Europass Curriculum Vitae

Personal information

Surname(s) / First name(s)	**Bettotti Paolo**
Address(es)	Vicolo Baroni 18, 38068, Rovereto, Italia
Telephone(s)	Mobile: +39.329.11.64.614
Email(s)	bettotti@science.unitn.it bnmbit@yahoo.it
Nationality(-ies)	Italian
Date of birth	18/06/1976
Gender	Male

Positions held

Date	01/10/2010 - pres.
Professional position	Laboratory technician at the Nanoscience Laboratory
Main tasks	WP Responsible in FP7-POSITIVE project.
Employer name and address	Department of Physics, University of Trento, via Sommarive 14, 38123 Povo, Trento
Date	01/08/2007 - 31/09/2010
Professional position	Post-doctoral fellowship within "Marie Curie" - COFUND FP7 Program
Main tasks	Researcher leader of the project GOPSI (“Polimeric slot waveguides integrated on silicon for sensing applications”).
Employer name and address	Department of Physics, University of Trento, via Sommarive 14, 38123 Povo, Trento
Date	01/03/2007 - 31/07/2007
Professional position	Post-doctoral fellowship
Main tasks	Modeling of nanophotonic structures for slow light applications.
Employer name and address	Department of Physics, University of Trento, via Sommarive 14, 38123 Povo, Trento
Date	01/03/2005 - 28/02/2007
Professional position	Post-doctoral fellowship
Main tasks	Modeling, fabrication and characterization of 1D and 2D, silicon based, photonic crystals structures
Employer name and address	Department of Physics, University of Trento, via Sommarive 14, 38123 Povo, Trento

Education and Qualifications

Date	21/02/2005
Qualification	PhD in Physics
Name of the Institute	Department of Physics, University of Trento, via Sommarive 14, 38123 Povo, Trento
ISCED equivalence	6
Date	26/03/2001
Qualification	M.Sc. in Material Science (*summa cum laude*)
Name of the Institute	Universitá degli Studi di Padova, via 8 Febbraio 2, 35122, Padova
ISCED equivalence	5A

Mother tongue(s)

Italian

Other languages

Inglese	C1 Proficient user	C1 Proficient user	C1 Proficient user	C1 Proficient user	C1 Proficient user
Francese	A1 Basic user	A1 Basic user	A1 Basic user	A1 Basic user	A1 Basic user

(*) *Common European Framework of Reference (CEF) level*

Social/Organisational skills

About ten years of research activity in an international groups as the Nanoscience Lab gave me an excellent skill of group work. My strong multidisciplinary background allow me to effectively interface with researcher from other research fields (as demonstrated by publications list). But, if necessary I have great autonomy in job organization, and I am able to clearly define objectives and priorities, as demonstrated by the funded projects.

Technical skills

Great knowledge of semiconductor electrochemistry, particularly on porous silicon fabrication. Excellent expertise on scanning probe microscopy (both AFM and SNOM) and related characterization techniques (on soft and hard materials). Excellent knowledge of the most common spectroscopical methods (UV-vis-(FT)IR, (time resolved) photoluminescence, Raman and good knowledge of gaining media spectroscopy). Very good know-how of e-beam lithography and SEM equipments. Well-experienced of CMOS microfabrication facilities. Good knowledge of chemical synthetic methods (both inorganic and organic).

Informatic skills

Deep knowledge of both Linux and Windows systems. Data analysis using commercial software (Origin, Matlab) and home-developed codes. Known programming languages: Fortran 77/90, C, C++, Scheme, Python (base), bash scripting. Metalaguages: LaTEX, XHTML, PHP(base). Great experience on photonic crystals modeling with both PWE and FDTD methods (Lumerical, PhotonD, MEEP and MPB codes) and of waveguiding structures (FDTD and mode solver techniques).

Funded research projects

(**Author and researcher in charge**) CRS2006: "Atto-dispenser of Nanostructures integrated into a scanning probe microscope"

(**Author and researcher in charge**) Marie-Curie COFUND (POSTDOC)2006: “Functionalization of polymeric slot waveguides on silicon substrate for sensing applications”

(**Co-author and Workpackage leader**) FP7-ICT-POSITIVE (No. 257401): “POSITIVE - A highly integrated and sensitive POrous SIlicon based lab on a chip for multiple quantitaTIVE monitoring of Food allergies at point of care”

Participation in research projects

COFIN2000: “One- and two-dimensional photonic crystals: growth, theory and optical properties”

COFIN2002: “Macroporous silicon based photonic crystals: fabrication and characterization”

COFIN2004: “Silicon based photonic crystals for the control of propagation and emission of light”

FIRB2002: “Molecular and hybrid organic-inorganic nanostructures for photonics”

POLYCERNET: “Tailored Multifunctional Polymer-Derived NanoCeramics”

PHOLOGIC: “Nanophotonic Logic Gates”

WADIMOS: “Wavelength Division Multiplexed Photonic Layer on CMOS”

POSITIVE **(workpackage leader)**: “A highly integrated and sensitive PORous SIlicon based lab on a chip for multiple quantitaTIVE monitoring of Food allergies at point of care”

Teaching activities

2003-2004	Teaching Assistant - Physics course (Mechanics) at Engineering Faculty
2010	*"Photovoltaics"* course module at the 2nd level master"Nano-Micro" organized jointly by University of Trento and Fondazione Bruno Kessler
2011	Teaching Assistant - General Chemistry course at Biotechnology Bachelor Degree

Presentation held at Conferences/Workshop:

2001	Silicon workshop, Genova (Italy)
2002	Silicon workshop, Genova (Italy)
2009	(invited talk) NANOSIL Workshop on Convergence of Electronics and Photonics , 1-2 Oct. 2009, Aachen (Germany)
2010	Fotonica2010, 25-27 may 2010, Pisa (Italy)
2010	OSA IPR & PS Conference, 25-27 july 2010, Monterey (USA)
2010	(invited talk) ICOOMAP, 15-20 august, Budapest (Hungary)
2011	(invited talk) CLEO, 22-26 may, Munich (Germany)
2011	(invited talk) 24-26 august, Nanophotonics for Sensing and Nonlinear Optics, Adelaide (Australia)
2011	(invited talk) TICME, 12-14 december, Trento (Italy)

Seminars:

2005	Dept. of Materials Engineering, Univ. of Trento: "Silicon based 2D photonic crystals"
2007	Laboratory of Nanotechnologies and Optical Instrumentation, Univ. of Troyes: "Silicon based photonic crystals: from design to fabrication and impregnation with active media"
2008	Institute of Materials Research, Univ. of Mexico: "SixNy thin films for photonic applications"
2010	Dept. of Physics, Univ. of Trento: "Optical isolation"
2010	Dept. of Physics, Univ. of Trento: "Porous silicon: from fundamentals to applications"

Schools

2001	1st Optoelectronic & Photonic winter school, Trento
2002	3rd International WE Heraeus Summerschool
2003	2nd Optoelectronic & Photonic winter school, Trento "Advances on Molecular and Hybrid Photonics"
2005	3rd Optoelectronic & Photonic winter school, Trento "Optical Interconnects"
2007	4rd Optoelectronic & Photonic winter school, Trento "Biophotonics"

Referee for

Advanced Materials, Advanced Functional Materials, Optics Express, Optics Letters, Materials Chemistry and Physics, Journal of Applied Physics, Applied Optics, Journal of Nanophotonics, Physica Status Solidi, Optical Materials Express, Journal of Materials Research.

Publications

Articles published on refereed journals:

- M. Galli, M. Agio, L. C. Andreani, M. Belotti, G. Guizzetti, F. Marabelli, M. Patrini, P. Bettotti, L. Dal Negro, Z. Gaburro, L. Pavesi, A. Lui, P. Bellutti, "Spectroscopy of photonic bands in two-dimensional macroporous silicon photonic crystals", Phys. Rev. B, 65, 113111-1 (2002).

- P. Bettotti, M. Cazzanelli, L. Dal Negro, B. Danese, Z. Gaburro, C. J. Oton, G. Vijaya Prakash, L. Pavesi, “Silicon nanostructures for photonics”, J. of Phys.: Condens. Matter, 14, 8253 (2002).

- P. Bettotti, L. Dal Negro, Z. Gaburro, L. Pavesi, A. Lui M. Galli, M. Patrini, F. Marabelli, “P-type macroporous silicon for two-dimensional photonic crystals”, J. Appl. Phys., 92, 6966 (2002).

- C. J. Oton, Z. Gaburro, M. Ghulinyan, L. Pancheri, P. Bettotti, L. Dal Negro, L. Pavesi, “Scattering rings in optically anisotropic porous silicon”, Appl. Phys. Lett., 81, 4919 (2002).

- L. Pavesi, Z. Gaburro, L. Dal Negro, P. Bettotti, G. Vijaya Prakash, M. Cazzanelli, C. Oton, “Nanostructured silicon as a photonic material”, Opt. Laser Eng., 39, 345 (2003).

- M. Ghulinyan, C. J. Oton, Z. Gaburro, P. Bettotti, L. Pavesi “Porous silicon free-standing coupled microcavities”, Appl. Phys. Lett., 82, 1550 (2003).

- Z. Gaburro, C. J. Oton, P. Bettotti, L. Dal Negro, G. Vijaya Prakash, M. Cazzanelli, L. Pavesi, “Interferometric method for monitoring electrochemical etching of thin films”, J. Electrochem. Soc., 150, C381 (2003).

- G. D. Soraru, S. Modena, P. Bettotti, G. Das, G. Mariotto, L. Pavesi, “Si nanocrystals obtained through polymer pyrolysis”, Appl. Phys. Lett., 83, 749 (2003).

- C. J. Oton, M. Ghulinyan, Z. Gaburro, P. Bettotti, L. Pavesi, L. Pancheri, S. Gialanella, N. E. Capuj, “Scattering rings as a tool for birefringence measurements in porous silicon”, J. Appl. Phys., 94, 6334 (2003).

- L. Dal Negro, P. Bettotti, M. Cazzanelli, L. Pavesi, D. Pacifici, “Applicability conditions and experimental analysis of the variable stripe length method for gain measurements”, Opt. Comm., 229, 337 (2003).

- Z. Gaburro, P. Bettotti, M. Saiani, L. Pavesi, L. Pancheri, C. J. Oton, N. Capuj, “Role of microstructure in porous silicon gas sensors for NO2”, Appl. Phys. Lett., 85, 555 (2004).

- P. Pellegrino, B. Garrido, Y. Lebour, J. A. Moreno, C. Garcia, J. R. Morante, P. Bettotti, L. Pavesi, M. Prassas “Luminescent properties of Er and Si co-implanted silicates”, Opt. Mater., 27(5), 910 (2005).

- F. Intonti, S. Vignolini, V. Türck, M. Colocci, P. Bettotti, L. Pavesi, S. L. Schweizer, R. Wehrspohn, D. Wiersma “Rewritable photonic circuits”, Appl. Phys.Lett., 89, 211117 (2006).

- G. Das, P. Bettotti, L. Ferraioli, R. Raj, G. Mariotto, L. Pavesi and G. D. Sorarù, “Study of the pyrolysis process of an hybrid CH3SiO1.5 gel into a SiCO glass”, Vibr. Spectrosc., 45, 61(2007).

- A. Ritucci, A. Reale, P. Zuppella, L. Reale, P. Tuccheri, G. Tomassetti, P. Bettotti and L. Pavesi, “Interference lithography by a soft X-ray laser beam: nanopatterning on photoresists”, J. Appl. Phys. 102, 034313 (2007).

- F. Riboli, P. Bettotti and L. Pavesi, “Band gap characterization and slow light effects in one dimensional photonic crystals based on silicon slot-waveguides”, Opt. Express, 15(19), 11769 (2007).

- G. Das, L. Ferraioli, P. Bettotti, F. De Angelis, G. Mariotto, L. Pavesi, E Di Fabrizio, G.D. Sorarù, “Si-nanocrystals/SiO2 thin film obtained by pyrolysis of sol-gel precursor”, Thin Solid Films, 516, 6804 (2008).

- R. Adamo, E. O. Anopchenko, P. Bettotti, M. Cazzanelli, E. D’Amato, N. Daldosso, L. Ferraioli, E. Froner, Z. Gaburro, R. Guider, S. Minhaz, D. Navarro-Urrios, A. Pitanti, S. Prezioso, M. Scarpa, R. Spano, M. Wuang, L. Pavesi, “Low dimensional Silicon Structures for Photonic and Sensor applications”, Appl. Surf. Science, 255, 624(2008).

- T. Toccoli, M. Tonezzer, P. Bettotti, N. Coppede, S. Larcheri, A. Pallaoro, L. Pavesi, S. Iannotta, “Supersonic Molecular Beams Deposition of a-Quaterthiophene: Enhanced Growth Control and Devices Performances”, Org. Electron., 10, 521(2009).

- D. Navarro-Urrios, M. Ghulinyan, P. Bettotti, E. Rigo, C. J. Oton, N. E. Capuj, F. Lahoz, I. R Martin, L. Pavesi, “Polymeric waveguides using oxidized porous silicon cladding for optical amplification”, Opt. Mater., 31, 1488(2009).

- E. Froner, F. Baschera, F. Tessarolo, P. Bettotti, L. Pavesi, B. Rossi, M. Scarpa, G. Mariotto, A. Rigo, “Hybrid nanostructured supports for surface enhanced Raman scattering”, Appl. Surf. Science, 255, 7652(2009).

- B. Srowthi, P. Moses, S. Trolier-McKinstry, T. Mayer, P. Bettotti, L. Pavesi, “Ferroelectric and Ferroelastic Domain Wall Motion in Unconstrained Pb(Zr,Ti)O3 Microtubes and Thin Films”, IEEE Trans. Ultrason. Ferroelectr. Freq. Control, 57, 792(2010).

- S. Mariazzi, P. Bettotti, S. Larcheri, L. Toniutti, R. S. Brusa, “High positronium yield and emission into the vacuum from oxidized tunable nanochannels in silicon”, Phys. Rev. B, 81, 235418 (2010).

- S. Mariazzi, P. Bettotti, R. Brusa, “Positronium Cooling and Emission in Vacuum from Nanochannels at Cryogenic Temperature”, Phys. Rev. Lett., 104, 243401 (2010).

- A. Pitanti, P. Bettotti, D. Sarchi, L. Pavesi, “Purcell factor and superradiance in Si-patterned waveguides”, Opt. Letters, 35, 3384 (2010).

- M. Tonezzer, E. Rigo, S. Gottardi, P. Bettotti, L. Pavesi, S. Iannotta, T. Toccoli, “The role of kinetic energy of impinging molecules in <alpha>-sexithiophene growth”, Thin Solid Films, 519, 4140 (2011)

- P. Bettotti, M. Mancinelli, R. Guider, M. Masi, M. Vanacharla, L. Pavesi, “Robust design of an optical router based on asymmetric side coupled integrated spaced sequence of optical resonators” Optics Lett., 36, 1473 (2011).

- M. Mancinelli, R. Guider, P. Bettotti, M. Masi, M. Vanacharla, L. Pavesi, “Coupled-resonator-induced-transparency concept for wavelength routing applications”, Opt. Express, 19, 12227 (2011)

- M. Mancinelli, R. Guider, M. Masi, P. Bettotti, M. R. Vanacharla, J.-M. Fedeli, L. Pavesi, “Optical characterization of a SCISSOR device”, Opt. Express, 19, 13664 (2011)

- M. Mancinelli, R. Guider, P. Bettotti, M. Masi, M. R. Vanacharla, J-M. Fedeli, D. Van Thourhout, L. Pavesi, “Optical characterization of silicon-on-insulator based single and coupled racetrack resonators”, J. Nanophotonics, 5, 051705 (2011)

- M. Masi, M. Mancinelli, M. R. Vanacharla, A. Battarelli, R. Guider, P. Bettotti, J.-M. Fedeli, L. Pavesi, “A silicon photonic interferometric router device based on SCISSOR concept”, J. Lightwave Technol., 29, 2747 (2011)

- P. Bettotti, A. Pitanti, E. Rigo, F. De Leonardis, V. Passaro, L. Pavesi, “Modeling of slot waveguide sensors realized in polymeric materials”, Sensors, 11, 7327 (2011)

- J. Alvarez, P. Bettotti, I. Suarez, N. Kumar, D. Hill, V. Chirvony, L. Pavesi, J. Martinez-Pastor, “Birefringent Porous Silicon Membranes for Optical Sensing”, Opt. Express, 19, 26106 (2011)

Congress acts subject to referee evaluation:

- P. Bettotti, Z. Gaburro, L. Dal Negro, L. Pavesi, “New progress on p-type macroporous silicon electrodissolution”, Materials and Devices for Optoelectronic and Microphotonics edited by R.B. Wehrspohn, S. Noda, C.Soukoulis, R. Marz, MRS Proc., 722, L6.7.1 (2002).

- L. Dal Negro, M. Cazzanelli, Z. Gaburro, P. Bettotti, L. Pavesi, D. Pacifici, G. Franzò, F. Priolo, F. Iacona, “Optical gain and stimulated emission in silicon nanocrystals”, MRS Proc., 738, G8.8.6 (2003).

- C. J. Oton, Z. Gaburro, M. Ghulinyan, N. Daldosso, L. Pancheri, P. Bettotti, L. Dal Negro, L. Pavesi “Scattering Rings in Birefringent Porous Silicon”, MRS Proc., 762, A17.17.1 (2003).

- D. Navarro-Urrios, M. Ghulinyan, P. Bettotti, N. Capuj, C. J. Oton, F. Lahoz, I. R. Martin, L. Pavesi, “Optical gain in dye-doped polymer waveguides using oxidized porous silicon cladding”, Proc. SPIE, vol. 6593, 659321-1 (2007).

- P. Bettotti, M. Mancinelli, M. Rao, M. Masi, R. Guider, L. Pavesi, and J.-M. Fedeli, “Complex Scissor Device Characterization and All-Optical Tuning of Single Resonant Cavity” in Integrated Photonics Research, Silicon and Nanophotonics, OSA Technical Digest (CD) (Optical Society of America, 2010), paper IMC3. http://www.opticsinfobase.org/abstract.cfm?URI=IPRSN-2010-IMC3

- P. Bettotti, L. Pavesi, “Nanosilicon: a new platform for photonics”, Phys. Stat. Sol.(c), 8, 2880 (2011)

- F. Saharil, K. B. Gylfason, Y. Liu, T. Haraldsson, P. Bettotti, N. Kumar, W. van der Wijngaart, “Dry transfer bonding of porous silicon membranes to oste(+) polymer microfluidic devices” in Proc. IEEE International Workshop on Microelectromechanical Systems (MEMS), 2012. QS 2011

- J. Alvarez, P. Bettotti, N. Kumar, I. Suarez, D. Hill, J. Martinez-Pastor, “Highly-sensitive anisotropic porous silicon based optical sensors”, Proc. SPIE 8212, 821209 (2012), http://dx.doi.org/10.1117/12.908214

Congress acts:

- Pavesi, L., Bettotti, P., Cazzanelli, M., Cella, S., Daldosso, N., Dal Negro, L., Danese, B., Gaburro, Z., Oton, C.J., Pancheri, L., Prakash, G.V., “Silicon nanostructures for photonics”, Semiconductor Conference, 2002. CAS 2002 Proceedings. International Volume 1, 8-12 Oct. 2002 Page(s):103 - 112 vol.1 Digital Object Identifier 10.1109/SMICND.2002.1105812

- L. Dal Negro, M. Cazzanelli, Z. Gaburro, P. Bettotti, L. Pavesi, F. Priolo, G. Franzò, D. Paci-fici, F. Icona, “Stimulated emission in silicon nanocrystals: Gain measurement and rate equa-tion modelling” in Towards the first silicon laser edited by L. Pavesi, S. Gaponenko, L. Dal Negro, NATO Science Series vol. 93 (Kluwer Academic Publishers, Dordrecht 2003) pag. 145.

- Galli, M., Belotti, M., Patrini, M., Marabelli, F., Agio, M., Andreani, L.C., Guizzetti, G., Bettotti, P., Pavesi, L., Lui, A., Pucker, G., “Optical properties and photonic bands of Si-based photonic crystals”, Lasers and Electro-Optics Europe, 2003. CLEO/Europe. 2003 Conference on 22-27 June 2003 Page(s):668 Digital Object Identifier 10.1109/CLEOE.2003.1313726

- Dal Negro, L., Danese, B., Gabarro, Z., Bettotti, P., Pavesi, L., Iacono, F., Fronzo, G., Pacifici, D., Priolo, F., “Enhanced emission cross section and VSL analysis of erbium coupled silicon nanocrystals”, Lasers and Electro-Optics Europe, 2003. CLEO/Europe. 2003 Conference on 22-27 June 2003 Page(s):360 - 360

- Ghulinyan, M., Oton, C.J., Gaburro, Z., Bettotti, P., Negro, L.D., Pavesi, L., Sapienza, R., Wiersma, D.S., “Light transport through porous silicon coupled microcavities”, Lasers and Electro-Optics Europe, 2003. CLEO/Europe. 2003 Conference on 22-27 June 2003 Page(s):660 Digital Object Identifier 10.1109/CLEOE.2003.1313721

- N. Daldosso, P. Bettotti, M. Cazzanelli, Z. Gaburro, M. Ghulinyan, M. Melchiorri, D. Navarro, F. Riboli, F. Sbrana, L. Pavesi, “On the Route Towards a Monolithically Integrated Silicon Photonics”, Proc. of International Conference on Communication, Devices and Intelligent Systems (CODIS 2004), Kolkata, India (2004).

- L. Pavesi, Z. Gaburro, N. Daldosso, F. Sbrana, M. Cazzanelli, M. Ghulinyan, P. Bettotti, D. Navarro, M. Melchiorri, F. Riboli, M. Saiani, “Silicon Photonics Research in Trento: an Integrated Approach” Proceedings of SCI2004 The 8th World Multi-Conference on Systemics, Cybernetics and Informatics July 18-21, 2004 - Orlando, Florida, USA.

- P. Bettotti, M. Cazzanelli, N. Daldosso, L. Ferraioli, Z Gaburro, M. Ghulinyan, D. Navarro, M. Melchiorri, F. Riboli, S. Prezioso, L. Pavesi, “Silicon nanostructures for photonics applications”, Proceedings First International Workshop on Semicondutor Nanocrystals - SEMINANO2005, Editors: B. Podor, Zs. J. Horvath, P. Basa, pg. 267 (2005).

- Anopchenko, E.O., Bettotti, P., Cazzanelli, M., Daldosso, N., Ferraioli, L., Gaburro, Z., Guider, R., Hossain, S.M., Navarro-Urrios, D., Pitanti, A., Prezioso, S., Spano, R., Wang, M., Pavesi, L., “Silicon Photonics at University of Trento”, Semiconductor Conference, 2007. CAS 2007. International Volume 1, Oct. 15 2007-Sept. 17 2007 Page(s):175 - 179 Digital Object Identifier 10.1109/SMICND.2007.4519674

- Pitanti, A., Bettotti, P., Rigo, E., Guider, R., Daldosso, N., Fedeli, J.M., Pavesi, L., “Coupled cavities in one-dimensional photonic crystal based on horizontal slot waveguide structure with Si-nc”, Group IV Photonics, 2008 5th IEEE International Conference on 17-19 Sept. 2008 Page(s): 353 - 355 Digital Object Identifier 10.1109/GROUP4.2008.4638197

- P. Bettotti, L. Pavesi, “Nanosilicon photonics as a platform to widen the scope of silicon photonics”, IEEE Proc. Iformation Photonics Conf. 18-20 May 2011, DOI: 10.1109/ICO-IP.2011.5953747

- F. Bianco, E.Borga, A. Yeremian, B.Dierre, K. Fedus, P. Bettotti, A. Pitanti, R. Pierobon, M. Ghulinyan, G. Pucker, M. Cazzanelli, L. Pavesi, “Second-order susceptibility Chi(2) in Si waveguides”, Group IV Photonics, 8th IEEE International Conference on 14-16 Sept. 2011, DOI: 10.1109/ROUP4.2011.6053704

Books (or Chapters):

- C. J. Oton, L. Dal Negro, P. Bettotti, L. Pancheri, Z. Gaburro, and L. Pavesi, “Photon States in one-dimensional photonic crystals based on porous silicon multilayers” in Radiation-Matter Interaction in Confined Systems, edited by L. C. Andreani, G. Benedek, E. Molinari (published by SIF, Bologna October 2002), Pag. 303-320.

- F. Marabelli, M. Agio, L.C. Andreani, D. Bajoni, M. Belotti, M. Galli, G. Guizzetti, M. Pa-trini, L. Pavesi, P. Bettotti, L. Dal Negro, Z.Gaburro, G. Pucker, A. Lui, P. Bellutti, D. Peyrade, Y. Chen, “Optical properties of one- and two-dimensional photonic crystals based on silicon”, in Radiation-Matter Interaction in Confined Systems, edited by L. C. Andreani, G. Benedek, E. Molinari (published by SIF, Bologna October 2002), Pag. 321.

- L. Pavesi, P. Bettotti, N. Daldosso, Z. Gaburro, M. Ghulinyan, D. Navarro, M. Melchiorri, F. Riboli, M. Saiani, F. Sbrana, “Nanostructured Silicon for Photonics - from materials to devices -”, Trans Tech Publications, Switzerland-Germany-UK-USA, 2005.

- O. Anopchenko, P. Bettotti, M. Cazzanelli, N. Daldosso, L. Ferraioli, Z. Gaburro, R. Guider, D. Navarro-Urrios, A. Pitanti, S. Prezioso, R. Spano and L. Pavesi “Low dimensional silicon to enable silicon photonics”, Highlights on Spectroscopies of Semiconductors and Nanostructures, edited by G. Guizzetti, L. C. Andreani, F. Marabelli, M. Patrini, (published by SIF, Bologna February 2007).

- A. Pitanti, P. Bettotti, M. Ghulinyan, L. Pavesi chapter of the monograph “Nanostructured Semiconductors: from basic research to application” edit by P. Granitzer e K. Rumpf, PanStanford Publishing Pte. Ltd.

- in preparation a chapter of the “Springer Handbook of Nanomaterial”: P. Bettotti “Porous Silicon”

Others contributions:

- O. Anopchenko, P. Bettotti, M. Cazzanelli, N. Daldosso, L. Ferraioli, Z. Gaburro, R. Guider, S. Minhaz, D. Navarro-Urrios, A. Pitanti, S. Prezioso, R. Spano, J. Wang, e L. Pavesi, “Nanocristalli di silicio: potranno permettere una fotonica basata su silicio?"

- L. Pavesi, P. Bettotti, “Nanosilicon photonic”, SPIE Newsroom, DOI: 10.1117/2.1201005.002949

Last update | March 6, 2012

Autorizzo il trattamento dei miei dati personali ai sensi del Decreto Legislativo 30 giugno 2003, n. 196 "Codice in materia di protezione dei dati personali"