

# European Curriculum Vitae Format



## Personal information

First name(s) / Surname(s) **ALICE MELOCCHI**  
Address(es) **DALMINE, BERGAMO, ITALY**  
Nationality Italian  
Date of birth 23 October 1986  
Gender Female

## Working experience

Dates Since August 1, 2016  
Title of qualification awarded Post-doctoral fellow  
Principal subjects/occupational skills covered Extrusion and molding processes for the manufacturing of pharmaceutical dosage forms  
Advisor: Dr. Lucia Zema  
Name and type of organisation providing education and training Pharmaceutical Technology & Regulatory Affairs "M. E. Sangalli" Unit, Department of Pharmaceutical Sciences, School of Pharmacy, University of Milan (Italy)

Dates Since June 1, 2015  
Title of qualification awarded Post-doctoral fellow  
Principal subjects/occupational skills covered Development of drug delivery systems in the form of capsular devices manufactured by injection molding, also exploiting 3D printing by fused deposition modeling as a rapid prototyping tool  
Advisor: Prof. Andrea Gazzaniga  
Name and type of organisation providing education and training Pharmaceutical Technology & Regulatory Affairs "M. E. Sangalli" Unit, Department of Pharmaceutical Sciences, School of Pharmacy, University of Milan (Italy)

Dates December 15, 2014 - May 31, 2015  
Title of qualification awarded Post-doctoral fellow for the Interuniversity Consortium "Tefarco Innova"  
Principal subjects/occupational skills covered Project title: "Preparation of dosage forms by injection molding"  
Advisor: Prof. Andrea Gazzaniga  
Name and type of organisation providing education and training Pharmaceutical Technology & Regulatory Affairs "M. E. Sangalli" Unit, Department of Pharmaceutical Sciences, School of Pharmacy, University of Milan (Italy)

Dates Since April, 2016  
Title of qualification awarded CTO (Chief Technology Officer) and then CSO (Chief Scientific Officer) of Multiply Labs Inc. (also known as PharmaCube Inc., <https://multiplylabs.com/>)  
Principal subjects/occupational skills covered Startup focused on the manufacturing of personalized supplements in the form of capsular devices by means of 3D printing by fused deposition modeling

## Attendance to

Summer 2016 batch of Y Combinator with Multiply Labs Inc., (also known as PharmaCube Inc.)

## Education and training

Dates	November 2011 - January 2015
Title of qualification awarded	Ph.D.
Principal subjects/occupational skills covered	Project title: "Injection Molding/Micromolding applications to drug delivery" Advisor: Lucia Zema, Ph.D.
Name and type of organisation providing education and training	Pharmaceutical Technology & Regulatory Affairs "M. E. Sangalli" Unit, Department of Pharmaceutical Sciences, School of Pharmacy, University of Milan (Italy)
Dates	October 1, 2013 - June 30, 2014
Title of qualification awarded	Ph.D. Visiting Student
Principal subjects/occupational skills covered	Formulation/Production of immediate release tablets (core) and their coating by means of injection molding technique
Name and type of organisation providing education and training	Novartis-MIT Center for continuous manufacturing, Department of Chemical Engineering, Massachusetts Institute of Technology (Cambridge, US-MA) Advisor: Prof. Bernhardt L. Trout
Dates	January 1, 2012 - December 31, 2012
Title of qualification awarded	Research activity for the Interuniversity Consortium "Tefarco Innova"
Principal subjects/occupational skills covered	Development of capsules to be used in dry powder inhalers by means of injection molding technique
Name and type of organisation providing education and training	Pharmaceutical Technology & Regulatory Affairs "M. E. Sangalli" Unit, Department of Pharmaceutical Sciences, School of Pharmacy, University of Milan (Italy)
Dates	December 2011
Title of qualification awarded	Pharmacy practice qualification
Name and type of organisation providing education and training	University of Milan (Italy)
Dates	July 2011
Title of qualification awarded	Pharm. D. in Pharmacy (110/110 <i>cum laude</i> )
Principal subjects/occupational skills covered	Graduation with an experimental thesis entitled: "Functional container with pH dependent solubility manufactured by injection molding" Advisor: Prof. Andrea Gazzaniga
Name and type of organisation providing education and training	Pharmaceutical Technology & Regulatory Affairs "M. E. Sangalli" Unit, Department of Pharmaceutical Sciences, School of Pharmacy, University of Milan (Italy)
Dates	November 2009 - February 2010
Title of qualification awarded	Professional training period
Name and type of organisation providing education and training	Public Pharmacy at A. O. Ospedali Riuniti di Bergamo, Bergamo (Italy)
Dates	August - November 2009
Title of qualification awarded	Professional training period
Name and type of organisation providing education and training	Hospital Pharmacy at A.O. Ospedali Riuniti di Bergamo, Bergamo (Italy)
Dates	July 2005
Title of qualification awarded	High school diploma (98/100)
Name and type of organisation providing education and training	Liceo Classico Paolo Sarpi, Bergamo (Italy)
Dates	November 2000
Title of qualification awarded	Conservatory diplomas in: music theory and solfeggio / complementary piano for strings (violin)

Name and type of organisation providing education and training	Music academy Gaetano Donizetti, Bergamo (Italy)
<b>Other courses</b>	
Dates	March 3-6, 2019
Title of qualification awarded	IFPAC® 2019, North Bethesda, US-MD
Name and type of organisation providing education and training	IFPAC® Scientific committee of the meeting
Dates	October 18-20, 2018
Title of qualification awarded	IT-CRS Workshop on Advances in Drug Delivery and Biomaterials: facts and vision, Padova
Name and type of organisation providing education and training	IT-CRS (Controlled Release Society Italian Chapter)
Dates	September 28, 2018
Title of qualification awarded	1 <sup>st</sup> conference SCI (Società Chimica Italiana) - Divisione di Tecnologia Farmaceutica, Como
Name and type of organisation providing education and training	SCI (Società Chimica Italiana) - Divisione di Tecnologia Farmaceutica
Dates	September 25-27, 2018
Title of qualification awarded	Ph. D. School for doctorate in pharmaceutical technology "Innovation in local drug delivery", Como
Name and type of organisation providing education and training	SCI (Società Chimica Italiana) - Divisione di Tecnologia Farmaceutica e ADRITELF (Association of Italian pharmaceutical scientists from academia)
Dates	July 22-24, 2018
Title of qualification awarded	45 <sup>th</sup> CRS Annual Meeting, New York
Name and type of organisation providing education and training	CRS (Controlled Release Society)
Dates	June 6 - 8, 2018
Title of qualification awarded	58 <sup>th</sup> AFI Meeting, Rimini
Name and type of organisation providing education and training	AFI (Association of Italian pharmaceutical scientists)
Dates	March 19-22, 2018
Title of qualification awarded	11 <sup>th</sup> World Meeting on Pharmaceutics, Biopharmaceutics and Pharmaceutical Technology, Granada
Name and type of organisation providing education and training	apGI (International Society of Drug delivery science and Technology), APV (The International Association for Pharmaceutical Technology) and ADRITELF (Association of Italian pharmaceutical scientists from academia)
Dates	October 26 - 28, 2017
Title of qualification awarded	IT-CRS Workshop on Macromolecules in drug delivery, Fisciano
Name and type of organisation providing education and training	IT-CRS (Controlled Release Society Italian Chapter)
Dates	June 7 - 9, 2017
Title of qualification awarded	57 <sup>th</sup> AFI Meeting, Rimini
Name and type of organisation providing education and training	AFI (Association of Italian pharmaceutical scientists)

Dates	May 30 - 31, 2017
Title of qualification awarded	APV workshop 2D and 3D Printing a new Trend in Pharmaceutical Manufacturing: Hype or Future? Berlin
Name and type of organisation providing education and training	APV (The International Association for Pharmaceutical Technology)
Dates	April 2 - 5, 2017
Title of qualification awarded	2 <sup>nd</sup> European conference on pharmaceuticals: drug delivery, Krakow
Name and type of organisation providing education and training	apGI (International Society of Drug delivery science and Technology), APV (The International Association for Pharmaceutical Technology) and ADRITELF (Association of Italian pharmaceutical scientists from academia)
Dates	November 29 - 30, 2016
Title of qualification awarded	MITO - Milano-Torino 2016, A journey through liposomes and polysaccharides
Name and type of organisation providing education and training	AFI (Association of Italian pharmaceutical scientists), ADRITELF (Association of Italian pharmaceutical scientists from academia)
Dates	November 3 - 4, 2016
Title of qualification awarded	IT-CRS Workshop on Pharmaceutical Innovations: academia meets industry, Milano
Name and type of organisation providing education and training	IT-CRS (Controlled Release Society Italian Chapter)
Dates	July 16 - 19, 2016
Title of qualification awarded	43 <sup>rd</sup> CRS Annual meeting, Seattle
Name and type of organisation providing education and training	CRS (Controlled Release Society)
Dates	May 5 - 7, 2016
Title of qualification awarded	10 <sup>th</sup> A.It.U.N Meeting, Parma
Name and type of organisation providing education and training	A.It.U.N.(AAPS Italian University Network) Meeting
Dates	April 4 - 7, 2016
Title of qualification awarded	10 <sup>th</sup> World meeting on Pharmaceutics, Biopharmaceutics and Pharmaceutical Technology, Glasgow
Name and type of organisation providing education and training	apGI (International Society of Drug delivery science and Technology), APV (The International Association for Pharmaceutical Technology) and ADRITELF (Association of Italian pharmaceutical scientists from academia)
Dates	July 26 - 29, 2015
Title of qualification awarded	42 <sup>nd</sup> CRS Annual meeting, Edinburgh
Name and type of organisation providing education and training	CRS (Controlled Release Society)
Dates	June 10 - 12, 2015
Title of qualification awarded	55 <sup>th</sup> AFI Meeting, Rimini
Name and type of organisation providing education and training	AFI (Association of Italian pharmaceutical scientists)
Dates	May 25 - 27, 2015
Title of qualification awarded	9 <sup>th</sup> A.It.U.N Meeting, Milan
Name and type of organisation providing education and training	A.It.U.N.(AAPS Italian University Network) Meeting

Dates	May 20 - 22, 2015
Title of qualification awarded	4 <sup>th</sup> International Symposium "Frontiers in Polymer Science", Riva del Garda
Name and type of organisation providing education and training	Elsevier
Dates	April 12 - 14, 2015
Title of qualification awarded	1 <sup>st</sup> European conference on pharmaceutics: drug delivery, Reims
Name and type of organisation providing education and training	apGI (International Society of Drug delivery science and Technology), APV (The International Association for Pharmaceutical Technology) and ADRITELF (Association of Italian pharmaceutical scientists from academia)
Dates	November 6 - 8, 2014
Title of qualification awarded	IT-CRS Workshop on Nanomedicine: pharmacokinetic challenges, targeting strategies and clinical outcomes, Firenze
Name and type of organisation providing education and training	IT-CRS (Controlled Release Society Italian Chapter)
Dates	March 31 - April 3, 2014
Title of qualification awarded	9 <sup>th</sup> World meeting on Pharmaceutics, Biopharmaceutics and Pharmaceutical technology, Lisbon,
Name and type of organisation providing education and training	apGI (International Society of Drug delivery science and Technology), APV (The International Association for Pharmaceutical Technology) and ADRITELF (Association of Italian pharmaceutical scientists from academia)
Dates	June 12 - 14, 2013
Title of qualification awarded	53 <sup>rd</sup> AFI Meeting, Rimini
Name and type of organisation providing education and training	AFI (Association of Italian pharmaceutical scientists)
Dates	September 13 - 16, 2012
Title of qualification awarded	22 <sup>nd</sup> ADRITELF Meeting, Firenze
Name and type of organisation providing education and training	ADRITELF (Association of Italian pharmaceutical scientists from academia)
Dates	September 13, 2012
Title of qualification awarded	Workshop: GLP/GMP applications, Firenze
Name and type of organisation providing education and training	ADRITELF (Association of Italian pharmaceutical scientists from academia)
Dates	September 10 - 12, 2012
Title of qualification awarded	Biothechnological drugs – XII Scuola Nazionale Dottorale per la formazione Avanzata in Discipline Tecnologico-Farmaceutiche, Firenze
Name and type of organisation providing education and training	Ph.D. School in Industrial Pharmacy
Dates	June 4 - 5, 2012
Title of qualification awarded	Workshop on Regulatory and economic aspects of biotechnological drugs, speakers: A.. Corsini (University of Milan), P. Minghetti (University of Milan), G. Tabusso (consultant), G. Torri (Ronzoni Institute of Chemical and Biochemical Research, Milan) and A. Wertheimer (School of Pharmacy, Temple University)
Name and type of organisation providing education and training	Ph.D. School, Department of Pharmaceutical Sciences, University of Milan
Dates	May 30-31 and June 1, 2012

Title of qualification awarded	52 <sup>nd</sup> AFI Meeting, Rimini
Name and type of organisation providing education and training	AFI (Association of Italian pharmaceutical scientists)
Dates	March 8 - 9, 2012
Title of qualification awarded	6 <sup>th</sup> A.It.U.N. Meeting, Take a breath and inhale the medicine, Parma
Name and type of organisation providing education and training	A.It.U.N.(AAPS Italian University Network) Meeting
Dates	January 9, 2012
Title of qualification awarded	L'industria farmaceutica in Italia: valore per la sanità, l'economia e l'occupazione
Name and type of organisation providing education training	Department of Pharmaceutical Sciences, University of Milan
Dates	November 8 - 12, 2011
Title of qualification awarded	3 <sup>rd</sup> International Congress on Biohydrogels, Firenze
Name and type of organisation providing education and training	Interuniversity research centre for advanced medical systems
Dates	September 22, 2011
Title of qualification awarded	1 <sup>st</sup> Harke Pharma Workshop
Name and type of organisation providing education and training	Harke Pharma
Dates	March 30, 2011
Title of qualification awarded	Training on QPAT-ORBIT database
Name and type of organisation providing education and training	Department of Pharmaceutical Sciences, University of Milan
Dates	February 17, 2011
Title of qualification awarded	Pelletisation: an old/new emerging technology?
Name and type of organisation providing education and training	Department of Pharmaceutical Sciences, University of Milan
Dates	November 2, 2010
Title of qualification awarded	Advanced Drug Delivery Systems
Name and type of organisation providing education and training	Department of Pharmaceutical Sciences, University of Milan
Dates	July 14, 2010
Title of qualification awarded	Hot Melt Extrusion: from basics to recent applications
Name and type of organisation providing education and training	Department of Pharmaceutical Sciences, University of Milan

### **Awards**

Type of qualification awarded	A. Melocchi, One of the 10 female founders to keep an eye on in 2019 ( <a href="http://shetechitaly.org/2019/03/08/10-female-founders-2019/">http://shetechitaly.org/2019/03/08/10-female-founders-2019/</a> )
Name and type of organisation providing the award	Sheech Italy ( <a href="http://shetechitaly.org/">http://shetechitaly.org/</a> )
Type of qualification awarded	A. Melocchi, One of the 50 most inspiring women in technology in Italy ( <a href="https://italy.inspiringfifty.org/alice-melocchi">https://italy.inspiringfifty.org/alice-melocchi</a> ).

Name and type of organisation providing the award	Judges selected from Inspiring 50 Italy ( <a href="https://italy.inspiringfifty.org/judges">https://italy.inspiringfifty.org/judges</a> )
Type of qualification awarded	A. Melocchi, Travel Grant to take part at the 44 <sup>th</sup> CRS Annual meeting, New York, 20-22 July 2018;
Name and type of organisation providing the award	Controlled Release Society Italian Chapter
Type of qualification awarded	Best poster, IT-CRS Workshop on Macromolecules in drug delivery, Fisciano, October 26 - 28, 2017 A. Melocchi, F. Parietti, A. Maroni, L. Zema, A. Gazzaniga, Single- and multi-compartment capsules for delivery of nutraceuticals
Name and type of organisation providing the award	Scientific committee of the meeting
Type of qualification awarded	Graduate research advances in delivery science award, 2016 CRS Annual meeting, Seattle, July 16 - 19, 2016
Name and type of organisation providing the award	Scientific committee of the meeting
Type of qualification awarded	Best paper published in 2015 on J. Drug Deliv. Sci. Technol., A. Melocchi, F. Parietti, G. Loreti, A. Maroni, A. Gazzaniga, L. Zema, 3D Printing by fused deposition modeling (FDM) of a swellable/erodible capsular device for oral pulsatile release of drugs, J. Drug Deliv. Sci. Technol., 30 Part B: 360-367, 2015
Name and type of organisation providing the award	Editorial board of the Journal
Type of qualification awarded	Best poster, IT-CRS Workshop on Nanomedicine: pharmacokinetic challenges, targeting strategies and clinical outcomes, Firenze, November 6 -8, 2014 A. Melocchi, F. Parietti, G. Loreti, A. Maroni, L. Zema, A. Gazzaniga, 3D-printing: application potential for the manufacturing of drug delivery systems in the form of capsular devices
Name and type of organisation providing the award	Scientific committee of the meeting
Type of qualification awarded	Best poster in Industrial Pharmacy award, 52 <sup>nd</sup> AFI Meeting, Rimini, May 30 - 31 and June 1, 2012 G. Loreti, A. Melocchi, E. Macchi, A. Maroni, A. Gazzaniga, L. Zema, Contenitori capsulari gastroresistenti realizzati mediante injection molding
Name and type of organisation providing the award	Scientific committee of the meeting
Type of qualification awarded	"Aldo La Manna" Graduate student award 2012
Name and type of organisation providing the award	ADRITELF (Association of Italian pharmaceutical scientists from academia)

## Patents

F. Parietti, A. Melocchi, L. Zema, A. Gazzaniga, Multi-compartment capsule, US 2018/0015044 A1, non-provisional patent, status: pending.

F. Parietti, K. C. Chan, Z. Bright, J. A. Curhan, A. Melocchi, Dispensing system, US 9,845,167 B1, non-provisional patent, status: approved.

## Publications

A. Melocchi, N. Inverardi, M. Uboldi, F. Baldi, A. Maroni, S. Pandini, F. Briatico-Vangosa, L. Zema, A. Gazzaniga, Retentive device for intravesical drug delivery based on water-induced shape memory response of poly(vinyl alcohol): design concept and 4D printing feasibility, Int. J. Pharm., 559: 299 - 311, 2019.

M. Cerea, A. Maroni, L. Palugan, M. Bellini, A. Foppoli, A. Melocchi, L. Zema, A. Gazzaniga, Novel hydrophilic matrix system with non-uniform drug distribution for zero-order release kinetics, *J. Control. Release*, 287: 247 - 256, 2018.

F. Casati, F. Briatico-Vangosa, F. Baldi, A. Melocchi, A. Maroni, A. Gazzaniga, L. Zema, Assessment of hot-processability and performance of ethylcellulose-based materials for injection-molded prolonged-release systems: an investigational approach, *Int. J. Pharm.*, 548: 400 - 407, 2018.

A. Melocchi, F. Parietti, S. Maccagnan, M. A. Ortenzi, A. Antenucci, F. Briatico-Vangosa, A. Maroni, A. Gazzaniga, L. Zema, Industrial development of a 3D printed nutraceutical delivery platform in the form of a multicompartiment HPC capsule, *AAPS PharmSciTech.*, 19: 3343 - 3354, 2018.

A. Maroni, A. Melocchi, F. Parietti, A. Foppoli, L. Zema, A. Gazzaniga, 3D printed multi compartment capsular devices for two-pulse oral drug delivery, *J. Control. Release*, 268: 10 - 18, 2017.

L. Zema, A. Melocchi, A. Maroni, A. Gazzaniga, 3D printing of medicinal products and the challenge of personalized medicine therapy, *J. Pharm. Sci.*, 106: 1697 - 1705, 2017.

F. Baldi, J. Ragnoli, D. Zinesi, F. Bignotti, F. Briatico-Vangosa, F. Casati, G. Loreti, A. Melocchi, L. Zema, Rheological characterization of ethylcellulose-based melts for pharmaceutical applications, *AAPS Pharm. Sci. Tech.*, 18: 855 - 866, 2017.

A. Melocchi, F. Parietti, A. Maroni, A. Foppoli, A. Gazzaniga, L. Zema, Hot-melt extruded filaments based on pharma-grade polymers for 3D printing by Fused Deposition Modeling, *Int. J. Pharm.*, 509 : 255 - 263, 2016.

A. Maroni, M. D. Del Curto, S. Salmaso, L. Zema, A. Melocchi, P. Caliceti, A. Gazzaniga, In Vitro and In Vivo Evaluation of an Oral Multiple-Unit Formulation for Colonic Delivery of Insulin, *Eur. J. Pharm. Biopharm.*, 108: 76 - 82, 2016.

A. Melocchi, F. Parietti, G. Loreti, A. Maroni, A. Gazzaniga, L. Zema, 3D Printing by fused deposition modeling (FDM) of a swellable/erodible capsular device for oral pulsatile release of drugs, *J. Drug Deliv. Sci. Technol.*, 30 Part B: 360 - 367, 2015.

A. Melocchi, G. Loreti, M.D. Del Curto, A. Maroni, A. Gazzaniga, L. Zema, Evaluation of hot melt extrusion and injection molding for the continuous manufacturing of immediate release tablets, *J. Pharm. Sci.*, 104: 1971 - 1980, 2015.

G. Loreti, A. Maroni, M. D. Del Curto, A. Melocchi, A. Gazzaniga, L. Zema, Evaluation of hot-melt extrusion technique in the preparation of HPC matrices for prolonged release, *Eur. J. Pharm. Sci.*, 52: 77 - 85, 2014.

L. Zema, G. Loreti, A. Melocchi, A. Maroni, L. Palugan, A. Gazzaniga, Gastroresistant capsular device prepared by injection molding, *Int. J. Pharm.*, 440: 264 - 272, 2013.

L. Zema, G. Loreti, A. Melocchi, A. Maroni, A. Gazzaniga, Injection molding and its application to drug delivery, *J. Control. Release*, 159: 324 - 331, 2012.

## Oral communications

A. Melocchi, F. Parietti, High-throughput robotic manufacturing technologies for small-batch production of 3D printed, multi-compartment capsular drug delivery systems, IFPAC® 2019, North Bethesda, March 3 - 6, 2019 (invited speaker)

A. Melocchi, Lecturer for the course "3D printing of dosage forms, drug delivery systems and dietary supplements", Milan, March 12-13, 2018 (invited speaker)

A. Melocchi, Application of fused deposition modeling (FDM) to the manufacturing of drug products, JRS Headquarter, Rosenberg, October 11, 2017 (invited speaker)

A. Melocchi, Evaluation of starch derivatives (Explotab®) for the continuous manufacturing of immediate release tablets by hot melt extrusion and injection molding, JRS Headquarter, Rosenberg, October 11, 2017 (invited speaker)

A. Melocchi, L. Zema, A. Gazzaniga, Sviluppo di contenitori capsulari per la somministrazione di farmaci e/o integratori alimentari realizzati mediante fused deposition modeling (FDM), 57<sup>th</sup> AFI Meeting, Rimini, June 7 - 10, 2017 (invited speaker)

A. Melocchi, L. Zema, A. Gazzaniga, Application of fused deposition modeling (FDM) to the manufacturing of drug products, APV workshop 2D and 3D Printing a new Trend in Pharmaceutical Manufacturing: Hype or Future? Berlin May 30 - 31, 2017 (invited speaker)



A. Melocchi, L. Zema, Application of injection molding and 3D printing by fused deposition modeling to the manufacturing of drug products, IT-CRS Workshop on pharmaceutical innovations: academia meets industry, Milano, November 3 - 4, 2016, (invited speaker)

A. Melocchi, F. Parietti, A. Maroni, F. Casati, S. Moutaharrik, A. Gazzaniga, L. Zema, Development of injection-molded capsular devices for pulsatile and colonic delivery through the application of fused deposition modeling (FDM) 3D printing, 43<sup>rd</sup> CRS Annual meeting, Seattle, July 16 - 19, 2016 (selected speaker)

A. Melocchi, L. Zema, A. Gazzaniga, Pharmaceutical application of 3D printing by fused deposition modeling, 10<sup>th</sup> A.It.U.N. Meeting, Parma, May 5-6, 2016 (invited speaker)

A. Melocchi, F. Parietti, A. Maroni, A. Gazzaniga, L. Zema, Hot-melt extruded filaments based on pharma-grade polymers for 3D printing by fused deposition modeling, 10<sup>th</sup> World meeting on Pharmaceutics, Biopharmaceutics and Pharmaceutical Technology, Glasgow, April 4 - 7, 2016 (selected speaker)

A. Melocchi, L. Zema, Pharmaceutical polymers for the manufacturing of a capsular delivery platform by injection molding, Evonik Workshop: targeted drug delivery with Eudragit<sup>®</sup>, Milan, October 28-29, 2015 (invited speaker)

A. Melocchi, Oral pulsatile delivery systems based on functional polymeric barriers: from coated units to capsular devices obtained by injection molding and 3D printing, 55<sup>th</sup> AFI Meeting, Rimini, June 10 - 12, 2015 (invited speaker)

A. Melocchi, Evaluation of starch derivatives (Explotab<sup>®</sup>) for the continuous manufacturing of immediate release tablets by hot melt extrusion and injection molding, JRS Customer seminar Italy/Switzerland, Milan, September 10 - 11, 2014 (invited speaker)

A. Melocchi, L. Zema, G. Loreti, A. Maroni, L. Palugan, A. Gazzaniga, Evaluation of injection molding for the manufacturing of immediate release tablets, invited speaker, 9<sup>th</sup> World meeting on Pharmaceutics, Biopharmaceutics and Pharmaceutical Technology, Lisbon, March 31 - April 3, 2014 (selected speaker)

A. Melocchi, L. Zema, A. Gazzaniga, Contenitori capsulari gastroresistenti realizzati mediante injection molding, Biotechnological drugs, XII Scuola Nazionale Dottorale per la formazione Avanzata in Discipline Tecnologico-Farmaceutiche, Firenze, September 10 - 12, 2012 (selected speaker)

## Personal skills and competences

Mother tongue(s) **Italian**

Other language(s) **English**

Reading skills Excellent

Writing skills Good

Verbal skills Good

## Social skills and competences

Ability to work in a team earned by working as a component of research groups at the University of Milan and particularly enhanced during the time spent in the MIT international structure. Communication skills earned during the training period passed both in the public and hospital pharmacy.

## Organisational skills and competences

Ability to supervise the research activities of undergraduate students earned during the two years of Ph.D.

Technical skills and competences	Specialised knowledge of: <ul style="list-style-type: none"> <li>- Coating process of oral solid dosage forms (fluid bed and pan equipment)</li> <li>- Granulation and pelletisation techniques</li> <li>- Hot and wet extrusion processes</li> <li>- Injection molding</li> <li>- 3D printing by fused deposition modeling</li> <li>- Tableting</li> <li>- Technological / Analytical techniques (e.g. HPLC, DSC, TGA, BET, coulter counter, SEM and optical microscope, X-ray, dissolution and disintegrating tests).</li> </ul>
Computer skills and competences	MS Office package and medical databases (e.g. Pubmed, Embase, QPAT-ORBIT)
Artistic skills and competences	Has been playing violin since the age of 6 years old both solo and in orchestra
Other skills and competences	Has been practising different sports alone and in team (swimming, volleyball and climbing).
Driving licence	Car driving licence

Milan,  
April 7, 2019

Alice Melocchi