Conclusions: CS, especially if it is > 90 %, can alter CTP parameters. This should be taken into consideration for its right interpretation.

C0079 False ischemic penumbras in CT brain perfusion studies

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Introduction/Objectives: CT brain perfusión studies allows calculation different parameters for differentiating between an ischemic penumbra, which might benefit from intravasculaer therapy with trombolytic agents, and infartec tissue, which would not benefit from such therapy.

The are diffent possible causes of false penumbras, each of which produces a different pattern at imaging: upstream flow restiction, evolution of ischemic change, vascular disregulation, positioning of the patient's head at an angle during image adquisition and variant anatomy in the circle of Willis.

Materials and Methods: Retrospective study in patients with acute stroke with CT brain perfusión study.

Results: From July 2012 to April 2015, CT brain perfusión was performed in 105 patients. Mean age 69,62, SD 13,94 years; 48,70% men and 51,3% women.

48,7% of the patiens presented ischemic penumbra and infarcted tissue and in 49,57% the was no penumbra. 2% of the cases were missed due to movement or technique failure.

In 6 patients (5,71%) CT brain perfusión showed false ischemic penumbra: 3 due to upstream flow restiction, 2 due to evolution of ischemic change and in 1 patient due to vascular disregulation (HANDL).

Conclusions: Identification of false positive results of CT perfusin imaging may help reduce morbidity related to unnecessary administration of thrombolytic agents.

Best AC, Acosta NR, Fraser JE, Borges MT, Brega KA, Anderson T et al.

Recognizing false ischemic penumbras in CT brain perfusion studies. Radiographics 2011, 32(4):1179-96.

C0081 Acute medullary compression on call

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Introduction/Objectives: In disorders affecting the spinal cord, Magnetic Resonance (MR) is the main character, being spinal cord compression its main indication in emergency.

The compression pathology of the spinal cord is a very serious problem that requires special attention and an accurate and quick diagnosis to prevent any irreversible cord damage

Materials and Methods: A set of cases with spinal cord compression has been reviewed to see the main indications of urgent MR when you are on call, what the indicated sequences are and what are you looking for when you have one of this cases on your hands.

Results: Sudden onset of acute myelopathy is caused most of the times by a traumatism, by displacement of one or more bone fragments into the medullary canal; discal hernias are another common cause, seeing the protruding disc fragment compressing the medulla, and, other subacute pathologies like the abscesses, infectious diseases and the neoplasias are other habitual causes in the acute radiology.

Vascular etiology must be taken into account to find a right differential diagnosis.

A good physical exploration and a right anamnesis are necessary to help the radiologist to detect possible lesions, as most of them, if not detected early, could become a bad forecast. It is necessary know "what" and "where" to look, and clinical symptoms are fundamental for that.

Conclusions: Facing any medullary syndrome it is necessary to determinate time of evolution, guide the possible etiology and define the lesion level.

In medicine, findings may be unpredictable, and the radiologist must be prepared to see a quite broad spectrum of pathologies and to be able to detect the lesion, identifying the compressive damage that needs urgent radiotherapy or surgery because time, in this kind of pathologies, may change the life of the patients.

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