

He complained also of a "burning about the heart." His expression was anxious, with but little "risus." His thirst was great, but swallowing difficult. He perspired profusely. The spasms of short duration, recurred once or twice every minute; pulse one hundred and fifteen to one hundred and twenty, soft. Opening medicines were ordered and at eleven o'clock tincture of hemp was given, repeated in doses of fifteen or twenty drops, with appreciable effect. On the 21st the bowels were not opened, though a turpentine enema was administered. The spasms were more violent and general, and a touch caused general spasm. He had not slept; one hundred and twenty to one hundred and forty drops had no effect. The doses were increased to sixty or eighty drops every three-quarters of an hour, and croton-oil was given, producing free action of the bowels; and in the evening the spasms abated, but the hemp caused only slight dosing at intervals. The tincture was ordered to be continued, and strong beef-tea to be drunk.

On the 22d swallowing was easier, the spasms less violent, but not less frequent; one hundred drops were given at half-past eleven, and continued about every half hour till four o'clock, when drowsiness was quite decided; he was not readily roused, even by the spasms which, though as frequent, were not so intense. At nine o'clock drowsiness was passing off; copious stools, colored as by the medicine, were brought away by injection; one hundred and thirty drops were given, and repeated at midnight, at which time he was much relieved, but suffered from cough. On the 23rd the spasms were again gaining strength, no hemp having been given for nine hours. A drachm of the tincture was given, and repeated at eleven, when he became quiet. The doses were continued till evening, when he took mince-collops and beef tea without difficulty, and the bowels were copiously relieved.

On the 24th, at visit, the spasms were absent, but the chest symptoms were worse, with general mucous rale, and frothy sputa mixed with blood. Drowsiness had been kept up by doses of a drachm to a drachm and a half. In the evening he was much weaker, but quite sensible, with a desire for food. On the 25th he was perfectly free from spasm, but was evidently dying from accumulation of mucous in the chest. Very little hemp was given. He died at 8 p. m.

In this case six ounces of O'Shaughnessy's tincture of Indian hemp were given in all, being equal to one hundred and forty grains of the extract. The extract for the tincture was reputed the best in Edinburgh. The doses at first were evidently too small. The examination of the body was not permitted.

It is a safe conclusion, from these facts, that Indian hemp deserves further trial in the tetanus of Europe, as well as in that of hot climates. I would particularly urge, however, the necessity, in all such trials, of making certain, by experiment on healthy persons, that the preparation to be used is good. For the present there is no other satisfactory test of quality.—*Jour. Mat. Med.*

PREPARATION OF PERMANGANATE OF POTASH.

Béchamp recommends the following method: In an iron basin ten parts of powdered binoxide of manganese are mixed with twelve parts of fused caustic potash; a little water is added to the mixture, which is rapidly dried, and introduced, while still hot, into a tubulated stoneware retort, and a current of pure, dry oxygen passed into it. To the neck of the retort a tube is fitted, just dipping under mercury. The absorption of oxygen is very rapid; it is complete when it bubbles through the mercury. The cooled mass is then exhausted with hot water, and a current of carbonic acid passed through the solution, by which the manganate is transformed into permanganate; when the solution has the characteristic color of the permanganate the current of gas is stopped, the oxides of manganese are allowed to settle, and the clear solution rapidly evaporated and allowed to crystallize. In general a pound of binoxide gives five or six ounces of permanganate at the first crystallization.—*The Druggist.*