

the other to induce certain precipitates or changes of colour. In toxicological investigations, a liquid fit for testing may sometimes be got by exhausting the contents of the stomach by alcohol. Solid substances may be digested at once in the spirit. Liquid substances require to be first concentrated. The pseudo-tincture thus obtained should be percolated, and the filtrate evaporated in the manner of making an extract. If the product contain Calabar Bean, a little of it applied to the eye of a small animal will contract the pupil; and injected under the skin it will produce a flaccid weak state of the limbs. Again, if diffused through water: 1st, ammonia turns the solution first yellow, afterwards (in a few hours) green, and eventually blue. 2nd, persalt of gold, as the terchlorid, throws down a purple precipitate, from which metallic gold may be separated. 3rd, with sulphuric acid and bi-chromate potass, or peroxid manganese, a violet which changes to red,—a deposit falls and leaves a clear, yellow fluid above. This last test is something like the colour tests for strychnia, but the latter is done in a different way and is marked by a greater variety of colours.

The *treatment* of a case of poisoning differs according to the phase it wears. If asphyxia threaten, the mouth and throat should be cleared of mucus that may have accumulated, artificial respiration established by Silvester's method, and mustard applied over the spine. Electricity along the course of the phrenic nerve has been recommended. If the symptoms be less urgent, the stomach is to be emptied by the pump, when a liquid preparation has been used, and by an emetic, as sulph. zinc, when the bean itself has been taken. When allowable, the pump is always preferable if there be much paralysis. Warm diluents should be freely used to dilute and wash out the poison. After this has been thoroughly done, I would advise small doses of tinct. nux vomica, a first dose of $m\ iv$. then $m\ j$. every fifteen minutes or half hour, till improvement set in, when the frequency of the dose should be carefully diminished. Stimulants, as brandy, will generally be serviceable.

Another point of interest about Calabar Bean is its ACTION UPON THE EYE. If the extract be diluted with glycerin, in the ratio of one to four, and a drop of the compound be applied to the eye by a camel's hair brush, or the paper, before described, be inserted, the following effects occur:

A.—Contraction of the pupil; perhaps so great as to reduce the aperture to a mere speck or a state of occlusion. It begins in about ten minutes, often attains to a maximum in 30 minutes, and lasts about three days, subsiding gradually. It is limited to the eye to which the application is made. The pupil of the other eye is often slightly dilated. No