

ACAC 2020 SCIENTIFIC PROGRAM

Wednesday March 10th 2021

10:30-11:00	Welcome
SESSION 1a: Chair: Dimitris Georgiadis	
11:00-11:45	Innovative DNA-based asymmetric catalysis Stellios Arseniyadis (Queen Mary University of London, UK)
11:45-12:00	Sustainable catalysis in useful organic transformations: Multicomponent reactions, cross-couplings, and CO ₂ activation Georgios C. Vougioukalakis (NKUA, Greece)
12:00-12:15	Gold Nanoparticles in Organic Transformations: Opening the Pandora's Box Marios Kidonakis, Manolis Stratakis (Univ.of Crete, Greece)
12:15-12:30	COFFEE BREAK
SESSION 1b: Chair: Victoria Magrioti	
12:30-13:00	Tailoring Polymer Dispersity in Controlled Radical Polymerization Athina Anastasaki (ETH Zurich, Switzerland)
13:00-13:15	A redox-active triazine framework for photocatalytic applications Panagiota Bika, Nikolaos Ioannidis, Tatianna Gianakopoulou, Panagiotis Dallas (NCSR "Demokritos", Greece)
13:15-14:15	Flash Presentations (12)
14:15-14:30	Questions
14:30-15:30	LUNCH
SESSION 2a: Chair: Evangelia Emmanouilidou	
15:30-16:00	The advent of metal-induced biomimesis in metabolism-related (patho)physiologies. Olga Tsave and Athanasios Salifoglou (AUTH, Greece)
16:00-16:15	Interplay of cholesterol, membrane bilayers and the AT1R: A cholesterol consensus motif on AT1R is revealed Sofia Kiriakidi, Christos Chatzigiannis, Christina Papaemmanouil, Andreas G. Tzakos, Zoe Cournia and Thomas Mavromoustakos (NKUA, BRFAA, Greece)
16:15-16:30	Development of a New Photopolymeric Material and Photolithographic Method for Cell Patterning

	Dimitra Kourti, Anastasia Kanioura, Theodoros Manouras, Maria Vamvakaki, Panagiotis Argitis, Margarita Chatzichristidi, Sotirios Kakabakos and Panagiota Petrou (NCSR "Demokritos", NKUA, Greece)
16:30-1645	Liposomal co-encapsulation of iron oxide nanoflowers and Atorvastatin for theranostic applications in atherosclerosis Maria Theodosiou, Marios Krokidis, Neofytou Panagiotis and Eleni Efthimiadou (NKUA, NCSR "Demokritos", Greece)
16:45-17:00	COFFEE BREAK
SESSION 2b Chair: Efstratios Stratikos	
17:00-17:45	Structural and physical underpinnings of specificity in cellular immunity Brian M. Baker (University of Notre Dame, USA)
17:45-18:00	Examination of potential interaction between Endoplasmic Reticulum Aminopeptidase 1 (ERAP1) and Major Histocompatibility Complex I (MHC I) Giorgos Mavridis, Anastasia Mpakali, Alexandros Athanassoulis, Aggelos Lelis, Dimitris Georgiadis, Athanasios Papakyriakou and Efstratios Stratikos (NCSR "Demokritos", Greece)
18:00-19:15	Flash Presentations (15)
19:15-19:30	Questions

Thursday March 11th 2021

SESSION 3a Chair: Christina-Anna Mitsopoulou	
10:00-10:45	Multiscale computational modeling of photosynthesis Dimitrios A. Pantazis (<i>Max-Planck-Institut für Kohlenforschung, Germany</i>)
10:45-11:00	Encapsulation in Chalcogen-Bonded vs Hydrogen-Bonded Cages Demeter Tzeli (<i>NKUA, Greece</i>)
11:00-11:15	Molecular Modelling of Ionic Liquid – CO ₂ Mixtures Konstantina Karanasiou and Niki Vergadou (<i>NCSR “Demokritos, Greece</i>)
11:15-11:30	Low-Wavelength Radiation Effect on PARP1 inhibitor Veliparib Carlota J.F. Conceição, Paulo A. Ribeiro, Maria Raposo (<i>Universidade NOVA de Lisboa, Portugal</i>)
11:30-11:45	Unmasking 17 α -ethinylestradiol presence in diverse water matrices Paulo M. Zagalo, Paulo A. Ribeiro, Maria Raposo (<i>Universidade Nova de Lisboa, Portugal</i>)
11:45-12:00	Unraveling the catalytic mechanism of proton reduction by a copper(I) diimine catalyst Maria Drosou, Fotios Kamatsos, George Ioannidis, Athanasios Zarkadoulas, Christiana A. Mitsopoulou, Constantina Papatriantafyllopoulou, and Demeter Tzeli (<i>NKUA, Greece</i>)
12:00-12:15	COFFEE BREAK
SESSION 3b Chair: Athanasios Tsekouras	
12:15-12:30	Mesophase behavior of Cetyltrimethylammonium chloride: insights from all-atom Molecular Dynamics simulations Flora D. Tsourtou, Stavros D. Peroukidis, Loukas D. Peristeras (<i>NCSR “Demokritos”, Greece</i>)
12:30-12:45	2D-Hyperfine Sublevel Correlation Investigation of the Tyrosyl Radicals of Photosystem II Maria Chrysina, Georgia Zahariou, Nikolaos Ioannidis, Yiannis Sanakis, George Mitrikas (<i>NCSR “Demokritos”, Greece</i>)
12:45-13:00	Effect of natural compounds on skin cancer cell line Thais P. Pivetta, Tania Vieira, Jorge C. Silva, Paulo A. Ribeiro, Maria Raposo (<i>Universidade NOVA de Lisboa, Portugal</i>)
13:00-13:15	An evaluation of Equilibrium Green-Kubo and Non-equilibrium Molecular Dynamics for viscosity simulations of lubricants at different temperatures and pressures Dimitrios Mathas, Walter Holweger, Marcus Wolf, Christof Bohnert, Vasilios Bakolas, Joanna Procelewska, Ling Wang, Chris-Kriton Skylari (<i>University of Southampton, UK</i>)
13:15-13:30	Theoretical and spectrochemical studies of cobalt oligonuclear hybrid materials with amino alcohols Sevasti Matsia, Athanasios Salifoglou (<i>AUTH, Greece</i>)

13:30-14:25	Flash Presentations (11)
14:25-14:40	Questions
14:40-15:30	LUNCH
SESSION 4a Chair: Andreas Danopoulos	
15:30-16:00	Structural speciation in binary-ternary metal ion-aromatic chelator systems mirrors tissue-specific in vitro cytotoxic selectivity. Athanasiou Salifoglou and Olga Tsave (AUTH, Greece)
16:00-16:15	Synthesis and Reactivity of Actinide Sandwich Complexes supported by the cyclo-butadienyl ligand. Nikolaos Tsoureas, Richard A. Layfield and Akselli Mansikkamäki (University of Sussex, UK)
16:15-16:30	Synthesis, physicochemical characterization and biological properties of vanadium-peroxido-zwitterion materials Efrosini Kioseoglou, Antonios Hatzidimitriou, Athanasiou Salifoglou (AUTH, Greece)
16:30-16:45	Development of smart polymeric nanocontainers as targeted drug delivery systems for the treatment of paediatric brain malignancies S. Seriah, M. Braoudaki, E. Efthimiadou (University of Hertfordshire, UK, NKUA, NCSR "Demokritos", Greece)
16:45-17:00	COFFEE BREAK
SESSION 4b Chair: Ioannis Papaefstathiou	
17:00-17:45	Crystal engineering: Reactivity to pharmaceutics Leonard R. MacGillivray (University of Iowa, USA)
17:45-18:00	Novel Thiolate Ni(II) complexes for hydrogen evolution photocatalytically and electrocatalytically Fotios Kamatsos, Maria Drosou, Christiana A. Mitsopoulou (NKUA, Greece)
18:00-18:15	Oxidation of toluene by pulsed corona discharge combined with photocatalysis as a post-treatment for gaseous exhaust Maarja Kask, Marina Krichevskaya, Sergei Preis and Juri Bolobajev (Tallinn University of Technology, Estonia)
18:45-19:40	Flash Presentations (13)
19:30-19:45	Questions

Friday March 12th 2021

SESSION 5a: Chair: Ermolaos Iatrou	
10:30-11:00	Designing Materials at the Macromolecular Level for High Performance Solid Polymer Electrolytes Emmanouil Glynos (FORTH, Greece)
11:00-11:15	Synthesis and characterization of poly{DL-lactide-b-[oligo(ethylene glycol) methyl ether(meth)acrylate]} block copolymers. Micellization and encapsulation of hydrophobic drug model compounds Ioannis Choinopoulos, Nikos Karanikolopoulos, Marinos Pitsikalis (NKUA, Greece)
11:15-11:30	Tailoring polymer dispersity by (PET)-RAFT polymerization: a versatile approach Kostas Parkatzidis, Richard Whitfield and Athina Anastasaki (ETH Zürich, Switzerland)
11:30-11:45	Dendritic polymer functionalized carbon nanodiscs/poly(vinyl alcohol) nanocomposite membranes for water treatment applications Ioannis Tournis, Andreas Sapalidis, Zili Sideratou and Fotis Katsaros (NCSR "Demokritos", Greece)
11:45-12:00	COFFEE BREAK
SESSION 5b: Chair: Panayiotis Kyritsis	
12:00-12:15	Effect of Polymerization Components on Oxygen-Tolerant Photo-ATRP Manon Rolland, Richard Whitfield, Daniel Messmer, Kostas Parkatzidis, Nghia P. Truong, and Athina Anastasaki (ETH Zürich, Switzerland)
12:15-13:15	Flash Presentations (12)
13:15-13:30	Questions
13:00-15:00	LUNCH
SESSION 6a Chair: Patrina Paraskevopoulou	
15:00-15:30	Looking into microporous materials with solid-state NMR spectroscopy Gregor Mali (National Institute of Chemistry, Ljubljana, Slovenia)
15:30-15:45	Stabilization and reverse-engineering of gold nanoparticles in silica aerogels for static and continuous-flow catalytic applications István Lázár, Hanna Judit Szabó, Lajos Darócz (University of Debrecen, Hungary)
15:45-16:00	Synthesis and characterization of UCNP s for bioimaging applications Ana Iglesias-Mejuto, Alyne Lamy-Mendes, João Pina, Benilde F.O. Costa, Carlos A. García-González and Luisa Durães (Universidade de Santiago de Compostela, Spain)

16:00-16:15	Water-free processing of novel porous materials via cryoextraction and supercritical drying Pavel Gurikov and S.P Raman (<i>Hamburg University of Technology, Aerogelex UG, Germany</i>)
16:15-16:30	COFFEE BREAK
SESSION 6b: Chair: Margarita Chatzichristidi	
16:30-17:00	Structural characterization of aerogels centered on application József Kalmár, Attila Forgács, Adél Len, Zoltán Dudás, István Fábián (<i>University of Debrecen, Hungary</i>)
17:00-17:15	Hybrid Porous Materials from Starch/κ-Carrageenan/ PVA and Starch/κ-Carrageenan/PVA-SbQ for Tissue Engineering Fernando Alvarado-Hidalgo, Karla Ramírez-Sánchez, Laria Rodriguez, Roy Zamora-Sequeira, Esteban Avendaño-Soto⁵, Ricardo Starbird-Perez and Carlos A. García-González (<i>Instituto Tecnológico de Costa Rica, Costa Rica</i>)
17:15-17:30	Effect of sodium bicarbonate solution on methyltrimethoxysilane-derived silica aerogels dried under ambient pressure Yujing Liu, Xiao Han¹, Balati Kuerbanjiang, Vlado K. Lazarov and Lidija Šiller (<i>Newcastle University, UK</i>)
17:30-18:20	Flash Presentations (10)
18:20-19:35	Questions

Session 6 is co-organized with COST Action CA18125 “Advanced Engineering and Research of aeroGels for Environment and Life Sciences” (AERoGELS).

Saturday March 13th 2021

SESSION 7a: Chair: Sotirios Karavoltsos	
9:30-10:00	Iron and hemoprotein abundance in the Atlantic Ocean; link to global biogeochemical cycles and climate change Evangelia Louropoulou (GEOMAR Helmholtz-Zentrum für Ozeanforschung Kiel, Germany)
10:00-10:15	Air filtration systems for controlling fungal contamination in pear warehouses: an overview of the REPEAR project Vasilis P. Valdramidis, Davide Sardella and Ruben Gatt (University of Malta, Malta)
10:15-10:30	Occurrence and distribution of trace metals in the marine surface microlayer of coastal areas in the Aegean sea Sotirios Karavoltsos, Aikaterini Sakellari and Manos Dassenakis (NKUA, Greece)
10:30-10:45	Comparison of the water quality of three rivers under different environmental pressures with the use of robotic boats Georgios Katsouras, Nikos Tsalas, Alekos Dosis, Marina Despotidou, Stylianos Samios, Efthymios Lytras, Kostas Papadopoulos, Sotirios Karavoltsos, Emmanouil Dassenakis, Michael Scoullos, and Elias Dimitriou (E.Y.D.A.P., Greece)
10:45-11:00	Application of robotic boats to the water quality control through Greece: EYDAP's success story Efthymios Lytras, Nikos Tsalas, Alekos Dosis, Georgios Katsouras, Marina Despotidou, Stylianos Samios, and Kostas Papadopoulos (E.Y.D.A.P., Greece)
11:00-11:15	Upgrade of EYDAP's water quality control with the use of robotic boats Marina Despotidou, Nikos Tsalas, Alekos Dosis, Georgios Katsouras, Stylianos Samios, Efthymios Lytras and Kostas Papadopoulos (E.Y.D.A.P., Greece)
11:15-11:30	COFFEE BREAK
SESSION 7b Chair: Evangelos Bakeas	
11:30-11:45	Sewer Mining technology: a sustainable solution for urban recreation areas irrigation Stylianos Samios, Kostas Papadopoulos, Efthymios Lytras, Marina Despotidou, Aggeliki Derlere, Georgios Katsouras, Nikos Tsalas, Noutsopoulos C., Mamaidis D., Makropoulos C. (E.Y.D.A.P., Greece)
11:45-12:00	PVAdapt: A cost-effective, smart, sustainable and multifunctional Building Integrated Photovoltaics (BIPV) system Mantha Schismenou, Marina Despotidou, Stylianos Samios, Efthymios Lytras and Konstantinos Papadopoulos (E.Y.D.A.P., Greece)
12:00-12:15	Honey, as the "time capsule" of long term environmental change – acacia bee products

	Zsófi Sajtos¹, Tamás Varga, Zita Gajdos, A.J. Timothy Jull³, Mihály Molnár, Edina Baranyai (University of Debrecen, Hungary)
12:15-12:30	Honey, as the “time capsule” of long term environmental change - rape, sun- and multifloral bee products Edina Baranyai, Zsófi Sajtos, Tamás Varga, Zita Gajdos¹, A.J. Timothy Jull, Zsuzsa Lisztes-Szabó, Mihály Molnár (University of Debrecen, Hungary)
12:30-12:45	Determination of PM-bound organosulfates in the atmosphere of Athens: Seasonal cycles and source apportionment Panagiotis-Georgios Kanellopoulos, Eirini Chrysochou, Koukoulakis Konstantinos, Sevasti-Panagiota Kotsaki, Nikolaos Zacharopoulos, Athanassios I. Philippopoulos and Evangelos Bakeas (NKUA, Greece)
12:45-13:00	Flash Presentations (3)
SESSION 8 Chair: Georgios C. Vougioukalakis	
13:00-13:30	Wavefunction engineering in semiconductor colloidal quantum dots for light emission Sotirios Christodoulou (University of Cyprus, Cyprus)
13:30-13:45	From molecules to nanomaterials Rapakousiou Amalia (CNRS, France)
13:45-14:00	CuO/PMMA polymer nanocomposites as resist materials for e-beam lithography Georgia Geka, George Papageorgiou, Margarita Chatzichristidi, Andreas Germanos Karydas, Vassilis Psycharis² and Eleni Makarona (NCSR "Demokritos", Greece)
14:00-14:15	Innovative Industrial Materials with Advanced Multifunctionality, Prolonged Lifetime and Improved Performance Against Environmental Conditions for Versatile Protective Equipment Ioanna K. Sideri, Nikolaos S. Heliopoulos, Theodoros Zikos, Dionysios Siamidis, Georgios C. Vougioukalakis, and Nikos Tagmatarchi (NHRF, Greece)
14:15-14:30	Chemical Synthesis of p-type Zinc Oxide Nanostructures Georgios P. Papageorgiou, Vassilis Psycharis, Maria Androulidaki, Dimitrios Christofilos and Eleni Makarona (Univ. of Patras, NCSR "Demokritos, Greece)
14:30-14:50	Flash Presentations (4)
14:50-15:00	Questions
15:00-15:30	AWARDS / CLOSING CEREMONY

Flash Presentations Program

Wednesday March 10th 2021

SESSION 1 (13:15-14:15)	
13:15-13:20	A new chiral pincer <i>P,N,N</i> phosphonite ligand and its Rh(I) complex as a potent catalyst for asymmetric hydrogenation Polydoros-Chrysovalantis Ioannou, Eleftherios Ferentinos, Panayotis Kyritsis and Ioannis D. Kostas (NHRF, Greece)
13:20-13:25	Design and synthesis of peptidomimetic inhibitors for the M1 family of zinc aminopeptidases Alexandros Athanasoulis, Ioannis Mavridis, Ioannis Temponeras, Efstratios Stratikos, Athanasios Papakyriakou and Dionisios Vourloumis (NCSR "Demokritos", Greece)
13:25-13:30	Synthesis and biological activity of new benzothiazole derivatives with potent anticancer activity Yakinthi Batsi, Georgia Antonopoulou, Kassandra Koumaki, Vivian Kosmidou, Maria Goulielmaki, Vassilis Zoumpourlis, Vassilis Souliotis, Alexander Pintzas and Ioannis D. Kostas (NHRF, Greece)
13:30-13:35	A novel, copper(I)-NHC well-defined catalytic system for the multicomponent synthesis of quaternary propargylamines Savvas G. Chalkidis and Georgios C. Vougioukalakis (NKUA, Greece)
13:35-13:40	Unveiling the molecular mechanism of action of the anti-hypertensive drug irbesartan through 2D NMR Spectroscopy Eleni Chontzopoulou, Sofia Kiriakidi, Uroš Javornik, Janez Plavec, Andreas Tzakos and Thomas Mavromoustakos (NKUA, Greece)
13:40-13:45	A novel, domino O-H/C-H activation reaction towards the synthesis of oxygen-doped polyaromatic molecules with technological applications Entzy Kaplanai, Eftathios Tonis, Yulian Zagranjarski and Georgios C. Vougioukalakis (NKUA, Greece)
13:45-13:50	Covalent inhibition of bacterial urease by bifunctional catechol-based phosphonates and phosphinates Aikaterini Pagoni, Agnieszka Grabowiecka, Artur Mucha, Łukasz Berlicki and Stamatia Vassiliou (NKUA, Greece)
13:50-13:55	Small molecules for the preparation of modified aramid fibers with improved properties Georgios Rotas, Anna Pantelia, Effrosyni Frousiou, Efstathios Tonis, Savvas G. Chalkidis and Georgios C. Vougioukalakis (NKUA, Greece)
13:55-14:00	A Pd-free Sonogashira coupling protocol employing an in-situ-prepared copper/chelating 1,2,3-triazolylidene system Efstathios Tonis, Felix Stein, Ioannis K. Stamatopoulos, Jessica Stubbe, Athanasios Zarkadoulas, Biprajit Sarkar and Georgios C. Vougioukalakis (NKUA, Greece)

14:00-14:05	The KA ² coupling under sustainable metal catalysis: assembly of tetrasubstituted propargylamines and theoretical study of the manganese-catalyzed version <u>Nikolaos V. Tzouras, Athanasios Zarkadoulas and Georgios C. Vougioukalakis (NKUA, Greece)</u>
14:05-14:10	Zinc iodide catalyzed allenylation of terminal alkynes towards trisubstituted allenes under conventional or microwave irradiation conditions <u>Leandros P. Zorba and Georgios C. Vougioukalakis (NKUA, Greece)</u>
14:10-14:15	Conformational analysis of cinnamic compound NGI27 using a combination of 2D NMR Spectroscopy and Molecular Dynamics studies <u>Anastasios Gkionis, Georgios Skoufas, Eleni Chontzopoulou, Nikitas Georgiou, Niki Gouleni, Thomas Mavromoustakos and Stamatia Vasiliou (NKUA, Greece)</u>
SESSION 2 (18:00-19:15)	
18:00-18:05	Development of novel anti-fouling paints for aquaculture applications. In vitro biological evaluation. <u>Nikoleta Kostopoulou, Danai Prokopiou, Maria-Malvina Stathouraki, Sergios Papageorgiou and Eleni Efthimiadou (NKUA, Greece)</u>
18:05-18:10	Synthesis of novel cinnamic acid derivatives as possible anti-Alzheimer agents <u>Niki Gouleni, Antonio diStefano, Ivana Cacciatore and Stamatia Vasiliou (NKUA, Greece)</u>
18:10-18:15	Searching for novel synthetic MAO inhibitors <u>Panagiou Mavroeidi, Aggeliki Syriopoulou, Nikitas Georgiou, Nikolaos Tzouras, Stavros Neofotistos, Georgios Vougioukalakis, Serdar Durdagi and Thomas Mavromoustakos (NKUA, Greece)</u>
18:15-18:20	Discovery of novel and selective inhibitor leads by targeting an allosteric site in Insulin-Regulated Aminopeptidase <u>Ioannis Temponeras, Lykourgos Chiniadis, Athanasios Papakyriakou and Efstratios Stratikos (NKUA, Greece)</u>
18:20-18:25	Unraveling the protein ruthenation by antimetastatic metallodrugs: High-resolution X-ray structures of the adduct formed between hen egg-white lysozyme and NAMI-A at various time intervals <u>Lykourgos Chiniadis, Petros Giastas, Elias Eliopoulos, Ioannis Bratsos and Athanasios Papakyriakou (NCSR "Demokritos", Greece)</u>
18:25-18:30	Design and synthesis of non-toxic nanocontainers loaded with selective inhibitors contributing to the pathogenesis of cancer. <u>Theodora S. Koutsikou, Ioannis Mavridis, Emmanuel N. Pitsinos, Penelope Bouziotis, Stavros Xanthopoulos, E. Sakellis, N. Boukos, G. Mitrikas and E. K. Efthimiadou (NCSR "Demokritos", Greece)</u>
18:30-18:35	Directed evolution of 3,4-dioxygenase of protocatechuic acid: Emergence of alternative substrate specificity <u>Tsagkogiannis Epameinondas, Syriopoulou Aggeliki, Tzakos Andreas, Mavromoustakos Thomas and Anna-Irini Koukou (UoI, Greece)</u>

18:35-18:40	Comparative NMR study of the complexation of Quercetin with two β -CD Konstantina Manta, Paraskevi Papakyriakopoulou, Maria Chountoulesi, Dimitrios A. Diamantis, Dimitrios Spaneas, Vasiliki Vakali, Nikolaos Naziris, Maria V. Chatziathanasiadou, Ioannis Andreadelis, Kalliopi Moschovou, Ioanna Athanasiadou, Paraskevas Dallas, Dimitrios M. Rekkas, Costas Demetzos, Gaia Colombo, Uros Javornik, Janez Plavec, Thomas Mavromoustakos, Andreas G. Tzakos and Georgia Valsami (NKUA, Greece)
18:40-18:45	Conformational characteristics decisive for their biological action of organotin metallotherapeutics N. Zoupanou, S. Chadjikakou, C. Banti, M.E Stathopoulou, S. Kyriakidi, Carlos Silva Lopez and T. Mavromoustakos (NKUA, Greece)
18:45-18:50	Bio-functional surfaces of fluoropolymers via lithography techniques F. Machairioti, A. Nika, P. Petrou and M. Chatzichristidi (NKUA, Greece)
18:50-18:55	Water-soluble multi-walled carbon nanotubes decorated with guanidinylatedhyperbranched poly(ethyleneimine) derivatives with enhanced antibacterial performance Kyriaki-Marina Lyra, Katerina N.Panagiotaki, Aggeliki Papavasiliou and Zili Sideratou (NCSR "Demokritos", Greece)
18:55-19:00	Iron oxide magnetic nanoparticles modified with biomolecules for theranostic applications Danai Prokopiou, Vladan Kusigerski, Sanja Vranjes-Duric and Eleni K. Efthimiadou (NCSR "Demokritos", Greece)
19:00-19:05	Hollow pH sensitive polymeric nanospheres modified with quantum dots for bioapplications Athina Papadopoulou, Eleni K. Efthimiadou, Nikolaos Chalmpes and Dimitrios Gournis (NKUA, Greece)
19:05-19:10	Investigation of insulinomimetic action of cobalt compounds with physiological substrates focusing on adipogenesis C. Chalkiadakis, O. Tsav, S. Matsia and A. Salifoglou (AUTH, Greece)
19:10-19:15	Polymeric microparticle synthesis as advanced materials in biomedical applications Christos Vasileiou, Sevasti Matsia, Ioannis Kioumis and Athanasios Salifoglou (AUTH, Greece)

Thursday March 11th 2021

SESSION 3 (13:30-14:25)	
13:30-13:35	Incorporation of graphitic carbon nitride as ETL for highly efficient perovskite solar cells <u>Ioanna Martinaiou, Konstantina Gkini and Polycarpos Falaras (NCSR "Demokritos", Greece)</u>
13:35-13:40	Constrained Fermionic Dynamics of Nuclear Systems: Ground states and Giant Dipole Resonances <u>T. Depastas, G.A. Souliotis, K. Palli, M. Veselsky, H. Zheng and A. Bonasera (NKUA, Greece)</u>
13:40-13:45	Microscopic dynamics study of multinucleon transfer in ^{40}Ar induced collisions at 15 MeV/nucleon for the production of neutron rich isotopes <u>K. Palli, G.A. Souliotis, T. Depastas, O. Fasoula, S. Koulouris, M. Veselsky and A. Bonasera (NKUA, Greece)</u>
13:45-13:50	Xerogel Coatings to bone implants prevent development of biofilm formation and severe osteomyelitis <u>Marilina Douloudi, Eleni Nikoli, Michaela Papageorgiou, Michael Arkas, Paraskevi Gomoza, Michalis Vardavoulias, Ioanna Kitsou, Athina Tsetsekou, Yuly López, Sara Soto, Amalie Blirup-Plum, Bent Aalbæk, Henrik Elvang Jensen and Louise Kruse Jensen (NCSR "Demokritos", Greece)</u>
13:50-13:55	Ternary phase diagrams of polyimide/solvent/non-solvent systems <u>K. Mansouris, G.V. Theodorakopoulos, D.S. Karousos, A.A. Sapalidis, E.K. Efthimiadou and E.P. Favvas (NCSR "Demokritos", Greece)</u>
13:55-14:00	Electronic structure and Bonding properties of iron–sulfur clusters <u>Markella A. Mermigki and Demeter Tzeli (NKUA, Greece)</u>
14:00-14:05	Molecular dynamics simulation of poly(vinylidene fluoride) <u>Matrona N. Panou and Niki Vergadou (NCSR "Demokritos", Greece)</u>
14:05-14:10	Tuning the absorption spectra of nickel and zinc complexes of N-confused tetraphenylporphyrin <u>Eleftherios Papamichalis, Ioannis D. Petsalakis and Demeter Tzeli (NKUA, Greece)</u>
14:10-14:15	Core/Shell Au/Pt nanoparticles as a potential drug delivery system enhancing the optical and anticancer activity, coated with a new drug to target glioblastoma. <u>Anastasia P. Stavropoulou, Maria Theodosiou, Elias Sakellis, Nikos Boukos, Giorgos Papanastasiou, Chengjia Wang, Adriana Tavares, Carlos Alcaide Corral, Dimitrios Gournis, Nikolaos Chalmpes, Oliviero L. Gobbo and Eleni K. Efthimiadou (NKUA, Greece)</u>
14:15-14:20	Theoretical study of the photophysical processes of a three-input AND molecular logic gate with an enhanced fluorescent output <u>Christina Tzeliotou and Demeter Tzeli (NKUA, Greece)</u>
14:20-14:25	Analysis of the double, quadruple and sextuple chemical bonding of diatomic molecules of 2 nd row transition metals

	Alexandros Androutsopoulos, Theodoros Depastas, Ioannis Karapetsas and Demeter Tzeli (NKUA, Greece)
SESSION 4 (18:15-19:20)	
18:15-18:20	Metal oxide photocatalysts for photoelectrochemical energy production Maria Antoniadou, Michalis K. Arfanis and Polycarpos Falaras (NCSR "Demokritos", Greece)
18:20-18:25	Mechanochemical synthesis of sustainable amide functionalized MOFs for water remediation – “SAFeMOFs” A. M. Fidelli, A. D. Katsenis and G. S. Papaefstathiou (NKUA, Greece)
18:25-18:30	Improved environmental stability of perovskite photoactive layer mixed with functionalized porphyrin molecules Anastasia Soultati, Konstantinos Tsevas, Athanassios G. Coutsolelos and Maria Vasilopoulou (NCSR "Demokritos", Greece)
18:30-18:35	Post-synthetic modified MOFs for water remediation applications Georgios D. Tarlas and Giannis S. Papaefstathiou (NKUA, Greece)
18:35-18:40	Organometallic complexes of $[(\eta^5\text{-cp})\text{Ru}(12\text{-CPP})]\text{PF}_6$ Konstantinos Ypsilantis, Theodoros Tsolis and Achilleas Garoufis (UoI, Greece)
18:40-18:45	Stable performance of DSSCs under "pan-illumination" lighting conditions through optimized electrolyte formulation George V. Belessiotis and Polycarpos Falaras (NCSR "Demokritos", Greece)
18:45-18:50	Binding affinity of a diimine-dithiolene Ni(II) complex with bovine serum albumin: spectroscopic and docking Studies S. Balou, A. Daflou, M. Vlara and C.A. Mitsopoulou (NKUA, Greece)
18:50-18:55	Silver-modified $\text{TiO}_2/\text{g-C}_3\text{N}_4$ nanocomposites for photocatalytic degradation of water contaminants Islam Ibrahim and Polycarpos Falaras (NKUA, Greece)
18:55-19:00	Photocatalytic hydrogen evolution through TGA coated Cd-Te QDs and Ni (II) complexes M. Kourmousi, F. Kamatsos and C. Mitsopoulou (NKUA, Greece)
19:00-19:05	A new oxalamide-based 3D Fe-MOF for potential glucose sorption and electrochemical detection in human perspiration via electrode modification. Panagiotis Oikonomopoulos and Giannis S. Papaefstathiou (NKUA, Greece)
19:05-19:10	MOF-74 Analogues for glucose sorption and/or electrode modifiers for the electrochemical detection of glucose in human perspiration. Alexios K. Plessas and Giannis S. Papaefstathiou (NKUA, Greece)
19:10-19:15	Binary-Ternary coordination complexes of flavonoids and trivalent metal ions. Design, synthesis and characterization. Georgios Lazopoulos, Sevasti Matsia, Antonios Hatzidimitriou and Athanasios Salifoglou (AUTH, Greece)
19:15-19:20	Biological evaluation of tris-heteroleptic ruthenium complexes with DNA and BSA, docking studies analysis

**S. Balou, M. Apostolopoulou, J. Stetou and C.A. Mitsopoulou (NKUA,
Greece)**

Friday March 12th 2021

SESSION 5 (12:15-13:15)	
12:15-12:20	Synthesis and characterization of linear and miktoarm star copolymers with high Flory-Huggins (χ) interaction parameter Polyxeni P. Angelopoulou, Maria-Malvina Stathouraki and Georgios Sakellariou (NKUA, Greece)
12:20-12:25	pH-sensitive nanogates based on poly(L-histidine) and poly(ethylene oxide) for controlled drug release from mesoporous silica nanoparticles Foteini Arfara, Barbara Athanasiou and Hermis Iatrou (NKUA, Greece)
12:25-12:30	Amphiphilic block copolymers with terminal moieties for effective targeting and drug release against tumor cells Panagiotis Christakopoulos and Hermis Iatrou (NKUA, Greece)
12:30-12:35	Stimuli-responsive polypeptide hydrogels for targeted drug delivery against pancreatic cancer Maria Kasimati Tzanne and Hermis Iatrou (NKUA, Greece)
12:35-12:40	Synthesis of complex architectures based on poly(N-Vinylpyrrolidone) through Reversible Addition Fragmentation Chain Transfer Polymerization (RAFT) Kokkorogianni Olga and Pitsikalis Marinos (NKUA, Greece)
12:40-12:45	Statistical copolymers of N-vinylpyrrolidone and isobornyl methacrylate via free radical and RAFT polymerization: monomer reactivity ratios, thermal properties and kinetics of thermal decomposition. Olga Kokkorogianni, Philippos Kontoes-Georgoudakis, Maria Athanasopoulou, Nikolaos Polizos and Marinos Pitsikalis (NKUA, Greece)
12:45-12:50	Synthesis and characterization of double-stimuli-responsive terpolymers based on poly(ethylene oxide), poly(histidine) and poly(cysteine) Iro Kyroglou and Hermis Iatrou (NKUA, Greece)
12:50-12:55	Synthesis and characterization of well-defined miktoarm star polymers, $(PS)_n(PEO)_n$ Emmanouil Mygiakis, Emmanouil Glynnos and George Sakellariou (NKUA, Greece)
12:55-13:00	Synthesis of a well-defined polyelectrolyte by controlled/ “living” nitroxide mediated radical polymerization. Kinetic study Christos Pantazidis, Stelios Andreou, Emmanouil Glynnos and Georgios Sakellariou (NKUA, Greece)
13:00-13:05	Near-Infrared absorbing conjugated polymer nanoparticles for photoacoustic imaging Andriana Schiza, Alkmini Nega and Christos L. Chochos (NHRF, Greece)
13:05-13:10	Synthesis and characterization of the novel N^{ϵ} -9-fluorenylmethoxycarbonyl-l-lysine N-carboxy anhydride. Synthesis of branched polypeptide Pandora Thimi and Hermis Iatrou (NKUA, Greece)
13:10-13:15	Synthesis and thermal properties of complex macromolecular architectures based on poly(styrene oxide) and poly(ethylene oxide)

	<u>Christos Zisis</u> , George V. Theodosopoulos and Marinos Pitsikalis (NKUA, Greece)
SESSION 6 (17:30-18:25)	
17:30-17:35	Polylactide-crosslinked alginate aerogels Grigoris Raptopoulos and Patrina Paraskevopoulou (NKUA, Greece)
17:35-17:40	Poly(ionic liquid)-chitosan aerogels for environmental applications Raquel V. Barrulas, Clara López-Iglesias, Marcileia Zanatta, Teresa Casimiro, Carlos A. García-González and Marta C. Corvo (NOVA, Portugal)
17:40-17:45	Synthesis of polyurea aerogels with first-row transition metal catalysts Eleni Effraimopoulou, Despoina Chriti, Maria Papastergiou, Grigoris Raptopoulos and Patrina Paraskevopoulou (NKUA, Greece)
17:45-17:50	Assessing in situ remediation efficacy of advanced aerogel adsorbent by using model aquatic culture of paramecium caudatum exposed to Hg(II) Petra Herman, Alexandra Kiss, Gábor Nagy, István Fábián and József Kalmár (University of Debrecen, Hungary)
17:50-17:55	Evaluation of polyurea-crosslinked alginate aerogels for seawater decontamination Faidra Leontaridou, Grigoris Raptopoulos, Maria Papastergiou, Aikaterini Sakellari, Sotirios Karavoltsos and Patrina Paraskevopoulou (NKUA, Greece)
17:55-18:00	False Morphology of Aerogels Caused by Gold Coating for SEM Imaging Laura Juhász, Krisztián Moldován, Pavel Gurikov, Falk Liebner, István Fábián, József Kalmár and Csaba Cserháti (University of Debrecen, Hungary)
18:00-18:05	Mechanism of action of silica aerogel catalyst functionalized with Cu(II)-cyclam complex Vlada Baikenova, Attila Forgács, István Fábián and József Kalmár (University of Debrecen, Hungary)
18:05-18:10	Cisplatin loaded hybrid aerogel microparticles for cervical and colorectal cancer chemotherapy John Chinonso Egu, Krisztián Moldován, Petra Herman, István Fábián, Ferenc Fenyesi and József Kalmár (University of Debrecen, Hungary)
18:10-18:15	Adsorption of bovine serum albumin (BSA) on silica aerogel surface Madalina Ranga, Attila Forgács, József Kalmár and István Fábián (University of Debrecen, Hungary)
18:15-18:20	Hydration induced structural changes of polyamide and polyimide aerogels Tran Hoang Thanh Truc, Attila Forgács, Krisztián Moldován, István Fábián and József Kalmár (University of Debrecen, Hungary)
18:20-18:25	Silk fibroin aerogel particles for chronic wound healing Beatriz Bernardes, Raquel Costa, Carlos A. García-González, Ana Leite Oliveira (Universidade Católica Portuguesa, Portugal)

Saturday March 13th 2021

SESSION 7 (12:45-13:00)	
12:45-12:50	Characterization of marine surface microlayer by ATR-FTIR spectroscopy, free amino acids analysis and chemometrics <u>Sotirios Karavoltsos, Aikaterini Sakellari, Georgios Bekiaris, Dimitra Tagkouli and Nick Kalogeropoulos (NKUA, Greece)</u>
12:50-12:55	Ultraviolet light correlated to wine antioxidant activity <u>Nikolaos Zikos (NKUA, Greece)</u>
12:55-13:00	How different types of questions guide students' reasoning about global warming <u>Maria Mavridi, Katerina Salta and Thomas Mavromoustakos (NKUA, Greece)</u>
SESSION 8 (14:30-14:50)	
14:30-14:35	Wet chemical synthesis of CuO and NiO nanoarchitectures and nanometrological analysis <u>Anthi Dimou, Aikaterini Ninou, Margarita Chatzichristidi, Vassilios Constantoudis and Eleni Makarona (NKUA, Greece)</u>
14:35-14:40	Hydrothermal deposition of metal nanoparticles onto carbon microspheres as catalysts for H ₂ O ₂ reduction <u>Milan Momčilović, Jelena Čović, Marjan Ranđelović and Aleksandra Zarubica (University of Belgrade, Serbia)</u>
14:40-14:45	Microfluidics and Lab on a chip: Development of micro-chip manufacturing techniques with PDMS and study of micro fluxes. <u>Konstantinos Rogkotis, Sevasti Matsia and Athanasios Salifoglou (AUTH, Greece)</u>
14:45-14:50	Design of a hybrid mechanical flotation system for enhancing fine mineral particles <u>P.K. Tsav, M. Kostoglou, T.D. Karapantsios and N. K. Lazaridis (AUTH, Greece)</u>