

3rd European Science Foundation Summer School

Nanomedicine 2011

19-24 June 2011

LEUCOREA and Luther-Hotel, Lutherstadt Wittenberg, Germany



With support from



MARTIN-LUTHER-UNIVERSITÄT
HALLE-WITTENBERG

Organising Committee: Karsten Mäder, MLU Halle-Wittenberg, DE; Heidi Foth, MLU Halle-Wittenberg, DE; Rogério Gaspar, University of Lisbon, PT & Maria J. Vicent, CIPF Valencia, ES

Sunday 19 June	
17:00 – 19:00	Registration at ESF desk at Luther-Hotel
19:00 – 19:30	Welcome drink
19:30 – 20:30	Dinner at Luther-Hotel
20:30 – 23:00	Conference opening and Welcome message Michael Schillmeier , Ludwig-Maximilians-Universität, DE and Karsten Mäder , MLU Halle-Wittenberg, DE Setting the Scene Michael Schillmeier , Ludwig-Maximilians-Universität, DE The Imitation of the Future - Nanomedical Innovations and STS
Monday 20 June	
Session I – The questions – Ethics and communication (at Leucorea center) Chair: tba	
8:30 -9:30	Alfred Nordmann , Technische Universität Darmstadt, DE Ethical and social aspects of Nanomedicine
9:30 – 10:00	Robin Pierce , Delft University of Technology, NL Centering the Patient in Translational Nanomedicine: The bedside is not an island

10:00 – 10:30	Coffee break
Session II – THE TOOLS. Mathematical models, Materials Science & Engineering Chair: tba	
10:30 – 11:30	Hans Oberleithner , Westfälische Wilhelms-Universität Münster, DE Nanomechanics of Vascular Endothelium measured with Atomic Force Microscopy
11:30 – 12:30	Rolf Nitzsche , Malvern Instruments GmbH, DE Particle sizing at the Nanoscale
12:30 - 14:30	Lunch at Luther-Hotel
Session II – THE TOOLS. Mathematical models, Materials Science & Engineering (continued) Chair: tba	
14:30 – 15:30	Tomas Etrych , Institute of Macromolecular Chemistry, CZ Chemical responsive polymers
15:30 – 16:30	Charlotte Kloft , Freie Universitaet Berlin , DE Mathematical modeling as a tool in Nanomedicine
16:30 – 17:00	Coffee break
17:00 – 18:00	Hamid Gandehari , Utah Center for Nanomedicine, US Recombinant polymers for drug and gene delivery
18:00 – 19:00	Poster Session I
19:00 – 20:30	Dinner at Luther-Hotel
20:30 – 21:30	Tutorials (<i>at Luther-Hotel</i>) Ethics - Tutorials Modelling - Tutorials Particle sizing
Tuesday 21 June	
Session III – THE TOOLS. Molecular Characterization, Cellular and whole body fate (at Leucorea center) Chair: tba	
8:30 -9:30	Arwyn Jones , Cardiff University, UK Uptake and Intracellular Fate of Nanomedicines
9:30 – 10:00	Anne Barnett , Izon Science Limited, UK SIOS: A new impedance-based measurement technique for characterisation and advanced analysis of particle systems for nanomedicine, drug delivery and diagnostics 2nd Lecture to be announced Eduardo Antonio Della Pia , Cardiff University, UK Can we realize a single protein biosensor?
10:00 – 10:30	Coffee Break
10:30 – 11:30	Andreas Briel , nanoPET Pharma GmbH, DE Size-activity relationships in nanosized diagnostics
11:30 – 12:30	Molly Stevens , Imperial College London, UK Bone Engineering
12:30 - 14:30	Lunch at Luther-Hotel
Session IV: The Issues – Nanotoxicology (at Leucorea center)	

Chair: tba	
14:30 – 15:30	Heidi Foth , <i>Martin-Luther-Universität Halle-Wittenberg, DE</i> Nanotoxicology – what do we know and which safety do we need?
15:30 – 16:00	Muhammad Asif , <i>Linkoping university, SE</i> The potential application of functionalized ZnO nanorod as electrochemical (glucose and metal ions) biosensors and photodynamic therapy for Intracellular environment Aneta Fraczek-Szczypta , <i>University of Science and Technology in Krakow, PL</i> Preliminary investigation of different types of carbon nanotubes with osteoblast and macrophage cells Maros Halama , <i>Technical University of Kosice, SK</i> Assessment of life-time of metallic nanoparticles in simulated body fluids
16:15 – 19:30	Walking tour in Wittenberg
19:30	Dinner at Luther-Hotel
Wednesday 22 June	
Session V – Clinical needs and applications (at Leucorea center)	
Chair: tba	
8:30 -9:30	Karsten Mäder , <i>Martin-Luther-Universität Halle-Wittenberg, DE</i> Noninvasive characterization of nanomedicines
9:30 – 10:00	Ashok Bankar , <i>University of Pune, IN</i> Anti-biofilm activity of bio-inspired nanoparticles against the pathogenic microbes Branko Trajkovski , <i>Charité - Universitätsmedizin Berlin, DE</i> New implant coating platform for local drug delivery Luis Bimbo , <i>University of Helsinki, FI</i> Mesoporous silicon particles as emerging Nanomedicine carriers
10:00 – 10:30	Coffee Break
10:30 – 12:30	Poster Session II
Session V – Clinical needs and applications (continued)	
Chair: tba	
12:30 - 14:30	Lunch at Luther-Hotel
14:30 – 15:30	Kostas Kostarelos , <i>University of London, UK</i> Applications and Toxicity of Carbon Nanotubes
15:30 – 16:30	Uta Griesenbach , <i>Imperial College London, UK</i> Gene Therapy to the lung
16:30 – 17:00	Coffee break
17:00 – 18:00	Raymond Schiffelers , <i>Utrecht University, NL</i> Liposomal drug delivery
18:00 – 19:00	Thomas Kissel , <i>Philipps Universität Marburg, DE</i> Polymeric nanoparticles
19:00 – 21:00	Dinner at Luther-Hotel
21:00 – 22:00	Tutorials (at Luther-Hotel)

	Tissue engineering – Diagnostics - Nano-DDS
Thursday 23 June	
Session VI - Lab to clinic nanopharmaceuticals (at Leucorea center) Chair: tba	
8:30 -9:30	Maria Vicent , CIPF Centro de Investigacion Prince Felipe Research Centre, ES Polymer Conjugates
9:30 – 10:00	Catarina Goncalves , Minho University, PT Self-assembled dextrin nanogels for biomedical applications Mirjam Hemmelmann , Johannes Gutenberg - Universität Mainz, DE HPMA based amphiphilic copolymers for drug delivery over the blood brain barrier Ondrej Sedlacek , Institute of Macromolecular Chemistry AS CR, CZ Multilevel targeting of Auger electron emitters to close proximity of DNA in tumor cells by DNA ellipticine-polymer carrier conjugates
10:00 – 10:30	Coffee break
10:30 – 11:30	Andreas Jordan , MagForce Nanotechnologies AG, DE Nanotherm
11:30 – 12:30	Sasha Kabanov , University of Nebraska, US Polymer Micelles
12:30 - 14:30	Lunch at Luther-Hotel
Session VI - Lab to clinic nanopharmaceuticals (continued) Chair: tba	
14:30 – 15:30	Rainer Alex , F. Hoffmann La Roche Ltd, DE Clinical development in big Pharma
15:30 – 16:30	Rogerio Gaspar , Faculdade de Farmácia da Universidade de Lisboa, PT Regulatory and translation
16:30 – 17:00	Coffee break
17:00 – 19:00	Poster Session III
19:30	Get together Drink and Conference Dinner at Luther-Hotel
Friday 24 June	
Session VII - Clinical status and outlook (at Leucorea center) Chair: tba	
8:30 -9:30	Twan Lammers , University Clinical RWTH Aachen, DE Clinical needs and application: cancer
9:30 – 10:00	Delphine Fayol , Université Paris 7, FR Magnetic cells as tool for regenerative medicine Jef Ryken , Katholieke Universiteit Leuven, BE Specific virus targeting with antibody-functionalized magnetic beads Joana Silva , University of Lisbon, PT Design of a Therapeutic Melanoma Vaccine Candidate: Coencapsulation of a

	Melanoma Peptide Antigen and a CpG Oligonucleotide as an Adjuvant into Polymeric Nanoparticles
10:00 – 10:30	Coffee break
10:30 – 11:30	Viola Vogel, ETH Zurich Swiss Federal Institute of Technology, CH Tissue-Engineering-mechanical forces
11:30 – 12:30	Dusica Maysinger, McGill University, CA Nanomedicines for frustrated microglia
12:30 – 13:00	Concluding remarks and outlook
13:00	Departure
List of accepted posters	

1.	A. Santos Hélder	Nanoporous Silicon as a Nanomedicine Platform for Imaging and Delivery of Therapeutics <i>(H.A. Santos, L.M. Bimbo and J. Hirvonen)</i>
2.	Adebiyi Marion	COMPUTATIONAL DISCOVERY OF THE RESISTANCE MECHANISM OF PLASMODIUM FALCIPARUM TO CHLOROQUINE AND TETRACYCLINES
3.	Afadzi Mercy	Intracellular Delivery of Nanoparticles using Ultrasound. <i>(Mercy Afadzi(1), Yngve Hofstad Hansen(1), Tonni Franke Johansen(2), Svein-Erik Måsøy(2), Bjørn Angelsen(2), Catharina de L. Davies (1))</i>
4.	Ajalloueian Fatemeh	Fabrication a PVA/organo-nanoclay bionanocomposite for Medical Applications
5.	Allmeroth Mareli	Modifying the body distribution of HPMA based copolymers as potential drug carriers by molecular weight and aggregate formation monitored with Positron Emission Tomography <i>Mareli Allmeroth (1), D. Moderegger (2), B. Biesalski (3), F. Rösch (2), O. Thews</i>
6.	Andrade Fernanda	Effect of type of poloxamer and production parameters in the encapsulation of insulin into polymeric micelles <i>Andrade, F.1, Antunes, F.1, Videira, M.2, Ferreira, D.1, Sarmento, B.1,3- 1 - Department of Pharmaceutical Technology, Faculty of Pharmacy, Univer</i>
7.	Apicella Alessandra	"Molecular imaging of misfolding related amyloid proteins" <i>A. Apicella 1, M. Soncini 2, M. Deriu 3, S. Furlan 2, D. Dellasega 1, A. M. Frana 4, C. S. Casari 1, M. E. Regonesi 4, P. Tortora 4, A. Redaelli 2, C. E. Bottani 1</i> <i>1) Dipartimento di Energia, Poli</i>
8.	Ashrafi Seyed Jamal	Challenge of Anti microbial and toxicity tests of silver nano particles <i>1S. J. Ashrafi, 2M. F Rastegar, G.Amo Abedini1 and S. A. Kumar3</i> <i>1-Dep Nanobiotechnology, Faculty of new science and technology, Tehran university, Tehran, Iran</i>

		2-Dep of Plant Prote
9.	Attama Anthony	<p>Formulation and Evaluation of Solid Lipids-Based Nanostructured Lipid Carriers for Transdermal Delivery</p> <p>A. A. Attama^{1,2} and C. C. Mueller-Goymann¹ ¹Institut für Pharmazeutische Technologie, Technische Universität Carolo Wilhelmina zu Braunschweig, D-38</p>
10.	Ayedemi Oluyomi	Screening tools for nanotoxicology
11.	Aymen Mohammed Salih	Designing of rapid gold nanoparticle diagnostic test to give an early alarm of gastric carcinoma cause by Helicobacter pylori
12.	Azzopardi Ernest Anthony	<p>Title: Polymer therapeutics for safe effective targeting of antimicrobial therapy in infection</p> <p>Authors: Ernest A. Azzopardi , Elaine L. Ferguson, David W. Thomas - Affiliation: Wound Biology Group, School of Dentistry, Cardiff University, Cardiff, CF1</p>
13.	Balter Adi	<p>Surface Engineered Porous Silicon-based Nanostructures for Cancer Therapy</p> <p>Adi Balter¹, Naama Massad-Ivanir² and Ester Segal^{2,3} ¹The Inter-Departmental Program of Biotechnology, ²Department of Biotechnology and Food Engineering, ³The Russell Berrie Nanot</p>
14.	Boca Sanda Cosmina	<p>Plasmon-assisted photothermal therapy of cancer cells using chitosan-coated triangular silver nanoparticles,</p> <p>Sanda Boca¹, Monica Potara¹, Aurelie Juhem³, Patrice Baldeck² , Simion Astilean¹ ¹Nanobiophotonics Center, Institute for Interdisciplinary Exp</p>
15.	Bonnaud Cécile	Smart vesicles for drug delivery, Cécile Bonnaud, Dr. Isabelle Geissbühler. Prof. Alke Fink
16.	Boscaini Anita	<p>CELL UPTAKE EVALUATION OF GOLD NANOPARTICLES (AuNPs) USING RAMAN SPECTROSCOPY</p> <p>Anita Boscaini 1, Giulio Fracasso 1, Vincenzo Amendola 2, Cristina Anselmi 1, Gabriele Marcolongo 2, Moreno Meneghetti 2, Marco Colombatti 1 - 1 Dept. of Pathology- Section of</p>
17.	Brymora Katarzyna	<p>Ab initio modelling of ligands surface effects on nanoparticles used in magnetohyperthermia</p> <p>K.Brymora (a) S.Ammar (b) N.Yaacoub (a) J.-M.Greneche (a) and F.Calvayrac (a) a : LPEC UMR6087 Universite du Maine Le Mans b : ITODYS Universite Paris Diderot</p>
18.	Cambianica Ilaria Nadia	Functionalization of nanoliposomes with ApoE-derived peptides enhances cellular uptake and drug transport

		across an in vitro model of blood-brain barrier <i>I. Cambianica1, F. Re1, C. Zona3, S. Sesana1, R. Rigolio2, B. La Ferla3, F. Nicotra3, G. Forloni4, A</i>
19.	Carenza Elisa	Title: Anionic magnetic nanoparticles for cell tracking Authors: <i>E. Carenza (a), A. Rosell (b), L. Levander (a), V. Barceló³ (b), J. Montaner (b), A. Roig (a)</i> <i>(a) Institut de Ciència de Materials de Barcelona (ICMAB-CSIC), Campus UAB, 08193, Bellaterra</i>
20.	Cendrowski Krzysztof	Synthesis of multifunctional single nano-hole hollow silica nanospheres with delayed drug release system
21.	Coghi Maria Donata	Title: Single-Domains Protein A-Engineered Magnetic Nanoparticles: Toward a Universal Strategy to Site-Specific Labeling of Antibodies for Targeted Detection of Tumor Cells. Authors: <i>Maria Donata Coghi†, Serena Mazzucchelli†,</i>
22.	Colombo Miriam	"Uniform LPS-Loaded Magnetic Nanoparticles for the Investigation of LPS/TLR4 Signaling" <i>Colombo, Piazza, Granucci, Peri and Prosperi Dipartimento di Biotecnologie e Bioscienze Università degli Studi di Milano-Bicocca</i>
23.	Cuggino Julio	Thermosensitive nanogels based in dendritic polyglycerol and NIPAM for biomedical applications. <i>Julio C. Cuggino, Cecilia I. Alvarez I. , Miriam C. Strumia , Pia Welker , Kai Licha , Dirk Steinhilber , Radu-Cristian Mutihac , Marcelo Calderón a Departame</i>
24.	De Backer Lynn	Influence of natural pulmonary surfactant on the efficacy of siRNA loaded dextran nanogels <i>L. De Backer, J. Demeester, S. De Smedt, K. Raemdonck Ghent Research Group on Nanomedicines, Laboratory of General Biochemistry and Physical Pharmacy, Ghent Unive</i>
25.	De Freitas Dias Tomás Miguel	"Evaluation of cell-free DNA integrity as a potential biomarker in cancer diagnosis" <i>Tomás de Freitas Dias; BERG-IBB and INESC-MN</i>
26.	Dehshahri Ali	Modification of PAMAM dendrimer lead to efficient nanocarriers for plasmid DNA delivery <i>Dehshahri, Ali 1,2; Hoseini Alhashemi, Samira 1,2 1Shiraz University of Medical Sciences, Shiraz, Iran ; 2Pharmaceutical Sciences Research Center, Shiraz, Iran</i>
27.	D'hollander Antoine	Specific biological targeting using branched gold nanoparticles for tumor targeting therapy <i>A. D'Hollander1,2, H. Jans1,2, K. Jans1, B. Van de Broeke, U. Himmelreich3, L. Lagae1,4 1 Imec, SSET—Functional Nanosystems, Kapeldreef 75, 3001</i>

		<i>Leuven, Belgium</i>
28.	Draheim Christina	A nanocapsule drug delivery system for the therapy of inflammatory bowel diseases
29.	Duro Aroa	Well defined and Versatile Polyglutamates
30.	Ferreira Silvia Alexandra	Supramolecular Assembled Nanogel Made of Mannan <i>Sílvia A. Ferreira^{*1}, Tommy Cedervall², Sara Linse², Manuel Vilanova³, Francisco M. Gama¹</i> <i>¹ IBB-Institute for Biotechnology and Bioengineering, Centre for Biological Engineering, University of Minho, Ca</i>
31.	Galbiati Elisabetta	Investigating the structural biofunctionality of antibodies conjugated to magnetic nanoparticles, <i>E. Galbiati, P. Verderio, A. Natalello, P. Tortora, S. M. Doglia, D. Prosperi</i>
32.	Gläßer Verena	
33.	Gregori Maria	Study of the effect and the affinity of GT1b incorporating nanoliposomes on Abeta 1-42 peptide, <i>Maria Gregori [a], Elisa Salvati [a], Hasna Ahyayauch [b], Felix Go^{&#241;}i [b], Massimo Masserini [a]</i> . <i>a University of Milano-Bicocca, Department of Experiment</i>
34.	Gupta Anu	Synthesis and Drug Release Study of pH Sensitive CHITOSAN-ACRYLIC ACID Films
35.	Gupta Dwijendra	SYNTHESIS AND CHARACTERIZATION OF THE Eu DOPED Y2O3 NANOPARTICLES AS A POTENTIAL BIO-IMAGING PROBE <i>Dwijendra K. Gupta[*]Manish Dwivedi, Vijay Tripathi, and Surya Pratap Singh</i> <i>Membrane Molecular Biology Lab, Center of Bioinformatics, & *Department of Bioche</i>
36.	Gurugubelli Balakrishna	Source apportionment of indoor atmospheric NOx and Sox in atmospheric precipitation of central museum at arid environmental city Bhuj, western India.
37.	Hafezi-Ardakani Masoud	Synthesis of nanocrystalline Merwinite as a new bioceramic <i>Masoud Hafezi-Ardakani</i> <i>Academic Center for Education, Culture and Research, Yazd Branch</i>
38.	Hamdy Mohammad	Nanomedicine: Promise Of The Future In Disease Management
39.	Hashem Nia Azadeh	Synthesis And Evaluation Of Transfection Efficiency Of Non-Viral Nanovectors Based On Carbon Nanotubes (CNT) In Gene Delivery <i>Hashem Nia A.,Ramezani M.,Rahimizadeh M.,Abnoos Kh.,Eshghi H.</i>
40.	Hellmund Markus	Dendritic Polyglycerols in Nanomedicine

		<i>Markus Hellmund, Fatemeh Sheikhi, Harald Krüger, Ariane Tschiche, Marcelo Calderon, Rainer Haag</i>
41.	Hemmelmann Mirjam	HPMA based amphiphilic copolymers for drug delivery over the blood brain barrier <i>Mirjam Hemmelmann, Christiane Knoth, Christof Hiemke, Rudolf Zentel - Inst. of Org. Chem., Johannes Gutenberg-Universität Mainz, GER</i>
42.	Herd Heather	Ascertainment biological mechanisms in macrophages and epithelial response to silica nanoparticle physiochemical characteristics to aide in the engineering of novel nano diagnostics and -therapeutics <i>H. Herd (1-3), N. Daum (2,4), H. Ghandehari (1,2,5), C.</i>
43.	Hirsch Vera	Influence of surface charge on protein adsorption on polymer coated iron oxide nanoparticles
44.	Hoffmann Stefan	
45.	Inci Fatih	Artificial Lipid Membrane Construction as a Model for Membrane Protein Research, <i>Fatih Inci, Basak Turken and Fatma N.Kok, Molecular Biology-Genetics and Biotechnology Program, Istanbul Technical University, Istanbul 34469, Turkey</i>
46.	Ismayilova Aygun	Testing of normal and mutant alleles of alpha-1-antitrypsin
47.	Ivukina Ekaterina	Barnase:barstar system as a platform for complexes with fluorescent nanodiamonds <i>E.A. Ivukina¹, V.K.A. Sreenivasan², O.A. Stremovskiy¹, A.V. Zvyagin² and S.M. Deyev¹ 1 Shemyakin and Ovchinnikov Institute of Bioorganic chemistry, Russian Academy of Science</i>
48.	Jagannathan Ramya	"Speculation on the nanotoxicological perspectives" <i>Ramya Jagannathan, A B Mandal, Chemical Laboratory, Council of Scientific & Industrial Research, Central Leather Research Institute, Adyar, Chennai - 600020, India - S Murugan and T S Kumaravel GLR Labor</i>
49.	Jager Eliezer	"Stealth" nanoparticles platform by self-assembly of new degradable polyester and reactive HPMA-based polymers <i>Eliézer Jäger(1), Alessandro Jäger(1), Petr Chytil(1), Tomáš Etrych(1), Blanka Čihová(2), Karel Ulbrich(1), Petr Štěpánek(1)</i> <i>(1) In</i>
50.	Jain Purvi	Nano particles for bio-imaging
51.	Jain Aastha	Cell Penetrating Peptides and their application in human theragnostics
52.	Jigar Pancholi	Thia calix [4]arene hydroxamic acid as a receptor for Cu(II)

		<p>Ion</p> <p><i>J. P. Pancholi* and Y. K. Agrawal *Institute of Research and Development, Gujarat Forensic Sciences University DFS Head Quarters, Sector 18-A, Nr. Police Bhavan, Gandhinagar-382007, Gujara</i></p>
53.	Judd Amy	<p>Nanomaterials for the advancement of infection control, <i>Amy Judd*, Jon Heylings#, Ka-Wai Wan*, *School of Pharmacy, Keele University, ST5 5BG, UK #Dermal Technology Laboratory Ltd, Med IC4, Keele university science and business Park, Keele, Staffordshire,</i></p>
54.	Kalimuthu Kalishwaralal	<p>RGD peptide conjugated with Silver nanoparticles: Therapeutic Target molecules for Cancer</p>
55.	Khoruzhenko Antonina	<p>Detection of the role of mTOR kinase in migration and invasion of malignant cells</p>
56.	Kucerova Jana	<p>ENZYME-BIOFUNCTIONALIZED NANOFIBERS AS A NEW MATERIAL FOR WOUND TREATMENT <i>J. Kucerova1, M. Slovакova1, Z. Bilkova1, M. Juklickova2, A. Klabaňova2, D. Stranska2 1University of Pardubice, Faculty of Chemical Technology, Dept. Biological and Biochemical Scie</i></p>
57.	Kumar Vijay	<p>Gd@Au15: A magic magnetic gold cluster for cancer therapy and bioimaging <i>Brahm Deo Yadav and Vijay Kumar Dr. Vijay Kumar Foundation, 1969 Sector 4, Gurgaon 122001, India</i></p>
58.	Kutza Johannes	
59.	Landini Ettore	<p>Mechanical testing of reference model gels and articular cartilage by atomic force microscopy <i>E.Landini 1, R.Gottardi 1,D. Carnelli 2, M. Taffetani 2, P. Vena 2, R. Raiteri 1 1 Department of Biophysical and Electronic Engineering, University of Genova, Ge</i></p>
60.	Lapczuk Joanna	<p>"Study on Stable suspension formation and biocompatibility of graphene oxide and reduced graphene oxide" <i>Joanna Lapczuk, Anna Wajda, Mateusz Kurzawski, Marek Drozdzik Pomeranian Medical University, Department of Pharmacology, Powstańców Wlkp. 72 Av., 70-111</i></p>
61.	Leitner Stefanie	<p>Formation of cationic O/W nano-emulsions with a biocompatible polymer in the dispersed phase and study of biomedical application, S.Leitner1,2, G. Calderó1,2, M.J. García-Celma3,1, C. Solans2,1 <i>1Centro de Investigación Biomédica en Red en Bioingeniería,</i></p>
62.	Lian Qiong	<p>Multifunctional Magnetic Idarubicin-Loaded Nanoparticles for Magnetically Guided and Improved Drug Delivery <i>Qiong Lian,&#8224; Eva-Marie Prinz,&#8225; Melanie Schnabel,ji Rolf Hempelmann,&#8225; Gerhard Wenz,ji Claus-Michael Lehr,</i></p>

		†,* Brigitte Loret
63.	Liu Li	Multifunctional nano carrier for targeted gene delivery <i>Authors: Li Liu, Mengyao Zheng, Markus Benfer, Thomas Kissel</i> <i>Affiliation: Department of Pharmaceutics and Biopharmacy, Philipps-University Marburg, Ketzerbach 63, D-35032 Marburg</i>
64.	Maitra Amarnath	NANOTECHNOLOGY AND NANOBIOTECHNOLOGY - ARE THEY CHILDREN OF SAME FATHER?
65.	Malanchuk Oksana	Architecture of mTORC2 <i>O.M. Malanchuk, V.V. Filonenko</i> <i>The Institute of Molecular Biology and Genetics NAS of Ukraine, 150, Zabolotnogo st., Kyiv 03143, Ukraine</i>
66.	Malhotra Samta	Reconstruction of biological networks using image based features and mathematical methods
67.	Marcu Aurelian	Hetero-Nanostructure Properties Control using PLA-VLS Fabrication Method
68.	Martens Thomas	Evaluating intravitreal mobility of nanomedicines in ocular gene therapy <i>Thomas F. Martens, Dries Vercauteren, Katrien Forier, Katrien Remaut, Stefaan C. De Smedt, Kevin Braeckmans</i> <i>Ghent University, Laboratory of General Biochemistry and Physical Pharma</i>
69.	Mell Nico Alexander	NANOPARTICLES FOR THE LOCAL TARGETING OF INTERLEUKIN-10 TO THE INFLAMED INTESTINAL MUCOSA <i>Mell, N. A. 1,2, Lehr, C.M. 1,2, Collnot, E.-M. 1,2</i> <i>1 Department of Biopharmaceutics and Pharmaceutical Technology, Saarland University, Saarbrücken, Germany</i> <i>2 Depa</i>
70.	Mittal Ankit	Transcutaneous Vaccination via Particulate Carrier System <i>Ankit Mittal1,2, Steffi Hansen1,2 and C.M. Lehr1,2</i> <i>1 Helmholtz Institute for Pharmaceutical Research Saarland (HIPS), 2 Helmholtz-Center for Infection Research (HZI), Saarland University, Saarbr</i>
71.	Mostaghaci Babak	Synthesis of amino-modified calcium phosphate nanoparticles as novel gene delivery vector
72.	Naheed Suad	Comparative Effects of Lipid Lowering Potentials of Iris germanica from Extract to Fractions <i>Suad Naheeda,, , M.Iqbal Choudharya, Shama Nasima, Atta-ur-Rahmana and J. M. Alamb</i> <i>aH. E. J. Research Institute of Chemistry, International Center for Chemical</i>
73.	Odeniyi Michael Ayodele	Development and Evaluation of Cedrela gum Based Microparticles of Theophylline

		Odeniyi M. A. 1,2 and Takeuchi H. 2 1Dept. of Pharmaceutics & Industrial Pharmacy, University of Ibadan, Ibadan, Nigeria. 2Dept of Pharmaceutical Engineering, Gifu Pharmaceu
74.	Odor King Obinna	TRADITIONAL MEDICINE AN EMERGING TREND IN AFRICAN HEALING PRACTICE: THE CASE OF SEXOLOGICAL PRACTICES OF THE GERIATRICS IN NIGERIA.
75.	Oyediran Oyewale Akanfe	Nanomedicine -Nano-encapsulation: An Innovative Approach Towards Improving IDP Therapies OYEDIRAN O.A., University of Ibadan
76.	Pavel Mariana	Finite element model of magnetic nanoparticles used in drug delivery and hyperthermia cancer therapy Mariana Pavel (1,2), Radu Tanasa (1) and Alexandru Stancu (1) (1) Department of Physics, "Alexandru Ioan Cuza" University, 700506 Iasi, Romania (2) "Gr. T"
77.	Pelipenko Jan	Formulation of nanofibers and their effect on the cell behavior
78.	Pereira Paula	Glycol chitosan-based nanoparticles for siRNA delivery P. Pereira 1, F. M. Gama 1 1 IBB-Institute for Biotechnology and Bioengineering, Centre for Biological Engineering, Minho University, Campus de Gualtar 4710-057, Braga, Portugal.
79.	Pinheiro Marina	Marina Pinheiro, MS, Marlene Lúcio, PhD, Salette Reis, PhD, José L.F.C. Lima, PhD Evaluation of Rifabutine and JC2 on the biophysical properties of the membrane studied with 3D and 2D model systems
80.	Prajapati Vijay Kumar	Targeted killing of Leishmania donovani in vivo and in vitro with Amphotericin B attached to functionalized Carbon Nanotube Vijay Kumar Prajapati1, Kalpana Awasthi2, Thakur Prasad Yadav2, Madhukar Rai1, Onkar Nath Srivastava2, Shyam Sundar1 1Infectious Di
81.	Ramesh C. Nagarwal	Novel Modified PLA Nano in-situ Gel of 5-FU for Ophthalmic Delivery
82.	Ramezani Mohammad	Targeted Delivery of Nanoparticle-Aptamer Conjugates to Acute Lymphoblastic Leukemia T-cells Mohammad Ramezani1, Khalil Abnous1, Nasim H. Shahidi2 1 Nanotechnology Research Centre, School of Pharmacy, Mashhad University of Medical Sciences, P.O. Box 9177
83.	Roanne Jones	Effect of collagen substrate nanostructure and mechanical properties on the ex vivo expansion of corneal stem cells

		<p><i>Roanne R Jones, Bo Chen, Shengli Mi, Bernice Wright, Ian W Hamley and Che J Connan</i> <i>Stem Cells and Nanomaterials Laboratory, University of</i></p>
84.	Rotkina Anna	<p>Effect of Spherical Amorphous Nanoparticles (SANPs) from Birch Bark Triterpenoids (BBT) on platelets aggregation in vitro. <i>Rotkina A*, Romanova E.*, Moskovtzev A.*, Kaplun A.#, Kubatiev A. * Institute of General pathology & Pathophysiology RAMS, Labor</i></p>
85.	Sanchez Lorena	<p>Design and characterization of biocatalytic virus-like particles</p>
86.	Santos Ferreira Ines	<p>Preliminary Formulation Studies on a-Tocopherol Derivatives-Loaded PMMA Microparticles</p>
87.	Santos Pedrosa Sílvia	<p>Development of self-assembled hyaluronic acid nanogels</p>
88.	Schädlich Andreas	
89.	Sewiye Yohannes	<p>techniques of molecular biology and r-DNA technology</p>
90.	Simeonidis Konstantinos	<p>Mechanisms occurring in magnetic hyperthermia using Fe₃O₄ nanoparticles</p>
91.	Simion Gabriela	<p>Nanosystems Application in Biomedical Engineering</p>
92.	Tenambergen Frederike	
93.	Thom Kathleen	<p>Application of contrast agent Resovist® for tracking of aluminum hydroxide adjuvant using magnetic resonance imaging <i>K. Thom1, K. Aurich2, J. Sündermann1, G. Glöckl1, J.-P. Kühn3 and W. Weitschies1</i> <i>1Institute of Pharmacy, EMA University of Greifswald, G</i></p>
94.	Ulmeanu Magdalena	<p>Nano and micro-morphology modifications of Si (100) substrate induced by femtosecond laser pulse irradiations in air, water, CCl₄, C₂Cl₃F₃.</p>
95.	Vreto Lutfi	<p>Use of nanomedicine for elderly</p>
96.	Vystrcilova Lucie	<p>High-Molecular-Weight Polymer Drug Carriers for Cancer Treatment and Imaging</p>
97.	Wajda Anna	<p>"Synthesis of nanoparticles for drug delivery and its biocompatibility with mouse fibroblast" <i>Anna Wajda, Joanna Łapczuk, Mateusz Kurzawski, Marek Drozdzik Pomeranian Medical University, Department of Pharmacology, Powstańców Wlkp. 72 Av., 70-111 Szczecin,</i></p>
98.	Włodarczyk Anna Julia	<p>A 3-D model of human bronchial epithelium – a more realistic in vitro tool for assessing toxicity of inhaled nanoparticles <i>Włodarczyk AJ (1,2), Job C (2), Sexton K (2) and B. C. O. R. B. C. KA (2)</i></p>

		(1) Institute of Cardiology, Jagiellonian University School of M
99.	Yamada Hiroe	Synthesis of biodegradable starch derivatives for gene delivery, <i>Hiroe Yamada a, Carolin Thiele a, Brigitta Loretz a, Gerhard Wenz b, Claus-Michael Lehr a</i> <i>a Helmholtz Institute for Pharmaceutical Research Saarland, Saarbrücken, Germany</i> <i>b Saarland University</i>
100.	Zakharchenko Svetlana	Fully biodegradable self-rolled polymer tubes for cells encapsulation. <i>Svetlana Zakharchenko and Leonid Ionov</i> <i>Leibniz Institute of Polymer Research Dresden</i>
101.	Zamith Cardoso Andre Joao	Self organization and morphological transformations of nanostructures in microconfined environment for Drug Release, <i>Andre Zamith-Cardoso, Hans-Georg Braun, IPFDD</i>
102.	Zholobko Oksana	Nanostructured “smart” surfaces for controlled adsorption of proteins <i>O. Zholobko¹, J. Zem^{&#322;a2}, K. Fornal², P. Kuzyk, I. Begej¹, A. Budkowski², Yu. Stetsyshyn¹</i> <i>¹Department of organic chemistry National University «Lvivska Politechnika»</i> <i>S. Bandera 12,</i>
103.	Zhornik Alena	Toxicity of carbon nanotubes <i>A. Zhornik, L. Baranova, V. Emelyanova, I. Volotovski</i> <i>Institute of Biophysics and Cell Engineering of NAS of Belarus</i>
104.	Zubareva Anastasia	Preparation and characterization chitosan nanoparticles for doxorubicin delivery. <i>A.A. Zubareva, *A.V. Prokhorov, A.V. Il'ina, *E.V. Svirshchevskaya, V.P. Varlamov</i> <i>Centre «Bioengineering» RAS, Moscow</i> <i>*Shemyakin and Ovchinnikov Institute of Bioorganic Chemis</i>