Canadian Psychiatric Association Journal*, *19*, 259-65.
- DEYKIN, E. Y. & DIMASCIO, A. (1972) Relationship of patient background characteristics to efficacy of pharmacotherapy in depression. *Journal of Nervous and Mental Disease*, *155*, 209-15.
- FRY, J. (1954) The psychoneurotic in general practice. *Medical World*, *80*, 657-66.
- HAMILTON, M. & WHITE, J. (1959) Clinical syndromes in depressive states. *Journal of Mental Science*, *105*, 985-98.
- IZARD, C. E. (1972) *Patterns of Emotions*. New York: Academic Press.
- LEVINE, S. (1975) A controlled comparison of maprotiline (Ludiomil) with imipramine avoiding observer bias. *Journal of International Medical Research*, *3*, Supplement 2, 75-8.
- PAYKEL, E. S. (1971) Classification of depressed patients: a cluster analysis derived grouping. *British Journal of Psychiatry*, *118*, 275-88.
- (1972) Depressive typologies and response to amitriptyline. *British Journal of Psychiatry*, *120*, 147-56.
- PILOWSKY, I., LEVINE, S. & BOULTON, D. M. (1969) The classification of depression by numerical taxonomy. *British Journal of Psychiatry*, *115*, 937-45.
- & BOULTON, D. M. (1970) Development of a questionnaire-based decision rule for classifying depressed patients. *British Journal of Psychiatry*, *116*, 647-50.
- & McGRATH, M. D. (1970) Effect of ECT on responses to a depression questionnaire: implications for taxonomy. *British Journal of Psychiatry*, *117*, 685-8.
- & SPALDING, D. (1972) A method for measuring depression: validity studies on a depression questionnaire. *British Journal of Psychiatry*, *121*, 411-16.

- POPOFF, L. M. (1969) A simple method for diagnosis of depression by the family physician. *Clinical Medicine*, **76**, 24-9.
- RASKIN, A., SCHULTERBRAND, J. G., REATIG, N., CHASE, C. & McKEON, J. J. (1970) Differential response to chlorpromazine, imipramine, and placebo. *Archives of General Psychiatry*, **23**, 164-73.
- SHAPIRO, M. B. (1975) The single variable approach to assessing the intensity of the feeling of depression. *European Journal of Behavioural Analysis and Modification*, **1**, 62-70.
- WATTS, C. (1956) The incidence and prognosis of endogenous depression. *British Medical Journal*, *i*, 1392-7.

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