Risk in the time of the Corona Virus Pandemic

JUNE 28 - JULY 2, 2020 • online

FOR TEACHERS OF GRADES K-12 IN ALL CONTENT AREAS

Join us at QUEST to investigate how to cope with risk by learning how animals modulate it every day of their lives. Risk is an inherent property of being alive. Nothing in the environment is constant, so all animals - including humans - have to cope with uncertainty. And given that any strategy that balances tradeoffs among actions associated with competing demands in an uncertain world runs the risk of failing to meet any of them, how do animals cope? Consequently, coping with risk is a never ending problem facing all living beings.

This summer QUEST will challenge teachers to ‘get inside the minds’ of animals, in particular squirrels in your backyard, to see how they solve this problem. All animals face the risk of failing to solve two central and conflicting problems associated with maintaining both their short-term and long-term well-being. So, what is a clever squirrel to do? How should it modulate its risk of dying either from predation or from starvation? This is exactly the same question we are now asking ourselves and that of our governments: how do we avoid infecting ourselves and our neighbors with the Corona virus and perishing without crashing the economy and preventing large segments of the population from putting food on the table for themselves and their families?

"Everyone wants a perfect way out of this crisis. There isn’t one. Every choice is fraught, every choice is uncertain and some choices that make sense in one place won’t make sense in another. We’re just going to have to find our way.”

- NYT by Bret Stephen, 4/28/2020

Squirrels do this and our field experiments will explore the spatial and temporal differences that provide context specific solutions that balance risks among alternatives.

This QUEST Unit will be led by content expert Professor Rubenstein, Ecology and Evolutionary Biology, Princeton University and local teachers. Daily meetings will be scheduled ONLINE via Zoom for 1-2 hours. Data collection and analysis will be in small groups each day, with the online support of lead teachers. Everyone will present their questions/problem, data analysis and explanations with evidence as addressed in the NGSS Practices via Zoom on 7/2.

There is no fee for the first 16 teachers. REGISTRATION IS REQUIRED, BY JUNE 2, 2020. For more information and application visit https://teacherprep.princeton.edu/quest2020 or contact Dr. Anne Catena at acatena@princeton.edu or (609) 258-3336.