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**THE USE OF ULTRASOUND IN PULMONOLOGY EXAMITATION**

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An ultrasound scan called sonography is an imaging method that uses high-frequency sound waves to produce precise images of structures within the the body . Lung sonography is an emerging and useful technique in the management of some pulmonary diseases. Many years ago sonorgraphy of the thorax was limited to the study of the pleural effusion and thoracic superficial masses because alveolar and bones of thoracic cage limit the propagation of the ultrasound beam. Recently it was found out that lung sonography is highly sensitive to variation of pulmonary content and balance between air fluids.

Pulmonary ultrasound can be used to detect:

– pulmonary congestion;

– acute pulmonary embolism;

–pulmonary edema;

– interstitial syndromes;

– pneumothorax;

– pneumonia;

– chronic obstructive pulmonary diseases;

– hemothorax;

– peripheral abscess;

* tumors.

Ultrasound can be also used to guide the needle during thoracentesis or biopsy. Ultrasound technique is non invansive (the skin is not cut or pierced) therefore its not painful. Risks are minimized since there is no use of radiation. Severe obesity may interfere with the chest ultrasound.

Procedure: the patient is asked to remove clothes jewelry or any other objects that may interfere with the scan. Examination is usually done in lying position back or side depending o the specific area to be examined. A clear gel will be placed on the skin over the area to be examined , the transducer will be placed in this area moving in the area to be studied. After the procedure the gel is then wiped off. Generally there is no special care following ultrasound chest scan.