

THE  
Journal of the American Medical Association.

PUBLISHED WEEKLY.

THE EDITOR of this JOURNAL would be glad to receive any items of general interest in regard to local events, or matters that it is desirable to call to the attention of the profession. Letters written for publication or containing items of information, should be accompanied by the writer's full name and address, although not necessarily to be published. All communications in regard to editorial work should be addressed to the Editor.

SUBSCRIPTION PRICE, INCLUDING POSTAGE.

PER ANNUM, IN ADVANCE..... \$5.00.  
SINGLE COPIES..... 10 CENTS.

Subscriptions may begin at any date. The safest mode of remittance is by bank check or postal money order, drawn to the order of the undersigned. When neither is accessible, remittances may be made at the risk of the publishers, by forwarding in REGISTERED letters.

Address

JOURNAL OF THE AMERICAN MEDICAL ASSOCIATION,  
No. 65 RANDOLPH STREET,  
CHICAGO, ILLINOIS.

SATURDAY, AUGUST 23, 1884.

TREATMENT OF EPIDEMIC CHOLERA BY LARGE HYPODERMIC INJECTIONS OR INFILTRATIONS.—A few weeks since we published a brief communication from Dr. S. S. Todd, of Kansas City, Missouri, proposing to treat cases of epidemic cholera largely by injections of considerable quantities of whisky and water into the subcutaneous areolar tissues, with the expectation that it would be taken up fast enough to prevent the blood from becoming too much exhausted of its water and saline elements by the copious gastric and intestinal evacuations which accompany the active stage of the disease.

In the present number we give place to a letter from Dr. Uhler, of Baltimore, touching the same subject. He commends the object sought to be accomplished by Dr. Todd, but thinks that the direct injection, by large hypodermic syringe, of sufficient fluid for the purpose, would rupture the subcutaneous areolar tissue and lead to extensive suppuration. To obviate this he suggests a method by which the fluid could be more slowly and continuously introduced into the tissues or directly into the cavity of the peritonæum, from which it would be rapidly absorbed by the peritoneal membrane.

All these suggestions are founded on the assumption that the chief danger from cholera is in the loss of the water and salts of the blood, leaving that fluid too viscid to circulate; and that a supply of these elements as fast as they are lost would result in curing the disease.

Our own clinical experience with cholera, suggests that there would be much practical difficulty in car-

rying out the propositions of either Drs. Todd or Uhler. To inject hypodermically from 60 to 120 cubic centimeters (fl. ℥ii to ℥iv) of any kind of liquid directly into the areolar tissue of an extremity, and repeat it often enough to make any adequate offset to the quantity being discharged from the mucous membranes in the active stage of cholera, would necessarily rupture and disorganize that tissue, as stated by Dr. Uhler. And to keep four or more hypodermic syringe points constantly inserted and connected by rubber tubing with a fountain containing the liquid to be infiltrated into the tissue, as proposed by Dr. Uhler, while the patient is vomiting, purging, and writhing under the muscular cramps every five or ten minutes, would require more fortitude and patience in preserving one position, than I have ever seen in persons in the active stage of this disease.

If we wait until the patient gets quiet enough to keep Dr. Uhler's apparatus adjusted, continuously, it will be when he is in so profound a collapse that the capillaries will fail to take up the infiltrated liquid. What effect the injection of water, or medicated water, into the peritoneal cavity during the progress of a case of cholera, would have, can be determined only by trial. We apprehend, however, that all these expedients, even if carried into practical effect, would lead to the same result as has been found to follow the direct injection of various diluent liquids into the veins, namely, a temporary improvement of the circulation, followed shortly by renewal of intestinal discharges and return of the collapse. The truth is, that the rapid drainage of the serous fluids of the blood and tissues is simply an *effect* resulting from the inversion of the natural action of the mucous membrane of the alimentary canal; and until this inverted action is reversed, the mere supply of water or any artificial serum, whether it be by hypodermic infiltrations, venous injections, or injections into the peritoneal cavity, will only furnish additional material for discharges, without otherwise altering the progress or final termination of the case.

MORPHINE IN THE EARLY STAGES OF INSANITY.—The responsibility of the physician in the use of morphia, in consequence of the possible development of the morphia habit, is great; but his responsibility relative to the possible disaster of a preventable lifelong insanity, not prevented, is, if possible, still greater.

Auguste Voisin,<sup>1</sup> of the *Salpêtrière*, Paris, claims

<sup>1</sup> Leçons Clinique sur les Maladies Mentales, etc., Paris, 1883.

for the use of the hydrochlorate of morphia, in gradually increased large doses long maintained, remarkable results in the treatment of certain forms of insanity. His theories are well sustained by physiological observations, and his cases are taken from the records of the *Salpêtrière* and private practice, and many of the cases have been examined after the lapse of several years.

In the article referred to, "Leçon Trentième," he gives a resumé of the history of the systematic use of opium and morphia in the treatment of insanity, and dates his own experience with it from the year 1867. His success was at first greatly diminished by the obstinate vomiting which frequently occurs; but on learning from M. Roller, Physician of the Insane Asylum at Illenau, France, that, regardless of the vomiting, the dose should be increased, he continued to increase the dose, and to that instruction he attributes his success. He has since treated successfully the various manifestations of insanity which would seem to correspond practically to the first division adopted by the International Congress of Alienists in 1867, namely: simple insanity, comprehending mania, melancholia, monomania, circular insanity, moral insanity, in their early manifestations.

He uses exclusively the hydrochlorate of morphia, and only hypodermically, but fails to give the strength of the solution which he finds most satisfactory. He does not mention the combination, so much appreciated in America, of morphia and atropia. Probably the association of the atropia is not to be desired. He speaks against the tablets in use, and especially objects to warm water as a vehicle. The efficacious dose desirable to sustain until the desired effect is obtained, can only be found by proceeding cautiously and studying each individual apart. One rule which the author never departs from, is not to exceed, in the initial dose, from one to three milligrammes. Whilst light cases associated with hallucinations are frequently relieved in a few days with a daily dose of from five to six centigrammes, yet in other cases the dose has to be increased to seventy centigrammes. He narrates one case in which two grammes of the hydrochlorate of morphia, in two doses, were administered daily, with no manifestation of its presence beyond a contraction of the pupils. The latter was one of the unsuccessful cases. He never entrusts the administration to a nurse.

The influence of the medicine exhibits itself in the order of their appearance by a redness of the face and conjunctivæ, nausea, vomiting, general sensation of heat, lassitude, sleep, loss of weight, dimi-

nution of arterial tension; later, an improvement of the countenance is manifest, the face becomes more intelligent and the tint of the flesh improves, the general weight now increases, and in women, the courses reappear. The manifestation of any of these symptoms supports a favorable prognosis, whilst their absence is unfavorable. Where there is great emaciation, previous to the commencement of the morphine treatment the author practices transfusion. The presence of a congested condition of the cerebro-spinal system he considers an absolute contra-indication for the use of morphia. Consequently in some cases he first applies blisters to the nape of the neck or other convenient regions, and regards its use as absolutely contra-indicated in epilepsy, general paralysis, and insanity due to an atheromatous condition of the arteries.

He mentions three phenomena which he considers of importance in pronouncing an opinion relative to the cure of the patient: The consciousness of their former condition, the recollection of their delirium, and a sense of gratitude towards those from whom the relief was obtained.

Judging from a purely theoretical point of view we should say that the plan of treatment is eminently philosophic. It is not at all unreasonable to suppose that many such cases may arise from an exaggerated form of ordinary sadness, suspicion, or diluted but universal pain, associated it may be with a condition of body incapable of throwing off the superimposed incubus. Let us suppose, for instance, that the pain associated with a severe felon, a toothache or earache, instead of being confined to one place, disseminated over the whole body so that the sufferer cannot locate his seat of pain; the pain would not necessarily be the less because it was thus distributed, the patient would, however, be very much less likely to obtain relief from the physician; and we have only to suppose that general feeling increased and unrelieved to disturb the equilibrium of the best of us. If, as we are led to suppose by Auguste Voisin, the arterial tension is constantly increased in the initial stages of insanity, it would not be unreasonable to suppose that in such cases some such universal agent is at work, and from our experience with morphia as a magic power in the relief of other affections of a painful, ease-disturbing nature, we ought to expect it to be equally efficient, at any rate in certain cases of insanity, arising apparently from an ill-defined but universal pain, whether physical or moral.

Such a method of treatment offers special advantages in the possibility of saving a patient from being sent to a retreat, which is sufficient in itself, in many

cases, to develop a spirit of resentment which would add to the chances of a relapse. As to the possibility of developing the morphia habit, it would be very injudicious to ignore it; but in urgent cases risks have to be taken, and by following the example of Auguste Voisin in allowing the remedy to be administered by the physician alone, the danger is reduced to a minimum.

**PROGRESS OF CHOLERA IN EUROPE.**—While the epidemic in Toulon and Marseilles is diminishing, apparently for want of material to feed it, it is steadily extending to other parts. A dispatch of the 16th inst. says:

“There are now forty-one places and thirteen departments in France from which deaths from the cholera have been reported, and there are doubtless half as many more towns and villages from which no reports have reached the world outside. The cholera area now stretches from Toulouse, in the southwest, to Auxerre, in the north, in the department of Yonne, and to the gap in the southeast in the Haute Alps, thus making a triangle whose sides are respectively 235, 245, and 310 miles long. Auxerre is only about 100 miles from Paris in a southerly direction.”

It also exists in many places in northern Italy, and in the Nostras prison at Geneva, Switzerland.

What is called *English Cholera*, has been for some time prevailing with considerable severity in Northampton and neighboring villages, in England.

**INTERNATIONAL MEDICAL CONGRESS AT COPENHAGEN.**—This body closed its session according to programme on the 16th inst. The number of members present is stated at about 1,600, of whom about fifty were from this country.

**SUPPOSED DUPLICATES OF JULY 19, 1884.**—If there are any of our readers who still think they have received *two* copies of the JOURNAL for July 19, Vol. III, No. 3, and no copy for July 26, Vol. III, No. 4, let them compare the supposed duplicate numbers by examining the date and number at the top of the first inside page of reading matter, as well as the contents of the two copies, and they will find that they have both numbers *three* and *four*, the latter only being wrongly dated and numbered on the front outside page.

**INTERNATIONAL MEDICAL CONGRESS.**—A dispatch from Copenhagen of the 13th inst., stated that Dr. J. S. Billings, of U. S. A., and delegate from the American Medical Association, had presented to the Congress there assembled an invitation to hold the next triennial session in this country in 1887. If the invitation is accepted, those who attend will meet a cordial reception from the profession in this country.

## SOCIETY PROCEEDINGS.

### GYNÆCOLOGICAL SOCIETY OF BOSTON, MASS.

The Society met for its regular February meeting, H. O. Marcy, M.D., President, in the chair, and H. G. Harriman, M.D., Assistant Secretary.

Dr. Marcy again thanked the Society for the recent honor of his unanimous election to the chair. He realized the responsibilities of the position, but had concluded to accept it, although full of zeal for the greatest good of the Society, because he believed, after all, that the effective work must still be done by the “rank and file.” In the year to come he would use his efforts to advance every interest of the organization, and render it an aggressive force both at home and abroad.

Frank S. Billings, M.D., associate member, then read the paper of the day, upon “Eclampsia Parturientium in Woman and in the Cow,” of which a digest follows:

As respects etiology, eclampsia is the most theoretical of all diseases. Derivatively speaking, the term is applicable to but a single one of the many phenomena which it is made to cover. Usage has also restricted its application to such phenomena occurring in woman during the *puerperium*; but, in reality, it equally applies to similar conditions occurring in scarlatina, diphtheria, etc. Convulsions in parturition would be a better designation than eclampsia.

Eclampsia is not a disease; rather it is a symptom of a diseased condition of the organism. It represents a result, the outward visible phenomena by which certain internal disturbances manifest themselves to the observer.

*Definition.*—Other medical men agree more fully regarding the nature of the disease than do veterinarians. Frank alone, among veterinary writers, looks upon the accident commonly called milk fever, calving fever, collapse, etc., as identical with eclampsia in woman. He defines to the following effect: An acute and very dangerous disease in cows, especially common in the great milk-producing breeds, characterized by unconsciousness, paralysis, and sometimes convulsions, due to uræmia of the brain.

The reason why convulsions are not so frequent and so severe in the cow as in woman, is that the degree of nervous irritability in the bovine species is much lower.

*Eclampsia in woman* Spiegelberg defines as epileptoid convulsions of a tonic, or, more especially, of a clonic character, which appear during the *puerperium*, accompanied by unconsciousness and coma. Nothnagel regards it as an acute epilepsy. Wernich connects it with injury done to the ischiatic nerve, by the uterus, which produces excitability to the pons and the medulla oblongata. If to this assumed injury be added irritation of the nerves of the general system, eclampsia results.

The reader next gave a full exposition of the cause and phenomena of this disease, in woman and in the cow, of which the following is a brief *resumé*: