but it penetrated to the right through the raphe and infiltrated the abducens nucleus on that side. In its cerebral and in its spinal extension it limited itself rather completely to the left side, and involved on this side the trigeminus, the motor nucleus and the greater part of the sensory nucleus of which was destroyed. The greater part of the glossopharyngeal and hypoglossus nuclei were infiltrated and nearly destroyed by the tumour. The hypoglossus nuclei, in its proximal portion, showed in parts very marked changes, and as it was followed into the cord it became more and more normal. The tumor was a pure glioma. J. C.

The Primitive Lesion of Tabes.—Nageotte. (*Société de Biologie*, November 10, 1894.) The writer believes that there exists in tabes an intense perineuritis, which begins at that portion of the posterior roots which is situated between the ganglion and the point of entrance of the root into the sub-arachnoidian space. In the beginning this inflammation partakes of the nature of an embryonic process, while in the more advanced stages it passes in to a fibrous state. This inflammation is primitive, and leads up secondarily to degeneration of the posterior root fibres. The inflammation invades equally the anterior roots at a similar level, but the nervous tubes of these roots resist infinitely more the interstitial process than the posterior roots. Nevertheless it would be possible to invoke this lesion as a cause of the peripheral motor neuritis, at least in certain cases. The roots in the nerves in paralytic tabics do not differ from those in pure tabes in this regard. This conjunctive lesion is of the same order as those of the brain in progressive general paralysis. There exists no histological argument which prevents the admission that this embryonal lesion, afterwards sclerotic, may be syphilitic. J. C.

CLINICAL.

The Reflexes in Total Transverse Lesions of the Spinal Cord.—Gerhardt. (*Deutsche Zeitschrift für Nervenheilkunde*, Bd. 6, p. 127.) Bastian's assertion that a total transverse lesion high up in the cord abolishes the knee-jerk is well known, and has received the unqualified support of Bowlby, Thorburn, Bruns and others, although all are not satisfied with his explanation, which really comes from Hughlings Jackson, that it is the cutting off of cerebellar influence that makes the knee-jerk impossible. Gerhardt's case, which he considers as positive evidence against the view of Bastian, is a boy of seventeen, whose trouble began with a feeling of weakness in the right foot, gradually became paraparetic, in sixteen days was unable to walk, and a month later had become completely paraplegic. Sensation gradually diminished to a level above the umbilicus, but was not completely abolished until two years later. The knee-jerks were greatly exaggerated up to the fourth year of illness, when they began to diminish; by the end of the year were completely absent, and were not to be obtained up to the time of death, about five years from the onset. The superficial reflexes were retained, but they gradually altered in character, becoming very slow. The autopsy revealed an angioma extending from the fifth to the eighth dorsal vertebra, which had compressed and completely destroyed the cord in this region. He explains the loss of knee jerk by referring it to the marked contractures which had developed, with supposed changes in the muscles and joints. [Such changes might possibly be an adequate cause, but it seems fully as reasonable, if not more so, to assume that this slowly-growing tumor, slowly growing as shown by the long retention of sensibility, only accomplished the complete destruction of conducting paths in the cord at the end of three or three and a half years, and that from this time the tendon reflexes were lost.]

NOTE.—Since the above was written the review of Bruns has appeared (*Neurol. Centralb.*, January 15, 1895), in which he essentially agrees with the foregoing.

PATRICK (Chicago).