

they have finally been engulfed in the deep and all-devouring sea of intemperance.

There are predisposing causes. By the operation of another natural law, the law of the heredity of alcohol, not a few human beings are launched upon the world with a tendency to inebriety ingrained in their very nature. If such drink at all they drink to excess. Moderate drinking is an impossibility to them. Others again, though burdened with no innate drink taint, are, not infrequently as a result of the drinking habits of their parents, endowed with so feeble a will that they may truly be said to have no moral backbone. These, too, are predisposed to inebriety.

Besides the great predominant factor—the narcotic poison which produces the phenomena of drunkenness—and the predisposing causes, there is a considerable variety of exciting causes. A steady, regular living, excellent man leads for many years a sober life. A sudden nervous shock—the unexpected loss of property, of children, or wife—is known to excite him to that habitual inebriety, for the cure of which he enters an inebriate home. A scholar, calm, thoughtful, and temperate, doggedly pursues his studies when he ought to be at rest, all unheeding, all unthinking, till the overtaxed brain gives way, and a very deplorable and intractable form of inebriety is the issue. A lady, chaste as snow and in general abstinent as a hermit, has at times an uncontrollable craving for strong drink, and she finds her only security from a drunken outbreak to consist in seclusion in some institution where she cannot procure intoxicating drink for a few days, till the exciting cause passes away. A hard-working clergyman frequently feels completely exhausted in body and mind. An occasional glass of fermented wine dissipates for a brief space the feeling of prostration. His one anxiety being to keep up to the work to which his whole heart is given, he despises his physical weakness, ignores his congested liver, his disordered digestion, and his overworn brain, and has recourse to his magical alcoholic pick-me-up. The oftener it is resorted to the oftener is it required. The

VOL. V.—12

they are in a minority, are so physically susceptible with it, they are, of organization is so strongly implanted in the natural development of alcohol on the brain, a rol is over the very the same. A tendency to affect intractable more than arsenic or as, by the operation of an adequate dose of as a heathen, and an sleepy as it will make ill the poison, alcohol, body, and by its nature, a bad man as of a bad man is exempt from the ices of the educated, high places in the a to the mighty host cases of habitual inebriates have been clergymen signs are part of a poisoning by alcohol; susceptibility to be from pure wantonness in to take to excess—first glass is drunk a drunkard, are very, and no fears for their ade, have, as a rule, and no fears for their to voyage, and it has mpts to escape that

THE DISEASE

W. W. J.

while there is a standard foods to be in a state of... of the distinct... s. to the various... in the form of... it wide range of... r perfect health... the basis of our... The science of... morbid feelings... he border line... he selection of... een foods and... ognized by all... ngeably in the... re neither sick... st look for the... ugs as possess... to be regarded... on the degree... ard of perfect... necessities, to... rly, unnatural... ng or lust to... As the vital... r natural and... ervated or

perverted nerve structure, they search after such substances as the chemistry of science may evolve from the fruits of the earth, that they may be composed, exhilarated, or narcotized, in accordance with the concealed cravings within.

Evenly balanced people, who are by nature calm and self-possessed, and in good bodily health, are not those who usually fall into excess. With bodies in a normal state, and fed by natural food, and minds well poised, deliberate, and disciplined by culture, thus constituting a being self-controlled and vigorous, they have no need to venture into the realm of artificial nutrients, seeking for specifics to recuperate exhausted nerves, or to supplement ordinary diet. We must look for the chief factors of the craving for drinks among the ailing and half sick, who suffer from disquietude of nerve, dyspepsia, and the various hysteric and kindred phenomena, that are now so readily recognized, even by unprofessional observers.

Thus we come naturally and logically to apprehend the remote causes of inebriety. That they are intrinsic and belong to the individual, is without doubt true. This brings us also to the real issue that is involved in the subject we are considering. It is not a legal question, the issue being revenue or no revenue. It is not simply a moral question, the issue being between the use and non-use of intoxicants. It is a question of nerves—a neurosis—the issue being between soundness and unsoundness of structure or function; between a complete and an incomplete manhood. It is disease, and in the language of the "American Association for the Cure of Inebriates," "a disease that is curable in the same sense that other diseases are, its primary cause being a constitutional susceptibility to the alcoholic impression, which may be inherited or acquired."

This disease, however, is not to be regarded as an entity that approaches and invades the human organism from without, but rather as a variation of natural function, having its source in the system itself. It may be implanted somewhere in the complex structure which constitutes the man, by hereditary taint. It may be, by some obscure and undefined

87. *Practical Facts Relating to the Disease of Inebriety.*

which, coming together, which, by their active and retro-active processes, originate and evolve symptoms that indicate a departure from a healthy standard.

The existence of a predisposition to physical disease and to mental and mental qualities to say nothing of resemblances of persons and manners, is a fact which is as familiar to the people, as any other fact in the natural history of the race. It constitutes a part of each family record, and belongs as an essential to the inheritance of every household. In its relation to the subject before us, no exception can be made. The law of heredity is inflexible, and its behests are without compromise.

The tendency in nature being toward the maintenance of the perfect type, we may look for an endowment of new normal tissue where all the conditions are favorable, and under such circumstances a cure, or what is popularly called reformation, takes place. Around this single fact are clustered the opposing theories and statements which characterize the history of this subject. If the public mind could lay hold of and appreciate the doctrine that a sound physiological basis is essential to a perfectly sound and evenly balanced mental nature, there would not be the degree of divergence between the real truth and what is commonly accepted as truth in this matter. In the most common forms of alimentary disorder it is not difficult for people to observe the altered *menie* to which reference has already been made.

Nothing is more common, than the irritable temper of dyspeptics, the gloomy moodiness that accompanies liver derangement, or the odd fancies and vagaries of hysteria, which so commonly represent sympathy with diseased organs. The same law is applicable to the subject in hand, and no one who has observed closely can have failed to notice the differences of character which are exhibited in the career of an inebriate, as he progresses from the careless, motiveless beginning, to the stage of cerebral disorder.

If there is one prevailing symptom which is common alike to all, it is an ever present and magnified consciousness of

self. Such persons require attention, and exact it of others. They are self-important, and demand a recognition of their importance by others. Their symptoms are exaggerated, and their sufferings intense, and unless this is appreciated by others as by themselves, they are provoked, and sometimes passionate. These symptoms do not appear, however, till the boundary line is passed.

The following occurs in a late report of the Virginia Lunatic Asylum: "One of the most prolific evils of inebriety, even when not carried to the extent of continuous drunkenness, is that it so impresses the organism of some persons, as to establish a hereditary tendency, which passes down to the next generation and continues long after. This temperament may continue to be transmitted until it shall permanently impress the organism, and be so prominent as to be recognized generations after."

The inebriate is full of the delusion that the wrong is not in himself, but in others and in the surroundings. He is always confident that he is the victim of others' mistakes. When he comes to an asylum and recovers in part from the immediate effects of alcohol, the resistant becomes irascible. He cannot understand why he should not have the full liberty to go about. Hence, he fills the atmosphere with complaint and dissatisfaction, which no amount of care and kindness can overcome.

The various psychological changes and symptoms seen in the inebriate, are not more strange or complex than the differences recognized among persons who are called well, all of which depends on the changes and peculiarities of the mental organization.

The acute primary effects of inebriety are: Congestion from want of vaso-motor nervous control, loss of muscular control; perversions of judgment and will power, and absolute prostration of nerve power.

4. That if the jury believe from any cause, either from personal injuries or the use of ideal spirits the prisoner's mind was impaired, and at the time of committing the act was by reason of such cause unconscious that he was committing a crime, he is not guilty of any offense whatever.

5. That if the jury find that the prisoner was greatly excited or affected by the use of liquors, and which produced a state of mind unfavorable to deliberation and premeditation, although not such as to render the party entirely incapable of forming a deliberate purpose, he cannot be convicted of any higher crime than that of manslaughter.

6. That the law does not require that the insanity which absolves from crime should exist in any definite period, or for any particular length of time, but only that it should exist at the moment when the act charged was committed.

7. That the proof of prior insanity at any time imposes upon the state the burden of proving the crime to have been perpetrated during a lucid interval, and that the proof of prior insanity defeats the legal presumption of sanity, and creates a legal presumption of continued lunacy which like the former must be overthrown by proof.

8. That if the jury have any doubt as to the case on the question of the sanity of the prisoner at the time of the commission of the act, he should be acquitted.

9. That if intoxicated at the time of committing the act, he is guilty of no higher crime than that of manslaughter.

10. That in order to convict of murder in the first degree, the jury must find that the accused killed the deceased with premeditation, and while in the possession of a sound mind, and of his reasoning faculties, and that if the jury have any doubt on this point or on any point in the case, they are bound to give the prisoner the benefit of that doubt.

The judge refused to charge the jury on the above points, but instructed them that drunkenness does not excuse a party from the consequence of a criminal act. A man committing a criminal act, though intoxicated at the time, is a legal and proper subject of punishment.

LEGAL CONSEQUENCES OF INTOXICATION

LAWYER V. COMMONS, 1854, 12 BARRISTERS' COX.

The following case, the facts of which have been considered to some extent in the preceding review of the responsibility of homicide, is a valuable illustration of the fact that it is beyond the power of the jury to find a defendant guilty of murder if he was, at the time of committing the act, unconscious of his actions.

The case was argued by Mr. B. in the Court of Common Pleas, and was decided in favor of the prisoner. The prisoner was charged with the murder of a woman, who had been some years blind, and who had been receiving medical treatment from the prisoner at the time of her death. The prisoner was charged with the murder of the woman, and it was proved that she was blind, and that she was receiving medical treatment from the prisoner at the time of her death. The prisoner was charged with the murder of the woman, and it was proved that she was blind, and that she was receiving medical treatment from the prisoner at the time of her death.

The case was argued by Mr. B. in the Court of Common Pleas, and was decided in favor of the prisoner. The prisoner was charged with the murder of a woman, who had been some years blind, and who had been receiving medical treatment from the prisoner at the time of her death. The prisoner was charged with the murder of the woman, and it was proved that she was blind, and that she was receiving medical treatment from the prisoner at the time of her death.

The case was argued by Mr. B. in the Court of Common Pleas, and was decided in favor of the prisoner. The prisoner was charged with the murder of a woman, who had been some years blind, and who had been receiving medical treatment from the prisoner at the time of her death. The prisoner was charged with the murder of the woman, and it was proved that she was blind, and that she was receiving medical treatment from the prisoner at the time of her death.

The case was argued by Mr. B. in the Court of Common Pleas, and was decided in favor of the prisoner. The prisoner was charged with the murder of a woman, who had been some years blind, and who had been receiving medical treatment from the prisoner at the time of her death. The prisoner was charged with the murder of the woman, and it was proved that she was blind, and that she was receiving medical treatment from the prisoner at the time of her death.

The case was argued by Mr. B. in the Court of Common Pleas, and was decided in favor of the prisoner. The prisoner was charged with the murder of a woman, who had been some years blind, and who had been receiving medical treatment from the prisoner at the time of her death. The prisoner was charged with the murder of the woman, and it was proved that she was blind, and that she was receiving medical treatment from the prisoner at the time of her death.

If a man by long continued habits of intoxication has brought insanity or so impaired and enfeebled his mind as to be utterly imbecile, he is no longer responsible for crime.

The jury returned a verdict of guilty of murder in the first degree.

On a motion for a new trial in the court of appeals, one of the presiding judges made the following statements of the law in such cases.

"The request of the prisoner's counsel to charge the jury that intoxication was in any degree an excuse for crime, presumes a condition of mind and body in which it would be difficult to do a criminal act. The mind would be incapable of forming a criminal intent, and if it was in that condition by reason of intoxication the physical organs would ordinarily be powerless to do harm.

"Drunkenness in no condition is ever an excuse for crime, or the commission of a criminal act. If a drunken man takes the life of another unaccompanied with circumstances of provocation or justification, the jury will be warranted in finding the existence of malice, although no express malice be proved.

"Intoxication, which is in itself a crime against society, combines with the act of killing and the evil intent to take life which necessarily accompanies it, and altogether afford sufficient grounds for imposing malice."

"We wish to reiterate the doctrine emphatically that intoxication is no excuse for crime, in any or all circumstances."

Half a century ago such interpretations of law would have excited no comment. To-day they are simply dogmatic statements contradicted by all teachings of science, experience, and the common justice of humanity.

It is interesting to note, in this connection, a discussion on the responsibility of inebriates, in the psychological section of the Medical Congress at Amsterdam lately. A number of cases were reported of persons who had been alcoholics, and were convicted of crime committed during this state.

M. Dalby opened the discussion by saying that the old theory, that human justice is the voice of God Himself, and that punishments are various forms of expiation, representing Divine vengeance, are still held and acted on by judges. In reality, criminal law is a law of social defence, founded on necessity and utility, not on vengeance and expiation. Irresponsibility is measured only by the danger which society and individuals incur from the crime. The law dare not recognize irresponsibility. An insane person is absolutely deprived of all consciousness, or knowledge of his actions and thoughts. Modern society has departed from the spirit and text of the law, and has admitted the existence of partial insanities, of which inebriety is one. As a result crime has increased, the bars of justice have failed to protect society and to improve the condition of the guilty. Irresponsibility accorded to alcoholics is a premium to alcoholism. Alcohol is the cause of more than half of the crime committed. It follows from a utilitarian point of view, that the repression due to alcoholism ought to be vigorous and exemplary.

M. Saule protested against this doctrine as urged by M. Dalby. He insisted that partial responsibility was as clearly demonstrated as any other mental condition. That the object of medical men in trials of inebriates was to discover the mental state present at the time the crime was perpetrated. In all these cases conditions of partial or complete irresponsibility were present. It is of the greatest importance to distinguish between intoxication, drunkenness, and alcoholic insanity. In all cases which come before the courts for settlement three experts should be called to give the judge or jury the necessary information. Individuals who daily take a small overdose of alcohol insufficient to produce intoxication are more liable to serious pathological changes, than those who from time to time indulge in great excesses, and where such persons commit crime, the evidence will often be conflicting and give evidence of his sobriety.

The actual increase of the number of crimes cannot be

perished to insufficient repression of inebriates and increased facility of escape from punishment.

M. Howard and others differed from M. Dalby, and totally disagreed from his views as to the responsibility of inebriates and other partial inebriates.

These views of the limited responsibility of inebriety are held by all the leading authorities. Occasionally the opinion of M. Dalby are expressed by physicians and judges, but they have no scientific endorsement, and may be said to belong to the literature of the dark ages.

The time has come for a full recognition of the condition of inebriety as a diseased state, in the courts before the question of punishment or responsibility can be determined.

Why should any one stop to deny and dispute the disease theory of inebriety, when the great ocean of the unknown is so broad that each may pursue his own discoveries without collision with the other? There is work here for all the time and energies of every one, and vast unknown regions, where enthusiastic pioneers can always be in the vanguard, untroubled by crowding, or the rivalry of neighbors.

Inebriety has always an early stage that is unnoticed; a period full of hints and indications of the coming storm; a stage in its march, where means and measures would most effectually avert and stamp out the disease. This is the great battle-ground of the future, where inebriety can be prevented and cured.

The theory that inebriety is first a vice, then a disease, is the same old compromise between ignorance and half science, which has marked the progress of every great truth in the world. As a sign of a better knowledge and clearer realization of the laws and forces which govern inebriety, it is cheering.

Abstracts and Reviews.

DISCUSSION ON INEBRIETY FROM TRAUMA-TISM.

In the October number of the *JOURNAL OF INEBRIETY* was published a paper on inebriety caused by physical traumatism, by Dr. Crothers. This paper was read before the British Medical Temperance Association in London, Dr. Richardson presiding, and brought out an interesting discussion, of which the following is an abstract.

The discussion was opened by Dr. Norman Kerr, who said: I am very glad that we have had the opportunity of listening to this paper, because it contains a great deal of suggestive matter, and, at the same time, a great deal of sound philosophy and sound truth. It does seem a shock, all at once after our great moral and temperance reformation, to be told by an American physician that a great many of these cases we have been hammering at only on the basis of voluntary amelioration are a necessity from the physical condition of the person, but it seems to me that the thing is absolutely proved by our own observation of the cases of habitual inebriety. I, personally, see cases every week in which the people are evidently, to my perception, as clearly suffering from a physical, and therefore a mental, disease, as any patient who has gout, rheumatism, small-pox, or fever. I do not mean to say that it is impossible for some to recover. Supernatural power may enable one to rise above the flesh, but I am certain that I do see cases in which, to all human appearance, there is no hope whatever left for reformation or cure from habitual inebriety unless they are put in circumstances—of their own accord or by compulsion—in which for a time they will not be under the temptation from alcoholic

bers. Perhaps under those circumstances their system may be and by recover its tone, their will-power become strengthened, and with proper treatment something may be done to enable them to listen with understanding to the message of the Gospel. Yet of moral reasoning at present they are incapable. Some of these cases, both amongst women and men and particularly amongst clergymen and doctors (of whom I see a great many when in this condition), remind me of certain other cases I meet with in the practice of my profession. I get a dozen cases of scarlet fever or typhoid fever all of which respond to the advice, to the physic and to the cure I give them, but in the thirtieth case all the doctors on earth, all the physic made, and all the nurses trained, do not arrest for one moment the progress of the patient to the grave. The patient seems to be dead to all medicaments and every hygienic means used for recovery. In the same way it seems that there are cases of habitual inebriety that hitherto speaking, are dead to everything we can do. We can make no impression with either medicinal or moral restoratives. They run the gamut of the Salvation Army, the Blue Ribbon Army, and all the religious and social movements of the times, but there they are in the mire at last despite all that can be done. I know a case at this very moment of a clergyman—and there are very few clergymen in London who do not know of this case, because it has been before the police courts repeatedly. This clergyman has been in nearly every inebriate home, subject to every kind of moral and religious teaching, and yet without avail though he is an accomplished scholar, speaks both Greek and Hebrew. He is only a type of a great many others I have seen. Most of his old friends, who have done so much for him, won't see him now, or have anything to do with him. Now this is the peculiar value of this paper—that it will open the eyes of the British public and especially of the religious classes, to the sort of what they seem in a vain measure to have been altogether ignorant in the past, that there is something needed besides moral and religious means

used to restore inebriates. We know that a great many inebriates are subject to moral influences, and by a strong exercise of will—perhaps looking to higher sources—are enabled to abandon their habits, go on prosperously, and become good temperate advocates and respectable citizens; but I hope that the Christian public in this country, which is doing so much for the reformation of the drunkard now-a-days, will make that movement of theirs really effectual and permanent by taking into account that there is another aspect than their own. viz., the physical aspect, and that as all the religion and all the morality in the world cannot give back to a man a leg that has been taken off or a tooth that has been extracted so neither can it restore his brain, his nervous system, his will, and his muscles to the same condition that they were in before they were affected by the action of alcohol. In other words, no mental or spiritual process can obliterate or efface the footprints of alcohol upon the brain and nervous system. I and of course speaking only of certain cases which completely baffled us. Will regard to cases of mental shock—how many do we see? I will mention one or two that I know. A gentleman of forty-six years of age, who suddenly lost his wife from heart disease, and to whom the news was brought very unexpectedly, from being a most sober man at once became a drunkard and died in that state. I knew a medical man, thirty-six years old, who committed an error in diagnosis in a critical case, and it preyed upon his mind so much that he took to excessive drinking till he died. I knew another man, a man conversed of a most illustrious name in science. He was thirty years old and was a very hard student. He was working for a prize after he had graduated and was disappointed at not getting it. The result was that from perfect sobriety he launched into excessive drinking, and within a few months committed suicide by taking paralytic acid. A former friend years of age fell from a break on his head and was inensible for some time, and from being sober and finally became drunken and extravagant, and died from intemperance. I

well as collect a local preacher, a farmer of forty-two years of age, who had married his wife, but who had his nervous system so far broken down and so worn out by the care and the strain which when he visited her that on the day of the funeral he had to be carried into the mourning carriage. He afterwards turned out into drinking and the last I heard of him was that he was an habitual drunkard. With regard to the young lady, who is now dead, at twenty-four years of age was to have been married. Everybody—the clergyman, the bride, and so on—was in attendance except the brides-room. This unfortunate girl, as good and excellent a being as ever I saw, and who did a great deal of good in her parish and was beloved by her friends, took to drinking and finally died of alcoholic pneumonia. A nurse on a steamship crossing the Atlantic, twenty-two years of age, a very steady, sober man—not even a smoker—did something careless but not criminal. He was discharged, and the shock at once started him off as the paper so well put it, the main hope of sobriety, and shunted him on to that of drinking, the result being that he drank till he died of alcoholic phthisis. Another case connected with marriage? A clergyman whom I knew, thirty-eight years of age, married very immoderately—that is to say, in haste. The young woman was not satisfied with her bargain and before a week was over she left him. The result to him was that from being a total abstainer he became a very heavy drinker, and is now really a drunkard. There are a great many cases of broken-down nervous force—take, for example, of students, clergymen, and nurses—the latter especially. After nurses have been a week or ten days incessantly nursing a small-pox or typhoid fever case, with their minds constantly on the stretch, it may happen that all at once they have given way to excessive drinking and the habit has been set up. I will not detain you any farther now, though one's mind is so full of cases of this kind that they would bear out almost every point which Dr. Crocher has so lucidly and ably put before us. One of the

most beneficent operations of this association of cases would be to set about endeavoring to enlighten the public and educate the Christian mind of this country, to see habitual drunkenness as it really is, its aural and mental causes, and the diverse methods of dealing with it, so as to care the unhappy victims whose presence amongst us we all deplore. Dr. Gray said he was quite prepared to endorse everything that Dr. Norman Keir had said. As we well know, he had had considerable experience of habitual drunkards, and he cared them for charitable purposes into his home. He had at present as inmates a clergyman and a laborer. The clergyman was a most estimable man, the rector of a parish, and he had an excellent wife—none of those rare women that one meet with in the course of life. She died about two years ago, before which the clergyman said he never drank but socially, certainly not to excess; but since his loss he had been continually slipping. He was brought to his house some time since by his son, quite enervated. He had now been in his house a little more than three months, having fortunately placed himself under the Hospital Dispensary's care. He was continually saying that he wanted to get back to his duty. He had been in such a state as to be unable to undertake anything for two minutes together, and as to finishing any particular room without assistance, he couldn't do it. Even now he could scarcely remember anything for five minutes together, but notwithstanding had written to his bishop's secretary to allow him on probation to resume his work. He, however, was totally unfit for it, although it was quite likely that in the end he would recover. The other case was that of a solicitor who married some three or four years ago. He had suffered from prostration, but on the advice of a great authority was told that he might marry. After marriage the old symptoms appeared, and, as might be imagined, this was a great shock to him. It was really the cause that led him to excessive drinking, but he could not get his brothers and his friends to believe him. He (the speaker) quite believed that this was the truth. They some-

THE
QUARTERLY JOURNAL OF INEBRIETY.

Vol. V.

APRIL, 1883.

No. 2.

This Journal will not be responsible for the opinions of contributors, unless indorsed by the Association.

INEBRIETY AND THE EFFORTS TO CHECK IT.

BY HENRY HOWARD, M. R. C. S., ENG., GOVERNMENT VISITING
PHYSICIAN TO THE LONGUE POINT LUNATIC ASYLUM,
PROVINCE OF QUEBEC, CANADA. AUTHOR OF THE PHI-
LOSOPHY OF INSANITY, CRIME, AND RESPONSIBILITY.

That great and good man, whom I am delighted to honor, His Eminence CARDINAL NEWMAN, in his grammar of assent, thus speaks, page 270: "And in like manner, as regards John and Richard, when compared with one another each is himself and nothing else, and though regarded abstractly, the two may fairly be said to have something in common, viz.: that abstract sameness which does not exist at all, yet, strictly speaking, they have nothing in common, for they have a vested interest in all that they respectively are; and, moreover, what seems to be common in the two becomes, in fact, so uncommon, so *sui simile*, in their respective individualities—the bodily frame of each is so singled out from all other bodies by its special constitution, sound or weak, by its vitality, activity, pathological history, and changes. And

good. Other beings are complete from their first existence in that line of excellence which is allotted to them; but man begins with nothing realized (to use the word), and he has to make capital for himself by the exercise of those *faculties* which are his *natural* inheritance. Each of us has the prerogative of completing his inchoate and rudimentary *nature*, and of developing his own perfection out of the *living elements* with which his *mind began to be*. It is his gift to be the creator of his own sufficiency and to be emphatically self-made. This is the law of his being which he cannot escape; and whatever is involved in that law he is bound, or rather *he is carried on, to fulfill*." Page 376, speaking of natural laws and revealed religion, he says, "Next, as to its relation to nature, as I have said, christianity is simply an *addition* to it; it does not *supersede* or *contradict* it; it *recognizes* it, and that of necessity; for how, possibly, can it prove its claim except by an appeal to what we have already? Be it ever so miraculous, it cannot dispense with nature; this would be to cut the ground from under it, for what would be the worth of evidences in favor of a revelation which denied the authority of a system of *thought* and these methods of *reasoning*; out of which these evidences necessarily grew?" Page 367, "I have said that the laws on which this world is governed do not go so far as to prove that evil will never die out of the creation; nevertheless, they look in that direction. . . . Experience enables us to ascertain the moral constitution of man, and thereby to presage his future from his present. It teaches us first, that he is not sufficient for his own happiness, but is dependent upon the sensible objects which surround him, and from these he cannot take with him when he leaves this world; secondly, that disobedience to his sense of right is, even by itself, misery, and, that he carries that misery about him wherever he is, though no divine retribution followed upon it; and, thirdly, that he cannot change his nature and his habits by wishing, but is simply *himself*, and will ever be *himself*, and what he now is, wherever he is, as long as he continues to be;—or, at least,

good. Other beings are complete from all other *works* which the *world* of each is so habituated to. Instead of saying, as in the case of the inferior animals, that the two men differ only in number, we say, rather, that the two men differ from each other in *quality*, rather to say that they differ from each other in all that they are in *identity*, in incommunicability, and in personality." Page 218. "We are conscious of the objects of external nature, and we reflect and act upon them, and this consciousness, reflection, and action, we call our rational nature, and as we use the so-called elements without first criticizing what we have no command over, so is it much more commanding in us to criticize, or find fault with our own nature, which is nothing else than we, instead of using according to the use of which it ordinarily admits, our being with its faculties, mind and body, is a fact not admitting of question. All things being of necessity offered to it, not it to other things. . . . I am what I am or I am nothing. I cannot think, reflect or judge, without starting, from the very point which I am at contemplating; my ideas are all assumptions, and I am ever moving in a circle. I cannot avoid being satisfied for myself, for I cannot make myself anything else, and to change me is to destroy me. If I do not use myself I have no other self to use. It is enough for me the what I am in order to put it to use. . . . What I possess to be able to pronounce that it is *natural*. What I have to ascertain is the laws under which I live. My first elementary lesson of duty is that of resignation to the laws of my *nature*, whatever they are; my first disobedience is to be impatient at what I am, and to indulge in ambitious aspirations after what I cannot be, to cherish a distrust of my powers, and to desire to change *laws* which are identical with myself. Truths, such as these, which are too obvious to be called irresistible are illustrated by what we see in nature. . . . "What is the peculiarity of our nature in contrast with the inferior animals around us? It is that though *man cannot change what he is born with*, he is a being of progress with relation to his perfection and characteristic

there came the absurd part of calling upon the legislatures of the different countries to prohibit the sale of all intoxicating liquors, to prohibit its importation and exportation, and its manufacture; and, lastly, the abolishing of license for the sale of any intoxicating liquor. This was going too far, was tyrannical as well as foolish, and the very best men have opposed such a course of action. All honor to the memory of those great men passed away, and honor to those great living men who still persevere, keeping the temperance question within its legitimate bounds. But with those that appeal to the legislatures for unjust powers I have no sympathy whatever; unjust, because contrary to natural laws; impossible, because in the present state of scientific knowledge no legal power in the world could prevent mankind from procuring alcohol in one form or another. Even the Catholic Church, while approving of temperance societies and using all her legitimate power in the cause of temperance, has sternly refused to declare in favor of legal prohibition. Why has the Church thus acted? Because, under no circumstances could she oppose natural laws. As I have shown, Cardinal Newman states that revealed religion is something added to natural religion, but not opposed to it, nor does it take precedence of it.

As to abolishing the licensing system, it simply means opening the door to every unprincipled person to sell liquor without license. Our very best security, to save people from being actually poisoned with the worst sort of poison, is the licensing system. It is by this system we have the power to enforce police regulations.

Again, this prohibitory move has opened the door to the worst part of communities, political schemers, who, wanting political power for their own aggrandizement and selfish ends, hoodwink the people by the cry of a prohibitory law, that they well know they never could obtain, nor do they wish to obtain it.

Well, I repeat, for fifty years I have been a close observer of the temperance move that has, in that time, spread all

that will give no material witness to make him either than in to, and that the power he gives the new drinker he is to abate.

I have quoted the forcible words of the great christian man and great scholar, the great lover of nature, because they are words so striking in a word with my own views, and because they will support me in the views I am about to present, particularly against those that would have no objection to an anti-temperance, but would be content with using contrary to the expressed views of one of the greatest living scholars. I well remember fifty years ago, when good and true men, Catholics and Protestants, seeing the terrible havoc that intemperance was making, not only upon individuals and their families, but upon the whole of society, leading not only to an endless host, but to crime of all degrees against society, with I to see what could be done to fill the world of this second evil. I remember the first move in the cause of temperance that took place in Ireland, when there were but few that could be induced to take the pledge of temperance, and a short space of time, however, the good work spread, and before many years that was not a city, town, village, or hamlet in Ireland that had not its temperance society. I saw assemblies of thousands in the Rotunda in Dublin, met in the cause of temperance. Soon after, I saw tens of thousands assemble in the County of Leitrim in Ireland, to take the pledge from that great apostle of temperance, Father Matthew. I saw that great charitable move sweep over the greater part of Europe, and finally over America. But moral scoundrels could not see the intricate and dipsomaniac; though they may have kept some from becoming such. In this field there were great and mighty men; heroes who deserved to succeed; who fought bravely, although every day opened their eyes to the fruitlessness of their efforts. I say they saw it, from the fact that every few years saw them change the bases of their tactics. First, it was simply temperance, then it was abstinence from strong drink, then total abstinence. After all these means had been found to fail,

As to abolishing the licensing system, it simply means opening the door to every unprincipled person to sell liquor without license. Our very best security, to save people from being actually poisoned with the worst sort of poison, is the licensing system. It is by this system we have the power to enforce police regulations.

Again, this prohibitory move has opened the door to the worst part of communities, political schemers, who, wanting political power for their own aggrandizement and selfish ends, hoodwink the people by the cry of a prohibitory law, that they well know they never could obtain, nor do they wish to obtain it.

Well, I repeat, for fifty years I have been a close observer of the temperance move that has, in that time, spread all

to which I wish to draw attention, that when the dipsomaniac takes snuff or alcohol to act as a sedative upon him, after he has a good sleep he gradually recovers his sanity, and looks no more for the alcohol.

Now I would not be understood to say that all the alcohol thus taken by the dipsomaniac does not, in time, injure his nervous system, and in time render him a confirmed chronic maniac. On the contrary I believe it does; but that he is not rendered a dipsomaniac by alcohol, but that his uncontrollable desire, periodical, for alcohol is due to his periodical attacks of mania. He is a dipsomaniac from some physical defect in his mental organization.

The inebriate, like unto the dipsomaniac, is one suffering from some physical defect in his mental organization, either teratological or pathological. The latter may be, and no doubt very frequently is, the result of the abuse of alcohol, a disease no doubt easily acquired.

The inebriate differs from the dipsomaniac in this particular, that the latter drinks only periodically, whereas the former, if he could, would be all the time drinking. His uncontrollable desire for stimulants never ceases. The more he drinks the more he desires to drink, pursuing his course, if he lives long enough, till he becomes a miserable demented—very probably die from general paralysis, or terminate his miserable existence by suicide, and thus the dipsomaniac rarely does, unless he first becomes an inebriate.

Here then are the two classes of society that claim the pity and attention of the temperance advocates; to the medical scientists, two classes; to the philanthropist, for all practical purposes, one. The duty of these societies and individuals appears to me to be perfectly plain. I don't say discontinue your good works of temperance societies; far from it. But I do say let all unite for the one common object of doing all that is possible for the cure of the dipsomaniac and inebriate. Hospitals and medical treatment is what they require. Nothing can be done for this class

of the United States, and perhaps find by means of it the means which have been sought in vain for curing inebriates, the workings of the mind. America is the best stand, with respect to civilization, and taking myself the question, has the means to establish any success? I am forced to answer in the negative. How it is, and why, has its time, for the leaders, believed so. Why was it a failure? For two reasons, first, the workers sought to take much, they aimed at the impossible, secondly, either through ignorance or ignorance they have not been in accord with nature's laws. They tried to do much when they attempted prohibitory laws; they failed at the impossible when they attempted, by moral means only, to restore the inebriate and dipsomaniac to the status of normal men. These good men had yet to learn what we can use the elements of nature, but we cannot force them to learn that every man is what he is in virtue of his physical organization, and that no two organizations are alike; that the functions we possess are natural; that John and Richard, when compared with one another, each is limited and nothing else; that the bodily frame of each is so shaped out from all other bodies by its special constitution, sound or weak, by its vitality, activity, pathological history and changes; and again, the *status* of each is so distinct from all other *status* in disposition, *faculties*, and habits. They had to learn that inebriety and dipsomania were the result of physical defect, and that a man "cannot change his nature and his habits by wishes."

Considering how different men are constituted, there can be no possible doubt that the abuse of alcohol has been destructive to some and injurious to all. What are the therapeutic effects of alcohol upon animal organisms? It is a sedative, a stimulant, an anæsthetic, an antipyretic, an antispasmodic, a tonic, a narcotic, and a toxic.

The dipsomaniac is not a maniac from the effects of alcohol; but when he gets an attack of mania he, in obedience to natural laws, rushes insanely for alcohol because of its relative effects upon him. And it is a remarkable fact,

In the first half of the century, the Gray matter
 was not so much the focus of attention as it is today.
 It was considered a mystery, a realm of the unknown,
 where the forces of nature were at work. The
 discovery of the structure of the brain, the
 discovery of the function of the brain, the
 discovery of the connection between the brain and
 the body, the discovery of the connection between
 the brain and the mind, these are the milestones
 of the history of psychology.

In the second half of the century, the focus of
 attention shifted to the mind. The mind was
 considered a mysterious realm, a realm of the
 unknown. The discovery of the structure of
 the brain, the discovery of the function of
 the brain, the discovery of the connection
 between the brain and the body, the discovery
 of the connection between the brain and the
 mind, these are the milestones of the history
 of psychology.

In the third half of the century, the focus
 of attention shifted to the behavior. The
 mind was considered a mysterious realm,
 a realm of the unknown. The discovery of
 the structure of the brain, the discovery of
 the function of the brain, the discovery of
 the connection between the brain and the
 body, the discovery of the connection between
 the brain and the mind, these are the
 milestones of the history of psychology.

After the earliest research, the focus of
 attention shifted to the mind. The mind was
 considered a mysterious realm, a realm of the
 unknown. The discovery of the structure of
 the brain, the discovery of the function of
 the brain, the discovery of the connection
 between the brain and the body, the discovery
 of the connection between the brain and the
 mind, these are the milestones of the history
 of psychology.

BY ALBERT

PRT

PRINCIPLES OF INEBRIATE ASYLUMS.

WALTER TAY, M.D., SUPERINTENDENT OF WASHINGTONIAN
HOMES, BOSTON, MASS.

After the establishment of inebriate asylums, one of the earliest results was the discovery that inebriety is a *disease* rather than a vice; and this disease began to be pathologically studied, and as its symptoms became better understood, the proper remedies were discovered and suitable medicines administered, so that at the present time inebriate asylums have become institutions where the enervated and diseased physical system of the patient is treated medically, and the appropriate remedies are applied to restore his bodily health, while his mental and moral powers are restored by the influence of the superintendent, by intercourse with his fellow-patients, by observation of individual cases; and by such influence he is awakened to the danger he has been in and educated to total abstinence so thoroughly that the instances of relapse are comparatively few. The patient having once become convinced that in total abstinence he has only hope of a permanent cure, and being taught to look back upon the fearful abyss from which he has just been rescued, and being once more in possession of a sound mind in a sound body, there is every reason to believe in his triumphant victory over his enemy.

There is and can be no such thing as moderation in the use of alcoholic stimulants for a reformed inebriate. Temperance societies and temperance lecturers who advocate inebriate indulgence are not doing mankind any benefit. They may point out certain influential citizens who take a glass of liquor occasionally, and who have never been seen reeling along the street under its influence; these men may

the inebriate I speak, but my conviction has been that
 sooner or later these men become sober men, and flourish in
 their native land, having made their own bodies and minds
 capable of doing their duty in their respective voca-
 tions of home and of state, of private engagements, civil
 and holy, approved in heaven and man, and safe for assertion
 before the law, and that, notwithstanding their excess, how
 soon and how gradually they become temperate drinkers
 and that they had never imagined the struggle that they
 were engaged in, and never thought of giving up, and that
 they had never asked for professional help in their lives. Of
 the many who have been under my treatment, the greater
 part have no moderate drinkers, and I think they could
 not have been at all moderate, had they known about
 its medicinal power, and how easily they could have their
 strength restored, when from illness they became
 ill temperate.

It is known that alcohol contains some of the nutritive prop-
 erties essential for the maintenance of the functions of animal
 life, and some physicians have taken to give it in their
 practice. The treatment which the alcoholic inebriate has
 to go through is a matter of many years, and it is necessary to
 the patient's safety to be kept in his view, that the results
 of the treatment will not be seen when he is first treated, but
 after the temporary relief which it affords is followed by
 great debility, and the system rendered so feeble that recov-
 ery is difficult.

The immediate effect of alcohol on the nervous system of
 the human brain, produces a subject worthy of profound study,
 and it would be well if our children in the schools would
 make this a part of their education. Sober thinkers rec-
 ommend that the student's attentions and habits be control-
 led, through the student's attentions and habits be control-
 led, that muscular organs may attain the noblest of dispo-
 sition, and that the faculties of the intellect produced by
 study on the heart, mind, and stomach, kidneys, liver, lungs, its
 development, and that in the future, words of the inter-
 nal system, as a whole, its total development of the order

in the workings of the mechanism of the human frame, this
 knowledge, I maintain, would do much to help to prevent
 the use of this poison, and in some future article I shall
 speak more at length on this particular view of the subject.
 At present I wish to call attention to the fact that our treat-
 ment of the inebriate is not what it should be, nor in accord-
 ance with the enlightenment of the age, nor will this treat-
 ment be tolerated nor continued when our people are better
 informed in regard to this disease. I hold and firmly believe,
 and I am acquainted with eminent physicians and intelligent
 individuals who maintain with me, that it is a crime to cast
 the inebriate into prison with criminals. We might as well
 imprison persons afflicted with the small-pox or any other
 malady in order to remove from our sight the disgusting
 object or to preserve the community from contagion. All
 Christendom would cry out with horror against our cruelty
 in this disposing of the poor sick. Hence the State pro-
 vides hospitals with competent medical attendants, nurses,
 etc., and in most cases the sick are cured and returned to
 society, healthy, robust, willing and able to repay the com-
 munity by taking up again their share in the work of life.

The inebriate is diseased, a sick man, and so afflicted is he
 that without assistance from his fellow-men he must perish.
 He is incapacitated from doing anything to help himself.
 He yearns for help from his brother man, whose brain is not
 like his own, reeling in delirium or soaked in alcoholic
 oblivion. How cruel it appears for us to cast such a one into
 prison, and thereby degrade him in his own estimation and
 bring him to feel that he is a criminal for whom no one
 cares. "I wish I was dead," he groans; "I know I could
 get over this if any one would help me; but every one
 despises me. There is the murderer in the opposite cell;
 see the ladies bring him flowers and books and speak consol-
 ingly to him; but on me they cast eyes of contempt and are
 disgusted with my sad appearance. Oh, I wish I was dead."

But people may argue that the inebriate is a liar, a thief, a
 blasphemer, a contemner of God's law; well, these are all

be exceptions, I grant, but my experience has been that sooner or later those men become drunkards, and though it may never be known outside their own families and medical friends who hide them away, and by giving excuses of sickness, of being out of town, or pressing engagements, etc., put their appearance in an intoxicated state, our assertion is none the less true, that moderation begets excess. How often and how sincerely do these so-called moderate drinkers wish that they had never harbored the thought that they were stronger in will-power than their neighbors, and that they had never raised the poisonous liquor to their lips. Of the many who have been under my treatment, the greater part began as moderate drinkers, who thought they could take a glass or leave it alone; how little they knew about its wonderful power, and how poorly they calculated their strength they discovered, when from tippers they became dipsomaniacs.

It is known that alcohol contains none of the nutritive properties essential for the continuance or preservation of animal life, and good physicians have ceased to prescribe it in their practice. The reaction, when the alcoholic stimulant has spent its force, is injurious, and many times so dangerous to the patient already weakened by sickness that the results have proved fatal, and even when death does not immediately ensue the temporary relief which it affords is followed by great lassitude and the system rendered so feeble that recovery is delayed.

The immediate effect of alcohol on the nervous system of the human frame presents a subject worthy of profound study, and it would be well if our children in the schools would make this a part of their education. Seeing drunkards reeling through the streets, unconscious and unable to control their muscular organs, may attract the ridicule or disgust of sober people, but the *knowledge* of the effect produced by alcohol on the heart, head, stomach, kidneys, pelvic parts, its deterioration of the blood in the minute vessels of the arterial system, in a word its total disarrangement of the order

in the working knowledge, in ing the use of speak more at At present I w ment of the inc ance with the g ment be toleran informed in reg and I am acquat individuals who the inebriate in imprisonment in order malady in order object or to pic Christendom wo in thus disposin vides hospitals etc., and in most society, healthy, unity by takin The inebriate is that without assi He is incapacita The years for hel like his own re oblivion. How c prison, and therec bring him to tea cares. "I wish I get over this I despises me. Th see the ladies brii ngly to him; but disgusted with my But people may blasphemy, a con



We continue to act as solicitors for patents, caveats, trade-marks, copyrights, etc., for the United States, and to obtain patents in Canada, England, France, Germany, and all other countries. **Thirty-six years' practice.** No charge for examination of models or drawings. Advice by mail free.

Patents obtained through us are noticed in the **SCIENTIFIC AMERICAN**, which has the largest circulation, and is the most influential newspaper of its kind published in the world. The advantages of such notices everywhere under stands.

This large and splendidly illustrated newspaper is published **WEEKLY** at \$3.20 a year, and is admitted to be the best paper devoted to science, mechanics, inventions, engineering works, and other departments of industrial progress, published in any country. Single copies by mail, 10 cents. Sold by all news-dealers.

Address, Munn & Co., Publishers of Scientific American, 231 Broadway, New York. Handbook about patents mailed free.

THE Quarterly Journal of Inebriety.

THIS Journal will be devoted to the study of Inebriety, Opium mania, and the various disorders which both precede and follow. The many forms of Neuroses which arise from the action of these toxic agents are increasing, and becoming more complex, requiring special study, and, as yet, are comparatively unknown to the profession.

This Quarterly will be a medium for the presentation of investigations and studies in this field; also the official organ of the

American Association for the Cure of Inebriates,
publishing all its papers and transactions, and giving the practitioner a full review of the literature of this subject.

SUBSCRIPTIONS

Per Year, in advance, \$2.00. Specimen Numbers, 50 cents.

All books, magazines, and exchanges, with contributions and subscriptions should be addressed to

T. D. CROTHERS, M.D., Secy.,
HARTFORD, CONN.

Or to **BAILLIÈRE, TINDALL & COX,**
20 KING WILLIAM STREET, STRAND,
LONDON.



THE SCIENTIFIC AMERICAN is published weekly, and is the most influential newspaper of its kind published in the world. The advantages of such notices everywhere under stands.

This large and splendidly illustrated newspaper is published **WEEKLY** at \$3.20 a year, and is admitted to be the best paper devoted to science, mechanics, inventions, engineering works, and other departments of industrial progress, published in any country. Single copies by mail, 10 cents. Sold by all news-dealers.

Address, Munn & Co., Publishers of Scientific American, 231 Broadway, New York. Handbook about patents mailed free.

INDEX TO VOL. V.

A.

	Page.
Actiology of Inebriety,—Neurotic mental activity,	17
Alcohol in cases of great exposure,	22
Action of alcohol on the brain and nervous system,	62
Acute diseases following Inebriety,	124
Annual meeting of our Association,	167
Alcoholic inebriety from a medical point,	183
Adjustment of inherited tendencies,	225
Alcoholic drinking,	236
Alcoholic insanity,	241
Alcohol on the electrical condition of the body,	262

B.

Beer and strong alcohols,	53
Beer statistics,	182
Border-land studies,	264

C.

Craniology of Inebriates,	48
Chloral Inebriety,	171
Care of Inebriates,	182
Curability of Inebriety,	192
Crothers, T. D.,	53, 54, 88, 109, 156, 186, 267, 268, 269
Curability of opium addiction,	252
Caffeine and alcohol,	273

D.

Delusions on the treatment of dipsomania,	43
Discussion of Inebriety from traumatism,	93
Diseases of the eye from Inebriety,	104
Divisions of Inebriety,	112
Dipsomania,	121
Disease of Inebriety,	123, 201
Day, Albert,	22, 73, 153, 262

Dipsomania, 238
Dipsomania of Poe, 262
Danger from marriage with Inebriates, 268

E
Exercise in the treatment of Inebriety, 199
Early stage of Inebriety, 190

F
Food in the treatment of Inebriety, 58
Facts of alcohol, 123
Facts concerning Inebriety, 153

G
German Association for the Cure of Inebriates, 116

H
Heredity, 122
Heredity in crime and Inebriety, 128
How to treat Inebriates, 145
Historical notes on the responsibility of Inebriates, 156
History of the growth of public sentiment in England, 160
Howard, Henry, 66
Hall, Lucy M., M.D., 213
Historic note, 274

I
Inebriety and how to check it, 65
Inebriety causing cirrhosis of the liver, 121
Inebriety provoked by the church sacrament, 186
Individual treatment of Inebriety, 194
Inebriety from inheritance, 200
Inebriety in woman, 213
Inebriety from the standpoint of to-day, 269

K
Kerr, Norman, 77, 160

L
Legal opinions of Inebriety, 88
Liberty of the Inebriate, 181
Legal treatment of Inebriates, 203

M
Mason, Lewis D., 8, 241
Mann, E. C., 29, 140
Mattison, J. B., 252

P
Pathology of Inebriety, 56
Principles of Inebriate Asylums, 73
Practical facts relating to the disease of Inebriety, 84
Paralysis and Inebriety, 179
Prevention of Inebriety, 190
Parrish, Joseph, 1, 84, 144, 225
Pathological hints of Inebriety, 230
Popular temperance movement, 267

R
Report of English inspectors of Inebriate Asylums, 107

S
Some practical points relating to treatment of Inebriety, 27
Semi-annual meeting of the Asso. for the Cure of Inebriety, 40
Some new books, 58
Study of Inebriety, 55
Some new remedies valuable in Inebriety, 61
Studies of alcohol, 101
Special remedies in the value of Inebriety, 115
Symptoms of inherited Inebriety, 118
Statistics of the increase of revenue tax, 198

T
The temperance cause and its departures, 1
The importance of restraint in the early stages of dipsomania, 8
The remedial treatment of Inebriates, 77
The memory in Inebriety, 102
The effects of alcohol in Inebriety of women, 106
The philosophy of insanity, crime, and responsibility, 108
Treatment of opium Inebriety, 126
The pathology of Inebriety and its importance, 139
Test for alcohol in the urine, 181
The legal and scientific means for treatment in Inebriety, 183
The medical recognition of Inebriety, 196
Treatment of Inebriates in small homes, 272

W
Washington Inebriate Asylum, 113
What shall we do with the drunkard, 174
What is an Inebriate, 180
Wright, T. L., 17, 228
Where Inebriety is not recognized medically, 271

... was a man of very great feeling. He was sent to bed, placed under the covers and was in a remarkably well...

Dr. Devalde was of opinion that the heroic struggle for civilisation, however successful, does not reach those mentally weaker than their environment, so that they do not drink, not only because of a strong desire, which they know they would be beaten. He was of opinion that general sobriety attendance at church by persons in the male classes was most likely to defeat its own object.

The President Dr. Farquharson said: I quite agree with the remark that this is a paper which should interest every member of the medical profession, whether he belongs to one branch or not. The first point that occurs to me in discussion of this—admitting all the facts, as admit them we must be I can not argue case upon case, just as Dr. Norman Kerr has done—that this shock of which the learned Doctor speaks is a case of persons taking to drink—the question is whether these persons are all predisposed before they begin to drink, and before having themselves become drunkards or from their ancestry having communicated to them the desire to resort to that kind of relief. If they have been drinkers themselves and have been habitually attached to drink, and I presume a good many have been so, then it is very easy to understand why they fall back upon it under these emergencies. Very often in the past generations, a generation which we represent as men, in the boy life of that generation boys were taught to take an excess of drink, and they, without knowing it actually as a harm, became habituated to the influence of alcohol, and in the early days of their nutrition and their growth were so possessed by the action of this agent that they afterwards, though with the maturity of knowledge and wisdom resting upon them, still were affected by it, and then when the great came, having been as it were once affected and lost their mental balance, they had fallen back upon that to which they were accustomed. I do not think this is applicable merely to alcohol. I do not know

whether Dr. Devalde... these phenomena, but I... these drunkards who have... been temperate. I should like... factors have not been... here a tendency by int... *and this tendency was at... persons as well as health... alcohol as it is used, not... for health.* The only... is this, if a man meets with... or observance of other... thence and afterwards... ing in that way, I think... man has gone through... strongly by his friends... a woman persuaded to... in one or two instances... quite the same sort of... Men in moments of rub... wards sometimes been... spoken of here are case... has already been p... agree with Dr. Kerr a... real view of those condi... tional and existing aff... more likely to lead to... world outside medicine... (very few medical men... require to be completely... the treatment and cur... that Dr. Kerr has not a... only put forward what... are fully developed, not... and none which the rel... service except to take...

of the world, but this was a twin of the first, and was not in the least different.

It was the fierce struggle for existence, but it was not only a struggle for existence, but a struggle for life. It was not only a struggle for life, but a struggle for the life of the nation. He was the only man of his time who was not likely to die of

drunkards, and I quite agree with you when you say that every man who is not a drunkard is a drunkard, but I do not think that we should be so hard on them as Dr. Norman says. I think the learned Doctor is a little mistaken—the question is not whether they begin to drink before they become drunkards or whether they begin to drink after they have become drunkards, and if they have been drunkards from childhood, then it is very easy to see how they can be so. In our generation, a generation which has the new life of that generation boys are ever so drunk, and they, without any reason, become habituated to the influence of the early days of their nutrition to be possessed by the action of this world, though with the maturity of the world upon them, still were affected by the world, having been as if were their mental balance, they had fallen when they were accustomed. I do not like the word to alcohol. I do not know

whether Dr. Drysdale in his large experience has observed these phenomena, but I should think he has. Now, when these drunkards who have been treated by Dr. Crothers have always been temperate, does not appear, and if themselves temperate I should like to know whether their fathers and mothers have not been so affected that they—the offspring—have a tendency by inheritance to this change. *If they have not this tendency one way or another, and if it be true that a person in perfect health can by mental shock be made to take alcohol as described, matters are very serious indeed, but I do not think so.* The only way in which I can account for that is that a man meets with a great shock, and by mere custom or observance of other people becomes for the moment a drinker and afterwards a drunkard. I can imagine him starting in that way; I think I have seen an instance where a man has gone through a great affliction, being persuaded strongly by his friends to take a glass of wine. I have seen a woman persuaded in the same way, and I think I have seen in one or two instances some made drunkards, but that is not quite the same sort of argument put forward in this paper. Men in moments of mirth are made to take liquor, and afterwards sometimes become drunkards, but the class of cases spoken of here are cases of persons where the effect of alcohol has already been pronounced in the body. I strongly agree with Dr. Kerr as to the importance of taking a physical view of these conditions. I am quite sure that all emotional and exciting attempts at curing this disease are only more likely to lead to an increased condition of it. The world outside medicine, and largely the world inside it too (very few medical men are paying serious attention to it), require to be completely reformed in their views in regard to the treatment and cure of habitual drunkards. I am sure that Dr. Kerr has not at all exaggerated that point. He has only put forward what is simple truth. When these cases are fully developed none of the agencies which we possess, and none which the religious world possesses, seem to be of service except to take the victims absolutely and entirely out

of ten or twelve, which may mislead the mischievous
 woman, what a hole to think all influence men. The
 man, and if I fear that some might will come from a su-
 prence is enough to many, does he drive me back to inno-
 cent drinks. A 2nd man, under great religious emotion,
 at a meeting, picked up his mind to abstain, and he has
 obtained a fortnight. A friend met him, who is fond of his
 glass, and said, "How fast you look." Thereupon, he flies
 to me and says, "It is possible that I am entirely and abso-
 lutely changed." I have not seen it night. I am in a state
 of the greatest fear and alarm, and I feel changed. I did
 not lose consciousness, but on the following morning he
 was somewhat better. He however, did not abstain, con-
 sideration, and will very likely fall back. In fact, I think he is
 as certain to get back as that the sun will rise to-morrow
 morning. The President, consulted by sayers, that he did
 not think completely attendance at church would do any
 good, but rather the reverse, and by proposing a cordial vote
 of thanks to the reader of the paper, which was heartily
 agreed to.

STUDIES IN ALCOHOL. BY DUJARDEN BEAU-
 MELITZ OF PARIS.

Dr Hurd has recently made a translation of some very
 important conclusions from studies of alcohol, by Dr. Beau-
 melitz, which appear in the *Revue Medicale Journal*, from
 which we extract the following:

The present theory of the antipyretic and refrigerant
 action of alcohol, and one which accords with all experi-
 ments in this direction, is the acceleration of alcohol in
 the circulating blood and the destruction of the acetates
 formed in the water and carbonate acid. 70/100 after having
 shown that the acceleration of the blood is continually
 increasing, he has suggested in the presence of water bodies
 and oxygen up to them all its combined oxygen has made it
 plain that the globule impregnated with alcohol transforms
 the latter into acetic acid during the phenomenon of trans-
 fer.

In this regard, the following is a summary of the
 all these things, so as to give a summary for the
 respiration units of the same brain with its
 throughout of the capillary. It is not, as
 current of oxygen is, a certain amount of blood which
 has been used with alcohol, the blood which is used by
 the reactions of acetic acid when the present is
 employed.

We are now in a position to explain the reactions and
 other phenomena observed in alcohol, the blood which
 know in fact that an animal is needed by alcohol, the
 undergoes depression of temperature, if death occurs. At
 the very least, we observe by the action of alcohol, or the pre-
 sence of alcohol, and that held in all the vessels
 of the animal, a change of temperature, the result of the
 intervention of the phenomenon of fermentation, and the
 alcohol. Since the blood, when it is in contact with
 quantity of oxygen, it follows naturally that the reactions
 in the tissues of the vessels are incomplete, and that the
 carbon is imperfect. The result of this is, however, that
 is the accumulation of lactic acid in all the tissues, and
 the presence of lactic acid in the blood capillaries. The
 black blood, however, in the vessels is the formation of
 the respiratory chain, in which the oxygen being that the
 the globule, less carbonic acid is required. Hence the lactic
 gas accumulated in the blood, there is also an accumu-
 lation of this acid. The acid, which is then, is formed
 from the breaking up of alcohol and oxygen. The
 carbonates in the blood, which are CO₂ and H₂O, are
 acetates, and these latter, in the presence of water, form
 water and alkaline carbonates. In these reactions, which
 a veritable poisoning of the animal, and which is the
 progressive slowing of respiration and blood, in all
 organs.

Jailet thinks that the decrease of alcohol in the blood, is
 owing to the effect on the tubules of acetic acid, formed
 during the oxidation of the alcohol.

THE MEMORY IN INEBRIETY

In *Effects of Alcohol on the Brain*, Dr. *Le Gros* describes memory as follows: "It consists of a conservation and a reproduction. The first depends upon nutrition and the second upon assimilation and local circulation. In the first instance where the nutrition is normal, the impressions must not only be retained, but they must be registered, conserved, produced, and modified according to the requirements of the body. The second element of memory is the reproduction. This reproduction depends upon the general and local circulation of the blood in the brain. It will follow also on the quality and quantity of the blood. It will follow from the fact that where the nutrition of the body is defective and the circulation irregular and changeable, the registering and conserving process of memory will be imperfect. This is confirmed by clinical experience in many ways. The effect of fevers, diseases of the organs directly concerned in nutrition with exhaustion, old age and any profound disturbance of the system is always noted in impaired, weakened memory."

The effect of alcohol is noted in the first stage by great exaltation of memory. Both the past and the present come out in the most vivid relations. An appearance of brilliancy follows that is very deceptive, because it is of uncertain duration, and is only along certain narrow lines. The next stage comes on quickly and may be concealed from all general observation for a time. It begins in partial amnesia, memory rapidly into total loss of memory. The incubation in a state of intoxication is in this condition, shading all the way back to partial and then realization of the present and past. In some cases progressive amnesia begins in matters of dates and figures, going on to facts and ideas, extending over years, a regular progressive paralysis of this function in which one by one of all general impressions of the past

and away for ever. Consistent inebriates, or those who drink regularly are subjects of this affection, which may exist for years and not be noticed. Persons in this class suffer from intermittent amnesia. At times the memory is disturbed and events covering days and months may never be recalled. These blanks may come on in many different ways, by an extreme form of sobriety or be called up very vividly by an exciting train of recuses. Events that have been long forgotten take the place of recent impressions and the person, soon or late, in many cases, double and trebles round out side by side in strange contrasts in many instances. This was strikingly illustrated in the case of a clergyman who was a periodic inebriate and when amnesia was complete, although in every effort to conceal his state, he was with his belief and acted as if he were of one mind. As his state was not known in the most honest states, so many have known during this period. Numerous instances are on record of this state, which has been noted in a certain form of somnambulism. The inebriated state is another phase of these various affections, and the same study of the same phenomena will show that in all these cases memory is defective. In the statement of *Dr. Le Gros* on this subject, it is noted that in cases of low memory, to some of the past can not be recalled, quite so much as the that coming into focus in evidence. One form of this depends on the quantity of the substance in the system, and the evidence of its state should be considered, until the condition of his memory has been the subject of a careful study. Very serious and interesting questions appear very often, depending on the amount of memory of inebriates. *Dr. Le Gros* is a very able writer, and his study of this question has a field of future study that promises a revolution in both courts and medical practice concerning inebriety.

Dr. Stewart's *Practical Treatment and Care of Alcoholic* published in Detroit, Michigan is a very welcome addition to the practical books of a working library.

tendency to low forms of inflammation, and altogether such cases are tedious and troublesome at the best. *Abby's* *Phthisis*. This is a name given by ophthalmic surgeons to a disease frequently observed in the outpatient room of any eye hospital. The sufferer often an apparently healthy, able-bodied man, complains of his sight. He says that it has been failing him for some time, that he has noticed a sort of veil or haze in front of his eye, that he cannot see anything distinctly, that everything is faint and without definition or outline. He cannot read any but the largest type, glasses are of no service. On examining the eye with an instrument called the ophthalmoscope, by means of which the interior of the eye can be illuminated, we are often not able to detect any structural change. Then we naturally endeavor to find out the cause, and we can find none other than too great an indulgence in drink. The patient admits that he has taken "pretty far," especially of spirits, and on Saturday nights. What convinces me that drink is the real cause is that in a large number of cases that I have carefully recorded and watched, I find that where alcohol is entirely abandoned, and the system is brought up by tonic treatment, the sight is restored to its normal condition. The blindness is caused by the thromboses of blood circulation and imperfect supply of blood to the retina that beautiful and wonderful nervous layer where the images are formed. If drink is persisted in, nutritive and structural changes take place, and the optic nerve, which conducts the impressions formed to the brain, becomes quite atrophic or wasted, and the case is hopeless. It has been my sad lot to see more than one such exorable case where a strong, healthy-looking man, led by an anxious wife to a hospital, had to be told that there was no hope for him, and that drink had been the cause of all this terrible affliction. Such cases occur to men who are by no means hopeless drunkards, but are apparently regular and hard-working men, but at the same time regular and constant drinkers.

DISEASES OF THE EYE FROM INEBRIETY

Dr. Jones, Surgeon to the Royal Eye Hospital, Manchester, Eng., makes the following reference to this subject in a late lecture, published by the Sanitary Association:

Certain functional derangements are aggravated, if not actually caused, by alcohol. Black specks, little rounded beads or bands, or sometimes fly-like bodies, called muscae volitantes, are seen floating before the eye, these often are not due to any structural change, but they are very troublesome and annoying. Alcohol may produce them, or at any rate render them much more noticeable by its tendency to disturb digestion, by its effect upon the nervous system, and upon the blood supply of the eye. A chronic congestion or inflammation of the delicate lining membrane of the lid and eye, called conjunctiva, is often produced by drink. In its normal condition it is pale, white, and clear. When irritated the blood-vessels become dilated and engorged with blood, thus giving it an injected, red, painful appearance. This is often noticed in free partakers of wine, the venous injection is almost characteristic. In conjunctivitis very difficult to say what share alcohol takes in the production of this disease, which is an opacity of the crystalline lens of the eye. As the disease is undoubtedly caused by deficient nutrition, due to an impoverished supply of blood, and a consequent loss of the watery constituents of the lens, and as the disease is often found in such disease as diabetes, where the watery constituents of the blood are very deficient, so that it assumes great density, and this gives rise to an endostomosis (an interchange) of the watery constituents of the lens, which consequently becomes opaque, and furthermore, as alcohol has an insatiable thirst for water, and as it undoubtedly acts injuriously on the blood, it is admissible to infer that it has a decided tendency to produce such changes in the eye. One thing is certain, that the prognosis in the catarrh operations of heavy drinkers is never so satisfactory, we always look upon them with suspicion as to the result, the wounds do not heal well, there is

THE EFFECTS OF ALCOHOL IN INEBRIETY OF WOMEN

According to Dr. Allbutt of London, the spine of women who use alcohol is more affected than in men. In one case spinal paralysis appears in the ether delirium. In women the excessive use of spirits is noted by severe shooting pains in the legs, always accompanied by great muscular weakness. When the usual digestive, hepatic, and uterine derangements, following inebriety in women, suddenly disappear, grave trouble may be anticipated. A metastasis is likely to take place, from which cardiac and cerebral disorders will come on. The form of paralysis following inebriety in women is peculiar and different from other. The loss of power begins in all the limbs, in the upper extremities, particularly of the hands and wrists. The muscles are soft and flabby, and a persistent congestion and swelling of the feet and hands are noticed. Particularly noticed after walking, or hanging the hands down for a time. This was due to vaso-motor paralysis. Delirium tremens is rare, but hallucinations and delusions are common. Careful microscopic examination of the cord and brain, after death, failed to reveal any prominent changes. A curious fact has been noticed, that, in all these cases, the sphincters retained their power to the last, even when paralysis had invaded nearly all other sections. Another fact is equally unexplainable, that is, the absence of albumen in the urine, which is seen often up to death in most cases.

Boer's Medical Combination Index, noticed in our advertising pages, is of almost indispensable value, for making handy notes and references, thus grouping them as to be available for use in the future.

The Physiology of Alcoholics, by Dr. Carpenter, published by the National Temperance Society, New York City, will take equal rank with many other valuable publications of this Society.

REPORT OF THE ENGLISH INSPECTOR OF INEBRIATE ASYLUMS

The second report of the Government Inspector, like the first, is a sad comment on the want of knowledge of both the nature and character of the subject. It is impossible for any one, no matter what his attainments are, to form any correct conclusions of the value of inebriate asylums, as organized under the English habitual drunkards act, the operation of which is limited to months, and only three or four asylums. The law is recognized and acknowledged to be exceedingly impractical and obstructive in its practical workings, and yet, the Inspector assumes that it is perfect; that the subject is well understood by the managers of asylums, and himself in particular, that the experience of a few months and the confinement of some cases for a few weeks, furnishes evidence that is conclusive.

In this country, men who have been practically engaged for years treating these cases are very guarded in their opinions and prognosis. The report of the Inspector is startlingly clear and emphatic on questions that can be by no means understood in the present state of the subject. His comments on the usefulness or failure of this or that means are entitled to no consideration, because unfounded on experience or study. It is deplorable that the subject should be held in check by foolish dogmatism, in a land of truly great scientific men, where the truth can be so easily ascertained.

A series of papers on the Power of Alcohol over the Nature of Man, as displayed by the modifications of mind, morals, and the physical constitution incident to its use, by Dr. T. L. Wright, of Bellefontaine, Ohio, are being published in the *Detroit Lancet*. In many respects they are the most suggestive and original discussions which have appeared on this subject. The range of study is wider, and the phenomena of inebriety is seen higher up and from the latest researches of science.

THE PHILOSOPHY OF INSANITY, CRIME, AND RESPONSIBILITY

Under this title a well-known specialist, Dr. H. Howard of Montreal, Canada, presents a very suggestive discussion of many of the obscure phases of this subject. The first part of the book is devoted to the nature and character of insanity and the last to the medical jurisprudence of crime and insanity, also criminal responsibility. The book is largely a compilation of recent discussions of this subject with the author's views, many of which are entitled to much consideration, as coming from a long life experience.

The value of this monogram to the student of inebriety is more from the side lights which it throws on the partial insanity and changing responsibility seen in inebriety.

Also, the collateral evidence, which is grouped in cases, proving the physical origin of conditions which are at present ascribed to moral causes. The book will well repay a careful study, and we urge our readers to procure it. The leading article of this number of the Journal, by the same author, will indicate the importance and value of his book in our special studies.

The more we know of the various forms of insanity, and the classification from external causes and psychological symptoms, the monomaniacs, the partial insanities, the moral and intellectual insanities, the more clearly the disease of inebriety appears. No matter how obscure, its physical causation can always be traced in the different physiological and psychological symptoms. When the physical organization is healthy and normal all action and thought are sane and reasonable; but when pathological and anatomical changes take place, then impulses and actions are abnormal and disordered. The morbid is diseased and controlled by the diseased organism, and recovery can only come from restoration of these disordered nerve and cell activities.

Editorial

EXERCISE IN THE TREATMENT OF INEBRIETY

The inebriate has always an unbalanced organism. The equilibrium is broken up and the natural force expenditure is diverted. The abiding element of the food cannot be obtained because digestion is defective. The liberation of energy through the brain and muscles is imperfect. An excess of one or the other is always present. This excess of force expenditure reaches the extreme limits in the paroxysmal activity of the inebriate.

In health the body is a machine, where force and energy are constantly stored and liberated.

If the food supply and the intensity of the organism are perfect, both the brain and muscles are active in this liberation of energy. If the expenditure of energy by great brain and nerve activity goes beyond a certain limit, the food storing force is impaired, and if to this is added muscular inactivity both the mind and quality of the brain action will degenerate.

If muscular expenditure is carried beyond a healthy range, the same impairment of food force and brain activity follows. The brain workers who neglect the body, and the muscle workers who neglect the brain, all suffer, and the food force fails to supply the demand. Thus muscular and brain exercise are absolutely essential in the great force liberating apparatus. This activity not only aids in preparing the food for the building up process of the body, but is an important factor in the elimination of waste matter.

In inebriety this brain and muscle energy is always at its maximum and minimum intensity. Muscular agitation or inactivity, intense brain and nervous excitation, marked by

delirium and delusions are always present. The storage force from the food is lessened, and certain favoring channels appear through which these forces are liberated. As in one case, the excess of alcohol is followed by mental or muscular excitement.

All thought and nervous activity is unbalanced; a period of intense excitement is followed by a state of insensibility. The brain may become insensible from the start and the muscles be agitated, or the order may be reversed. In both cases general paralysis and excessive debility always provoke the desire for spirits to lessen the effect of this loss of energy.

In the treatment after the withdrawal of alcohol, the restoration of this lost energy is the object to be obtained. In the ideal state of perfect health the exercise of the brain and muscles, and the elaboration of the food must be chemically and physiologically exact. The metabolic and nerve expenditure in the restoring process must be exact, and also the elaboration of food, and the elimination of the waste material.

The practical problem is to find the conditions and degree of exercise most favorable to this end. Each case must be determined from the facts of its history. Some facts indicated by long experience seem to have a general application. Thus the emotional excitement following revivals and efforts to will and pledge themselves to recover is in most cases a source of still further exhaustion and departure from health. On the other hand the want of exercise and depression from confinement in jails and general bad surroundings is equally injurious. The inebriate who complains of dullness and seeks a change of mental and physical surroundings, is in many cases obeying a physiological impulse that is literally an effort of nature towards recovery. Often it is the same impulse which is manifest in muscular nervousness and seeks relief in long walks and much exercise. Inebriates who come from centers of great mental activity and consequent nerve exhaustion from mental strain require more muscular exercise in the treatment. Muscular workers who are inebriated need more brain exercise in the treatment. Where inebriety springs from both conditions of exhaustion,

a wise combination of general exercise is essential. Exercise that will change and direct the force expenditure elements aids in recovery. The brain worker is more debilitated as an inebriate has more exhausted energy, and more susceptible to the surroundings, requiring more exact methods of treatment. Inebriety from muscle workers is always marked by organic deteriorations of the heart, liver, and other organs. The degree of exercise as a remedy must vary much in each case, and where they are combined require skill in the adaptation to the needs of each case. Exercise is a physiological necessity as much as food is a requirement of the body. The times of taking exercise, and its degree and nature are often indicated in many cases. No universal rule of labor on the farm, on in workshops, or of walking or exercise in the gymnasium or continuous emotional excitement from religious appeals or intellectual amusement can be applied. Every case must be treated by itself. Whatever other means may be used, judicious exercise directed by skilled observers is a remedy of great power, but unless wisely used is dangerous and will cause the very conditions which it is designed to remove.

The managers of the Journal or Exerter are always pleased to receive papers and letters for publication or personal consideration. But we expect that persons who disagree with us will assume that we are not filled with prejudice against the truth from any other source, or dishonest in our recognition of it. The articles published in this Journal are by men fully acquainted with the subject of which they write, and represent the experience and conclusions of the authors, without regard to any impression they make on the reader. The aim of this Journal is not to build up any theory or dogma that is not founded on the widest experience and studies of many persons. Under all circumstances we are ready to accept the truth whenever it is established on good evidence, no matter what the consequences may be. We want facts, not theories or moral speculations.

DIVISIONS OF INEBRIETY

The classification of inebriety must be made on an etiological basis at present. This must of course be of the most general nature, as all our studies are very imperfect and sadly lacking in distinctness. The facts, real and apparent, are numerous and cover a wide field, making it almost impossible to reduce them to order and discover their true meaning. Some general division like the following, will be found of value:

1. Inebriety direct, as inebriety from inebriate ancestors one or two generations back.
2. Heredity indirect, as coming from insane, consumptive, epileptic, and otherwise defective nerve organized ancestors.
3. Physical Traumatism, from injuries direct and indirect, or diseases with entailments are followed by inebriety directly traceable to these events.
4. Traumatism of a psychical nature, such as mental shocks of all kinds, perturbations, and intense agitations of the nervous system, which are quickly followed by inebriety.
5. Excessive strain and drain of both physical and nervous systems.
6. Anaemia and neuroasthenia in all forms and conditions.

These are only the outlines of vast unexplored fields, that must be traced and examined before the true generalizations will be found. In the natural evolution of every complex science there comes a time when the great central truths stand out clear and distinct. These may serve as landmarks from which to date other and more minute observations. The disease of inebriety is one of these great facts. From this point the field of etiology, pathology, and treatment, wide and present such a complex mass of facts that only farther on can we expect them to be reduced to order and rightly marshaled. This is the work of the next century, when the whole subject of mental science shall have advanced beyond the present shadows of superstition and infancy.

WASHINGTON INEBRIATE ASYLUM

The Secretary of the Board of Trustees of this asylum, Col. D. D. Cone, has furnished the following facts, which indicate that this institution has made the right start, and will be in active operation at an early day. In 1876, by a special act of Congress, this institution was incorporated, to be called the Washington City Inebriate Asylum. The act provided that all persons who subscribed ten dollars should be deemed stockholders, and the affairs of the Asylum should be managed by twenty-five trustees chosen from the stockholders; also that all funds and property owned by the incorporation should not exceed a half a million of dollars, and that said property should be applied for no other purpose except for the care, medical treatment, and control of inebriates. The act specified the way commitments of patients should be made, which is practically the same as of the insane. In section ninth, inebriates who are to be committed are described as persons who by the use of intoxicating liquors or other intoxicants, have lost self-control or become incapable of proper attention to the care and management of their affairs; or habitually or periodically neglected thereof or dangerous to themselves or others, shall be regarded as inebriates or habitual drunkards. The Board of Officers are as follows: John C. Harkness, President, D. P. Hal- loway, Vice-President, D. D. Cone, Secretary, W. W. Moore, Treasurer, and Joseph T. Howard, M. D. Superintending Physician. The organization of the board followed soon after the passage of the act, and has been enthusiastically maintained up to the present. A number of benevolent gentlemen have long ago signified their readiness to aid in the work, if an appropriation could be obtained from Congress, to give permanence to the work. The commissioners of the District, and others, have recommended an appropriation from Congress repeatedly, but while the claims for this object have been favorably received, and met with no opposition, so far they have been laid over for the future. The

SPECIAL REMEDIES OF VALUE IN INEBRIETY

Our object is to call attention to some of the remedies that are being used in the treatment of inebriety, and indicate their general value, from the experience of to-day. We would not have the reader infer that these are the only therapeutic agents of use in the treatment of inebriety, of that we call attention to them simply as advertisers in this journal.

Most of these remedies have been tested clinically from samples sent direct from the manufacturer, and while we have not yet completed the clinical observations of these drugs, enough has been ascertained to fully sustain the following endorsements: *Coca* and *Tannin* *Dissimulata* prepared by Park, Davis & Co. of Detroit, either used in combination, or separately, have often a marked action as a nerve tonic and sedative. The *valerian* has been given as a tonic in cases of great debility, and so far it seems of greater value than quinine. The dosage is in some instances a very pleasant narcotic and is always worth a trial. The *Knotted Phosphates* of F. Crosby, New York, have in our hands proved to be of much value in cases suffering from great debility and acute dyspepsia.

Tea-chophina is another remedy that has a peculiar value in inebriety where nutritive disturbances are present. *Trilobes Hypophosphites* may be placed in the same list as a remedy that should be tried in all these cases of chronic inebriety where conditions of prostration, the crura are associated with this disease. *Hyoscyamus* *Asa* *Phosphata* should be used in every case of inebriety and as a general tonic and nervine it seems unequalled but should be given in a few weeks after the alcohol is withdrawn. *Alum Sulfate* by Keith & Co. of New York, is a remedy about which much difference of opinion exists. From a limited observation it is evidently a medicine of some value, and has been used with success to combat the peculiar exhaustion from opium and alcoholic inebriety. The value of *Branolis* prepared by Battle & Co. of St. Louis, is so well attested that it needs no comment.

renew grade movement of the State of New York, to closing up the asylum at Binghamton, greatly unsettled the public mind regarding the value of such asylums, and caused the committee of Congress to hesitate about making appropriations for the present. A better acquaintance with the subject and its necessities will make clear the practical value of such asylums for the treatment of inebriates, above the currents of popular opinion. The government have always shown great liberality in encouraging and helping all benevolent institutions in the District, and it is confidently expected that a large appropriation will be made for an inebriate asylum at an early day. The need and value of such an asylum has been truthfully portrayed in Washington letters to the Hartford *Times*, and in other correspondence from that city. The Board of Officers have perfected their plans of building and location, and only await help from Congress to begin at once. They are confident that a well-managed asylum at this point will have a national importance and value that will be felt far into the future. A renewed effort will be made in the coming session which will bring a large local endorsement and will be no doubt successful. We assure our friends that this work is one of the great necessities of the age which will be recognized and acted upon practically sooner or later.

The new book by Dr. Parrish, entitled *Alcoholic Inebriety from a Medical Standpoint*, is published by P. Blakiston, Son & Co., Philadelphia. The following is the table of contents:

1. Who are inebriates? 6. Insanity and inebriety. How related.
2. The Vice Aspect of Inebriety. 7. How to Deal with Inebriates.
3. The Crime Aspect of Inebriety. 8. Asylums and Reformatories.
4. Inebriety a Disease. 9. The Psychology of Inebriety.
5. The Heredity of Inebriety. 10. The Conclusion.

The medical expert, whose studies and observations have impressed him more with a knowledge which he has acquired than what remains to be learned, is not a safe guide on the subject of inebriety.

The Horsford Acid Phosphate, the Hypophosphites of Fellows, and the Vitalized Phosphates of Crosby, have each a personal value in all cases of inebriety, but we need further study to determine their use minutely. The other remedies have been found essential, and should always be included in the means used to treat inebriety.

GERMAN ASSOCIATION FOR THE CURE OF INEBRIATES

In the October number of this Journal we mentioned that steps had been taken in Germany for the organization of a scientific society for the study of inebriety. Through the kindness of Dr. Pieper of Moyland, Prussia, we are able to give some particulars of this effort.

In October, 1882, an informal meeting was held at Frankfurt on the Rhine to discuss the best plan of a permanent organization, the object of which should be to promote a thorough study of inebriety, and the means for its prevention and cure. A religious society which had been in existence some time, called the Society for the Suppression of Alcoholic drinks, united with this movement, and a general good feeling prevailed. A large number of eminent medical men were present, and agreed to issue a circular to the public for a more general endorsement at a later meeting.

The following is the substance of the appeal, which was sent to every physician and all the leading men of the country:

"We address ourselves to the German public of all classes, in full confidence that the time has come to look upon the injuries from excess of drink, and inebriety from the standpoint of science—to organize a society by which this subject can be studied and be better known.

"The desire for drink, which seems to be constantly increasing, is making serious inroads into the vigor and mortality of our people. Everywhere it is clearly apparent that the excess of drink is filling our hospitals, almshouses, and

insane asylums, and all other asylums, of every character, also the suffering and mortality is not exceeding that of all other causes combined. Therefore, we appeal to the public classes, and those who have influence to help on our sustenance some measures for the cure of this evil. We ask for the study of this matter, for a more exact knowledge of the evils, and the best measures to effectually control them. Efforts in this direction have been made in Sweden, Holland, England, France, and America, and a growing interest is manifest to know more about the meaning and the making.

"We appeal to our countrymen to unite with us in our movement, and aid in the organization of a society which shall be outside of all religious, political, or any other influence, except the one object of studying the inebriate and the means to help him. We ask for the cooperation of all and trust to hear in many places and private or manner, expecting that it will be hard at first to get perfect unity of action, but we are assured that the result of our labor will be a great triumph. We therefore call a public meeting at *Gravel* near Berlin, Thursday, March 29, 1883, to effect a permanent organization.

"This address is signed by several physicians and among them are many professors and medical teachers of world wide reputation. Several directors and physicians of insane asylums, and government officials, including two field marshals, lawyers, judges, and mayors, besides have also their signatures to this paper. The result of this movement will be watched with great interest. Our association has cause for great congratulation in the thought that the objects for which our society was organized thirteen years ago, are at last recognized by the great thinkers of the age.

The fourteenth annual meeting of the American Association for the Cure of Inebriates will be held in the 100th Street of the Inebriates Home, Fort Hamilton, N. Y., April 25, 1885. The first session will begin at 10 o'clock. A large attendance is expected.

Clinical Notes and Comments

SYMPTOMS OF INHERITED INEBRIETY

Some children of drunkards inherit immediately from their parents diseases like epilepsy, chorea, cerea, hysteria, idiocy or imbecility. They are subjects of interest from the standpoint of the pathologist or physician from the cradle to the grave. They suffer, and are burdens to their friends or to the community as long as they live. As a rule such persons are precocious. They develop prematurely and show considerable intellectual quickness. They often possess a taste for music or painting, or for special handicrafts, and are ingenious, winning, and attractive to all who come into relations with them. They are tasteful in dress, if females, and show, almost brilliant in conversation and bearing. They sometimes display, from tender years, perversion of the moral sense. They are untruthful, unscrupulous as to the means employed to accomplish cherished plans, indifferent to the property rights of others, and lacking in appreciation of abstract right and justice. At puberty, they often develop unpleasant characteristics. They usually display at this time a lack of mental equilibrium and frequently lose those traits of mind which in childhood proved attractive. They are wayward, jealous, suspicious, perversé, and often show their parents and interested friends by acts of apparently wanton cruelty towards young children, or towards animals. As adult life is reached in females, they become hysterical and nervous, and often sink into a condition of neurasthenia which terminates sooner or later in actual insanity, or in the frenzy. Males, at a corresponding age, become reckless, reckless, dissipated, and vicious. Many of both sexes develop insanity at adolescence without adequate exciting cause, and

remain insane for life. It would seem as if the original potential energy of the brain and nervous system had become exhausted during the comparatively brief period of childhood and youth. Stimulated to unnatural activity by a highly excitable nervous system, they develop precociously and wear out prematurely. If the early environment of such persons has been favorable or the morbid tendencies derived from one parent have been neutralized by those inherited from the other, they may go through life without breaking down. All, however, are liable to develop insanity or mediocrity whenever subjected to any severe strain. Excessive labors, overwork, over-joy, ill health, child bearing, change of life, old age—these and many other exciting causes are sufficient to destroy mental health. Whenever mental disease is thus developed, the ability of the individual to recover is much diminished. As a rule such persons do not recover from attack of mental disease, or at best make what is known for want of a better expression as "imperfect recoveries." They are liable to a recurrence of similar attacks upon slight exciting causes and eventually become incurable. In many instances the fact that a tendency to insanity has been derived from an inebriate ancestor renders it necessary to give an unfavorable opinion as to the prospects of complete recovery from an attack of insanity, which under other circumstances would have been curable.

The marked instability which characterizes the nervous system of the children of inebriates is shown by the facility with which the transformation of normal conditions into abnormal states occurs. They are high-headed after a slight derangement of digestion or of the circulation, and easily develop trance states, somnambulism, hysteria, and catatonic conditions. Their vital resistance, which depends largely upon a good state of nutrition, is lessened, and they fall whenever any mental or physical strain comes upon them. The children of inebriate parents are notably liable from this cause to accustom themselves to stimulants and to resort to alcoholics, opium, chloral, or tobacco to spur their flagging energies to action.

In some instances an inebriate heredity develops in one child as depravity, in another as mebrity, in a third as hysteria, and in a fourth as insanity.

In those unfortunate cases where the brain and nervous system of the parent was poisoned by alcohol when their existence began, conditions of actual disease are always present. In some instances the brain and nervous system are endowed with an excessive degree of excitability, which gives rise to convulsive seizures or to chronic chorea. Here the reaction of the nervous system to external stimulation is excessive, and perpetual disease and disorder results. In other cases the growth of the brain has been arrested prior to birth, and the mind does not develop at all, or it develops very imperfectly. This is ascribed by some to the direct effect of alcohol to increase the growth of the connective tissue of the brain which is developed at the expense of the gray matter, and thus encroaches upon the thought-producing portion of the brain structure.

The greater proportion of females inheriting this predisposition is due to the fact that daughters are much more liable to inherit the mental and physical characteristics and defects of their fathers, while sons inherit similarly from their mothers; and for obvious reasons fathers are much more liable than mothers to transmit the degenerations and diseased tendencies which originate in alcoholic indulgence. In females, too, the tendency is to the development of a more active form of insanity or mebrity; and the probabilities of recovery are correspondingly better. In males there is a relatively greater tendency to the development of degenerative forms of disease. This is probably due to the fact that when mental and physical characteristics are derived by males from the father, the mental equilibrium and physical vigor are not as uniformly maintained as when these characteristics are derived from the mother, and hence the probability of a degenerative brain change is increased if the father is an inebriate. The same is also true of females where a neurosis is derived from an inebriate mother whose characteristics they inherit.—*Dr. Hurd, in The Physician and Surgeon.*

INEBRIETY CAUSING CIRRHOSIS OF THE LIVER.

In the excessive use of alcohol the liver is the first organ to suffer, because the alcohol reaches it immediately after its absorption in a comparatively unaltered state, and diluted only by the secretions of the stomach. Acting as an irritant, if long continued, it soon excites an overgrowth of the connective tissue along the ramifications of the portal vein. The first products a round-celled embryonic tissue, by the pressure of which the bulk of the liver is actually increased, but organizing into fibrillated connective tissue, it has the property of all such newly formed tissue; it contracts and compresses the proper parenchyma of the organ—that is the cells—and destroys them. When the cirrhelets formed by the smaller branches of the portal vein are involved, the areas included in them are compressed and forced to rise upward, forming gram-like elevations, whence the term granular liver. When the branches of medium size are involved, larger areas of liver substance are compressed, and elevations, of which many correspond in size to the hob-nail, are produced, and these results are the so-called hob-nail liver, and when still larger branches of the portal vein are involved, we have even larger bulging areas, and a lobulated appearance results.—*Dr. Lyson, in Medical Times.*

DIPSOMANIA.

According to Prof. Ball of Paris, the dipsomaniac is never an habitual drunkard. He always has free intervals of sobriety, and intelligent consciousness of himself and surroundings. This state is most frequently inherited, and yet it comes from many distinct causes. Often it is preceded by states of melancholy, suicidal impulses, eccentricity, and great irritability of thought and action. Sometimes morbid fears, depressions, and delusions are the forerunners of this form of insanity. Many curious phases appear during the parox-

FACTS OF ALCOHOL

The least toxic of all alcohols is ethyl alcohol from vinous fermentation, the most toxic is the amyl alcohol (potato spirit—fusil oil). The toxic phenomena of these alcohols may be divided into three periods: A period of ebriety or of excitation, a period of resolution, and a period of collapse. These periods undergo modifications depending on the nature of the alcohol employed, the dose administered, and the resistance of the subject. In alcohols obtained by fermentation these three periods of intoxication succeed each other in regular order, but in proportion as you depart from the ethyl series their character is more accentuated, their evolution more rapid, and certain convulsive phenomena appear. With methyl alcohol (wood spirit) the period of excitement is more intense, resolution collapses, and the toxic symptoms which follow more rapid in their action, and when the dose is not sufficient to kill the phenomena disappear more promptly. Alcohol from glycerine causes a rapid increase of temperature. When ethyl alcohol was given regularly for a long time, prolonged somnolence without any excitement followed. When absinthe was added great irritability and excitement followed.—*Leuret*.

DISEASE OF INEBRIETY

There are certain persons who seem impelled to drink, as others are impelled to murder or suicide. The impulse is so strong that they are rendered entirely unfit to take care of themselves or their affairs. If left to themselves they would drink continuously till they reach delirium tremens or alcoholic paralysis. Closely studied, we find them to be people who, from congenital or acquired weakness of mind, are unable to exercise any self-control, and are practically of unsound mind. They may have suffered from blows on the head, previous attacks of insanity, or they may have by inheritance an insane neurosis. They probably desire to

Clinical Notes and Comments

ysm. In one case the effect of alcohol is most pleasing, or most unpleasant, but he has no control over it. He may drink openly and associate with the lowest company, or be very sensitive and hide himself away among strangers. Anything is used that has spirits, no matter what it may be. Dipsomania has been noticed in the author's experience among women, as the direct result of excessive menstruation, over-excitement, sunstroke, excesses, and great physical exertions. Esquirol confounded these cases with periodical insanity. Often they may be mistaken for dementia paralytica, which begins in this way. In our observation the dipsomaniac is more positively insane during the period of his drink impulse, than in any other form of mental aberration.

HEREDITY

Mania or delusion pronounced in one ancestor, and the other subject to nervous disease, will appear in the descendant in all forms of intellectual degenerations, from weakness of mind to idiocy. Convulsive disease of the brain or nerves in one ancestor, and the other of weak or feeble will, power, will develop inebriety, melancholy, and other disorders with prominent psychical troubles in the descendants.

Inebriety in one ancestor, and nerve disease in the other, is followed by epilepsy and various phases of convulsive diseases in the ancestor. A person whose ancestors have suffered from any form of insanity or epilepsy will have a change of disease from the abuse of alcohol. Varied forms of delirium and aberrations will follow. Complex psychical and physical disturbances will appear; moral insanities and perversions which are always obscure are seen. In all these cases associated with inebriety, there are certain fixed laws dimly seen at present, which seem to determine the form and nature of the disorder. A further study will enable us to predict from certain conditions results which will follow as positively as day follows night.

place themselves under control and will voluntarily enter an asylum if it be possible. Here the drinking is most frequently the result of insanity, which is, however, aggravated by the perpetual alcoholization.—*Dr. Blanford, in Lectures on Insanity.*

ACUTE DISEASES FOLLOWING INEBRIETY.

In a clinical lecture delivered at the Philadelphia Hospital by Dr. Pepper, reported in the *Medical Times*, are the following remarks: The case was that of an inebriate admitted for pleurisy, and failure of the heart, with delirium, followed by death. He says: "Inebriates are exposed to great dangers from the supervention of any acute disease, or the occurrence of any injury or accident. A man who has healthy habits, and is accustomed to live moderately, will bear the most serious accidents and violent acute diseases, react against them, and throw them off; but a man who has saturated himself with alcohol, whose nervous system has lost all proper reactionary tone, and whose tissues are degenerated by the alcohol in the blood, no sooner gets an acute disease or receives an injury, than there is great danger of his succumbing to it.

The kidneys of an inebriate are always over-taxed, so that the least additional strain will often cause a failure of function. The blood is not depurated, and other secondary results come on. Delirium occurs frequently, and probably has its roots in the nervous system, which is in a state of habitual irritation and exhaustion. This is true of the motor, emotional, and mental functions. Any disease or injury coming on such a one is apt to lead to irregular nervous action and delirium.

The condition of the kidneys gives a hint of the way in which delirium comes on. Often it is of a uræmic character, from defective kidney action, defective depuration of the blood and retention of poisonous matter in that fluid. This is followed by delirium of an ataxic character. Hence we have two forms of delirium seen in inebriates, one from

irritation and exhaustion of the nerve centers, the other from retained poisonous matter in the blood. The treatment must to a large extent be governed by the diagnosis of this condition.

Fatty degeneration and failure of the heart's action presents serious complications in the case. Often the fibre of the heart has undergone degeneration and when a strain comes, failure and a state of paresis follows, with secondary trouble from engorgement of the lungs. The congestion of the lungs brings additional labor of the heart, and more exhaustion, and failure of all the nerve energies. These will be found two forms of delirium tremens which should be recognized in practice. In one, symptoms of violent nervous excitement with the preservation of a good deal of muscular strength, occurring acutely in a man of comparative health, who has been using stimulants freely. It comes on after a violent debauch, where the man has been drinking to excess, and taking little food, and where he stops all use of spirits suddenly. In the second form, the man has been drinking longer, and has become exhausted from over-stimulation, and the powerful reflex irritation conveyed to the brain from the inflamed mucus membranes. The liver and kidneys are disordered, and all their functions are perverted, and a condition of profound debility is present. In this form of delirium the mind is filled with delusions and hallucinations of the most distressing character, attended with muscular trembling, which lasts a long time. In the treatment the doctor advises isolation of the patient in surroundings where rest, quiet, good food, and constant care can be given. He would give the usual sedatives, such as chloral, bromides, and occasionally alcohol. He thinks pilocarpin and laborandi valuable in many cases, and would add morphia to lessen the profound irritation.

Practical experience fails to sustain the doctor's views of alcohol in these cases. The London hospital, where a large number of the worst forms of delirium tremens are constantly treated, does not use any form of spirits, and the results are more favorable than elsewhere.

—average time one week—the extent of its giving, both amount and duration, depending entirely on the peculiarities of each case before and during treatment.

Hot baths, 110° to 112°, are the most efficient agent at command to relieve and remove the peculiar restlessness which is an invariable sequel of opiate abandonment. They are given often as regulated, ten to twenty minutes duration. Their efficacy is sometimes enhanced by a short douche or shower.

Electricity is used as a tonic and sedative. The galvanic current we often employ at the outset, and, after abandonment, find it useful as a general restorative and remover of local pains. For the muscular debility following withdrawal, nothing, in our experience, equals general faradization—ten to twenty minute seances daily. The sense of exhilarating comfort resulting is often very decided. Occasionally it is used twice, daily, and, very exceptionally, it is not at all acceptable.

Atropia is used in initial doses of $\frac{1}{15}$ gr., hypodermically per diem—or its equivalent by the mouth—and pushed until it produces systemic effects—dry throat and disturbed vision. This has never required a dose exceeding $\frac{1}{10}$ of a grain.

Strychnia is given in subcutaneous doses of $\frac{1}{30}$ of a gr., thrice daily, and continued, in some form, throughout treatment.

Hyoscyama, in our experience, has proven itself the nearest approach to morphia of any alkaloid yet presented. We use Merck's *amorphous*, in the dose of $\frac{1}{4}$ gr. hypodermically, and have known it, repeatedly, to produce steady sleep of several hours duration.

Gradual decrease has its advocates, and sometimes its advantages. It is the plan pursued by the charlatans, who find in the peculiar, secretive character of this disorder a fertile field. It is a mistake to assert, as does Howe, that "tapering off will not effect a cure." It often succeeds, but, oftener fails, unless ureter close and constant professional observation. Its great disadvantage is, that prolonged decrease tries the patience to such an extent that it is sooner or later abandoned, patient lacking both time and inclination for its continuance.—*Dr. Mattison, in Proceedings.*

Vol. V.—15

TREATMENT OF OPIUM INEBRIETY

The therapeutics of these cases included bromide of sodium, hot baths, electricity—both galvanic and faradic current, atropia, strychnia, hyoscyama, opimia, chloral, coca, camphor, turpentine, Jamaica ginger, varied tonics, full feeding, and cheerful surroundings.

To note these in detail requires some preliminary reference to the morbid condition they are intended to relieve. The symptomatology of opium abandonment, in our opinion, relates to an exalted activity of the spinal cord manifested in varied reflex irritations. To this are attributable the aches, pains, vomiting, purging, collapse and horrible discomfort, in general, which follow entire and abrupt withdrawal of a long accustomed opiate. If this be correct, it is also correct to assert that any drug able to control this over-action must prove potent for good in treatment. Such we have in the bromides. Their power to subdue reflex irritation is known to all, and in no disorder is this more happily proven than in the one to which we refer.

A special and original application of this power is what we term preliminary sedation, which consists in the giving of the bromide for a time prior to entire opiate withdrawal—meanwhile gradually reducing the accustomed narcotic—so that at the time of maximum spinal irritation we have maximum bromide sedation, and the one counteracts and controls the other.

We use, extensively, bromide of sodium. It has two leading advantages. Saving bromide of lithium, it contains the largest proportion of bromine, which is the active factor, and it is less unpleasant than any other, never, in our experience, causing gastric trouble. Minor points in its favor are, lessened tendency to digestive and muscular impairment, and cutaneous irritation.

We use it in full doses—60 grains, increased to 100 or 120—in eight ounces of water, twice, daily, at twelve-hour intervals, and continue it from five to ten days, or even longer

HEREDITY IN CRIME AND INEBRIETY.

The following instance has come to light at Taunton, Mass. in a trial for burglary where one of the criminals turned State's evidence, whose ancestral history runs as follows: Two hundred years ago or more, a noted pirate abandoned the sea, and settled in the neighborhood of Boston. A numerous progeny came after him, all more or less criminal and drunken. In the third generation from the pirate, there were sixteen inebriates, in the fourth generation in the direct line twenty six members were punished for various offences against law and order, mostly for theft and forgery. In the fifth generation came the notorious Malborne Briggs, who at one time, was in State Prison, with seven of his sons, for various offenses. The sixth and seventh generations furnished a scattering crowd of criminals and inebriates, whose records are found in every penal institution in the State. The last representative, who turned State's evidence, seemed to have no consciousness of right or wrong, or moral responsibility, although possessed of considerable genius.

This remarkable lineage is a striking illustration of the laws of heredity, which have yet to be studied before we can understand them thoroughly.

The Home for Inebriates, in Calcutta, India, under the care of Miss Leslie, is creating unusual interest among missionaries and others. In a recent report it is mentioned that a large number of persons under treatment have been permanently restored. Active steps are being taken to enlarge its sphere of action.

Dr. Lewis D. Mason, the well known attending Physician of the Inebriates' Home at Fort Hamilton, N. Y., was lately elected honorary member of the Belgian Society of Mental Medicine. This is a deserved compliment for one of our most industrious and original workers.

B KEITH & CO.

PREPARED ONLY

Pure Concentrated Medicines,

The Combined Active Principles of Medicinal Plants.

CONCENTRATED TINCTURES, OILS, ETC.

So called tonics are in the market, which do little or no good, and are made by triturating extracts with inert matter, so that the

What are Concentrated Tinctures?

They are made from the crude principle, from which the active principle is obtained, and is in a state of purity, and in a small amount of the appropriate solvent, so that the only action that enters CONCENTRATED TINCTURES, by this method, are those of the active principle.

Physicians ordering these Tinctures from the Trade will therefore perceive the necessity of designating them as KEITH'S in their orders.

A NEW REMEDY.

CON. TINC. AVENA SATIVA,

(FROM COMMON GRASS.)

Its Properties are as follows:

NERV. STIMULANT, TONIC, CATHARTIC, ETC.

IS EMPLOYED IN THE TREATMENT OF

Paralysis, Epilepsy, St. Virus Dance,

ALCOHOLISM,

THE MORPHIA OR OPIUM HABIT,

Defective or Deficient Menstruation,

*(From *Moravia Delicia* or *Stictis*, a portion of the *Sida*.)*

COLDNESS OF THE EXTREMITIES, WEAKNESS, NERVE EXHAUSTION DUE TO OVERWORK, FEVER, LOSS OF GENERAL CRAMPS, CONSTIPATION, AND IN THE CONVALESCENT STAGES OF ALL ACUTE DISEASES.

For full description of this remedy, with Certificate from the Hon. Dr. J. H. B. Mason, of the Home for Inebriates, see the *Journal of Inebriety*, Vol. I, No. 1, p. 12. Also *Journal of Inebriety*, Vol. I, No. 2, p. 12. Also *Journal of Inebriety*, Vol. I, No. 3, p. 12.

B. KEITH & CO.,

No. 41 Liberty Street, New York.

WALNUT LODGE, HARTFORD, CONN.

For the special medical care and treatment of the insane... Home for the insane... Private treatment of the insane...

PRIVATE TREATMENT OF OPIUM HABITUALS.

By J. D. CROFTERS, M.D., HARTFORD, CONN. The private treatment of opium habituals... Methods of treatment... Results...

THE PRIVATE INSTITUTION FOR THE WEAKEST MINDED YOUTH.

AT BARRE, MASS. OFFERS TO parents and guardians superior facilities for the education and improvement of their children...

LONG ISLAND COLLEGE HOSPITAL, BROOKLYN, N. Y.

OFFICE OF THE SUPERINTENDENT OF THE HOSPITAL... OFFICE OF THE SURGEON GENERAL... OFFICE OF THE CLERK...

THE COST OF ADVERTISING.

It is a common error to suppose that the cost of advertising is... The cost of advertising is not the same for all newspapers... It depends on the circulation and the position of the advertisement...

G. P. ROWELL & CO., Newspaper Advertising Bureau.

Printing House Square, opp. Tribune Building, 10 Spruce St., New York

Private Homes for Mental and Habit Cases.

Physicians who are consulted regarding mental cases... Private homes for mental and habit cases... Locations: Hartford, Conn. and Philadelphia.

ALFRED T. LIVINGSTON, M.D., 727 Pine St., Philadelphia.

EU R H K A

BURR'S INDEX TO MEDICAL SUBJECTS, PHYSICIANS & SURGEONS.

Particular References to Matters Found in Text Books, Medical Treatises, Reports, Reviews, Journals, etc., and in the Names of PRACTICAL DISEASES, OF LOCALITIES, OF CLIMATES, OF MODES OF LIFE, OF OCCUPATIONS, ETC., IN SHORT, FOR THE PRESENTATION OF MEMORANDA CONCERNING WHATEVER THE Physician wishes to fix in mind, or lay by for Ready Reference.

THE PATENT, INSTANTANEOUS-REFERENCE, MARGINAL THUMB-HOLE CUTS, Physician and Surgeon.

AN INDEX TO INFORMATION FOR IMMEDIATE OR FUTURE USE

AS words and names are placed by the first two letters, with nearly three hundred combining letters cut in Thumb Holes, the edges of the leaves. Opened at any combination by the use of one hand.

It has a combination for every word in the English language.

CONVENIENT, SAVES TIME, LABOR, MONEY, AND VEGETATION.

Bound in Half Russia, Black and Goggles; Quarto, Size 5 1/2 x 8 inches, 12,000 Lines, Price \$3.75. Cloth, Size 5 1/2 x 8 inches, 12,000 Lines, Price \$2.75. Bound in Full Sheep, 7 1/2 x 10 inches, 12,000 Lines, Price \$4.75. Russia Ends and Bands, 7 1/2 x 10 inches, 12,000 Lines, Price \$3.75.

For One Month, we will furnish the MEDICAL INDEXES bound in Half Russia, cloth covers, with the A. B. C. Index, in Great Letters, on Morocco Leather, (Red and Black alternate) bound over the back of the Leaf, which affords a double protection.

For full particulars address the publishers.

THE J. B. BURR PUBLISHING CO., Hartford, Conn.

FELLOWS' HYPO-PHOS-PHITES.

(See: Hypophos. Comp. Enclaves.)

Contains The Essential Elements to the Animal Organization—Potash and Lime;

The Oxidizing Agents—Iron and Manganese;

The Tonics—Quinine and Strychnine;

And the Vitalizing Constituent—Phosphorus.

Combined in the form of a syrup, with *slight alkaline reaction*.

It Differs in Effect from all Others, being pleasant to taste, acceptable to the stomach, and harmless under prolonged use.

It has Sustained a High Reputation in America and England for efficiency in the treatment of Pulmonary Tuberculosis, Chronic Bronchitis, and other affections of the respiratory organs, and is employed also in various nervous and debilitating diseases with success.

Its Curative Properties are largely attributable to Stimulant, Tonic, and Nutritive qualities, whereby the various organic functions are recruited.

In Cases where invigorating constitutional treatment is applied, and tonic treatment is desirable, this preparation will be found to act with safety and satisfaction.

Its Action is Prompt; stimulating the appetite and the digestion, it promotes assimilation, and enters directly into the circulation with the food products.

The Prescribed Dose produces a feeling of buoyancy, removing depression or melancholy, and hence is of great value in the treatment of MENTAL AND NERVOUS AFFECTIONS.

From its exerting a double tonic effect and influencing a healthy flow of the secretions, its use is indicated in a wide range of diseases.

Each Bottle of Fellows' Hypophosphites contains 128 Doses.

PREPARED BY

JAMES I. FELLOWS, CHEMIST,
48 VESEY STREET, NEW YORK.

CIRCULARS AND SAMPLES SENT TO PHYSICIANS ON APPLICATION.

SPECIAL TO PHYSICIANS.—ONE large bottle containing 15 oz. (which usually sells for \$1.50) will be sent upon receipt of Fifty Cents with the application. This will afford an opportunity for a thorough test in chronic cases of Debility and Nervousness. Express charges prepaid upon all samples.

FOR SALE BY ALL DRUGGISTS.

DR. HUBBARD will receive for professional treatment persons suffering from the use of

ALCOHOL, OPIUM, OR CHLORAL.

Patients receive all the comforts of a home, combined with fresh air, beautiful scenery, fishing, boating, etc.

TERMS MODERATE.

BILLERICA

is beautifully situated on the Concord River, and on the Boston & Lowell R.R., 18 miles from Boston.

For further particulars, address

W. A. HUBBARD, A.B., M.D.,

BILLERICA, Middlesex County, MASS.

RIVERSIDE RETREAT,

PAINESVILLE, OHIO.

For the treatment of nervous and mental diseases, and those addicted to the Opium and Alcohol habit. Location for health and beauty unsurpassed; 30 miles east of Cleveland, on the shore of Lake Erie, at the mouth of Grand River. Years of experience, personal supervision, trained nurses, and ample appliances are the secret of our success.

For particulars, address

JOHN S. MARSHALL, M.D.

CHARLES F. HOUSE, M.D.

THE REMEDIAL TREATMENT OF INTEMPERATES.

* BY NORMAN KERR, M.D., F.R.S.

Scarcely a week passes during which I do not receive, either from a clergyman, a Christian worker or some broken-hearted relative of the victim, a request of this kind:—"A. B. is drinking himself to death. His wife and family are neglected, and he is dissipating his fortune in drink. Pray send me a prescription for some medicine, as I feel sure you can, to give him a distaste for his destroyer." I quote the frequent, piteous, and despairing cry, simply in proof of the utter and widespread ignorance, even among educated and intelligent Christian people, of the true nature of habitual drunkenness.

Drunkenness, occasional and habitual, is the inevitable outcome of our national habit of drinking intoxicating liquors. Their leading component—that for which we drink these beverages, the alcohol they contain—is a prompt and potent irritant narcotic poison. It is in virtue of an immutable natural law that the general use of so powerful a neurotic poison, which irritates the vital organs, destroys the mental balance, and inflames the passions, induces all the varied phenomena of intoxication in a certain number of the drinkers. It is not more certain that in a given number of lives in an insurance office some tolerably known proportion will die every year, than that in a given number of persons drinking our intoxicating liquors, some proportion will annually drink themselves into drunkenness, disease, and prematurely.

* Honorary Secretary to the Habitual Drinkards' Legislation Society; and to the Dairy-able Home for Intemperates; Foreign Corresponding Secretary, and Honorary Member of, the American Association for the Cure of Intemperance.

...a... ..

... ..

... ..

... ..

the symptoms and results of his disease, just as emptions and fever, etc., are results and symptoms of small-pox. Remove the disease, the cause, and the effects will disappear. I might go on to show how much labor, life, and riches are lost to the State by thus dealing with the inmate; but I feel confident that intelligent people who will give the matter sufficient consideration will conclude with me that there can be no cure for the inmate by degrading him in prison. The result of the treatment in the Washington Home in Boston ought to be sufficient to open the eyes of those in authority, and in fact of every citizen, and cause the erection of similar institutions throughout the State. I can point to judges sitting on the bench, to respected and beloved pastors of congregations, to lawyers, doctors, and to thousands of honest, upright, respectable citizens, who were permanently cured in this Home after they were given over as lost by their most intimate friends, and many of them after having lost all hope for themselves, because of the harsh treatment which they suffered under our laws.

Inebriety, like malaria, is certain to follow the germ causes and favorable soil for development. No will power or training that fails to recognize this fact can prevent it. Given the conditions and exciting causes, and inebriety may be predicted as surely as the transit of a planet. The movements of nature's laws are the same here as elsewhere; fixed and eternal in their ceaseless rounds.

Whenever a man or woman persists in using alcohol to excess, in defiance of all social and natural laws of health, society, and common sense, the conclusions are inevitable that such persons are diseased and imbecile. They possess a defective mental organization, and are more or less irresponsible because of this abnormal state. They are not fit to live in society and should be protected from society and themselves.—SIR THOMAS WATSON.

Scarcely a
 ether from a
 hearted relation
 as drinking his
 located, and he
 me a prescription
 to give him;
 quent, precaution
 utter and wise
 intelligent Ch
 drunkenness.
 Drunkenness
 outcome of or
 ners. Their
 these beverage
 potent irritant
 able natural
 rone poison, a
 mental balance
 varied phenomenon
 drinkers. It is
 lives in an insu
 will die every
 drinking out in
 ally drink them
 * Honorary Secy
 the Dairymilk Com
 Honorary Member o

THE R.M.

ture death. Many of these—happily they are in a minority, though their numbers are appalling—are so physically susceptible to alcohol that, once tamper with it, they are humanly speaking, lost. Their nervous organization is so defective, or the transmitted taint is so strongly implanted in them, that they are unable to arrest the natural development of the characteristic poisonous effect of alcohol on the brain and the will. Their only power of control is over the very beginning of the habit of drinking.

The nature of the poison is always the same. A tendency to produce their characteristic poisonous effect intractable from intoxicating drinks. Alcohol, no more than arsenic or opium, is a respecter of persons. Just as, by the operation of an unchangeable law of nature, will an adequate dose of strychnia kill a Christian as quickly as a heathen, and an opiate draught make an archbishop as sleepy as it will make a costermonger, so, in like manner will the poison, alcohol, by its irritating properties inflame the body, and by its narcotic properties cloud the mind of a good man as of a bad man. No person, no profession, no rank is exempt from the working of this law. The most select circles of the educated, the loftiest positions in the state and high places in the church, have all contributed their quota to the mighty host of the inebriate. Some of the worst cases of habitual inebriety with which I have had to deal have been clergymen and doctors.

Inebriety has a physical origin. Its signs are part of a group of symptoms characteristic of poisoning by alcohol; and its primary cause is a constitutional susceptibility to be affected by the poison. True it is that from pure wantonness it sometimes enters into the heart of man to take to excessive drinking; but the cases in which the first glass is drunk with the deliberate purpose of becoming a drunkard, are very rare indeed. Inebriates, male and female, have, as a rule, never intended to become such. They had no fears for their safety when they set out on their alcoholic voyage, and it has generally been only after repeated attempts to escape that

they have
sea of
There
another
a few
tendency
drink at
impossible
inmate
drinking
will that
These
Beside
which
predispos
ing cause
many year
expected
excite his
he enters
and temper
to be at
brain give
of inebri
general al
craving to
a drunken
tion where
days, till
clergyman
mind. And
a brief sp
being to k
given, he
gested live
brain, and
The offence
Vol. V.