oxysms, but iterated, keeping on ; never urgent, yet not passing half a minute without occurring ; feeble, with a certain throat-hoarseness about it, having rather a choking character, and with no expectoration as its result. When I say *no* expectoration, I should say there *was* no expectoration ; but a little is now appearing.

[*To be continued.*]

Clinical Lecture

ON THE

TREATMENT OF RHEUMATIC FEVER,

AND OF THE USE OF ALCOHOL IN SERIOUS CASES OF THIS DISEASE.

DELIVERED AT KING'S COLLEGE HOSPITAL,
WINTER SESSION, 1861-62.

BY

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Complicated Cases of Rheumatic Fever. Two Classes of Cases.

CASE II. *A boy aged 16. Joint affection. Pericarditis with effusion. Slight pneumonia. Pulse 132 ; respiration 72. TREATMENT as in Case I, but less opium was given, and only four ounces of brandy in twenty-four hours. Convalescence a fortnight after the disease was at its worst.*

General remarks on the treatment pursued. On the propriety of giving stimulants in cases of acute rheumatism.

[*Concluded from page 83.*]

LET me now ask your attention while I give a very brief outline of another case of the same malady, in which the same plan of treatment was carried out ; but, as the patient was much stronger, it was only necessary to give small quantities of brandy.

CASE II. The patient is a boy of the name of Alfred Davies, in No. VII Ward (vol. iv, p. 36). He is 15 years of age ; and, as far as the morbid processes are concerned, he was in much the same state as the case I have already adverted to. There was joint-affection, with loud to-and-fro rubbing sound over the heart, followed by effusion in the pericardium. There was some extent of pulmonary affection.

Two days after admission, the pulse was 132, and the respiration 72. The same plan of treatment was pursued as in the case of the girl ; but it was not necessary to give so much opium ; and as the powers of the patient were good, as his voice was strong, as he could move about in bed, and sit up, and as his pulse, though quick, was strong, no alcohol whatever was given for the first nine days ; but then his strength began to fail ; the pulse was still as high as 128, and much weaker ; so that I thought it desirable to give him small quantities of stimulant.

From the 2nd (the day he was admitted) to the 9th November, the pulse had varied slightly in frequency from day to day ; but the lowest was 104, and the highest 132.

On Nov. 10, the pulse was weak, 128 ; and he was ordered to take four ounces of brandy in the twenty-four hours.

On Nov. 11, it was 124 ; on the 13th, 104 ; and by the 19th, it had fallen to 96.

On Nov. 21st, a further diminution in frequency had occurred, and the brandy was reduced. A manifest and rapid improvement in the condition of the patient accompanied the diminution in frequency of the pulse.

A gradual diminution in the frequency of the pulse, and an increase in its power, were observed for the four days succeeding that on which he commenced taking four ounces of brandy.

By Nov. 26, he was able to resume ordinary diet, and was convalescent. The rubbing sound and the pericardiac dulness gradually diminished, and a systolic mitral bruit became audible. His strength gradually improved, and he left the hospital on December 14, just one month from the time when the disease was at the worst.

The essential nature of the morbid changes in the two cases I have brought under your notice in this lecture was the same. In each there was pericarditis, followed by regurgitant mitral bruit. The general plan of treatment was the same ; but, as the exhaustion was far greater in the first case than in the second, it was necessary to give a much larger quantity of alcohol, and keep it up for a longer time. In the latter case, a marked improvement was observable in the patient's state very soon after he was put upon four ounces of brandy in the twenty-four hours ; for from this time the pulse steadily diminished in frequency (from 128 to 96) and increased in power.

General Remarks on the Treatment Pursued. I hope I have succeeded in my effort to explain clearly the principles which have guided me in the treatment of these cases. I did not attempt to treat the disease ; but endeavoured to ascertain precisely in what way a fatal result was likely to occur ; and did all I could to avert it or postpone it. I have not cured the malady ; but I think we have been the means of keeping the first patient alive while the disease passed off. From the observations of others, and from having watched the course of many cases myself, I knew that the absorption of fluid and lymph in the pleura or pericardium could not take place very rapidly, and I knew that if the effusion increased beyond a certain point death must result. No treatment could possibly produce any sudden alteration in the morbid conditions which tended to kill the patient.

If we had concentrated our attention solely on the special disease ; if we had considered only what should be done for the pneumonia, for the pericarditis, for the rheumatic state, the patient might have died from prostration. She might have succumbed to the depressing effects resulting from the morbid condition. True, if we could remove the cause of the prostration, it would be better than relieving the last by artificial stimulus ; but we cannot remove the cause. We know that the disease must disappear slowly ; we know that when the case is fatal we lose the patient more commonly from exhaustion than from disease. Now, in alcohol we have a remedy which, of all others, acts rapidly on the flagging powers of a patient worn-out by disease. It does not increase inflammation. It cannot increase the tendency to formation of lymph. By restoring the powers, it undoubtedly tends to diminish the tendency to effusion. Alcohol is not an *antidote*. It does not destroy a poison in the system ; neither does it combine with one and render it inert.

I have given you the history of but two cases,

gentlemen; but many of you have seen the same phenomena in others. During the early part of the spring of this year, I was attending a child of seven years of age, with precisely the same symptoms. The disease ran a similar course, and the treatment was, in all respects, the same, with the exception that less opium was given. The illness in this case was much more protracted, and the exhaustion was greater. It was necessary to keep up the stimulant for a much longer period. The child had a narrow escape, but is now in good health; although a loud mitral *bruit* affords evidence of the serious damage which the heart has sustained.

On the Propriety of giving Stimulants in Acute Rheumatism. You must judge as to the propriety of giving or withholding stimulants from the general state of the patient, according to the same principles which enable you to decide as to the quantity and nature of the nourishment required. If you decide upon giving stimulants, you will determine the quantity after considering the strength of the pulse and heart's action and the condition of the nervous system. In some cases, you need not give any, and in others will give only very small quantities; but there are cases which seem almost hopeless, that may be saved by the timely administration of small doses very frequently repeated; so that within two or three days, although a patient may have taken as many bottles of brandy, not the slightest indication of alcoholism has been produced.

Practically, it is of great importance to regulate the quantity of alcohol according to the requirements of the system, and to administer it in small doses at regular intervals, so as to support the failing powers from hour to hour. No greater mistake could be made than to attempt to act upon any arbitrary rules in the use of this most valuable remedy. For instance, to regard alcohol as a necessary remedy to be employed, and to be depended upon, in every case of rheumatic fever or any other disease, would be as grave an error as to refuse to give it in any case. There are cases of acute rheumatism which will get well without a drop of alcohol. There are cases of the same malady in which it would be very wrong to give alcohol—at least, during the earlier period of the attack; and there are cases which I believe can be saved by this remedy alone. It is possible that alcohol, by its action on the blood and nervous system, may, in certain cases, tend indirectly to increase the tendency to what we term the inflammatory conditions; but it is quite certain that, in other cases, it diminishes the tendency to these changes; and it is beyond dispute that inflammation of some of the most important organs of the body will resolve, and the effused products be absorbed, while the patient is taking from ten to twenty ounces of brandy in the twenty-four hours. It is also true that the absorption of inflammatory products is carried on quite as rapidly in a low condition of the system under the influence of alcohol, as in a strong one in which not a drop of alcohol is given. Alcohol does not prevent the healing of wounds; but there are states of the system where repair does not take place until alcohol has been given to the patient.

The question as to whether alcohol should be given or withheld in a case is generally determined, not by the fact of the presence or absence of any special morbid process, but by the patient's powers at the

time; and in a case where alcohol is given, the proportion is determined by the degree of exhaustion. If the strength has diminished very rapidly, you would, from the first, give more than if the powers had been slowly failing. If the pulse diminished in frequency and increased in power after a few doses, you may be sure you are giving the right quantity. If the alcohol seems to produce little or no change you must give more. But if you watch a few cases from day to day, you will be more convinced of the great importance of studying the effects of this remedy in exhausting disease than from anything I can say on the matter.

Original Communications.

ON INFLAMMATION: ESPECIALLY ON PNEUMONIA.

By EDWARD COPEMAN, M.D., Norwich.

[Read before the Norfolk and Norwich Pathological Society.]

THE age we live in is a wonderful age; a period in which such rapid strides have been made in all the arts and sciences as almost to confound man's understanding. Even during the lives of many here, great changes have taken place in almost everything around us. The art of war is entirely different from what it was in the days of our youth; and in chemistry, the names familiar to us in our pupillage are supplanted by others, which are as Hebrew to those who have not continued the study of that science. This tendency to rapid progress has shown itself in our own profession also, and we are every now and then startled almost out of our propriety by the introduction of theories and opinions which well nigh upset the fixed rules and principles of our professional life. I shall not trouble you with any lengthened disquisition as to these circumstances; but it may be well to remark that it does not follow that every alteration is an improvement, or that every new theory is true. It may be right after all to employ antiphlogistic remedies in acute diseases, instead of trusting to brandy. It may be better to amputate a limb affected with synovial disease than merely to excise the diseased joint. It may prove true that the first sound of the heart is synchronous with the contraction of the ventricle, and the second coincident with and caused by the closing of the aortic valves; in which case we shall not have to unlearn all we have hitherto been taught upon the subject, and unsettle all our landmarks for the diagnosis of diseases of the heart. We must, after all, view with a certain degree of distrust all novel theories which materially entrench upon previously well recognised facts; although I would by no means refuse them a fair and unprejudiced examination, for generally, no doubt, something at least that is useful may be sifted out of them.

Inflammation is one of the principal subjects concerning which new views and novel modes of treatment are adopted. Nevertheless, more than half a century ago, John Hunter expressed many of the opinions we now hear, and I question whether we at the present time understand the subject better than he did. He said "we have much less occasion for evacuations in inflammations than there was formerly, the lancet therefore in inflammation, and also purgatives, are much more laid aside." Again, "we may be said to live above *par*, at the full stretch of living, therefore, when disease attacks us, our powers cannot be excited further, and we sink, so as to require being supported and kept up to that mode of life to which we have been accustomed." And again, "in inflammation when the constitution is strong then it will be commonly the most manageable, for strength