

## INTRODUCTION

Fourth ventricular lesions involve a large group of neoplasms which affects infants more than adults, some are common such as Medulloblastomas and Ependymomas while others are less common as choroid plexus neoplasms, dermoid, epidermoid and others are very rare as meningiomas and metastases.

The clinical presentation is mostly with symptoms of increased tension as headache, vomiting and blurring of vision due to obstruction of cerebrospinal fluid pathway causing hydrocephalus. Though other symptoms may present due to cerebellar or brain stem affection.

The advancement in radiological diagnosis has helped in earlier diagnosis of fourth ventricular lesion. Neuroradiological investigations have a very important role in diagnosis of lesions including mainly CT and MRI. MRI is more superior to CT in most cases as beam hardening artifacts caused by CT prevent visualization of tumor borders. In addition to its better delineation of the lesion in the relation to the surrounding structures.

The management of fourth ventricular lesions is directed primarily to the hydrocephalus causing the main symptoms, though there is great controversy about whether the tumor should be attacked directly or CSF diversionary procedure should be done first as they carry the risk of upward herniation, haemorrhage into the tumor and shunt-related metastases.

Different tumours have different principles in removal though the main standard approaches remain the same for all. Post operative adjunctive therapy is essential for most tumors and include: Radiotherapy

and chemotherapy mainly. The progress in these branches has markedly improved survival rate especially in children.