

Daniele Novarina, PhD



Research

2014/3- present

Post-doctoral position in Michael Chang's lab

Topic of research: molecular determinants of ageing in *S. cerevisiae*

European Research Institute for the Biology of Ageing (ERIBA), University of Groningen, University Medical Center Groningen

2013/1-2014/1

Post-doctoral position in Marco Muzi Falconi and Paolo Plevani's lab

Topic of research: mechanisms involved in the maintenance of genome stability in *S. cerevisiae*

Università degli Studi di Milano

2009/1-2013/1

Ph.D. in Genetics and Biomolecular Sciences in Marco Muzi Falconi and Paolo Plevani's lab

Topic of research: mechanisms involved in the maintenance of genome stability in *S. cerevisiae*

Università degli Studi di Milano

Education

2013/01/25

PhD in Genetics and Biomolecular Sciences

Università degli Studi di Milano

2008/10/10

Master degree in Molecular Biology of the cell

Università degli Studi di Milano

2006/7/20

Bachelor degree in Biology

Università degli Studi di Milano

Research output

Revisiting the role of the spindle assembly checkpoint in the formation of gross chromosomal rearrangements in *Saccharomyces cerevisiae*

Yao, Y., Yin, Z., Bringas, F. R. R., Boudeman, J., Novarina, D. & Chang, M., 13-Apr-2024, *BioRxiv*.

A user-friendly and streamlined protocol for CRISPR/Cas9 genome editing in budding yeast

Novarina, D., Koutsoumpa, A. & Miliadis-Argeitis, A., 17-Jun-2022, In: *STAR protocols*. 3, 2, 42 p., 101358.

High-throughput replica-pinning approach to screen for yeast genes controlling low-frequency events

Novarina, D., Bringas, F. R. R., Rosas Bringas, O. & Chang, M., 18-Mar-2022, In: *STAR protocols*. 3, 1, 17 p., 101082.

VID22 counteracts G-quadruplex-induced genome instability

Galati, E., Bosio, M. C., Novarina, D., Chiara, M., Bernini, G. M., Mozzarelli, A. M., García-Rubio, M. L., Gómez-González, B., Aguilera, A., Carzaniga, T., Todisco, M., Bellini, T., Nava, G. M., Frigè, G., Sertic, S., Horner, D. S., Baryshnikova, A., Manzari, C., D'Erchia, A. M. & Pesole, G. & 3 others, Brown, G. W., Muzi-Falconi, M. & Lazzaro, F., 16-Dec-2021, In: *Nucleic Acids Research*. 49, 22, p. 12785–12804 20 p.

Vacuolar Localization via the N-terminal Domain of Sch9 is Required for TORC1-dependent Phosphorylation and Downstream Signal Transduction

Novarina, D., Guerra, P. & Miliadis-Argeitis, A., 3-Dec-2021, In: *Journal of Molecular Biology*. 433, 24, 167326.

A Genome-Wide Screen for Genes Affecting Spontaneous Direct-Repeat Recombination in *Saccharomyces cerevisiae*
Novarina, D., Desai, R., Vaisica, J. A., Ou, J., Bellaoui, M., Brown, G. W. & Chang, M., Jun-2020, In: *G3 : Genes, Genomes, Genetics*. 10, 6, p. 1858-1867 50 p.

A genome-wide screen identifies genes that suppress the accumulation of spontaneous mutations in young and aged yeast cells

Novarina, D., Janssens, G. E., Bokern, K., Schut, T., van Oerle, N. C., Kazemier, H. G., Veenhoff, L. M. & Chang, M., 1-Feb-2020, In: *Aging Cell*. 19, 2, 13 p., e13084.

Generally Applicable Transformation Protocols for Fluorescent Nanodiamond Internalization into Cells

Hemelaar, S. R., van der Laan, K. J., Hinterding, S. R., Koot, M. V., Ellermann, E., Perona-Martinez, F. P., Roig, D., Hommelet, S., Novarina, D., Takahashi, H., Chang, M. & Schirhagl, R., 19-Jul-2017, In: *Scientific Reports*. 7, 7 p., 5862.

Increased genome instability is not accompanied by sensitivity to DNA damaging agents in aged yeast cells

Novarina, D., Mavrova, S. N., Janssens, G. E., Rempel, I. L., Veenhoff, L. M. & Chang, M., Jun-2017, In: *Dna repair*. 54, p. 1-7 7 p.

A simple microfluidic platform to study age-dependent protein abundance and localization changes in *Saccharomyces cerevisiae*

Cabrera, M., Novarina, D., Rempel, I. L., Veenhoff, L. M. & Chang, M., 13-Apr-2017, In: *Microbial Cell*. 4, 5, p. 169-174 6 p.

Exploring Quantitative Yeast Phenomics with Single-Cell Analysis of DNA Damage Foci

Styles, E. B., Founk, K. J., Zamparo, L. A., Sing, T. L., Altintas, D., Ribeyre, C., Ribaud, V., Rougemont, J., Mayhew, D., Costanzo, M., Usaj, M., Verster, A. J., Koch, E. N., Novarina, D., Graf, M., Luke, B., Muzi-Falconi, M., Myers, C. L., Mitra, R. D. & Shore, D. & 4 others, Brown, G. W., Zhang, Z., Boone, C. & Andrews, B. J., 28-Sept-2016, In: *Cell systems*. 3, 3, p. 264-277.e10

RNase H and post-replication repair protect cells from ribonucleotides incorporated in DNA

Pizzi, S., Lazzaro, F., Novarina, D., Carnevali, S., Watt, D., Stone, J., Burgers, P. M., Kunkel, T., Muzi-Falconi, M. & Plevani, P., Jul-2013, In: *Febs Journal*. 280, p. 55-55 1 p.

RNase H and Postreplication Repair Protect Cells from Ribonucleotides Incorporated in DNA

Lazzaro, F., Novarina, D., Amara, F., Watt, D. L., Stone, J. E., Costanzo, V., Burgers, P. M., Kunkel, T. A., Plevani, P. & Muzi-Falconi, M., 13-Jan-2012, In: *Molecular Cell*. 45, 1, p. 99-110 12 p.

Mind the gap: Keeping UV lesions in check

Novarina, D., Amara, F., Lazzaro, F., Plevani, P. & Muzi-Falconi, M., 15-Jul-2011, In: *Dna repair*. 10, 7, p. 751-759 9 p.

Dynamics of Rad9 Chromatin Binding and Checkpoint Function Are Mediated by Its Dimerization and Are Cell Cycle-Regulated by CDK1 Activity

Granata, M., Lazzaro, F., Novarina, D., Panigada, D., Puddu, F., Abreu, C. M., Kumar, R., Grenon, M., Lowndes, N. F., Plevani, P. & Muzi-Falconi, M., 5-Aug-2010, In: *PLoS genetics*. 6, 8, 14 p., 1001047.