

for cure. Against her are her age, poor intelligence, the long duration of symptoms and her rigid social situation. These factors make psychoanalysis out of the question and hold out only moderate hope of success for deeper therapy.

The question now arises as to who will conduct her therapy. This promises to be a long and difficult task, so that regarding both time and experience, it appears that specialist psychotherapy is more feasible, and has more hope of success, than the supportive therapy possible in general practice.

This is a family problem. In her present state she is no more than a passenger in her dual role of wife and mother—and, for the sake of her husband and children, deeper therapy must be tried if there is any prospect of cure; her two oldest boys are already the victims of one broken home.

Help in the understanding of this case has come from interviews with the patient herself, discussion with the family doctor and reading, especially M. Balint's *The doctor, his patient and the illness* (1957) and Clifford Allen's *Textbook of Psychosexual Disorders* (1962).

Summary

This patient, with neurotic personality and a stormy marital background, developed a neurotic illness after her only pregnancy by her second husband. The nature of the symptoms were varied—obsessive compulsive acts, neurodermatitis, depression and frigidity.

She was cared for by several long interviews and given concurrent drug treatment. Under this therapy, the obsessional trends disappeared quickly and the skin lesions healed slowly. The symptoms of depression lessened but recurred. Her frigidity remained intractable. The situation now is that, both for the relief of her frigidity, and for the stability of the household, further psychotherapy is required. Present knowledge of the aetiology and prognosis of the illness can, at best, forecast only moderate success.

CLINICAL TRIALS

THE TREATMENT OF MENTAL SYMPTOMS IN THE AGED WITH PROTHIPENDYL (TOLNATE)

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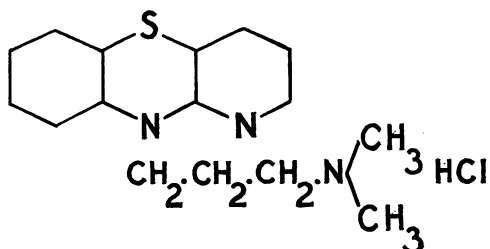
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IT HAS BEEN SAID that "In the end all our contrivances have but one object: to continue growth of human personalities and the cultivation of the best life possible". Physicians and welfare workers may

have considerable difficulty in making tolerable the declining years of the elderly. The problem is negligible when there is no mental or physical deterioration; it is when the signs or symptoms of mental and physical deterioration become dominant that tragedies occur; the more so when there is loneliness associated with economic problems.

The economic and social aspects of old age are being increasingly cared for by the State and by specialized societies; however, the treatment of the physical and mental health of a patient must always remain the primary responsibility of the general practitioner. In the past, many elderly patients have been either sent to Poor Law Institutions or cared for by relatives who were often intolerant and resentful. Nowadays, with the aid of modern drugs, there should be a reversal of this process and a swing away from institutionalizing the aged unless for a very cogent reason, such as a nursing problem or because of senile dementia. Such signs and symptoms of a deteriorating cerebral cortex, as tension, irritability, forgetfulness and reversal of the sleep pattern can often be alleviated by sedative drugs, or tranquillizers. Recently, a new azo-phenothiazine, prothipendyl (Tolnate), has been advocated for the sedation of the aged. This paper presents the results of treating 50 patients with prothipendyl and discusses the value of the preparation.

Pharmacology. Prothipendyl is an azo-phenothiazine with the chemical formula:



Animal pharmacology has shown the drug to have a strong inhibitor effect when mice and rhesus monkeys are first stimulated; it has also been shown that no stupor was produced during these tests, as may be seen after equivalent doses of chlorpromazine. The conditioned response escape effects are completely inhibited in rats, and both mice and rats were seen to be sedated without the appearance of the cataleptic syndrome which appears when some phenothiazines are given intraperitoneally. The drug also shows strong antihistamine and anti-emetic actions. No pathological changes have been reported as a result of chronic toxicity investigations in animals.

Methods and material

Fifty patients of both sexes were treated, of whom only five were

under the age of 50. Of the patients over 50 years, 11 were between 50 and 70 and 34 were over 70 years. Some were treated in geriatric institutions and others in their own homes.

The main indications for the use of prothipendyl were anxiety, irritability, tension and disturbance of the sleep pattern. Patients were assessed on the first day of treatment and all clinical details were entered on special record cards provided for the trial. They were later reassessed at fortnightly or monthly intervals depending on the severity of the original condition.

The prothipendyl was dispensed as 20 mg. tablets; the dosage varied from 60 to 120 mg. of the drug daily. Forty-five patients were given tablets three times a day; seven of these patients, with a disturbed sleep pattern, were given, in addition, 40 mg. of intramuscular prothipendyl at night. The remaining five patients were given 40 mg. prothipendyl orally at night only without diurnal therapy.

Results

Of the 50 cases treated in this series, 32 showed a satisfactory response and 18 showed either no response or deteriorated. A patient's response was considered satisfactory when the predominant symptoms were improved and where either home or institutional care was made easier. The table shows the clinical conditions treated and the results in each group.

TABLE
SUMMARY OF CONDITIONS TREATED AND RESULTS

<i>Disease</i>	<i>Total patients</i>	<i>Satisfactory</i>	<i>Unsatisfactory</i>
Anxiety state	9	6	3
Endogenous depression ..	1	—	1
Cerebral arteriosclerosis ..	17	15	2
Cerebral catastrophe ..	5	1	4
Senile involution	13	8	5
Senile involution and depression	5	2	3
	50	32	18

Six of the seven patients who required additional prothipendyl intramuscularly at night responded well. Two of these patients were able to omit the intramuscular prothipendyl at night and

were subsequently controlled on 120 mg. of the drug each day. Three patients continued to be well controlled on 60 mg. of the drug by day with an addition of 40 mg. intramuscularly at night. The remaining two patients required 40 mg. of intramuscular prothipendyl at night without the drug by day, but one of these two patients never had a really satisfactory night's sleep. Three of the four patients on 40 mg. of prothipendyl orally at night only responded well. The fourth patient deteriorated and required psychiatric hospital treatment.

The side-effects were negligible and presented no problem; they were seen in five patients only and were noted as anorexia, nausea, vomiting and diarrhoea as separate symptoms in four patients: it is probable that these symptoms were coincidental to the therapy. The fifth patient aged 80 on 40 mg. prothipendyl by mouth at night only, developed symptoms of Parkinsonism but this may well have been a part of the terminal phase.

Discussion

It is especially important in the elderly to prescribe drugs with care and to evaluate any new symptoms which may appear. These symptoms may be associated with a new interposing disease or may be due to side-effects of the treatment. Exton-Smith (1962) has recently drawn attention to many of these problems and discussed the use of sedatives and tranquillizers in the elderly patient. One of the most important of these problems is to avoid producing hypotension in the geriatric patient. These patients are often unable to compensate readily for minor changes in cerebral oxygen tension and there is also an increased risk of a cerebral or coronary thrombosis developing with the fall in blood pressure. Phenothiazines are known in certain instances to cause hypotension and although this condition has been reported from time to time with prothipendyl it has rarely caused anxiety (Izac, 1961). It is reported that hypotension, with prothipendyl therapy, may be encountered after a single dose exceeding 40 mg. but that patients on prolonged therapy, who may be liable to this complication, appear to compensate after two or three days treatment and hypotension is thereafter infrequent (Schiemann, 1959). In this series no problems of hypotension were encountered but it would appear wise to avoid sudden acute changes in posture for an hour or so after giving intramuscular prothipendyl at this dose level.

As one would expect, the poor responses to the drug were seen in those patients where depression was the predominant symptom. Poor responses also occurred in patients with cerebral damage following a cerebral vascular upset. Patients with hypertension or arteriosclerosis responded well. The apparent lack of side-effects of

this drug is most valuable in the management of the geriatric patient. In our series, the drug was shown to be a satisfactory sedative in either prolonged dosage or in a single dose at night. The great advantage of using prothipendyl was that there was a lack of 'hang-over' effect in the majority of cases. This lack of 'hang-over' made nursing much easier and lessened the risk of bed-sores, inhalation bronchopneumonia and kindred problems which are associated with geriatric care. It is of interest to note that prothipendyl is said not to cause damage to the liver and has been used on more than one occasion to sedate patients who had developed jaundice when on chlorpromazine (Barthel and Gerber, 1960). There was no occasion in this trial to use the drug as an anti-emetic, but this could be valuable in geriatric medicine (Davison *et al.*, 1962).

Summary

Fifty patients, 32 of whom were over the age of 70, were treated with prothipendyl (Tolnate) to reduce their symptoms of anxiety, tension, irritability and confusion and also a disturbed sleep pattern. Of the 50 patients treated, 32 showed a satisfactory response and 18 showed either no response or deteriorated. Side-effects were minimal.

Acknowledgement

My thanks are due to Smith, Kline and French Laboratories Ltd. for the supplies of prothipendyl used during this trial.

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THREE YEARS OBSERVATION OF TRIOGESIC IN THE TREATMENT OF MIGRAINE

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THE FOLLOWING OBSERVATIONS which I have made over a period of three years started on the occasion when one of my patients, who had been treated for sinusitis, reported that the treatment had greatly benefited his attacks of migraine. It was for his migraine that the