

# Concurrent validity of radiography and ultrasound examination for the diagnosis of aortic aneurisms in Albanian patients

Ilirian Laçi<sup>1,2</sup> and Alketa Spahiu<sup>2</sup>



## ABSTRACT

**Aim:** The aim of our study was to assess the concurrent validity of radiography and ultrasound examination among patients diagnosed with aortic aneurisms in Albania, a transitional country in South Eastern Europe.

**Methods:** This study included 75 consecutive patients diagnosed with aortic aneurisms (thoracic and/or abdominal) admitted at the University Hospital Centre “Mother Teresa” in Tirana during 2012-2014 (56 men and 19 women). For each patient, computerized tomography (CT) scan with contrast was used to confirm the diagnosis of aortic aneurisms. In addition to the CT scan (“gold standard” for the diagnosis of aneurisms), in 37 patients, radiography and ultrasound examination were simultaneously performed in order to assess the validity of these techniques. Furthermore, demographic data and other relevant clinical information were collected for each study participant.

**Results:** In 18 patients with thoracic aneurisms pertinent to ascendant aorta where radiography and ultrasound were simultaneously performed, ultrasound was able to diagnose 5 (27.8%) cases which were not detected through radiography ( $P=0.038$ ). Conversely, in 16 patients with abdominal aneurisms where radiography and ultrasound were simultaneously performed, ultrasound was able to diagnose 4 (25.0%) cases which were not detected through radiography ( $P=0.034$ ). The remaining three patients diagnosed with thoracic-abdominal aneurisms were not detected either by ultrasound examination or radiography.

**Conclusions:** In this sample of Albanian patients diagnosed with aortic aneurisms ( $N=75$ ), overall, 9 (24.3%) subjects were detected through ultrasound examination but not radiography ( $P<0.001$ ). Findings from this study provide valuable clues about the concurrent validity and predictive value of these two key examinations for the diagnosis of aortic aneurisms.

## BIOGRAPHY

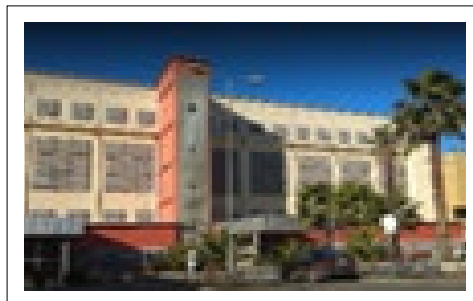
Ilirian Laçi completed his PhD on 2016 in University of Medicine Tirana, Albania. He is the lector at University of Medicine Tirana, Albania, consultant radiologist at Mother Theresa University Hospital Center and Villa Maria Hospital Tirana, Albania. He is focused in interventional radiology and nuclear medicine too. He has a long experience (8 years) in emergency medicine, BSL and ACLS. He over 30 publications and referatons in Albania and in other countries

## PUBLICATIONS

Ilirian Laci, Alketa Spahiu. Concurrent validity of radiography and ultrasound examination for the diagnosis of aortic aneurisms in Albanian patients. 2016. South Eastern European Journal of Public Health.

Ilirian Laçi, I. Manea, M. Matei, et al. C98 unilateral versus bilateral varicocelethomy there is any difference? 2010. European Urology Supplements.

Ilirian Laçi, Violeta Hoxha, et al. Microalbuminuria, arterial hypertension and type 2 diabetes mellitus: pp.17.132. 2010. Journal of Hypertension



World Congress on Health and Medical Science, Webinar | June 17, 2020

<sup>1</sup> University of Medicine, Albania, <sup>2</sup> Mother Theresa University Hospital Center, Albania

Citation: Ilirian Laçi, Concurrent validity of radiography and ultrasound examination for the diagnosis of aortic aneurisms in Albanian patients, World Congress on Health and Medical Science, Webinar, June 17, 2020, 04