شبكة المعلومات الجامعية

بسم اللّه الرحمن الرحيم

شبكة المعلومات الجامعية

التوثيق الالكتروني والميكروفيلم

شبكة المعلومات الجامعية

جامعة عين شمس

التوثيق الإلكتروني والميكروفيلم

قسم

نقسم باللّه العظيم أن المادة التي تم توثيقها وتسجيلها علي هذه الأقراص المدمجة قد أعدت دون أية تغيرات

يجب أن

تحفظ هذه الأقراص المدمجة بعيدا عن الغبار

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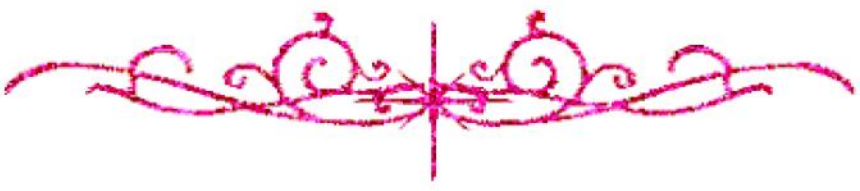
بعض الوثائق الأصلية تالفة



بالرسالة صفحات
لم ترد بالأصل

Role of Diffusion Weighted MRI in Evaluation of Mediastinal Masses

Thesis

Submitted for partial fulfillment of M.D in Radiodiagnosis

Presented by

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Role of Diffusion Weighted MRI in Evaluation of Mediastinal Masses

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Abstract:

Purpose: Diffusion-weighted imaging is a fundamental tool integrated in MR protocols useful in differentiating benign from malignant mediastinal masses, assessing mediastinal lymphadenopathy and investigating central bronchogenic carcinoma. This method is an excellent alternative to CT or PET/CT in the investigation of mediastinal masses. Current applications of diffusion MRI in malignancies include monitoring the treatment response and detecting recurrent cancer.
Aim of the work: This study aims to assess the value of using MRI diffusion in differentiating benign and malignant mediastinal masses, differentiating central masses from post obstructive collapse and differentiating lymphoma versus sarcoidosis.
Patients and methods: This study included 30 patients; 16 males and 14 females in the period from June 2013 to July 2014. The mean age was 49.3 ± 16.85 (range: 22–82 years).
Cases were referred for MRI assessment and were approved by the ethical committee in our department.
The complaints varied between dyspnea, chest pain, cough, hemoptysis, fatigue and loss of weight. A superconducting 1.5 T MRI machine with a four-channel body phased-array coil was used for the examination.
Biopsy and histopathological assessment was done after that.
Results: MRI examination with diffusion imaging was able to differentiate between benign and malignant mediastinal and hilar lesion confirmed by the biopsy and histopathology.
Conclusion: MRI with diffusion weighted images can detect and stage lung cancer, differentiate benign from malignant mediastinal masses and differentiate lymphoma from sarcoidosis in mediastinal/hilar lymphadenopathy.

Keywords: Diffusion-weighted (DW) MRI, mediastinal masses, benign and malignant lesions.

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