

## SUPPURATIVE INFLAMMATION OF THE TYMPANUM.

*(Read before the Pictou County Medical Society, Oct. 9th, 1888.)*

BY DR. C. J. MILLER, NEW GLASGOW.

IT is not pretended that this is a strictly correct diagnosis of the case to which the following brief outline notes refer. Suppuration, in fact, was not a very prominent feature in the case, and as to its precise situation, I can venture little more than conjecture. If the diagnosis were based on symptomatology, the case would unhesitatingly be dubbed otalgia, for this was the most prominent characteristic about it, and in the patient's estimation the most important. I will proceed to give something like its clinical history.

A machinist or iron worker about 38 years of age, of fairly good constitution, was the subject. In his work he is exposed, especially during winter, to sudden extremes of temperature and moisture. After a series of such exposures general indisposition with vertical headache came on. The headache became general and coryza developed. The cephalalgia persisted with a good deal of severity for two or three days. It may have been to some extent due to or aggravated by a few gr. iiii ss. doses of quinine he had taken for the symptoms that preceded the headache. During the third or fourth night nausea and vomiting occurred followed by cessation of the headache.

Next night he did not sleep on account of pain in the right ear. There was also pain around the ear and over the forehead, and some swelling down the right side of the neck. After instillation of a solution of Cocaine gr. xvi, and Morphine gr. viii to an ounce of equal parts of Glycerine and water, there was a short respite from the otalgia. But soreness over mastoid process and right half of face remained. Presently the earache returned with increased severity and was barely controlled by instillation of a solution of Atropia (gr. iv to 5i) and hypodermatic injections of Morphia. This state of matters continued for four or five days during which there were rigidity and tenderness of the right posterior cervical muscles. The auditory canal at this stage presented nothing abnormal except some tumefaction, not sufficient however to interfere with a tolerably satisfactory view of the membrana tympani, which did not appear abnormal as to color or shape. Functionally the ear was considerably impaired.

The otalgia was intense and subject to exacerbations, during which the unaffected ear was also the seat of pain. For fifteen days there was very little apparent change in the case, the history being paroxysms of pain superadded to an underlying constant pain, which the free use of Morphia and Atropia did not entirely overcome. During all this there was, as may be supposed, some constitutional disturbance due chiefly to the ear trouble, but also in part, no doubt to the treatment,—furred tongue, anorexia, constipation and some rise in temperature.

On the sixteenth day some pus made its appearance in the meatus of the affected ear. Two or three hours previously the passage had been examined by speculum and mirror, and carefully swabbed out and explored, with a view to the discovery of any visible indication of an abscess, but nothing was noticed except a little general swelling of the upper and posterior walls of the meatus near the insertion of the membrana tympani. Even after the discharge of pus its exact point of exit could not be exactly made out.

For nine or ten weeks there was an occasional slight discharge from the ear. Pain in and around the ear was still experienced, though much less acute than it was before the discharge. Throbbing and rough grating sounds in the ear, synchronous with the carotid pulsation were also much complained of. These intra-aural or subjective sounds in combination with external sounds produced a very disagreeable effect, because the former in rhythmical succession interrupted or excluded the latter, and thus there was produced a sort of double pulsation sound in the ear. At intervals during this time he was at work. Noise lessened the hearing power of the affected ear. This according to some neurologists, is an indication that the disease was located in the percipient apparatus, or in other words that it was centric and not peripheral. Another sign pointing to an inflamed or irritable acoustic nerve was that loud or prolonged noise aggravated the pain and discomfort in the affected ear. For a day or two during the thirteenth week he complained of a sharp darting pain in the ear shooting inwards and felt most acutely at the root of the tongue on the right side. At this time there was no discharge from the ear, but most of the indications for a few days led to the conclusion that an abscess was forming somewhere in the ear. There was severe intra-aural pain requiring the hypodermatic use of Morphia. The walls of the meatus were swollen so as almost to occlude the passage. The external tissues around the ear were also swollen so that the auricle was dislocated outwards or pushed away from the side of the head. Pain and tenderness over mastoid eminence were also present, and for a few hours there was a profuse serous discharge from the nostrils that was described as being hot. At this time there was little, if any, constitutional disturbance. Under fomentations medicated with chloroform, and a blister to the neck, the symptoms subsided without any further evidence of suppuration.

After this the patient resumed his occupation, but the ear was quite often the seat of pain, and along with the corresponding side of the head has continued sensitive to cold. He frequently has headache and this generally leads up to otalgia. Right posterior cervical muscles apt to become stiff and painful if his feet get wet and cold. On each side of the sagittal suture there is a tender spot which patient thinks is higher in temperature than the rest of the scalp. Functionally the affected ear is tolerably good, and