




Lia Talozzi

Postdoctoral Scholar, Neurology and Neurological Sciences

 Curriculum Vitae available Online

Bio

BIO

Dr. Talozzi aims to contribute to the definition of quantitative biomarkers for neurological pathologies. She has a physics background, and a master's in applied physics. She graduated with honors from Bologna University, where she pursued her Ph.D. in Biomedical and Neuromotor Sciences. During her doctoral studies, she worked primarily with magnetic resonance imaging, majoring in tractography methods, for which she was awarded a scholarship at the Neuroanatomy and Tractography Laboratory, King's College London. Subsequently, she exploited dimensionality reduction techniques for associating white matter damage with clinical symptoms within the Bordeaux University Disconnectome ERC grant. Currently, she expanded her research horizons to genetic investigations by joining the Greicius Lab. She aims to develop novel strategies for modeling risk scores for Alzheimer's pathology using long read sequencing methodologies.

HONORS AND AWARDS

- Research exchange grant King's College London, Marco Polo funding, Bologna University (2018)
- Travel grant AIRMM, Italian Association for Magnetic Resonance in Medicine (AIRMM) (2019)
- Travel grant OHBM conference, Guarantors of Brain UK (2019)
- Educational stipend ISMRM, International Society of Magnetic Resonance in Medicine (2017/2018/2020)
- Top ranked OHBM Glasgow abstract, merit travel stipend., Organization of Human Brain Mapping (OHBM) (2022)
- Seal of excellence for the MSCA HORIZON-MSCA-2021-PF-01-01, European Union MSCA grant (2022)

PROFESSIONAL EDUCATION

- Doctor of Philosophy, Universita Degli Studi Di Bologna (2019)
- Master of Science, Universita Degli Studi Di Bologna (2016)
- Bachelor of Science, Universita Degli Studi Di Bologna (2013)
- BS, Bologna University , Physics (2013)
- MSc, Bologna University , Applied Physics (2016)
- PhD, Bologna University , Biomedical and Neuromotor Sciences (2019)

STANFORD ADVISORS

- Michael Greicius, Postdoctoral Faculty Sponsor

LINKS

- Personal Site: <https://www.lia-talozzi.com>
- My Lab Site: <https://greiciuslab.stanford.edu/people/lia-talozzi>

- Developed Web Application: <http://disconnectomestudio.bcblab.com>
- Science divulgation platform: <https://www.clinicalneuroanatomyseminars.com>

Research & Scholarship

LAB AFFILIATIONS

- Michael Greicius, Greicius Lab (12/9/2022)

Publications

PUBLICATIONS

- **Atypical brain structural connectivity and social cognition in childhood maltreatment and peer victimisation.** *BMC psychiatry*
Lim, L., Talozzi, L., Howells, H.
2024; 24 (1): 287
- **APOE loss-of-function variants: Compatible with longevity and associated with resistance to Alzheimer's disease pathology.** *Neuron*
Chemparathy, A., Le Guen, Y., Chen, S., Lee, E. G., Leong, L., Gorzynski, J. E., Jensen, T. D., Ferrasse, A., Xu, G., Xiang, H., Belloy, M. E., Kasireddy, N., Peña-Tauber, et al
2024
- **Testing the Disconnectome Symptom Discoverer model on out-of-sample post-stroke language outcomes.** *Brain : a journal of neurology*
Hope, T. M., Neville, D., Talozzi, L., Foulon, C., Forkel, S. J., Thiebaut de Schotten, M., Price, C. J.
2023
- **Atlasing white matter and grey matter joint contributions to resting-state networks in the human brain.** *Communications biology*
Nozais, V., Forkel, S. J., Petit, L., Talozzi, L., Corbetta, M., Thiebaut de Schotten, M., Joliot, M.
2023; 6 (1): 726
- **A 3' UTR Deletion Is a Leading Candidate Causal Variant at the TMEM106B Locus Reducing Risk for FTLD-TDP.** *medRxiv : the preprint server for health sciences*
Chemparathy, A., Le Guen, Y., Zeng, Y., Gorzynski, J., Jensen, T., Kasireddy, N., Talozzi, L., Belloy, M. E., Stewart, I., Gitler, A. D., Wagner, A. D., Mormino, E., Henderson, et al
2023
- **Latent disconnectome prediction of long-term cognitive-behavioural symptoms in stroke.** *Brain : a journal of neurology*
Talozzi, L., Forkel, S. J., Pacella, V., Nozais, V., Allart, E., Piscicelli, C., Pérennou, D., Tranel, D., Boes, A., Corbetta, M., Nachev, P., de Schotten, M. T.
2023
- **Longitudinal prediction of motor dysfunction after stroke: a disconnectome study** *BRAIN STRUCTURE & FUNCTION*
Dulyan, L., Talozzi, L., Pacella, V., Corbetta, M., Forkel, S. J., de Schotten, M.
2022; 227 (9): 3085-3098
- **Molecular biomarkers correlate with brain grey and white matter changes in patients with mitochondrial m.3243A > G mutation** *MOLECULAR GENETICS AND METABOLISM*
Evangelisti, S., Gramegna, L., La Morgia, C., Di Vito, L., Maresca, A., Talozzi, L., Bianchini, C., Mitolo, M., Manners, D., Caporali, L., Valentino, M., Liguori, R., Carelli, et al
2022; 135 (1): 72-81
- **Major cerebral vessels involvement in patients with MELAS syndrome: Worth a scan? A systematic review** *JOURNAL OF NEURORADIOLOGY*
Gramegna, L., Cortesi, I., Mitolo, M., Evangelisti, S., Lia, T., Cirillo, L., Tonon, C., Lodi, R.
2021; 48 (5): 359-366
- **Role of Diffusion MRI Tractography in Endoscopic Endonasal Skull Base Surgery** *JOVE-JOURNAL OF VISUALIZED EXPERIMENTS*
Zoli, M., Talozzi, L., Mitolo, M., Lodi, R., Mazzatenta, D., Tonon, C.
2021
- **Brain MRS correlates with mitochondrial dysfunction biomarkers in MELAS-associated mtDNA mutations** *ANNALS OF CLINICAL AND TRANSLATIONAL NEUROLOGY*

Gramegna, L. L., Evangelisti, S., Di Vito, L., La Morgia, C., Maresca, A., Caporali, L., Amore, G., Talozzi, L., Bianchini, C., Testa, C., Manners, D. N., Cortesi, I., Valentino, et al

2021; 8 (6): 1200-1211

- **From Neurosurgical Planning to Histopathological Brain Tumor Characterization: Potentialities of Arcuate Fasciculus Along-Tract Diffusion Tensor Imaging Tractography Measures** *FRONTIERS IN NEUROLOGY*
Zoli, M., Talozzi, L., Martinoni, M., Manners, D. N., Badaloni, F., Testa, C., Asioli, S., Mitolo, M., Bartiromo, F., Rochat, M., Fabbri, V., Sturiale, C., Conti, et al
2021; 12: 633209
- **The Combination of Metabolic Posterior Cingulate Cortical Abnormalities and Structural Asymmetries Improves the Differential Diagnosis Between Primary Progressive Aphasia and Alzheimer's Disease** *JOURNAL OF ALZHEIMERS DISEASE*
Mitolo, M., Stanzani-Maserati, M., Manners, D. N., Capellari, S., Testa, C., Talozzi, L., Poda, R., Oppi, F., Evangelisti, S., Gramegna, L. L., Magarelli, S., Pantieri, R., Liguori, et al
2021; 82 (4): 1467-1473
- **Cell signaling pathways in autosomal-dominant leukodystrophy (ADLD): the intriguing role of the astrocytes** *CELLULAR AND MOLECULAR LIFE SCIENCES*
Ratti, S., Rusciano, I., Mongiorgi, S., Owusu Obeng, E., Cappellini, A., Teti, G., Falconi, M., Talozzi, L., Capellari, S., Bartoletti-Stella, A., Guaraldi, P., Cortelli, P., Suh, et al
2021; 78 (6): 2781-2795
- **L-Dopa Modulation of Brain Connectivity in Parkinson's Disease Patients: A Pilot EEG-fMRI Study** *FRONTIERS IN NEUROSCIENCE*
Evangelisti, S., Pittau, F., Testa, C., Rizzo, G., Gramegna, L., Ferri, L., Coito, A., Cortelli, P., Calandra-Buonaura, G., Bisquoli, F., Bianchini, C., Manners, D., Talozzi, et al
2019; 13: 611
- **Stridor-related gray matter alterations in multiple system atrophy: A pilot study** *PARKINSONISM & RELATED DISORDERS*
Testa, C., Calandra-Buonaura, G., Evangelisti, S., Giannini, G., Provini, F., Ratti, S., Cecere, A., Talozzi, L., Manners, D., Lodi, R., Tonon, C., Cortelli, P.
2019; 62: 226-230
- **Predicting conversion from mild cognitive impairment to Alzheimer's disease using brain H-1-MRS and volumetric changes: A two-year retrospective follow-up study** *NEUROIMAGE-CLINICAL*
Mitolo, M., Stanzani-Maserati, M., Capellari, S., Testa, C., Rucci, P., Poda, R., Oppi, F., Gallassi, R., Sambati, L., Rizzo, G., Parchi, P., Evangelista, S., Talozzi, et al
2019; 23: 101843
- **Along-tract analysis of the arcuate fasciculus using the Laplacian operator to evaluate different tractography methods** *MAGNETIC RESONANCE IMAGING*
Talozzi, L., Testa, C., Evangelisti, S., Cirignotta, L., Bianchini, C., Ratti, S., Fantazzini, P., Tonon, C., Manners, D., Lodi, R.
2018; 54: 183-193
- **Multi-class parkinsonian disorders classification with quantitative MR markers and graph-based features using support vector machines** *PARKINSONISM & RELATED DISORDERS*
Morisi, R., Manners, D., Gnecco, G., Lanconelli, N., Testa, C., Evangelisti, S., Talozzi, L., Gramegna, L., Bianchini, C., Calandra-Buonaura, G., Sambati, L., Giannini, G., Cortelli, et al
2018; 47: 64-70