

persisting in spite of various remedies. The temperature in the morning was  $103^{\circ}$  F., and occasionally  $102^{\circ}$ , in the axilla, but for nearly a week the temperature remained at  $104.8^{\circ}$ . As there had been no marked exacerbations in the temperature, we looked upon it as a case of grave character, on account of the sustained fever. With reference to the intestinal lesions, as manifested at least by the occurrence of symptoms of bowel disorder, they were not severe: he had only three or four stools a day. The eruption was well defined, but there is nothing in the case to which I wish to call your attention besides the temperature record.

Let us see his present condition. His temperature this morning is  $100\frac{1}{2}^{\circ}$ ; last night it was  $101\frac{1}{2}^{\circ}$ . I, therefore, think that the disease is yielding. The bowels have not been opened for thirty-six hours, and tend to constipation. He is very deaf, but obeys intelligently when I can make him hear. His tongue is moderately dry and slightly fissured; it is tremulously protruded. I want you to observe this cracked, dry condition, with the yellowish coating upon it; though it is not very dry, it still impresses you as a dry tongue. His abdomen is rather prominent and tender; a few spots of eruption are still visible upon the surface. There has been some atony of the bladder, so that the urine has had to be frequently drawn with the catheter. Examining his heart, I notice that there is almost complete extinction of the first sound; it can just barely be heard. The pulse beats only one hundred in the minute, even with the excitement of coming before you; but, as I see upon the record, it has never been a rapid pulse. It is compressible, but has decidedly more volume than it had a few days since. His general condition is improving with the reduction in the temperature. He has been taking dilute muriatic acid (gtt. v) and turpentine (℥ x) every two hours. He also takes twelve grains of quinine daily; and six ounces of wine and six of whiskey: therefore he is freely stimulated. His food consists of milk and beef tea, two pints of each in the twenty-four hours.

Now I have given you a statement of his treatment, with a single exception, and that is what I wish to develop in our discussion, viz.: the treatment of the high temperature. When I found that this man had, a week ago, an evening temperature remaining persistently at  $104^{\circ}$ , I tried to reduce it by large doses of quinine, sixteen grains daily; and on one day he took ten grains morning and evening. He was also frequently sponged with cold water. The effect was but slight; the temperature remained high. I then directed that cloths wrung out of ice water should be laid upon the abdomen until the desired result was obtained. It was found that this was more efficient, and the temperature was at once reduced to  $100^{\circ}$ , so that by this means we were enabled to keep the temperature within bounds, and thus to gain time. We discussed the

expediency of putting him in a bath, but, as he was very weak, and the bath room is some distance from his bed, rather than subject him to the risks of so much handling, we yielded the point, though, if the bath had been more convenient, I would have preferred it. I wish to call your attention especially to the use of ice water applications to reduce temperature, as a substitute for the large doses of quinine, and cold baths, which are not always convenient. It is a most instructive case. Indeed, I consider that the man's life has been saved by this means. Taking into consideration the rising temperature and the failing circulation, as shown by the impaired heart sounds, it did seem likely that the case would not get well. I would call your attention to the fact that in this case the quinine failed to reduce the temperature. It does not often fail, but it did here.

Another point is this deafness which you have observed. I almost had to shout to him before he put his tongue out. The resident physician tells me that he has been so since he came in; therefore it was not the effect of the quinine. Deafness in typhoid fever is not uncommon, and I may state that it does not contradict the use of quinine; by no means. It is due to the state of the blood and the impaired nervous system. We also note here that he has a constant tendency to stupor, is rather drowsy and heavy; he sleeps well at night without opium; he has not been delirious, and has not suffered with headache. The deafness, therefore, is the only symptom referable to the nervous system. There is very little if any, jerking of the tendons, or tremor.

Now, gentlemen, with regard to the treatment I shall make a slight modification. Quinine need only be given in tonic doses. We will order him to take eight grains daily. The dry tongue indicates that the turpentine is still useful; the amount of acid is so small that it does not make much difference whether it be continued or not, but, as it is grateful to the stomach and aids digestion, we will continue it also. Sponging of the general surface with water will be done several times a day, as heretofore; and if the temperature again rises we will return to the ice water applications. With regard to the amount of stimulant, although it seems large, yet I will not reduce it, on account of his dry tongue and weak heart. I think that just now it would be dangerous to make any change.

#### PILOCARPINE IN ACUTE ERYSIPELAS.

I have here a case to show you which I think will interest you, as it brings out rather a novel treatment of erysipelas. I intended to exhibit this to you this morning as a case of erysipelas, but I find that the erysipelas has gone. I, therefore, can only speak of the treatment, which has proved more quickly efficacious than I supposed it would.

This man B. K., 32 years of age, a fireman, was