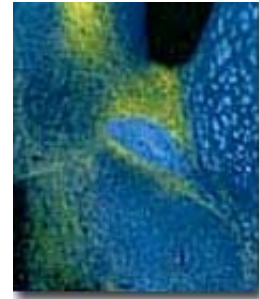




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Research Interests

Our laboratory is interested in general aspects of synaptic neurochemical markers and in neuroimaging. Our goals are ultimately to provide direct imaging measures of the effects of diseases and therapies in the human brain, thus, advancing our understanding of neurologic and psychiatric illness and permitting the development of better therapies. We are actively pursuing the development and characterization of markers specific to each of two cell types involved in disorders of memory and cognition (cholinergic neurons) or in psychosis and movement disorders (dopaminergic neurons). We are developing and applying new, non-invasive methods for imaging of receptors and other markers in the human brain based on positron emission tomography (PET). The possibility of drug-induced changes in receptor numbers may be investigated in the human brain at therapeutically relevant drug doses. This latter information may help identify mechanisms underlying drug intolerance

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