## Ultrasonography courses for medical students organized by "Iuliu Hatieganu" University of Medicine and Pharmacy and SRUMB (The Romanian Society of Ultrasonography in Medicine and Biology)

## - A project that seems to be successful. Should it be continued?

The vision of the European Federation of Societies for Ultrasound in Medicine and Biology, on the medium and long term, is to implement ultrasonography as a basic educational and clinical diagnosis instrument for medical students.

The results obtained until now show a rather inconsistent and incoherent teaching of ultrasonography in the European medical schools. There is an obvious lack of vision on this aspect even though there is a consensus regarding the value of ultrasonography in the teaching of various disciplines (anatomy, physiology, physiopathology and semiology) as well as in completing the diagnosis algorithm (clinical applications in different specialties and medical emergencies) [1-8].

Such a project could take many directions. The Romanian Society for Ultrasonography in Medicine and Biology - SRUMB (www.srumb.ro), taking advantage of an experienced and dedicated academic team, but also of a newly improved laboratory, equipped with simulators developed by the "Iuliu Hatieganu" University of Medicine and Pharmacy, has initiated basic courses for students as part of its national conferences – as far as we know this idea has an innovative character. The project started in 2012 on the occasion of the XVth National Conference of the Romanian Society and of the Ist Symposium of Medical Education using Ultrasonography which took place in Cluj-Napoca during 31st May - 2nd June 2012 and continued with the IInd edition, as part of the XVIth Ultrasonography conference which recently took place in Oradea (30th May -1st June). Why "Iuliu Hatieganu" University of Medicine and Pharmacy? Because in this school of medicine there are consistent preoccupations focused on educational activities using ultrasound [2, 9-12]. Why in association with the national conference? Because this kind of manifestation in Romania is usually organized in university centers where there







are medical schools and because in the last years (at least the ones in Cluj and Oradea) they were organized with the support of the students' organizations. Also because they were easy to organize using the local academic team and having a direct relationship with the exposition of the ultrasound machines which is usually present at such events. The events also benefited from the support of the local dealers of the name brands (in these situations equipment from Phillips was used) and the students were able to learn using simulators.

The courses were organized requiring preregistration, the applications being closed much earlier than those of the physicians, and the promotion of the courses was handled by the students' organizations. In both editions of the conference, the number of participants was limited to 75, thus granting each student the opportunity to practice the ultrasonographic technique on an ultrasound machine.

The coordinators of the courses were Dr. Monica Platon–Lupsor from "Iuliu Hatieganu" University of Medicine and Pharmacy, Cluj-Napoca and Dr. Alina Venter (Oradea) for the abdominal ultrasonography section and Dr. Sorin Pop ("Iuliu Hatieganu" University of Medicine and Pharmacy, Cluj-Napoca) and Dr. Dan Sirca (University of Medicine, Oradea) for the vascular and cardiac ultrasonography section. A distinct area equipped with a projector for the theoretical part (figure 1) and mannequins and portable ultrasound machines (figure 2, 3) was available each time.

The level of training was basic, the educational objectives being focused on the "stimulation" of the students' interest regarding the use of this method. The whole length of the course was 8 hours and consisted of basic theoretical ultrasonographic concepts (the appearance of the portable equipment, the kind of information it can provide, minimal knowledge about the manipulation of the machines, the normal aspect of the abdominal organs, heart and great vessels) and real-time examinations performed on a on a real subject and on a simulator, always assisted by a coordinator.

Questionnaires were administered after each course and their results indicated that the students appreciated the organization of this course as part of the conference and considered useful the short presentation of the theoretical part and even more the "hands-on" sessions. All the students considered useful the organization of such a course in each ultrasonography conference and suggested a longer period for the course (2 days instead of 1).

We consider that this model of implementing basic ultrasonographic knowledge is useful for medical students. There is an obvious collegial closeness between the students and the residents and specialists. The interest of the students is due to the applicable character of this diagnosis procedure which makes it easy for them to learn. The professional societies should therefore be more involved in promoting ultrasonography among students. SRUMB will continue this practice during its conferences in the following years – in Timisoara in 2014 and Constanta in 2015.

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