

# Pneumatocele, Pneumocephalus or Aerocele

## Pneumatocele, Pneumocefalo ou Aerocele



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**Palavras-chave:** Fracturas Cranianas; Hematoma Subdural Pneumocefalia; Trepanação

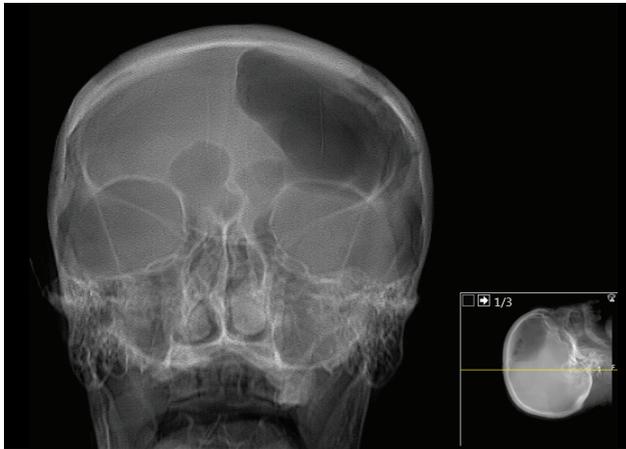


Figure 1 – Radiography image of the computerized tomography with the hypertransparency on the left side of frontal image

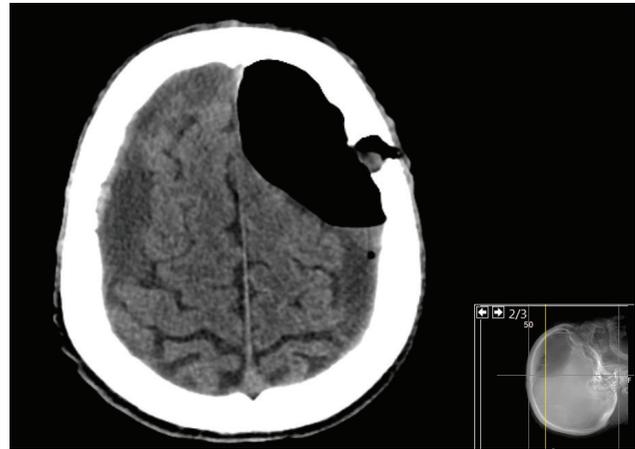


Figure 2 – The computed tomography image show the air with its very low density, compressing, deforming and collapsing the left lateral ventricle, showing the dehiscence of frontal surgical wound

An 85 year-old man with head trauma, complicated by bilateral fronto-temporal subdural hematoma was subjected to drainage by trepanation, without neurological sequelae.

One month later, he was re-admitted in the emergency department with gradual deterioration of his neurological state. Clinically, he had a Glasgow coma scale of 9 points (E2M5V2). Head tomography revealed a large left frontal epidural pneumatocele with 45 mm of maximum thickness causing mass effect (midline deviation of 6 mm), and in particular, deforming and collapsing the left lateral ventricle (Fig.s 1 and 2).

A dehiscence of the frontal surgical wound was

confirmed, leading to neurosurgical debridement and closure. A positive recovery was observed.

The presence of gas or air in any intracranial compartment it is called pneumatocele, pneumocephalus or aerocele; it can be extra-axial (epidural, subdural, subarachnoid) or intra-axial (parenchymal, intra-ventricular, intra-vascular).<sup>1-3</sup>

It is most commonly encountered following trauma or surgery and is rarely associated with infections and tumors.<sup>1-3</sup>

It can be fatal if not treated properly.<sup>1-3</sup>

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### PROTECTION OF HUMANS AND ANIMALS

The authors declare that the procedures were followed according to the regulations established by the Clinical Research and Ethics Committee and to the Helsinki Declaration of the World Medical Association.

### DATA CONFIDENTIALITY

The authors declare having followed the protocols in use at their working center regarding patients' data publication. Informed consent was duly obtained from the patient.

### CONFLICTS OF INTEREST

All authors report no conflict of interest.

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