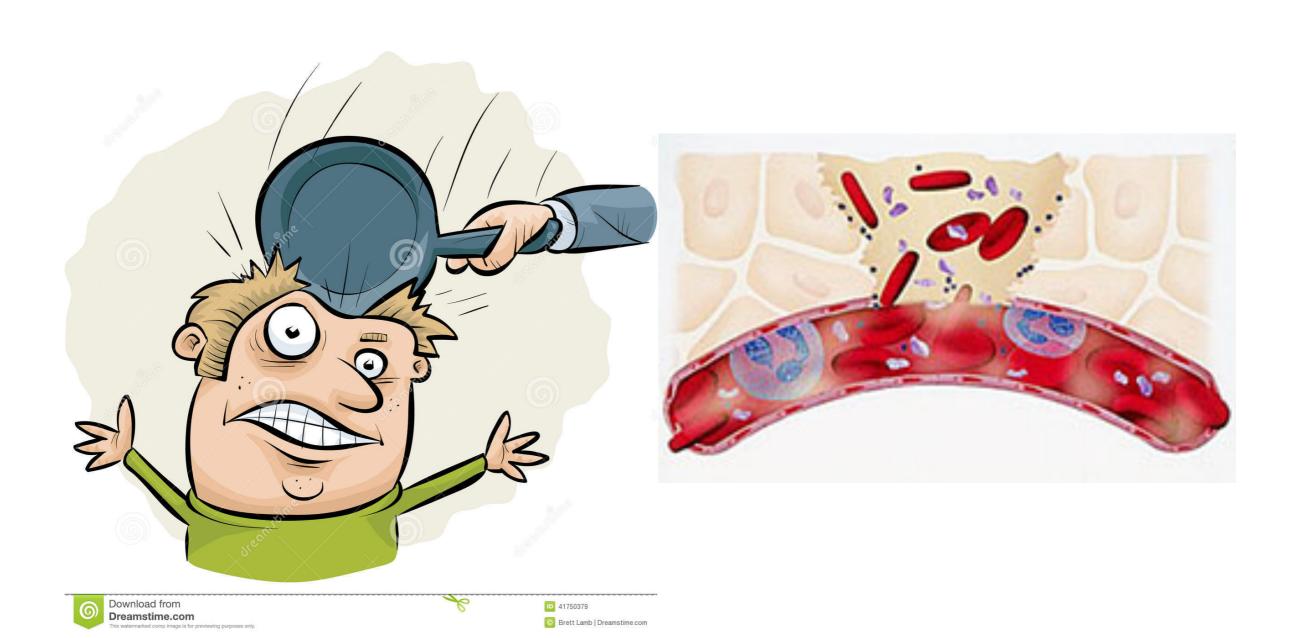
CNS pathology Third year medical students

Dr Heyam Awad

brain haemorrhage

Traumatic vs non traumatic



Case 1

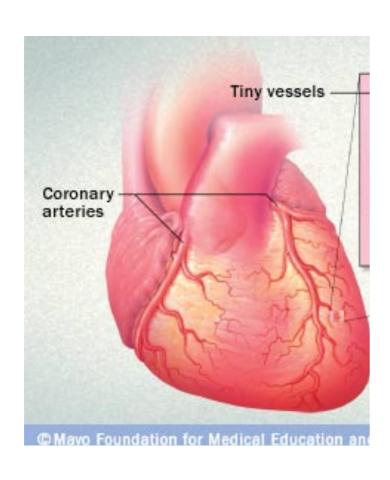
 Mr H (65 years old) was enjoying a vacation in Hawaii with his wife to celebrate their 30th marriage anniversary. While having dinner he told his wife that he felt a sudden headache but continued eating!! a few minutes later he

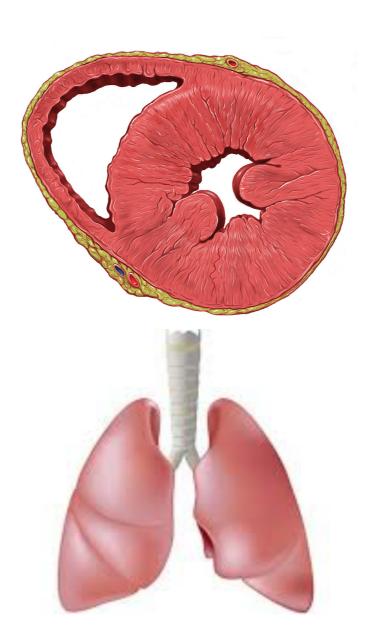
unfortunately died.

 Mr H was taken to hospital where death was confirmed.

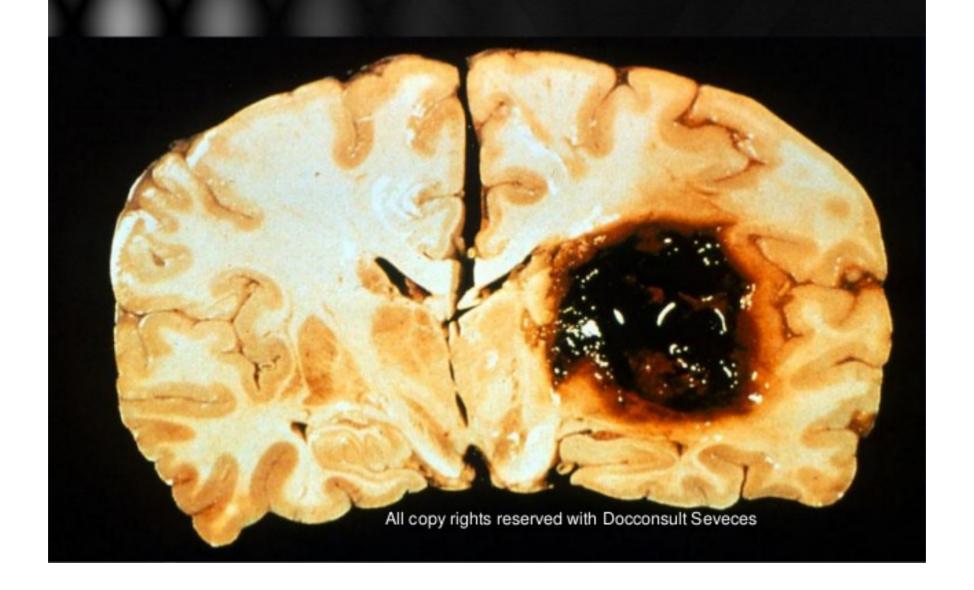
What's the next step doctors should take?

- An autopsy was performed.
- What organ systems must the pathologist focus on while undertaking the autopsy in this case?



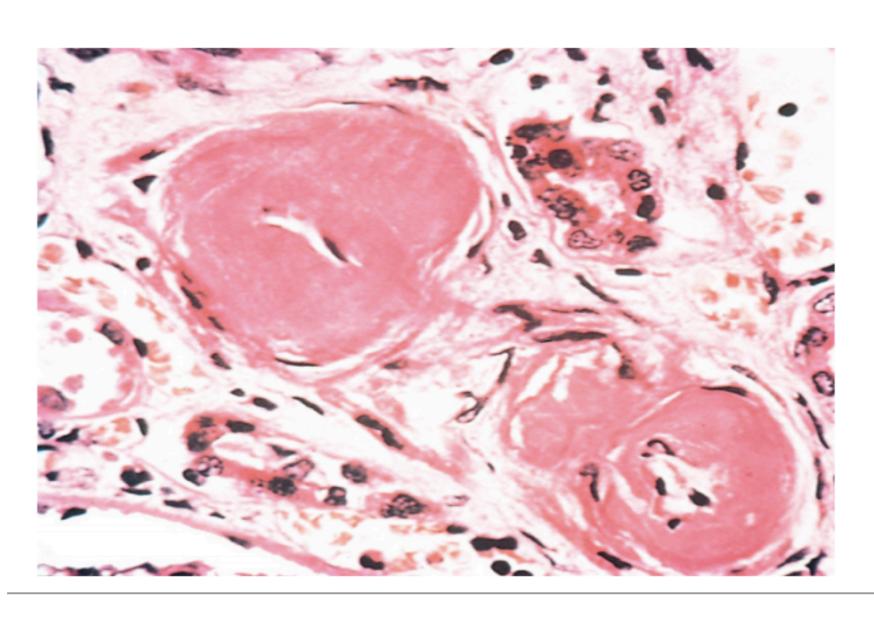


AUTOPSY OF INTRACEREBRAL HEMORRHAGE

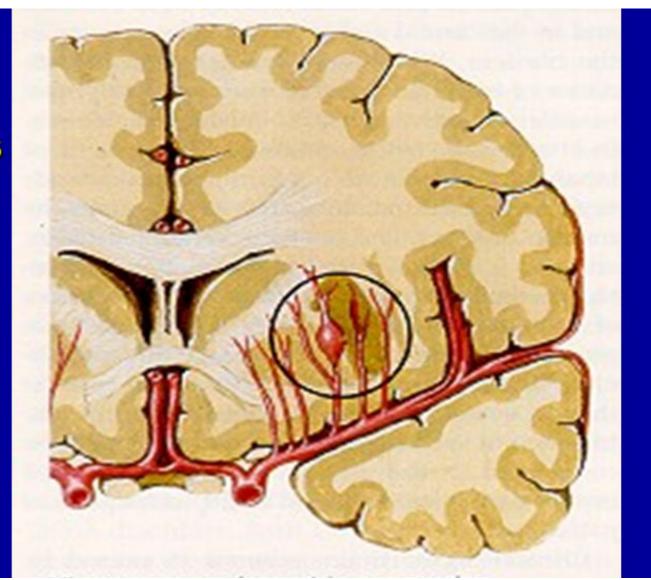


- What is the cause of death.
- What is the underlying cause?
- How can hypertension cause haemorrhage?

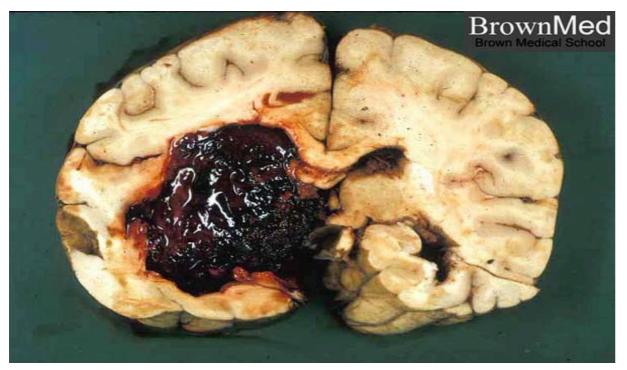
Hyaline arteriolosclerosis



Microaneurysms in penetrating arteries

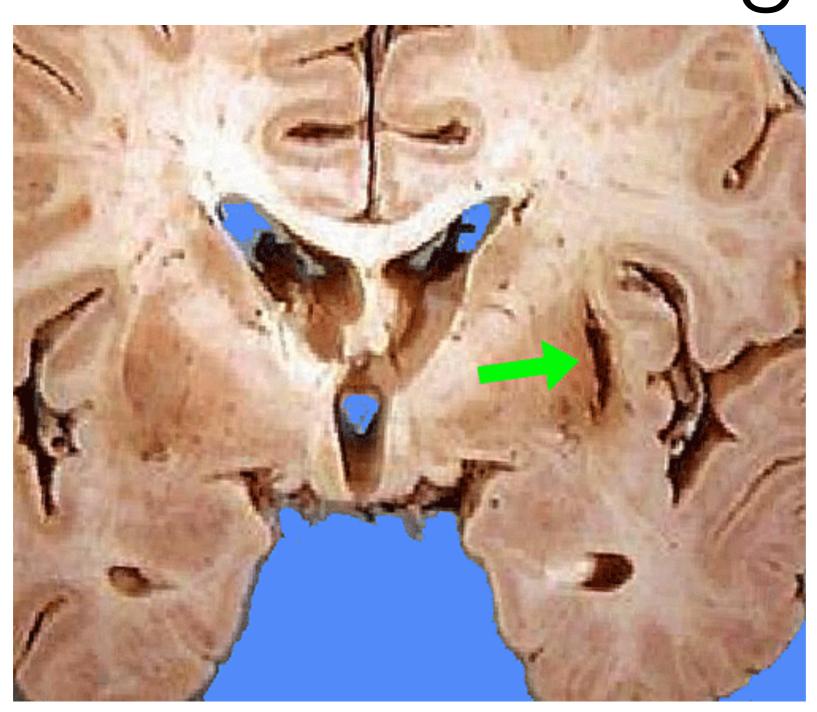


Brain haemorrhage

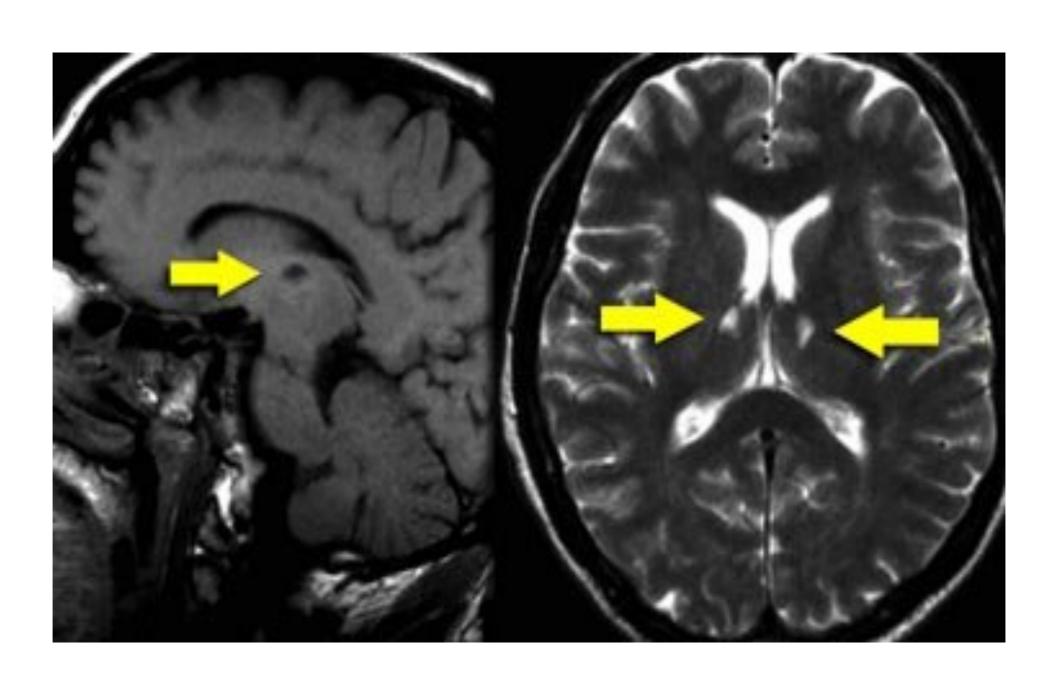


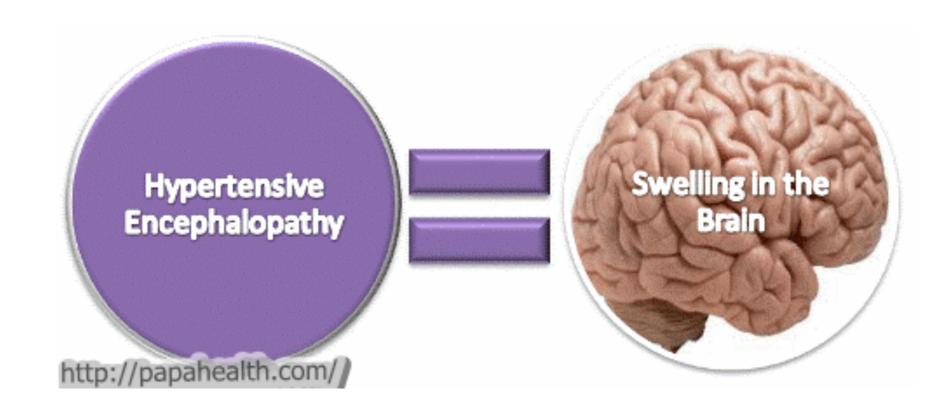


slit haemorrhage

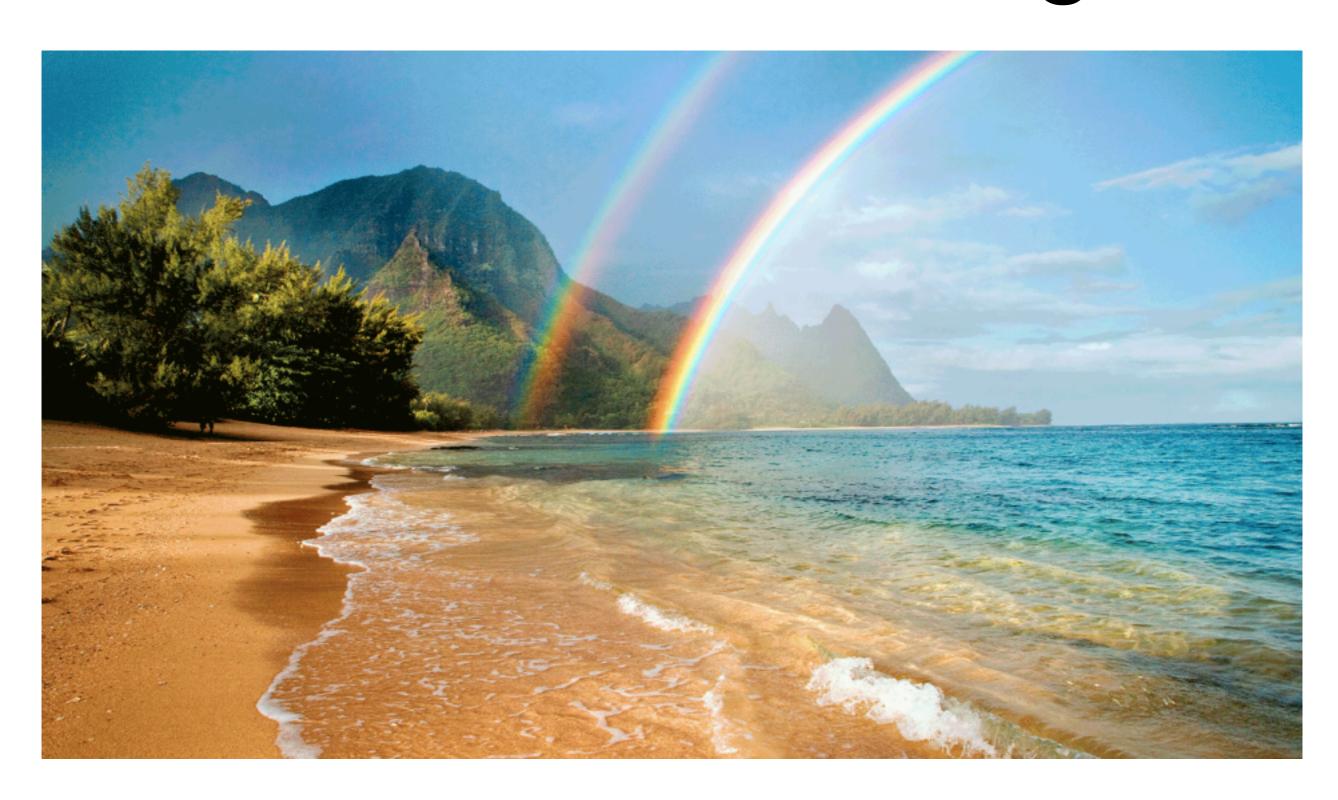


Lacunar infarct





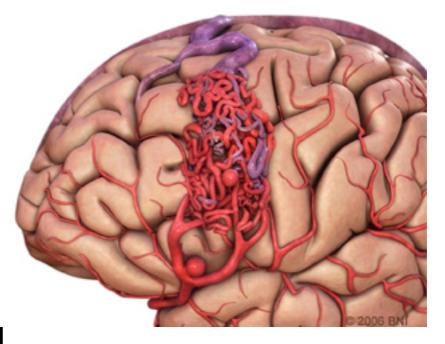
Take home message



case 2

- A 16 year old boy had seizures for the past two years. The school called his mum to collect her son who had a severe headache and then vomited.
- His mother took him to the hospital and a CT scan was performed that showed an intracerebral haemorrhage
- What's the most likely cause?



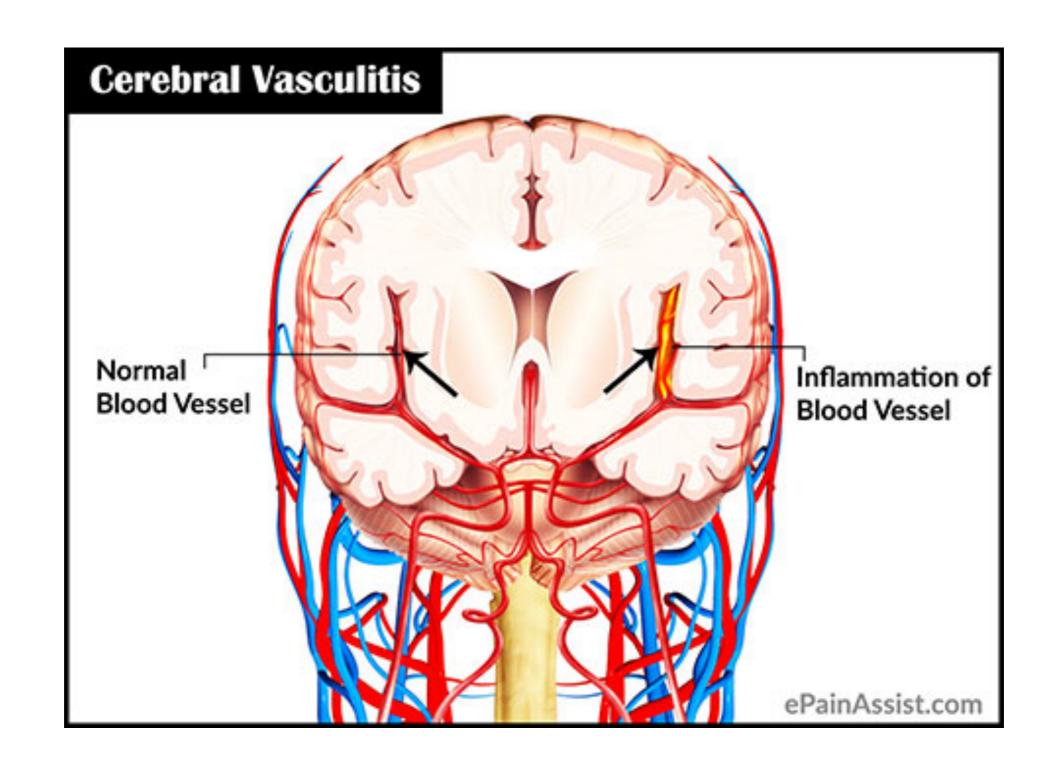


M1360300 [RM] (c) www.visualphotos.com

case 3

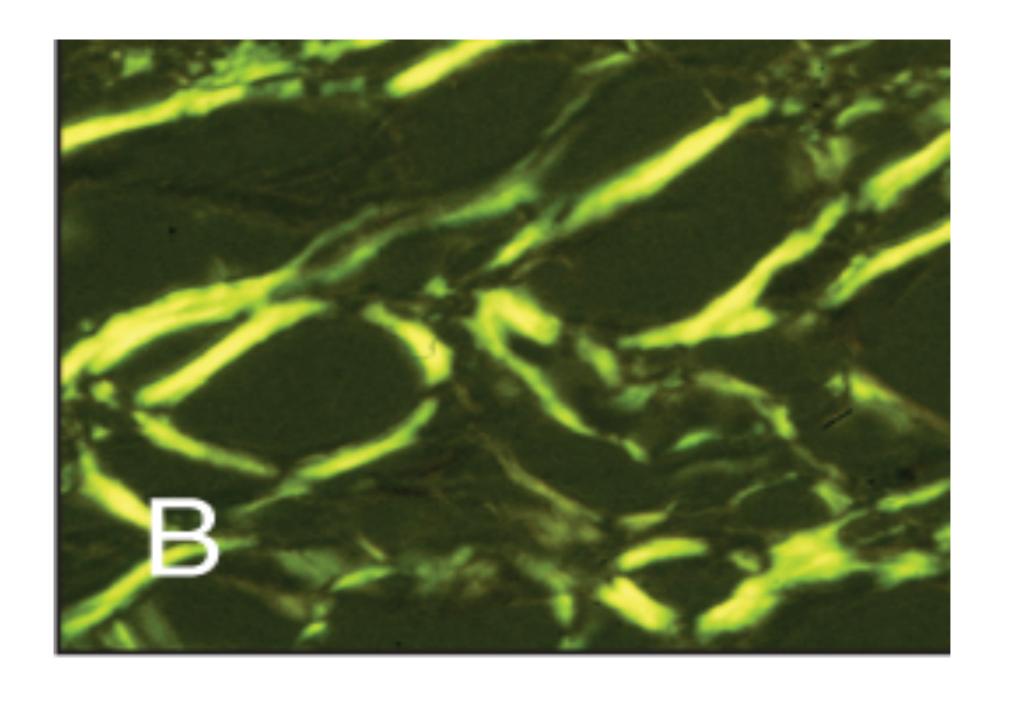
 A 32 year old male, known of having HIV infection, had neurological symptoms which on investigation were found to be due to an intracerebral haemorrhage

? Cause



case 4

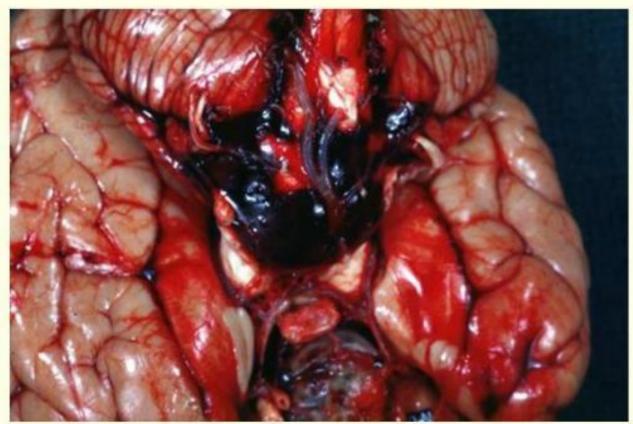
- A 45 year old woman with a long standing history of rheumatoid arthritis developed weakness in her right leg which was followed by headache and vomiting. On examination her blood pressure was 180/95, heart rate 40/ minute and you noticed shallow breathing.
- CT scan showed an intracerebral haemorrhage, can you suggest a cause???



Case 5

- A 77 year old woman who is known to be a diabetic and hypertensive suffered from sudden severe headache which she described as the worst headache in her life. She was rushed to hospital and CT scan showed subarachnoid haemorrhage.
- What is the most common cause of subarachnoid haemorrhage??

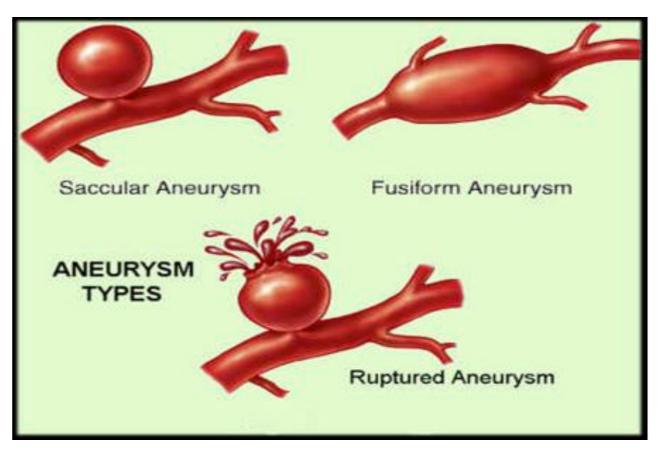
Subarachnoid Hemorrhage

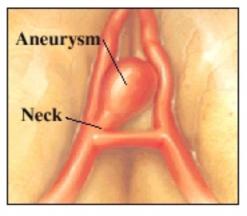


* Restricted use. PEIR; University of Alabama at Birmingham, Department of Pathology

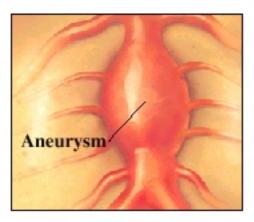
Subarachnoid haemorrhage



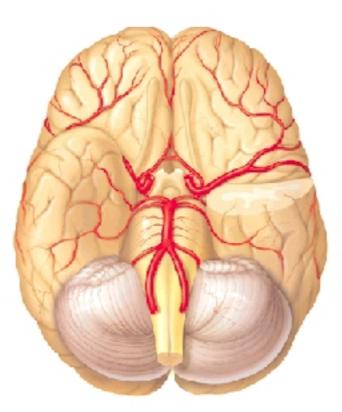




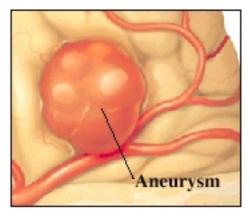
A saccular (berry) aneurysm bulges from one side of an artery. A neck leads to it.



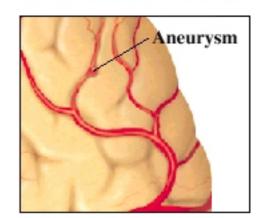
A fusiform aneurysm bulges from all sides of an artery. It rarely has a neck.



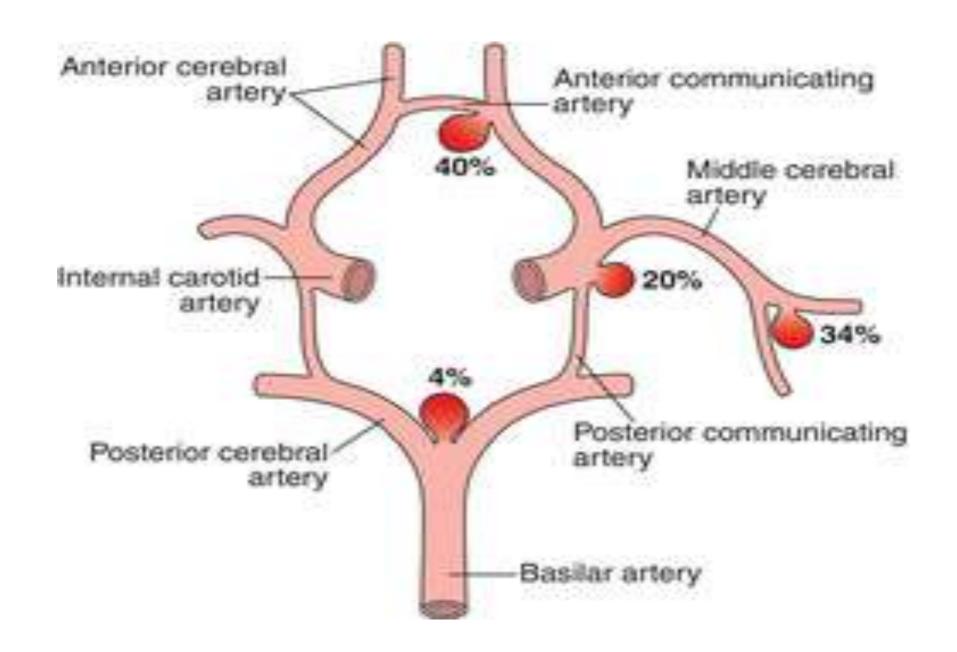
Using this picture, the surgeon may mark the site of the aneurysm.



A giant aneurysm can involve more than one artery. It is over 2.5 centimeters (cm) wide.



A mycotic aneurysm is caused by an infected artery wall. This type of aneurysm is fairly rare.



Traumatic haemorrhage

