



THE SCIENTIFIC LITERACY CENTER'S MISSION

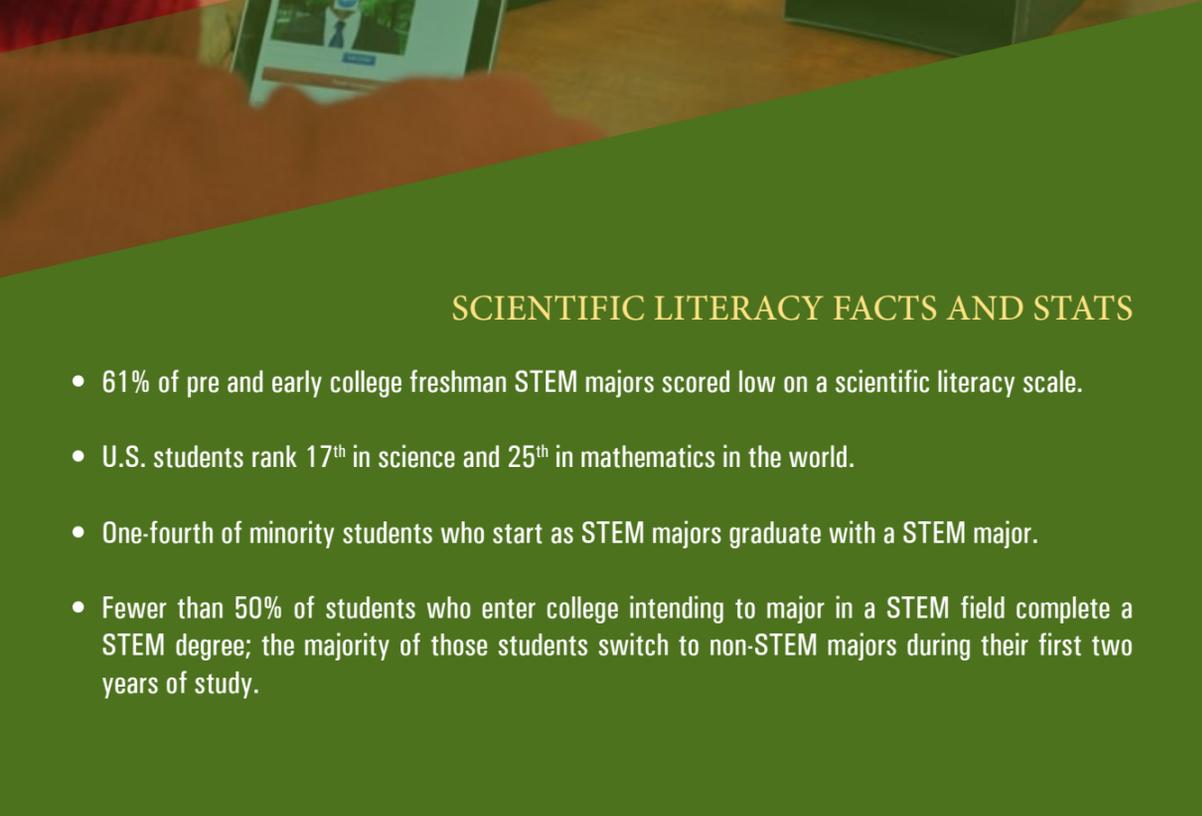
The Scientific Literacy Center's mission is to promote student knowledge, interest and successful pursuit of STEM majors; enhance student cognitive and non-cognitive skills needed for success in the STEM major; provide a scientific literacy curriculum that is specifically designed to increase STEM retention; promote increased student awareness of career opportunities in STEM; provide a scientific literacy assessment; and study this instrument to continue to research the scientific literacy of freshman STEM majors.

CONTACT US



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SCIENTIFIC LITERACY FACTS AND STATS

- 61% of pre and early college freshman STEM majors scored low on a scientific literacy scale.
- U.S. students rank 17th in science and 25th in mathematics in the world.
- One-fourth of minority students who start as STEM majors graduate with a STEM major.
- Fewer than 50% of students who enter college intending to major in a STEM field complete a STEM degree; the majority of those students switch to non-STEM majors during their first two years of study.



SCIENTIFIC LITERACY CENTER

Making Scientific Literacy a Top Priority Among College Freshman STEM Majors and High School Students Interested in STEM

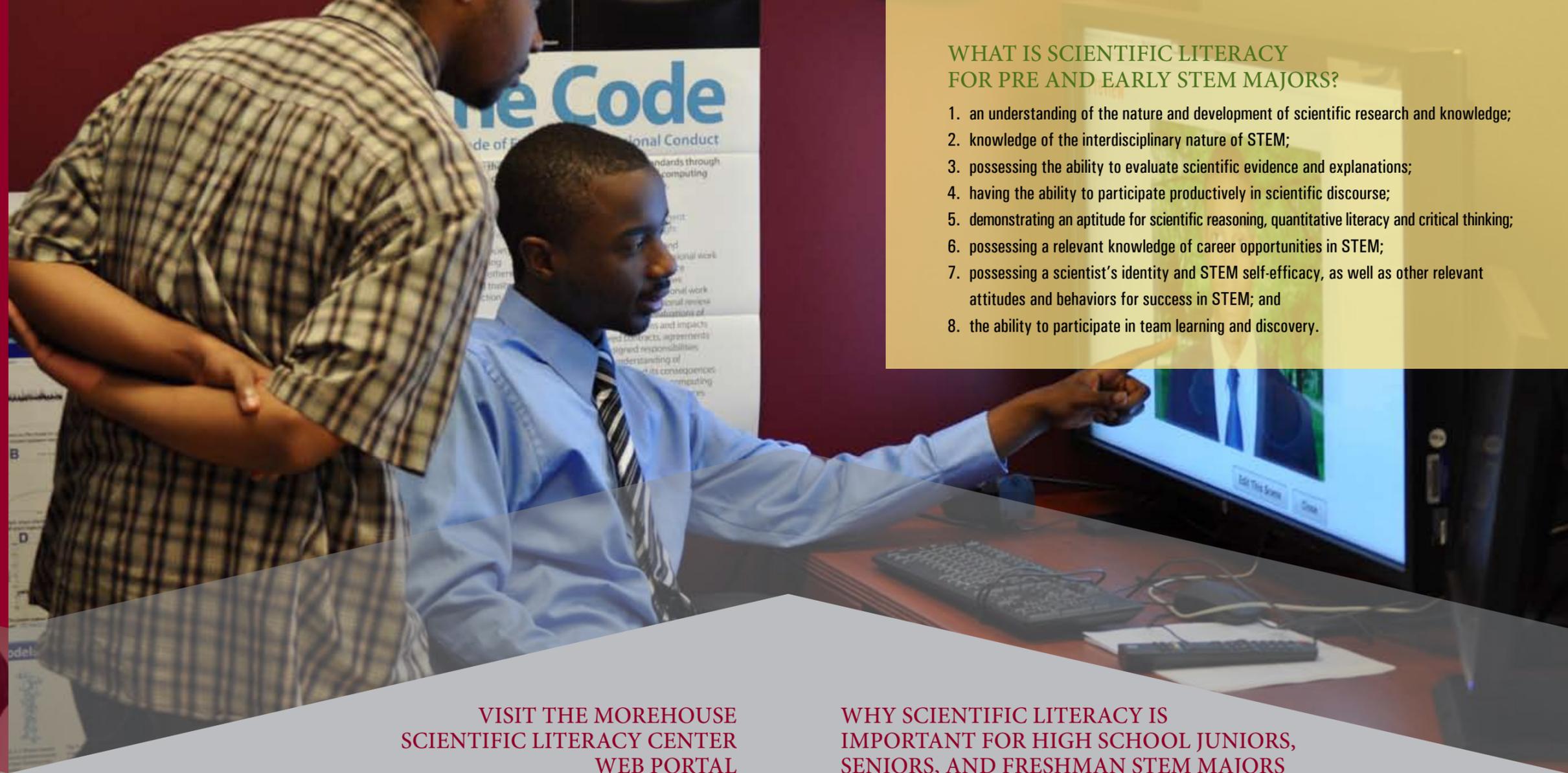
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THE MOREHOUSE SCIENTIFIC LITERACY CENTER

The Center promotes student success in STEM majors by providing a:

- scientific literacy curriculum with PowerPoint presentations, lectures, student activities, case studies and teaching notes;
- scientific literacy assessment instrument that identifies deficiencies in STEM competencies (i.e., conceptual understanding, knowledge base, skill sets, scientific reasoning, quantitative literacy, attitudes, behaviors, and self-efficacy);
- searchable database of STEM occupations, as well as professional and trade organizations;
- video archive of interviews with STEM professionals highlighting their careers and other helpful information;
- searchable digital resource library for STEM-related information including but limited to classroom activities, research articles, publications, reports, and statistics.



WHAT IS SCIENTIFIC LITERACY FOR PRE AND EARLY STEM MAJORS?

1. an understanding of the nature and development of scientific research and knowledge;
2. knowledge of the interdisciplinary nature of STEM;
3. possessing the ability to evaluate scientific evidence and explanations;
4. having the ability to participate productively in scientific discourse;
5. demonstrating an aptitude for scientific reasoning, quantitative literacy and critical thinking;
6. possessing a relevant knowledge of career opportunities in STEM;
7. possessing a scientist's identity and STEM self-efficacy, as well as other relevant attitudes and behaviors for success in STEM; and
8. the ability to participate in team learning and discovery.

VISIT THE MOREHOUSE SCIENTIFIC LITERACY CENTER WEB PORTAL

- **Scientific Literacy Survey** - Take quizzes to help identify your strengths and deficiencies in scientific literacy.
- **Scientific Literacy Course** - Participate in Scientific Literacy Course video productions with PowerPoint presentations and activities.
- **STEM Careers** - Search our database of more than 150 STEM occupations and 90 STEM professional and trade organizations.
- **STEM Pioneer Biographies and Interviews** - Visit a featured video archive of interviews with 200 plus STEM pioneers.
- **Virtual STEM Advisor** - Learn from virtual instructors who assist students with questions related to STEM careers.
- **Digital Library** - Search our database of scientific literacy and STEM-related research articles, publications, reports, and related resources.

WHY SCIENTIFIC LITERACY IS IMPORTANT FOR HIGH SCHOOL JUNIORS, SENIORS, AND FRESHMAN STEM MAJORS

For the U.S. to remain competitive in the global STEM economy, we must produce the next generation of STEM professionals. Increasing the level of scientific literacy of freshman STEM majors, as well as high school students interested in STEM will potentially:

- increase retention in STEM majors
- increase STEM workforce; and
- produce a positive impact on America's global economic strength and competitiveness.

A scientifically literate population of pre and early STEM majors will help solve the current problem that one out of every two freshman STEM majors in college do not graduate with a STEM degree.

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Our Scientific Literacy course increased STEM retention by 30%.

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