chromatolysis. The number of neurons was reduced, but focal necroses were seldom present. In two other cases which showed Korsakow's syndrome, areas of arteriosclerotic softening were found, but there was no constant localization of the pathological changes. It does not seem justifiable to state that there is a selective degeneration present in chronic alcoholism, or any correspondence between severity of the clinical symptoms and the degree of corresponding brain lesions.

R. G. G.


There appears to be a statistically highly significant difference in the blood glutathione (GSH) level between groups of mental patients and adequate individuals. This difference is greatest in catatonic dementia praecox. It is also marked in hebephrenic and paranoid praecox, and in general paresis. It is less marked, but still statistically significant, in manic-depressive psychosis. In the small number of cases of epilepsy examined it was not statistically significant. Diurnal variation and exercise have been ruled out as influences affecting the validity of conclusions based on the data accumulated in this study.

C. S. R.

PROGNOSIS AND TREATMENT


This law of 1921 provides that any person indicted for a capital offence or any person indicted or bound over for trial in the Superior Court who has been previously convicted of a felony or indicted more than once for any offence shall be reported to the Department of Mental Diseases for examination, 'to determine his mental condition and the existence of any mental disease or defect which would affect his criminal responsibility.' It may be said that by providing an impartial and competent mental examination of certain legal classes of persons accused of crime in advance of trial, it has furnished to the court information as to the defendant's mental condition, and by so doing has avoided the expense of numerous costly trials; it has reduced to a negligible number the 'battles of experts' which have in the past brought discredit upon psychiatric expert testimony; it has protected the rights of the psychotic or otherwise mentally incompetent accused who might without it have gone unrecognized; it has served in numerous cases to indicate a disposition which was more desirable socially and more in accord with
justice and fairness to the defendant than would have been the routine and
mechanically determined one that would ordinarily have been meted out;
finally, it has aided in the process of educating judges and the bar generally
to a realization of the value of psychiatry as an aid in the individualization
of justice.

C. S. R.

[86] An experimental study of the control of the mechanism of speech, and
in particular of that of respiration, in stuttering subjects.—George

In the series of experiments described here the question at issue was that of
the relative efficiency of stutterers and normal speakers in voluntary control
of the mechanism of speech in situations in which speech itself was not
required. The results on respiratory control indicate that the stuttering
speakers are inferior to the normals in their ability to maintain voluntarily
the rhythm or regularity of the performance. The measures of regularity for
the two groups of subjects in this type of performance showed a difference
which was more than eight times its probable error. This result affords
striking confirmation of the findings of Blackburn from experiments of a
similar kind. In voluntary control of the lips and jaws, although the
stutterers are once more inferior to the normal subjects, the differences
between the groups are not to be considered significant. These results appear
to indicate: (1) That although the ordinary rest-breathing of the stutterer
may show no abnormality, there may well be a specific deficiency in his
respiratory control; and (2) that respiratory disturbance in the stutterer is
not confined to or induced by those social situations in which communication
by speech is demanded by the sufferer. It was present under the conditions of
these experiments in which speech was explicitly eliminated and the social
stimulus reduced to a minimum.

C. S. R.


A study of the effects of sodium amytal in some patients suffering from
abnormal mental reactions is undertaken. It would seem to have an anti-
inhibitory effect through depression of the activity of some of the neurones
of the cerebral cortex. In some psychotic reactions, such effects are
therapeutically undesirable. The effect of the drug is to release the patient
from inhibition symptoms such as mutism and catatonia, but this is only
temporary.

R. G. G.

Evidence here has been presented which indicates that the favourable changes in the behaviour of catatonic schizophrenics following the intravenous injection of sodium amytal are not dependent on the dilation of the cerebral vessels, on the rise in the CO₂ content, or a fall in the pH in the arterial blood. Narcosis produced by a number of different drugs was not followed by any change in symptoms such as occurred after narcosis by sodium amytal. The changes in symptoms which followed this drug administration were found to have a different and more favourable character and a longer duration than those which were elicited occasionally by such severely disturbing experiences as anoxæmia, respiring high concentrations of CO₂ or other types of treatment which were necessarily painful. Since sodium amytal is a drug which acts primarily on the brainstem, it is suggested that its effectiveness in rousing catatonic patients from stupor lends some support to the hypothesis that the symptoms of this disease are due in part to a dysfunction of the brainstem.

C. S. R.


Thirteen cases of various types were treated with a combination of gonadal hormones and the aphrodisiac drug, yohimbine. Of the nine male cases so treated, seven were discharged as recovered or greatly improved and one gave no response whatever. Of four female cases, three recovered and one was definitely made worse. Gonadal extracts appeared to be valuable therapeutic agents in the schizophrenic psychoses, with particular emphasis on the female follicular hormone. It is possible that in spite of the absence of overt indications of sex-gland hypoplasia such a condition may be present and may be an important factor in preparation of the soil for this psychosis. The higher recovery rate in the female cases may be purely coincidental, or more probably may be due to the fact that oestrin is a substance of known potency and chemical composition, whereas testicular extracts are variable in their activities. The drug yohimbine acts as a general central nervous tonic, has a specific influence on the genital apparatus, and appears to enhance synergically the action of the gonad hormones. No untoward symptoms were observed after administration of these preparations, either orally or by subcutaneous or intramuscular injection, the treatment then being quite safe. The blood phosphorus level appeared to be distinctly higher
in cases of schizophrenia than in the normal person, improvement in the mental condition being followed by a fall in this level (using the inorganic fraction as an index). This index appeared to be of value in controlling the treatment.

C. S. R.


The blood of the placenta obtained by cutting the umbilical cord on the placental side was injected at intervals in patients suffering from schizophrenia. In nine cases (24 per cent.) a remission took place, 20 cases (54 per cent.) improved and eight cases (22 per cent.) remained stationary.

When one considers that a certain number of cases of schizophrenia improve spontaneously the results of the treatment described are not convincing.

M.


Thirty-eight cases are reported out of an experience with 85 treatments of sustained sleep therapy, for a period of nearly four years.

Sustained sleep therapy is a valuable method in manic-depressive psychosis, in certain types of schizophrenia and in psychoneurosis. Of the other groups, too few were available, or the observations were not complete enough to draw definite conclusions. The method employed is a modification of the one used in the Burgholzli Clinic, consisting of administering diallylbarbituric acid rectally for a period of about ten days. In the prenarcotic stage dial is given per mouth and occasionally intramuscularly when indicated. During the narcotic stage morphine-scopolamine is given on the third day of the treatment and continued thereafter now and then, to lessen the possibilities of acquiring a tolerance to the dial.

‘Narco-sustained’ therapy is not without danger. The dangers are lessened by carefully eliminating contraindications, by maintaining a light state of sleep and by employing a specially trained nursing personnel. The quality of sleep has no bearing on the ultimate clinical outcome; lightly narcotized cases with frequent periods of wakefulness have shown equally good results. In the post-narcotic stage lasting for three days or over the
patient is conscious but his memory for recent events remains clouded and retention is poor. Situational conflicts are often clearly revealed and confabulations are not infrequent. Most cases show beneficial effects in some manner. Long-standing deteriorated cases respond slightly, if at all. Among the improved some are able to resume their former occupations, at least in part, outside of the institution. Involutional cases responded poorly.

R. G. G.

[92] An investigation into the after-histories of discharged mental patients.

The authors, from their study, come to the following conclusions. In many cases an isolated attack carries with it a favourable prognosis with little tendency to recurrence. There appears to be a 'danger period' about a year after discharge when the tendency to relapse is maximal. After this the probability of recurrence tends to diminish, except in the case of schizophrenics. Cases of dementia praecox show the same 'danger period' at the end of a year, and in addition a further critical time about a year later. The importance of pregnancy or the puerperium as a precipitating factor in an attack of insanity is questioned. In view of these findings a regular follow-up of discharged cases appears desirable in order to ensure any necessary treatment before the psychosis becomes fully established.

C. S. R.


The Sexual Sterilization Act of Alberta was assented to in March, 1928. Up to the end of 1933, 288 cases—87 males and 201 females—had been passed by the Eugenics Board. Of these 206—48 males and 158 females—had at that time been operated on. These operations—a vasectomy or salpingectomy—have been followed by no serious sequelae. No complaints have been received as to any change in libido or sex satisfaction, and none are expected. Of the 288 cases, 54·2 per cent. were diagnosed as mentally defective, 12·5 per cent. as mental deficiency with psychosis, and 30·2 per cent. as otherwise psychotic, while 3·1 per cent. were borderline cases. Social problems, such as immorality, illegitimacy, delinquency, dependence, partial or complete, were prominent features in many of the histories. Contrary to frequently expressed fears there is at present no evidence that sterilization will
lead to promiscuity or a lowering of moral standards. Facts indicating a hereditary taint or predisposition, in many cases to a striking extent, were found in 60.8 per cent. of cases. Sexual sterilization seems a logical and acceptable method of coping with certain problems of mental disease and defect.

C. S. R.