

well be transferred to the list of the *materia medica*; or, having fallen into disuse, should be omitted altogether; and it is possible that Iodide of Arsenic belongs to one if not both of these classes. But all will agree that, where an article is in the list of preparations, the process described should be the *best* process known for the purpose; and the product which may be obtained by careful manipulation, as the result of the formula given, should correspond to the description of the substance, in the smaller type, which, in the *pharmacopœia*, follows the formula itself.

The process for the preparation of the Iodide of Arsenic as given in the U. S. *Pharmacopœia*, consists in heating together the so-called metallic arsenic with iodine, in the proportions of one part of the former to five of the latter, and after the combination has taken place, pouring the fused iodide upon a porcelain slab to cool.

The product is described as an orange-red, crystalline solid, wholly soluble in water.

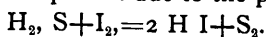
The product obtained by this process, however, does not correspond to the description given; because, not only are the proportions such as will leave some metallic arsenic unacted on—that is to say, there is too little iodine or too much arsenic, according to the formula—but iodide of arsenic, even when pure, undergoes a slight decomposition when dissolved in water; a small quantity of a yellowish-white *insoluble* powder being produced, which is described in the books as an *oxidide* of arsenic. Moreover, metallic arsenic is somewhat difficult to obtain in the market, and when procured is impure; so that the amount of iodide of arsenic produced from it is uncertain, while the product itself is either very dark coloured or brownish; fails to dissolve perfectly, independent of the decomposition above noted, and if used for the preparation of the solution of iodide of arsenic and mercury, produces an unreliable article. Indeed, Donovan's solution has fallen into disrepute with many physicians, because the amounts of arsenic, iodide and mercury which it contains are so variable.

The writer proposes a process which avoids the use of metallic arsenic, and produces an iodide of a much purer character and of a more definite composition.

It consists in the solution of *arsenious acid* in *hydriodic acid* and the subsequent evaporation of the solution to dryness.

*Hydriodic acid* for this purpose is readily prepared by passing sulphuretted hydrogen into water holding iodine in suspension.

A Troy ounce of iodine is placed in a small vessel, with eight or ten fluid ounces of water, and the washed gas passed into it, until it loses all color except that due to the precipitated sulphur.



The solution is filtered and boiled until its odor of sulphuretted hydrogen has ceased. The acid is poured into an evaporating dish, and there is added one-fourth ounce of *arsenious acid*; the liquid is