



**INCORPORATING GE SLOS INTO
YOUR CLASSES—AND HAVE FUN
WHILE DOING IT!**

LMC Fall GE Flex 2022

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“Central to an Associate Degree, General Education is designed to introduce students to the variety of means through which people comprehend the modern world. It reflects the conviction of colleges, then, that those who receive their degrees must possess in common certain basic principles, concepts and methodologies both unique to and shared by the various disciplines. College educated persons must be able to use this knowledge when evaluating and appreciating the physical environment, the culture and the society in which they live. Most importantly, General Education should lead to better self-understanding.” – California Code of Regulations, Title 5, 55061

Icebreaker: What do you teach at LMC?

1. Introduce yourself with your preferred name and pronouns.
2. Describe your discipline or the courses that you teach in 6 words or less.



Local GE Overview

6 GE SLOs

1. Human Communication
2. Information Literacy
3. Ethical Insights
4. Diverse Perspectives
5. Quantitative Reasoning
6. Scientific Inquiry

Aligns with Discipline Categories

1. Arts and Humanities
2. Language and Rationality (LR 2B)
3. Social and Behavioral Sciences
4. Ethnic and Multicultural Studies
5. Language and Rationality (LR 2A)
6. Natural Sciences

If your COOR transfers as a UC or CSU GE class, it will be automatically added to the GE LMC pattern if there is a comparable LMC GE requirement. At the next regular COOR revision, you will be required to integrate the assigned GE SLO.

Strategies for GE COORs

- TIP 1: Be explicit and explicate.
- TIP 2: Reiteration, multiplicity, and elucidation are your friends.
- TIP 3: Combine, mix and match!
- TIP 4: Utilize campus resources.

**TOP
TIPS**

Tips for Writing COOR Descriptions

Embed learning outcome theme/s into course description as appropriate (explicit and explicate).

Example: Astronomy, GE SLO 6:
Scientific Inquiry

- A survey of current concepts of the Universe and their historical evolution. Emphasis is placed on the process of **scientific inquiry** by which current scientific understanding has been achieved, on the aesthetics of science, and on the limitations and implications of scientific knowledge. The material is presented throughout with the aid of the planetarium for Pittsburg sections. Interdisciplinary connections, ethical implications, and multicultural perspectives are infused throughout the course.

Tips for Writing COOR CSLOs (Explicit and explicate) (Reiteration, multiplicity, & elucidation)

Embed assigned GE SLO into at least one of your CSLOs

Example: Art, GE SLO 1: Human Communication

CSLO 1: Read critically and **communicate effectively** as a writer and **speaker** on **artistic expression as cultural statements** within the political, philosophical and religious contexts of prehistoric and ancient society and relate them to our contemporary world.

Tips for Writing COOR Assignments

History Example: GE SLO 3: Ethical Insight

Write a 3–5-page essay which uses primary and secondary sources as evidence to answer the following questions:

- How did the lancados and Eurafrican traders combine aspects of African and European cultures?
- What does the life and treatment of Sarah Baartman reveal about the intersections of science, race, and **ethics** in the early 19th century? How were the “scientific” examinations of Baartman’s body used to create new ideas about race and racial difference in the 19th century? What were/are the **ethical implications** of using scientific inquiries to justify racial hierarchy and difference?

Tips for Embedding more than one GESLO (mix and match)

Astronomy, GE SLO 6: Scientific Inquiry assigned; others integrated GE SLO 3: Ethical Insight and GESLO 4: Diverse Perspectives

- **Description:** A survey of current concepts of the Universe and their historical evolution. Emphasis is placed on the process of **scientific inquiry** by which current scientific understanding has been achieved, on the aesthetics of science, and on the limitations and implications of scientific knowledge. The material is presented throughout with the aid of the planetarium for Pittsburg sections. Interdisciplinary connections, **ethical implications**, and **multicultural perspectives** are infused throughout the course.
- **CSLO 6:** Explain the **ethical implications** inherent in issues such as building telescopes on sacred, indigenous land; government spending on astronomy research and space exploration; broadcasting our existence to the rest of the Galaxy; and terraforming other planets.
- **CSLO 7:** Analyze and evaluate the **contributions to the development of astronomy by cultures from around the world** and from different times. Explain the different **cultural perspectives** of a given constellation. Explain how different cultures built pyramids for astronomical observing.

Tips for
Embedding
more than
one GESLO
(mix and
match)

**Astronomy, GE SLO 6: Scientific Inquiry
assigned; others integrated GE SLO 3:
Ethical Insight and GE SLO 4: Diverse
Perspectives**

- **Sample assignment 1: "Ethical Science"** is an article about the 15 rules that scientific researchers must follow as they pursue their scientific investigations. Students read the article and answer critical thinking questions about why particular rules are necessary, how the rules relate to the students' lives, and how a number of rules would apply to a given, real-life scenario. Students investigate, analyze, and synthesize the **ethical implications of the scientific process.** (CSLO 1, 2, 5, 6)
- **Sample Assignment 2: "Multicultural Constellation"** is an article about **how cultures around the world viewed and interpreted the constellations Orion, its belt, and the Pleiades star cluster.** Students read the article and answer critical thinking and **multicultural diversity questions that relate, contrast, and tie together different cultures' interpretations.** (CSLO 1, 2, 5, 7)



GE SLO 1:
HUMAN
COMMUNICATION

Sara Toruno-Conley



AT THE COMPLETION OF THE LMC GE PROGRAM, A STUDENT WILL BE ABLE TO COMMUNICATE AND COLLABORATE EFFECTIVELY AS A SPEAKER, VISUAL COMMUNICATOR, AND/OR PERFORMER.



Humanities
COR:
GESLO 1 is
embedded in
one CSLO and
two sample
assignments.

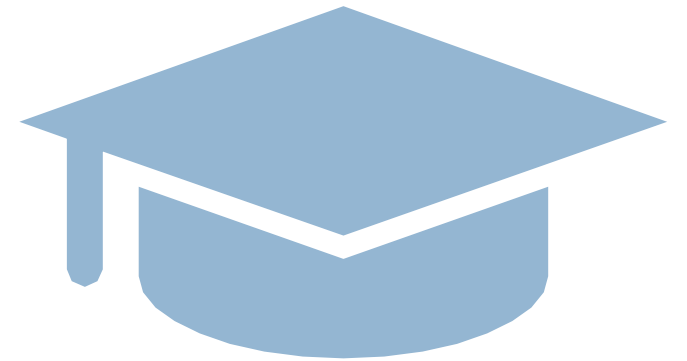
- **CSLO:** Read critically and **communicate effectively as a writer and speaker** on political, philosophical and religious identities and beliefs of the American people over the course of our history and relate them to our contemporary world. (GESLO 1, PSLOs 1, 2, 3 and 4)
- **Sample Assignment 1:** Reading “conversations” **are oral rather than written responses** to literary works. Students are organized into groups, which are assigned specific prompts to respond to in a “live” conversation in the classroom of 25-30 minutes in duration. During the discussion, both the instructor and other students may contribute or ask questions. Prompts are not assigned until 2-3 days before the conversation, so students must read the entire work assigned and get prepared individually and coordinate as a group, with talking points to guide them.
- **Sample Assignment 2: Final Oral Presentation/Debate:** This is the capstone of the course, in which students model multiple political, economic and cultural issues in a fictional scenario based on real events. **For example, students must address the primary ethical decision of the 20th century, the decision to drop the atomic bomb on Japan.** Groups are assigned to address this issue from political, military, and scientific positions. Finally, a judgment is determined, and the decision is reviewed. This assignment requires students to integrate all skills and abilities articulated in the CSLOs.



GE SLO 2:
INFORMATION
LITERACY

Sara Toruno-Conley

At the completion of the LMC GE program a student will be able to evaluate information and its sources critically.





English COR:
GE SLO 2 is
embedded in
course
description,
one CSLO, and
two sample
assignments.



Partial Course Description: Students will produce at least 5,000 words of formal, final draft writing that draws upon the assigned readings as well **as articles that students have researched on their own.**



CSLO: Conduct basic **research using library tools**, incorporating various sources into essays using appropriate documentation format

English COR Sample Assignments

- **Assignment 1:** This assignment requires students include research as a major component of an essay. Leading up to the assignment, students **will learn to search for and evaluate LMC library resources** effectively, **search for and evaluate internet resources effectively**, and integrate sources in essays effectively.
- Task: Write an 8-10-page thesis-driven essay using examples from your course readings and at least **4 sources from the LMC library databases** in response to one of the questions below:
- How is inequality deeply rooted in Bay Area housing (and/or US housing) and what can we do to fix this?
- What 1-3 factors do you think are most responsible for the housing crisis in the Bay and/or California? What solutions can you offer?
- **Research any upcoming or proposed development projects** for your own city/area. Find 1-2 and then form an argument around whether you think the development project(s) should be allowed to go through based on ideas from *Golden Gates* and your own research.

- **Assignment 2:** Online course example:
- This assignment requires students to complete an online module and then quiz to learn how **to quickly evaluate online information** related to an essay topic.
- Task: To complete this assignment, you first need to read through the **Fact Checking module** in order to learn about **misinformation and disinformation** and how it relates to other concepts like fake news. You will also learn a few simple moves to help you **quickly evaluate information you find online**. By the end of the module, you will be able to **move beyond elementary source evaluation tips to fact-check online posts like a pro.**

Bio Break (10 mins)
Enjoy some “funky music!”



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GE SLO 3:
ETHICAL INSIGHT

Ryan Tripp

Students will be able to analyze and address ethical problems with a clear understanding of personal, social and civic responsibilities.





the hypo
@TheHyyype

professor: you're currently failing
your ethics class

me: *slides a \$20 across the desk*
how about now

Ethical Insight CSLOs Examples

CSLO 3 requires students to “analyze Black knowledge production and contributions in American and global society in the academy and in science, technology, film, television, music, art, and social movements and apply standards of **ethical** inquiry to their representation as social and cultural standard.”

CSLO 4 prompts students to “support racial and social justice, liberation, equity, **ethics**, and cultural empowerment in Black communities.”



Additional Information on Ethics

- The fourth CSLO further stipulates that the course analyzes “how **ethical values**, obligations, consequences and the resulting **moral implications** relate to how we are socialized in American society.” Students will “recognize and understand...the American value system.”

METAETHICS

NORMATIVE ETHICS

APPLIED ETHICS

Examples of Reiteration, Multiplicity, and Elucidation

- **Almost every CSLO** indicates, to the point of redundancy, “**ethical** implications of knowledge, decision-making, and actions by utilizing the scientific approach to behavior.”
- The **first sample writing assignment** similarly requires students to “demonstrate the ability to read, think, and communicate effectively about fieldwork, applied anthropology, and the Code of **Ethics**.”
- A clearer example is the **second sample writing assignment**, which prompts students to analyze “the American Anthropology Association (AAA) Code of **Ethics** and...review what actions or measures anthropologists can and will take in the field in order to adhere to the **ethical** guidelines of the profession while actively engaged in applied anthropology.”



GE SLO 4:
**DIVERSE
PERSPECTIVES**

Ryan Tripp

Students will be able to evaluate diverse social, multicultural and/or global perspectives regarding current or past issues and events.





Diverse Perspectives: CSLO and Assignment Examples

The third CSLO stipulates that the curriculum and pedagogy aim to “illustrate the application and significance of Native American/Indigenous **diversity** in a global society to examine and compare relative attitudes and intersections of race and racism, gender roles, sexuality, class, religion, spirituality, ability, age, tribal citizenship, and language in Native American/Indigenous communities.”

The first **sample writing assignment** seeks to address “**diversity**,” requiring students to “compare the experiences of two API groups discussed so far in class in terms of their legal, economic, and social treatment in the U.S.” The **second sample writing assignment** also indicates “**diversity**” as a pedagogical goal, requiring students to demonstrate “how the community actively engages with anti-racist and anti-colonial theory and praxis, as they build a just and equitable society.”

The second sample writing assignment requires students, through collaboration, to “describe and analyze the effects of racial and ethnic **diversity** within contemporary society.”

Example of two GE SLOs in one COOR CSLO and assignment (Combine, Mix, and Match)

Example: The third CSLO similarly states that the course will emphasize “the case history of the Supreme Court as it relates to the development of civil liberties protections, civil rights guarantees, precedent, and the **ethical** implications to **diverse** demographic groups.”

Example: The first sample writing assignment requires students to “analyze **diversity** as well as the social and political construction of race, ethnicity, class, gender, and sexuality and the **ethical** implications of patterns of social and political power that affects these communities.”

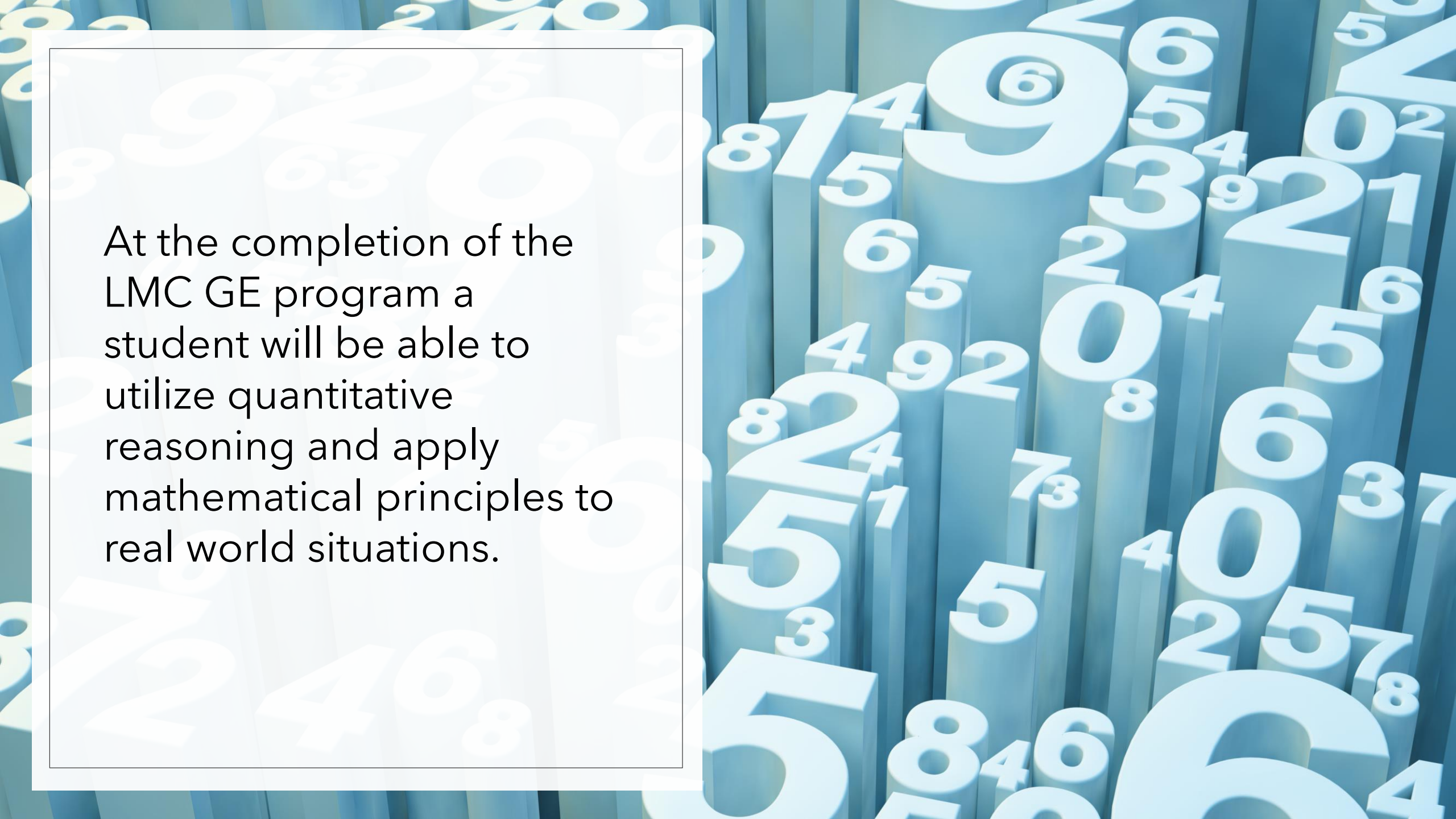
Second
Assignment
Example
(Combine,
Mix, and
Match)

- The first sample writing assignment requires students to “identify and describe rhetorical strategies that illustrate the **common tropes/stereotypes of Native American/Indigenous, Black/African American, Asian American/Asian Pacific Islander, and Chicanx/Latinx communities in popular culture, and more**. Students will discuss the **ethical** implications of such problematic representations and determine if logical fallacies are utilized to create racist arguments and misrepresentations.”



GE SLO 5:
**QUANTITATIVE
REASONING**

Cindy McGrath

The background of the slide is a dense field of 3D-rendered numbers in various shades of blue and white. The numbers are scattered across the frame, creating a sense of depth and movement. Some numbers are larger and more prominent, while others are smaller and more faded. The overall effect is a vibrant, mathematical-themed backdrop.

At the completion of the LMC GE program a student will be able to utilize quantitative reasoning and apply mathematical principles to real world situations.



**When the whole class is fighting
over whether the answer is 17 or 18
but you got 157**



VIA 9GAG.COM

Quantitative Reasoning: CSLO creation & Example Assignment

For CSLOs: Include concepts and examples involving applications of mathematical ideas:

- Apply concepts in various fields of study
- Use formulas to solve problems
- Apply relevant rules of logic/ reasoning
- Use operations to explain/solve problems

Example assignment:

- In finance the “marginal cost” for a producing q items (abbreviated “MC”) is the cost to produce one more item, otherwise known as the derivative at a point. Thus, for a cost function $C(q)$ we say that $MC=C'(q)$. A motorcycle manufacturing company has marginal cost function $MC = 3q^2 - 6q + 9$.
 - (a) Find the total cost function if the fixed costs are 400.
 - (b) What is the cost to make the 21st motorcycle?
 - (c) What is the total cost to make 20 motorcycles? What is the cost per motorcycle?
 - (d) If the manufacturing company sells the motorcycles to the dealer for \$1000 the revenue function would be $R(q) = 1000q$. Sketch a graph including both the cost function and the revenue function and label the break-even point.

Additional Quantitative Reasoning Examples

Assignment 2: Using calculus, find the volume of a cone with radius r and height h . Using proper notation, represent the volume as an integral and evaluate that integral. Show a graph that supports your work.

In Philosophy: Students can analyze logical statements using truth tables or other applicable rules of logic.

2. Determine if the following arguments are valid using a truth table:

- a. $(p \rightarrow q) \rightarrow r, p \therefore r$
- b. $(p * q) \rightarrow r, p \therefore r$
- c. $(p \vee q) \rightarrow r, p \therefore r$



GE SLO 6:
SCIENTIFIC INQUIRY

Sara Toruno-Conley

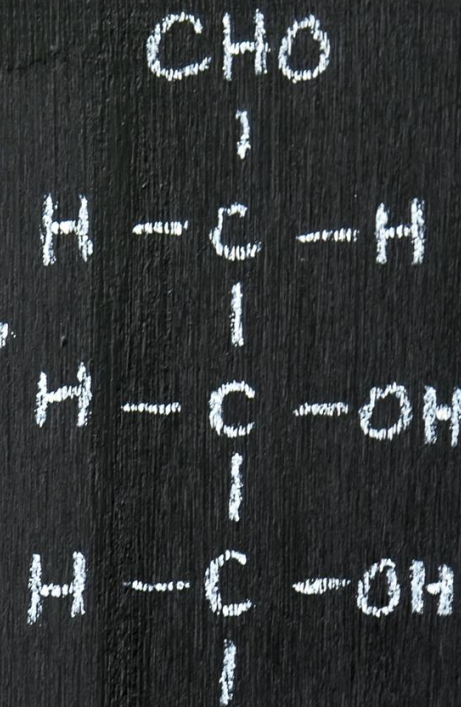
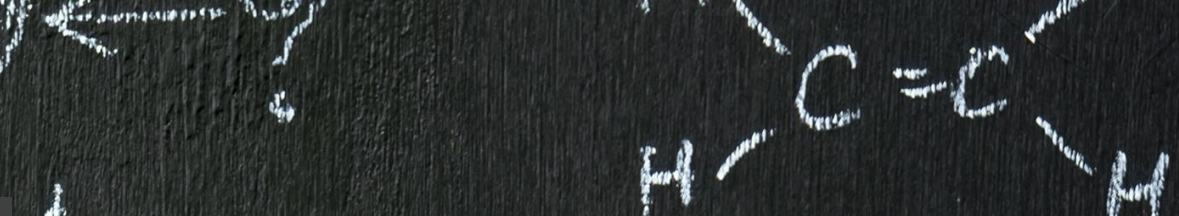


Dear
NASA,

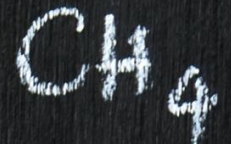
Your mom thought
I was big enough.

Sincerly,
Pluto

At the completion of the LMC GE program a student will be able to apply methods of scientific inquiry in real world situations.

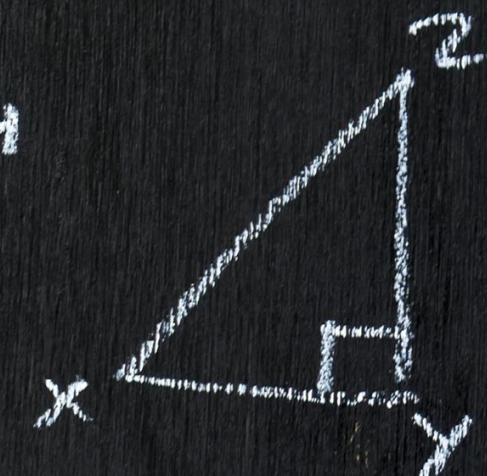


$$n = \frac{w}{M}$$



$$n = \sqrt{(x_2 - x_1)^2 + (y_2 - y_1)^2}$$

CH_2OH



Biological
Science COOR:
GE SLO 6 is
embedded in
course
description, one
CSLO, and one
assignment

Partial Course Description: Weekly laboratory experiments on all major topics will allow the student to use the **scientific method** to gain knowledge and practical experience in the collection and analysis of data, and in drawing appropriate conclusions.

CSLO: Apply **scientific inquiry** to explore biological phenomena, that requires a hypothesis, and data collection with evaluation. Draw meaningful conclusions from the data that distinguishes between **scientific and unscientific concepts** about human biology. Report conclusions orally or in written form.

Biological Science Sample Assignment

- Students will be assigned lab assignments related to the lecture content. For example, students may create their own experiment using the concepts and knowledge of the **scientific method**, solve genetics problems, perform dissections, or other assignments that ask students to consider whether **the scientific method** alone can be relied on to determine the most **ethical ways to use scientific discoveries and knowledge**.
- Example of a Written Lab Summary: Students will utilize **the scientific method** to carry out a correlational research study to determine the relationship between two variables. Students **will develop a hypothesis with prediction**, experimental methodology, collect and analyze data, and draw conclusions based on the data. Students will submit a final summary where they will outline their hypothesis, predictions, methodology, and conclusions in written form.

GE SHOW AND TELL!

Tell us about an assignment that you use in one of your classes that integrates a GE SLO!





QUESTIONS?

[HTTPS://WWW.LOSMEDANOS.EDU/INTRA-OUT/GE/](https://www.losmedanos.edu/intra-out/ge/)