

A new social role for medical physicists: the Italian Association of Medical Physics (AIFM) free web section 'Ilfisicomedicorisponde' to convey clear and scientific information to public

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INTRODUCTION

Evolution in European and American legislations and scientific initiatives, such as IAEA_Rpop, Image Wisely, and Image Gently, are leading to a new multidisciplinary approach in radiology, and to an increase in patient awareness. In this scenario, there is a need of a new social role for medical physicists. This work describes the Italian Association of Medical Physics (AIFM) 'Ilfisicomedicorisponde' ('themedicalphysicistanswers') project, started in October 2013, with the goal to make medical physicists' expertise and experience on quality and safety in medical radiation exposure easily available to the public.



Figure 1.

'Ilfisicomedicorisponde' section in the AIFM website

METHODS

A 'Ilfisicomedicorisponde' section (Fig. 1) has been created in the institutional AIFM website (http://www.fisicamedica.it/). Through the section, patients or healthcare professionals can ask questions related to dose issues, radiation risk, etc. The project team (editorial board) is composed of nine AIFM member groups, each coordinated by two supervisors with consolidated experience in different medical physics fields (radiology, radiotherapy, nuclear medicine, NIR, CEM, pregnancy and pediatrics, energy, HTA). FAQs for radiation protection in medicine and environment have been implemented, as well as a forum for open discussion. Email address (ilfisicomedicorisponde@gmail.com) is also available

for patients that want to ask question privately.

Editorial Board coordinators and number of members

Administrators: Dr. Lorenzo Bianchi, Dr. Stefania Delle Canne;

Radiology (17 members): Dr. Paola Bregant, Dr. Andrea Nitrosi Radiotherapy (20 members): Dr. Carlo Cavedon, Dr. Cinzia

Mordacchini

Nuclear Medicine (7 members): Dr. Claudio Traino, Dr. Orazio

Zoccarato

MRI (14 members): Dr. Danilo Aragno, Dr. Faustino Bonutti Miscellaneous (US, Wi-Fi and Laser, 4 members): Dr.

Francesco Frigerio

Pregnancy and Pediatrics (11 members): Dr. Vittorio Cannatà, Dr. Piero Feroldi

Electromagnetic Fields (12 members): Dr. Luigi Spiazzi, Dr. Piero Feroldi

Energy (5 members): Dr. Giuseppe Scalzo, Prof. Giancarlo Gialanella

Health Technology Assessment (2 members): Dr. Stefania Maggi, Dr. Lamberto Widesott

RESULTS and CONCLUSION

More than 10,000 web visits in the last five months (45% related to Wi-Fi field), and about 60 (60% related to pregnancy or pediatric exposure, 5-15% other topics) email contacts in the last year have been recorded. For questions related to medical issues (anesthesia, justification, etc.), and environmental issues (electromagnetic fields), to which it is not possible to answer as a medical physicist, a virtuous collaboration with radiologists and environmental experts has started. Figure 2 shows how the forum has led to an exponential growth of section notoriety: questions received after its launch, one year ago, are considerably higher than those received over two years by email. Table 1 lists topics of public greatest interest, based on five months recorded visits.

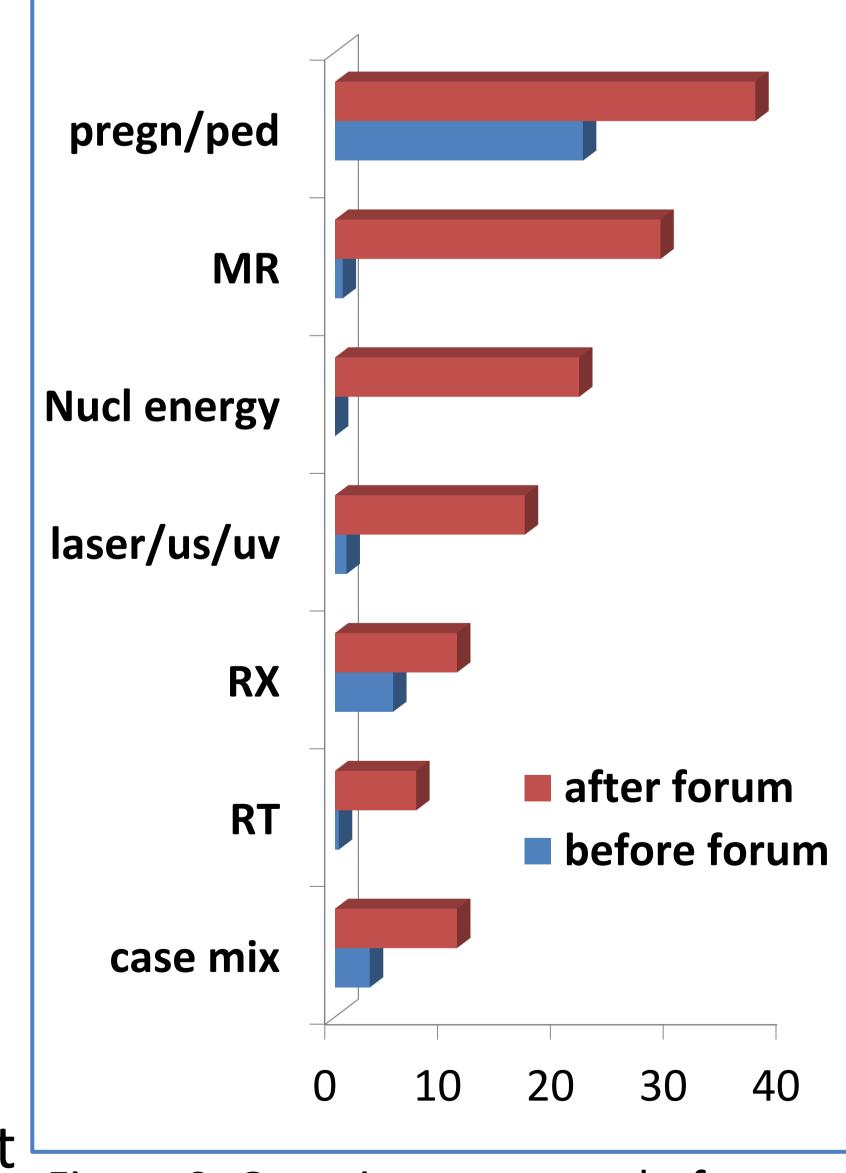


Figure 2. Questions per year before and after forum introduction

Topics	Question	5 months web visits
WIFI	Are WiFi systems used in house dangerous?	4601
Radiation and -Pregnancy -Children	Radiography in Pregnancy	1048
	Nuclear medicine exams in pregnancy or lactation	673
	Mammography in pregnancy	647
	Radiations hazards	602
	Radiation-induced effects in children	588
	Low dose exposures	564
	Ultrasound during pregnancy	504
NUCLEAR ENERGY	Fukushima, radiation hazard, Italy, environment	997
	Radioactive waste	652
RADIOLOGY	What are ionising radiations?	831
US and LASER	Ultrasound and Blood Coagulation	698
HTA	What's HTA?	582
US	How are ultrasound used in medicine?	549

Table 1. Topics of greatest interest based in five months recorded visits

The public interest in the project has recently prompted the AIFM to inaugurate a new section, addressed to members, called 'medical physicists learn to answer.' This section provides insights into the topics of medical physics that are of greatest interest to the population and represents an useful mean to disseminate scientific culture and updating within the medical physicists community.

Ilfisicomedicorisponde project helps to convey clear but scientific information to the public, giving the opportunity to better understand issues that sometimes may be the cause of anxiety and fear due to missing, wrong or superficial information.

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