

EuroPACS Newsletter

Official newsletter of the EuroPACS Association



Volume 12, number 1
July 1999

EuroPACS Association

The objective of EuroPACS is promoting the exchange of information in the field of research for the benefit of the development and the use of digital systems for the acquisition, storage, transport, processing, display and reproduction of medical pictures (Picture Archiving and Communication systems, PACS in short)"

Article 3 of the articles of the Association

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EuroPACS Newsletter volume 12, number 1 July 1999

Contents

	page
Letter of the President	2
Editorial Comment	2
Program of EuroPACS'99	3
Conquest Hospital: business cases leading to a new managed DICOM/Intranet PACS service within an EPR.	5
EuroPACS Course	6
Mobile teleradiology	7
Next EuroPACS Meetings	8
Board Meeting 1999 - DRAFT	8
News on PACS	10

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Letter of the President

I was very encouraged to see the large audiences attending the EuroPACS sessions at CARS '99 in Paris in June, and their frequent enthusiastic participation in the discussions afterwards. The EuroPACS Society is growing rapidly, reflecting the exponential growth in expertise in this area.

The aim of EuroPACS is to provide a forum for all those interested in PACS, teleradiology and digital imaging, especially in Europe. The society welcomes members from all disciplines involved in these areas. The society aims to encourage research in PACS, teleradiology and digital imaging, and to promote the interchange of ideas and practical experience between those involved with PACS and its associated speciality areas; including integrating HIS, RIS, and EPR (electronic patient record) functions, and extending into the workflow and economic aspects of PACS.

The annual EuroPACS meeting provides an opportunity for more formal oral and poster presentations to be made on PACS-related subjects.

The society will aim to publish (electronically and in paper format) two newsletters per year. These will keep EuroPACS members in touch with one another between meetings, and publish PACS-related items of interest. As stated in the minutes of the recent EuroPACS Board Meeting (published in this newsletter) there is now the opportunity for EuroPACS members to place advertisements (200 Euros/issue)

in issues of the newsletter. EuroPACS members running courses may submit the content of their course to the EuroPACS Board. If approved by the Board, the members may describe their course as "approved by EuroPACS" and it will be displayed on the EuroPACS website (cost 200 Euros). Our webmaster, Dr Rolf Heckerman, has many new and exciting ideas for the EuroPACS website which we hope to be implementing over the coming year.

I look forward to seeing you all again at next year's EuroPACS meeting in Graz, Austria (September 21st – 23rd, 2000) if not before at other PACS-related or imaging meetings. Meanwhile go out and encourage all your friends and colleagues to join EuroPACS!

With best wishes

Dr Nicola H. Strickland

BM BCh, MA Hons (Oxon) MRCP
(UK) FRCR

President of EuroPACS Society

Editorial Comments

Dear readers,

starting from this issue, you will notice a new format and new sections of the Newsletter.

Contributions from EuroPACS Members, which were missing in the recent past issues, will be present again. We are focusing on a more professional and attractive publication, which may bring added value to all of you active in the PACS field.

Would you like to contribute?

Our new sections will encompass short scientific papers, work-in-progress papers, opinions, and industry and research notes from our audience.

The newsletter will recognize the current role of PACS as clinical tool in an increasing number of European hospitals and we will focus on the evaluation of the existing installations and on the integration with other computer systems (RIS, HIS, EPR, etc). You are invited to contribute to the upcoming issues in these and other EuroPACS topics: workstations, multimedia, teleradiology and image distribution, evolution of standards, and descriptions of new PACS installations. You will find details on how to send your contributions in the EuroPACS web site: www.europacs.org

Would you like to join the EuroPACS Association?

EuroPACS is a small but very active and growing community of European radiologists and scientists sharing information about digital medical imaging. New members from clinical, industry, information technology, health care economics, academic or research environments are welcome in the Association. For membership information, please visit our web site.

We are looking forward to seeing you in Graz for EuroPACS'2000,

Davide Caramella
Joaquim Piqueras
Jarmo Reponen

Program of the 17th International EuroPACS Meeting

President: **Nicola H. Strickland, MD (UK)**

Session 1

08:00 Tutorial on IMAC/PACS

H.K. Huang, San Francisco (USA)

09:00 2TB and growing fast: 18 months of experience with the Innsbruck PACS

R. Vogl, TILAK GmbH Hospital Holding Company, IT Dept., Innsbruck (A)

09:15 The reality of implementing a PACS

R. Jakob, U. Wendl, Siemens Health Services, Erlangen (D)

09:30 PACS in Turku University Central Hospital in Finland

M. Kormano, M. Maass, M. Kosonen, A. Kiuru, Turku University Central Hospital, Medical Imaging Centre, Turku (FIN)

09:45 Break

10:00 Integration of "video server" technologies in a radiology PACS

P. Croisille, J.P. Roux, M. Amiel, Creatis, Cardiac Hospital L. Pradel, Dept.of Radiology, R. Huaulme, Matra Systems & Informations, Lyon (F)

10:15 18 Months experience with an integrated radiology system: HIS-RIS-SPEECH-PACS

W. Kumpan, F. Karnel, G. Nics, Kaiser -Franz- Josef- Hospital Vienna, Dept. of Radiology, Vienna (A)

10:30 Filmless hospital in Rome (Italy): First experience in realization and clinical use

C. Capotondi, S. Sbarbati, A. Cavacece, M. Carfora, C. Cosentini, M. Clementi, G. Alessi, Istituto "Figlie di San Camillo", "G.Vannini "Hospital, Dept. of Imaging, Rome (I)

10:45 Examples from an UK district hospital of business cases leading to

a new case for a DICOM/Intranet PACS provision

K. Foord, S. Jones, Conquest Hospital, Dept. of Radiology, P. Rice, Probus Projects Ltd., St. Leonards on Sea (UK)

11:00 Improving workflow with integrated RIS-PACS solutions

H. Schmidt, S. Northrup, Siemens Health Services, Erlangen (D)

Session 2

14:00 Features desirable on a home workstation (practical demonstration)

Invited Speaker: N.H. Strickland,

14:30 JAVA-based PACS

A. Heuer, S. Hludov, C. Meinel, Institute of Telematics, Trier (D)

14:45 A powerful user interface to PACS or how to access one specific radiological image out of one million

J.-E. Angelhed, S. Svensson, A. Karlsson, L. Larsson, Sahlgrenska University Hospital, Dept. of Medical Physics and Medical Engineering, S. Gustavsson, G. Carlsson, U. Tylén, Dept. of Radiology, Göteborg (S)

15:00 Potential workflow changes with the introduction of computerised or direct radiography

P.D. McConnell, Hunter Health Imaging Service, Newcastle, D. McLean, University of Sydney, School of Medical Radiation Technology, Sydney (AUS)

15:15 The costs and benefits of a hospital wide PACS: results of a comprehensive study

G. Weatherburn, M. Buxton, Brunel University, Health Economics Research Group, Uxbridge, S. Bryan, University of Birmingham, Health Services Management Centre, Birmingham, J. Watkins, University of Glasgow, Gartnavel Royal Hospital, Dept. of Psychological Medicine, Glasgow (UK)

15:30 Break

15:45 PACS and patient radiation doses - what is the evidence?

G. Weatherburn, Brunel University, Health Economics Research Group, Uxbridge, S. Bryan, University of Birmingham, Health Services Management Centre, Birmingham (UK)

16:00 First experience in digital signature of radiological reports : Practical and legal implications

C. Saccavini, G.P. Feltrin, A. Ramelli, D. Miotto, L. Rubaltelli, R. Stramare, M. Chiesura-Corona, F. Pomerri, S. Puggina, C. Dus, University of Padova, Institute of Radiology, Padova (I)

16:15 Using web technologies on PACS environments: A DICOM web server with a DICOM Java viewer

J. Fernández-Bayó, C. Rúbies, O. Barbero, M. Sentís, L. Donoso, SDI-UDIAT, Image Laboratory, Corporacio Sanitaria Parc Tauli, Sabadell (E)

16:30 Openness and flexibility: From teleradiology to PACS

U. Engelmann, A. Schröter, M. Schwab, U. Eisenmann, H.P. Meinzer, Deutsches Krebsforschungszentrum, Dept. of Medical and Biological Informatics, Heidelberg (D)

Session 3

08:00 Preparing cases for an on-line radiology library

Invited Speaker: D. Caramella,

08:30 Paperless direct radiological report writing: Effect on throughput and productivity in a university hospital

D.R. Voellmy, J.F. Debatin, O. Handgräter, B. Marincek, Zürich University Hospital, Dept. of Med. Radiology, Zürich (CH)

08:45 Evaluation of a digital camera for acquiring teleradiology images

E. Krupinski, C. Gonzales, R. Weinstein, University of Arizona, Arizona Telemedicine Program, Tucson, M. Gonzales, Patagonia Family Health Center, Patagonia (USA)

09:00 Navigation and performance presentation of multimedia diagnostic imaging reports

N.J.G. Brown, The Sheiling, New Alresford (UK), B. Gibaud, University of Rennes, Faculty of Medicine, SIM Laboratory, Rennes (F), T.N. Arvanitis, University of Birmingham, School of Electronics & Electrical Eng., Birmingham, A. Hinchley, Communications Planning Limited, Suffolk, K.E. Britton, St. Bartholomew's Hospital, Dept. of Nuclear Medicine, London (UK), A. Värri, Tampere University of Technology, Signal Processing Laboratory, Tampere (FIN), A. Todd-Pokropek, University College London, London (UK)

09:15 **A multimedia editor for radiological reports based on the DICOM Supplement Structured Reporting**

S. von Gehlen, L. Vorwerk, P. Jensch, University of Oldenburg, Fachbereich Informatik, M. Eichelberg, OFFIS, Oldenburger Forschungs- und Entwicklungsinstitut f. Informatik-Werkzeuge u. Systeme, Oldenburg (D)

09:30 Break

09:45 **Important DICOM services for the workflow support in radiology**

S. Helbig, D. Simon, D. Van Syckle, Merge Technologies Inc., Milwaukee (USA)

10:00 **Signal motion image data extraction by pattern matching method in the APACS**

H. Takeda, Y. Matsumura, S. Kuwata, H. Nakano, H. Kato, Osaka University Medical School, Dept. of Medical Information Science, S.Yamazaki, T. Okamura, H. Oshima, S. Kimura, Multimedia Systems Union, Osaka, M. Miyamoto, M. Sako, Kobe University Medical School, Dept. of Medical Information, Kobe (J)

Conquest Hospital : business cases leading to a new managed DICOM/Intranet PACS service within an EPR.

Keith Foord, FRCR

Consultant Radiologist and Director of Clinical Informatics,
Conquest Hospital, Hastings,UK

At EuroPACS'99 we described the step by step approach to the development of a business case for a new DICOM/Intranet PACS service to replace a developmental ACR-NEMA2 (SPI) PACS . Each business case considered the financial, operational, strategic and clinical issues.

Various options concerning the old PACS were considered including complete single tender re-development in-situ to complete abandonment of PACS. This study concluded that there was a stark financial choice between careful step wise progress or abandonment with considerable write off costs. A single tender re-development was considered unwise, but it was decided that any new PACS could only be countenanced if it was introduced at low risk to the hospital. The hospital board approved this approach and a new operational requirement was drafted which took 18 months to develop.

Concurrently a step wise approach to PACS re-development was undertaken with each step being carefully costed on a stand alone basis, generating business cases which indicated 10 year costs on a discounted cash flow basis at 6% cost inflation. These included CR / fluoroscopy DICOM segment re-development .

Computed Radiography business case

In addition we contracted for:

- a maximally DICOM conformant CT replacement

- MRI provision with a networked CT/MRI workstation
- analogue fluoroscopy room replacement with a DICOM digital room
- Radiology Information System replacement and finally
- core PACS archives, servers and workstations.

New RIS business case

It was decided that the new PACS should be provided as a managed service with regular technology refresh clauses to avoid obsolescence. RIS and most new equipment was to be leased with performance and uptime clauses, rather than being purchased outright.

The final PACS business case examined the option of not proceeding with PACS and the consequential effects of continuing hard copy production with its associated archiving space, staff and revenue consequences. Best, most likely and worst case scenarios were examined for this (€)no PACS, option.

The (€)no PACS, option produced significant additional ten year costs ranging from • 320,000 to nearly • 800,000.

Set against this the best, most likely and worst case PACS ten year costs ranged from a worst case additional cost of • 270,000 to a ten year saving of • 400,000, with the most likely case being cost neutral.

Penultimate business case for PACS.

Compare the most likely 'do nothing' case with the most likely PACS case. Because do nothing means that film purchase, storage and management costs continue to escalate PACS is the cheaper option.

On this basis we proceeded to European tender for a managed DICOM/Intranet PACS service, the preferred supplier being chosen in August 1998. Assuming all permissions are given we have the aim of a new fully operational PACS starting within radiology in early 2000 and rolling out to the whole hospital in a six month programme.

With the PACS case it was deemed inappropriate to count non-radiological efficiency savings and potential litigation saving costs, as although it was acknowledged that these existed they would be intangible. They would be regarded as a corporate bonus. Some estimates of these 'savings have been made as an example of possibilities. Compare the pie charts of savings and costs above.

EuroPACS Course

EuroPACS sponsors a Course on IT applications in Radiology, that will be organized by former President of the Association Prof. Michel Osteaux of the VUB University in Brussels.

This one week course aims to deliver, in depth and practically with some hands on experience, a common knowledge about Picture Archiving and Communication (PACS) Technology to European radiologists, technologists and radiology administrators. The course format includes formal lectures and computer aided teaching, self-evaluation and self-teaching sessions.

Date:

October 3 - 7, 1999

Venue:

Auditorium Kiekens, Academic
Hospital, Vrije Universiteit Brussel,
Laarbeeklaan 101, 1090 Brussels

Web:

<http://minf.vub.ac.be/EPcourse/info.html>

TOPICS**Standards: DICOM-HTML-HL7**

(B. Gibaud)

HIS/RIS integration

(R. Van den Broeck)

**Organisation issues & Medical
requirements**

(K. Foord)

Medical informatics

(M. Osteaux)

Medico-legal issues

(M. Osteaux)

Inter-Intra-Extranet

(D. Caramella)

Distribution to clinical Clients

(M. Osteaux)

Teleradiology as a reference tool

(U. Engelmann)

**Hospital and Radiology Information
Systems**

(R. Vande Velde)

Storage and archiving

(B. Wein)

**Technology Assessment and
Economical Aspects**

(G. Weatherburn)

Teleradiology in daily practice

(J. Reponen)

Advanced PACS applications

(N. Strickland)

Image acquisition modalities

(J. Piqueras)

Networking

(F. Verhelle)

Workflow management

(G. Gell)

Workstations: user requirements

(B. Wein)

Clinical implementations

AZ-VUB - Hammersmith

Clinical implementations 2

Hastings - Aachen - Maastricht

Mobile teleradiology

Jarmo Reponen
Department of Radiology
University of Oulu, Finland

A new field of teleradiology applications is currently being experimented in Finland, where mobile telephone technology has been used instead of terrestrial lines. In 1993 at the Oulu University Hospital a laptop computer was connected to a Nokia DC 560 portable NMT-450 (Nordic Mobile Telephone) cellular system car phone with a modem adapter.

This system was connected to an image server at the University Hospital, where digitized and JPEG compressed CT images were available.

The transfer speed was as slow as 2,400 bit/s and the system weighed over 9 kg. The laptop computer used as a remote terminal could only show 16 gray levels on the screen.

Despite its limitations, the system could be used for image reception all over Scandinavia and showed the potentialities of mobile teleradiology. Since 1994 a smaller NMT-900 handheld cellular phone and a NMT PCMCIA data card were tested.

This combination reduced the weight of the cellular phone part of the system to 1 kg. The nominal data transmission rate increased to 9,600 bit/s.

More advanced laptop computers had active matrix screens capable of showing 256 colors. Packed in a suitcase, this system weighed less than 5 kg, and could serve as a portable terminal.

The limitations were short operation time and slow effective speed due to transmission errors in the analogue transmission.

After the development of GSM digital networks the problems in establishing a secure and stable transmission have largely been solved.

This new technology enabled a clinical trial. A neuroradiologist was supplied with a portable terminal which was capable of receiving and viewing images.

The terminal consisted of a notebook computer whose display had 640x480 pixel resolution and 256 colors.

The notebook computer was equipped with a PCMCIA digital cellular data card, that was used to interface the computer to a GSM telephone. The data transmission rate was 9,600 bit/s. The CT images were captured from the screen of a workstation using a public domain software.

To reduce the bandwidth required for transmission, the images were compressed with a JPEG algorithm and stored in 8 bit/pixel grayscale format.

The images were then automatically transferred in patient folders to the server. The consultant then accessed the images from the server. In the trial, two series of scans were examined: in the first series, a neuroradiologist interpreted the CT scans during normal working hours on a portable computer, later the same neuroradiologist reviewed the images on film.

In the second series, the images were sent by a junior radiologist for a neuroradiologist consultation after normal working hours. Three senior neuroradiologist gave their advice in turn.

These results were also compared to the film interpretation the next morning. In the re-evaluation, the images of all patients were viewed in the manner used by the radiologists to interpret CT images in daily work.

A written report was made both for transmitted a comparison images.

A total of 68 emergency CT examinations were transmitted.

Transmission time via GSM for a single CT image was one minute and for a complete head scan 18 minutes.

The transmitted images were acceptable for final diagnosis in 72% of the cases, the rest being acceptable for preliminary diagnosis.

The diagnosis from the transmitted images did not change after later review of the original images in 97% of the cases.

The wireless link saved the senior radiologist a hospital visit in 24% of the cases.

The results showed that the remote consultation link can be built with readily available technology and that the technique is useful in radiological subspecialist consultations of CT images.

REFERENCES

J. Reponen, S. Lahde, O. Tervonen, E. Ilkko, T. Rissanen I. Suramo: "Low-cost digital teleradiology" European Journal of Radiology 19, pp226-231, 1995

J. Reponen, E. Ilkko, L. Jyrkinen, et al : "Wireless radiological consultation with a portable computer" Journal of Telemedicine and Telecare 4, pp201-205, 1998

Next EuroPACS Meetings

EuroPACS 2000

Graz, Austria

September, 21st - 23rd, 2000

The turn of the millenium will be a good opportunity to sum up achievements of PACS so far and to present the trends towards the integration of PACS with related information services.

Organizer: Prof. Günther Gell, Dr. Andreas Holzinger and Dr. Marco Wiltgen

Dept. of Medical Informatics & General Hospital Graz

University of Graz

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www.kfunigraz.ac.at/wwwimi/europacs

EuroPACS 2001

Berlin, Germany

June, 27 – 30, 2001

Joined with CARS 2001

Computed Assisted Radiology and
Surgery

International Congress and Exhibition

Organizer: Prof. Heinz U. Lemke and Dr Berthold Wein

Technical Universaty Berlin

CARS secretariat at:

+49 7742 91410 - fax +4977424391

URL: <http://cars.tu-berlin.de/>

Minutes of the Board Meeting in PARIS during the 17th EuroPACS Annual Meeting on 24th June 1999

DRAFT

Participants: Strickland, Caramella, Gell, Gibaud, Lemke, Ligier, Nishitani, Osteaux, Piqueras, Reponen,

Absent: Huang, Ottes, Ratib, Todd-Pokropek, Wein

General

- Strickland opened the meeting at 1900hrs, and welcomed the participants. She apologised for not having invited Berthold Wein, the new member of the board, due to a mistake in his email address (this has now been rectified and a letter of explanation and apology sent to Dr Wein).
- Strickland reminded Board Members that Ottes resigned as Secretary last year, and thanked him (in his absence) for his very valuable contribution as Secretary and Treasurer over the past years. Caramella was elected as the new Secretary (no other member having been proposed, or wishing to stand).
- The proposed election of treasurer was deferred. This is because Todd-Pokropek (who had been proposed as a possible candidate for Treasurer) has not attended the meeting, and no other proposals had been received. None of the attending Board Members wished to stand. Osteaux mentioned that Todd-Pokropek had previously accepted the position of Treasurer, but had not undertaken any duties in this capacity however. This fact did not

appear to be widely known by other members of the Board.

- Strickland pointed out that the financial transactions of EuroPACS should be externally audited and the yearly financial report should, ideally, be produced by a firm of independent accountants. Strickland drew attention to a number of problems concerned with the financial aspects of EuroPACS, including the fact that the EuroPACS bank accounts are officially held in The Netherlands, under the jurisdiction of Professor Bakker. There is also a disappointingly low number of current EuroPACS members (i.e. members who have paid their subscriptions to date). All members of the Board are urged to publicise EuroPACS membership as widely as possible in order to recruit new members.

EuroPACS Newsletter

- Piqueras presented the 1998 edition of the newsletter, which will be sent to members and published on the EuroPACS web page. A note was made of the fact that this letter was now 9 months out of date.
- It was felt that a newsletter should be published more frequently, but nobody was prepared to take on this task. At an impromptu meeting as of some members of the EuroPACS Board on 25th June (see below) Caramella agreed to produce 2 new newsletter editions in the forthcoming year, one by 31st July, the other by the end of December 1999. This will be sent in electronic form to be published on the website

and circulated to the current members of the EuroPACS Society.

- Lemke circulated a copy of a monthly newsletter of Medical Image and Information Management to members of the board. This publication is entitled “PACS and networking news”. He proposed this as a possible format for the EuroPACS newsletter. However this is a relatively costly undertaking, which could not be justified by the current small EuroPACS membership (of approximately 40 members).
- It was agreed that the forthcoming trial of 2 newsletters produced by Caramella would have more informal format, and include announcements on courses of interest, courses run by EuroPACS members, and advertisements. Industrial members of EuroPACS will be allowed to publish advertisements on the web page and in the newsletters. The cost for this will be 200 Euros per issue advertisement.
- EuroPACS members wishing to have their courses approved by EuroPACS can submit the details of the course (including content and lecturers) for approval by the EuroPACS board, and they will then be entitled to cite “*approved by EuroPACS*” in the publicity for their courses. The fee for this privilege will be 200 Euros. If the course is repeated with changes, then reassessment by the EuroPACS board members will be necessary.

The official EuroPACS course

- The first course is being organised by Osteaux, and is scheduled for September in Brussels. Every official EuroPACS course will contribute 200 Euros to the

EuroPACS Society, in recognition of the fact that it is designated “The EuroPACS Course” and using the EuroPACS name. It was felt that a fixed contribution to EuroPACS (rather than a percentage contribution) would be best since this would allow the sum to be budgeted in advance into the expected course costs.

EuroPACS Congress Subcommittee

- A congress subcommittee has been formally set up, which comprises the current meeting organiser and the 2 prior meeting organisers. The formal introduction of the congress organisation subcommittee should enable the current organiser to benefit maximally from the organisational experience and contact information gained by the past 2 organisers, and should lessen the workload falling on one person.
- The Year 2000 EuroPACS meeting is to be held in Graz, Austria, September 21 – 23. Its congress organisation committee comprises Gell (the current organiser) and the 2 prior organisers Piqueras and Caramella.
- The 2001 EuroPACS meeting (to be held jointly with CARS in Berlin) will be organised by a subcommittee comprising the 2 most recent meeting organisers, Gell and Piqueras, and Wein will be invited to be the committee organiser of the 2001 EuroPACS meeting.
- The EuroPACS subcommittee will function by exchanging ideas, proposals and advice via e-mail.
- It was agreed to change the format and aims of the EuroPACS congresses, placing an emphasis on the practical aspects of PACS and

teleradiology, drawing upon experience acquired in Europe in particular. Lemke and Strickland advocated the successful format of recent SCAR meetings in the U.S.A, where practical workshops are a strong feature. These include expert panels addressing written submitted questions from the floor, for example.

Mission Statement of EuroPACS Society

- Strickland read a short proposal for a new mission statement for the EuroPACS Society. The main emphasis of EuroPACS should focus upon the practical implementation of all aspects of digital imaging, as well as advances and research into the underlying technology and its application outcomes. It was agreed that the terms “imaging” and “tele-imaging” should be used (in favour of “radiology” and “teleradiology”) in order to emphasise the wide scope of digital imaging, including many different branches of medicine, surgery, and informatics, not just radiology.
- Lemke proposed broadening the scope of the society to include all medical informatics topics, although note was made of the point raised by Gell that there should not be direct overlap with pure medical informatics matters covered by the organisation MIE.
- Strickland will circulate (by email) a new mission statement proposed for EuroPACS by 31st July 1999. Comments will be sought and final approval from Board Members obtained by 31st August.

Benefits of EuroPACS Membership

- A reduced rate for the annual EuroPACS Congress (this reduction must be greater than the cost of membership to act as incentive).
- Receipt of 1 (or possibly 2) paper copies of the EuroPACS newsletter annually. (The importance of the timely production of newsletters was emphasised).
- The right to cite EuroPACS membership on c.v.'s (particularly important for independent PACS consultants or members of industry).
- The right to place advertisements on the website or in the EuroPACS newsletter (at a cost of 200 Euros per advertisement).
- The chance to make announcements for forthcoming meeting in the EuroPACS newsletter or on the website.
- The possibility of having the EuroPACS board approve a course, so that it can be officially considered “approved by EuroPACS”.
- The right to have membership name, address and contact numbers displayed on the EuroPACS website.
- There was considerable discussion concerning whether the benefits of EuroPACS membership were sufficient incentive for joining the society. Caramella made the radical suggestion that the Board should consider free membership. Against this Strickland argued that there was no successful medical society currently offering free membership. Limited funds are necessary for a

society to be viable and to pay for basic needs such as a webmaster, some secretarial help, and independent financial auditing. It was agreed that EuroPACS membership should remain 200 Euros on an individual basis. At present the membership fee is the same for all members (including members from industry). This point could be re-discussed at next year's annual board meeting however. The membership currently is on a named person basis.

The meeting ended at 2100hrs.

Impromptu Consolidation Meeting 1130 – 1230hrs 25th June 1999

Participants: Strickland, Caramella, Gell, Gibaud, Osteaux, Reponen

Articles of the Association

The need to update and modernise the official statutes of the EuroPACS Society was unanimously agreed. These were appropriate when the society was first setup 16 years ago, as a form of "club" for those involved in research and development into PACS. They are now too restricting.

These articles were originally drawn-up by Professor Bakker and colleagues in The Netherlands. They were written in Dutch law and are held with the original EuroPACS bank account, in the Netherlands.

A statutes subcommittee was setup led by Osteaux, but also comprising Strickland and Wein, with Caramella and Lemke as associate members.

Osteaux will setup a meeting between himself, Strickland, Ottes and Bakker at the end of September/beginning of October 1999 to revise and modernise the original EuroPACS statutes. These revised statutes will be formally discussed and approved (+/- amendments) at the annual board meeting in Graz.

The financial arrangements will also be formally discussed with HISCOM (Ottes and Bakker) at the autumn meeting arranged by Osteaux. The bank accounts setup by Strickland in London (one in £ sterling, the other in Euros) will be considered as temporary measures, pending optimisation of the banking arrangements at an international level.

A provisional budget was approved: 200 Euros for the webmaster to maintain the website in the coming year (1999/2000) and 1,000 Euros for secretarial and travel expenses for the president in order to attend meeting in The Netherlands to revise the statutes.

E-mail voting

Gibaud suggested that when email responses were sought, every board member must respond with either approval or disapproval in order to acknowledge consideration of the topic under discussion. Voting on specific issues may be carried out by email (when confidentiality is not required).

EuroPACS 2002

Reponen confirmed his willingness to host this meeting in Oulu, Finland. No other definite proposals have yet been received for an alternative venue. A provisional announcement of Finland as a possible venue for the 2002 meetings was made at the EuroPACS General Assembly on Friday 26th June.

Informal assessment of EuroPACS 1999

It was encouraging that the EuroPACS sessions were very well attended (full rooms), with enthusiastic audiences and generally a high quality of papers presented. This was felt to reinforce the need for the continuation of the EuroPACS Society in Europe as an entity.

NEWS on PACS

A new company enters in the PACS market.

Ebit Sanità S.p.A, constituted in 1999 by Esaote and Bracco, is a company based in Genoa - Italy which carries out and manages Information Technology systems and services mainly for the Italian hospitals and healthcare structures.

Main focus of Ebit Sanità's operations are the hospital departments and the out-of-hospital units active in the support of medical diagnostics and of technological and administrative management, such as diagnostic imaging, cardiology, intensive care and emergency departments.

Esaote e Bracco have decided to join their know-how and experience mainly in radiology and cardiology information systems, medical product connectivity and DICOM networking to offer complete management solutions to the Italian healthcare.

Esaote and Bracco, with over US\$ 800 million net sales in 1998, are together one of the main European players in diagnostic imaging.

Information about Esaote and Bracco is available on the Internet at:

<http://www.esaote.com>

and

<http://www.bracco.com>.

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