

# **SOCIETY OF PEDIATRIC PAIN MEDICINE VISUAL PEARL SERIES**



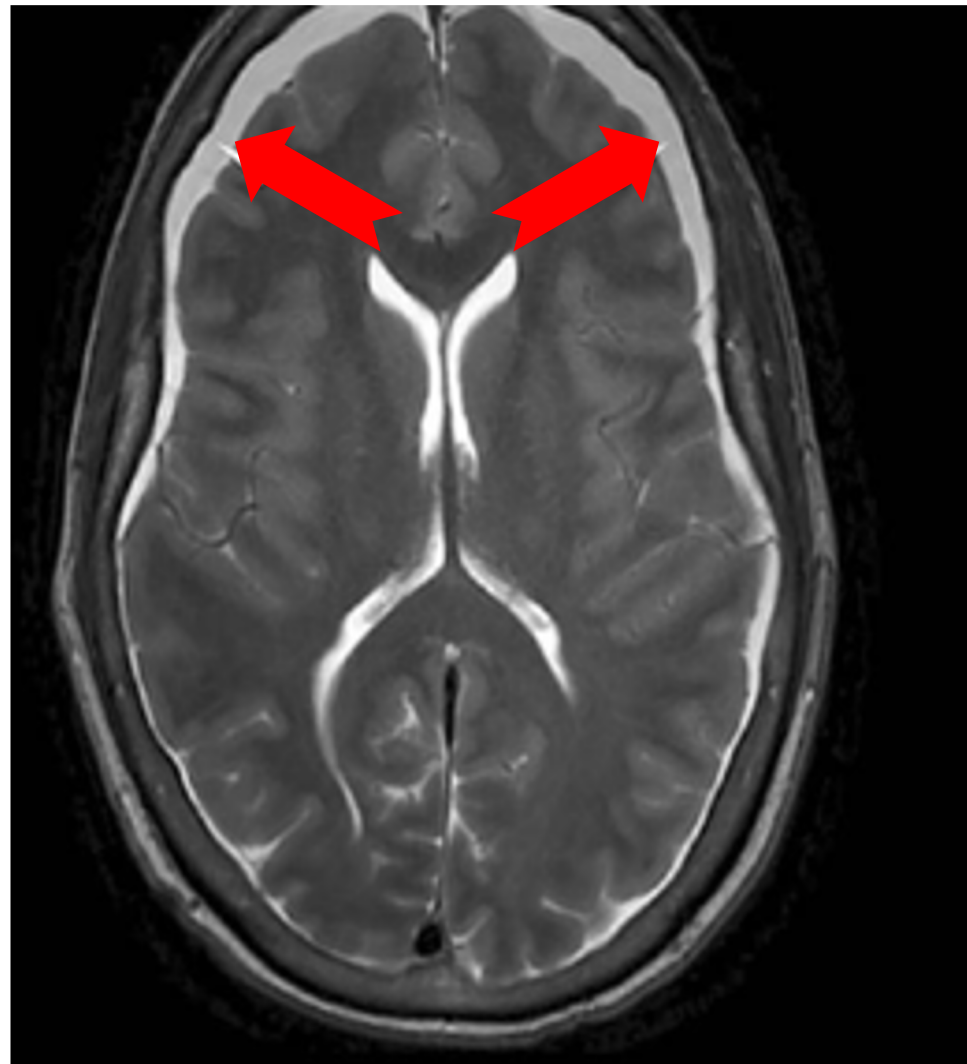
## ***VISUAL AIDS IN DETECTION OF SPONTANEOUS CSF LEAKS***

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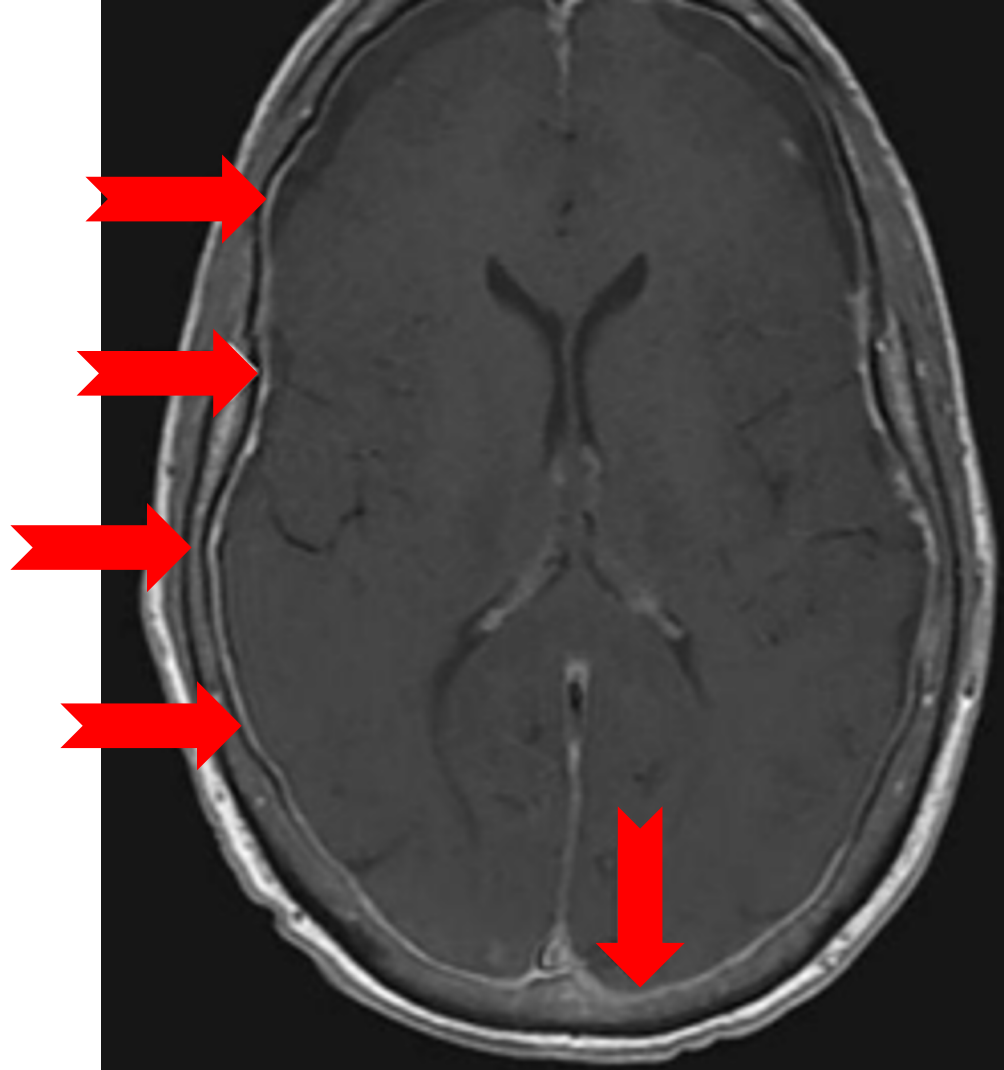
Brain MRI -**S**EEPS  
(diagnostic 75% of the  
time)

- **S**ubdural fluid  
collections- *thought to be  
caused by tearing of subdural  
bridging veins*



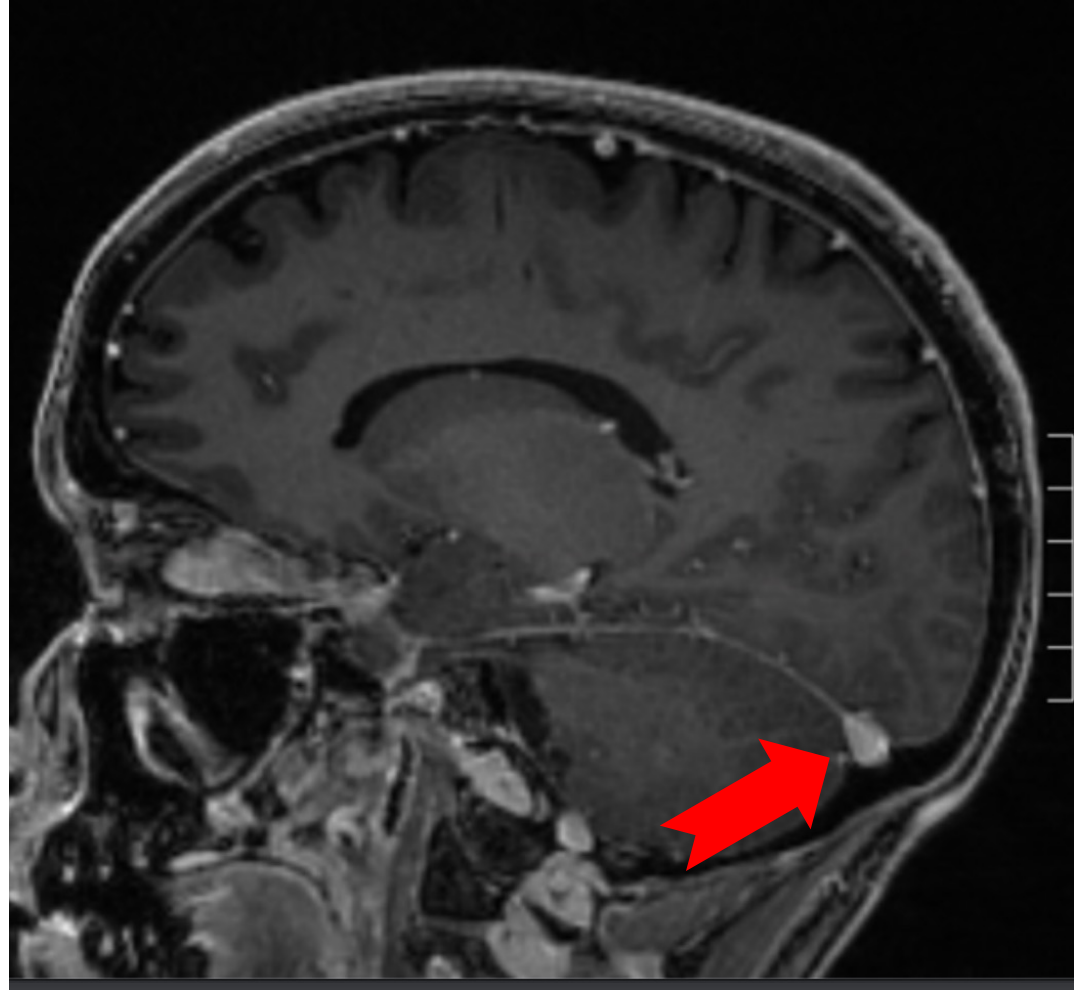
## Brain MRI -SEEPS

- Enhancement of the pachymeninges- *Diffuse enhancement of both the supra- and infra-tentorial meninges is the most well-known imaging finding in spontaneous intracranial hypotension, with the dilation of thin-walled blood vessels of the subdural zone is thought to be the mechanism for contrast enhancement*



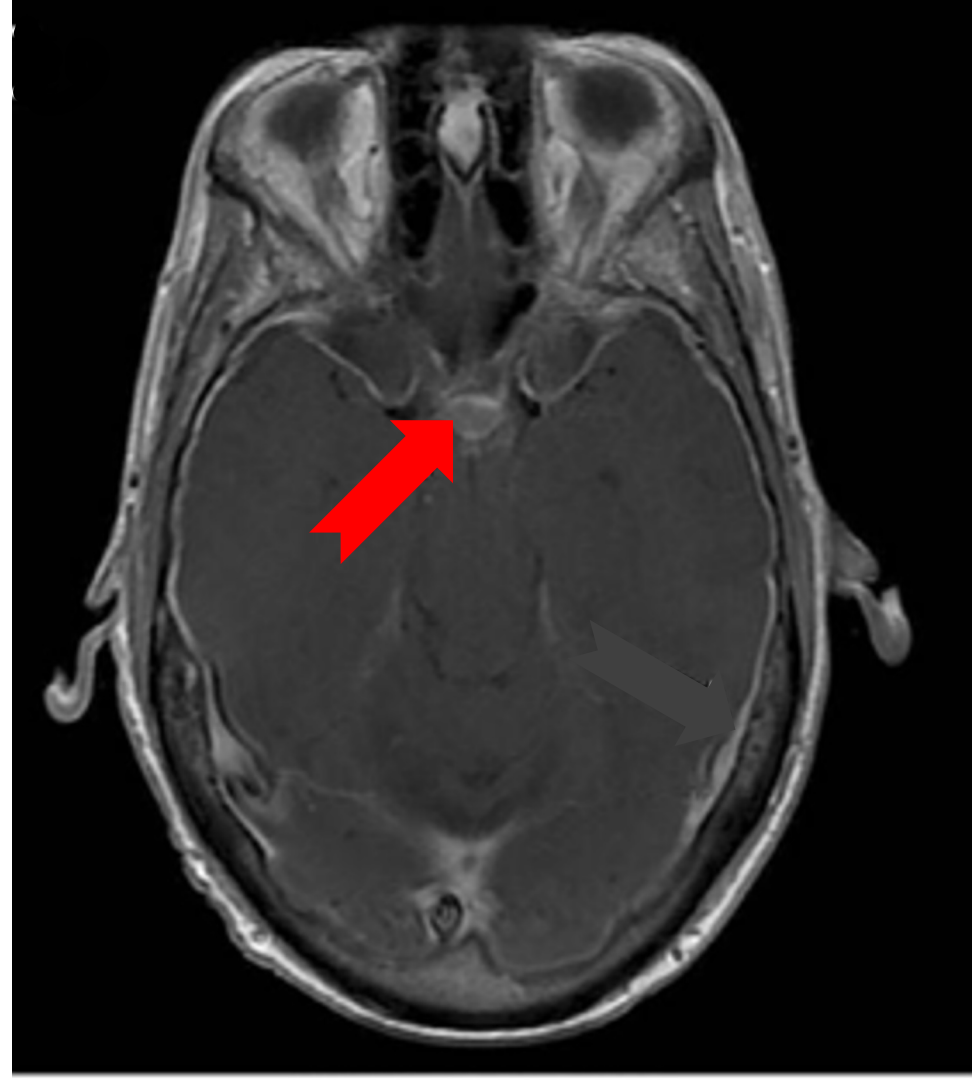
## Brain MRI -SEEPS

- **E**ngorgement of venous structures -  
*most evidently in the large cerebral veins and/or dural sinus*



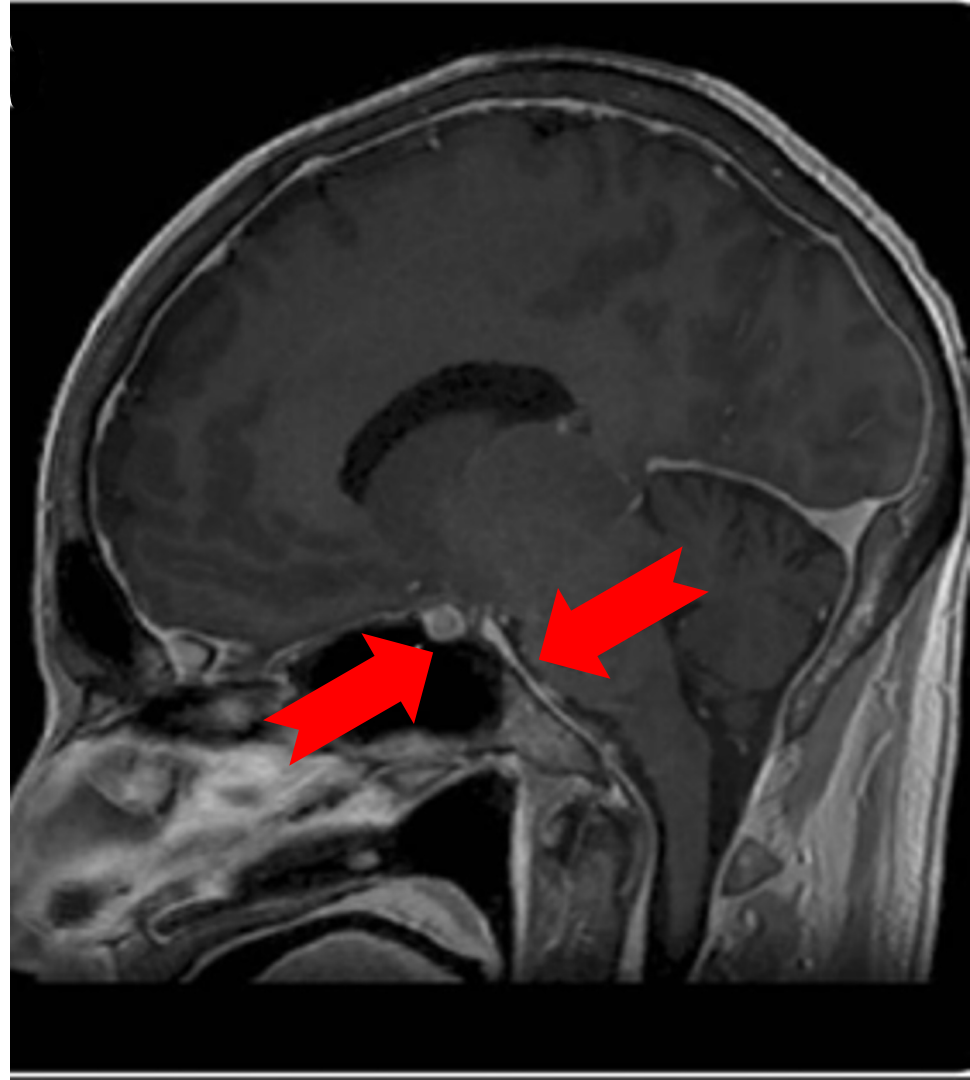
## Brain MRI -SEEPS

- **P**ituitary hyperemia  
*- been described as a cardinal feature  
of spontaneous intracranial hypotension*



## Brain MRI -SEEPS

- Effacement of **s**ubarachnoid spaces -due to loss of cerebrospinal fluid buoyancy and may be accompanied by ventricular collapse



# Spine MRI

- Bone spurs





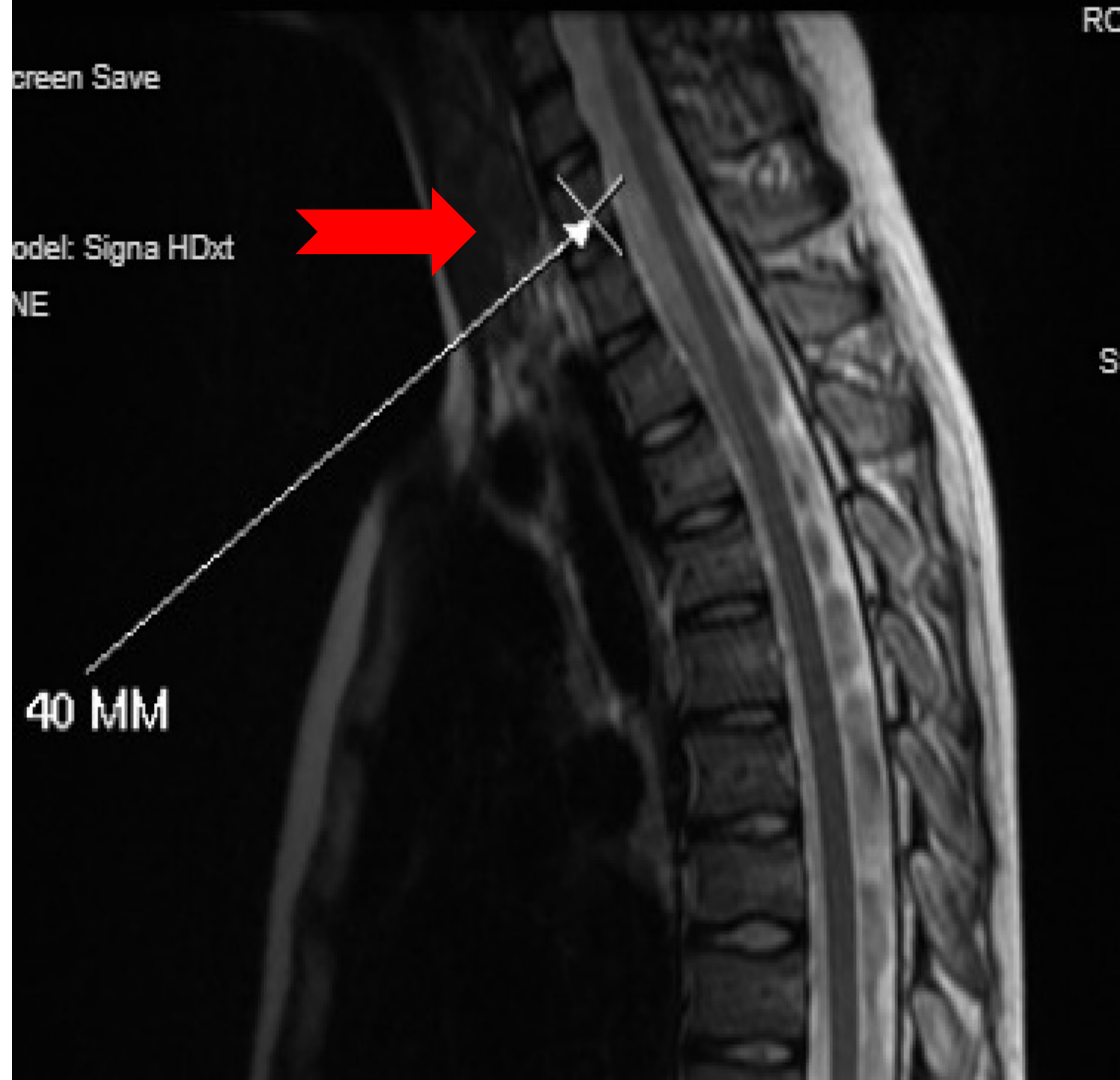
- Epidural CSF collection





- Dural Ectasia

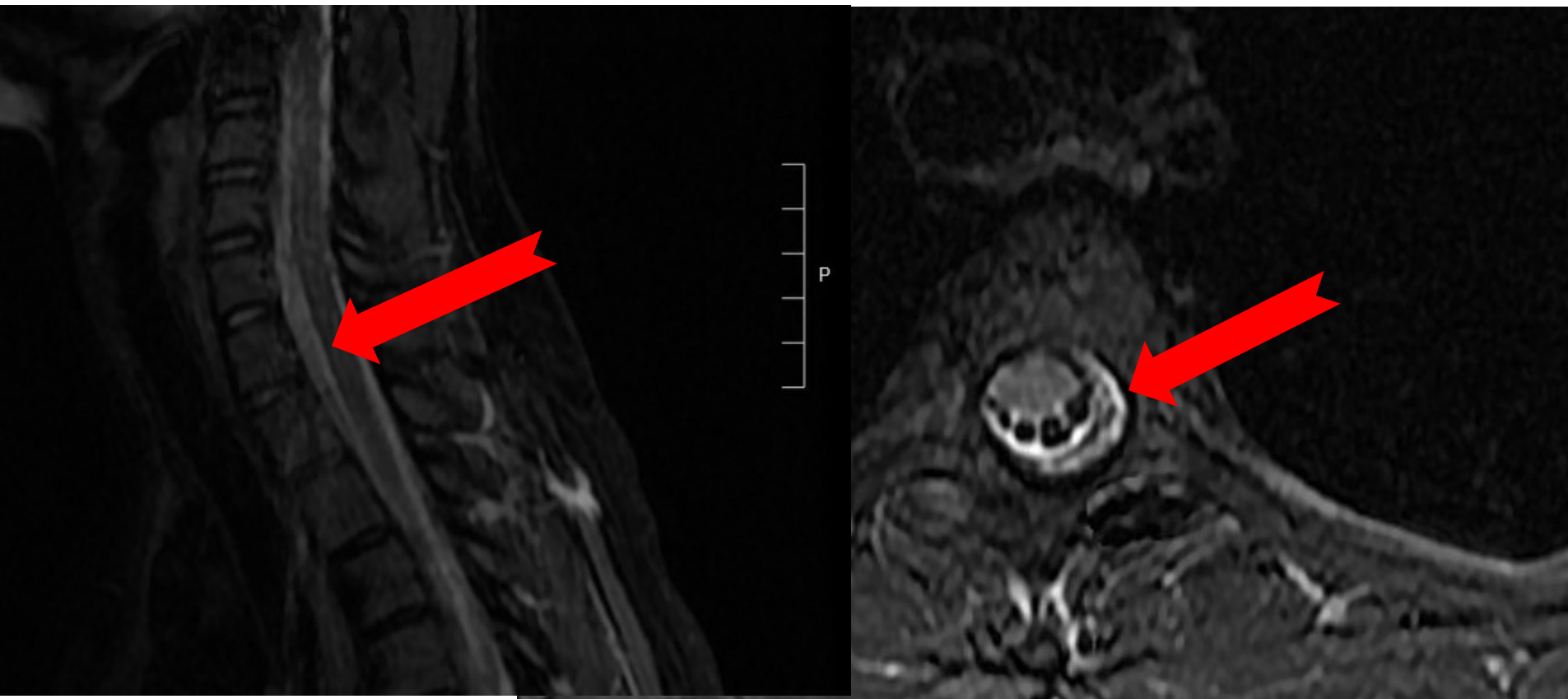
- ballooning or widening of the dural sac and is associated with herniation of nerve root sleeves



- Spinal anomalies-  
Tarlov's cyst,  
meningeal diverticuli  
etc



Orthostatic hypotension symptoms developed after concussion when patient hit in the head with a volleyball twice. Arrow shows Epidural CSF collection.





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