

Marta Pratelli, Ph.D.



Marta Pratelli is a Postdoctoral Fellow in the Spitzer Lab, in the Neurobiology Section of the Division of Biological Sciences at the University of California San Diego (UCSD). She received her BA and MS degrees in Molecular Biology at the University of Pisa, Italy, where she also completed her PhD in Biology working in the lab of Dr. Pasqualetti. There she investigated the plasticity of the serotonergic system, working on the generation and characterization of a TPH2 conditional knockout mouse line for depletion of serotonin and a TPH2 reporter stem cell line to model serotonergic development and function. These studies led her to investigate the effects of perturbation of serotonin homeostasis on adult serotonergic neuronal circuitry. Her work demonstrated that conditional serotonin depletion during adulthood as well as chronic fluoxetine induces morphological rearrangements of serotonergic fibers innervating the hippocampus. She is currently leading several research projects in the Spitzer lab to investigate different aspects of the relationship between exposure to drugs of abuse and a recently discovered form of neurotransmitter plasticity, called neurotransmitter switching, which has been shown to cause behavioral changes.