

Dural metastasis of prostate adenocarcinoma with spontaneous subdural hematoma: an unusual mimicker of meningioma

Metástase dural solitária de adenocarcinoma de próstata mimetizando meningioma: disseminação incomum de uma neoplasia frequente

Marianna CIONI¹, Mateos BOGONI¹, Carolina CHOMISKI¹, Laura MASCHKE¹, Marco Aurélio Soato RATTI¹, Bernardo Corrêa de Almeida TEIXEIRA

A 65-year-old male presented with abrupt onset of right hemiparesis. He was previously diagnosed with advanced adenocarcinoma of the prostate. Magnetic resonance imaging showed an extra-axial expansile lesion, located in the left perirolandic region associated with a nontraumatic subdural hematoma. Histopathology and immunohistochemistry of the lesion revealed metastatic prostate adenocarcinoma (Figure 1 and 2).

Dural metastasis from prostate adenocarcinoma is a rare condition, responsible for 1% of all cases¹. Pathogenetic mechanisms include hematogenous spread and surgical seeding². A dural metastasis usually presents as a solitary mass with avid contrast enhancement. Bone erosion and nontraumatic subdural hematoma may rarely be seen³.

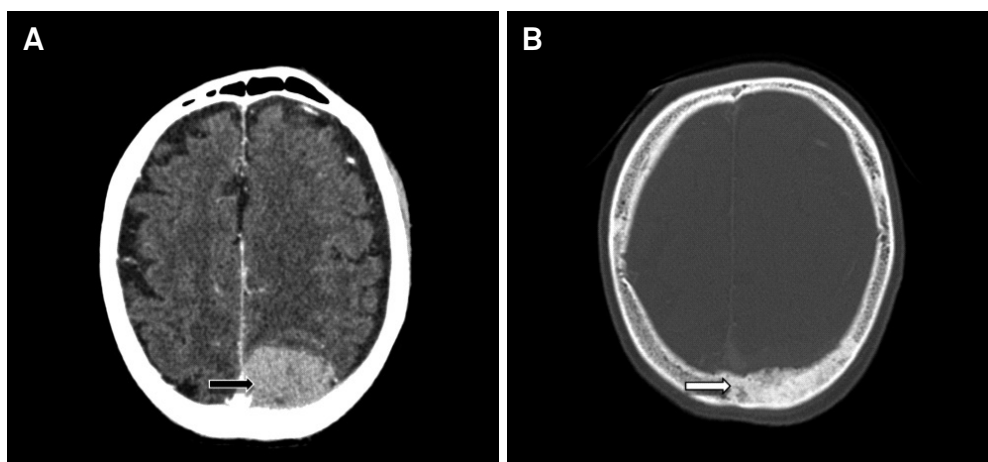








Figure 1. Computed tomography shows an oval extra-axial lesion (black arrow) on the left parietal convexity, with intense and homogeneous enhancement in the post-contrast phase (a). Note the sclerotic bone associated (white arrow), suggesting osseous infiltration (b).

¹Complexo Hospital de Clínicas do Paraná, Curitiba PR, Brasil.

Marianna Cioni  <https://orcid.org/0000-0001-5907-1477>; Mateos Bogoni  <https://orcid.org/0000-0002-3892-3455>; Carolina Chomiski  <https://orcid.org/0000-0002-2163-5588>; Laura Maschke  <https://orcid.org/0000-0003-0169-4246>; Marco Aurélio Soato Ratti  <https://orcid.org/0000-0002-1134-084X>; Bernardo Corrêa de Almeida Teixeira  <https://orcid.org/0000-0003-4769-6562>

Correspondence: Marianna Cioni; Rua Amintas de Barros, 240 – Centro; 80060-205 Curitiba PR, Brasil; E-mail: mariannacioni@gmail.com

Conflict of interest: There is no conflict of interest to declare.

Received 28 November 2018; Received in final form 05 February 2019; Accepted 20 March 2019.

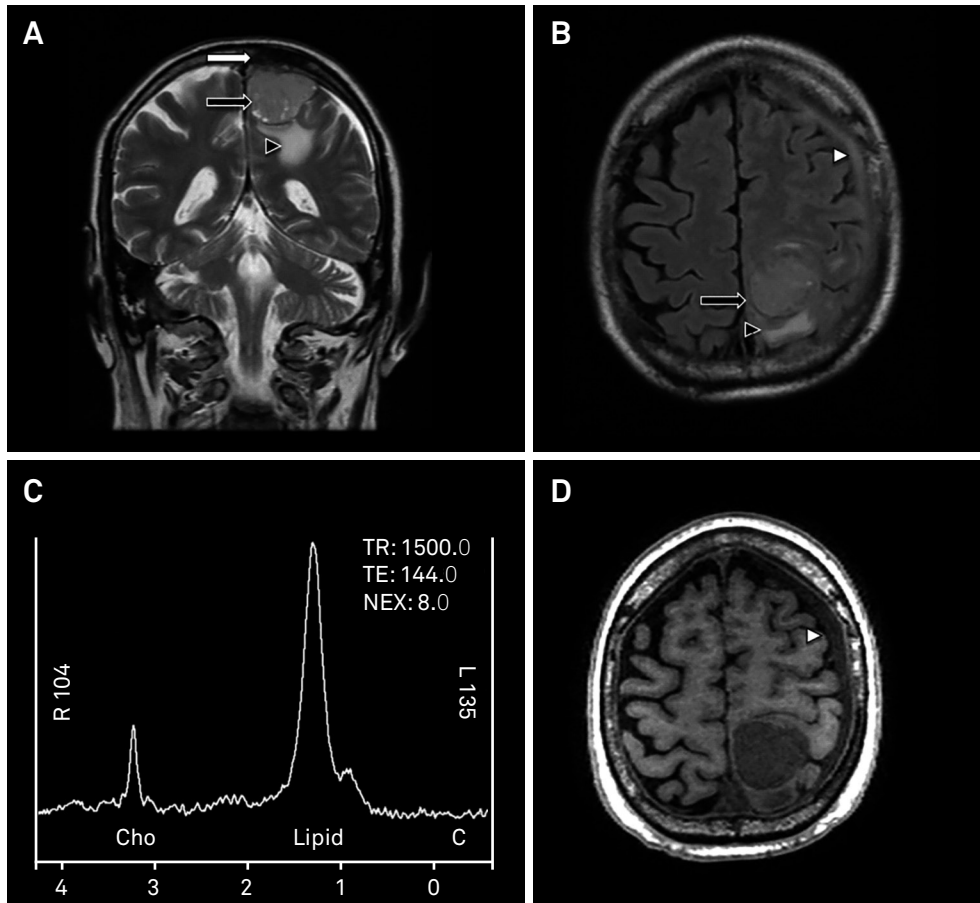


Figure 2. Magnetic resonance shows left periorbital extra-axial expansile lesion (black arrow), hyperintense in T2-weighted images, associated with vasogenic edema (black arrowhead) and with sclerotic adjacent bone (white arrow) (a, b). Single-voxel proton spectroscopy showed absence of NAA and creatine peaks with increased choline (Cho) and large lipid/lactate peaks, suggesting metastatic origin (c). Also note left subdural hematoma (white arrowhead) (b, d).

References

1. Guedes BDVS, Rocha AJ, Gama HPP, Silva CJ. Dural metastases from prostate carcinoma: A systematic review of the literature apropos of six patients. *Eur J Radiol.* 2011;80(2):236-40. <https://doi.org/10.1016/j.ejrad.2010.06.007>
2. Lath CO, Khanna PC, Gadewar S, Patkar DP. Intracranial metastasis from prostatic adenocarcinoma simulating
3. a meningioma. *Australas Radiol.* 2005;49(6):497-500. <https://doi.org/10.1111/j.1440-1673.2005.01473.x>
3. Smith AB, Rushing EJ. From the radiologic pathology archives: mass lesions of the dura: beyond meningioma: radiologic-pathologic correlation. *RadioGraphics.* 2014 Mar-Apr;34(2):295-312. <https://doi.org/10.1148/rg.342130075>