

Grade Levels: 9th-12th Sessions: 5
Student Max: 10 Student Min: 3
Course Cost: \$125 US
Dates (Times):
January 13th, 20th & 27th (7:00-8:00pm EST)
February 3rd & 10th (7:00-8:00pm EST)



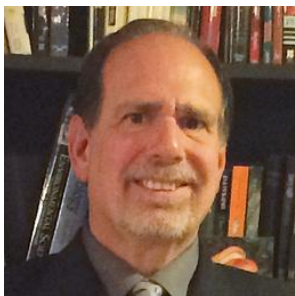
COURSE DESCRIPTION:

As students and curious-minded science folks we often ask the question “Is there life on other worlds?” We may have been following the many NASA space science missions that have explored the planets and some of their moons over the past several years which have allowed us to begin to seek answers to this ever-growing question. We often look at how unique life-forms can exist and thrive under extreme conditions in hostile environments here on Earth. Let’s journey to these other worlds and learn about the field of Astrobiology and our search for life on these “strange” worlds.

MATERIALS LIST:

Access to the following platform: <https://www.nasa.gov/>

COURSE INSTRUCTOR:



Barry Fried - My career in education began as a science teacher and continued as an administrator in the New York City school district. While serving as a department and school leader, I still had my passion for teaching and maintained my role as a classroom teacher, which was the most rewarding time of my school day. Presently, I am an education consultant, delivering professional development to teachers in the sciences, mathematics, instructional technology and STEM and providing job-embedded services to support classroom instruction for schools throughout the United States. On occasion, I conduct virtual training sessions for teachers. Additionally, I am very proud to be a Solar System Ambassador and a New Horizons Fellow for NASA's Educational Outreach Programs, conducting workshops for teachers, students, parents and at community events in Space Mission Science. My values and beliefs developed over a 30-year teaching career as I understood my responsibility toward improving student performance and that all students can learn when provided with a supportive classroom environment. My lessons were creative and inquiry-focused which engaged students and helped in generating enthusiasm with an eagerness to learn. After receiving my Bachelor of Science in Biology, I earned my New York State Teaching Certification in the Sciences while completing my Master of Science in Biology, after which, I received my Professional

Diploma in Educational Administration & Supervision. I served as principal of a comprehensive high school for 11 years. Prior to my tenure as principal, I was a classroom teacher at the intermediate and high school levels, teaching all science subjects, and an assistant principal of science and technology at the high school level. I integrated STEM education for my students, was an inclusion teacher supporting IEP students, instituted a robotics program, coached our Science Olympiad team and was a member of many educational and science organizations, spearheading changes in instructional practices in my school district. Working to increase student achievement, I collaborated with educators and students through virtual and face-to-face training by providing opportunities to engage in 'real-time' science to help bridge cultural and socio-economic gaps among students from diverse backgrounds and academic levels. I still enjoy sharing my experiences by presenting at regional and national conferences on topics including Learning for Conceptual Understanding, Diversified & Differentiated Learning Strategies, Integrating Interdisciplinary Approaches to Science Education, Astrobiology in the Urban Setting and Multicultural/Equity in Science Education, to name a few. One highlight was being selected as a 'Featured Speaker' at the Regional NSTA Conference in Detroit, MI on the topic Using Instructional Technology. I also have written curriculum in Biological and Earth System Sciences, am a published author, and was featured in two Educational Administration textbooks. SKILLS: AP Biology, M.S.; AP Chemistry, BSc; AP Environmental Science, BSc; Astronomy, BSc; Biology, M.S.; Chemistry, BSc; Earth Science, BSc;

Ecology and Environmental Biology, BSc; Environmental Science, BSc; General Science, BSc; Horticulture, BSc; Human Biology, M.S.; Natural Sciences, BSc; Physical Science (Middle School/Jr. High), BSc; Physics, BSc; Physics and Astronomy, BSc; Physiology, M.S.