



17th Mediterranean Conference on Calorimetry and Thermal Analysis

MEDICTA 2025

PROGRAMME

9-11 July 2025 Thessaloniki, GREECE
KEDEA Building, Aristotle University of Thessaloniki



Aristotle University
of Thessaloniki
SCHOOL OF PHYSICS



<https://medicta2025.web.auth.gr>



Welcome message by Chairman

On behalf of the Scientific, Local, and International Organizing Committees, I am pleased to welcome you to **MEDICTA2025**, the **17th Mediterranean Conference on Calorimetry and Thermal Analysis**, held in Thessaloniki, Greece, from July 9 to 11, 2025.

The conference aims to highlight the role of Thermal Analysis and Calorimetry in scientific fields such as materials, drugs, food, energy, and the environment, as well as in key areas of the kinetics and thermodynamics of physical and chemical processes. Scientists, engineers, academics, researchers, and experts from around the world, especially from Mediterranean countries, were invited to participate and present their valuable work. The conference is primarily supported by the Societies of Thermal Analysis from Mediterranean Countries, including the Hellenic Society of Thermal Analysis (HSTA), the Interdivisional Group of Calorimetry and Thermal Analysis (GICAT), the Italian Association of Calorimetry and Thermal Analysis (AICAT), the Committee for Thermal Analysis and Calorimetry of the Croatian Society of Chemical Engineers (CCTAC-CSCE), the French Association for Calorimetry and Thermal Analysis (AFCAT), the Spanish Group of Calorimetry and Thermal Analysis (GECAT), and the Calorimetry and Thermal Analysis Group of Porto (CATPOR).

We welcome you in **Thessaloniki, Greece** and hope to have a fruitful and enjoyable conference!

On behalf of the Organizing Committee,

Prof. Dimitris S. Achilias

President of the Hellenic Society of Thermal Analysis



View of the Thermaic Gulf from the Upper Town (or Old Town) of Thessaloniki



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PROGRAMME	
Wednesday 9 July 2025	
8:30	Registration
9:15-9:50	Welcome / Hall I Dimitris Achilias – Konstantinos Chrissafis
9:15-9:35	Opening Greeting from the President of H.S.T.A. Welcome Addresses
9:35-9:50	A historical overview of H.S.T.A. through the eyes of <u>Prof. Maria Lalia-Kantouri</u>
9:50-11:15	Session I / Hall I Maria Lalia-Kantouri – Stefano Vecchio-Ciprioti
9:50-10:35	Invited lecture: Thermodynamic Characterization of Relevant Organic Compounds with application in biomass valorization and as energetic materials <u>Ana Luís R. Silva</u>
10:35-10:45	Characterising materials under hydrogen atmosphere <u>Derek Black</u> , SETARAM - KEP Technologies
10:45-11:05	Thermal stability of multimeric proteins: recognizing the dissociation/denaturation mechanism through DSC <u>Dimitrios Fessas</u> , F. Saitta
11:05-11:15	Influence of the Pressure in the curing process of Thermosets <u>Dr. Carlos A. Gracia Fernández</u> , TA Instruments –Waters S.A.
11:15-11:35	<i>Coffee Break (ground floor-outdoors)</i>
11:35-13:30	Session II / Hall I Maria Das Dores Silva – Dimitrios Fessas
11:35-12:20	Invited lecture: Form-stable phase change fibers via electrospinning <u>I. Chrysafi, K. Avraam, Theodora Krasia-Christoforou</u>
12:20-12:40	Co-oxidation of lipids and proteins in mixed media paints <u>G. Caroti, R. Georgiou, Celia Duce, I. Bonaduce</u>
12:40-13:00	Calorimetric and thermodynamic analysis of Malaria-vector <i>A. gambiae</i> OBPs with natural repellents <u>Francesca Saitta, E. Christodoulou, E.C.V. Stamatyi, K.E. Tsitsanou, P. G.V. Liggri, M. Signorelli, S.E. Zographi, D. Fessas</u>
13:00-13:20	Different states of water in α - and β -cyclodextrin hydrates <u>Liudmila Zelenina, T. Chusova, T. Rodionova, A. Manakov</u>



13:20-13:30	High-End Scientific Instrumentation for Modern Needs <u>Apostolos Fragkalas</u> - HELLAMCO
13:30-14:15	<i>Lunch Break (ground floor-outdoors)</i>
14:15-15:05	POSTER SESSION (middle floor)
15:05-17:05	Session III / Hall I Fabio Faraguna – Kiriaki Chrissopoulou
15:05-15:25	Kinetic study of high temperature thermal reduction of CuO(s) for thermochemical energy storage <u>Aymen Miali</u> , L. Favergeon, M. Fischer, L. Vieille
15:25-15:45	Thermal Analysis of Hematite-Wax Pickering Emulsions for Environmental Applications <u>Chiara Ferlito</u> , L. Lisuzzo, L. Guercio, G. Cavallaro, G. Lazzara
15:45-16:05	MicroRNAs and their interaction with biologically active molecules in drug repurposing <u>Diana Alister</u> , F. D'Aria, C. Giancola
16:05-16:25	The key role of the anion in the mixtures formed by TBA-salts and imidazole-based compounds <u>Ivan Fabrizi</u> , S. Di Muzio, F. Ramondo, F. Trequattrini, O. Palumbo, A. Paolone
16:25-16:45	Vapour Pressures, Phase Transitions, and Solid-State Fluorescence of Three Benzazoles <u>José M. Silva Ferraz</u> , A. L. R. Silva, V. L. S. Freitas, M. D. M. C. Ribeiro da Silva, S. Vecchio-Cipriotti
16:45-17:05	Thermal degradation of Cu-, Ga-, and In-based liquid metal salts (LMSs) <u>Michael Casale</u> , T. Burton, S. Delsante, D. Colombara
17:05-17:25	<i>Coffee Break (ground floor-outdoors)</i>

Parallel Session

15:05-17:05	Session IV / Hall III Theodora Krasia-Christoforou – Ana-Luísa R. Silva
15:05-15:25	Effect of Thiol-Ene/Acrylate Reactions on Thermal Behavior of Methacrylated Eugenol-Based Thermosets <u>Gabriel I. dos Santos</u> , C. Gagliari, R. T. Alarcon, A. de Moura, G. Bannach
15:25-15:45	Thermal characterization of Bupropion: DSC and TGA for Optimizing Hot Melt extrusion and 3D-printing



	<u>Chrystalla Protopapa</u> , A. Siamidi, S. Kolipaka, D. Theodoridou, L. A. Junqueira, M. Vlachou, D. Douroumis
15:45-16:05	The use of DSC and TGA techniques for the characterization of hybrids of perphenazine loaded in clay minerals <u>Claudia Urru</u> , V. Friuli, G. Bruni, C. Ferrara, L. Maggi, D. Capsoni
16:05-16:25	Properties of Poly(lactic acid) (PLA) and Poly(butylene succinate) Blends through Nanocellulose Incorporation and Compatibilization <u>Georgia Lathira</u> , E. Xanthopoulou, Z. Terzopoulou, R. Sanchez, P. Albaladejo Sánchez, M.A. Valera, D. Bikiaris
16:25-16:45	Effect of lignocellulosic residue on the biodegradation of PLA biomaterials in natural conditions <u>Elena Pulidori</u> , C. Pelosi, V. Paganini, A. Corti, G. Totaro, C. Duce
16:45-17:05	Thermochemical Recycling of Styrenic Polymer Blends: Study of Thermal Decomposition and Pyrolysis Products <u>Eleni Alexopoulou</u> , M.A. Charitopoulou, D. Achilias
17:05-17:25	<i>Coffee Break (ground floor-outdoors)</i>
17:25-19:30	Session V / Hall I Loïc Favergéon – Dionysios Mouzakis
17:25-18:10	Invited lecture: Harnessing Polymer Crystallinity: Innovations for Fuel Additives and Pharmaceutical Applications <u>Fabio Faraguna</u> , I. Šoljić Jerbić, E. Meštrović, A. Jukić, I. Pucko, R. Anelić, P. Pongrac, K. Blažević, L. Mandić
18:10-18:30	Tuning Crystallization in Bottlebrush Copolymers G. Markozanne, F. Krasanakis, T. Manouras, M. Vamvakaki, S. H. Anastasiadis, <u>Kiriaki Chrissopoulou</u>
18:30-18:50	Selectivity of thermoresponsive functional polymers for lithium removal from battery leachate A. Liberati, A. Geneste, J.-P. Mericq, S. Monge, C. Faur, <u>Bénédicte Prélot</u>
18:50-19:10	A novel approach in Human Implants Transportation Procedure <u>Dionysios E Mouzakis</u> , G. Tsoulfas, A. Papalois, L. Vagiotas
19:10-19:20	Packaging design for a better Future Planet <u>Eleftherios Tourasanidis</u> , HATZOPOULOS S.A.
19:30-21:00	<i>Welcome Cocktail</i>



Thursday 10 July 2025	
8:30	Registration
9:00-11:05	Session VI / Hall I Luis Pérez-Maqueda – Matko Erceg
9:00-9:45	Invited lecture: Recent advances in thermal energy storage <u>Ricardo Chacartegui</u>
9:45-10:05	Kinetics of curing for two-component epoxy with different epoxy/amine ratios <u>Dr. Elena Moukhina, NETZSCH</u>
10:05-10:25	Kinetic analysis of coke combustion via temperature-programmed oxidation and thermogravimetric method: Effect of coke nature <u>Eleni Pachatouridou, A. Lappas</u>
10:25-10:45	Isoconversional Kinetic Analysis for Evaluating Experimental Data Quality in Polymer Degradation and Crystallization <u>Evangelia Tarani, K. Chrissafis</u>
10:45-11:05	Thermal stability and kinetics of thermal decomposition of linear, and star-shaped polyisocyanates <u>E. Apostolakis, A. Katara, D. Mantzara, M. Panteli, M. Iatrou, I. Kontogiannis, I. Kyrikos, Marinos Pitsikalis</u>
11:05-11:25	<i>Coffee Break (ground floor-outdoors)</i>
11:25-13:30	Session VII / Hall I Marinos Pitsikalis – Natassa Pippa
11:25-12:10	Invited lecture: Challenges and Applications of Solid-Liquid Calorimetry in Studies of Interfacial Phenomena and Surface Properties of Porous Materials <u>Jerzy-Jozef Zajac</u>
12:10-12:30	Static and Dynamic Behaviour Dependence on the Degree of Crystallinity and Printing Orientation of 3D Printed PLA Exoprostheses Parts <u>D. Zachos, L.C. Kontaxis, Stefanos Zaoutsos</u>
12:30-12:50	Volatilization thermodynamics of mixed-ligand metal(II) complexes for producing high-emission films <u>Kseniya Zherikova, E. Vikulova</u>
12:50-13:10	Modular Peltier-based Isothermal Battery-Calorimeter <u>Michael Gerlach, LINSEIS</u>



13:10-13:30	Solid-phase synthesis and characterization of samples of double titanates of terbium-lutetium, dysprosium-lutetium, holmium-lutetium, erbium-lutetium <u>Mira Bissengaliyeva</u> , A. Kozlovskiy, D. Gogol, D. Sadyrbekov
13:30-14:20	<i>Lunch Break (ground floor-outdoors)</i>
14:20-15:10	POSTER SESSION (middle floor)
15:10-16:30	Session VIII / Hall I Stefanos Zaoutsos – Jerzy-Jozef Zajac
15:10-15:30	PLA nanocomposites based on different MWCNT systems for printed electronics <u>Eleftheria Xanthopoulou</u> , R. O. Ioannidis, A. Pitsavas, D. Balaskas, P. Klonos, A. M. Gorman, S. Makri, A. Grigoropoulos, D.N. Bikaris
15:30-15:50	Environmental Thermodynamics of Halogenated Anisoles: Vapor Pressures, Solubility, and Mobility Assessment <u>Bruno Pinheiro</u> , A. Almeida, M. Monte
15:50-16:10	Thermoresponsive nanoparticles for gene delivery <u>Ioannis Tsichlis</u> , A. Vardaxi, K. Rahali, S. Pispas, D. Douroumis, C. Demetzos
16:10-16:30	Hydroprocessing of commercial multilayer food packaging with the aim of separating the films, applying thermal treatment and recycling <u>Panagiotis Alexiou</u> , E.C. Vouvoudi, D.S. Achilias
16:30-16:50	<i>Coffee Break (ground floor-outdoors)</i>

Parallel Session

15:10-16:30	Session IX / Hall III Ioannis Tsivintzelis – Ignazio Blanco
15:10-15:30	Analytical Pyrolysis for the Quantification of Microplastics/ Nanoplastics in Aquatic Environmental Samples <u>Nina Maria Ainali</u> , D. N. Bikaris, D.A. Lambropoulou
15:30-15:50	Using calorimetry to distinguish specific features in the glass transition in thin films <u>Marta Ruiz-Ruiz</u> , C. Rodríguez-Tinoco, M. González-Silveira, J. Rodríguez-Viejo
15:50-16:10	Up-scaling of biobased PLA copolymers via a cast film extrusion line for printed electronics



	<u>Rafail O. Ioannidis</u> , Z. Terzopoulou, A. M. Gorman, N. Nikolaidis, C. Rein, D. N. Bikiaris
16:10-16:30	Evaluation of MXene modified poly(ethylene glycol) (PEG) impregnated carbon aerogels for solar energy harvesting applications <u>Katarzyna Suchorowiec</u> , K. Pielichowska
16:30-16:50	<i>Coffee Break (ground floor-outdoors)</i>
16:50-18:30	Session X / Hall I Giuseppe Lazzara – Adamos Stimoniaris
16:50-17:10	Thermogravimetric analyses for Deep Eutectic Systems suitable for extraction processes samples <u>Chiara Pelosi</u> , A. Volpe, E. Micheli, E. Pulidori, G. Ciancaleoni, L. Bernazzani, C. Duce
17:10-17:30	Novel PLA nanocomposites based on Ag nanoparticles via <i>in-situ</i> polymerization for printed electronics <u>Kyriaki Lazaridou</u> , R.O. Ioannidis, P. Klonos, A. Gorman, D.N. Bikiaris
17:30-17:50	Development of a high-sensitivity microsecond pulse heating calorimetry for small-scale <u>Hugo Gómez-Torres</u> , M. Molina-Ruiz, S. Privitera-Uno, E. Menéndez, L. Abad, J. Rodriguez-Viejo, A. Lopeandia
17:50-18:10	Identification of polymer content in waste fishing nets and their potential recycling through pyrolysis <u>Moschos I. Moschos</u> , A. Charousi, S.D. Stefanidis, E.C. Vouvoudi, A.A. Lappas, D.S. Achilias
18:10-18:30	Thermal behaviour and physicochemical evaluation of genistein-loaded exosome-inspired nanoparticles <u>Maria Tsakiri</u> , N. Naziris, R. Sagar, C. Zivko, M. Ionov, M. Bryszewska, V. Mahairaki, C. Demetzos
20:45	<i>Gala Dinner</i>
	<i>Parallel Session</i>
16:50-18:30	Session XI / Hall III Ricardo Chacartegui – Evangelia Tarani
16:50-17:10	Investigation of peroxide vulcanization kinetics in EPDM/carbon-based nanocomposites through isothermal DSC experiments <u>Panayiotis Ketikis</u> , P.A. Tarantili



17:10-17:30	Studies on the thermal properties of controlled-release fertiliser based on alginate based hydrogels and waste sheep wool <u>Ewa Szczepanik, E. Molik, K. Pielichowska</u>
17:30-17:50	Effect of Carbon-Based Nanofillers on the Crystallization and Thermal Behavior of Poly(butylene furanoate) (PBF) Nanocomposites <u>Nikolaos Pardalis, E. Xanthopoulou, N. Jourdainne, N. Guigo, D. Bikaris</u>
17:50-18:10	Interactions between natural products and model membranes: implications for antifungal action <u>Francesca Sacchi, F. Saitta, S. Gosh, S. Princiotto, F. Annunziata, S. Dallavalle, A. Pinto, A. Kunova, P. Cortesi, D. Fessas</u>
18:10-18:30	Thermal and mechanical behaviour of natural and modified pine resin <u>Spyros Bousios, C. Karafousia, A. Krestou, A. Kanapitsas, A. Stimoniaris</u>
20:45	Gala Dinner

Friday 11 July 2025

8:30	<i>Registration</i>
9:00-11:05	Session XII / Hall I Georgios Papageorgiou – Evangelia Vouvoudi
9:00-9:45	Invited lecture: Alkali-activated materials for waste valorisation: chemico-physical characterization <u>Michelina Catauro, A. D'Angelo, V. Viola</u>
9:45-10:05	Mitigating Sintering Disturbances in Magnetic Ceramics via Thermal Analysis: A Case Study V. Tsakaloudi, S. Zaspalis, G. Kogias, A. Evdou, <u>Vassilis Zaspalis, E. Rauchenwald, D. Holz</u>
10:05-10:25	Thermoelectric Powdered Materials: Dual-Phase-Lag Times E. Massaguer, A. Massaguer, <u>Juan J. Suñol</u>
10:25-10:45	Molecular recognition properties of carboxylato-prism[n]arene containers in aqueous solution G. D. G. Santonoceta, R. Del Regno, P. Della Sala, A. Palmieri, P. Neri, Margherita De Rosa, C. Talotta, C. Gaeta, <u>Carmelo Sgarlata</u>
10:45-11:05	What can images bring to thermal analysis? <u>Olivier Savard, Hitachi High-Tech Analytical Science Ltd.</u>



11:05-11:25	Coffee Break (ground floor-outdoors)
11:25-13:25	Session XIII / Hall I Vassilis Zaspalis - Michelina Catauro
11:25-11:45	Advanced thermal analysis coupled with kinetic simulations to describe and predict Diels-Alder dynamic polymer network behavior J.Mangialetto, R. Verhelle, G.Van Assche, <u>Niko Van den Brande</u>
11:45-12:05	Adsorption and Desorption of Methanol and Water on LTA and FAU Zeolites Probed by TGA for the Intensified Synthesis of Methanol <u>Vasiliki Koidi</u> , E. Heracleous, A. Lappas
12:05-12:25	Solvent extraction and pyrolysis of plastics from waste electric and electronic equipment (WEEE) <u>Maria-Anna Charitopoulou</u> , D. Achiliyas
12:25-12:45	Exploring macroporosity and partial mesoporosity in carbon materials through thermoporometry with menthol <u>Gabriela Zelenková</u> , T. Zelenka, D. Majda, E. Kinnertová, M. Almáši
12:45-13:05	Exploring Mesoporosity in Metal–Organic Frameworks through Thermoporometry G. Zelenková, <u>Tomáš Zelenka</u> , M. Almáši
13:05-13:25	Synergistic Effect of Carbon-Based Fillers and Melamine Polyphosphate on the Fire Behavior and Thermal Stability of Flexible Polyurethane Foams <u>Arkadiusz Głowiński</u> , P. Rybiński, A. Zawierucha, M. Železik
13:25-14:00	Closing Ceremony / HALL I Dimitris Achiliyas - Konstantinos Chrissafis

Poster Session 1

Wednesday 9/7/2025, 14:15-15:05

- PS.1-1** Thermal Characterization of 3D-Printed Mucoadhesive Bupropion Hydrochloride Buccal Films Fabricated via LCD Technology
Chrystalla Protopapa, A. Siamidi, L. A. Junqueira, M. Vlachou, D. Douroumis
- PS.1-2** Petrolatum-based ointment as carrier for Ni²⁺, Co²⁺ and Zn²⁺ amino acid-complexes.
Okolišan D., Vlase G., Tășală Alexandru S., Cristina Cișmas, Pahomi A., Vlase T.
- PS.1-3** Thermal and Structural Characterization of High Molecular Weight Poly(mandelic acid)s Synthesized via Steglich Esterification



D. Meimarglou, D. Bikaris

- PS.1-4** DSC in the Characterization of Blends of Biobased and Recycled Thermoplastic Polyesters
Eirini Chatzi, N. Poulopoulou, P. Papatheochari, P. Moustaka, S. Pallas, Z. Terzopoulou, D.S. Achilias, G.Z. Papageorgiou
- PS.1-5** Fast Scan Calorimetry and Conventional DSC study of the Thermal Behavior of the Biobased Poly(propylene vanillate)
Eirini Chatzi, K. Rinis, E. Karafatis, Z. Terzopoulou, D.N. Bikaris, G. Floudas, G. Z. Papageorgiou
- PS.1-6** Thermal properties of controlled-release fertiliser based on biodegradable polymers and waste sheep wool
Ewa Szczepanik, E. Molik, K. Pielichowska
- PS.1-7** Effect of Thiol Content on the Photopolymerization of a Methacrylated Eugenol-Based Monomer
Gabriel I. dos Santos, C. Gagliari, R. T. Alarcon, A. de Moura, G. Bannach
- PS.1-8** Pineapple Fiber Reinforced Diels-Alder Based Self-Healing Polymer Composite
Görkem EYLÜL Kaya, A.C. Cornellà, E. Worlawoe Gaba, J. Brancart, Tom Verstraten, N. Van den Brande
- PS.1-9** Calcium-Mediated DNA Encapsulation in Cardiolipin Liposomes: Physicochemical Characterization and Thermal Analysis
Ioannis Tsichlis, S. Pispas, D. Douroumis, C. Demetzos
- PS.1-10** Evaluation of Polysaccharides hydrogels dopped with MXenes for solar-thermal energy conversion applications
Katarzyna Suchorowiec, J. Kasznik, K. Pielichowska
- PS.1-11** Thermal analysis and characterization of polymers from single-use plastics: Assessing environmental impact and end-of-life pathways
Kyriaki Lazaridou, M. A. Ntrivala, D. Karavasili, A.C. Pitsavas, D. Achilias
- PS.1-12** Thermal Characterization of Alginate-Based Hydrogels Loaded with Melatonin for Agricultural Applications
K. Athanasiou, E. Tarani, Lazaros C. Karagiannidis, A. Ioannou, E.C. Georgiadou, V. Fotopoulos, T. Krasia-Christoforou, K. Chrissafis
- PS.1-13** Preliminary studies of some pharmaceutical formulations based on anticoagulant drugs
G. Vlase, Maria Dumitrescu, L. Pitulice, I.-A. Bradu, M.-M. Budiul, I. Gallo, T. Vlase
- PS.1-14** Effect of iron oxide nanoparticles on the thermal decomposition of organic ligands with different carrier gas



Michael Casale, S. Delsante, A. Omelyanchik, A. Messina, C. Lambruschini, J. A. Marins, Y. Bentahar, J. Queiro Campos, G. Godeau, C. Hurel, P. Kuzhir, D. Peddis, D. Colombara

PS.1-15 Characterization of graphene oxide/EPDM nanocomposites prepared using the masterbatch technique

Panayiotis Ketikis, P. A. Tarantili

PS.1-16 Beyond the mountains: Analysis of bronze age pottery samples from the Vanatori-Neamt – Valea rea fortification (Vanatori-Neamt, Neamt County, Romania) using multiple analytic techniques

D. Vlase, Raul Vlase, V. Diaconu, T. Vlase, G. Vlase, L. Pitulice, P. Sfirloaga

PS.1-17 Phase Transitions of the Fast-Crystallizing Biobased Polymer Poly(octylene 2,5-Furandicarboxylate)

K. Rinis, Stefanos Skarlatoudis, E. Chatzi, E. Karafatis, Z. Terzopoulou, G. Floudas, G. Z. Papageorgiou

PS.1-18 Investigating the Suitability of Biomass Pellets for Energy Production in Greece through TGA and Physical Analysis

Zoi-Paschalina Terzopoulou-Barmpa, V. Kamperidou

PS.1-19 Systematic Review of Wood Delignification and Densification at Varying Temperatures for Advanced Material Applications

Zoi-Paschalina Terzopoulou-Barmpa

PS.1-20 Dynamic Mechanical Response of Polymer Matrix Carbon Fiber Reinforced Composites Under Aging Conditions

S. Zaoutos, Efthimiou Konstantina, J. Kechagias

PS.1-21 Continuous annealing of medium-Mn steels: phase transformation kinetics, austenite stability and microstructural evolution

Adam Skowronek, A. Grajcar

PS.1-22 Design approach and phase transformation study of Mo- and Cu-containing quenching and partitioning medium-Mn steels

Aleksandra Kozłowska, A. Skowronek, F. Tullu Kassaye, O. Gulbay, A. Gramlich, U. Krupp, A. Grajcar

PS.1-23 Catalytic decomposition of vegetable oil using nanoreactors with entrapped lipase and additives

Anca-Ruxandra Leonties, A. Precupas, R.-M. Toma, A. Raducan, L. Aricov

PS.1-24 The influence of sinapic acid binding on lysozyme thermal stability

Anca Ruxandra Leonties, D. Gheorghe, I. Matei, V.T. Popa, A. Precupas

PS.1-25 Influence of double-filling on the thermal and transport properties of (Fe,Ni)-based skutterudites

Cecilia Piscino, P. Manfrinetti, A. M. Cardinale, N. Parod

PS.1-26 Investigating the effect of rutin on bovine hemoglobin fibril formation



Aurica Precupas, A. Leonties, L. Aricov, R. Toma, M. Anastasescu, V.T. Popa

PS.1-27 Thermal, and Barrier Characterization of LDPE greenhouse films treated with agrochemicals

Ignazio Blanco, G. Rizzo, V. Siracusa

PS.1-28 Thermal Conductivity Measurements: an Hybrid Instrumental Approach

Ignazio Blanco, C. Tosto, G. Cicala

PS.1-29 Thermal Investigation of Phase Transition and Magnetic Anisotropy in L1₀-FePt Nanostructures

D. Karfaridis, E. Th. Papaioannou, Evangelia Tarani, G. Vourlias

PS.1-30 Evaluation of different light sources on a fully biobased photoinitiator/monomer system

Caroline Gagliari, G. I. dos Santos, I. Sganzerla Rosário, G. Bannach, L.C. da Silva-Filho

PS.1-31 How the purity of gum rosins affects their thermal properties and their application in photopolymerization

Caroline Gagliari, G.I. dos Santos, I. Sganzerla Rosário, G. Bannach, L. C. da Silva-Filho

PS.1-32 Natural materials Development from Collagen-based Wastes - ArtDECOW: Collagen pretreatment and solubilization

E. Micheli, E. Pulidori, C. Pelosi, E. Bramanti, I. Bonaduce, Celia Duce

PS.1-33 Calorimetric study of SLE in the binary system water + orthophosphoric acid
M. Mouhib, R. Chiriac, F. Toche, J.-J. Couniou, Christelle Goutaudier

PS.1-34 Surface relaxivity is pore size dependent: Insights from NMR relaxometry and DSC thermoporometry

Eva Kinnertová, V. Slovák, P. Kopčan

PS.1-35 Thermal stability and oxidation behavior of copper selenide compounds synthesized by different industry-grade methods

A. Teknetzi, Evangelia Tarani, V. Pavlidis, K. Chrissafis, G. Vourlias

PS.1-36 Thermal Behavior of the Biobased Poly(alkylene furanoate)s in Comparison to Poly(alkylene Terephthalate)s

D. Christou, E. Chatzi, D. N. Bikaris, D.S. Achilias, George Z. Papageorgiou

Poster Session 2

Thursday 10/7/2025, 14:20-15:10

PS.2-1 Thermal analysis for chitosan/nanoclay composites investigations

M.M. Calvino, M. Rita Caruso, L. Lisuzzo, G. Cavallaro, S. Milioto, Giuseppe Lazzara



- PS.2-2** The effect of carboxylic acid dimerization on the enthalpies of mixing
Ioannis Tsivintzelis, C. Panayiotou
- PS.2-3** Effect of sequential tempering on the microstructural, thermal and mechanical properties of the 7075 alloy
M. Chemingui, M. Khitouni, Joan-Josep Suñol
- PS.2-4** Microstructure, thermal, and mechanical properties of Al-4CNT-graphene hybrid composites
H. Hachache, S. Alleg, Z. Hamlati, B. Alphewes, P. Apata Olubambi, Joan-Josep Suñol
- PS.2-5** Thermal investigations of structural disorders of triboactivated natural apatites
Katerina Mihaylova, V. Petkova, N. Petrova, E. Serafimova
- PS.2-6** Microstructural investigations of fluor- and hydroxyl apatites on high-energy milling and high-temperature heating
V. Petkova, Katerina Mihaylova, N. Petrova, Y. Tzvetanova, V. Stoyanov, A. Trikkel, K. Tonsuaadu
- PS.2-7** Comparative Thermal Decomposition of Agricultural Residues and Seagrass under Inert and Oxidative Atmosphere
C. Kyriakou-Tziamtzi, Konstantinos Chrissafis
- PS.2-8** On the feasibility of studying pMDI curing evolution using a DRIFT environmental chamber
L. Malletzidou, Konstantinos Chrissafis
- PS.2-9** Thermal investigation of γ -cyclodextrin hydrates
Liudmila Zelenina, T. Chusova, T. Rodionova, A. Manakov, Y. Laventosa
- PS.2-10** Nonessential activation of Laccase from *Trametes versicolor* with sodium sulfate
Ludmila Aricov, R.-M. Toma, A. Raducan, A. Precupas, A.-R. Leonties
- PS.2-11** Different thermal behavior of two transport proteins in the presence of quercetin
Ludmila Aricov, I. Matei, A. Busuioc, A. Precupas
- PS.2-12** Novel interface reaction kinetic models for heterogeneous processes
Luis A. Pérez-Maqueda, J. Arcenegui-Troya, A. Perejón, P. E. Sánchez-Jiménez
- PS.2-13** Preparation and characterization of thermoelectric polymer-ceramics composites
Marco Fortunato, R. Galafassi, R. Manfredi, I. Pallecchi, P. Stagnaro, M. T. Buscaglia
- PS.2-14** Valorisation via thermal pyrolysis of plastic packaging
Maria-Anna Charitopoulou, S. Koutroumpi, D. Achilias
- PS.2-15** Thermochemistry and reactivity of substituted 2-amino-5-R-thiadiazoles



A.C.M.O. Lima, A.L.R. Silva, Maria D. M. C. Ribeiro da Silva

PS.2-16 Thermal properties of poly(3-hydroxybutyrate) plasticized with epoxidized soybean oil (ESO) and poly(butylene adipate) (PBA)
Matko Erceg, I. Krešić

PS.2-17 Study of olive oils from the Slovenian coastal region by thermal analysis
V. Koradin, Nataša Čelan Korošin

PS.2-18 From Heating to Healing: Thermal analysis in rational design of a hybrid lipid/copolymer nanocarrier

E. Triantafyllopoulou, D. R. Perinelli, G. Bonacucina, G. Valsami, S. Pispas,
Natassa Pippa

PS.2-19 Differential Scanning Calorimetry Analysis of the Thermotropic Behavior of Melittoside in Model Lipid Bilayers

A. Mavromati, E.-M. Tomou, M. Anagnostou, S. Kikionis, Natassa Pippa, H. Skaltsa

PS.2-20 Stimuli-responsive lyotropic liquid crystalline nanoparticles with block copolymers: Physicochemical, morphological and thermal evaluation

M. Chountoulesi, Natassa Pippa, D.R. Perinelli, A. Forys, V. Chrysostomou, A. Kaminari, G. Bonacucina, B. Trzebicka, S. Pispas, C. Demetzos

PS.2-21 Application of a skin calorimeter to study local heat loss during exercise

Pedro Jesús Rodríguez de Rivera, M. Rodríguez de Rivera, F. Socorro, M. Rodríguez de Rivera

PS.2-22 Calibration of a non-differential skin calorimeter

Manuel Rodríguez de Rivera, M. Rodríguez de Rivera, F. Socorro, P. J. Rodríguez de Rivera

PS.2-23 Effect of Carbon-Based Fillers and Melamine Polyphosphate on the Toxicity and smoke emission of Flexible Polyurethane Foams

Przemysław Rybiński, A. Główacki, A. Zawierucha, M. Źelezík

PS.2-24 Dynamic-mechanical properties of renewable photopolymerizable thiolene/acrylic system

Rafael T. Alarcon, A. Cellai, C. C. Schmitt-Cavalheiro, É. T. G. Cavalheiro, M. Sangermano

PS.2-25 Investigation of photopolymerizable epoxidized vegetable oil monomers by photo-DSC

Rafael T. Alarcon, M. Porcarello, C. C. Schmitt, M. Sangermano

PS.2-26 Additive manufacturing of WC-Co ceramic/metal composites using binder jetting: impact of debinding cycle and study of sintering shrinkage by thermal analysis (EGA, TMA)

E. Marciano, Rodica Chiriac, F. Toche, O. Dezellus, X. Boulnat, S. Dezecot, A. Burr



PS.2-27 DSC Study of Thermooxidative Stability of Bioproducts Obtained by Solid-State Fermentation

Tatiana Klempová, M. Čertík, Z. Cibulková

PS.2-28 Pottery and clay: analysis of late Neolithic pottery and clay samples from the Ronaț-Triaj site (Timișoara, Timis County, Romania) using hyphenated techniques

D. Vlase, R. Vlase, L. Pitulice, A. Pahomi, P. Sfirloaga, C.I. Suciu, F. Manea, S.-V. Predescu, Titus Vlase

PS.2-29 Biopolymer films based on κ -carrageenan and cellulose derivatives as entrapment matrices for Amygdalin (B17)

Okolišan D., Vlase G., Budiu M. M., Matica A., Vlase Titus

PS.2-30 Evaluation of induced microstructural and thermal effects in system CaO-P₂O₅-SiO₂ upon tribochemical activation

K. Mihaylova, Vilma Petkova, N. Petrova, R. Nikolova, L. Tzvetanova

PS.2-31 Applied TG-DSC-MS analysis of microstructural properties of self-compacting cement mortars

Vilma Petkova, V. Stoyanov, K. Mihaylova, A. Stoyanov, V. Stoyanov, A. Trikkel, K. Tonsuaadu

PS.2-32 Thermal Properties of commercial PVC materials and influence of the additives
Evangelia Vouvoudi, D. Achilias

PS.2-33 Thermal properties of commercial rPET pellets and their microwave alkali hydrolysis as a recycling potential

M. Roussou, Evangelia Vouvoudi, D.S. Achilias

PS.2-34 G-quadruplex DNA interactions with peptides: Physicochemical insights
S. Marzano, F. D'Aria, J. Amato, Bruno Pagano

PS.2-35 Thermooxidative Stability of Polymers Employed in the Conservation of Plastic Cultural Heritage

Zuzana Cibulková, P. Šimon, T. Kocsisová

PS.2-36 Thermal Issues in Designing Novel Satellite Structures with Additive Manufacturing Technologies
E. Mouzakis, D. Tompros

PS.2-37 RNA and DNA aptamers for therapeutic applications: a thermodynamic study
F. D'Aria, A. Passarelli, Concetta Giancola



Arch of Galerius "Kamara" (constructed on the ancient Roman Egnatia Road, 305 AC)



"The Umbrellas" by G. Zongopoulos (placed on the waterfront, 1997)



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