

**Epitome of current researches on subjects connected with medicine and the medical sciences / editors N.H. Martin, C.E. Stuart, H. Spargo.**

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100



May 1st, 1892, before treatment  
Weight, 13 stone 9 lbs.



September 1st, 1892, after treatment  
Weight, 12 stone 6 lbs.

Dr. W. Hunter's Case, No, 63, page 26

EPITOME  
OF  
CURRENT RESEARCHES

ON SUBJECTS CONNECTED WITH

*Medicine and the Medical Sciences*

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BRADY & MARTIN

NEWCASTLE-UPON-TYNE

EPITOMES ARE HELPFUL TO THE MEMORY

—*Watton*

## INTRODUCTION

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The present number of our Epitome is entirely occupied with references to the treatment of disease by extracts of animal origin. The remarkable and complete success which has attended the treatment of Myxœdema by an extract prepared from the thyroid gland of the sheep has strongly directed the attention of scientists and physicians to this subject and has raised the hope that other human ailments which may be due to the disturbed function of other glands of the body, will be found to yield to a similar line of treatment. The papers published by Professor Brown-Séquard in France and Dr William Hammond in America assert that this has already been demonstrated, but the methods followed in France and America are so widely different from those which in England have indicated so clearly the cause and treatment of Myxœdema that a few introductory comparisons may not be amiss. In France Prof. Brown-Séquard some years ago published an ingenious theory with regard to gland secretion and threw out many suggestions as to the possible use of extracts of various glands, but by further research he appears to have entirely convinced himself that most, if not "all the ills that flesh is heir to" may be cured by an extract from the testicles or "orchitic" fluid. We do not suppose that Prof. Brown-Séquard is responsible for the brochure of the enterprising pharmacien who calls the fluid (apparently on his own initiative) "Sequardine," but as this is advertised as the source from which physicians must supply themselves, a perusal of the pamphlet is interesting. According to this pamphlet, the fluid will apparently cure anything from eczema to cancer; locomotor ataxy is included in the list and only a doubt is thrown upon tuberculosis. The writer calls the fluid a "living principle" (*principe vivant*) a "generator of life" (*générateur de la vie*), a "preserver of organic energy" (*conservateur de la synergie organique*), and contrasts the marvellous effects of this life giving tonic with those

artificially provoked by pharmaceutical preparations (*par les médicaments de la pharmacie*). Moreover faith (in the power of this remedy) must be a potential quality of the physician who, armed with a Pravaz syringe and a bottle of Sequardine goes forth to combat disease, as in every case he must persevere during months of treatment and "it goes without saying that the injections against old age must be continued until death" (*Il va sans dire que les injections contre la sénilité doivent être continuées jusqu'à la mort*).

If we turn to America the case is not very different, for whilst the papers on this subject published in the Medical Journals assume the aspect of scientific contributions to medicine, we find there exists a company whose business it appears to be to exploit these Animal Extracts and who advertise them as being prepared "under the supervision of" the author of the papers. We think this will lead observers in this country to seek confirmatory evidence of their value from a possibly more disinterested source. The case of Myxœdema and its treatment is so entirely different, the origin and cause of the disease was worked out through years of patient investigation by men eminent in their departments of Physiology, Pathology, Chemistry and Medicine, and the treatment has been firmly established by scores of separate observers and has been demonstrated and recorded over and over again. We hope this is a prelude to further researches and conquests over disease in the same direction, but however long each separate investigation may take we are quite sure that no English physicians and scientists will seek assistance from or adopt methods suggestive of charlatanism.

N. H. M.

# Epitome of Current Researches

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## ANIMAL EXTRACTS IN THERAPEUTICS

Dr Brown-Séquard contributes a paper to the *British Medical Journal* (June 3rd and 10th, 1893), "On a New Therapeutic Method, consisting in the use of Organic Liquids extracted from Glands and other Organs," in which he refers to his own experiments and connection with the subject from 1869 onwards, and gives the process devised by himself and Professor d'Arsonval for making the extracts, and the experience of a number of continental physicians in the use of them. In his lectures, delivered in the Paris School of Medicine, in 1869, Dr Brown-Séquard advanced the theory that all glands, whether furnished with excretory ducts or not, possess, in addition to the external secretion, which is concerned with the more obvious function of the gland, an internal secretion, which gives to the blood principles which are of the highest importance to the health of the individual, and the absence of which is felt when the glands are extirpated or destroyed by disease. Further experiments confirmed the correctness of this view, and Dr Brown-Séquard inferred therefrom that, if he could introduce the internal secretion of the gland of a healthy animal into the blood of a man suffering from a train of symptoms caused by the arrested function of that gland, important therapeutic effects would result. In 1889 Dr Brown-Séquard announced that such a result could be obtained by injecting under the skin a liquid extract prepared from the glands, and he gives further details of experiments which were made by himself and Professor d'Arsonval to prove that large quantities of the liquid organic extracts, prepared and sterilised after their method, could be injected under the skin, and even into the veins and arteries, with perfect safety. Details are then given in the paper of the method of preparing the extracts and of filtering and sterilising them in the d'Arsonval filter, a picture of which is published. The remainder of the paper is taken up with recording what has been accomplished, and with suggestions for the further employment of this mode of treatment.



The chief fluid used by Dr Brown-Séguard has been an extract prepared from the sexual organs, which he calls "orchitic liquid." The doctor made his first communication on the orchitic liquid in June, 1889, and published an account of it in *The Lancet*, July 20th, 1889. His further experience fully confirms the statements made in that paper, and cases are cited which "positively establish that a good deal more than what I observed on myself has been obtained in a large number of old people." Of 405 cases of locomotor ataxy, after excluding 63 of doubtful diagnosis, there were 314 cases of great amelioration or cure. Superficial cancer was benefitted in 97 cases out of 103, the improvement being shown by "the healing of ulcers, the cessation of pain, of insomnia, of hæmorrhage, of all appearances of cachexia, and of every other symptom, except the presence of the tumour." Favourable results in the treatment of pulmonary tuberculosis is stated on the testimony of physicians, quoted by name, and confirmed "by more than 60 medical practitioners of Paris, or of the French provinces," The question of the cure of organic diseases is reserved, what is recorded applying to the cessation of morbid manifestations; but the doctor knows cases of "the cure of ulcers (in leprosy and cancer), of the disappearance of a fibrous tumour of the womb, and of morbid deposit of connective tissue in the heart, the arteries, and muscles." Experiments upon guinea pigs established the fact that mothers treated with "orchitic liquid" gave birth to larger, heavier, and stronger young than those not so treated, and, on the authority of Dr Kahn, a case is recorded of an ataxic debilitated woman, whose child had not moved in her sixth month of pregnancy, being treated with this fluid, when the child soon began to move with energy and was born in an extremely vigorous condition. The doctor then, somewhat inconsequently, refers to an "ovarie liquid," which, he states, acts with less power than the "orchitic liquid," but from which, he says, "sixty old women in Paris have derived benefit from its action, according to an American lady physician, Mrs Brown." Dr Brown-Séguard suggests "it would be important to make use of that special liquid in cases of removal of both ovaries, or of disease having destroyed them."

The study of the phenomena of anuria led the Doctor and Professor d'Arsonval to the conclusion that the uræmic symptoms are much less intense when the kidneys are not disorganised, and their internal secretion remained active, and to the inference from their experiments that patients, in such

cases, would be benefitted by the subcutaneous injection of a renal fluid. A case treated by Professor Dieulafoy appeared to support the correctness of this view, although the patient died. Reference is made to experiments showing the appearance of diabetes in dogs, from whom the whole of the pancreas had been removed, and to the use of a pancreatic liquid in the treatment of diabetes; but no case of cure had been recorded, and Dr Brown-Séguard states that the "orchitic liquid" has considerably more power against any form of diabetes than the pancreatic liquid." The liver is also stated to possess an "internal secretion," and the suggestion made that it would be well to make use of the hepatic liquid in cases of "extensive organic disease of the liver," but no evidence is adduced in support of this suggestion. Suprarenal liquid was tried in cases of Addison's disease, and splenic liquid in cases of leucocythemia with but slight result, whereas, in both these diseases, Dr Brown-Séguard states his "orchitic liquid" to possess considerable power. In the remainder of the paper slight reference is made to the injection of "organic liquid extracts drawn from other parts than glands," but no other suggestions are made on the authority of the doctor himself.

#### ON CERTAIN ORGANIC EXTRACTS THEIR PREPARATION AND PHYSIOLOGICAL AND THERAPEUTICAL EFFECTS

Dr William A. Hammond contributes an article on the above subject to the *New York Medical Journal*, of Jan. 28th, 1893. After referring to the experiments of Brown-Séguard the author mentions his own systematic researches which have been continuously made since 1889.

He then refers to some results published in the same Journal, August 31st, 1889, of the entire cure of a case of traumatic neuritis, two cases of cardiac weakness with neurasthenia, one of sexual impotence, two of muscular rheumatism and lumbago, one of hemiplegia, one of melancholia, and one of cardiac asthma, the result of excessive mental work, all of which were cured by the injections of testicular juice. Dr Hammond had nothing to retract from what was written more than three years before, but the additional experience had convinced him that "we have in testicular juice a valuable addition to our materia medica, the precise worth of which, however, it is not yet in our power to establish." The Dr then refers to sterilization of testicular juice, and expresses his belief that experiments with such fluids are

worthless, he suggests instead the microscopical examination of the fluid before using it for injection. He goes on to state the theory upon which his experiments have been conducted, and he is confident that his system is "not only well founded in fact, but is in accordance with physiological law, and that we have in it philosophical means of combating disease." Dr Hammond's system is founded on the fact that each organ of the body in a healthy state absorbs from the blood the material necessary for its own growth and preservation, and that in diseased conditions of a particular organ this power may be lost or impaired. Under such circumstances if we can inject directly into the blood the peculiar matter which an organ requires we supply the missing element, and enable the organ to regain its normal condition. "Let us suppose a person suffering from an exhausted brain, the result of excessive brain work. Three hearty meals are eaten every day, but no matter how judiciously the food may be arranged, the condition continues. Now, if we inject into that persons blood a concentrated extract of the brain of a healthy animal, we supply at once the pabulum which the organ requires. Then, if under this treatment, the morbid symptoms disappear, we are justified in concluding that we have successfully aided Nature in doing that which unassisted she would not accomplish." Dr Hammond believes this to be applicable to all the other organs of the body, with the exception of the kidneys and liver, and these being excretory organs cannot properly be used for preparing extracts to be introduced into the blood. The Doctor then gives some account of the experiments he has made, and the formula which he has finally adopted for his extract of brain, which he calls "cerebrine," and which he states may be taken as a type of the process to be employed in making extracts from the other organs. With his "cerebrine" Dr Hammond has obtained "decided advantage in cases of nervous prostration—the so-called neurasthenia—in insomnia due to cerebral hypercæmia, in migraine, hysteria general paresis, hebephrenia and epilepsy."

The remainder of the paper is taken up with combating the statement that there is no difference between the action of medicines taken into the stomach and injected into the blood by hypodermic injections.

He maintains that while it may be true that some substances are not altered by the gastric juice, it is not so with regard to those of animal origin, and he found that when such substances "are enclosed in capsules so as to reach the stomach without coming in contact with the mucous membrane of the

mouth, they are absolutely without physiological or therapeutical effect so far as can be perceived, even when given in quantities of a teaspoonful or more." He found, however, that if some of the animal extracts are put upon the tongue in double the dose used for injection, and allowed to remain in the mouth without being swallowed, they are absorbed and exert a slower but still decided effect.

#### MYXŒDEMA, AND ITS TREATMENT BY A LIQUID EXTRACT PREPARED FROM THE THYROID GLAND

In December, 1883, a Committee of the Clinical Society, of London, was appointed "to consider the subject of Myxœdema." The report of this committee was published as a supplement to the Transactions of the Society in 1888, in an octavo volume, of 215 pages, and ten sheets of tables, giving an exhaustive analysis of 109 cases of Myxœdema which had been recorded. The body of the volume is divided into six sections, as follows:—I. Historical Summary; II. Detailed and General Analysis of Symptoms; III. Pathological Report, signed by the following three members of the Committee—John Cavafy, James F. Goodhart, and W. B. Hadden; IV. Report of Chemical Investigations of the Tissues and Organs from cases of Myxœdema in Men and Animals, signed by W. D. Halliburton; V. Report of Experimental Researches into the Function and Pathology of the Thyroid Gland, in connection with the conditions termed Myxœdema, Cachexia Strumipriva, Cretinism, etc., signed by Victor Horsley; VI. Report on the Results of Total and Partial Extirpation of the Goitrous Thyroid Gland in Man, signed by Felix Semon. These sections are followed by a General Summary, signed by William M. Ord. In the next three pages are published the "Conclusions," signed by every member of the Committee, and which is stated in the Introduction to be "an exposition of the Committee's unanimous opinion." "In an Appendix are embodied Dr Stephen Mackenzie's investigations on the weight of the thyroid body at different periods of life, and in persons dying from various causes," and "Finally a Bibliography of Myxœdema is added to facilitate future enquiries."

The tables at the end of the volume, under eighty-eight headings, give a complete analysis of the condition, antecedents, symptoms, changes intellectual and bodily, treatment, mode of death, and other remarks, so far as these have been recorded in the references quoted.

Following the publication of the above Report, various suggestions were made as to the possibility of curing the complaint by supplying to the animal economy the ingredient which, in the normal condition of the thyroid gland, maintained the being in health. In 1889 and 1890 this mainly took the form of suggestions for the transplantation, or grafting of healthy thyroid glands from some animal into the affected person. In 1891 a great advance upon this method was made by Dr George R. Murray, of Newcastle-on-Tyne, who inferred from the etiology of the disease and the results which had been obtained by grafting, that "it seems reasonable to suppose that the same amount of improvement might be obtained by simply injecting the juice or an extract of the thyroid gland of the sheep beneath the skin of the patient." Dr Murray commenced the treatment of a case in April, 1891, and reported the successful result to the meeting of the British Medical Association, held at Bournemouth, in July of that year. This method of treatment has since then been followed with most striking success, and the published results are characterized by the Editor of *The British Medical Journal* (Feb. 4th, 1893), as "the most striking and significant triumphs which have ever been won in the field of practice." If any one is inclined to think this language in the very smallest degree exaggerated, let him turn to the column "treatment," in the tables appended to the report to which we have referred, and he will see that anything like permanent improvement of the cases under the various forms of treatment is unknown, and even "slight improvement" is only recorded in a few cases. In fact, up till 1891, Myxœdema was practically an incurable complaint,\* whereas, since the commencement of its treatment by thyroid extract it has become, if not absolutely curable, at least one of the most tractable of maladies, so far as the relief of all the unpleasant and dangerous symptoms are concerned. It will be impossible, in the space at our command, to give an adequate summary of the papers which have recently appeared on this subject; but we give a list of many of the more important of these in the following table, and under the heading "Remarks," we have endeavoured to indicate the most striking feature of each paper, so that medical men may at once turn to the one most likely to supply the information sought. We gather, generally, that in giving the extract by hypodermic injection, great care should be taken to sterilise the syringe and especially the

\* Professor Victor Horsley, in 1890, writes—"These diseases (Myxœdema, Cachexia Strumipriva, and allied diseases), are hopelessly incurable with present remedies."—*B. M. J.*, Feb. 8, 1890, page 287.

needle, that the injection should be made very slowly, and that it is not necessary to repeat the dose as often as when the liquid extract or the powder is given by the mouth; in the latter case a daily dose at first is not too much; but even here it is desirable that the patient refrain from exercise for some little time after taking each dose. For detailed information as to treatment, see the paper, by Dr G. R. Murray, in *The Lancet*, May 13th, 1893.

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### CRETINISM

In *The Lancet*, March 18th, 1893, page 580, Dr Edward Carmichael, of Edinburgh, publishes, with photographs before and after treatment, a most interesting case of Cretinism successfully treated by the hypodermic injection of Thyroid Extract and feeding.

The child, between five and six years of age, was like an infant, she had broad and massive features, dry and harsh skin, prominent abdomen, made no attempt to walk, and had very feeble intelligence. From April to October, 1892, the child was treated with hypodermic injections of thyroid extract, with the result of continuous improvement.

“After the first few injections the appearance of the child had completely changed; there was a marked diminution in the size of the abdomen, so that a bodice which fitted before the commencement of the treatment now overlapped by four or five inches. The thick lips and *alœ nasi* were now of normal size, the skin was pliant and soft, the temperature to touch improved, and the hair apparently more healthy, though still sparse. As week by week passed some mark of improvement was always seen. In October the child began to walk, and soon was running about and even walking long distances. The head smaller to appearance, became covered with a fine crop of healthy hair. Marked improvement in intelligence was seen in many little actions.”

NOTE.—Dr Edward Carmichael stated in his article that the Thyroid Extract which produced the above remarkable result was prepared by Brady and Martin, of Newcastle-upon-Tyne, but the Editor of *The Lancet* omitted to print the fact. Is it merely a coincidence that in another portion of the same number of *The Lancet* there was published more than two pages of Advertisements relating to this subject?—[*Ets.*]

SOME RECENT LITERATURE ON THYROID GLAND,  
MYXŒDEMA, CRETINISM, &c.

AUTHOR'S NAME	TITLE OF PAPER	WHERE PUBLISHED	REMARKS
Anderson, Dr McCall	The treatment of Myxœdema	Practitioner, Jan., 1893, p. 36	Mentions treatment by other means than Thyroid Extract, gives illustrations, and sums up with comparisons between hypodermic method and by the mouth
Baber, Dr E. Cresswell	Feeding with fresh Thyroid Glands in Myxœdema	B. M. J., vol. i., '93, p. 10	This method deserves a trial but enjoins careful watching during administration.
Barron, Dr A. ....	Two cases of Myxœdema treated by Thyroid injections	B. M. J., vol. ii., '92, p. 1384	Gives mode of preparing Extract slightly different from Dr. Murray's
Beatty, Dr. Wallace	A case of Myxœdema successfully treated by Massage and Hypodermic injections of the Thyroid Gland of a Sheep	B. M. J., vol. i., '92, p. 544	
Benson, Dr .....	Case of Myxœdema of long standing treated by administration of Thyroid Extract by mouth	B. M. J., vol. i., '93, p. 795	Suggests that all cases should be commenced by mouth and hypodermic treatment be reserved for obstinate cases
Berry, Mr James .....	Diseases of the Thyroid Gland	Lancet, vol. i., '90, p. 195; B. M. J., vol. i., '90, p. 180	Paper read and discussed at the Pathological Society of London. Author suggests transplantation of Thyroid Gland in Myxœdema and Cretinism
Beadles, Mr Cecil F.	A case of Myxœdema with Insanity treated by the subcutaneous injection of Thyroid Extract	B. M. J., vol. ii., '92, p. 1386	History of the case from 1884 and details of successful treatment from May to October, 1892
Bramwell, Dr Byrom	The Clinical Features of Myxœdema	Edin. M. J., May, '93, p. 985	
Browne, Mr Lennox	Congenital enlargement of the Thyroid; Removal; Recovery	Lancet, vol. i., '90, p. 279	
Carmichael, Dr. Edward	Cretinism treated by the Hypodermic injection of Thyroid Extract and by feeding	Lancet, vol. i., '93, p. 580	Child six years old treated with success Photographs before and after treatment
Carter, Dr E. C. ....	A case of Myxœdema with Insanity treated by injection with Extract of Thyroid Gland	B. M. J., vol. i., '90, p. 805	
Corkhill, Dr J. G. G.	Myxœdema with enlarged Thyroid treated by subcutaneous injections of Thyroid Extract; Recovery	B. M. J., vol. i., '93, p. 8	See Case, No. 27, Fol. 20

SOME RECENT LITERATURE ON THYROID GLAND,  
MYXŒDEMA, CRETINISM, &c. (continued)

AUTHOR'S NAME	TITLE OF PAPER	WHERE PUBLISHED	REMARKS
Cunningham, Dr. H. W.	Myxœdema associated with Goitre	B. M. J., vol. ii., '92, p. 1386	Letter
Davies, Dr A. T. ....	The treatment of Myxœdema	Lancet, vol. i., '93, p. 328.	Letter advocates the use of a powder
Do. ....	The treatment of Myxœdema by Thyroid Gland.	B. M. J., vol. i., '93, p. 668	Alluded to variations in size of Thyroid Glands and consequent need of caution in regulating dose
Duckworth, Sir Dyce	Sequel to a case of Myxœdema	B. M. J., vol. i., '92, p. 911. Lancet, vol. i., '92, p. 976	Although the title of this paper is treatment by "Thyroid feeding" the first five cases are treated by "Thyroid Extract" and only the sixth by "½th of a Thyroid Gland"
Dunlop, Dr. G. H. M.	Six cases of Myxœdema treated by Thyroid feeding	Ed. M. J., May, 1893, p. 1005	
Fenwick, Mr E. Hurry	The Diuretic Action of fresh Thyroid Juice	B. M. J., vol. ii., '91, p. 798	
Do.	The subcutaneous injection of Thyroid Juice in Myxœdema	B. M. J., vol. ii., '92, p. 613	
Do.	The Effects of Fresh Thyroid Juice in Myxœdema	Ibid., p. 894	
Fox, Dr E. L. ....	A case of Myxœdema treated by taking Extract of Thyroid by the mouth.	B. M. J., vol. ii., '92, p. 941	
Gibson, Dr J. L. ....	The Function of the Thyroid Gland	B. M. J., vol. i., '92, p. 1049	Letter anent Prof. Victor Horsley's paper in the same Journal, Jan. 30th and Feb. 6th
Gourlay, Mr F. ....	Thyroid Medication; a Suggestion	B. M. J., vol. ii., '92, p. 1459	Suggests to mince Thyroid Gland very fine and dry at a low temperature
Hale, Dr G. E. ....	Four cases of Myxœdema treated by injections of Thyroid Extract	B. M. J., vol. ii., '92, p. 1428	
Hanan, Dr Arthur	Cretinism and Myxœdema	B. M. J., vol. ii., '90, p. 786	
Henry, Dr. J. P. ....	A case of Myxœdema cured by Thyroid Extract	B. M. J., vol. i., '93, p. 737	Gives portraits of case before and after treatment
Holman, Dr Constantine	Case of Myxœdema treated by Thyroid Feeding	B. M. J., vol. i., '93, p. 114	Good case of treatment by feeding
Horsley, Prof. Victor	Note on a possible means of arresting the progress of Myxœdema, Cachexia, Strumipriva, and allied diseases	B. M. J., vol. i., '90, p. 287	



SOME RECENT LITERATURE ON THYROID GLAND,  
MYXŒDEMA, CRETINISM, &c. (continued)

AUTHOR'S NAME	TITLE OF PAPER	WHERE PUBLISHED	REMARKS
Horsley, Prof. Victor	Further note on the possibility of curing Myxœdema	B. M. J., vol. ii., '90, p. 201	
Do.	Remarks on the function of the Thyroid Gland: a Critical and Historical Review.	B. M. J., vol. i., '92, pp. 215 and 265	
Do.	The Function of the Thyroid Gland.	B. M. J., vol. i., '92, p. 1113	Reply to Dr. J. L. Gibson's letter
Lundie, Dr R. A. ....	A case of Myxœdema treated with Thyroid Extract and Thyroid Feeding.	B. M. J., vol. i., '93, p. 64	Gives portraits of case before and after treatment and enjoins caution as to unusual exertion during treatment
Do. ....	The Treatment of Myxœdema.	Ed. M. J., May, 1893, p. 996	Valuable paper with table of 46 published cases
Mackenzie, Dr Hector	Tuberculous Larynx in a case of Myxœdema.	B. M. J., vol. ii., '91, p. 896	
Do.	A case of Myxœdema treated with great benefit by feeding with fresh Thyroid glands.	B. M. J., vol. ii., '92, p. 940	
Do	Myxœdema and the recent advances in its treatment.	Lancet, vol. i., '93, p. 123.	A valuable summary of the subject
Murray, Dr George R.	Note on the treatment of Myxœdema by hypodermic injections of an Extract of the Thyroid gland of a sheep.	B. M. J., vol. ii., '91, p. 796	This paper was read at the meeting of the British Medical Association at Bournemouth in July, 1891, and is the <i>first</i> recorded case of the successful use of Thyroid Extract
Do.	The Pathology and Treatment of Myxœdema. Remarks on the treatment of Myxœdema, with notes of four cases.	B. M. J., vol. ii., '92, p. 449	
Do.	The treatment of Myxœdema and Cretinism.	Lancet, vol. i., '93, p. 1130	Case of a male treated, with photographs. Valuable suggestions as to the use of Thyroid Extract and precautions in administering

SOME RECENT LITERATURE ON THYROID GLAND,  
MYXŒDEMA, CRETINISM, &c. (continued)

AUTHOR'S NAME	TITLE OF PAPER	WHERE PUBLISHED	REMARKS
Napier, Dr. Alex.	The Thyroid treatment of Myxœdema: the selection of Thyroid gland for administration.	Lancet, vol. i., '93, p. 273	Dr Napier dissected 100 Thyroids and found 50 more or less diseased and cautions the readers of the Lancet against relying upon "unskilled" selection of the glands. We have dissected many thousands of glands and have not found the abnormal ones to exceed 2 per cent. —Eds.
Schwarz, —	The value of injections of Thyroid juice.	B. M. J., vol. ii., '92, Epit. No. 460	Used an aqueous extract with negative results
Shapland, Mr J. Dee	The treatment of Myxœdema with the Thyroid gland of the sheep.	B. M. J., vol. i., '93, p. 738	Fed patient with "underdone Thyroid Gland." Photographs
Shaw, Dr Clays	Case of Myxœdema with restless Melancholia treated by injections of Thyroid Juice: Recovery	B. M. J., vol. ii., '92, p. 451	Gives bulletin of treatment from April 8 to July 8, with sheep's, cows' and calves' thyroids, and with B. liquid extract
Stewart, Prof. Grainger	The treatment of Myxœdema by Thyroid Feeding: its advantages and risks	Practitioner, July, 1883, p. 1.	Lays special stress on the necessity of examining the heart before commencing treatment. See note page 34
Sollier, —	Basedow's Disease and Myxœdema	B. M. J., vol. i., '92, Epit., 136	
Stokes, Sir William	Operations on the Thyroid Gland	B. M. J., vol. ii., '91, p. 75	From proceedings of Royal Academy of Medicine in Ireland
Thomson, Dr John	Note on a case of Myxœdema which ended <i>fatally</i> shortly after commencement of Thyroid treatment.	Ed. M. J., May, 1893, p. 1014	Patient treated by Thyroid Glands. Post mortem by Dr Thomson and Dr Byrom Bramwell. Microscopic report by Dr Gordon Sanders
Vermeluen, Mr F.	The treatment of Myxœdema by feeding with Thyroid glands.	B. M. J., vol. i., '93, p. 266.	
Whitwell, Dr James R.	The nervous element in Myxœdema.	B. M. J., vol. i., '92, p. 430	Interesting paper with illustrations of Nerve cells of motor region, healthy, in epilepsy with dementia and in Myxœdema
Williams, Mr H.	Graves's Disease and Myxœdema.	B. M. J., vol. i., '93, p. 799	

## TABLE OF RESULTS OF TH

\* Under "Where Recorded"

No.	DOCTOR'S NAME	Sex & age of Patient	Ill	Treated by	Dose and Duration of Treatment
1	Abbot-Anderson, Dr. W. M.	F. 32	.....	Hypodermic	15 injections of 5 and three thyroids
2	Aikman, Dr. J. ....	F. 45	24 years	Hypodermic and internal	20 minims by hypodermic injection once a week
3	Do. ....	F. 57	12 years	Do.	Do.
4	Anderson, Prof. M'Call	F. 30	? 10 years	Internal	20 minims daily, often
5	Atkins, Mr F. D. ....	F. 53	15 months	Hypodermic & Internal	20 drops every other day injection for 8 weeks
6	Baber, Dr E. Creswell	M. 53	5 or 6 years	Internal	5 glands in 3 weeks
7	Barley, Dr D. H. ....	F. 30	First diagnosed 2 years before treatment	Do.	15 minims daily
8	Barron, Dr ..... ..	F. 64	5 years	Hypodermic	.....
9	Do.	F. 55	.....	Do.	.....

## TREATMENT OF MYXŒDEMA

of case sent to B. and M.

Result	Improvement commenced	Unpleasant Effects and Cause of them	Further Remarks	Where Recorded
Improved all main-	All the symptoms improved rapidly	Only a sensation of faintness and numbness in the arms after the first two injections	-----	Journal of Laryngology Rhinology & Otology
Full cure	In body heat after 10 days, growth of hair under 1 month, menstruation six weeks	Diarrhœa, flushing and oppression with intermitting pulse. Once abscess	-----	*
	Do. menstruation 4 months	Diarrhœa once, flushing of face, and intermitting pulse	-----	*
Improved	Within a few days	None	-----	Practitioner, Jan. 1893, p. 39
Satisfac- Patient tively well	About end of the 4th week	Abscess in back causing a good deal of trouble	I find it necessary for my patient to take the remedy internally occasionally, as sometimes her face becomes swollen and her voice altered. Tried the raw Sheep's thyroid, it did the patient good but was very nauseating. The Extract is more pleasing & efficacious	*
Improved	-----	Depression, headache, and aching in back and limbs; nausea	-----	B.M.J., i. 1893, p. 10
Locally cured	Within a fortnight	First dose taken was 25 minims by mistake—fainting, collapse	Bad case. Pronounced mental symptoms (loss of memory &c.) almost unable to walk from staggering. Was treated with raw glands with slight success for one month before extract used. Difficult to obtain raw gland	*
Weight in most stable	-----	-----	One taking 2 lobes weekly, the other $\frac{1}{2}$ gland, by injection weekly	Ib. ii, 1892, pp. 1197 & 1384
-----	In less than seven weeks, after thirteen injections, the weight had fallen from 10st 5lbs to 9st 11b	-----	-----	L'pool M. J., Jan., 1893, p. 142

## TABLE OF RESULTS OF THYROID

\* Under "Where Recorded"

No.	DOCTOR'S NAME	Sex & age of Patient	Ill	Treated by	Dose and Duration of Treatment
10	Barton, Dr J. K. ....	F. 60	2 years	Hypodermic	15 minims every third day for 6 weeks
11	Bateman, Mr W. A. F.	F. 46	10 years	Internal	20 drops daily at 1 p.m. 15 drops twice a day in milk
12	Do.	F. 50	About 6 years	Do.	15 drops in milk
13	Do.	F. 50	About 12 years	Do.	15 drops every other day in milk
14	Beadles, Dr .....	F. 50	8 years	Hypodermic	20 minims twice weekly
15	Beatty, Dr Wallace .....	F. 45	5 or 6 years	Do.	5 glands in 2 months
16	Benson, Dr Hawtrey .....	F. middle age	8 years	Internal	10 minims twice daily for three weeks, then 15 minims twice daily for rest of year
17	Bentlif, Mr P. B. ....	F. 33	9 years	Powder internally	5 grains gradually
18	Blandford, Mr. J. W. ....	.....	5 years	Internal	10 minims twice daily
19	Do. ....	.....	2 years	Do.	Do.
20	Bouchard, Prof. ....	.....	.....	Hypodermic	.....
21	Brand, Dr A. T. ....	F. 59	About 2 years	Do.	15 minims twice a day
22	Calvert, Dr. ....	F.	12 years	Internal	$\frac{1}{2}$ gland thrice weekly
23	Carter, Dr E. C. ....	F. 43	.....	Hypodermic	.....

## TREATMENT OF MYXŒDEMA

of case sent to B. and M.

Result	Improvement commenced	Unpleasant Effects and cause of them	Further remarks	Where Recorded
factory, change-appearance in mind, vigour, swellings ceased, healed	Ten days after treatment and went on rapidly afterwards	None	I have seen this patient two months after treatment ceased and she was perfectly well	D. M. J., May, 1893
to be cured. mented	During first fortnight of treatment	The 20 drops daily was too much and patient had severe headache and a papular rash	A well-marked case of Myxœdema, and treatment has been most remarkable	*
artling Treatment	-----	None	Treatment seems to have turned this lady into a young and good looking woman. She is the mother of 12 children	*
improved both physical & con-	In the first week	None	-----	*
ically	In about a fortnight	Heat and nausea	A maniacal patient	B. M. J., ii. '92, p. 1386
te re-	A marked improvement in the patient's condition was noticeable within one week	None	-----	Ib. i. 1892, p. 544
ally relieved	In about three weeks	None	Patient now takes 6 minims daily to maintain the recovery and it is sufficient.	B. M. J., April 15, 93, p. 795
ment treatment	About a week after commenced treatment	Faintness, severe headache	-----	*
ment	Sudden death from syncope	-----	-----	*
ed	Within a fortnight but relapsed after a time and improved again on treatment	None	-----	*
improved of all symptoms	-----	Headache and pains in chest and limbs	-----	Lancet, ii. '92, p. 807
better	Within a fortnight	Great feeling of faintness on two occasions, probably due to too rapid injection	Tumours have twice formed at site of injection, but abscess has never formed.	*
ed	-----	-----	Gland partly cooked	Ib. i. 1893, p. 248
	After six injections	Once local inflammation	Cows' and pigs' thyroids used	B. M. J., i. 1892, p. 805

## TABLE OF RESULTS OF THE

\* Under "Where Recorded"

No.	DOCTOR'S NAME	Sex & age of Patient	Ill	Treated by	Dose and Duration of Treatment
24	Chopinet, Dr	F. 23	2 years	Hypodermic	$\frac{1}{2}$ gland in three fortnightly
25	Clarke, Dr Mitchell	M. 48	.....	Do.	.....
26	Do.	F.	.....	Do.	.....
27	Corkhill, Dr J. G.	F. 32	.....	Do.	September to November 1892, 15 minims three times a week
	Berry, Dr H. P.	F. 32	1 year	Hypodermic and Powder	September 24th, now
28	C Do.	Dr T. F. 63	10 years	Hypodermic & Internal	About 10 minims 4 months and 2 months
28*		F. 38	4 years		
29		F. 64	6 months	Internal	10 drops daily. 1st March and April
30	Davidson, Dr G.	F. 49	Nearly 3 years	Hypodermic	30 minims twice from middle of January to end of March, 1893
31	Davies, Dr A. T.	M. 43	12 years	Do.	.....
32	Do.	F.	.....	Do.	.....
33	Do.	F. 47	.....	Internal	Powder representing 1st twice weekly, then
34	Do.	F.	.....	Do.	Do.
35	Do.	M. 45	6 years	Do.	.....
36	Dunlop, Dr Melville	F. 46	3 $\frac{1}{2}$ years	Do.	In most cases treatment commenced by 5 grains thrice weekly. As treatment resulted dose usually diminished until established, when further are given every day until cessation of treatment interminable.
37	Do.	F. 46	13 years	Do.	
38	Do.	F. 43	2 years	Do.	
39	Do.	F. 56	9 years	Do.	
40	Do.	F. 52	2 years	Do.	
41	Do.	F. 60	.....	Do.	

## TREATMENT OF MYXŒDEMA

of case sent to B. and M.

Result	Improvement Commenced	Unpleasant Effects and Cause of them	Further Remarks	Where Recorded
Greatly improved	.....	Pain in back and general fatigue for 24-36 hours after injections	Thymus Extract used at first, without improvement	Soc. de Biol. Paris, 1892, iv. p. 602
Do.	.....	.....	.....	B.M.J., ii, 1892 p. 451
Do.	At once	None	Thyroid enlarged	Ib. ii. 1892, p. 451 B. M. J., i., '93, p. 8
Do. and	Almost immediately	An attack of fainting twice after injections	When under the influence of Thyroid the patient lost weight	B. M. J.
Do. and	Almost immediately	None except some uneasiness caused by hypodermic injections.	Patients continue to be somewhat weak	*
Do. and	In about a week	Swelling of Parotid and submaxillary glands from a single treble dose	Whenever Thyroid is discontinued the Myxœdema symptoms re-appear. Keeps well when she takes the Thyroid Extract, daily 5 drops	Case referred to in Edin. Med. Journ., May, 1893
Do. and	After first injection	None	Used the extract once, when 15 days old, without any unpleasant result	*
Do. and	.....	None	Relapse after a few weeks' interval.	Clin. Soc. Trans., vol. 25, p. 306.
Do. and	.....	.....	.....	B. M. J., ii., 1892, p. 451.
Do. and	.....	.....	Lost 4 stone under treatment.	Lancet, i. 1893, p. 248.
Do. and	.....	.....	.....	Do.
Do. and	.....	.....	.....	Do.
Do. and	Improvement noticed in a few days, or in a week at longest both by patients and friends	Nausea, vomiting, want of appetite, pains in limbs and over chest, faintness occurred in two cases to a slight degree. In no case were these symptoms severe. In one case palpitation and intermittent pulse, probably due to interference with balance of circulation owing to great loss of body weight	.....	Ed. M. J., May, 1893



## TABLE OF RESULTS OF THE

\* Under "Where Recorded"

No.	DOCTOR'S NAME	Sex & age of Patient	Ill	Treated by	Dose and Duration of Treatment
42	Dunlop, Dr D. Melville.....	M. 64	15 or 16 years	Pure glands	1-6th of a gland week
43	Dunlop, Mr J. ....	F. 54	1 year	Internal	10 minims twice a first week than the a day
44	E Dr G. ....	F. 53	5½ years	Do.	1 drachm during 20 minim doses. till present date
45	Fenwick, Dr E. Hurry.....	F. 3 cases	.....	Hypodermic	.....
46	Fox, Dr E. L. ....	F. 49	.....	Internal	½ gland twice a week
47	Gibbins, Dr A. T. ....	F. 42	A year or more	Do.	10 minims twice first, afterwards every other day
48	Goodchild, Mr T. A. ....	F. 58	3 years	Do.	15 minims daily now 5 minims daily
49	Green, Mr A. Withers	F. 26	5 years	Hypodermic	First 3 months 2½ twice a week, next once a week
50	Hale, Dr .....	F. 48	15 years	Do.	25 minims weekly
51	Do.	F. 46	2 years	Do.	Do.
52	Do.	F. 54	7 years	Do.	Do.
53	Do.	F. 27	1½ years	Do.	Do.

## TREATMENT OF MYXŒDEMA

of case sent to B. and M.

It	Improvement commenced	Unpleasant Effects and Cause of them	Further Remarks	Where Recorded
Man at by every extreme as treatment ceased	-----	-----	In this case the man was so weak before treatment commenced, that he had to be fed and nursed like a baby. I feel certain death would have occurred in any case quite independently of treatment	Ed. M. J., May, 1893
im- ment	Quite visible after first week	None	-----	*
ly to- overy. years to young	Within 3 or 4 weeks	Fugitive pains and some soreness in the neighbourhood of the Thyroid gland	Nothing but steady improvement. Can transact the ordinary business of life, write cheques, letters etc.	*
l	Almost immediately	No abscesses with fresh unsterilised juice.	-----	B. M. J., ii., 1892, pp. 613 and 894.
proved	-----	Weakness and profuse perspirations.	The weakness followed larger doses than had been ordered. Gland partly cooked.	Ib. ii., 1892, p. 940.
prove-	In about a week	Diarrhœa, headache and increased temperature after a few days, when taken twice a day	-----	*
	In about a week	None	A very marked case and improvement rapid	*
im- ment	Gradually from the first	Some local swelling inclining to abscess at seat of puncture, sometimes through keeping injection too long before using	Soon after first confinement began to be fat and fail in health; has had two children who died, aged 16 mos. and 12 mos.; suckled both up to their death.	*
d im- ment	In about 3 weeks	None.	Slight deterioration after 3 months' intermission.	B. M. J., ii., '92, p. 1428.
prove-	In about 5 weeks	Giddiness and headache, weakness and pain in arms.	-----	Do.
d im- ment	-----	Faintness, nausea, &c.	-----	Do.
prove-	-----	Once local inflammation. Once abscess.	-----	Do.

## TABLE OF RESULTS OF TREATMENT

\* Under "Where Recorded"

No.	DOCTOR'S NAME	Sex & age of Patient	Ill	Treated by	Dose and Duration of Treatment
54	Hall, Dr B. ....	F. 49	At least 2 years	Internal	10 minims daily for 3 months
55	Handford, Dr ..... .....	.....	.....	Do.	.....
56	Hardy, Dr C. M. ....	F. 46	10 years	Hypodermic & Powder. Then partially cooked glands Hypodermic	15 minims Hypodermic each day, $\frac{1}{2}$ lobe of gland ing
57	Hawkyard, Mr A. ....	F. 49	About a year	Hypodermic	20 minims first 4 injections, afterwards 10 minims, then 10 minims October, 1892, to June, 1893.
58	Haynes, Dr Stanley ....	M. 80	2 years	Internal	10 minims twice a day to June, 1893, since then 10 minims twice a day
59	Henry, Dr J. P. ....	F. 44	13 or 14 years	Hypodermic	May to Oct., 1892, 30 minims twice a week for 4 weeks, then 30 minims twice a week for rest of time
60	Herr, Dr ..... .....	.....	.....	Do.	.....
61	Holman, Dr C. ....	F. 44	7 years	Internal	1 gland every 2nd day $\frac{1}{2}$ gland
62	Howitz, Prof. ....	F. 42	7 years	Do.	2 glands daily, last 2 every 2nd day

## TREATMENT OF MYXŒDEMA

\* case sent to B. and M.

It	Improvement commenced	Unpleasant Effects and Cause of them	Further Remarks	Where Recorded
re-	Within a fortnight she began to feel better	None	She was nearly bald and she now has a thick crop of hair coming. She could not walk upstairs without feeling faint, she can now walk a couple of miles without fatigue. The "flabbiness" and waxy colour have gone	*  B.M.J., ii., '92, p. 1434.
proved	Within 10 days	None	-----	*
at the sign, June	Marked improvement after third injection	The last injection caused a very large abscess. Probable cause an improperly sterilized needle	The case was remarkable for the very rapid onset of symptoms; was a typical case of myxœdema at commencement of treatment. Twelve months before, there was not the slightest sign of myxœdema present	*
proved; under it	About ten days	None	Case imperfect having been too short a time under special treatment? Myxœdema being limited to right lower limb	*
	Immediately	Epileptiform convulsion after 1st injection. Flushing, weakness and pain in back once or twice. Abscess once	Patient is now in excellent health and taking occasional doses of Thyroid to render cure permanent	B.M.J., April 8th, 1893
	-----	Once an epileptiform attack.	-----	Ib. ii., 1892, p. 452.
proved	-----	Tumultuous action of heart; disturbed sleep.	Disease in right kidney improved simultaneously.	Ib. i., 1893, p. 114.
proved	-----	Pain in chest, with quick weak pulse.	Calves' glands partly cooked.	Semaine Méd., 8 Fév., 1893, p. 59.

## TABLE OF RESULTS OF THE

\* Under "Where Recorded"

No.	DOCTOR'S NAME	Sex & age of Patient	Ill	Treated by	Dose and Duration of Treatment
63	Hunter, Dr W. ....	M. 36	Many years; first diagnosed 1888	Hypodermic	30 minims once about 3 months afterwards once a for other 2 months May and October
64	Jackson, Dr H. ....	F. 42	8 years	Internal	One average size taken raw in the week from May 14th when was given in doses daily for then gradually twenty minims reduced to 10 mi
65	Lubbock, Mr E. A. ....	F. 40	10 years	Do.	Extract equal twice weekly. to June 19th, 18
66	Lundie, Dr R. A. ....	F. 53	14 years	Do.	5 minims daily at
67 68	Lunn, Mr J. R. .... Do. ....	F. 42 F. 68	years	First Hypo- dermic, then Internal	20 minims once a commenced with three times a we
69	McKelvie, Dr R. ....	F. 34	About 3 years	Hypodermic	15 minims every then 25 minims of
70	Mackenzie, Dr. H. W. G.	F. 39	4 years	Internal	Sometimes 2 thy

## TREATMENT OF MYXŒDEMA

of case sent to B. and M.

It	Improvement commenced	Unpleasant Effects and Cause of them	Further Remarks	Where Recorded
cure, sign of June,	Shewed an improvement almost immediately after first injection	No unpleasant effects except formation of abscess at seat of injection when that was made into gluteal region. All other injections gave no trouble	Once only being injected he looked pale and felt faint but only for a minute or two. Dr. Hunter believes this to be the <i>second</i> case of cure in a male	Paper read before Med-Chirurgical Society of Nottingham (See plate facing introduction)
improve-	About 7 weeks after, a considerable improvement was manifest in her general appearance	8 weeks after commencing the treatment a great feebleness, languor and want of appetite came over her and she was obliged by the weakness to go to bed, this passed gradually off and with a Mixture of Nitro-hydrochloric her appetite returned. She has again resumed the drops but in 10 minim doses only	-----	*
re-	Immediately	A little giddiness the next morning following the taking of the doses on the first two occasions only	Patient <i>feels</i> quite well and walked 8 miles on June 11th without fatigue	*
proved	-----	Abscesses & nausea from subcutaneous injections. Pain in chest, arms, &c. Breathlessness	-----	B. M. J., i., 1893, p. 64
im-	In a few weeks	A feeling of weakness and itchiness of skin	One woman was quite deaf before treatment	*
	In 6 weeks, when menstruation returned after 3 years stoppage	None. Always injected slowly and kept syringe scrupulously clean	Associated with the illness throughout was an intense neuralgia of thigh, worse at nights, which no treatment internal or external could relieve, and this was the last symptom to disappear. Menstruation recurred thrice; she is now pregnant; hair began to grow in three months	*
marked for the	-----	Nausea, vomiting, pains all over, quick pulse	-----	Ib., ii., 1892, p. 940

## TABLE OF RESULTS OF THE

\* Under "Where Recorded"

No.	DOCTOR'S NAME	Sex & age of Patient	Ill	Treated by	Dose and Duration of Treatment
71	Mackenzie, Mr L. ....	F. 52	3 or 4 years	Hypodermic	12 minims once latterly 24 minims once a week
72	Maule, Dr W. ....	F. 45	14 years	Internal	Raw Thyroid given first three weeks powder
73	Mendel, Dr ....	F. 58	11 years	Hypodermic	Daily injections— later $\frac{1}{10}$ th thyroid
74	Mitchell, Mr J. J. and Craig, Mr. J. ....	M. 50	15 years	Do.	10 minims twice first month, then week, and after fortnight to this time
		Brother and Sister			
75	Do.	F. 47	7 years	Do.	Do.
76	Murray, Dr G. R. ....	F. 46	4 or 5 years	Do.	24 glands in 3 months 25 minims fortnightly
77	Do.	F. 52	12 years	Do.	25 minims weekly nightly
78	Do.	F. 62	6 or 7 years	Do.	25 minims weekly
79	Do.	F. 64	5 years	Do.	12 to 25 minims weekly
80	Napier, Dr ....	F. 54	5 years	Do.	3rd gland, usual second day
81	Neilson, Dr H. J. ....	M. 55	24 years consequent on "cut throat"— suicidal	Internal	Jan. 27th to Apr minims on every Saturday and Su
82	O'Carroll, Dr J. F. ....	F. 33	About 8 months noticeably	Hypodermic	Two months

## TREATMENT OF MYXŒDEMA

Case sent to B. and M.

It	Improvement Commenced	Unpleasant Effects and Cause of them	Further remarks	Where recorded
after rest ruary re- some-	Patient improved visibly after 1st injection	Had to give up hypodermic injection owing to 3 severe abscesses forming at points of puncture partly from not resting arm	-----	*
satis- Still of	At once	None	Patient improved with preparation of iron in addition to Thyroid Powder	*
proved	-----	None	-----	Deut. Med. Wochensch, Jan. 12, 1893, p. 25 *
im- nt in ance ypical as	At end of first week in each case, but much more so in the case of the sister. The sister is practically cured but relapses somewhat unless she has an injection periodically. Brother very much improved.	During first month of treatment there was rapid wasting (the flesh lost being subsequently regained to a great extent) so much so that the female patient took to her bed and thought she was going to die. Attacks of dyspnoea and severe headache lasting 24 hours were also noticed after some of the earlier injections	When the treatment had been carried on three weeks, the glands were given raw instead of extract but caused such depression, headache and dyspnoea that the use of them had to be given up	*
proved	-----	Once abscess	Relapse after five weeks interval	B. M. J., ii., 1891, p. 797, and ii., 1892, p. 449. Ib. ii., 1892. p. 450
	-----	Malaise. Once slight epileptiform convulsions, &c.	-----	Do.
	-----	-----	Died from cardiac failure Ditto	Do. Do.
proved	-----	Abscesses, headache, and febricula	-----	Glasgow M.J. Sept., 1892, p. 161 *
Im- nt	Six weeks after first treatment with Thyroid Extract.	Giddiness only	Cut in throat injured thyroid gland	*
nent	-----	None	The case was a very slightly marked one and there was corresponding difficulty in determining improvement. It was mainly noticed in diminution in the girth of the arms, and in re-establishment of normal sweating	*



## TABLE OF RESULTS OF THE

\* Under "Where Recorded"

No.	DOCTOR'S NAME	Sex & age of Patient	Ill	Treated by	Dose and Duration of Treatment
83	Oldacres, Mr C. E. ....	M. 62	9 years	1st Hypodermic, then Internal	20 minims to 10 minims hypodermically, 20 minims internally.
84	Pasteur, Dr .....	F. 55	? 17 years	Internal	$\frac{1}{2}$ gland twice a week 1 gland daily
85	Pollard, Dr. ....	F. 37	2 or 3 years	Hypodermic for eight months then Internal	20 minims of extract 3 times a week
86	Robin, Dr V. ....	7	Congenital	Hypodermic	.....
87	Robinson, Mr E. L. ....	F.	7 or 8 years	Hypodermic and Internal	10 to 20 minims
88	Rogers, Dr Bertram .....	F. 62	From 6 to 10 years	Internal	December 5th, 1892, 21st, 1893 minims alternate day, later 20 xx twice a week
89	Shaw, Dr Claye .....	F. 33	15 months	Hypodermic	30 minims, three times a week
90 90*	Sheppard, Dr W. T. .... Do.	F. 50 F. 30	7-8 years 4 years	Hypodermic and Internal	20 minims twice a week about 2 months
91	Sloan, Dr S. ....	F. 49	16 years	Internal	10 minims daily for 2 weeks, gradually reduced to 5 minims every 2 days. From Dec. 1892, 5 minims 3 times a week gradually reduced to 2 days. From Jan. end of May
92	Do.	F. 48	15 years	Do.	From Dec. 1892, 5 minims 3 times a week gradually reduced to 2 days. From Jan. end of May
93	Smith, Dr R. ....	F. 54	Over 3 years	Hypodermic and Internal commencing with Hypodermic	February 24th, 1893, 21st, 1893, 25 minims weekly from Feb. 21st to Sept. Two or three times a week

## TREATMENT OF MYXŒDEMA

of case sent to B and M.

Patient	Improvement Commenced	Unpleasant Effects and Cause of them	Further Remarks	Where recorded
before treatment, 17 days after 12th dose to go again work	After first injection	Great pain from injections but no abscess. After the earlier injections the dose had to be reduced to 10 minims, as they made him feel so ill and prostrate.	The fresher the Extract the less pain there seemed to be	Northampton Med. Meeting. Case exhibited by Dr Jones
of im-	-----	Toxic symptoms, accompanied by extreme feebleness of heart	-----	Lancet, i. 1893 p. 248
parent-thyroid; still twice a pre-	Immediately	2 serious abscesses. Twice alarming sense of fainting, oppression of breathing (during hypodermic treatment only)	-----	*
proved	-----	-----	Grafting of thyroid performed subsequently	Lyon. Med., Aug. 7, 1892, also in B.M.J. "Epit." ii., 1892, p. 43
cally	After second injection	Giddiness. A sense of suffocation	The first improvement shewn was a brighter look, a return of hearing which had been nearly lost, and a feeling of warmth. The case peeled all over	*
recovery not well ears	Increase of sensation of warmth in 5 days. Improvement in speech in a week or 10 days. Skin moister early.	Faintness but never syncope, due probably to too frequent doses.	Elevation of temperature to normal after a month. Pulse much accelerated at first but is now stronger than it has ever been	*
recovery	Within a fortnight	Only some local abscesses at entrance of point of syringe	Recovered simultaneously from melancholia	B. M. J., ii., 1892, p. 451
satisfac- in treat- ceased	After second or third injection.	In one case syringing was followed by an abscess.		*
very	10 to 14 days	At first only, weakness and "stretching" pains.	The Gout attacks are not so severe since	*
	In 2 weeks or so	At first only, weakness and "stretching" pains. Giddiness if <i>medicine</i> old	Patient says she is in splendid health	*
great improvement and d, es- the	14 days after 1st dose	None after Hypo. Injec: Cyanosis and faintness with profuse sweating after Thyroid by mouth. (Excessive dose)		*

## TABLE OF RESULTS OF TH

\* Under "Where Recorded"

No.	DOCTOR'S NAME	Sex & age of Patient	Ill	Treated by	Dose and Duration of Treatment
95	Smith, Dr R. ....	F. 64	11 years	Hypodermic and Internal commencing with Hypodermic	Hypodermic 30 minims a week till July 4; lobe Sheep's Thyroid from Nov. 9th till time (June)
96	Smith, Mr T. and Chadwick, Dr C. M. ....	F. 73	10 years	Internal	5-20 minims three day, first gradually increased and then
97	Soulby, Dr C. E. ....	M. 40	18 months	Do.	May and June 2 grains daily for 4 weeks
98	Squance, Dr T. Coke ....	F. 18	6 months	Hypodermic	April, May, and June 10 minims daily
99	Do.	F. 17	3 months	Internal	April to June, 1893 2 grains powder daily
100	Do.	F. 25	18 months	Do.	April, May, and June 10 grains powder daily
101	Stewart, Dr J. ....	F. 49	11 years	Hypodermic	15 minims bi-weekly
102	.....	F. 45	6 years	Hypodermic & Internal	20 to 30 minims by mouth 10 minims by mouth at first, then twice
103	Tonking, Dr. J. H. ....	F. 50	Several years	Hypodermic	20 minims twice weekly from April 14th
104	Wichmann, Dr .....	F. 35	2 years	Do.	$\frac{1}{2}$ thyroid twice weekly
105	Wilkinson, Dr J. B. ....	F. 58	2 or 3 years	Internal	10 minims per day April 22nd, 1893; continuing
106	Copley, Mr W. H. ....	F. 50	12 years	Hypodermic and Internal	60 minims
107	Day, Mr T. Montagu ....	F. 62	6 or 7 years	Internal	10 minims daily
108	J Dr. H. ....	F. 74	3 or 4 years	Do.	10 minims twice a
109	Do.	M. 44	5 years	Do.	Do.
110	Kirk, Dr R. ....	F. 33	10 years	Do.	.....
111	Do.	F. 34	3 or 4 years	Do.	.....
112	Do.	F. 71	20 years	Do.	.....
113	Owen, Mr. J. Lewis ....	F. 46	2 years	Hypodermic	25 minims

## TREATMENT OF MYXŒDEMA

Case sent to B. and M.

Time	Improvement commenced	Unpleasant Effects and Cause of them	Further Remarks	Where Recorded
Improvement and	42 days after commencement of treatment	Thickening of subcutaneous tissue after Hypodermic	Great improvement in growth of hair, in speech and movements generally, also mental improvement. No change as to delusions. No real alteration in temperature readings	*
Symptoms present all	On second day	Inflammation about the large toe nail, followed by acute Dermatitis of lower half of foot and threatening of gangrene	Time too short to say how far improvement permanent	*
Progress	In two weeks	None	-----	*
Relief	Fortnight	Hypodermic injection, followed by rigor and cellulitis, seemed to be due to idiosyncrasy	-----	*
Progress	Do.	None	-----	*
Progress	Do.	None	-----	*
Improvement	After 3rd injection	Injections in themselves caused no bad effect	-----	*
Time and date	Almost immediately	Formation of abscess by hypodermic injection & headache after continuance by both methods	-----	*
Improvement; smaller; progress; men- improve- hair	After 2nd injection	Tendency to faint same day as injection, with profuse sweating	Before injections, had frequent comatose attacks, with contracted pupils. No albumen	*
Improved	-----	Once headache for a few hours	Said, after 9 injections, not to be recognisable as a case of Myxœdema	Deut. Med. Wochensch, Jan. 12, 1893, p. 26
Relief	First week	None	-----	*
Relief	In 6 weeks	Some	-----	*
Relief	At once	Slight	Not a cure	*
Relief	End of a week	None	-----	*
Relief	10 days	Do.	-----	*
Relief	Almost immediately	Do.	-----	*
Relief	Do.	Do.	-----	*
Relief	Do.	Do.	-----	*
Improvement	After first week	Some	-----	Sheffield M.J., July, 1893, p., 315

## CRETINISM, TR

\* Under "Where recorded"

No.	DOCTOR'S NAME	Sex & Age of Patient	Ill	Treated by	Dose and Duration of Treatment
	Carmichael, Dr. Edward	F. 6	Congenital	Hypodermic and feeding	Ten minims twice then weekly of Then half a lobes weekly.
	Gilchrist, Mr T.	F. 26	Sporadic since an attack of whooping cough in Infancy, according to statement of mother	Extract internally	Equal to one gland for three months
	K , Dr H. E.	F. 26	Congenital	Internal	5 minims to 20 m diem ; June, 1893, treatment
	Paterson, Dr A. Gordon		18 months	Sporadic	Cretinism treated
	S , Mr P.	F. 15	Congenital	Internal	One drachm week then fortnightly
	Aikman, Dr J.	Has treated one case.			Articulation said to be imp
	Dunlop, Dr G. Melville	Has used the extract in two cases			of Cretinism, and
	Kirk, Dr R.	Has used the extract in two cases			of Cretinism with
	Maule, Dr W.	Has used the extract in three cases			of Cretinism, and
	Plummer, Dr S. W.	F. 22	2½ years	Hypodermic and internal	Ten to fifteen minims other night
	Do.	F. 24	4 years	Internal	

## EXOPHTHALMIC GO

NOTE.—Prof. Grainger Stewart, in the July number of *The Practitioner*, among the risks of treating Myxœdema by the Thyroid Gland, writes, "Among these is the occurrence of local abscesses, which has led most practitioners to abandon the hypodermic administration of the remedy." In the May number of the *Edinburgh Medical Journal*, Dr Lundie publishes a table of 46 cases of the Thyroid Treatment of Myxœdema of which 32 are treated by hypodermic injection and 14 by internal administration of glands and extracts. Of the 32 who were injected four only are reported to have suffered from abscesses, and we are not told the cause of them. In compiling the above table we asked our correspondents if there were unpleasant symptoms, could they suggest a reason for them, and the result is that in the very few cases in which abscesses have occurred we have as the probable cause "an imperfectly sterilized syringe," "partly from a resting arm," "when injected into gluteal region but not otherwise," and

## THYROID EXTRACT

Case sent to B. and M.

	Improvement commenced	Unpleasant effects and cause of them	Further remarks	Where recorded
	After the first few injections	At first child restless, irritable and sleepless. Dose reduced	-----	Lancet, vol. i., 1893, p. 580
Im- t in At- nade ating The lema body omen ed onth	After about one week	Severe headache at first	The girl became more inclined to play, and did not care to sleep so much as formerly. Beyond the reduction in the solid œdema the most marked improvement was in intellect	*
	About 10 days	Slight chilliness after first few doses	-----	*
3. De-	Decided improvement	after one month's use	of extract. Condition still improving	
	At once	None		*
				*
	ment of improvement, but by no means as great as in the Myxœdemic cases			
	ment in one			
<b>TREATED BY THYROID EXTRACT</b>				
rate and Ex- os sed. both arge) imin- ener- roved	Improvement could be detected after about first week of treatment	Once, slight induration at seat of a hypodermic injection: otherwise no bad effect	I think the improvement noted was sufficient to justify extended trials of Thyroid Extract in Exophthalmic Goitre	

h. We have compiled the above table in order to bring together, in a form available for reference, as large a number of cases as possible, and we hope the record may possess some value at the present time. The table is extremely favourable to the employment of thyroid extract both by hypodermic injection and by internal administration, but it includes every case returned to us and if the result had been exactly opposite, we should have published it just the same. Although in our capacity as manufacturing chemists (as Brady & Martin) we have made every animal extract which has been suggested for the treatment of this disease, we have no desire to make one of them unless they are proved to possess some value, as we have no ambition and no personal aims to gratify ourselves those of being useful, in such capacity as we occupy, in aiding the physician and surgeon in the relief and cure of human suffering.—Eds.

**Subcutaneous Injection of Normal Nerve Substance in Epilepsy and Neurasthenia.**—Babes *Deutsch. Med. Woch.*, July 28th, 1892, records the results of this method of treatment in a large number of patients. Normal brain and spinal cord were made into an emulsion with broth in the proportion of 1 gramme of the nerve tissue to 5 grammes of broth. Of this 4 to 5 grammes were injected in the abdomen or flank five to six times a week in epileptics, and four to five times a week in neurasthenias. A large number of epileptics were cured, and others greatly improved. Good results were also obtained in melancholia, neurasthenia, and cases of slow heart action. A case of sleeplessness, in which all known narcotics, even in large doses, had failed, was cured after three injections. A patient with cephalalgia of over a year's duration was remarkably improved after seven injections. Syncopal attacks and a paralytic condition in another patient disappeared after 16 injections. Sciatica of a month's standing was cured by three injections.—*B. M. J. Epit.*, Jan. 21, 1893, No. 60.

**Thyroid Extract (Fluid), for Hypodermic use.**—Forty-five minims are equal to one lobe of the thyroid gland of the sheep.

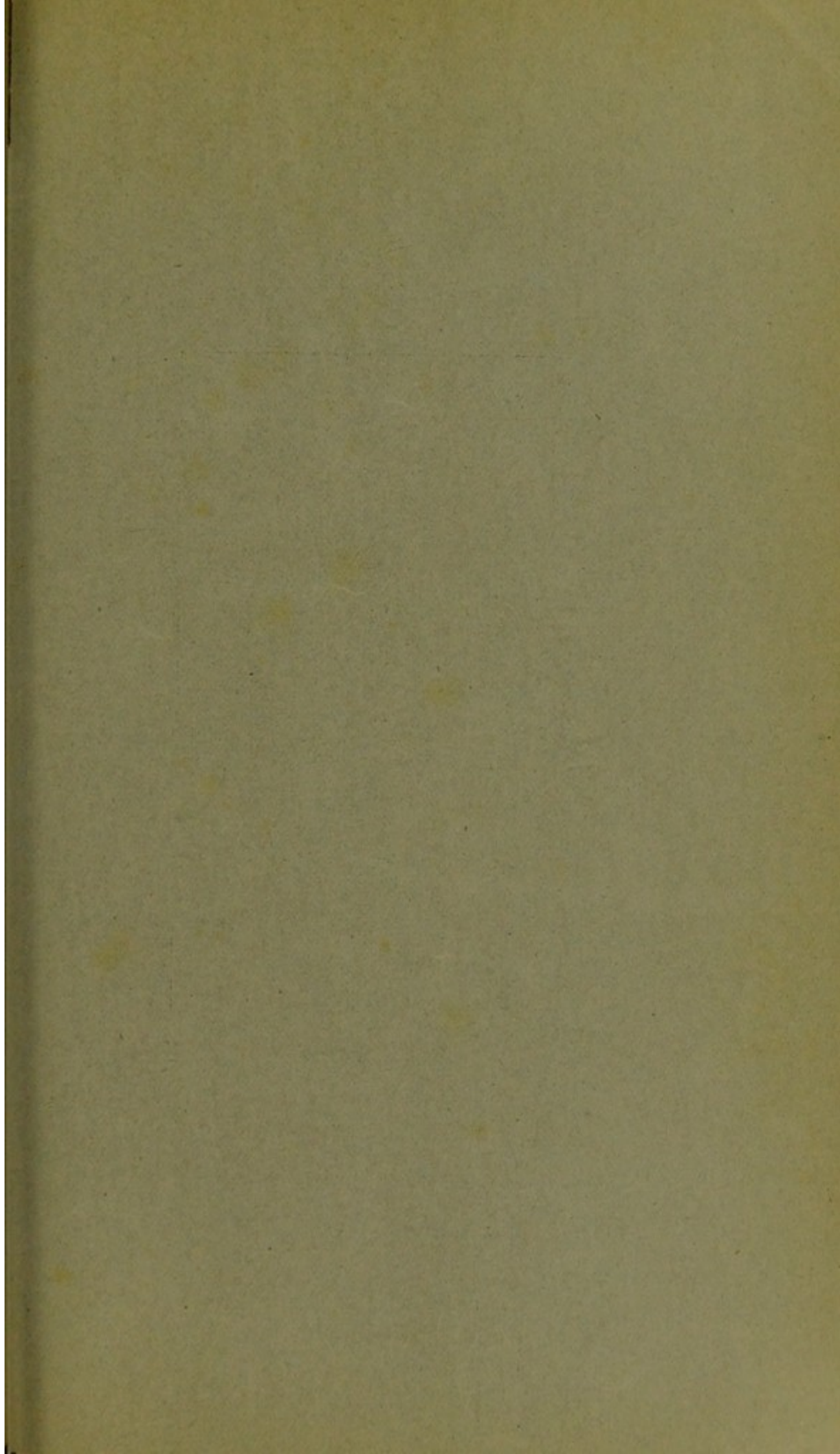
*Dose*—Fifteen minims injected slowly into some part where the skin is loose and not exposed to pressure, as between the shoulder blades. This dose may be given twice a week, and if done with proper antiseptic precautions, as regards the skin and hypodermic syringe, unpleasant results rarely follow. According to Dr Murray (*Lancet*, October 22, 1892) the advantages of the hypodermic method are considerable. "It is easily carried out, and only requires to be repeated twice a week at first, and afterwards an injection once a week or once a fortnight will maintain the patient in the improved condition. The main object is to introduce the secretion of the gland into the circulation of the patient slowly and in as natural a condition as possible, and this end is obtained by the hypodermic method."

**Thyroid Extract (Fluid), for Internal Administration.** The same strength as the fluid for hypodermic use, and only differing from it in not containing the small quantity of carbolic acid used to preserve the hypodermic solution.

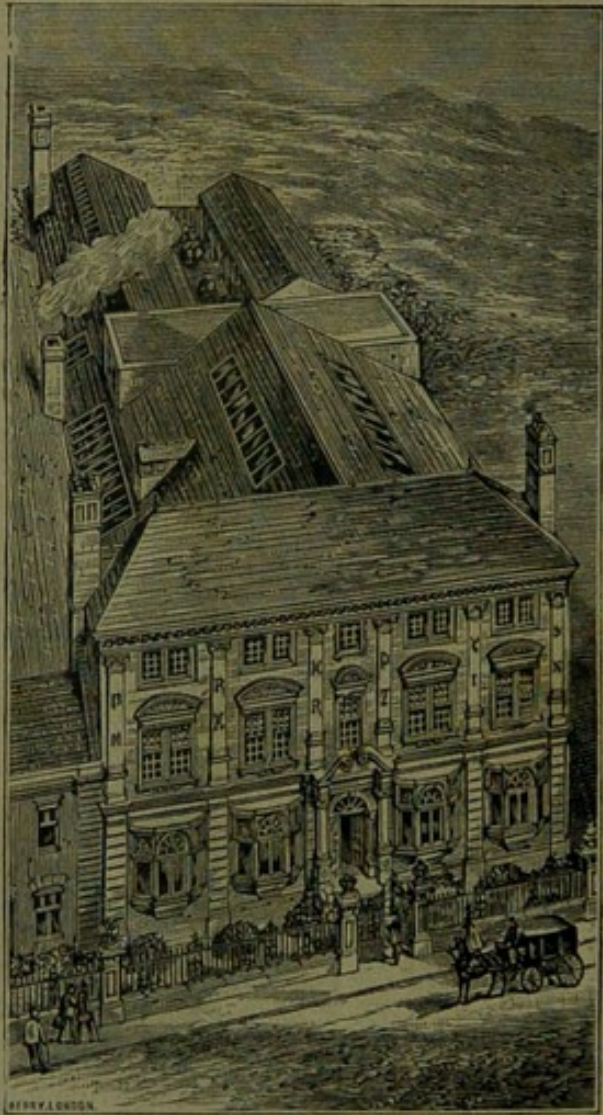
*Dose*—Five to twenty minims daily in any bland vehicle.

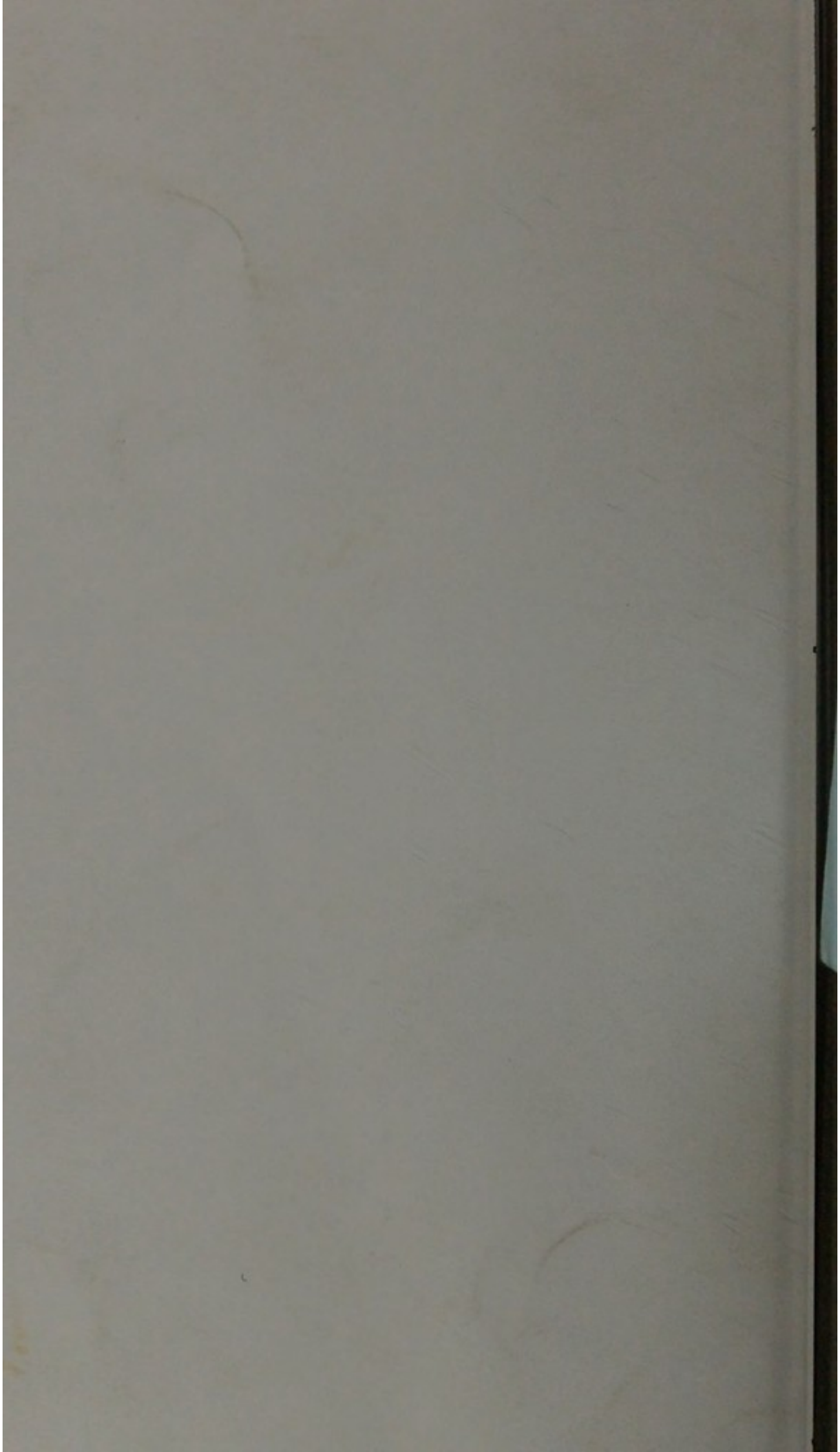
**Thyroid Extract Powder, (B. & M.)**—This powder is prepared by carefully expressing the juice of the thyroid glands with antiseptic precautions, diluting it with a neutral substance and carefully drying on sterilized glass plates. One gramme of the powder is equal to one lobe of the thyroid gland of a sheep.

*Dose*—Three to ten grains daily.











TABLE(S)  
RUN INTO  
GUTTER

