Personal INFO

Silvia Brunelli

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Sex Female | Date of Birth 30/12/1969 | Nationality Italian

PRESENT APPOINTMENT	Associate Professor in Cell Biology, BIOS10/A
TITLE	PhD in Cellular and Molecular Biology

UNIVERSITY EDUCATION

1988-1992 MSc Biology Cum Laude, University of Milano (IT)
1994-1998 PhD in Cell and Molecular Biology. Open University (UK).

PROFESSIONAL EXPERIENCE

1994-1997 PhD student, San Raffaele Scientific Institute, Milano (IT).
2008-2011 Marie Curie Research fellow, MRC-NIMR, London (UK).
1999-2001 MRC research associate, MRC-NIMR, London (UK).
2001-2005 Postdoctoral fellow, San Raffaele Scientific Institute, Milano (IT).
2005-2015 Researcher, University of Milano Bicocca, Milano (IT)
From 2015 Associate Professor, University of Milano Bicocca, Milano (IT)

SCIENTIFIC SCOPE & RESEARCH FIELD

The results of my activity are documented in 76 peer-reviewed publications (Scopus H-index: 39), 4094 citations.
ERC fields: LS Life Science
LS3_11 Tissue organisation and morphogenesis in animals and plants (including biophysical approaches)
LS3_12 Stem cell biology in development, tissue regeneration and ageing, and fundamental aspects of stem cell-based therapies
LS4_1 Organ physiology and pathophysiology
LS6_1 Innate immunity in animals and plants

I am Faculty member for Cell and Molecular Biology and Human Molecular Genetics teaching at the Medical School at University of Milano-Bicocca
My research explores the molecular mechanisms of muscle regeneration and the intricate interactions between innate immunity and vessel-associated progenitors, with a particular focus on the role of endothelial-mesenchymal transitions (EndMT) in fibrotic diseases. To support this work, I have developed innovative mouse models to study how muscle progenitors and the immune system interact in both physiological and pathological conditions.
In recent years, my research has increasingly focused on the role of innate immunity in heterotopic ossification, particularly in fibrodysplasia ossificans progressiva (FOP). Collaborating with leading centers of excellence, I aim to identify novel therapeutic targets for this rare and challenging condition.
I have authored 78 peer-reviewed articles, achieved an H-index of 39, and secured funding from prestigious organizations such as Fondazione Telethon, Fondazione Cariplo, and the European Community.

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RESEARCH TRAINING AND EXPERIENCE

1994-1997: PhD student (Open University-UK) under Prof Edoardo Boncinelli, DIBIT-HSR, Milano. Identified EMX2's role in cerebral cortex development and schizencephaly.
August 1997-March 2001: EC fellow then MRC research associate (from 1999) under Dr. Robin Lovell-Badge, NIMR, London, UK. Studied HMG-containing transcription Sox3 gene in gastrulation and CNS development.
March 2001-January 2005: Postdoc scientist under Prof. Giulio Cossu, S.C.R.I., DIBIT-HSR, Milan, Italy. Investigated myogenic differentiation of mesoangioblast stem cells and molecular mechanisms of myogenesis, including a new Wnt non-canonical pathway. Identified novel gene necdin's role in mesoangioblast fate choice and skeletal muscle regeneration, funded by Telethon.
February 2005: Appointed Assistant Professor, University of Milano-Bicocca, Milano. Conducted independent research on molecular biology of development, stem cells, and muscle regeneration. Explored nitric oxide and mitochondria dynamics in myogenic differentiation. Established collaborations on Cripto's role in muscle regeneration and immune-muscle repair interactions.
Since 2014: Studying cellular mechanisms of heterotopic ossification (HO) with Dr. Renata Bocciardi, University of Genoa. Validated cell-based assays for screening FDA-approved drugs targeting ACVR1 gene. Investigating vessel-associated progenitors and immune system crosstalk in Fibrodysplasia Ossificans Progressiva models.
2018: Founded and lead HEVA Research lab, Department of Medicine and Surgery, University of Milan Bicocca, focusing on hematopoietic and vascular cell defects in childhood leukemias, systemic sclerosis, Fibrodysplasia Ossificans Progressiva, and muscular dystrophies.

APPOINTMENTS

-2005-2015 University Researcher, in the Department of Health Science, University of Milano Bicocca.
-2008-2015 Group Leader of the unit of Functional Genetics of Muscle Regeneration, in the Division of Regenerative Medicine, Stem Cells and Gene Therapy, DIBIT, San Raffaele Scientific Institute.
-from April 2015: Associate Professor in Cell Biology, in the Department of Medicine and Surgery, University of Milano Bicocca.
-from 2015: Member of the Istituto Nazionale Biostrutture e Biosistemi-Consorzio Interuniversitario
-from 2018: Director of “Virgilio Program”, a program for training medical students as physician scientists in Milan, funded by Fondazione Cariplo.

AWARDS

1998: Marie Curie Training Network IF fellowship (postgraduate)
1997: Marie Curie Training Network IF fellowship (undergraduate)
2018: Eligibility for Full Professorship in: Cellular Biology (05/F1).
2018: Eligibility for Full Professorship in: General Pathology (06/B1).
2018: Eligibility for Full Professorship in: Biomedical Technology (06/N1).
2014 Fondo Ateneo Quota Competitiva, Università di Milano-Bicocca
2016 Fondo Ateneo Quota Competitiva, Università di Milano Bicocca
2019 Fondo Ateneo Quota Competitiva, Università di Milano-Bicocca,

PRESENT FUNDING

-Marie Skodowska-Curie Actions (MSCA) Innovative Training Networks (ITN) H2020-MSCA-ITN-2019: REcreating the ideal Niche: environmental control Of cell Identity in Regenerating and diseased muscles. RENOIR (grant agreement No 860034) (2020-2025) Coordinator of the network (12 partners) and PI **https://renoir-itn.eu/.**
- Associazione FOP Italia. "Caratterizzazione cellulare e molecolare dei macrofagi polarizzati infiltranti durante l'insorgenza dell'ossificazione eterotopica in un modello murino di Fibrodisplasia Ossificans Progressiva.(2021-2026)" **http://www.fopitalia.it/**
-Italian Ministry of University-Fondo per il Programma Nazionale di Ricerca e Progetti di Rilevante Interesse Nazionale (PRIN)”Environmental control oF Ectopic oSTeOgenesis in Fibrodysplasia

Ossificans Progressiva: from mouse to chip and back-EFESTO (2022TR9N4R) (2023-2025), coordinator of the network, 3 partners, PI) **https://prin.mur.gov.it/Home**
-Fondazione Telethon- *Exploring the Role of SPP1 in Macrophage-Osteogenic Cell Crosstalk and its involvement in Heterotopic Ossification in Fibrodysplasia Ossificans Progressiva* (GMR24T1043) (2025-2027) **https://www.telethon.it/**

PAST FUNDING

• Fondazione Cariplo 2017: The Virgilio Program: a pregraduate track for the training of physician scientists in Italy, 3years. Co-PI.
• Telethon GGP15196, 2015 New treatment strategies for Fibrodysplasia Ossificans Progressiva, 3yr .co-Investigator.
• Fondazione Cariplo Ricerca Medica 2013 Role of cripto in orchestrating tissue remodelling in muscle damage. Coordinator of the project (2 units) and Unit PI
• Italian Ministry of University PRIN 2012 Identificazione di nuove molecole terapeutiche per le malattie muscolari orfane su base infiammatoria. Unit PI
• FP7-Health 2010 Endostem (241440): Activation of vasculature associated stem cells and muscle stem cells for the repair and maintenance of muscle tissue. Workpackage leader (6 units) and Unit PI.
• Association Française contre les Myopathies AFM 2009: The role of iron handling by macrophages in the repair of muscle damage: relevance to muscle disorders. Project Coordinator (3 units) and Unit PI.
• Italian Ministry of University PRIN 2008: Controllo del potenziale rigenerativo del muscolo scheletrico da parte di fattori che influenzino l'attivazione e il reclutamento di cellule staminali. Unit PI.
Italian Ministry of Health -Ricerca Finalizzata 2008: Optimization of pre-clinical models of cell therapy for muscular dystrophy. Unit PI.
• Telethon 2007 GPGGP07013: Role of necdin in the differentiation and regeneration of the skeletal muscle:mechanism of action and application to the cell therapy of muscular dystrophy. PI
• Fondazione Cariplo Ricerca Medica 2007: Ottimizzazione di un protocollo di terapia cellulare per la Distrofia Muscolare di Duchenne. Unit PI.
• Fondazione Cariplo Ricerca Medica 2007: Eterogeneità genetica nella sclerosi neuronale e muscolare, approccio di genomica e proteomica per l'identificazione di nuovi geni per la diagnostica delle malattie del motoneurone. Unit PI.
• Italian Ministry of Health Progetto ex art 56 anno 2006: Malattia del motoneurone: pathway molecolari e cellulari nella degenerazione neuronale e muscolare come causa di eterogeneita' clinica e genetica. Unit PI.

PATENTS

• Bianchi ME, Vénéreau EJ, Casalgrandi M, Brunelli S (2013). HMGB1 Variants and Uses thereof. US Provisional n. 61/676,071; PCT/EP2013/065829
• Cossu G, Clementi E, Brunelli S (2007). Method of treatment for muscular dystrophy. WO2007088050 - 2007-08-09.
• Clementi E, Cossu G, Brunelli S, Ongini E (2007). Use of nitrooxyderivative of drug for the treatment of muscular dystrophies. WO2007088123 - 2007-08-09

EDITORIAL ACTIVITY

Member of the editorial board of "Stem Cells International" and "Frontiers in Immunology". Guest Editor Guest Associate Editor of Frontiers in Cell and Developmental Biology, Topic Editor of the special issue "Fetal/Embryonic Hematopoietic Progenitors and Their Impact on Adult Diseases".

SCIENTIFIC SOCIETIES

Member of the Associazione Italiana Biologia e Genetica Generale e Molecolare (AIBG) and of Associazione Biologia Cellulare e del Differenziamento (ABCD).

OTHERS COMPETENCES

Reviewer for several national and international research grant agencies including: Italian Ministry of Research (MIUR), Agence Nationale de la Research (France), AFM-Telethon (France),

Fund for Scientific Research (FNRSFNRS, Belgium), Royal Netherlands Academy of Arts and Sciences, Cancer Research UK, National Science Centre Poland.
Reviewer for several scientific journal (including Embo Molecular Medicine, Journal of Immunology, Cell Death and Differentiation, Scientific Reports).
Supervisor of >15 PhD students (2 at present) of the DIMET PhD Program of Univeristy of Milano Bicocca.
Examiner of > 20 PhD students from national and international PHD program (France, Hungary)

PUBLICATIONS

1. Rodríguez, C., Timóteo-Ferreira, F., Minchiotti, G., Brunelli, S. & Guardiola, O. Cellular interactions and microenvironment dynamics in skeletal muscle regeneration and disease. *Front. Cell Dev. Biol.* **12**, 1385399 (2024).
2. Quattrini G, Vergani B, Bombelli S, De Marco S, D'Orlando C, Bianchi C, Leone BE, Meneveri R, Biondi A, Cazzaniga G, Rabbitts TH, Brunelli S, Azzoni E. Hematopoietic Stem Cell (HSC)-Independent Progenitors Are Susceptible to Mll-Af9-Induced Leukemic Transformation. Barone C, Orsenigo R, Cazzola A, D'Errico E, Patelli A,.. Cancers (Basel). 2023 Jul 14;15(14):3624. doi: 10.3390/cancers15143624.
3. Cossu G, Tonlorenzi R, Brunelli S, Sampaolesi M, Messina G, Azzoni E, Benedetti S, Biressi S, Bonfanti C, Bragg L, Camps J, Cappellari O, Cassano M, Ciceri F, Coletta M, Covarello D, Crippa S, Cusella-De Angelis MG, De Angelis L, Dellavalle A, Diaz-Manera J, Galli D, Galli F, Gargioli C, Gerli MFM, Giacomazzi G, Galvez BG, Hoshiya H, Guttinger M, Innocenzi A, Minasi MG, Perani L, Previtali SC, Quattrocelli M, Ragazzi M, Roostalu U, Rossi G, Scardigli R, Sirabella D, Tedesco FS, Torrente Y, Ugarte G. Mesoangioblasts at 20: from the embryonic aorta to the patient bed. Front Genet. 2023 Jan 4;13:1056114. doi: 10.3389/fgene.2022.1056114. eCollection 2022.
4. Barone, C., Orsenigo, R., Meneveri, R., Brunelli, S., Azzoni, E. One Size Does Not Fit All: Heterogeneity in Developmental Hematopoiesis ***Cells***, 2022, 11(6), 1061
5. Gamberale R, D'Orlando C, Brunelli S, Meneveri R, Mazzola P, Foti G, Bellani G, Zatti G, Munegato D, Volpato S, Zurlo A, Caruso G, Andreano A, Valsecchi MG, Bellelli G. Study protocol: understanding the pathophysiologic mechanisms underlying delirium in older people undergoing hip fracture surgery. BMC Geriatr. (2021) Nov 4;21(1):633. doi: 10.1186/s12877-021-02584
6. Azzoni, E., Boiers, C., Brunelli, S., and Ronchi, A. (2021) Editorial: Fetal/Embryonic Hematopoietic Progenitors and Their Impact on Adult Diseases, Front. Cell Dev. Biol. doi: 10.3389/fcell.2021.732649
7. Careccia G, Saclier M, Tirone M, Ruggieri E, Principi E, Raffaghello L, Torchio S, Recchia D, Canepari M, Gorzanelli A, Ferrara M, Castellani P, Rubartelli A, Rovere-Querini P, Casalgrandi M, Preti A, Lorenzetti I, Bruno C, Bottinelli R, Brunelli S, Previtali SC, Bianchi ME, Messina G, Vénéreau E. (2021) Rebalancing expression of HMGB1 redox isoforms to counteract muscular dystrophy. Sci Transl Med. Jun 2;13(596):eaay8416.doi:10.1126/scitranslmed.aay8416. PMID: 34078746.
8. Cazzola, A., Cazzaniga, G., Biondi, A., Meneveri, R., Brunelli, S., and Azzoni, E. (2021) Prenatal Origin of Pediatric Leukemia: Lessons From Hematopoietic Development. *Frontiers Cell Dev Biology* **8**, 618164
9. Iavarone F, Guardiola O, Scagliola A, Andolfi G, Esposito F, Serrano AL, Perdiguero E, **Brunelli S,** Munoz-Canoves P, and Minchiotti G. (2020) Cripto shapes macrophage plasticity and restricts EndMT in injured and diseased skeletal muscle. EMBO Reports. doi: 10.15252/embr.201949075
10. Tirone, M., Giovenzana, A., Vallone, A., Zordan, P., Sormani, M., Nicolosi, P. A., et al. (2019). Severe Heterotopic Ossification in the Skeletal Muscle and Endothelial Cells Recruitment to Chondrogenesis Are Enhanced by Monocyte/Macrophage Depletion. Frontiers in Immunology, 10, 2845–15. http://doi.org/10.3389/fimmu.2019.01640
11. Nicolosi, P. A., Tombetti, E., Giovenzana, A., Donè, E., Pulcinelli, E., Meneveri, R., et al. (2019). Macrophages Guard Endothelial Lineage by Hindering Endothelial-to-Mesenchymal Transition: Implications for the Pathogenesis of Systemic Sclerosis. *The Journal of Immunology*, ji1800883. http://doi.org/10.4049/jimmunol.1800883.
12. Tirone, M., Tran, N.L., Ceriotti, C., Gorzanelli, A., Caneparo, M., Bottinelli, R., Raucci, A., Di Maggio, S., Santiago, C., Mellado, M., Saclier, M., François, S., Careccia, G., He, M., De Marchis, F., Conti, V., Ben Larbi, S., Cuvellier, S., Casalgrandi, M., Preti, A., Chazaud, B., Yousef Al-Abed, Y., Messina, G., Sitia, G., Brunelli, S., Bianchi, M.E. and Vénéreau E. (2017) High Mobility Group Box 1 orchestrates tissue regeneration via CXCR4. J Exp Med. 2017 Dec 4. pii: jem.20160217. doi: 10.1084/jem.20160217.
13. Guardiola, O., Andolfi, G., Tirone, M., Brunelli, S., Minchiotti, G. Induction of Acute Skeletal Muscle Regeneration by Cardiotoxin Injection. *J. Vis. Exp.* (2017), e54515, doi:10.3791/54515 (2016).
14. Tirone M, Conti V, Manenti F, Nicolosi PA, D'Orlando C, Azzoni E, Brunelli S. (2016). Nitric Oxide donor molsidomine positively modulates myogenic differentiation of embryonic endothelial progenitors. PLoS One 11(10):e0164893. doi: 10.1371/journal.pone.0164893.

15. Medici D, Muñoz-Cánoves P, Yang P-C, Brunelli S. (2016) Mesenchymal Transitions in Development and Disease. Stem Cells International. doi:10.1155/2016/5107517
16. Cappato S, Tonachini L, Giacopelli F, Tirone M, Galietta L.J.V., Sormani M, Giovenzana A, Spinelli AE, Canciani B, Brunelli S, Ravazzolo R, Bocciardi R. (2016). High throughput screening for modulators of ACVR1 transcription potentially the treatment of Fibrodysplasia Ossificans Progressiva. Disease models and mechanisms. doi/10.1242/dmm.023929
17. Nicolosi PA, Tombetti E, Maugeri N, Rovere-Querini P, Brunelli S and Manfredi AA (2016) Vascular Remodelling and Mesenchymal Transition in Systemic. Stem Cells International. doi.org/10.1155/2016/4636859
18. Valentina Conti, Anna Gandaglia, Francesco Galli, Mario Tirone, Elisa Bellini, Lara Campana, Charlotte Kilstrup-Nielsen, Patrizia Rovere-Querini, Silvia Brunelli, and Nicoletta Landsberger. (2015). MeCP2 Affects Skeletal Muscle Growth and Morphology through Non Cell-Autonomous Mechanisms. *PLoS ONE* 10:e0130183.
19. Touvier T, De Palma D, Rigamonti E, Scagliola A, Incerti E, Mazelin L, Thomas JL, D'Antonio M, Politi P, Schaeffer L, Clementi E, Brunelli S. (2015). Muscle-specific Drp1 overexpression impairs skeletal muscle growth via translational attenuation. Cell Death and Disease. Feb 26;6:e1663. doi: 10.1038/cddis.2014.595.
20. Dentice M, Ambrosio R, Damiano V, Sibilio A, Luongo C, Guardiola O, Yennek S, Zordan P, Minchiotti G, Colao A, Marsili A, Brunelli S, Del Vecchio L, Larsen PR, Tajbakhsh S, Salvatore D (2014). Intracellular Inactivation of Thyroid Hormone Is a Survival Mechanism for Muscle Stem Cell Proliferation and Lineage Progression. Cell Metabolism, Nov 13;20(6):1038-1048. doi: 10.1016/j.cmet.2014.10.009
21. Bosurgi L., Brunelli S, Rigamonti E, Monno A, Manfredi A, Rovere-Querini P. Vessel-associated myogenic precursors control macrophage activation and clearance of apoptotic cells. (2014) Clinical and Experimental Immunology. Apr 21. doi: 10.1111/cei.12356. IF 2012 3.409
22. Rigamonti E, Zordan P. Sciorati C, Rovere-Querini P and Brunelli S. Macrophage plasticity in skeletal muscle repair (2014). BioMed Research International. Vol 2014. http://dx.doi.org/10.1155/2014/560629
23. Azzoni E, Conti V, Campana L, Dellavalle A, Adams RH, Cossu G and Brunelli S. Hemogenic endothelium generates mesoangioblasts that contribute to several mesodermal lineages in vivo (2014). Development 141:1821-1834; doi:10.1242/dev.103242
24. Venturin M, Carra S, Gaudenzi G, Brunelli S, Gallo GR, Moncini S, Cotelli F, Riva P. ADAP2 in heart development: a candidate gene for the occurrence of Cardiovascular Malformations in NF1 Microdeletion Syndrome (2014). Journal of Medical Genetics. doi: 10.1136/jmedgenet-2013-102240
25. Zordan P, Rigamonti E, Freudenberg K, Conti V, Azzon, E, Patrizia Rovere-Querini P, Brunelli S. Macrophages commit postnatal endothelium derived-progenitors to angiogenesis and restrict endothelial to mesenchymal transition during muscle regeneration. (2014). Cell Death and Disease. Jan 30;5:e1031 doi:10.1038/cddis.2013.558.
26. Rovere-Querini P, Clementi E, Brunelli S. Nitric Oxide and muscle repair: multiple actions converging on therapeutic efficacy (2013). European Journal of Pharmachology. doi:pii: S0014-2999(13)00853-4. 10.1016/j.ejphar.2013.11.006
27. Cazzato. D, Assi, E, Moscheni, C, Brunelli, S, De Palma, S, Cervia, D, Perrotta, C, Clementi, E. Nitric Oxide drives embryonic myogenesis in chicken through the upregulation of myogenic differentiation factors (2013). Experimental Cell Research. doi:pii: S0014-4827(13)00481-3. 10.1016/j.yexcr.2013.11.006
28. D'Orlando, C, Marzetti, E, François S, Lorenzi M, Conti V, Di Stasio E, Rosa F, Md, Brunelli S, Doglietto Gb, Pacelli F, Bossola M. Gastric cancer does not affect the expression of atrophy-related genes in human skeletal muscle. (2013). Muscle Nerve Jul 8. doi: 10.1002/mus.23945.
29. Dormoy-Raclet V, Cammas A, Celona B, Lian Xl, Van Der Giessen K, Zivojnovic M, Brunelli S, Riuzzi F, Sorci G, Wilhelm G, Di Marco S, Donato R, Bianchi Me, Imed-Eddine Gallouzi I-E. (2013). HuR and miR-1192 regulate myogenesis by modulating the translation of HMGB1 mRNA. Nature Communications. 4:2388 doi: 10.1038/ncomms3388
30. Zordan P, Sciorati C, Campana L, Cottone L, Clementi E, Rovere-Querini P, Brunelli S. The Nitric Oxide-donor molsidomine modulates the innate inflammatory response in a mouse model of muscular dystrophy (2013). European Journal of Pharmachology. 715(1-3):296-303 doi: 10.1016/j.ejphar.2013.05.007
31. Rigamonti E, Touvier T, Clementi E, Manfredi A, Brunelli S, Rovere-Querini P. Requirement of inducible Nitric Oxide Synthase for skeletal muscle regeneration after acute damage. (2013). Journal of Immunology 190(4):1767-77. doi: 10.4049/jimmunol.1202903.
32. Guardiola O, Lafuste P, Brunelli S, Iaconis S, Touvier T, Mourikis P, De Bock K, Lonardo E, Andolfi G, Bouché A, Liguori Gl, Shen Mm Tajbakhsh S, Cossu G, Carmeliet P, Minchiotti G. Cripto regulates skeletal muscle regeneration and modulates satellite cell determination by antagonizing Myostatin. Proc Natl Acad Sci U S A. (2012) 109(47):E3231-40. doi: 10.1073/pnas.1204017109. Epub 2012 Nov 5.
33. François S, D'Orlando C, Fatone T, Touvier T, Pessina P, Meneveri R, Brunelli S. Necdin enhances myoblasts survival by facilitating the degradation of the mediator of apoptosis CCAR1/CARP1. PLoS One. (2012);7(8):e43335.

34. D'Angelo MG, Gandossini S, Martinelli Boneschi F, Sciorati S, Bonato B, Brighina E, Comi Gp, Turconi Ac, Magri F, Stefanoni G, Brunelli S, Bresolin N, Cattaneo D, Clementi E. (2012). Nitric oxide donor and non steroidal anti inflammatory drugs as a therapy for muscular dystrophies: evidence from a safety study with pilot efficacy measures in adult dystrophic patients. Pharmacol Res. (2012) Apr;65(4):472-9. Epub 2012 Jan 25.
35. Bosurgi L, Corna G, Vezzoli M, Touvier T, Cossu G, Manfredi Aa, Brunelli S, Rovere-Querini P. Transplanted mesoangioblasts require macrophage IL-10 for survival in a mouse model of muscle injury. J Immunol. 2012 Jun15;188 (12):6267-77. Epub 2012 May 9.
36. Buono R, Vantaggiato C, Pisa V, Azzoni E, Bassi Mt, Brunelli S, Sciorati C, Clementi E. Nitric oxide sustains long-term skeletal muscle regeneration by regulating fate of satellite cells via signaling pathways requiring Vangl2 and cyclic GMP. Stem Cells. (2012) Feb;30(2):197-209. doi: 10.1002/stem.783.
37. Pessina P, Conti V, Tonlorenzi R, Touvier T, Meneveri R, Cossu G, Brunelli S. (2011). Necdin enhances muscle reconstitution of dystrophic muscle by vessel associated progenitors, by promoting cell survival and myogenic differentiation. Cell Death And Differentiation. doi:10.1038/cdd.2011.160 IF 9.050
38. Dellavalle A, Maroli G, Covarello D, Azzoni E, Innocenzi A, Perani L, Antonini S, Sambasivan R, Brunelli S, Tajbakhsh S, Cossu G. (2011). Pericytes resident in postnatal skeletal muscle differentiate into muscle fibres and generate satellite cells. Nature Communications. doi:10.1038/ncomms1508.
39. Donati C, Marseglia G, Magi A, Serratì S, Cencetti F, Bernacchioni C, Nannetti G, Benelli M, Brunelli S., Torricelli F, Cossu G, Bruni P (2011). Sphingosine 1-Phosphate Induces Differentiation of Mesoangioblasts towards Smooth Muscle. A Role for GATA6. Plos One, vol. 6; p. e20389, ISSN: 1932-6203, doi: 10.1371/journal.pone.0020389
40. Sciorati C, Miglietta D, Buono R, Pisa V, Cattaneo D, Azzoni E, Brunelli S., Clementi E (2011). A dual acting compound releasing nitric oxide (NO) and ibuprofen, NCX 320, shows significant therapeutic effects in a mouse model of muscular dystrophy. Pharmacological Research, ISSN: 1043-6618, doi: 10.1016/j.phrs.2011.05.003
41. Vezzoli M, Castellani P, Corna G, Castiglioni A, Bosurgi L, Monno A, Brunelli S., MANFREDI AA, RUBARTELLI A, ROVERE-QUERINI P (2011). HMGB1 release and redox regulation accompany regeneration and remodeling of skeletal muscle. Antioxidants & Redox Signaling, ISSN: 1523-0864, doi: 10.1089/ars.2010.3341
42. Bentivegna A, Conconi D, Panzeri E, Sala E, Bovo G, Viganò P, Brunelli S., Bossi M, Tredici G, Strada G, Dalprà L (2010). Biological heterogeneity of putative bladder cancer stem-like cell populations from human bladder transitional cell carcinoma samples. Cancer Science, vol. 101; p. 416-424, ISSN: 1347-9032, doi: 10.1111/j.1349-7006.2009.01414.x
43. Corna G, Campana L, Pignatti E, Castiglioni A, Tagliafico E, Bosurgi L, Campanella A, Brunelli S., Manfredi Aa, Apostoli P, Silvestri L, Camaschella C, Rovere-Querini P (2010). Polarization dictates iron handling by inflammatory and alternatively activated macrophages. Haematologica, vol. 95; p. 1814-1822, ISSN: 0390-6078, doi: 10.3324/haematol.2010.023879
44. De Palma C, Falcone S, Pisoni S, Cipolat S, Panzeri C, Pambianco S, Pisconti A, Allevi R, Bassi Mt, Cossu G, Pozzan T, Moncada S, Scorrano L, Brunelli S., Clementi E (2010). Nitric oxide inhibition of Drp1-mediated mitochondrial fission is critical for myogenic differentiation. Cell Death And Differentiation, vol. 17; p. 1684-1696, ISSN: 1350-9047, doi: 10.1038/cdd.2010.48
45. Pessina P, Conti V, Pacelli F, Rosa F, Doglietto Gb, Brunelli S., Bossola M (2010). Skeletal muscle of gastric cancer patients expresses genes involved in muscle regeneration. Oncology Reports, vol. 24; p. 741-745, ISSN: 1021-335X
46. Sciorati C, Buono R, Azzoni E, Casati S, Ciuffreda P, D'angelo G, Cattaneo D, Brunelli S., Clementi E (2010). Co-administration of ibuprofen and nitric oxide is an effective experimental therapy for muscular dystrophy, with immediate applicability to humans. BRITISH Journal Of Pharmacology, vol. 160; p. 1550-1560, ISSN: 0007-1188, doi: 10.1111/j.1476-5381.2010.00809.x
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