

powder. When a very quick action is necessary, $\frac{3}{4}$ milligram of strophanthin may be injected.

After these remedies, the pulse will very often improve, yet the amount of urine remain the same. It may then be necessary to remove the fluid by mechanical means, in order to relieve the pressure upon the venous system. The importance of sufficient sleep cannot be overestimated, since in pathological conditions, more urine is excreted when the patient is asleep than when he is awake.

Most modern diuretics that act directly upon the kidneys, belong to the purin group. They are generally free from direct actions upon the heart; they increase the flow of blood through the kidneys and stimulate particularly the excretion of water and salt. If an increased renal circulation is impossible, owing to severe lesions in the renal vessels and the glomeruli, a diuretic effect will usually not occur.

According to Romberg, the most valuable member of the group is theocin. In order to obviate gastric disturbance, it must be given carefully, as follows: 0.1 Gm. twice a day; if the diuresis is insufficient, 0.2 Gm. twice a day. The administration is continued on alternating days or less often, and if necessary, the dose may be cautiously increased to 0.2 Gm. three to four times a day. Most brilliant results may thus be obtained without after-effects. If necessary, the drug may be given per rectum.

Diuretin is perhaps the best known diuretic, but is not so potent. Large doses (1 Gm. three to four times daily) can be given only for short periods; smaller ones (0.5 Gm. three to four times daily) for a longer time.

Pure caffeine is much weaker in action and is only rarely employed. Agurin closely resembles diuretin and is given in the same dose.

The various vegetable diuretics are only rarely used at the present time, as they are much inferior to the purin derivatives. Among them are *baccæ guniperi*, *herba equiseti*, *radix ononidis*, *asparagus*, and *folia betulæ*. A dialyzed preparation of the diuretic tea, official in the German Pharmacopœia, is frequently employed with good results abroad, even where theocin has failed.

Calomel and sodium salicylate are good diuretics, but frequently injure the renal epithelium. The epithelial desquamation following the use of sodium salicylate and its derivatives, such as aspirin, is usually, however, of short duration, even where the medication is continued.