

| | Lecture Hall A | Lecture Hall B | Lecture Hall C | Corridors |
|---------------|---|--|--|------------------|
| 08:00 - 08:30 | ISRP-14 Opening Ceremony | | | |
| 08:30 - 09:00 | <u>Plenary Lecture A1</u> : Alice in Wonderland: How to understand Dementia from Fundamental Radiation Physics and Chemistry <i>Christopher Thomas Chantler</i> | | | |
| 09:00 - 09:30 | <u>Plenary Lecture B1</u> : Synchrotron Radiation in Brazil: Past, present and future <i>Aldo Félix Craievich</i> | | | |
| 09:30 - 10:00 | <u>Plenary Lecture C1</u> : 2D and 3D graphene: from plasmonics to photoacoustics <i>Augusto Claudio Marcelli</i> | | | |
| 10:00 - 10:30 | Coffee Break in simultaneous with Poster Session Opening Exhibition Range | | | Poster Session 1 |
| 10:30 - 11:00 | <u>Plenary Lecture D1</u> : Magnetic structures studied by powder neutrons diffraction: Spin reorientation in perovskite structures <i>Raúl Carbonio</i> | | | |
| 11:00 - 11:30 | <u>Plenary Lecture E1</u> : Recent advances in the low energy calibration of large liquid noble gas detectors <i>María Isabel Lopes</i> | | | |
| 11:30 - 12:00 | <u>Plenary Lecture F1</u> : Studies of replacement of Am-Be and Cs-137 sources by D-T generators in oil well logging tools <i>William Lewis Dunn</i> | | | |
| 12:00 - 13:30 | Lunch Interval | | | |
| 13:30 - 14:00 | <u>Plenary Lecture G1</u> : New advances in Energy-Dispersive RIXS <i>Héctor Jorge Sánchez</i> | | | |
| 14:00 - 14:30 | <u>Plenary Lecture H1</u> : Techniques for identifying depth inhomogeneities of elemental distribution in materials <i>Ladislav Musilek</i> | | | |
| 14:30 - 15:00 | <u>Plenary Lecture I1</u> : Pharmaceutical applications of X-ray Diffraction <i>Silvia Lucía Cuffini</i> | | | |
| 15:00 - 15:30 | Coffee Break | | | |
| | Oral Session 1 | Oral Session 2 | Oral Session 3 | |
| 15:30 - 15:45 | Radiogenic Risks to Patients and Staff from Pediatric Therapeutic Cardiac Catheterization Procedures <i>Suleiman Abdelmoneim, Abdelrazig Ali, Almohammed-Huda, Alkhorayef Mohammed, Alonazi Batil, Bradley David A</i> | CaSiO ₃ polycrystal for neutron, proton and carbon detection <i>Gonzales Lorenzo Carlos, Watanabe Shigueo, Bueno Carmen, Satoshi Kodaira, Luana Nascimento</i> | Characterisation of CMOS-based optical CT imaging system for radiotherapy dosimetry using PRESAGE dosimeter <i>Hafiz M Zin, Nurul Farah Rosli, Abdul Rahman Ahmad Taufek</i> | |
| 15:45 - 16:00 | Survey of Pediatric Imaging Exposure from Computed Tomography Examinations <i>Alkhorayef Mohammed</i> | Dating aeolian sediments using ESR Ti-Li center in quartz, TL and OSL-SAR: Dama Branca, study <i>Do Carmo L. S., Watanabe Shigueo, Silva R.J., Chubaci J.F.D.</i> | Phantom development and implementation for Gamma Knife® dosimetry <i>Almeida Costa Nathalia, Albuquerque Potiens Maria da Penha, Silvestre Patallo Ileana, Dimitriadis Alex</i> | |
| 16:00 - 16:15 | Development of a reconstruction methodology for the X-Ray spectrum of a medical LinAc positioning flat panel <i>Prieto A I, Juste B, Morató S, Miró R, Verdú G</i> | X-ray Tube-based RIXS: Synchrotron-free Atomic Local Environment Determinations <i>Leani Juan José, Perez Roberto Daniel, Robledo José Ignacio, Sánchez Héctor Jorge</i> | Laser scanning and visible light transmission imaging of polymer gel dosimeters <i>Chacón David, M. Romero, F. Mattea, Valente M.</i> | |
| 16:15 - 16:30 | Modeling of radiation action based charged particle cluster ionization distributions <i>Chaoui Zine El Abidine</i> | Thermo-luminescent response of coloured silica beads to high-dose electron beam <i>Ley K., Hashim S. A., Lohstroh A., Shenton-Taylor C., Bradley D.A.</i> | Synthetic polycrystals of CaSiO ₃ in nuclear medicine <i>Gonzales Lorenzo Carlos, Silva Carrera Betzabel, Watanabe Shigueo, Miyamoto Massahiro, Luiz Edemer</i> | |
| 16:30 - 16:45 | CONVERAY®: Convergent photon beam for high precision tumor targeting <i>Figueroa Rodolfo, Leiva J, Moncada R, Santibáñez Mauricio, Velásquez J, Valente Mauro</i> | Detection efficiency of X-ray and gamma photons using a BSI CMOS image Sensor and application to X-ray imaging <i>Lipovetzky José, Cicuttin Andrés, Crespo María Liz, Sofo Haro Miguel, Alcalde Bessia Fabricio, Pérez, Martín, Gomez Berisso Mariano</i> | DOSIS: A novel toolkit for patient-specific internal dosimetry <i>Pérez Pedro, Katarina Sjögren Gleisner, Francesca Botta, Johan Gustafsson, Michael Ljungberg, Valente Mauro</i> | |
| 16:45 - 17:00 | Scattered radiation on cardiologists during interventional cardiology procedure <i>Rivera Teodoro, Olvera B G, Tellez N. M., Ugalde M.A., Uruchurtu E.S.</i> | Monte Carlo Simulation of Charge Dispersion on Semiconductor Imaging Sensors <i>Magalhães Débora, Tomal Alessandra</i> | Experimental determination of dose enhancement in Gd-PAGAT integral dosimeters irradiated with optimized low energy X-ray tube <i>Santibáñez Mauricio, Fuentealba M., Guillen Y., Valente Mauro</i> | |
| 17:00 - 17:15 | An evaluation of dose-area product in pediatric barium meal procedures <i>Suelem O. Machado, Filipov Danielle, Schelin Hugo R, Deniyak Valeriy, Legnani Adriano, Ledesma Jorge</i> | Radiation Damage Impact on Hybrid-Pixel Detectors Data <i>Magalhães Débora, Rinkel Jean, Tomal Alessandra</i> | Low dose radiation dosimetry using natural blue quartz crystal by TL technique <i>Silva Carrera B N, Cano Nilo F, Watanabe Shigueo</i> | |
| 17:15 - 17:30 | Quantification of single X-ray scattering in mammographic conditions with a digital image detector <i>Ríos A B, Somacal H, Valda A</i> | Elementary characterization of nail polishes by EDXRF <i>Narloch Danielle C, Paschuk Sergei A, Nicolosi Corrêa Janine, Montenegro Peddis T, Catarina A</i> | Gel dosimetry response comparison for 44 kVp and 6 MV photon beams <i>Vedelago José, Chacón David, Cuevas Diana, Venencia Daniel, Mattea Facundo, Valente Mauro</i> | |
| 17:30 - 18:00 | Participants are all invited to Poster Session 1 exhibition range to discuss final remarks with the authors of the poster contributions | | | |

Poster Session 1

| Corridor A | | Corridor B | |
|------------|--|---|-------|
| P1-1 | Comparison between Al₂O₃:C pellets and DIODEs for TSEB in vivo dosimetry using an anthropomorphic phantom <i>Almeida S.B., Villani D., Sakuraba R.K., Rezende A.C.P., Campos L.L.</i> | Effect of ²³⁸U, ²³²Th and 40K concentration in surface soils to the terrestrial gamma radiation dose rates (TGRD) level at the state of Negeri Sembilan, Malaysia <i>Nor Eliana Norbani, Nazaratul Ashifa Abdullah Salim, Abdul Rahman Ahmad Taufek</i> | P1-31 |
| P1-2 | Contribution of the Scattered Radiation on the Neutron Beam Fluence in the Neutron Calibration Laboratory at IPEN <i>Alvarenga Tallyson S, Polo Ivon O, Pereira Walsan P, Silva Felipe S, Fonseca Evaldo S, Caldas Linda V. E</i> | 3D Microtomography for Soil's Structural Analysis <i>Alves Haimon, Carnavale Thiago, Campos Tácio, Oliveira Antônio, Tadeu Ricardo</i> | P1-32 |
| P1-3 | Monte Carlo simulation of a non-LASER for application to Photodynamic therapy <i>Alva-Sánchez Mirko S, Pianoschi Thatiane, Bonatto Alexandre</i> | Impact of segmentation method and pixel size resolution for porosity analysis in coquina rocks <i>Araujo Olga M. O., Machado Alessandra S., Gomes Célio S., Ferreira Cintia G., dos Santos Thais M. P., Lopes Ricardo T.</i> | P1-33 |
| P1-4 | Simulation of the dose distribution of tumors with different hypoxia concentrations <i>Alva-Sánchez Mirko S, Pianoschi Thatiane</i> | Evaluation of polymer gels using Monte Carlo simulations <i>Santos W. S., Neves L. P., Perini A. P., Belinato Walmir, Caldas L. V. E.</i> | P1-34 |
| P1-5 | Scattering of the X- ray mobile machine: Simulation and experimental Measurements <i>Alva-Sánchez Mirko S, Barreto Schwarcke Marcelo Menna, Pianoschi Thatiane</i> | Dating of Shells from Pântano da Malhada, Rio de Janeiro <i>Brito Gomes Monise, Cortez Bruna, De Oliveira Letícia Mendes, do Carmo Lucas S, Chubaci José Fernando, Rojas Rocca Rene, Watanabe Shigueo</i> | P1-35 |
| P1-6 | Use of microtomography for evaluation of internal adaptation and polymerization shrinkage of composite resin restorative techniques <i>Alves Haimon, Perez Cesar, Campos Adriano, Filizzola Andressa, Tadeu Ricardo</i> | Synthesis, thermoluminescence, dosimetric characteristics and defect center of CaMgSi₂O₆ phosphor <i>Cano Nilo F, C.D. Gonzales-Lorenzo, Watanabe Shigueo</i> | P1-36 |
| P1-7 | Analysis of Lumen and Vascular Volume along the Human Fallopian tube using X-ray Microtomography <i>Alves Haimon, Castro Pedro, Aranda Osvaldo, Werner Heron, Pinho Matos Ana Paula, Bittencourt Luiz Felipe, Tadeu Ricardo</i> | Application of X-Ray Fluorescence Spectroscopy in food additives analysis <i>Cazón S., Merlo M. A., Mera M. F., Rubio M.</i> | P1-37 |
| P1-8 | Evaluation of 3D printing filaments for construction of a pediatric phantom for dosimetry in CBCT <i>Assemany Ladyjane P F, Rodrigues Júnior Orlando, Potiens Maria da Penha A</i> | Proton Beam Characteristics Determine System for Radiation Hardness Tests of Microelectronics <i>Chao Tsi-Chian, Yi-Chun Tsai, Chuan-Jong Tung, Chung-Chi Lee</i> | P1-38 |
| P1-9 | Occupational exposures in PET Procedures with 18F-FDG <i>Belinato Walmir, E. P. B. de Almeida, L. P. Neves, A. P. Perini, Caldas L V E, W. S. Santos</i> | Dating sediments from a terrace found in Iguape – Icapara in southeast coast in the state of São Paulo, Brazil <i>Cortez Bruna, Chubaci José F. D, Brito Gomes Monise, Oliveira Letícia M., Satiro Lucas C, Rocca René R, Arizaca Edy E. C, Watanabe Shigueo</i> | P1-39 |
| P1-10 | Computational modeling of thyroid shields and lead eyewear and the impact on the absorbed doses of eye lens and thyroid gland in CBCT exams <i>Maria Rosangela Soares, William S. Santos, Lucio P. Neves, Ana P. Perini, Ana Maia, Belinato Walmir, Caldas Linda V E</i> | Dating sediments from Paranaguá Barrier, Paranaguá, PR, using EPR and TL methods <i>Cuevas Arizaca E.E., Silva R. J., Faria Pereira L. F, Chubaci J.F.D., Ferreira Guedes C.C., Watanabe Shigueo</i> | P1-40 |
| P1-11 | Effects of gold particle size in fluorescence emission of low concentration Au-infused soft tissues <i>Casanelli Bryan, Figueroa Rodolfo, Santibáñez Mauricio, Valente Mauro</i> | Baseline, mapping and dose estimation of natural radioactivity in soils of the Brazilian State of Alagoas <i>de Andrade Filgueiras Rogério, Silva Ademir X., Ribeiro Fernando Carlos A., Lauria Dejanira C., Viglio Eduardo Paim</i> | P1-41 |
| P1-12 | Effects of modulation materials for lung dose distribution in proton therapy <i>Chang Kwo-Ping, Hsieh Hsin-Han, Chao Tsi-Chian, Wu Chin-Hui</i> | Dose distribution calculation with MCNP code in a research irradiator <i>Leal Acevedo B, Gamboa de Buen I</i> | P1-42 |
| P1-13 | Dose Impact of Additional Brass Aperture on Low Dose Penumbra for a Proton Wobbling Nozzle with Multileaf Collimator—Monte Carlo Study <i>Chao Tsi-Chian, Chia-Jung Wu, Yi-Chun Tsai, Chuan-Jong Tung, Chung-Chi Lee</i> | Specific activities of Ra-226, Ra-228 and K-40 in soils from the state of Espírito Santo, Brazil <i>Garcêz Ricardo W D, José M. Lopes, Dejanira C. Lauria, Fernanda G. da Cunha, Fernando C. A. Ribeiro, Ademir X. da Silva</i> | P1-43 |
| P1-14 | Performance Evaluation of a cylindrical ionization chamber used in radiation protection measurements of diagnostic radiology clinical systems <i>da Silva Ezequiel, Ladyjane Pereira Fontes Assemany, Maria da Penha Albuquerque Potiens</i> | Analytical and Monte Carlo methods for determining the I - value of liquid water <i>Geser Federico Alejandro, Mairani Andrea, Valente Mauro</i> | P1-44 |

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| P1-15 | Stability of ^{18}F-FDG, ^{18}F-FLT and ^{18}F-NaF at two different storage conditions <i>Mércia L. de Oliveira, Emanuel A. C. de Oliveira Jr, de Oliveira Raquel C, Gabriell M. R. Bastos</i> | Proton-boron fusion reaction for improving protontherapy: a theoretical model for the reaction cross section <i>Geser Federico Alejandro, Valente Mauro</i> | P1-45 |
| P1-16 | Semi-automated synthesis of [^{18}F] FLT using a conventional [^{18}F] FDG module <i>Mércia L. de Oliveira, de Oliveira Raquel C, Leonardo T. C. do Nascimento, Elias S. S. Nascimento, Valderes M. de Almeida</i> | Radiation leakage and scattered radiation of a 6MeV betatron: improving chart building methodology <i>Gonçalves Elicardo A. de S., dos Anjos Marcelino J., Oliveira Davi F., Simonacci Gomes Celio, Lopes Ricardo T.</i> | P1-46 |
| P1-17 | Dose reduction feasibility study in the treatment for choroidal melanoma by stereotactic radiotherapy <i>Simone Coutinho Cardoso, Dias Gonçalves Odair, Juan Valani Marques de Souza, Felipe Marques Lucas de Souza, Dirceu Dias Pereira</i> | MicroCT of laminated joints of pipe in polymeric composite material reinforced by fiberglass <i>C.G. Ferreira C, D.F. Oliveira, T.M.P. Santos, O.M.O. Araujo, F.D.F. Martins, R.T. Lopes, G.R. Pereira</i> | P1-47 |
| P1-18 | EVALUATION OF DOSE RECEIVED IN ADJACENT ORGANS IN THE DOSIMETRIC PLAN OF LUNG CANCER <i>Domingues de Souza Paulo Roberto, Bruna Teiga Rodrigues, Lucas Kodato Machado, Carlos Alberto Zeituni, Maria Elisa Chuery Martins Rostelato</i> | Thermoluminescence Characterization of a Smartphone Screen for Retrospective and Accident Dosimetry <i>Abdul Jilani Mohd K H bin, Khandaker Mayeen U, Abdul Sani Siti F binti, Bradley D. A</i> | P1-48 |
| P1-19 | Micro X-ray fluorescence elemental analysis in human neuroblastoma cells spheroid culture <i>Ferreira Gabriel C, D.F. Oliveira, R.G. Leitão, J.E.P. Rosa, C. Palmero, E.G.Oliveira-Barros, M.A. Oliveira, L.E. Nasciutti, Lopes R T, Anjos M J</i> | The Environmental Level Multi-source Air Kerma Calibration Standard Calibration System <i>Wang Shih-Wen, Lin Yi-Chun, Yuan Ming-Chen, Chu Chien-Hau, Lin Yung-Chieh, Tsai Hui-Yu</i> | P1-49 |
| P1-20 | MCMEG: InterComparison exercise on radiotherapy assessment prostate dose <i>Fonseca T. C. F., Seniwal B., Mendes A. M., Belo M. C. L., Lacerda M. A. S., Mendes M. B., Paixão R. L., Joana G. S, Santana P., Marques J., Squair L. P., Antunes P., Yoriyaz H., Bastos F.</i> | Release of radionuclides by Brazilian uranium mine <i>Pereira Wagner S, Alphonse Kelecom, Lopes Jose M, Delcy A. Py Júnior, Silva Ademir X</i> | P1-50 |
| P1-21 | Effective Atomic Number of Breast Tissues Determined by Transmission and Scattering Methods <i>Gobo M S S, Soares L D H, Poletti M E</i> | SR microXRF study of the Pb uptake using a mathematical model of diffusion in <i>Brassica napus</i> leaves <i>Rubio M, Mera M F, Pérez C A, Cazón S, Rubio M E</i> | P1-51 |
| P1-22 | Measurement of the linear attenuation coefficient of breast tissues using polienenergetic x-ray and a dispersive detector <i>Soares L D H, Gobo M S S, Poletti M E</i> | Limitation and comparison of two methods for determination of biogenic fraction in liquid fuels by ^{14}C <i>Nikolov Jovana, Krajcar Bronić Ines, Todorović Nataša, Stojković Ivana, Barešić Jadranka, Sironić Andreja, Tomić Milan</i> | P1-52 |
| P1-23 | The Influence of the Bucky Components on the Normalized Glandular Dose Estimation in Mammography <i>Godeli J, Poletti M E</i> | Characterization of Smart Optical Fibres Dosimeter for Space Radiation Dosimetry <i>Noor Noramaliza M, Farid Bajuri, Bradley D A</i> | P1-53 |
| P1-24 | Determination of scattering profiles using an energy X-ray diffraction system: corrections and geometric blurring <i>Graff J, Godeli J, Poletti M E</i> | Dating by physical methods of shells and sediments from the Giant Sambaqui Santa Marta II, Laguna, Santa Catarina <i>Oliveira Letícia Mendes, Cortez Bruna, Brito Gomes Monise, Sátiro Do Carmo Lucas, Rojas Rocca René, Chubaci José Fernando, Watanabe Shiguo</i> | P1-54 |
| P1-25 | PET/MRI AND ITS IMPORTANCE IN EARLY STAGING IN ONCOLOGICAL PATIENTS <i>Gonzalez K. M. L, Silva I. C. S, Rodrigues Júnior C. L, Lacerda I. V. B, Lima F. R. A</i> | Determination of X-ray production cross section for L and M subshells by proton impact <i>Bonifacio Mariano, Pérez Pablo Daniel, Rodríguez Tabatha Pamela, Trincavelli Jorge Carlos, Fernández-Varea José María, Suárez Sergio Gabriel</i> | P1-55 |
| P1-26 | Determination of the penumbra width of Elekta SRS Cone Collimator for 6 MV FF and 6 MV FFF energies using Gradient-Based Edge Detection <i>Groppo Daniela P., Saraiva Cristian W. C., Caldas. Linda V. E.</i> | Computational simulation of the detectors designed for computer tomography <i>Caio L. Lima, Caio E. S. Amaral, Walmir Belinato, Lucio P. Neves, Ana P. Perini, William S. Santos, Edson P. B. de Almeida, Marcus Vinícius Teixeira Navarro</i> | P1-56 |
| P1-27 | Density assessment with the LIBRA software <i>Nakano Irene T, Schelin Hugo R, Denyak Valeriy, Cristiane B. Spadoni, Paschuk Sergei, Khoury Helen J, Silvio Tacara</i> | Simulation of a laboratory for the radiation detectors calibration <i>Caio E. S. Amaral, Caio L. Lima, Walmir Belinato, Lucio P. Neves, Ana P. Perini, William S. Santos, Edson P. B. de Almeida, Marcus V. T. Navarro</i> | P1-57 |
| P1-28 | Difference in positioning in frame-based and frameless radiosurgeries <i>Taynná V. Almeida, Arno L. Cordova Jr, Cintia Mara da Silva, Pedro Argolo Piedade, Carlos G. Bezzerra Jr, Danyel S. Soboll, Denyak, Valeriy, Schelin, Hugo R</i> | Correction of gray values distortion in pipes radiography <i>Simonacci Gomes Célío, Oliveira Davi F, O.M.O Araújo, A.S.S. Silva, Lopes Ricardo T</i> | P1-58 |
| P1-29 | Utilization of gold nanoparticles in carbon ion therapy <i>Taynná V. Almeida, Andrea Danioni, Lorenzo Boscaro, Marco Cavaiani, Marco Riboldi, Denyak, Valeriy, Schelin, Hugo R</i> | Evaluation of detection efficiency of CdTe spectrometers of different workloads <i>Sirico Ana C A, Tomal Alessandra, Bottaro Márcio, Costa Paulo R.</i> | P1-59 |

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| P1-30 | Simulation of energy spectra in proton medical imaging using the code Geant4 <i>Silva R C L, Denyak Valery, Paschuk Sergei, Schelin Hugo R, Hoff G</i> | OSL dating of Amazon fluvial sediments by SAR protocols and Age Models <i>Tatumi Sonia H, Rossetti D de Fátima, Silva F Vanessa, Márcio Yee</i> | P1-60 |
| | | Detection of radium in water by x ray fluorescence from Monte Carlo Simulations <i>Burille F., Correa J.J.M., Zambianchi P., Zambianchi J.K., Antoniassi M.</i> | P1-61 |

OCTOBER 9TH 2018 - TUESDAY

| | Lecture Hall A | Lecture Hall B | Lecture Hall C | Corridors |
|---------------|--|----------------|----------------|-----------|
| 08:30 - 09:00 | <p><u>Plenary Lecture A2</u>: X-ray scattering methods in soft condensed matter, present and near future <i>Marcelo Ceolin</i></p> | | | |
| 09:00 - 09:30 | <p><u>Plenary Lecture B2</u>: <i>Polarization Properties of X-rays and Their Applications to the X-ray Analysis</i> <i>Ryohei Tanaka</i></p> | | | |
| 09:30 - 10:00 | <p><u>Plenary Lecture C2</u>: X-ray Quantum Metrology <i>Lawrence T. Hudson</i></p> | | | |
| 10:00 - 10:30 | Coffee Break | | | |
| 10:30 - 11:00 | <p><u>Plenary Lecture D2</u>: Tracking ancient people movements in the Sierras Pampeanas of Argentina by XRF, DRX and SEM on lithic technology <i>Gabriela Roxana Cattaneo</i></p> | | | |
| 11:00 - 11:30 | <p><u>Plenary Lecture E2</u>: Measuring ionization cross-sections by electron impact <i>Gustavo Castellano</i></p> | | | |
| 11:30 - 12:00 | <p><u>Plenary Lecture F2</u>: Synchrotron radiation x-ray microbeam-based techniques applied to agro-environmental sciences <i>Carlos Alberto Pérez</i></p> | | | |
| 12:00 - 14:00 | Lunch Interval | | | |
| 14:00 - 18:30 | <p>ISRP-14 TOUR - The Jesuit Church of Alta Gracia and San Roque Lake circuit (shuttle bus departure from Pabellón Argentina, ISRP-14 venue)</p> | | | |

| | Lecture Hall A | Lecture Hall B | Lecture Hall C | Corridors |
|---------------|--|---|---|------------------|
| 08:00 - 08:30 | <p>1st Bilateral Workshop on Applied Radiation Physics An Argentina/Italian network Opening Ceremony <i>Marcelo Rubio, (Argentina) ISRP-14 Chairman</i> <i>José Kenny, Italian Scientific Attaché, Embassy of Italy, Buenos Aires</i></p> | | | |
| 08:30 - 09:00 | <p>Plenary Lecture A3: Cultural Heritage Science at CNA (Seville, Spain): applications of XRF and IBA techniques to art and archaeological objects <i>Miguel Ángel Respalda</i></p> | | | |
| 09:00 - 09:30 | <p>Plenary Lecture B3: Applications of spectrometric techniques for the study of historic and cultural-heritage artworks <i>Alejandro Martín Sánchez</i></p> | | | |
| 09:30 - 10:00 | <p>Plenary Lecture C3: Radiocarbon dating of cultural heritage objects – case studies of regional importance <i>Ines Krajcar Bronić</i></p> | | | |
| 10:00 - 10:30 | Coffee Break in simultaneous with Poster Session Opening Exhibition Range | | | Poster Session 2 |
| 10:30 - 11:00 | <p>Plenary Lecture D3: Highly-specific non-invasive imaging of cultural heritage artifacts by means of X-ray macroscopic X-ray powder diffraction scanning (MA-XRPD) <i>Koen Janssens</i></p> | | | |
| 11:00 - 11:30 | <p>Plenary Lecture E3: Analysis of archaeological linen cloths: the shroud of Arquata <i>Stefania Bruni</i></p> | | | |
| 11:30 - 12:00 | <p>Plenary Lecture F3: Determination of mineral crystal structures of micro and nanovolumes by combination of electron diffraction tomography and synchrotron powder X-ray diffraction: two mineralogical examples <i>Fernando Colombo</i></p> | | | |
| 12:00 - 12:30 | <p>Plenary Lecture G3: Structural, Thermoluminescent and Optical Characterization of Gamma-Irradiated BeO <i>Juan Azorín Nieto</i></p> | | | |
| 12:30 - 13:30 | Lunch Interval | | | |
| 13:30 - 14:00 | <p>Plenary Lecture H3: Full Recovering of an X-ray Spectrum from Detector Influence <i>Jorge E. Fernández</i></p> | | | |
| 14:00 - 14:30 | <p>Plenary Lecture I3: Developments of X-Ray Fluorescence and Raman analytical techniques in the study of graphical documents <i>Marta Manso</i></p> | | | |
| 14:30 - 15:00 | <p>Plenary Lecture J3: XRF Mapping, the experience from industry <i>Michele Gironda</i></p> | | | |
| 15:00 - 15:30 | Coffee Break | | | |
| | Oral Session 4 | Oral Session 5 | Oral Session 6 | |
| 15:30 - 15:45 | <p>Direct Analysis of Soft Human Body Tissue for Cancer Diagnostics Utilizing Scatter Modulated Chemometric Energy Dispersive X-ray Fluorescence Spectrometry <i>Angeyo H. K., Okonda J., Sichangi E., Dehayem-Massop A.</i></p> | <p>Committed effective dose due to fruits and vegetables peels consumption: a radiometric analysis of the low-cost dietary nutritional alternative <i>Lopes José M., Garcéz Ricardo W. D., Silva Leandro B, Silva Roberto C, Mariano Alessandro D, Silva Ademir X, Dam R S F, Berdeguez Mirta B T</i></p> | <p>Flexible dosimeters based on polymer-nanoparticle composites <i>Ayesh Ahmad I., Salah Belal, Al-Sulaiti Leena A.</i></p> | |
| 15:45 - 16:00 | <p>Computed tomography x-ray characterization: a Monte Carlo study <i>Campos Luciana T., Phillip M. de Jesus, Elicardo A. S. Gonçalves, Luis A. G. Magalhães</i></p> | <p>Assessment of effluent of Nuclear Medicine facility from the View of Environmental Radiological Protection <i>do Carmo Alessander Sá, Ademir X. da Silva, Elizabeth A. Vianello, Wagner de S. Pereira, Evangelina M. L. de Macêdo</i></p> | <p>Raman spectroscopy as a tool to study oxygen effects on polymer gel dosimetry <i>Chacón D, Vedelago J, Strumia M, Valente Mauro, Mattea F</i></p> | |
| 16:00 - 16:15 | <p>Comparison between microtomographic images of bone samples reconstructed by Avizo and CTan / Ctvox <i>Ferreira da Costa Rogério, Braz Delson</i></p> | <p>DOS and XANES analysis of magnetic transition metals embedded in an oxide matrix <i>Grad G., González E., Torres Diaz J., Bonzi E.</i></p> | <p>Local molecular dynamics in γ-irradiated natural rubber/zeolites composites <i>Dragičević Martina, Tatjana Antonić Jelić, Srećko Valić</i></p> | |
| 16:15 - 16:30 | <p>Convergent X-ray beam for targeting tumors by nanoparticle-linked biomarkers <i>Figueroa Rodolfo, López Correa Johnnie, Santibáñez Mauricio, Valente Mauro</i></p> | <p>Silicon equivalent gas determination by using GEANT4 Monte Carlo simulation <i>Chiang Yueh, Chuan-Jong Tung, Chung-Chi Lee, Tsi-Chian Chao</i></p> | <p>TL and OSL characterization of beta-particles irradiated nanostructured Eu and Tb codoped calcium aluminate <i>Ventieri A, Tatumi Sonia H, Rojas Rocca R</i></p> | |
| 16:30 - 16:45 | <p>Development of a methodology for CdTe detector spectra correction using MCNPx simulations <i>Mendes B.M., Lima A.G.F, Ferreira-Machado S.C., Nogueira M.S.</i></p> | <p>Spectroscopic analysis of mortars and coatings from the Tartessic archeological site "El Turruñuelo" (Spain) <i>Martin Sánchez Alejandro, Nuevo María José, Ojeda Miguel Ángel, Santiago Guerra Millán, Sebastián Celestino, Esther Rodríguez González</i></p> | <p>Study and evaluation of beam-modifying wedge filters of the Siemens Oncor Expression linear accelerator using MCNP <i>Thalhofer J L, Lopes José M, Juraci P. Reis Júnior, Menezes Artur F., Berdeguez Mirta B T, Mariano Alessandro D, Barbosa Caroline M, Silva Ademir X</i></p> | |
| 16:45 - 17:00 | <p>Characterization of a Compton Spectrometer for Measurement of X-ray Spectrum of Megavoltage <i>Oyardo Manrique John P, Alessandro M. Da Costa</i></p> | <p>Application of Synchrotron Radiation-based Methods on Environmental Toxicology Research <i>Mera M F, Rubio M, Pérez C A, Cazón S, Muñoz S E</i></p> | <p>Effect of aerobic exercise on the learning and memory of mice that had the brain irradiated <i>Teixeira L P de M, Mantuano A, Lau C S C, Pereira L, Filgueiras C C, Souza R S, Ferreira-Machado S C</i></p> | |
| 17:00 - 17:15 | <p>Ionizing radiation of 2Gy in breast cells does not induce epithelial-mesenchymal transition <i>Pereira L., Lima A.G.F, Ferreira-Machado S.C., Almeida C.E.B., Teixeira L. P. de M, Morandi V., Magalhães L.A.G., Braz D.</i></p> | <p>Study of radon concentration in water and its possible influence in radon concentration in air <i>Novergues A, Juste B, Sancho M, Verdú G</i></p> | <p>CT image reconstruction with SuiteSparseQR factorization package <i>Chillarón M, Vidal V, Verdú G</i></p> | |
| 17:15 - 17:30 | <p>Optimized EDXRF system for detecting simultaneously gold and silver nanoparticles for future multi-parametric imaging of tumor characteristics <i>Santibáñez Mauricio, Saavedra R., Vedelago J, Malano F., Figueroa Rodolfo G, Valente Mauro</i></p> | <p>Activity concentration of ^{226}Ra, ^{228}Ra and ^{40}K in different types of teas raw samples <i>Silva Roberto C., Garcéz Ricardo W D, Lopes J M, Silva Leandro B, Mariano Alessandro D, Thalhofer J L, Dam R S F, da Silva Ademir X</i></p> | <p>Effects of external magnetic field in dose distributions by linear accelerators <i>Valente Mauro</i></p> | |
| 17:30 - 18:00 | Participants are all invited to Poster Session 2 exhibition range to discuss final remarks with the authors of the poster contributions | | | |
| 20:30 | ISRP-14 Banquet and Music (Hotel de la Cañada) | | | |

| Poster Session 2 | | | |
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| Corridor A | | Corridor B | |
| P2-1 | Calibrating thermoluminescent card to measure Mean Glandular Dose for regulatory system <i>Lima Squair P, Oliveira P. M. C, Nogueira M. S</i> | Characterization of metal-ceramic composite 316I/Sycro <i>Alves Haimon, Firmino, José, Cavichini, Arthur, Orlando Marcos, Tadeu Ricardo</i> | P2-31 |
| P2-2 | Dose equivalent estimation in a mixed radiation field during proton therapy using wobbling scattered treatment nozzle <i>Lin Yung-Chieh, Lee Chung-Chi, Chung Szu-Li, Tsai Hui-Yu</i> | OSL and EPR dating of shells sediments from Congonhas II sambaqui, Santa Catarina, Brazil <i>Cano Nilo F, Ana C.M. Camargo, Geovan M. Guimarães, Deisi S. E. Farias, Watanabe Shiguelo</i> | P2-32 |
| P2-3 | Residual radioactivity determination of brass apertura irradiated with wobbling proton beam by considering volume-source geometries <i>Lin Yung-Chieh, Wang Bao-Yuan, Chen Hsien-Hsin, Sheu Rong-Jiun, Jan Meei-Ling, Hsu Fang-Yu, Tsai Hui-Yu</i> | Dating volcanic ash and pumice stones from volcano El Misti, Peru, by thermoluminescence <i>Ayala-Arenas Jorge S., Cano Nilo F., Porras Marco R., Watanabe Shiguelo</i> | P2-33 |
| P2-4 | Automatic method to assess Au-infused tumor dimensions by XRF scanning using convergent beam <i>Lopez Correa J, Figueroa R, Valente Mauro</i> | Effect of the substitution of sand by rubber of waste tires and exposure to gamma radiation, on the mechanical properties and the ability of microwave absorption of hydraulic concrete <i>J. Colín, C.G. Guzman, Castillo Mejia Fermín, B. Leal, O. Flores, I. Gamboa, H. Martínez</i> | P2-34 |
| P2-5 | Development of a system to estimate doses in real time <i>Lourenco Jose, Paschuk Sergei, Schelin Hugo R, Denyak Valery, Lopes Fabio</i> | Modified surface with BN by plasma technique on a steel 1045 nitrided <i>E. Pardo L., B Campillo, Castillo Mejia Fermín, O. Flores, H. Martinez</i> | P2-35 |
| P2-6 | Patient doses in cardiac catheterization in Santa Catarina, Brazil <i>Davi Alves da Silva, Ana Figueiredo Maia, Rogério Machado, Vanessa Lorena Souza de Medeiros Freitas, Regina Dal Castel Pinheiro, Nadja Fernanda de Andrade Franco, Djeimis William Kremer, Marcus Vinícius Teixeira Navarro</i> | Evaluation of an extrapolation chamber for dosimetry in computed tomography beams using Monte Carlo code (MCNP5) <i>Castro Maysa C, Silva Natália F, Santos Lucas R, Cintra Felipe B, Caldas Linda V E</i> | P2-36 |
| P2-7 | Dose Measurements in Pediatric Barium Meal Procedure <i>Filipov D., Yagui A., Malthes A.L.M.C., Camargo A.C.A., De Melo C.R.D., Franco A.D</i> | Structural characterization of membranes for methanol direct fuel cells <i>Fernandez Bordín Santiago P, Andrada H., Bajales Luna N., Castellano Gustavo, Carreras A., Galván V.</i> | P2-37 |
| P2-8 | Paediatric phantom performance evaluation in computed tomography radiation standard beams <i>Martins Elaine W, Cardoso João V, Potiens Maria da Penha A.</i> | Microtomography applied in the characterization of concrete structures <i>Ferreira Bastos L, T. M. P. Santos, Lopes R T</i> | P2-38 |
| P2-9 | Verification of absorbed doses using thermoluminescent detectors and mapping of isodose curves in IMRT planning <i>Matsushima L. C., Veneziani G. R., Sakuraba R. K., Campos L. L.</i> | X-ray spectrometry applied for determination of linear attenuation coefficient of tissue-equivalent materials <i>Frimaio Andrew, Nascimento Bruna C., Barrio Ramon M.M., Campos Leticia L., Costa Paulo R.</i> | P2-39 |
| P2-10 | Low cost electron irradiator using $^{90}\text{Sr}+^{90}\text{Y}$ sources <i>Silva Rogério M V, Belinato Walmir, Santos William S, Perini Ana P, Neves Lucio P, Santos Carla J, Souza Divanizia N</i> | Synthesis and characterization of micro macroporous biphasic calcium phosphate granules by X-ray and electron techniques <i>Garcés M A, Limandri S, Fouga G, Calvo Guirado J L, Galván Josa V</i> | P2-40 |
| P2-11 | Monte Carlo simulation of microPET/CT occupational exposure using ^{18}F and ^{68}Ga tracers <i>Lucas W. G. Souza, Lorena Pozzo, Perini Ana P, Belinato Walmir, Santos William S, Caldas Linda V E, Neves Lucio P</i> | Concrete analysis for radioprotection <i>Klein M., Barros S. F., Da Costa D. S.</i> | P2-41 |

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| P2-12 | Patient dose in digital mammography, calculated and comparison with the DICOM heading <i>Gomes D S, Lima Squair P, Nogueira M S</i> | Statistical methods to extract chemical information in Valence to Core X-Ray Emission Spectroscopy <i>Pasquevich I., Limandri S., Tirao G.</i> | P2-42 |
| P2-13 | X-ray spectra transmitted by mortar barite used in radiation protection <i>Almeida Junior A T, Lima Squair P L, Mendes B M, Nogueira M S</i> | Synthesis and Structural Characterization of $\text{Lu}_{1-x}\text{Sr}_x\text{M}_{0.5}\text{Fe}_{0.5}\text{O}_3$ ($0 \leq x \leq 1$) perovskites with M = Cr or Mn <i>Lurgo Florencia E, Limandri Silvina, Tirao Germán, Carbonio Raúl E.</i> | P2-43 |
| P2-14 | EVALUATION OF QUALITY CONTROL IN DIGITAL EQUIPMENT OF BREAST TOMOSYNTHESIS <i>Viloria C, Paixão L, Squair P L, Peixoto J E, Nogueira M S, Chevalier M</i> | Comparative analysis of the transmission properties of radiologically equivalent materials <i>Nascimento Bruna C, Frimaio Audrew, Barrio Ramon M M, Sirico Ana C. A, Costa Paulo R</i> | P2-44 |
| P2-15 | Evaluation of fabricated Ge-doped optical fibres for proton beam dosimetry: TL sensitivity and spread-out Bragg peak <i>M. F. Hassan, W. N. W. A. Rahman, T. Tominaga, M. Geso, H. Akasaka, Bradley D A, Noor Noramaliza M</i> | Palladium presence in gold earrings from Punic jewellery (Cádiz, Spain): Advances in the gold trading routes <i>Ortega-Feliu I, Gómez-Tubío B, Scrivano S, Ager FJ, de la Bandera ML, Respaldiza Miguel A</i> | P2-45 |
| P2-16 | X-ray dosimetry, energy in the range of radiodiagnosis, by Radiophotoluminescence (RPL) <i>Ogussuko M, Daros KAC, Chubaci JFD, Tatumí SH</i> | Investigation of incorporation the cerium oxide nanoparticle in hydrogel wound dressing obtained by gamma radiation <i>Rezende Talita C, Pinheiro Christiano J G, Paula Heberth D</i> | P2-46 |
| P2-17 | Grazing incidence X-ray off specular scattering on Langmuir monolayers from biological membranes <i>Oliveira Rafael G., Pusterla Julio, Malfatti-Gasperini Antonio</i> | The characterization of wound dressing poly (vinylpyrrolidone) hydrogels using gamma radiation <i>Rezende Talita C, Pinheiro Christiano J G, Paula Heberth D, Morais Pedro A B</i> | P2-47 |
| P2-18 | Monitoring canine cancer development by X-ray microdiffraction scanning <i>Oliveira Natália M P, Salvego C A, Fagundes Alana C F, Mazzaro I, Zambianchi Pedro, Conceição A L C</i> | Synthesis and TL and OSL characterization of $(\text{MgB}_2\text{O}_4\text{-MgB}_4\text{O}_7)$: Ce:Li and $(\text{MgB}_2\text{O}_4\text{-MgB}_4\text{O}_7)$: Dy:Li glasses for dosimetry <i>Rivera Barrera Gerardo, Almeida Adriel S, Oliveira Junot Danilo, Souza Divanizia N</i> | P2-48 |
| P2-19 | Inverse Reconstruction of Energy Spectra of Clinical Electron Beams <i>Jorge H. W. Visbal, Oyardo Manrique John P, Alessandro M. Da Costa</i> | Thermal lens spectroscopy dosimetry using comercial glasses for high doses <i>Almeida Adriel S, Rivera Barrera Gerardo, Souza Divanizia N, F. Eroni P dos Santos, Claudevan A de Sousa</i> | P2-49 |
| P2-20 | Design, construction and testing of radioprotection structures for operating a research 225kVp X-ray generator <i>Pérez Pedro, Larisa Fischer, Valente Mauro</i> | Characterization of a sacred statuette replica of “Nossa Senhora da Conceição Aparecida” using X-ray spectrometry techniques <i>Sanches Francis Ana, Raysa C. Nardes, Hamilton S. G. Filho, Ramon S. dos Santos, Olga M. O. de Araújo, Ivan Brito, Catarine Canellas, Davi F. de Oliveira, Anjos Marcelino</i> | P2-50 |
| P2-21 | Computational dosimetry in a pediatric iCAT procedure using a virtual antropomorphic phantom <i>Neves Lucio P, Borges Adriane, Soares Maria R, Belinato Walmir, Santos William S, Caldas Linda V E, Perini Ana P</i> | Study and comparison of two gold hoards of the Bronze Age in the Iberian Peninsula: The treasure of Villena and Cabezo Redondo <i>Scrivano S, Gómez-Tubío B, Ortega-Feliu I, Ager F J, de la Bandera M L, Respaldiza M A</i> | P2-51 |
| P2-22 | Numerical dosimetry in brachytherapy to variable mama sizes using two different types of ^{125}I seeds <i>Santos William S, Santos Carla J, Neves Lucio P, Belinato Walmir, Caldas Linda V E, Perini Ana P</i> | Archaeometric study of ceramics from Conjunto Vilas and São João sites, AM <i>Oliveira L. S. S., Abreu C. M., Lopes R. A., Almeida F. O., Belletti J., S., Machado R., Rizzutto M. A., Souza Divanizia N</i> | P2-52 |
| P2-23 | Dose determination in pediatric interventional cardiology procedures: Monte Carlo approach <i>Santos Carla J, Santos William S, Neves Lucio P, Belinato Walmir, Caldas Linda V E, Perini Ana P</i> | Neutron activation analysis of Tibetan traditional medicinal pills at the VR-1 training reactor <i>Stefanik Milan, Sklenka Lubomir, Cesnek Martin, Miglierini Marcel</i> | P2-53 |

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| P2-24 | Dosimetric characteristics of LaAlO₃:Pr³⁺ phosphor <i>A. A. Barrera, B.G. Olvera, J. Guzmán, D. Quintana, J.G. Torres, J.A. Barrera, M.A. Ugalde, A. Morales, J. Zarate, Rivera Teodoro</i> | Study of the spontaneous oxidation of sodium in air by EPMA <i>Oliva F, Leiva E, Lener G, Barraco D, Trincavelli J</i> | P2-54 |
| P2-25 | Optically Stimulated Luminescence in Enaminones <i>A. Lara, Y.O. Villafañez, J. Guzmán, D. Quintana, J.G. Torres, H. Jiménez, J.A. Guevara, Rivera Teodoro</i> | Non-destructive examination of sealed glass ampules with historical baking enamel paints <i>Hložek Martin, Trojek Tomáš</i> | P2-55 |
| P2-26 | Dosimetric characteristics beta particle irradiated LaAlO₃:Dy³⁺ <i>M.A. Ugalde, J. Zarate, A. Hernández, Rivera Teodoro</i> | Recent or Roman enamel? Resolution of dating of the unique find from Mušov - Burgstall using X-ray fluorescence analysis <i>Hložek Martin, Komoróczy Balázs, Trojek Tomáš, Prokeš Radek</i> | P2-56 |
| P2-27 | Elemental distribution by synchrotron X-ray microfluorescence of benign prostatic hyperplasia 3D cell culture <i>Rocha K M J, Leitão R G, Oliveira-Barros E G, Oliveira M A, Canellas C G L, Anjos Marcelino J, Nasciutti L E, Lopes Ricardo T</i> | Methods of estimation of characteristics of the radiation fields in the area of the NPP main production block after a VVER-1000 reactor accident <i>Urban Tomas, Kluson Jaroslav</i> | P2-57 |
| P2-28 | Use of DIP software to improve the quality of radiographic images performed in hospital beds <i>Rodrigues Júnior C L, Vieira J W, Lima F R A, Silva I C S, Lacerda I V B, Gonzalez K M L</i> | Study and dating of ancient potteries from Yumina archaeological site, Arequipa, Peru by the TL technique <i>Ayala-Arenas Jorge S., Mejia B. Reanto, Cano Nilo F.</i> | P2-58 |
| P2-29 | Study of the quality image performed by CR and DR with virtual grid system on the simulation of abdominal radiography to obese patient <i>Pelegrini F R, Farias T M B, Shigueoka D C, Murata C H, Policarpo E M, Daros K A C</i> | | |
| P2-30 | Study of composition and structure of demineralized bone using X-ray Techniques <i>Sales Erika, Ribeiro da Silva Cristiane E., Silva Ramon S., Letichevsky Sonia, Monteiro Mauricio J., dos Santos Claudio T., de Avillez Roberto R., de Oliveira Luis Fernando, Lopes Ricardo T., Paciornik Sidnei, Anjos Marcelino</i> | | |

| | Lecture Hall A | Lecture Hall B | Lecture Hall C | Corridors |
|---------------|--|--|---|-----------|
| 08:30 - 09:00 | <u>Plenary Lecture A4</u> : Doped silica real-time luminescence sensing of diagnostic X-rays <i>David Bradley</i> | | | |
| 09:00 - 09:30 | <u>Plenary Lecture B4</u> : Application of laboratory X-ray spectroscopy instrumentation in Forensic Sciences <i>Ignasi Queralt</i> | | | |
| 09:30 - 10:00 | <u>Plenary Lecture C4</u> : Analysis of nuclear reactions to determine the radionuclides generated and its activity in various devices <i>Gumersindo Verdú</i> | | | |
| 10:00 - 10:30 | Coffee Break in simultaneous with Poster Session Opening Exhibition Range | | | |
| 10:30 - 11:00 | <u>Plenary Lecture D4</u> : Radiation Protection and Dosimetry in Medicine - selected topics <i>Pedro Vaz</i> | | | |
| 11:00 - 11:30 | <u>Plenary Lecture E4</u> : Synchrotron radiation connecting x-ray spectroscopy, crystal & electronic structure <i>Eric L. Shirley</i> | | | |
| 11:30 - 12:00 | <u>Plenary Lecture F4</u> : The physics of irradiation of biological matter by ion beams <i>Roberto D. Rivarola</i> | | | |
| 12:00 - 13:30 | Lunch Interval | | | |
| 13:30 - 14:00 | <u>Plenary Lecture G4</u> : 3D anthropomorphic phantoms: problems and solutions in determining attenuation coefficients of feedstock <i>Odair Dias Gonçalves</i> | | | |
| 14:00 - 14:30 | <u>Plenary Lecture H4</u> : The influence of tissue micro-structure on proton radiotherapy <i>Richard P. Hugtenburg</i> | | | |
| 14:30 - 15:00 | <u>Plenary Lecture I4</u> : Medical Imaging Devices and Analysis <i>M. Iqbal Saripan</i> | | | |
| 15:00 - 15:30 | Coffee Break | | | |
| | Oral Session 7 | Oral Session 8 | Oral Session 9 | |
| 15:30 - 15:45 | Structural, Thermoluminescent and Optical Characterization of Gamma-Irradiated BeO <i>Azorin Nieto Juan, Sosa Fonseca Rebeca, Martínez Baltezar Rodrigo</i> | Uncertain analysis on the radon equilibrium factor measurements <i>Martínez J E, Juste B, Verdú G, Ortiz J, Martorell S</i> | Radioactive particle tracking methodology to evaluate concrete mixer using MCNPX code <i>Dam R S F, Barbosa C M, Lopes J M, Thalhofer J L, Berdeguez M B T, Silva L B, Salgado C M, da Silva A. X.</i> | |
| 15:45 - 16:00 | Electron Mean Free Path in water liquid calculated from abinitio dielectric model and two set of optical data (1eV-50 000eV) <i>Chaoui Zine El Abidine</i> | Study of alternative substrates as adsorbent materials for measurement of radon exhalation by canister device <i>Noverques A, Juste B, Sancho M, García-Fayos B, Verdú G, Arnal J M, Santafé-Moros A</i> | Determination of the Settling Profile for Sludge in a Wastewater Treatment Unit Using RTD Curves and Radiotracers <i>Gonçalves E. R., Kenup-Hernandes H.O., Brandão L., Dualibi J. C., Braz D.</i> | |
| 16:00 - 16:15 | Estimation of Organ's Effective Dose in Patients Undergoing Chest X-ray Examination Using Monte Carlo Simulation <i>Elmehdi Hussein M, Entesar Zawam Dalah</i> | The exponential analysis problem in radiation measurement <i>Papp T, Maxwell J A, Tóth J, Varga D</i> | Radiotracers Applied in oil/water Separation Tanks in Oil Industry <i>Kenup-Hernandes H.O., Gonçalves E. R., Brandão L., Dualibi J.C., Silva A. X</i> | |
| 16:15 - 16:30 | Preparation of [¹⁹ F]Fluoromisonidazole using a TRACERlab MXFDG® module: Yield dependence on reaction parameters <i>Nascimento N C E S, Tafas L C N, Silva J, Oliveira M L, Lima F R A</i> | Simulation of geometry and materials of the TH-GEM based detector for radiation dosimetry <i>Silva Natália F., Silva Tiago F., Castro Maysa C., da Luz Hugo N., Cintra Felipe B., Caldas Linda V. E.</i> | Reassessment of X-Ray fundamental parameters for high-accuracy XRF spectra simulation <i>Guerra Mauro, Sampaio Jorge M., Parente Fernando, Marques José P., Indelicato Paul, Santos José Paulo</i> | |
| 16:30 - 16:45 | Solid Standards for Positron Emitters <i>Oliveira M L, Reis L C O, Leão R L C, Fragozo M C F, Lima F R A</i> | X-ray spectroscopy with commercial CMOS image sensors <i>Sofo Haro Miguel, Alcalde Bessia Fabricio, Pérez Martín, Balmaceda Dario, Bertou Xavier, Blosteín Juan Jeronimo, Gomez Berisso Mariano, Sidelnik Iván, Lipovetzky José</i> | Stochastics of Radioactive Decay <i>Kasi Servo S. H</i> | |
| 16:45 - 17:00 | Study of the influence X-Rays of Bremsstrahlung Produced by the Beta Particles of Yttrium-90 in SPET System Using Monte Carlo Simulation <i>Pastrana Orejuela C, Coelho F, Medeiros S, Vasconcello de Sá L, Souza S A L, Torres Berdeguez M B, Da Silva A X</i> | The chemical information from High-resolution K β X-Ray Emission Spectroscopy <i>Limandri S, Tiraó G</i> | Scaling behavior of Delbrück scattering <i>Kunwar Bhakta, Bhadra Arunava</i> | |
| 17:00 - 17:15 | A Poly(HEMA)10B hydrogel for thermal neutron detection <i>Mattea F, Vedelago J, Triviño S, Keil W, Álvarez-Igarzabal C, Valente Mauro, Romero M</i> | ELEMENTARY CHARACTERIZATION OF HEAVY METALS IN COSMETICS BY EDXRF <i>Torres Catarina A M P, Paschuk S A, Narloch D, Oliveira Monique de S</i> | Progress in the evaluation of higher order corrections to nuclear bremsstrahlung cross sections <i>Mangiarotti Alessio, Doris Jakubassa-Amundsen, Marcos Nogueira Martins</i> | |
| 17:15 - 17:30 | Performance of pillar shaped plastic scintillators for neutron based range verification in proton therapy <i>Skjerdal Kyrre, Ytre-Hauge Kristian S, Mattingly John, Meric Ilker</i> | Quantitative X-ray Fluorescence Analysis of Metallic Materials with Data Evaluation Based on Iterative Monte Carlo Method <i>Trojek Tomáš</i> | Design Studies Using MCNP6 for an Oil Well Logging Prototype Tool and a Test Facility <i>Pinilla Maria I, Aaron Hellinger, Long Vo, Alan Reinke, Dunn William L, J. Kenneth Shultis</i> | |
| 17:30 - 18:00 | Participants are all invited to Poster Session 3 exhibition range to discuss final remarks with the authors of the poster contributions | | | |
| 18:00 - 18:30 | Closing Ceremony | | | |

Poster Session 3

| Corridor A | | Corridor B | |
|-------------------|---|---|--------------|
| P3-1 | An Elemental Evaluation of Urban Road dirt in Tropical, Arid and Maritime Climates <i>Alsubaie Abdullah, Daar Eman, Alsulaiti L, Al-Dabbous Abdullah N., Alkhorayef Mohammed, Chamakh Mariem, Jaafar Maisarah, Almuwannis Mohammed S, Alzimami Khalid S, Bradley D A</i> | Influence of the thermal treatment on the PTTL and PTOSL signals from different natural materials <i>Antonio Patricia L, Caldas Linda V E</i> | P3-31 |
| P3-2 | Qualitative and quantitative analysis of cosmetic clays by EDXRF technique <i>Baltar Auffinger Fernanda, Walmor Cardoso Godoi, Danielle Cristine Narloch, Sergei Anatolyevich Paschuk</i> | Phototransfer analysis on TL and OSL responses of LiF:Mg,Ti (TLD-100) after exposure to ⁶⁰Co radiation <i>Antonio Patricia L, Caldas Linda V E</i> | P3-32 |
| P3-3 | Identification of the origin of the water used in the oil well injection using XRF <i>Barbosa Caroline M., Dam Roos Sophia de F., Lopes José M., dos Santos Raphael F G, Talhofer Jardel L., Salgado César M., Braz Delson</i> | TL and OSL response of CaF₂:Tm for electron beam radiation processing <i>Asfora Viviane K, Antonio Patricia L, Josemary A. C. Gonçalves, Vinicius S. M. de Barros, Bueno Carmen C, Khoury Helen J., Caldas Linda V. E.</i> | P3-33 |
| P3-4 | Inorganic scales characterization from oil industry using the X-ray Diffraction and X-ray Fluorescence techniques <i>Gama Filho Hamilton S., Silva Ramon S., Machado Celso C., Carvalho Rogério M., Conti Claudio C., O. de Jesus Edgar F., Oliveira Davi. F., Lopes Ricardo T., Anjos Marcelino J.</i> | Multivariate Optimization of Factors Influencing on the Quality of an ²⁴¹Am Alpha Source <i>Carranza Matias E</i> | P3-34 |
| P3-5 | Study of the influence of the density in the sample matrix used in the Gamma spectrometry <i>González E., Grad G., Bonzi E.</i> | Structure of the Hf, Ta, W, Pt and Au M x-ray emission spectra <i>Trincavelli J, Andrada H, Carreras A</i> | P3-35 |
| P3-6 | Comparative Analysis of the Coefficient of Conversion Using Different Methods of Internal Dose Estimates <i>Lacerda I. V. B., Vieira J. W, Oliveira M. L, Lima F. R. A.</i> | A homemade silicon equivalent proportional counter for neutron/proton radiation quality measurement <i>Chiang Yueh, Chuan-Jong Tung, Chung-Chi Lee, Tsi-Chian Chao</i> | P3-36 |
| P3-7 | 2D-Maps of Cu Paintings by Resonant Inelastic X-ray Scattering (RIXS) with Multivariate Methods <i>Sánchez Héctor Jorge, Robledo José Ignacio, Leani Juan José</i> | Structure of the Cd and Sn L-spectra <i>Fernandez Francisco, Sepúlveda Andrés, Castellano Gustavo</i> | P3-37 |
| P3-8 | Three-dimensional phantom performance evaluation for the SPECT and SPECT / CT examination desk speed test in the total body scan <i>Lima Ferreira Fernanda Carla, Souza Divanizia N, Andréa de Lima Ferreira Novais, Jose Elisandro de Andrade, Cledison de Jesus Cunha, Gilvan Cajueiro de Holanda Filho, Cinthia Marques Magalhães Paschoal</i> | Current response stability of a commercial PIN photodiode for low dose radiation processing applications <i>Gonçalves Josemary A. C., Mangiarotti Alessio, Bueno Carmen C</i> | P3-38 |
| P3-9 | A comparison of HVL mammography measurements with TLD system and different solid-state dosimeters <i>Lima Squair P, Oliveira P. M. C, Morais I. S, Nogueira M. S</i> | Intrinsic spatial resolution limit of the analyzer-based X-ray phase contrast imaging technique <i>Hönnicke Marcelo G, Morelhão Sérgio L</i> | P3-39 |
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