

Publications

Peer reviewed articles

1. H. L. Röst, Y. Liu, G. D'Agostino, M. Zanella, P. Navarro, G. Rosenberger, B.C. Collins, L. Gillet, **G. Testa**, L. Malmström and R. Aebersold TRIC: an automated alignment strategy for reproducible protein quantification in targeted proteomics *Nature Methods* 2016 DOI:10.1038/nmeth.3954
2. P.L. Germain, A. Vitriolo, A. Adamo, P. Laise, V. Das and **G. Testa** RNAontheBENCH: Computational and empirical resources for benchmarking RNAseq quantification and differential expression methods *Nucleic Acid Research* 2016 44(11):5054-5067 DOI: 10.1093/nar/gkw448
3. E. Signaroldi, P. Laise, S. Cristofanon, A. Brancaccio, E. Reisoli, S. Atashpaz, M. R. Terreni, C. Doglioni, G. Pruner, P. Malatesta and **G. Testa** Polycomb dysregulation in gliomagenesis targets a Zfp423-dependent differentiation network *Nature Communications* 2016 DOI: 10.1038/ncomms10753
4. A. Adamo, S. Atashpaz, P.L. Germain, M. Zanella, G. D'Agostino, V. Albertin, J. Chenoweth, L. Micale, C. Fusco, C. Unger, B. Augello, O. Palumbo, B. Hamilton, M. Carella, E. Donti, G. Pruner, A. Selicorni, E. Biamino, P. Prontera, R. McKay, G. Merla and **G. Testa** 7q11.23 dosage-dependent dysregulation in human pluripotent stem cells affects transcriptional programs in disease-relevant lineages *Nature Genetics* 2015 Feb;47(2):132-41 DOI 10.1038/ng.3169 *News and Views* in the same issue by Urban and Purmann
5. D.H. Park, S.J. Hong, R.D. Salinas, S.J. Liu, S.W. Sun, J. Sgualdino, **G. Testa**, M.M. Matzuk, N. Iwamori and D.A. Lim Activation of Neuronal Gene Expression by the JMJD3 Demethylase Is Required for Postnatal and Adult Brain Neurogenesis *Cell Reports* 2014 8(5):1290-9 DOI: <http://dx.doi.org/10.1016/j.celrep.2014.07.060>
6. M. Meloni and **G. Testa** Scrutinizing the Epigenetics Revolution *Biosocieties* 2014 DOI: 10.1057/biosoc.2014.22
7. A. Piunti, A. Rossi, A. Cerutti, M. Albert, S. Jammula, A. Scelfo, L. Cedrone, G. Fragola, L. Olsson, H. Koseki, **G. Testa**, S. Casola, K. Helin, F. d'Adda di Fagagna and D. Pasini Polycomb proteins control proliferation and transformation independently of cell cycle checkpoints by regulating DNA replication *Nature Communications* 2014; 5:3649. DOI: 10.1038/ncomms4649.
8. P. Prontera, D. Serino, B. Caldini, L. Scarponi, G. Merla, **G. Testa**, M. Muti, V. Napolioni, G. Mazzotta, M. Piccirilli and E. Donti Brief Report: Functional MRI of a Patient with 7q11.23 Duplication Syndrome and Autism Spectrum Disorder *Journal of Autism and Developmental Disorders* 2014 DOI 10.1007/s10803-014-2117-7
9. C. Palacios, J. Harris and **G. Testa** Multiplex parenting: In Vitro Gametes and the generations to come *Journal of Medical Ethics* 2014 40(11):752-8. DOI: 10.1136/medethics-2013-101810
10. M. Caganova, C. Carrisi, F. Mainoldi, F. Zanardi, P.L. Germain, L. George, F. Alberghini, G. Varano, L. Ferrarini, A.K. Talukder, M. Ponzoni, **G. Testa**, T. Nojima, C. Doglioni, D. Kitamura, K.M. Toellner, I. Su and S. Casola EZH2 contributes to lymphomagenesis via regulation of the germinal center response *Journal of Clinical Investigation* 123(12), 2013:5009-22
11. L. Schneider, S. Pellegatta, R. Favaro, F. Pisati, P. Roncaglia, **G. Testa**, S.K. Nicolis, G. Finocchiaro and F. D'Adda di Fagagna DNA damage in mammalian neural stem cells leads to astrocytic differentiation mediated by

- BMP2 signaling through JAK-STAT *Stem Cell Reports* 2013 DOI: 10.1016/j.stemcr.2013.06.004
12. G. Fragola, P.L. Germain, P. Laise, A. Cuomo, A. Blasimme, F. Gross, E. Signaroldi, G. Bucci, C. Sommer, G. Pruner, G. Mazzarol, T. Bonaldi, G. Mostoslavsky, S. Casola and **G. Testa** Cell reprogramming requires silencing of a core subset of Polycomb targets *PLoS Genetics* 9(2), 2013: e1003292
 13. A. Blasimme, B. Schmietow and **G. Testa** Reprogramming potentiality: the co-production of stem cell policy and democracy *American Journal of Bioethics* 13(1), 2013: 30-2
 14. T. Burgold, N. Voituron, M. Caganova, P.P. Tripathi, C Menuet, B.K. Tusi, F. Spreafico, M. Bévengut, C. Gestreau, S. Buontempo, A. Simeone, L. Kruidenier, G. Natoli, S. Casola, G. Hilaire and **G. Testa** The H3K27 demethylase JMJD3 is required for maintenance of the embryonic respiratory neuronal network, neonatal breathing and survival, *Cell Reports* 2(5), 2012: 1244-58
 15. L. Austenaa, I. Barozzi, A. Chronowska, A. Termanini, R. Ostuni, F. Stewart, **G. Testa** and G. Natoli The histone methyltransferase Wbp7 (MII4) controls macrophage function through GPI anchor synthesis, *Immunity* 36(4), 2012: 572-85
 16. M. Curnutte and **G. Testa** Consuming genomes: scientific and social innovation in direct-to-consumer genetic testing (2012) *New Genetics and Society*, 31:2, 159-181
 17. S. Campaner, F. Spreafico, T. Burgold, M. Doni, U. Rosato, B. Amati, and **G. Testa** The methyltransferase Set7/9(Setd7) is dispensable for the p53-mediated DNA damage response *Molecular Cell* 43, 2011; 681-688
 18. **G. Testa** The time of timing: How Polycomb proteins regulate neurogenesis *Bioessays*, 2011; 33(7):519-28
 19. G. Boniolo and **G. Testa** The Identity of Living Beings, Epigenetics, and the Modesty of Philosophy. *Erkenntnis*, 2011; DOI 10.1007/s10670-011-9308-9
 20. C.E. Pasi, A. Dereli-Oz, S. Negrini, M. Friedli, G. Fragola, A. Lombardo, G. Van Houwe, L. Naldini, S. Casola, **G. Testa**, D. Trono, P.G. Pelicci, and T.D. Halazonetis Genomic instability in induced stem cells *Cell Death and Differentiation*, 2011; 18(5):745-53
 21. **G. Testa** Stem Cell Teathrics *Nature* 2010, 465: 1012
 22. **G. Testa** What to do with the Grail now that we have it? iPSCs, potentiality, and public policy. *Cell Stem Cell*, 2009 5(4):358-9
 23. F. De Santa, N. Vipin, Z. H.Yap; B. K.Tusi, T. Burgold, L. Austenaa, G.Bucci, M.Caganova, S. Notarbartolo, S. Casola, **G. Testa**, W. Sung, C. Wei and G. Natoli Jmjd3 contributes to the control of gene expression in LPS activated macrophages *The EMBO Journal*, 2009; 28(21):3341-52
 24. G. Natoli, **G. Testa** and F. De Santa The future therapeutic potential of histone demethylases: a critical analysis *Current Opinion in Drug Discovery and Development* 2009; 12(5):607-15
 25. L. Skene, **G. Testa**, I. Hyun, K. W. Jung, A. McNab, J. Robertson, C. T. Scott, J. H. Solbak, P. Taylor, L. Zoloth Ethics Report on Interspecies Somatic Cell Nuclear Transfer Research *Cell Stem Cell*, 2009; 5(1): 27-30
 26. T. Burgold, F. Spreafico, F. De Santa, M. Totaro, E. Prosperini, G. Natoli and **G. Testa** The histone H3 lysine 27-specific demethylase Jmjd3 is required for neural commitment *PloS One* 2008 3(8): e3034
 27. J.A. Adjaye, A.G. Byskov, J.B. Cibelli, R. De Maria, S. Minger, M. Sampaolesi, **G. Testa**, C. Verfaillie, M. Zernicka-Goetz, H. Schöler, M. Boiani, N. Crosetto, C.A. Redi Pluripotency and differentiation in embryos and stem cells *Int J Dev Biol* 2008 52(7):801-9
 28. **G. Testa** Stem cells through stem beliefs: the co-production of biotechnological pluralism *Science as Culture* 2008 17(4): 435-448

29. F. De Santa, M. Totaro, E. Prosperini, S. Notarbartolo, **G. Testa**, and G. Natoli The histone H3 lysine-27 demethylase Jmjd3 links inflammation to inhibition of polycomb-mediated gene silencing *Cell* 2007 130(6):1083-94
30. I. Hyun*, P. Taylor*, **G. Testa***, B. Dickens, K. W. Jung, A. McNab, J. Robertson, L. Skene and L. Zoloth Ethical Standards for Human-to-Animal Chimera Experiments in Stem Cell Research *Cell Stem Cell* 2007 1(2):159-163 *equal contribution
31. **G. Testa**, L. Borghese, J. Steinbeck, and O. Brüstle Breakdown of the Potentiality Principle and Its Impact on Global Stem Cell Research *Cell Stem Cell* 2007 1(2):153-156
32. J. Scholten, K. Hartmann, A. Gerbaulet, T. Krieg, W. Müller, **G. Testa**, and A. Roers Mast cell-specific Cre/loxP-mediated recombination in vivo *Transgenic Res.* Epub 2007 Oct 31 (2008 (2):307-15)
33. **G. Testa** Nuclear Transfer: an Example of Responsive Epistemologies *Preprint 310 of the Proceedings of the Max Planck Institute for the History of Science* 2006 pp. 205-214
34. **G. Testa** and J. Harris Ethics and synthetic gametes *Bioethics*, 2005; 19: 146-166
35. **G. Testa** and J. Harris Ethical aspects of ES cell-derived gametes *Science*, 2004; 305:1719
36. **G. Testa** and J. Harris The ethics of deriving gametes from ES cells, response to A. Lippman and S.A. Newman *Science*, 2005;307: 515c-517c
37. **G. Testa**, J. Schaft, F.v.d. Hoeven, S. Glaser, Y. Zhang, T. Hermann, W. Stremmel and A. F. Stewart A reliable lacZ expression reporter cassette for multipurpose, knock-out-first, alleles *Genesis*, 2004, 38(3):151-8
38. **G. Testa**, K. Vintersten, Y. Zhang, V. Benes, J.P.P. Muyrers and A. F. Stewart BAC Engineering for the generation of ES cell-targeting constructs and mouse transgenes *Methods Mol Biol.* 2004; 256:141-58
39. K. Vintersten, **G. Testa**, A. F. Stewart. Microinjection of BAC DNA into the pronuclei of fertilised mouse oocytes *Methods Mol Biol.* 2004; 256: 141-58
40. J.P.P. Muyrers, Y. Zhang, V. Benes, J.M.J. Rientjes, **G. Testa** and A. F. Stewart ET recombination: DNA engineering using homologous recombination in *E. coli* *Methods Mol Biol.* 2004; 256: 107-22
41. **G. Testa**, Y. Zhang, K. Vintersten, V. Benes, I. Chambers, W. W. M. Pim Pijnappel, A. J.H. Smith, A. A. Smith and A. F. Stewart Engineering the mouse genome with bacterial artificial chromosomes to create multipurpose alleles *Nature Biotechnology*, 2003; 21(4): 443-7
42. T. Schell, **G. Testa**, S. Castagnetti, B. Rutz, M. Hannus and F. Frischknecht Neuroscience from different angles. Student symposium: From genes to thoughts *EMBO Reports* 2001 Jun; 2(6):471-5
43. **G. Testa** and A. F. Stewart Creating a transloction: engineering interchromosomal translocations in the mouse *EMBO Reports*, 2000 Aug; 1(2):120-1
44. Y. Zhang, J. P. P. Muyrers, **G. Testa** and A. F. Stewart DNA cloning by homologous recombination in *Escherichia coli*. *Nature Biotechnology* 2000 Dec; 18(12):1314-7
45. J. P. P. Muyrers, Y. Zhang, V. Benes, **G. Testa**, W. Ansorge and A. F. Stewart Point mutation of bacterial artificial chromosomes by ET recombination. *EMBO Reports* 2000 Sep; 1(3):239-43
46. J. P. P. Muyrers, Y. Zhang, **G. Testa** and A. F. Stewart Rapid modification of bacterial artificial chromosomes by ET-recombination *Nucleic Acid Research*, 1999 Mar 15; 27(6): 1555-1557
47. G. Nocentini, S. Ronchetti, A. Bartoli, **G. Testa**, F. D'Adamio, C. Riccardi and G. Migliorati TCR ζ : an alternatively sliced product of the T cell receptor zeta gene *European Journal of Immunology* 1995 25: 1405-1409

Peer-reviewed books and book chapters

1. L. Chiapperino and **G. Testa** 'The Epigenomic Self in Personalised Medicine: between Responsibility and Empowerment' in M. Meloni, S. Williams, P. Martin (Eds.) 'Biosocial Matters: Rethinking Sociology-Biology Relations in the Twenty-First Century', Wiley-Blackwell forthcoming in 2016
2. I. Galasso and **G. Testa** 'Medicina di Precisione: rifare il destino tra sfida e utopia' in M. Monti, S. Garagna, G. Milano and C.A. Redi (Eds.) 'Medicina di precisione. Un esercizio di cittadinanza scientifica e democrazia cognitiva' Pavia Collegio Ghislieri Ibis Edizioni 2015
3. **G. Testa** 'Democracies of stemness: stem cell technologies from generation to regeneration' in F. Calegari and C. Waskow (Eds.) 'Stem Cells. From Basic Research to Therapy', CRC Press 2014
4. **G. Testa** and A. Maturo 'Medicina rigenerativa ed embrioni', in G. Remuzzi and A. Maturo (Eds.) 'Ci curano o ci curiamo? Il malato tra crisi economica e responsabilità individuale', Franco Angeli, Milano 2013
5. **G. Testa** 'Stem cells and the structuring of the Italian biopolity' in H. R. Rheinberger and R. Mazzolini (Eds.) 'Different routes to stem cell research: Germany and Italy', Il Mulino (Bologna) and Duncker & Humblot (Berlin)(2012)
6. **G. Testa**
'More Than Just a Nucleus: Cloning and the Alignment of Scientific and Political Rationalities' in Sheila Jasanoff (Ed.) 'Reframing Rights: Bioconstitutionalism in the Genetic Age', 2011 *MIT Press*, pp. 86-104
7. H. Nowotny and **G. Testa**
Naked Genes. Reinventing the Human in the Molecular Age, 2011 *MIT Press* (originally appeared as 'Die gläsernen Gene. Die Erfindung des Individuums im molekularen Zeitalter', 2009 *Suhrkamp Verlag*; Italian translation 'Geni a nudo. Ripensare l'uomo nel XXI secolo', Codice Edizioni 2012; Russian translation forthcoming)
Reviewed in *Nature*, *The Financial Times*, *Die Zeit*, *Der Spiegel*, *Il Corriere della Sera*, *BBC Science*
8. **G. Testa**
'Cloning as Mirror'
in Christoph Zollikofer (Ed.) 'Klon statt Person', 2011 *Hochschulverlag AG* an der ETH Zuerich, pp. 45-50
9. **G. Testa**
'Le scienze della vita. Verso nuove antropogenesi?' in Antonio Pavan and Emanuela Magno (Eds.) 'Antropogenesi. Ricerche sull'origine e lo sviluppo del fenomeno umano' 2010, *Il Mulino*
10. G. Boniolo, G. Gatti, G. Pelicci and **G. Testa**
Cellule staminali. La base scientifica, le future terapie. La riflessione etica al di là dello slogan ideologico. Le risposte della scienza.
Quaderno 11 Libertà di sapere libertà di scegliere Fondazione Umberto Veronesi per il progresso delle scienze
11. **G. Testa** and S. Giaimo
'Il concetto di gene' in Giovanni Boniolo e Stefano Giaimo (Eds.) 'Filosofia e Scienze della Vita. Un'analisi dei fondamenti della biologia e della biomedicina' 2008 *Bruno Mondadori*
12. **G. Testa** and A. Minelli
'Vincoli ed epigenesi' in Giovanni Boniolo e Stefano Giaimo (Eds.) 'Filosofia e Scienze della Vita. Un'analisi dei fondamenti della biologia e della biomedicina' 2008 *Bruno Mondadori*

13. G. Testa

‘Che cos’è un clone? Pratiche e significato delle biotecnologie rosse in un mondo globale’ in Massimiano Bucchi and Federico Neresini (Eds.) ‘Cellule e Cittadini’ (Cells and citizens), 2006 *Sironi Editore*