

CURRICULUM VITAE

Virginia Barone

Name: Virginia Barone
Date of birth: February 19th, 1968
Place of birth: Genova-Italy
Nationality: Italian
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Educational Background

- 1990 Degree in Biological Science, University of Genova: 110/110 e lode.
Experimental thesis title: "Identification of a cellular model for the study of the Cystic Fibrosis molecular defect"
- 1996 Ph.D. in Human Genetics, . Thesis title: "Identification and characterization of genes involved in Hirschsprung disease"
- 1998 Specialization in Genetics. Thesis title: "Generation and functional analysis of knockout mice carrying a targeted disruption of ryanodine receptor type 1 and type 3 genes"

Professional Experience

From 2008: researcher at the Department of Molecular Medicine and Development, University of Siena (director prof V. Sorrentino)

2005 – 2007: research associate at the Laboratory of Tissue Engineering, Istituto Dermatologico dell'Immacolata, Roma (director prof. L. Korkina)

2003 – 2005: research associate at DIBIT, molecular and cellular neurophysiology Unit, San Raffaele Scientific Institute, Milano (director prof. G. Casari)

1996 – 2002: post-doctoral training at DIBIT, Growth factors and intracellular signaling Unit, San Raffaele Scientific Institute, Milano (director prof. V. Sorrentino)

1991 - 1995: Ph.D. training at the Institute G. Gaslini, Molecular Genetics laboratory, Genova. Subject of the Ph.D. training: identification and characterization of genes involved in Hirschsprung disease (director prof. G. Romeo)

1990 - 1991: research activity at the same laboratory

1988 - 1990: pre-graduate studentship at the Institute G. Gaslini, Molecular Genetics laboratory, Genova (director prof. G. Romeo)

Teaching experience:

2015-2016:

Histology for degrees in Dietetics, Dental Hygiene, Technical perfusion cardiovascular, Techniques of prevention in the workplace, Biomedical laboratory techniques, Orthoptic and Speech therapy.

Histology for degrees in Biotechnology

Histology for degree in Medicine and Dentistry

2014-2015:

Histology for degrees in Dietetics, Dental Hygiene, Technical perfusion cardiovascular, Techniques of prevention in the workplace, Biomedical laboratory techniques, Orthoptic and Speech therapy.

Histology for degrees in Biotechnology

2013-2014:

Histology for degrees in Dietetics, Dental Hygiene, Technical perfusion cardiovascular, Techniques of prevention in the workplace, Biomedical laboratory techniques, Orthoptic and Speech therapy.

Histology for degrees in Biotechnology

2012-2013

Histology for degrees in Dietetics, Dental Hygiene, Technical perfusion cardiovascular, Techniques of prevention in the workplace, Biomedical laboratory techniques, Orthoptic and Speech therapy.

Histology for degree in Medicine and Dentistry

2011-2012

Histology for degrees in Dietetics, Dental Hygiene, Technical perfusion cardiovascular, Techniques of prevention in the workplace, Biomedical laboratory techniques

Histology for degree in Medicine and Dentistry

2010-2011

Histology for Nursing and for Radiographers degrees

Histology for Biotechnology degree

2009-2010

Histology for Nursing and for Radiographers degrees

2008-2009: teaching collaboration at the Histology course of the Medicine Faculty

Courses and Scientific Congresses:

16-19 September 1991: VI Congresso FISME, Parma

20-21 September 1991: "II International Workshop on polycystic kidney disease", Parma

28 March-3 April 1993: "6th course of the European School of Medical Genetics", Sestri Levante, Genova

23-28 May 1993: "Advanced Course on Molecular Genetics", Leiden University

17-19 March 1994: "First International Workshop Franco Soave on Hirschsprung disease and related neurocristopathies", Sestri Levante, Genova

20-26 March 1994: 7th course of the "European School of Medical Genetics", Sestri Levante, Genova

1-5 June 1994: "European Society of Human Genetics, 26th annual meeting", Parigi

19-25 March 1995: 8th course of the "European School of Medical Genetics", Sestri Levante, Genova

15-17 May 1997: XVIth annual meeting of the European Malignant Hyperthermia Group, Nijmegen, The Netherlands

21-26 September 1997: XXVI European Muscle Congress, Schneverdingen, Germany.

22-26 February 1998: Biophysical Society Annual Meeting, Kansas City, U.S.A.

9-11 May 1999: European Cell Biology Organization, Bologna, Italy

2-6 October 1999: 1th FISV, Riva del Garda (TN), Italy

11-16 June 2000: Gordon Research Conference on muscle excitation-contraction coupling. Colby-Sawyer College in New London, NH, USA

2-6 September 2000: ELSO, Geneva, CH

28-31 October 2008: V Meeting Istituto Interuniversitario di Miologia, Certosa di Pontignano, Siena. Italy

3-4 April 2009: ABCD Meeting "Membrane traffic and organelle biogenesis" Bertinoro (Forlì) Italy

27-29 October 2011: VIII Meeting Istituto Interuniversitario di Miologia, Sestri Levante, Genova, Italy

12-14 October 2012: IX Meeting Istituto Interuniversitario di Miologia, Acaya, Lecce, Italy

10-13 October 2013: X Meeting Istituto Interuniversitario di Miologia, Monteriggioni (Siena), Italy

1-4 October 2015: XII meeting Istituto Interuniversitario di Miologia, San Bartolomeo (RE), Italy

Publications:

V. Barone, D. Randazzo, V. Del Re, V. Sorrentino, D. Rossi. Organization of junctional sarcoplasmic reticulum proteins in skeletal muscle fibers. **J Muscle Res Cell Motil** DOI 10.1007/s10974-015-9421-5, 2015

V. Barone, E. Mazzoli, I.Kunic, D. Rossi, S. Tronolone, V. Sorrentino. Yip1B isoform is localized at ER–Golgi intermediate and *cis*-Golgi compartments and is not required for maintenance of the Golgi structure in skeletal muscle. **Histochem Cell Biol** 143:235-243, 2015.

D. Rossi, B. Vezzani, L. Galli, C. Paolini, L. Toniolo, E. Pierantozzi, S. Spinozzi, V. Barone, E. Pegoraro, L. Bello, G. Cenacchi, G. Vattemi, G. Tomelleri, G. Ricci, G. Siciliano, F. Protasi, C. Reggiani, V. Sorrentino. A Mutation in the *CASQ1* Gene Causes a Vacuolar Myopathy with Accumulation of Sarcoplasmic Reticulum Protein Aggregates. **Hum Mut** 35:1163-1170, 2014

L. Leo, L. Gherardini, V. Barone, M. De Fusco, D. Pietrobon, T. Pizzorusso, G. Casari. Increased Susceptibility to Cortical Spreading Depression in the Mouse Model of Familial Hemiplegic Migraine Type 2. **PLoS Genet** 7(6): e1002129.

I. D'Addario, C. Abbruzzese, M. Lo Iacono, M. Teson, O. Golisano*, V. Barone*. Overexpression of YAP1 induces immortalization of normal human keratinocytes by blocking clonal evolution. **Histochem Cell Biol** 134:265-276, 2010

* These authors contributed equally to this work

D. Rossi, V. Barone, E. Giacomello, V. Cusimano, V. Sorrentino. The sarcoplasmic reticulum: an organized patchwork of specialized domains. **Traffic** 9:1044-9, 2008

A. Armani, S. Galli, E. Giacomello, P. Bagnato, V. Barone, D. Rossi, V. Sorrentino. Molecular interactions with obscurin are involved in the localization of muscle-specific small ankyrin1 isoforms to subcompartments of the sarcoplasmic reticulum. **Experimental Cell Research** 312:3546-3558, 2006

K.R. Vanmolkot, E.E. Kors, U. Turk, D. Turkdogan, A. Keyser, L.A. Broos, S.K. Kia, J.J. van den Heuvel, D.F. Black, J. Haan, R.R. Frants, V. Barone, M.D. Ferrari, G. Casari, J.B. Koenderink, A.M. van den Maagdenberg: Two de novo mutations in the Na,K-ATPase gene *ATP1A2* associated with pure familial hemiplegic migraine. **Eur J Hum Genet** 14(5):555-60, 2006

MT Bassi, N Bresolin, A Tonelli, K Nazos, F Crippa, C Baschiroto, C Zucca, A Bersano, D Dolcetta, FM Boneschi, V Barone, G Casari. A novel mutation in the *ATP1A2* gene causes alternating hemiplegia of childhood. **J Med Genet.** 41(8):621-8, 2004

P. Bagnato*, V. Barone*, D. Rossi, V. Sorrentino: Binding of ankyrin-1 isoform to the C-terminus of Obscurin identifies a molecular link between sarcoplasmic reticulum and myofibrils in striated muscle. **J Cell Biol** 160(2):245-253, 2003

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M. Salanova, G. Priori, V. Barone, E. Intravaia, B. Flucher, F. Ciruela, R. A. J. McIlhinney, J. B. Parys, K. Mikoshiba, V. Sorrentino: Homer proteins and InsP3 receptors co-localise in the longitudinal sarcoplasmic reticulum of skeletal muscle fibres. **Cell Calcium** 32(4), 193–200, 2002

V. Sorrentino, V. Barone, D. Rossi: Intracellular Ca^{2+} release channels in evolution. **Curr Opinion in Genet and Development** vol 10(6):662-667, 2000

- G. Raho, V. Barone, D. Rossi, L. Philipson, V. Sorrentino: The gas 5 gene shows four alternative splicing patterns without coding for a protein. **Gene** 256(1-2):13-7, 2000
- M.W. Conklin, V. Barone, V. Sorrentino, R. Coronado: Contribution of ryanodine receptor type 3 to Ca²⁺ sparks in embryonic mouse skeletal muscle. **Biophysical J** 77:1394-1403, 1999
- D. Balschun, D. P. Wolfer, F. Bertocchini, V. Barone, A. Conti, W. Zuschratter, L. Missiaen, H.P. Lipp, U. Frey and V. Sorrentino. Deletion of the ryanodine receptor Type 3 (RyR3) impairs forms of synaptic plasticity and spatial learning. **The EMBO J** 18:5264-5273, 1999
- P. Marcolongo, V. Barone, G. Priori, B. Pirola, S. Giglio, G. Biasucci, E. Zammarchi, G. Parenti, A. Burchell, A. Benedetti, V. Sorrentino: Structure and mutation analysis of the glycogen storage disease type 1b gene. **FEBS Letters**, 436:247-50, 1998
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- V. Barone, O. Massa, E. Intravaia, A. Bracco, A. Di Martino, V. Tegazzin, S. Cozzolino, V. Sorrentino: Mutation screening of the RYR1 gene and identification of two novel mutations in Italian Malignant Hyperthermia families. **J Med Genet** 36:115-118, 1999
- V. Barone, F. Bertocchini, R. Bottinelli, F. Protasi, P. D. Allen, C. Franzini Armstrong, C. Reggiani, V. Sorrentino: Contractile impairment and structural alterations of skeletal muscles from knockout mice lacking type 1 and type 3 ryanodine receptors. **FEBS Letters** 422(2):160-164, 1998
- M. Seri, L. Yin, V. Barone, A. Bolino, J. Celli, R. Bocciardi, B. Pasini, I. Ceccherini, M. Lerone, U. Kristoffersson, L. T. Larsson, J.M. Casasa, M.J. Abramowicz, J. M. Vanderwinden, I. Kravcenkiene, I. Baric, M. Silengo, G. Martucciello, G. Romeo: Frequency of RET mutations in long and short segment Hirschsprung disease. **Human Mutation** 9:243-249, 1997
- F. Bertocchini, A. Conti, V. Barone, C. Ovitt, H. Schoeler, R. Bottinelli, C. Reggiani, V. Sorrentino: Requirement of the Ryanodine receptor type 3 isoform of the Ca²⁺ release channel for efficient contraction in neonatal skeletal muscle. **EMBO J** 16:6956-6963, 1997
- V. Barone, A. Bracco, S. Cozzolino, O. Massa, V. Sorrentino: Il contributo della genetica nella diagnostica della I.M. e delle malattie neuromuscolari. **Minerva Anestesiologica** 63 (9):239-243, 1997
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- I. Ceccherini, R.M.W. Hofstra, L. Yin, R.P. Stulp, V. Barone, T. Stelwagen, R. Bocciardi, H. Nijeveen, A. Bolino, M. Seri, P. Ronchetto, B. Pasini, M. Bozzano, C.H.C.M. Buys, G. Romeo: DNA polymorphisms and conditions for SSCP analysis of the 20 exons of the *RET* proto-oncogene. **Oncogene** 9:3025-3029, 1994
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- L. Yin, V. Barone, M. Seri, A. Bolino, R. Bocciardi, I. Ceccherini, B. Pasini, T. Tocco, M. Lerone, S. Cywes, S. Moore, J.M. Vanderwinden, M. J. Abramowicz, U. Kristoffersson, L.Y. Larsson, B.C.J. Hamel, M. Silengo, G. Martucciello, G. Romeo G: Heterogeneity and low detection rate of *RET* mutations in Hirschsprung disease. **Eur J Hum Genet** 2:272-280, 1994
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- L.J.V. Galietta, V. Barone, M. de Luca, G. Romeo: Characterization of chloride and cation channels in cultured human keratinocytes. **Pfluegers Archiv** 418:18-25, 1991
- L.J.V. Galietta, A. Rasola, V. Barone, D.C. Gruenert, G. Romeo: A forskolin and verapamil sensitive potassium current in human tracheal cells. **Biochem Biophys Res Commun** 179: 1155-1160, 1991
- L.J.V. Galietta, V. Barone, T. Mastrocola, M. de Luca, S. Bondanza, R. Cancedda, G. Romeo: Uso dei cheratinociti umani in coltura come modello per lo studio elettrofisiologico del difetto molecolare della fibrosi cistica. Atti del IV Congresso FISME, Milano 27-29 Settembre, Monduzzi ed. Bologna, 1989

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Firma

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