

CURRICULUM VITAE

DEBORA PUGLIA

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https://www.researchgate.net/profile/Debora_Puglia?ev=hdr_xprf



1. PERSONAL DATA

Civil Status: Married, two daughters

Nationality: Italian

Birth date: 17/05/73

Place of Birth: Terni

EDUCATION

- PhD in Industrial Engineering (University of Perugia, 27/01/2004) discussing the following thesis: "Development and characterization of thermosetting matrix composites reinforced with vegetable fibers" Supervisor Prof. José M. Kenny Coordinator Prof. P. Conti.
- Degree in material engineering (101/110) (University of Perugia, 07/07/99), discussing the following thesis "Thermal degradation of epoxy-phenolic resins". Supervisor Prof. José M. Kenny, Co-supervisor Prof. Analia Vazquez

RESEARCH INTERESTS

- Biodegradable composites and nanocomposites materials reinforced with fiber and nanofillers of vegetable origin (lignin, cellulose)
- Composites and nanocomposites materials for food packaging materials
- Thermosetting matrix composites reinforced with fiber and nanofillers of vegetable origin (lignin, cellulose)
- Carbon nanostructures reinforced nanocomposites

WORK EXPERIENCE

07/11/2019 – present – Associate Professor of Materials Science and Technology at the University of Perugia

06/11/2016 – 06/11/2019 - tenure track contract - scientific-disciplinary sector ING-IND/22 - Materials Science and Technology

21/07/2013 - 06/11/2016: fixed-term researcher contract, type A- scientific-disciplinary sector ING-IND/22 - Materials Science and Technology

30/01 / 2014- 30/01/2020 - National scientific qualification for the functions of second level professor, Sector 09 / D1 - Materials Science and Technology

01/03/2015 - 31/12/2015: collaboration contract with ECNP scarl (European Center for Nanostructured polymers) within the European Project NANOLEAP

01/03/2015 - 30/06/2015: Collaboration contract with ECNP scarl (European Center for Nanostructured polymers) as part of the Piedmont's Polo, DRAPO project

01/04/2014 - 31/12/2014: Collaboration contract with ECNP scarl (European Center for Nanostructured polymers) as part of the Piedmont's Polo, DRAPO project

01/02/2013 - 20/07/2013: Research grant for the study of new polymeric materials and compounds, within the LIFE + Environment Policy and Governance project "Revalorization of coastal algae wastes in textile nonwoven industry with applications in building noise isolation "(SEA-MATTERS)

09/21/2011 - 04/30/2013: Collaboration contract with ECNP scarl (European Center for Nanostructured polymers) within the European POCO (Carbon Nanotube Confinement Strategies to Develop Novel POLYmer Matrix COMposites) project and the European ECNP GROWTH project (Support to Networks of Excellence with durable integrated structures, Consolidation Of The European Center For Nanostructured Polymers)

21/09/2010 - 20/09/2011: fixed-term university researcher contract, for the purposes of the Research Project "Development of flexible polymer photovoltaic cells" - scientific-disciplinary sector ING-IND / 22 - Science and Technology of materials

01/07/2009 - present: Administrative management of the ECNP scarl (European Center for Nanostructured polymers): human resources management, reporting on European and national funds, ordinary and extraordinary administration (scientific events), general secretariat

01/07/2009 - 20/09/2010: Collaboration contract with ECNP scarl (European Center for Nanostructured polymers) as part of the European POCO Carbon Nanotube Confinement Strategies to Develop Novel POLYmer Matrix COMposites project

05/01/2007 - 31/07/2008: Collaboration contract with the PROPLAST center (Center of Culture for Engineering plastics) Strada Comunale Savonesa, 9 PST -15050 Rivalta Scrivia (AL) - Italy for the characterization of thermosetting matrices reinforced with fullerene inorganic particles for the optimization of tribological surfaces

01/11/2005 - 31/01/2006: Industrial Collaboration Project PSTL - (ID / DB 388) with the Italian University Consortium on Materials Science and Technology (INSTM) Via G. Giusti n ° 9, 50121 Firenze - ITALY for a feasibility study for the production of carbon nanofiber based paint composite materials for applications in the field of protection against electromagnetic interference and radio frequencies.

01/03/2004 - 30/06/2009: Postdoctoral research fellow at the University of Perugia with contract for the development and characterization of nanocomposite materials, polymers and composites

01/04/2003 - 30/04/2003: Collaboration contract with I.N.B.B. - National Institute of Biostructures and Biosystems, for collaboration in the FIRB research project "Nanotechnologies, microtechnologies, integrated development of the materials.

01/09/1999 - 31/08/2000: Collaboration contract with the University of Perugia for the design and maintenance of a database for moulding materials.

TEACHING

2015 - present: Materials Science and Technology, Industrial Engineering

2017 - present: Materials Science and Technology, course in Design)

2013-2015: Assistant to the Materials Laboratory course (Bachelor in Industrial Engineering and Master's Degree in Industrial Engineering)

May 2013: Course on Characterization of polymeric materials at the Master in "Green chemistry: chemical production and new materials from renewable sources" - Department of Chemistry and Pharmacy of the University of Sassari.

2001 - 2012: Assistant to the Polymer Technology course of the First Level Degree Course at the University of Perugia - Degree in Materials Engineering

2005 - 2010: Assistant to the Polymer Technology course of the Second Level Degree Course at the University of Perugia - Degree in Materials Engineering

2004 - 2008: - Biomaterials - Materials Engineering at the University of Perugia

2007 - 2011: - Materials for Biotechnology I - Materials Engineering at the University of Perugia

2007 - 2011: - Materials for Biotechnology II - Materials Engineering at the University of Perugia

2005 - 2008: Bionanotechnology module for 2nd level European Master in Nanotechnology of polymeric materials

- Co-supervisor of 15 Bachelor's and Master's theses
- Doctoral thesis supervisor
- Reviewer for international journals on the Science of polymeric materials (Journal of Applied Polymer Science, Composite Science and Technology, Composites Part A, Thermochimica Acta,

Separation Science and Technology, Carbohydrate Polymers, Industrial Crops and Products, Material & Design, Journal of Natural Fibers)

RESEARCH, COORDINATION AND TECHNICAL CONSULTANCY ACTIVITIES

INTERNATIONAL PROJECTS EVALUATOR ASSIGNMENTS

- 2016, National Science Centre (Narodowe Centrum Nauki) - Funding scheme PRELUDIUM, Poland
- 2017, 2018, Austrian Science Fund (FWF), from 01-01-2017 to present
- 2017, FONDECYT Regular 2018 grant competition research project evaluator, Chilean National Science and Technology Commission (CONICYT - Chile), from 01-01-2017 to 31-12-2017
- 2017, French National research Agency (ANR), CES 21 "Food and Food Systems", from 01-01-2017 to 31-12-2017
- 2019, Pole of Innovation Grant Scheme (PoIGS): Pole of Innovation for Agriculture-Sustainable Materials for Composite Applications - Mauritius Research Council, 01-01-2019 to 31-12-2019
- 2019, Wellcome Trust DBT India Alliance. Fellowship, from 01-01-2019 to 31-12-2019
- 2019, Research project evaluator L'Oréal-UNESCO For Women in Science Sub-Saharan Africa Regional program, from 01-01-2019 to 31-12-2019

SCIENTIFIC RESPONSIBILITY FOR NATIONAL RESEARCH PROJECTS

- BIT3G - Third Generation Biorefinery: National Technology Cluster of Green Chemistry SPRING – Sustainable Processes and Resources for Innovation and National Growth, from 01-01-2014 to 31-12-2017
- CARIT (Fondazione cassa di Risparmio di Terni)- Engineering, characterization and functional properties of biodegradable stretch films for the food packaging sector". food packaging sector, from 01-03-2015 to 27-07-2017
- CARIT (Fondazione cassa di Risparmio di Terni) - Design and sustainable development of multifunctional biodegradable films for the food packaging sector with antibacterial and/or anti-bacterial properties induced by natural bioactive molecules, from 08-07-2016 to 25-10-2017
- POR-FESR 2007/2013 - ASSE I - INNOVATION AND PRODUCTION TRANSITION Activity I.1.3 Innovation and P.M.I. - Aid to subjects aggregated to innovation poles - MATERIA 1 - MATERIALI e rinforzi a Ridotto Impatto Ambientale - from 27-08-2010 to 01-10-2014
- POR-FESR 2007/2013 - PAS - PROGETTO ANTI SOFISTICAZIONE, from 30-03-2011 to 10-05-2016
- POR-FESR 2007/2013 - ASSE I - INNOVATION AND PRODUCTION TRANSITION Activity I.1.3 Innovation and P.M.I. - MATERIA 2 -MATERIALI e rinforzi a Ridotto Impatto Ambientale, from 02-08-2011 to 03-10-2014
- POR-FESR 2007/2013 - Measure I.1.3. Innovation Poles - 3rd Annual Program, Pole: "SUSTAINABLE ARCHITECTURE AND HYDROGEN" - SMARTCONCRETE, MODALITÀ REALIZZATIVE PER SOLAI IN CALCESTRUZZO DI NUOVA GENERAZIONE, rom 13-06-2012 to 04-09-2015
- POR FESR 07/13 MIS.I.1.1 - AUTOMOTIVE, DRAPPO' project, Sistemi ausiliari integrati ad alta efficienza per il recupero dell'energia e la riduzione dei consumi di autoveicoli, from 11-02-2013 to 24-05-2016
- PAR FSC - POLI IV ANNUAL PROGRAM,POLILED, MATERIALI POLIMERICI PER LED AD ALTA EFFICIENZA, from 11-07-2014 to 01-09-2017
- POR FESR 07/13 NewFunTermo_form, STUDIO DI NUOVE FUNZIONALITÀ SU COMPOSITI TERMOPLASTICI TERMOFORMATI, from 20-04-2015 to 19-10-2016
- POR FESR 2014/2020 Piedmont Region, Piattaforma Fabbrica Intelligente, GreenFactory4Compo, Design of structures and body components in composite material, from 14-11-2016 to 30-04-2019

INTERNATIONAL GRANTS (AS PRINCIPAL INVESTIGATOR)

- 2020: 4BIOLIVE Project (Production of Biostimulants, Biofertilizers, Biopolymers and Bioenergy from OLIVE-oil chain residues and by-products), PRIMA (Partnership for Research and Innovation

in the Mediterranean Area), Section 2 Call multi-topics 2020, Budget: 1022000 €

- CONICET-CUIA bilateral cooperation, 2020-2021 edition (cooperation project for promotion of exchange and researchers mobility between Italy and Argentina), Budget: 10000 €

OTHER SCIENTIFIC ACTIVITIES

- Participation to the research activities of the Instituto de Tecnología y Ciencias de la Ingeniería(INTECIN-CONICET), Faculty of Engineering, Buenos Aires (2-4.12.2010), responsible for of

- Participation in the technical staff of reference for ESA LET SME 2009 project Contract Number 22875/09 / NL / VS - Carbon Based Adhesive

- Collaboration for research and consultancy activities with local companies in the context of regional projects:

- Vision Projects (CF, Collorosso, CONART, Umbria Plasfor)

- Industrial projects and consultancy for the process of polymeric materials (CF, Collorosso, BRAI Cost, Meraklon, Novamont, Bayer Sheet Europe, Tarkett Sommer, Meccanotecnica Umbra, Alluminio Spoleto, Polycart)

- Consulting for companies belonging to the extra-regional industrial fabric (Proplast, CRF, CSM)

- Founding partner and R&D developer of MDP Materials Design and Processing srl Loc. Pentima Bassa 21 05100 Terni, a company that deals with technology transfer, research, development of technologies and design in the field of materials, composites and nanocomposites

- Participation in the technical reference staff for the following European projects with participation of the MDP srl:

FP6-NMP - MULTIHYPBRIDS - Project Reference: 26685 -Innovative sensor-based processing technology of nanostructured multifunctional hybrids and composites

Action Line: NMP-2004-3.4.4.1 Multifunctional material-based factory of the future, Duration: 01.01.2007 - 31.12.2010

FP6-NMP NAPOLYDE- Control and smart devices - Project Reference: 515846

Action Line: NMP-2003-3.4.3.1-2 New production technologies for high added-value products, exploiting and using nano-scale precision engineering techniques, Duration: 01.04.2005 - 31.03.2009

NMP-FP7-2010-1.2-3 - NEAT Nanoparticle Embedded in Alloy Thermoelectrics - Thermoelectric energy converters based on nanotechnology, Duration: 01.04.2011 - 31.03.2014

2007 - Participation as MDP in the establishment (in 2007) of the M.I.T.E.S. srl - (Materials for Information, Traceability, Encryption and Security, Academic spin-off at the University of Perugia for the production of M.P.I.D (Decodable Informative Plastic Materials).

- Participation in Italy-Spain integrated actions

- Participation in bilateral collaborations (2012-2019) CNR-CONICET (Argentina).

- Participation in the Italy - India collaboration program (2005-2007) between MAE and DST (Indian Department of Science & Technology)

- Participation in the MIUR Italia India program (2007-2009) - Grants for Young Researchers in the field on Nanoscience and Nanotechnology

- INTERNATIONAL POST DOCTORAL RESEARCH FELLOWSHIP PROGRAM (TÜBİTAK) Esra Evrim YALÇINKAYA - 02/09 / 2013-02 / 01/2014 - Synthesis and Characterization of PLA / Clay / CNC Bio-nanocomposites via solvent casting method

- Participation in the MAE program - MYNCYT (2014-2016) Nanotechnology Area - Preparation and characterization of polyurethanes from renewable sources and nanocomposites with reinforcement of nanocellulose

- Participation to the research activities of the Instituto de Investigaciones en Ciencia y Tecnología de Materiales (INTEMA-CONICET), Univ. of Mar del Plata, Mar del Plata (5-

10.12.2010), under the responsibility of Dr. Liliana Beatriz Manfredi, from 05-12-2010 to 10-12-2010

- Participation to the research activities of the (Nano)Materials Group of the Instituto de Investigaciones Fisicoquímicas Teóricas y Aplicadas (INIFTA), La Plata, Argentina, under the responsibility of Prof. Javier Amalvy, from 09-11-2015 to 19-11-2015.

- Participation to the research activities of the (Nano)Materials Group of the Instituto de Investigaciones Fisicoquímicas Teóricas y Aplicadas (INIFTA), La Plata, Argentina, under the responsibility of Prof. Javier Amalvy, from 18-05-2017 to 25-05-2017

- Participation to the research activities of the Departamento de Química Analítica, Nutrición y Bromatología Universidad de Alicante, under the responsibility of Prof. M^a Carmen Garrigós Selva, from 15-12-2019 to 19-12-2019.

ORGANIZATION OF SCIENTIFIC EVENTS

- Member of the organizing committee for "ECNP, International Conferences on Nanostructured Polymers and Nanocomposites": Rome (April 2008), Paris (April 2009), Madrid (April 2010), Prague (April 2012), Rome (September 2016), San Sebastian (October 2018)

- Member of the organizing committee for the 4th, 5th, 6th and 7th "International Conference on Biodegradable Polymers and Sustainable Composites" (BIOPOL2013, BIOPOL2015, BIOPOL2017, BIOPOL2019)

EVALUATOR OF INTERNATIONAL PHD THESIS

2019, Valorisation of biorefinery-derived humins: Towards the development of sustainable thermosets and composites, Candidate Anna SANGREGORIO, Institut de Chimie de Nice, Université

Côte d'Azur, Advisor: Nicolas Sbirazzuoli, from 01-08-2019 to 30-09-2019

2017 - Miryam Criado González, Layer-by-layer assembly of natural polymers for biomedical applications, Facultad de Ciencias Químicas/ Dpto. Physical Chemistry, UNIVERSIDAD COMPLUTENSE DE MADRID, from 01-01-2017 to 31-12-2017

2015 - Amalia I. Cano Embuena, UNIVERSITAT POLITÈCNICA DE VALÈNCIA, Different strategies to improve the functionality of biodegradable films based on starch and other polymers, from 01-01-2015 to 31-12-2015

2014 - Marina Patricia Arrieta, UNIVERSIDAD POLITÈCNICA DE VALENCIA "Films De PLA Y PLA-PHB Plastificados Para Su Aplicación En En Envases De Alimentos. Caracterización Y Análisis De Los Procesos De Degradación", from 01-01-2014 to 31-12-2014

2012- Natacha Bitinis, Consejo Superior De Investigaciones Científicas, Instituto De Ciencia Y Tecnología De Polímeros, Desarrollo De Nuevos Nanocompuestos Biodegradables Basados En Mezclas De Ácido Poliláctico Y Caucho Natural, from 01-01-2012 to 31-12-2012

2011 - Erlantz Lizundia Fernandez, NOVEL POLY (L-LACTIDE) / CARBON NANOTUBE. BIOCOSCOMPOSITES: PHASE STRUCTURE AND PROPERTIES, University Of The Basque, Country (EHU-UPV), from 01-01-2011 to 31-12-2011

Professional qualifications:

- May 2003: Issuing of professional qualification certificate from ISIRIM scarl, for "Expert in Innovation Management" Course N. TR 010351001 Objective 3 Measure E1 (Promotion of female participation in the labor market) Action 1

PARTICIPATION TO CONFERENCES

Workshop on Polymer Analysis, degradation and Stabilisation

Alicante, 29 September – 1 October 1999

Participation: Poster

Title: "Degradation behaviour of resol type phenolic - epoxy blends: thermal degradation and fire resistance")

Simposio Argentino de Polímeros, SAP99, Los Cocos, Córdoba

nov.1999

Participation: Poster

Title: "Relación entre la degradación termica y la estructura de los Resoles"

Simposio Argentino de Polímeros, SAP99, Los Cocos, Córdoba

nov.1999

Participation: Poster

Title: "Resistencia al Fuego de resoles con Distinta relación Molar Formaldehido/fenol"

"XIX CONVEGNO INTERREGIONALE TUMA 2000"

Montesilvano (PE), 25-27 May 2000

Participation: Poster

Title: "Degradazione termica di miscele di resine fenoliche e resine epossidiche",

"5° CONGRESSO NAZIONALE AIMAT"

Spoletto, 17-21 July 2000

Participation: Organizing Committee and poster

Title: "Comportamento degradativo di miscele epossi - fenoliche: degradazione termica e resistenza al fuoco"

MoDeSt 2000, Modification, Degradation and Stabilization of Polymers

Palermo, 3-7 September 2000

Participation: Poster

Title: "Degradation behaviour of epoxy - resol blends"

SLAP 2000 VII Simposio Latinoamericano de Polímeros

Havana, 20-24 November 2000

Participation: Poster

Title: "Desarrollo de mezclas de resinas epoxi con plastisoles de PVC"

"XX CONVEGNO INTERREGIONALE TUMA 2001"

Pisa, 24-25 May 2001

Participation: Oral presentation

Title: "Compositi a matrice termoindurente rinforzati con fibre di lino: confronto con il vetro"

"III CONVEGNO NAZIONALE INSTM"

Trento, 18-20 Giugno 2001

Participation: Poster

Title: "A comparison of the effects of flax and glass fibers on the mechanical properties of thermosetting matrix composites"

"RASSEGNA INTERNAZIONALE DELLA CHIMICA - RICH-MAC 2001"

Milan, Italy, 2-6 October 2001

Participation: Presentation posters of STM research group.

"COMAT 2001 - INTERNATIONAL CONFERENCE ON SCIENCE AND TECHNOLOGY OF COMPOSITE MATERIALS"

Mar del Plata, Argentina, 10-12 December 2001

Participation : Poster

Title: "ECOFINA": Ecoefficient Technologies and Products Based on Natural Fiber Composites.

Authors: D. Puglia, J. Biagiotti, A. Vere Simmonds, A. Rubio, J.M. Kenny.

"SAMPE EUROPE CONFERENCE - 23RD INTERNATIONAL CONFERENCE AND TUTORIALS"

Paris expo – Port de Versailles, Paris, April 9th –11th, 2002.

Participation : Poster

Title1: A Systematic Investigation on the Influence of Natural Fiber Treatments on the Final Behaviour of their Polymeric Matrix Composites. PART I: Effect of Treatment on the Fiber Properties.

Title2: A Systematic Investigation on the Influence of Natural Fiber Treatments on the Final Behaviour of their Polymeric Matrix Composites. PART II: Analysis of Composite Properties.

Authors: J. Biagiotti, D. Puglia, L. Torre A. Arbelaiz, G. Cantero, S. Arbizu, R. Llano-Ponte, Iñaki Mondragon , José M. Kenny.

“ECCM-10 - 10TH EUROPEAN CONFERENCE ON COMPOSITE MATERIALS”

Old St. Jan Conference Centre, Brugge, Belgium, June 3-7, 2002

Title: “ECOFINA”: Ecoefficient Technologies and Products Based on Natural Fiber Composites..

Authors: D. Puglia, J. Biagiotti and J.M. Kenny.

“6° CONGRESSO NAZIONALE AIMAT”

Modena, Italy, September 8-11, 2002

Title: “Influenza di vari trattamenti chimici di compatibilizzazione fibra matrice sulle caratteristiche termiche e meccaniche della fibra di lino”

Authors: D. Puglia, J. M. Kenny, G. Cantero, Iñaki Mondragon

“MODEST 2002”

Budapest, Hungary, 30 June – 4 July 2002

Title: “Thermal degradation of natural fibers and fully biodegradable polymer composites”

Authors: D. Puglia, A. Tomassucci, J. M. Kenny

“XXI CONVEGNO INTERREGIONALE TUMA 2002”

Urbino, Italy, July 15-17, 2002

Authors: D. Puglia, L. Valentini, J. M. Kenny

Title: “Analisi della Reazione di Cura di Compositi Resina Epossidica/Nanotubi di Carbonio attraverso Analisi Termica e Spettroscopia Raman”

“DIAMOND 2002” 13th European Conference on Diamond, Diamond like Materials, carbon Nanotubes, Nitrides and Silicon Carbide

Granada, Spain, 8-13 September 2002

Title: “Analysis of the Cure Reaction of Carbon Nanotubes/Epoxy Resin Composites Through Thermal Analysis and Raman Spectroscopy”

“EU Forum in Nanoscience Technology”

Beijing, P.R China. December 2002

Authors: J.M. Kenny, L. Torre, L. Valentini, J. Biagiotti and D. Puglia

Title: Processing, Structure and Properties of Polymer Matrix Nanocomposites for Industrial Applications.

“7th INTERNATIONAL CONFERENCE ON WOODFIBER-PLASTIC COMPOSITES”

Madison, Wisconsin, USA, May 19-20, 2003

Authors: : D.Puglia, A. Tomassucci, J.M. Kenny

Title; Mechanical And Thermal Properties of Biodegradable Composites Based on Mater-Bi® and Flax Cellulose Pulp

“SAMPE Europe Conference - 24nd INTERNATIONAL CONFERENCE AND FORUMS”

Paris expo – Port de Versailles, Paris, April 1th –3rd, 2003.

Authors: : L. Valentini, J. Biagiotti, D. Puglia, J. M. Kenny

Title: Effect of Nanotube Inclusions on Polymer Morphology in Composite Systems.

IV Convegno Nazionale sulla Scienza e Tecnologia dei Materiali

Ischia Porto (NA) 29 June – 2 July 2003

D. Puglia, A. Tomassucci and José M. Kenny

Title: Poster ANALYSIS OF THE CURE REACTION OF EPOXY MATRIX/SWNTs COMPOSITES THROUGH THERMAL ANALYSIS AND IMPEDANCE SPECTROSCOPY

EcoComp 2003- 2nd International Conference on Eco-Composites

D. Puglia, A. Tomassucci and José M. Kenny

Title: "Mechanical And Thermal Properties of Biodegradable Composites Based on Mater-Bi® and Flax Cellulose Pulp "

Queen Mary, University of London, London, UK, 1-2 September 2003

"International Workshop on Thermoplastic Matrix Composites 2003" Club Bellavista, Gallipoli, Lecce ITALY. September 11-12, 2003.

Authors: J. Biagiotti, D. Puglia, J. M. Kenny.

Title: Improvement of thermal and Mechanical Properties of Vegetable Fibres Based Composites by a Physical Treatment

"1st International Workshop on Natural Fibre Composites"

Hotel Continental Terme, Ischia (Italy) 19-21 October 2003

Participation: Poster

Authors: T. Isidori, S. Borsini, D. Puglia, A.V. Simmonds and José M. Kenny

Title: OPTIMIZATION OF PROCESSING AND EVALUATION OF SPECIFIC PROPERTIES OF ACRILIC AND VINYLESTER MATRIX COMPOSITES REINFORCED WITH FLAX FIBRES

"1st Workshop of the Network of Excellence "NANOFUN-POLY" in the Areas of Excellence "Applications" and "Nanostructure-Property Relationships"

Madrid, CSIC 14-15 March 2005

Participation: Poster

Authors: Debora Puglia, Luca Valentini, Ilaria Armentano, José M. Kenny

Title: AMINO-FUNCTIONALIZED CARBON NANOTUBES FOR BINDING TO POLYMERS - Analysis of the cure reaction of epoxy matrix / fluorine functionalized SWNTs

"XVII Convegno Nazionale dell'Associazione Italiana di Scienza e Tecnologia delle Macromolecole"

Naples, 11-15 September 2005

Participation: Poster

Authors: Debora Puglia, Luca Valentini, Ilaria Armentano, José M. Kenny

Title: AMINO-FUNCTIONALIZED CARBON NANOTUBES FOR BINDING TO POLYMERS

"1° Forum Nazionale dei Giovani Ricercatori su Materiali Polimerici e Biomateriali"

Modena, 18-20 September 2006

Participation: Poster

Authors: Debora Puglia, Luca Valentini, Ilaria Armentano, José M. Kenny

Title: AMINO-FUNCTIONALIZED CARBON NANOTUBES FOR BINDING TO POLYMERS

"Workshop on Nanofun Research Internal Projects"

Donostia San Sebastian, Spain 15-16 September 2006

Participation: Poster

Authors: Debora Puglia, Luca Valentini, Ilaria Armentano, José M. Kenny

Title: EFFECT OF AMINO-FUNCTIONALIZED CARBON NANOTUBES ON THERMAL STABILITY OF EPOXY SYSTEMS

“5th International Conference on NANOSTRUCTURED POLYMERS AND NANOCOMPOSITES”

Paris, France, April 15-17, 2009

Participation: Posters

Authors: M.G. Sajeev, D. Puglia, J.M. Kenny, S. Thomas

Title: Effect of introduction of SBS Triblock Copolymers on the final morphology and properties of an Epoxy/DDM System

Authors: P. Vijayan, D. Puglia, J.M. Kenny, S. Thomas

Title: Effect of introduction of nanoclay on morphology and thermo mechanical property of epoxy CTBN blends

“6th International ECNP Conference on Nanostructured Polymers and Nanocomposites”

Madrid (Spain) 28-30 April 2010

Participation: Poster

Authors: D. Puglia, M. Monti, M. Natali, J. M. Kenny, L. Torre

Title: Effect of carbon nanofibers in the kinetic of cure of nanocomposites based on a polyester resin

“ECCM 14”

Budapest 7-10 June 2010

I.M. De Rosa, A. Iannoni, J.M. Kenny, D. Puglia, C. Santulli, F. Sarasini, A. Terenzi, Environmentally friendly poly(lactic acid)/phormium tenax composite: thermal and mechanical characterization

“XX Convegno Italiano di Scienza e Tecnologia delle Macromolecole”

Terni, ITALY – Settembre 4-8, 2011

1) Iannoni, A. Terenzi, D. Puglia, F. Dominici, D. Turati, R. Lombi, N. Mottola, L. Torre, Studio di nuove formulazioni nanocomposite a matrice biodegradabile per la realizzazione di imballaggi ultrasottili

2) E. Fortunati, M. Monti, D. Puglia, C. Santulli, J. M. Kenny, L. Torre Nanocellulose extraction from Phormium Tenax fibres

“7th International ECNP Conference on Nanostructured Polymers and Nanocomposites”

Prague, Czech Republic, 24-27 April 2012

D. Puglia, E. Fortunati, C. Santulli, J.M. Kenny, Cellulose nanocrystals extracted from okra fibres as reinforcement in PVA nanocomposites

International SAMPE Technical Conference

“SAMPE 2012 Baltimore, MD”

2012 SAMPE International Symposium and Exhibition - Emerging Opportunities: Materials and Process Solutions; Baltimore, MD;

Baltimore, 21-24 May, 2012

Multifunctional Materials I

L. Torre, M. Rallini, M. Natali, M. Monti, D. Puglia, J.M. Kenny, Graphene Nanoplatelets as Conductive Fillers for Strain Sensing in Epoxy Nanocomposite

“ECCM 15”

June 24-28, 2012, Venice - Italy

1) R. Petrucci, E. Nisini, D. Ghelli, C.Santulli, D. Puglia, F. Sarasini, G. Minak, J.M. Kenny, Mechanical and impact characterisation of hybrid composite laminates based on flax, hemp, basalt and glass fibres produced by vacuum infusion

2) Mariano PRACELLA, Md. Minhaz-Ul HAQUE, Debora PUGLIA, Vera ALVAREZ, Preparation and characterization of PLA nanocomposites with nanocellulose filled PVAc

3) F. Sarasini C.Santulli, D. Puglia, T. Valente, J. Kenny, Thermal and mechanical behaviour of phormium tenax reinforced polypropylene composites

4) F.R. Lamastra, D. Puglia, M. Monti, A. Vella, L. Peponi, J. M. Kenny, F. Nanni Preparation and characterisation of Poly(ϵ -caprolactone) reinforced with MWCNTs and GNPs loaded aligned electrospun PMMA fibre mats

4th Workshop: Green Chemistry and Nanotechnologies in Polymer Chemistry, 4-6 September 2013 – Pisa, Italy

1) M. Pracella, M.-Ul Haque, N. Barbani, D. Puglia, V. Alvarez

Preparation and characterization of biodegradable polymer blend composites containing cellulose nanocrystals

2) M. Pracella, Md. Minhaz-Ul Haque, D. Puglia, E. Fortunati, J.M. Kenny

Biodegradation of binary and ternary composites of PLA and PLA/Ethylene-co-vinyl acetate blends with cellulose microfibers

IX CONVEGNO NAZIONALE INSTM SULLA SCIENZA E TECNOLOGIA DEI MATERIALI

Bari, 30 Giugno – 3 Luglio 2013

Optimized extraction of cellulose nanocrystal from pristine and carded hemp fibres

F. Luzi, E. Fortunati, D. Puglia, C. Santulli, L. Torre, J. M. Kenny

BIOPOL2013

Rome, 1-3 October 2013

D.Puglia, E. Fortunati, F. Luzi, L. Torre, C. Santulli, J.M. Kenny Effect of cellulose nanocrystals extracted from phormium leaves on the final properties of limonene modified PLA films

International Workshop “Eco-sustainable Food Packaging Based on Polymer Nanomaterials”

26-28 February 2014 CNR Rome Italy

E. Fortunati, D. Puglia, F. Luzi, F. Dominici, C. Santulli, L. Torre, J.M. Kenny “Combined Effect of Cellulose Nanocrystals Extracted from Phormium Tenax Leaves and Limonene on the Properties of PLA Films”

XII CONVEGNO NAZIONALE AIMAT

Lecce, 21 - 24 Settembre 2014

L. Torre, E. Fortunati, F. Luzi, D. Puglia, R. Petrucci, J.M. Kenny “Nanocompositi di acido polilattico rinforzati con nanocristalli di cellulosa estratti da posidonia oceanica: proprietà funzionali e biodegradazione”

EPF 2015, European Polymer Congress

Dresda, 21 – 26 Giugno, 2015

Oral Presentation: Fully biodegradable poly(lactic) acid films based on cellulose and lignin nanoparticles: a comprehensive study

BIOPOL 2015

San Sebastian (Spain), 6-9 Ottobre 2015

Oral presentation: Glycidyl methacrylate (GMA) grafting onto poly(lactic) acid films: effect of lignin nanoparticles and masterbatch process

Poster presentations:

1) Structure and properties of biodegradable wheat gluten biocomposites containing lignin nanoparticles

2) Effect of processing conditions and lignin content on crystallization and mechanical behavior of lignin nanoparticles/poly(lactic acid) bionanocomposites

BIOPOLI2015

II Workshop Polímeros Biodegradables y Biocompuestos, III Workshop of the project BIOPURFIL, Bio-based Polyurethane Composites with Natural Fillers
Novembre 11-13, 2015 - Buenos Aires, Argentina

- 1) A. Cordero, J. Amalvy, L. M. Chiacchiarelli, E. Fortunati, D. Puglia, J. Kenny Preparation of polyurethane using non-isocyanate synthesis and their composites with cellulose nanocrystals
- 2) A. Cordero, P. Peruzzo, J. Amalvy, L. M. Chiacchiarelli, D. Puglia, J. Kenny Preparation of castor oil based polyurethane and their composites with cellulose nanocrystals
- 3) Weijun Yang, Franco Dominici, Elena Fortunati, Debora Puglia, Jose M Kenny Glycidyl methacrylate (GMA) grafting onto poly(lactic) acid films: effect of lignin nanoparticles and masterbatch process

2nd ICNF – From Nature to Market

Fabrizio Sarasini, Jacopo Tirillò, Teodoro Valente, Carlo Santulli, Debora Puglia, José Maria Kenny, Polycaprolactone reinforced with natural fibres as potential biocomposite for orthoses
Azores/Portugal, 27-29 April 2015

COSINTERRA 2016

Luigi Torre, Elena Fortunati, Debora Puglia Rivalorizzazione di fibre vegetali ed animali in prodotti polimerici ad alto valore aggiunto,
Bastia Umbra, 30 SETTEMBRE 2016

AIMAT 2016, XIII Convegno Nazionale AIMAT Ischia Porto

13-15 luglio 2016

Yang W, Fortunati E, Balestra GM, Kenny JM, Puglia D, Torre L, Effect Of Cellulose And Lignin Nanoparticles On Disintegration, Antimicrobial And Antioxidant Properties Of PLA Active Films

NanoMaterials and BioMaterials for the next Decade Pantelleria (Sicily)

July, 5 - 7, 2017

Cellulose nanocrystals from pruning residues combined with carvacrol in PVA_CH active films for sustainable packaging applications
E. Fortunati, D. Puglia, F. Luzi, L. Torre

XXXV Convegno Nazionale della Società Italiana di Chimica Agraria

La ricerca in Chimica Agraria: integrazione dello studio dei sistemi suolo, pianta e ambiente, SICA 2017

Udine, 11-13 settembre 2017

Production and characterization of novel PLA_PBS based bionanocomposites reinforced with cellulose nanocrystals extracted from Carmagnola hemp fibres for food packaging applications
E. Fortunati¹, F. Luzi¹, D. Puglia¹, D. Pezzolla¹, G. Gigliotti¹, L. Torre¹

3rd ICNF – Advanced Materials for a Greener World

Braga/Portugal, 21-23 June 2017

COFFE BY-PRODUCT AS A LOW COST FILLER FOR NEW BIODEGRADABLE COMPOSITES
Fabrizio Sarasini¹, Jacopo Tirillò, Antonio Zuorro, Roberto Lavecchia, Gianluca Maffei, Teodoro Valente, Debora Puglia, Franco Dominici, Luigi Torre

JOINT EVENT ON 5th International Conference on Bioplastics and 6th World Congress on Biopolymers

September 07-09, 2017 | Paris, France

DOI: 10.4172/2157-7048-C1-005

Developing thermoplastic films from wheat flours with different proportions of finely grinded bran, Paolo Benincasa, Franco Dominici, Debora Puglia

CIRIAF2017

Rocca di Sant'Apollinare - Marsciano (PG) – 6/7 aprile 2017

S6 Progettazione circolare ed analisi di ciclo di vita

Elena Fortunati, Debora Puglia, Luigi Torre “Rivalorizzazione di fibre vegetali in prodotti polimerici ad alto valore aggiunto e basso impatto ambientale

MATBIM2017

4th international meeting on Material/Bioproduct Interaction

Porto, 26th to 28th April 2017

E. Fortunati, D.Puglia, F. Luzi, F. Dominici, L. Torre, Cellulose Nanocrystals From natural Sources in Nanocomposite Approach: special focus on Phormium Tenax Leaves Revalorization as Nanostructured Reinforced Phases in Plasticized PLA based films

BIOPOL2017

Mons, 11-13 September 2017

- 1) Debora Puglia, Elena Fortunati, Andrea Terenzi, Antonio Iannoni, Josè Maria Kenny, Luigi Torre. Stretchable PLA-PBS Based Films Plasticized With Novel Green Route: Processing Conditions, Thermal And Mechanical Responses
- 2) Weijun Yang, Marco Rallini, De-Yi Wang, Daqian Gao, Franco Dominici, Luigi Torre, Jose M. Kenny, Debora Puglia. Role Of Lignin Nanoparticles In UV Resistance, Thermal And Mechanical Performance Of PMMA Nanocomposites Prepared By A Combined Free-Radical Graft Polymerization/Masterbatch Procedure

BIOPOL2019

Stockholm, 17th-19th JUNE 2019

Keynote Lecture 7. Debora Puglia (University of Perugia, Terni, Italy). “Lignin based nanocomposites”

Poster presentations:

- W. Yang, E. Fortunati, F. Bertoglio, J.S. Owczarek, G. Bruni, M. Kozanecki, J.M. Kenny, L. Torre, L. Visai, D. Puglia. Polyvinyl Alcohol/Chitosan Hydrogels With Enhanced Antioxidant And Antibacterial Properties Induced By Lignin Nanoparticles
- F. Luzi, D. Puglia, E. Pannucci, R. Bernini, L. Santi, L. Torre. Quercetin And Gallic Acid Pva Films: Structural And Functional Properties For Packaging Applications
- Michelina Soccio, Silvia Quattrosoldi, Franco Dominici, Francesca Luzi, Nadia Lotti, Debora Puglia. Pbs-Based Copolymer As Compatibilizer In Thermoplastic Flour/Poly(Butylene Succinate) Blends

BIOPOL2022, Alicante, 14-16 October 2022, Keynote Lecture - Multifunctional lignin-based nanocomposites and hybrids

Poster presentations:

- 1) Francesca Luzi, Debora Puglia, Franco Dominici, Luigi Torre, Catia Clementi, Loredana Latterini, Effect Of Natural Pigment From Logwood Bark In The Coloring Of Biopolymeric Matrices: Role Of The Matrices And Ageing Stability
- 2) Elena Battaglini, Enrico Bianchi, Michelina Soccio, Emanuele Simonini, Debora Puglia, Franco Dominici, Maurizio Fiorini, Valentina Siracusa, Nadia Lotti, Poly(Butylene Furanoate) Film For Sustainable Food Packaging: Mechanical, Gas Barrier And Welding Behavior
- 3) J. Gomez-Caturla, R. Tejada-Oliveros, D. Garcia-Garcia, R. Balart, F. Dominici, D. Puglia, L. Torre, Study Of The Effect Of Mango Kernel Flour Particle Size On The Mechanical And Morphological Properties Of Plasticized Films With Glycerol
- 4) Carlos Javier Pelegrín, Franco Dominici, Francesca Luzi, Luigi Torre, Alfonso Jiménez, Debora Puglia And María Carmen Garrigós, Sustainable Composites Based On Thermoplastic Starch Reinforced With Industrial Horchata Wastes
- 5) Cristian Patiño Vidal, Francesca Luzi, Debora Puglia, Gracia López-Carballo, , Carol López De Dicastillo, María José Galotto , Abel Guarda. Development Of A Sustainable Food Packaging

Material Based In A Novel Polymeric And Biodegradable Multilayer System With Antibacterial Property

6) Jaume Sempere-Torregrosa, M^a Dolores Samper, José Miguel Ferri, Franco Dominici, Debora Puglia, Luigi Torre. Development Of Biodegradable Films Based On Polylactic Acid Incorporating Nanoparticles From Residues Of Herbal Infusions

7) F.R. Beltrán, F. Dominici, A. Agüero, M.P. Arrieta, D. Lascano, R. Balart, D. Puglia. Effect Of Maleinized Linseed Oil On The Structure And Properties Of Mechanically Recycled Poly(Lactic Acid) Bowls

8) Franco Dominici, Catia Clementi, Francesca Luzi, Luigi Torre, Loredana Latterini, Debora Puglia. Effect Of Metal Organic Frameworks (Mofs) As Stabilizers Of Natural Pigments In Bioplastic Composites

9) M^a Dolores Samper, Daniel Latorre-Guitierrez, Antonio Abel Lozano-Pérez, Franco Dominici, Debora Puglia And Luigi Torre. Effect Of Sericin And Maleinized Linseed Oil On Polylactic Acid Films Properties

10) Francesca Luzi, Franco Dominici, Luigi Torre, Marco Monti, Marta Zaccone, Federica Spina, Andrea Zanellati, Giovanna Cristina Varese, Debora Puglia. Mechanical Performance Of Polybutylene Succinate Composites Loaded With Mycelia Grown On Different Media

11) J. Gomez-Caturla, J. Ivorra-Martinez, D. Garcia-Garcia, R. Balart, F. Dominici, D. Puglia, L. Torre, Mechanical Properties And Morphology Of Composites Based On Polylactide And Mango Kernel Flour

12) Franco Dominici, Francesca Luzi, Paolo Benincasa, Luigi Torre, Debora Puglia. Polymeric Films Produced By Plasticizing Non-Edible Durum Wheat Flours: Processing And Variety-Property Relationship

13) A.C. Mellinas, F. Luzi, A. Jiménez, D. Puglia, M.C. Garrigós. Synthesis Of Lignin Nanocapsules For Active Food Packaging Applications

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PATENTS

WO2019211790 (A1) - PROCESS FOR OBTAINING PLASTIC MATERIAL FROM FLOURS AND SIMILAR PRODUCTS , Inventor(s): BENINCASA PAOLO [IT]; CUCCHIA MARIO [IT]; PUGLIA DEBORA [IT]; DOMINICI FRANCO [IT]; TORRE LUIGI [IT], Applicant(s): MOLINI SPIGADORO S P A [IT] +

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