Speaker: Ann Graybiel

Title: Making Decisions Based on Value: Mood States and Brain Circuits

Abstract: We make many decisions about what to do based on how we evaluate the costs and benefits of our potential actions. Some of this decision-making is straight-forward, and we scarcely notice ourselves thinking. But in other situations, and in individuals with extra stress or certain medical conditions, this kind of decision-making can provoke high anxiety. The Covid-19 pandemic, for many, has brought such cost-benefit decision-making to the fore. This lecture will highlight recent neuroscience research that focuses on neural circuits that are especially called to action during such motivationally challenging decision-making. The work highlights switching circuits in the basal ganglia that the brain can use to adjust both our moods and our subjective evaluations of the future.