

The first was advanced by Von Grafe, who held that abnormal and excessive intra-cranial pressure so acted on the cavernous sinus as to cause a stasis in the ophthalmic vein, and hence the swelling and venous engorgement about the optic papilla. This theory is now generally admitted to be incorrect.

The second seems to offer a satisfactory explanation of a certain number of cases, and still finds some supporters. According to this theory, fluid from the arachnoid space finds its way into the nerve sheaths, and thus causes choking of the lymph vessels in the optic papilla. According to this theory, sheath dropsy is the cause of the papillitis.

The third, as I understand it, teaches that the irritation of the brain, induced by certain intra-cranial lesions, causes a disturbance in the vaso-motor nerves, which govern the blood vessels of the papillæ, and thus give rise to the effusion into these structures.

The fourth assumes that with every case of papillitis there is œdema of the brain substance, that is, interference with the lymph circulation. By direct continuity this obstruction or interference extends to the intra-ocular portion of the nerves, and occasions the swelling, etc., of these parts.

However plausible each of these theories may seem, facts have been observed in connection with different cases of optic neuritis which cannot be explained by any one of them. How, for instance, account for the occasional occurrence of monocular papillitis under apparently identical conditions with those that induce the ordinary symmetrical disease? Or, if œdema of the brain is essential to the production of papillitis, how explain a case described by Hughlings Jackson in which there was atrophy of the brain? Some of these mysteries we cannot yet solve; but I strongly suspect the difficulty will ultimately be found to lie in our defective knowledge of the process of nutrition as occurring in the brain and the structures so closely connected therewith as are the optic nerves.

If my memory serves, I once heard H. Jackson say he could quite believe the papilla forms a sort of indicator for the condition of the brain, even where no actual disease of the optic