



# Turf Wars in Radiology: How They Affect Lithuania

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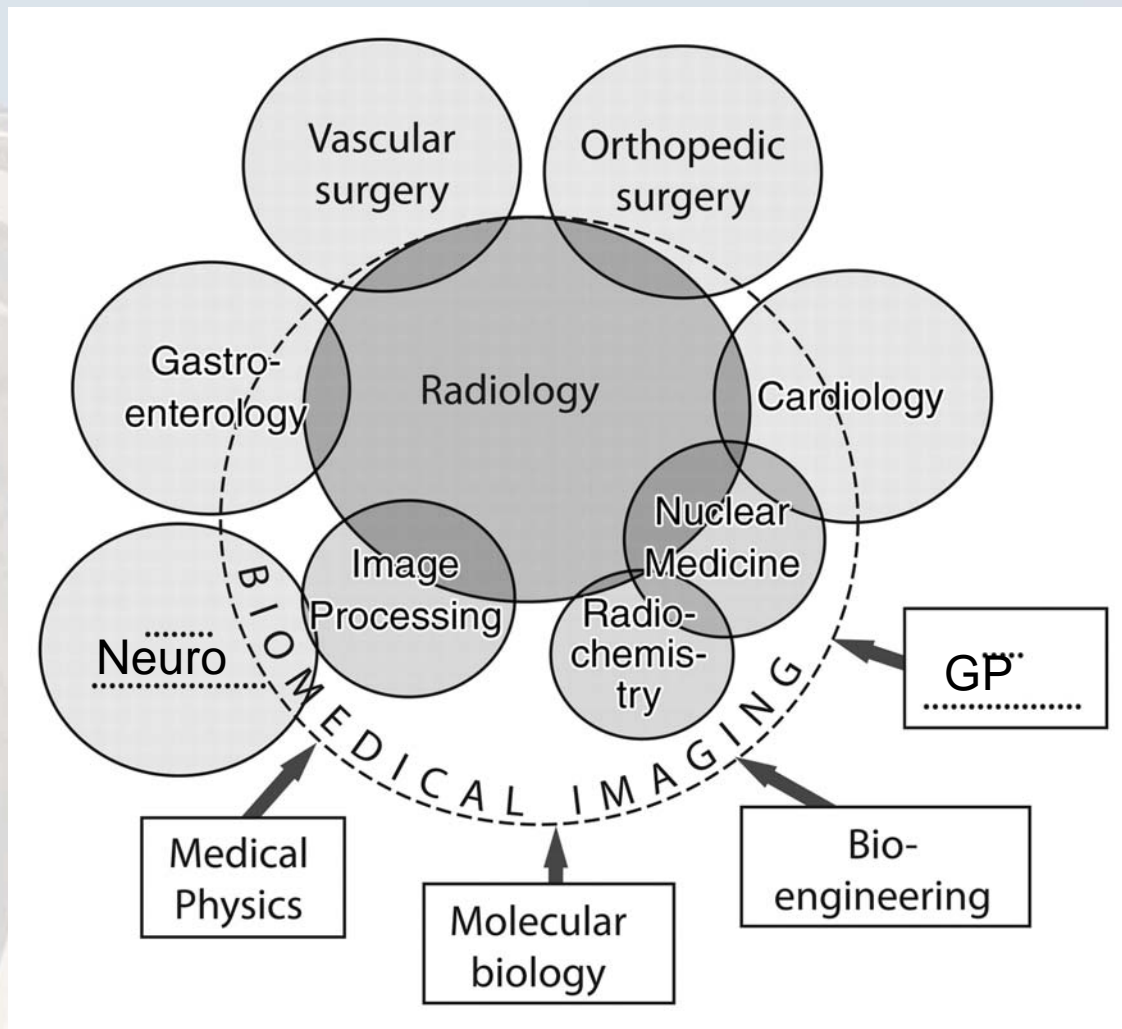
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*BCR 2010*



## Consolidated biomedical imaging facility.



Krestin G P Radiology 2009;250:612-617

*BCR 2010*

Radiology

VU, MF, VULSK



# Imaging Facilities/Equipment

- **X-rays 427**
  - Mammos 24
- **US -above 1'000**
  - **VULSK** -approx 40
  - DR -1
    - Fluoroscopy -2
    - CR -5
  - MR 1,5T -2      WS -2
  - CT -3(5 in 2011)      WS -7
  - SPECT -1
  - SPECT/CT 1 (end 2010)
  - Angio 6
    - Hybrid -1
- **CT -50 (16+ -15)**
  - Pvt -6
- **MR 16 (9 -1,5T)**
  - Pvt -9 (5 -1,5T)
- **Angiography units -20**
- **SPECT/CT -3**
- **SPECT -2**
- **PET/CT -0**
  - 2012/13 -2
- **PET/MR -0?**



# Professional Societies

- **Europe** 50(EU-27)/830.5 mln
- **ESR** 68/47'000
  - CIRSE
  - ESCR
  - ESGAR
  - ESNR
  - ESPR
  - ESSR
  - ESTI
  - ESUR
  - EUSOBI
- **EANM** 35/3'000
- **EFSUMB** 30/20'000
  - **CARS** 45/1'500
- **Lithuania** 1/ 3.5 mln
- **LRA** -1/**313**
  - **LBMD** -12
  - **(L)UA** -58





“War is a dangerous place”

**George W. Bush**



# Definitions/Problem

- If people or organisations are fighting for control of something, it is a **turf war**.

» <http://www.usingenglish.com/>

– Self-referral

-RAD vs Clinician

- referral for a procedure in which the referring physician is also the service **provider**,
- or has an **ownership** interest and benefits financially by providing the service

– Multimodality imaging

-RAD vs NM

– Diagnostic Ultrasound

-RAD vs Clinician

– IT solutions

-RAD vs IT spc



# Self-referral

USA -1997 through 2006

- CT increased 14% per year
- MRI increased 26% per year

• LT -2005 vs 2009

- CT increased by 30%
- MR increased x5

• Over the 10-year period studied

- ultrasound increased by nearly 40%,
- CT doubled,
- MRI nearly tripled.

State Patients' Fund at the Ministry of Health, Lithuania, 2010

R. Smith-Bindman *Health Affairs, 2008*



# Self-referral: RAD vs Clinician

- **Radiologists -467 (353)**
  - US specialists fulltime - 110
  - RT -914
- **GP -2000**
  - US
- **Neurologists -630**
  - MRI
    - Cath
  - Carotid Duplex
  - TCD
- **Cardiologists -390**
  - MRI
  - CTA
    - SPECT
  - Cath
  - Echo





# Self-referral

- The argument for neurologist self-referral, then, is about providing patients the best quality of care
    - General radiologists billing for the professional, interpretative component of the MRI without the full level of expertise.
- “That's a needless waste of time, effort, and money”**
- Leon Prockop MD, University of South Florida

Imaging Economics, 2009



# Neurologists vs Radiologists

## September 2010

- Carotid US -422
  - WNL -240 (57%)
  - HS -26 (6.0%)
  - Insignificant disease -156
- Venous US -187
  - DVT -55 (30%)
  - WNL -132



# Multimodality imaging -RAD vs NM

- Reporting
  - SPECT/CT
  - PET/CT
  - PET/MR



# Multimodality imaging -RAD vs NM

## White paper of the European Association of Nuclear Medicine (EANM) and the European Society of Radiology (ESR) on multimodality imaging

Angelika Bischof Delaloye • Ignasi Carrió •  
Alberto Cuocolo • Wolfram Knapp •  
Nicholas Gourtsoyannis • Iain McCall •  
Maximilian Reiser • Bruno Silberman

Published online: 3 July 2007  
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*Aim* This paper sets out the positions and aspirations of the European Association of Nuclear Medicine (EANM) and the European Society of Radiology (ESR) working together on an equal and constructive basis for the future benefit of both specialties.

### Conclusion

This paper sets out the positions and aspirations of the EANM and the ESR working together on an equal and constructive basis.

Both organisations:

1. are committed to working together for the future benefit of both specialties;
2. recognise the importance of coordinating working practices for multimodality imaging systems;
3. recognise that undertaking the nuclear medicine and radiology components of imaging with hybrid systems requires different skills;
4. recognise the importance of adequate and appropriate training in the two disciplines in order to provide a proper service to the patient by using hybrid systems;
5. propose training models with the overall objective of providing opportunities for the acquisition of special competency certification in multimodality imaging;
6. plan to develop common procedural guidelines;
7. recognise the importance of coordinating the purchase and management of hybrid systems to maximise the benefits to both specialties and of ensuring appropriate reimbursement of these examinations;
8. will work with EIBIR to develop further research opportunities across Europe.



“I know the human being and fish can coexist peacefully”  
George W. Bush



# Multimodality imaging RAD vs NM

Eur J Nucl Med Mol Imaging (2008) 35:674–676

DOI 10.1007/s00259-008-0777-3

CONTROVERSY

## **EANM–ESR white paper on multimodality imaging. A white paper for a black project: towards the decline of nuclear medicine as an independent specialty in Europe?**

G. Karcher • C. Als • S. Goldman • O. Mundler •  
H. B. Sayman

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A tragic position paper entitled “White paper of the European Association of Nuclear Medicine (EANM) and the European

opinion, may well initiate nothing less than the decline of nuclear medicine as an independent specialty in Europe.



16-19 January 2010, Bad Hofgastein, Austria

– Session 4, 16:00 - 16:45

• **European Corner, Round Table Discussion: *The White Paper revisited***

– Chairman: A. Bischof-Delaloye (Lausanne)

– J. Czernin (Los Angeles),

– W.H. Knapp (Hannover),

– **C. Herold (Vienna),**

– C. Pirich (Salzburg),

– **M. Reiser (Munich)**

○ EANM and ESR agree that qualification for all components of multimodality imaging should be accessible on the basis of full qualification in either nuclear medicine or radiology.

○ The precondition should be **2 years'** training in the complementary specialty.

○ According to national regulations, 1 year of complementary training might be integrated in the primary specialisation.

○ The two societies also agree that the complementary training should only be acknowledged if it is received in a fully accredited institution for the complementary specialty.



# Multimodality imaging: RAD vs NM Solution in Baltics

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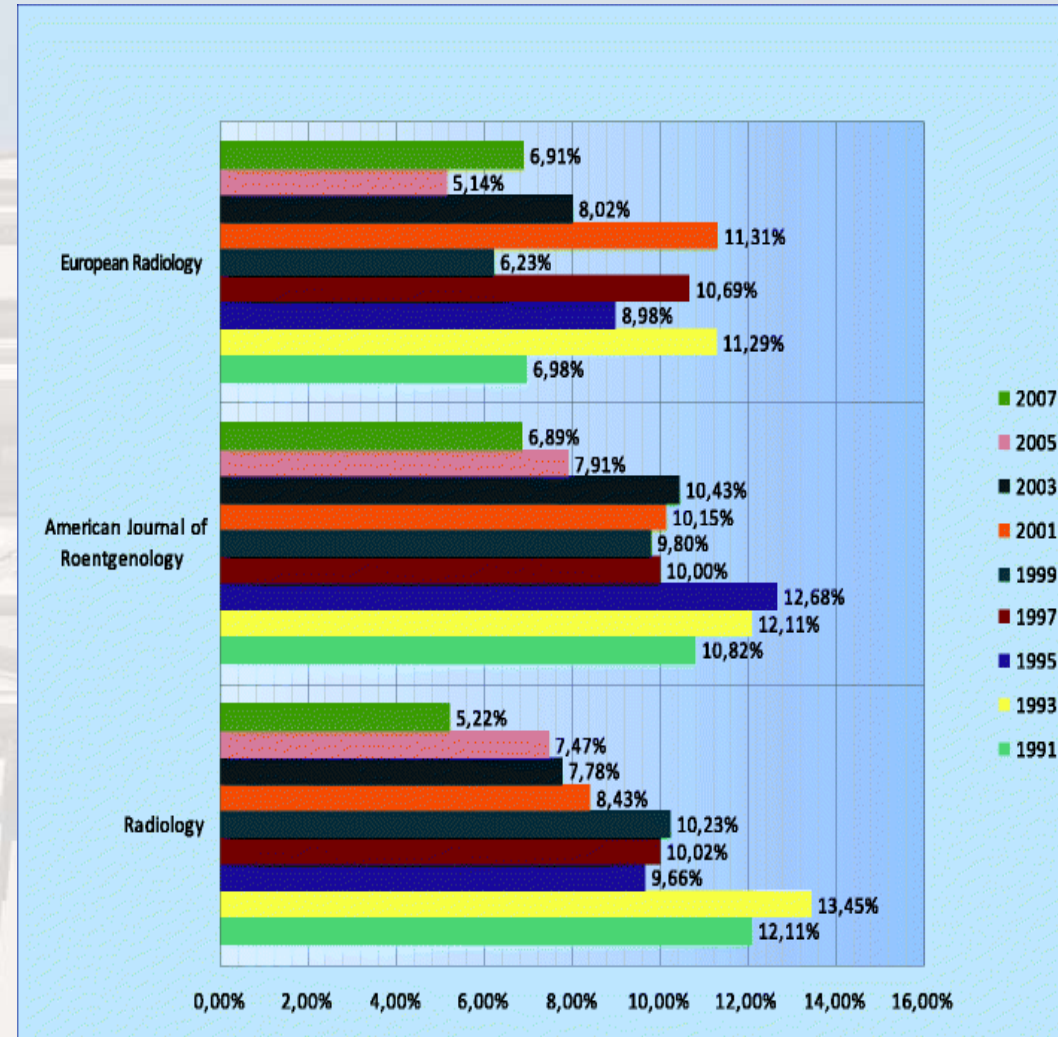




# Diagnostic Ultrasound

- “involvement of radiologists within research and practice of US is decreasing on both sides of the Atlantic, raising global concerns about the future of radiological US”

ME Lockhart ‘The role of radiology in the future of sonography’ AJR 2008  
E. Derchi, M.Claudon ‘Ultrasound: a strategic issue for radiology?’  
European Radiology 2009





# Diagnostic Ultrasound/ LT

- Separate speciality before 2004 :  
Echoskopija (Sonography)
    - **579** -NonRAD certified
  - Limited Medical Practice:  
Echoskopija (Sonography)
    - **Introductory Course** for License of Physician holders
  - Adominal– 6 weeks;
  - OB/GYN – 6 weeks;
  - Nephro/Urology – 6 weeks;
  - MSK – 6 weeks;
  - Small parts – 6 weeks
  - Breast – 6 weeks
  - Vascular – 6 weeks
- Except:
    - gydytojo radiologo,
    - gydytojo gastroenterologo,
    - gydytojo vaikų gastroenterologo,
    - gydytojo neurologo,
    - gydytojo vaikų neurologo,
    - gydytojo akušerio ginekologo,
    - gydytojo endokrinologo,
    - gydytojo vaikų endokrinologo,
    - gydytojo kardiologo,
    - gydytojo vaikų kardiologo,
    - gydytojo urologo
    - abdominalinės chirurgijos gydytojo
- **approx 40** -after 2004



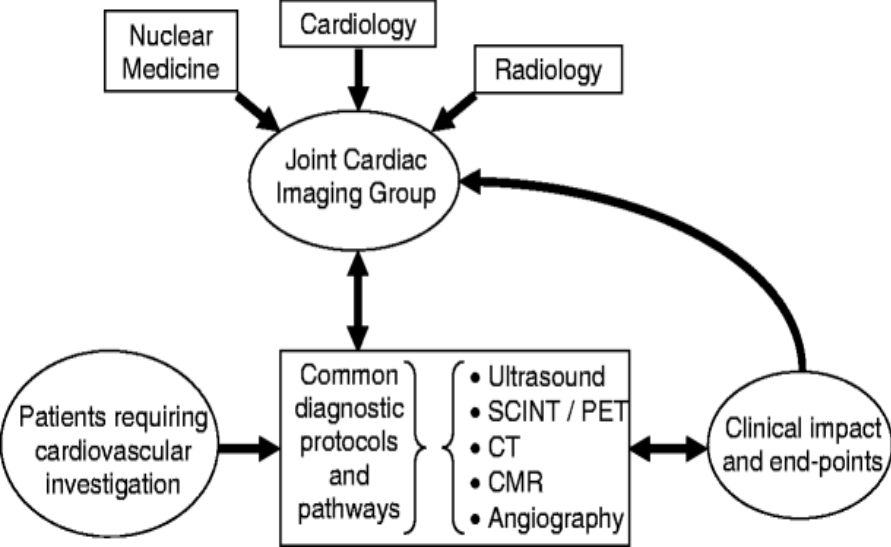
# Radiology vs Clinicians

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- US specialists -110
- RT -914
- GP -2000
- Neurologists -630
- Cardiologists -390



# Contribution to IT solutions

- Teleradiology – no legal background so far
  - Working group established in 2008
    - No activities since 2009
- MedDream



## The future of cardiovascular imaging and non-invasive diagnosis

A joint statement from the European Association of Echocardiography, the Working Groups on Cardiovascular Magnetic Resonance, Computers in Cardiology, and Nuclear Cardiology, of the European Society of Cardiology, the European Association of Nuclear Medicine and the Association for European Paediatric Cardiology

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## Conclusions

- Experts in different imaging modalities should collaborate not compete
- Joint clinical services and common diagnostic pathways should be developed
- Future diagnostic specialists should be trained in several imaging modalities
- Diagnostic tests should be evaluated by their impact on clinical outcomes
- Diagnostic guidelines should compare all methods that can be applied to a particular clinical question
- New criteria should be developed for judging the quality of diagnostic research
- Expertise in imaging should be encouraged and funded as an integral component of basic, epidemiological and clinical collaborative research networks



# Key to victory/survival

## Know our modalities better !!!



Thank You

"I have learned from mistakes I may or may not have made." George W. Bush