

large amount of decomposing nitrogenous material, which before its conversion into urea and creatine, to be eliminated by the kidney, is peculiarly liable to fermentation, on the introduction of any of the zymotic poisons: and we have also a non-azotized series including sugar, fat, and lactic acid, produced by the same effort, to be eliminated by the respiratory process. (To be continued.)

CHLOROFORM.

The recent able report of the Committee of the Royal Medical and Chirurgical Society, on the inhalation of Chloroform, embodying as it does, the present opinion of the medical profession of Great Britain, cannot but be considered extremely valuable. We regret that our paper is too small to give other than an abstract of those points in it which we consider the most interesting and useful.

Concentrated chloroform vapour destroys life by arresting the action of the heart.

When chloroform proves fatal whilst moderately inhaled, the heart's action is much weakened for some time before death.

Respiration generally, but not invariably, ceases before the action of the heart, and death is due to both these causes.

The danger from chloroform increases with the degree of stupor it induces.

A mixture of equal parts by measure of chloroform, ether, and alcohol, is as effective as pure chloroform, and a safer agent when deep and prolonged anaesthesia is required.

Dr. Kidd, the great authority on chloroform, here objected to this deduction, and said that these mixtures had been extensively tried in Austria and France by order of Government, but that they had caused disappointment, whilst they tended to mystery and were cumbersome; and gave as a reason that the ether is first inhaled, and then the chloroform, and that the spirits of wine remains on the cloth or sponge, and has to be squeezed out. (If this be the case, then the quantity poured upon the cloth must determine the amount of the ether inhaled before the chloroform completes the anaesthesia. Ed.)

The most certain means of restoring life, after poisoning by anaesthetics, is by artificial respiration. And resuscitation may generally be accomplished so long as the heart continues to beat. In exceptional cases, however, it may succeed after the cessation of the heart's action.

Galvanism is less reliable than artificial respiration in equal cases.

Dr. Kidd here remarked that he considered electro-magnetism better than any other means whatever.

Sudden pallor, or sudden lividity of the face, or sudden failure or flickering of the pulse, or feeble or shallow respiration, indicates danger, and the chloroform must at once be withdrawn. Should these symptoms become urgent, its directions are to allow free access of air; to pull forward the tongue and clear the mouth and fauces; to keep the patient recumbent; dash cold water on the face and chest; and commence Marshall Hall's or Sylvester's method of artificial respiration, which, it says, should not be delayed or suspended for the employment of galvanism.

Resuscitation is more difficult in cases of gradual narcotism than in those which become quickly insensible from a strong dose of chloroform vapour. It is not advisable to give an anaesthetic either

after a long fast, or on a full stomach, the best time being three or four hours after eating.

In cases of depression, brandy or other stimulant may be given before commencing the inhalation.

When chloroform is administered in the erect or sitting posture there is danger from syncope, and even sudden elevation or turning of the body when recumbent should be avoided.

If lint or a napkin be used, it should be folded as an open cone, or held an inch or an inch and a half from the face.

Chloroform should invariably be given slowly. Sudden increase of the strength of the anaesthetic is most dangerous.

The patient who appears likely to vomit whilst beginning to inhale the anaesthetic, should at once be brought fully under its influence, when the tendency to sickness will be found to cease. Provision for the free admission of air during the patient's narcotism is absolutely necessary.

With heart-disease the anaesthetic may be given in any case which requires an operation, although, when there is evidence of a fatty, weak, or dilated heart, great caution is demanded. Valvular disease is of less importance.

In phthisis, when an operation is unavoidable, the anaesthetic may be given with impunity.

For all operations upon the jaws or teeth, the lips, cheeks, or tongue, the anaesthetic may be inhaled with ordinary safety. By care and good management the patient may be kept under its influence to the completion of the operation. In these cases, blood, as it escapes, if not voided by the mouth, passes into the pharynx. If any small quantity finds its way through the larynx, it is readily expelled by coughing. In operations upon the soft palate, fauces, pharynx, and posterior nares if sudden or severe hæmorrhage is likely to occur, it is not advisable to induce deep insensibility.

In cases requiring laryngotomy and tracheotomy the anaesthetic may be employed with safety and advantage.

For operations upon the eye, involving the contents of the globe, the use of anaesthetics is open to objection on account of the damage which the eye may sustain from muscular straining or vomiting. If employed, profound insensibility should be induced.

In operations for hernia, and in the application of the taxis, the anaesthetic acts most beneficially.

For most operations about the anus, profound anaesthesia is positively demanded.

In the condition of shock, or of great depression, as after hæmorrhage, careful administration of the anaesthetic diminishes the risk of an operation.

The continuous vomiting occasionally induced by, and following upon the inhalation of anaesthetics may be injurious by consequent exhaustion, as well as by mechanically disturbing the repair of a wound. With this reservation, they do not appear to interfere with the recovery of patients from surgical operations.

Statistics.—The results of 2,586 capital operations performed before, and of 1,860 performed since the introduction of anaesthetics, collected from all authentic available sources, prove that anaesthetics have in no degree increased the rate of mortality.

In our issue of last month we inadvertently omitted to acknowledge our indebtedness to the American Medical Times for the excellent article on Gastralgia, by Dr. Lee of New York.