



Meet the Engineer!



As a biological and agricultural engineer, I explore, design, and study interactions among all aspects of biological systems.

Dr. J.M. Grace III Biological and Agricultural Engineer

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<http://www.naturalinquirer.org>

Important Scientist Characteristics:

The skills contributing most to my work are curiosity, mathematical and critical thinking, creativity, and effective communication. These traits combine to help my teams identify gaps in understanding, isolate questions, and provide solutions.

Example of a simple research question I have tried to answer:

What is the influence of human activities on our soil and water resources? Our work has found that human activities, including management, can result in both positive benefits and negative impacts to our soil and water resources.

Technology or equipment used in my work:

Modeling and geospatial mapping technology are critical to my work. These tools provide visual representation of multiple characteristics (e.g., water, vegetation, soils, elevation, population, pollutants) at many scales. This information helps define areas of interest for detailed study.

Most Exciting Work

My team's pursuit to describe the influence of forest road infrastructure, and its management, on water resources comes to mind as the most exciting work. This work has spanned my career, and there remains unanswered road infrastructure questions due to continually changing conditions.

When did you know you wanted to be an engineer?

I chose engineering as the profession I would pursue during my senior year in high school after being introduced to a discipline (agricultural engineering) that nurtures my passion for natural resources and my ability to grasp theoretical concepts and mathematics.