

Introduction

The AVM surgery is considered as the most challenging surgery that is performed in a limited centers of the world, we presented here our experience in 22 AVM surgeries ,10 males and 12 females ,in 19 pateints the AVM were supratentorial and in 3 infratentorial ,on Spetzler Marten grading they vary from grade 3 to 4

The most common presentation was spontaneous intracranial hemorrhage which happened in 15 patients, the next manner of presentation is headache in 3 patients and epilepsy in 4 patients

Methods

The surgery performed in a standard microsurgical technique by systematic elimination of the feeding arteries in a circumferential pattern leaving the major draining vein to be dealt with at the very end of surgery, two surgical issues are of great importance, the first one is avoiding entrance to the AVM nidus and the second is identification of transit vessels and dissecting them freely from the AVM and its feeding vessels

All cases had been dealt with surgically as primary treatment without preoperative gamma knife or embolization

Results

In 20 cases total excision were performed safely and without residual malformation, in the remaining two cases residual AVM was noticed in the postoperative CT.angiography that had been further managed by gamma knife .

Conclusions

AVM surgery though it is the most challenging surgery that can be performed by the neurosurgeon but it is the gold standard treatment modality that is clearly superior to stereotactic radiosurgery or interventional neuroradiology .In our series with S.M grade 3,4 no luxulary hyperperfusion with uncontrolled bleeding or brain edema had been encountered (normal pressure perfusion breakthrough)

Learning Objectives

Cure can be achieved when it is totally resected without violating the eloquent brain areas or occluding the transit normal vessels