

RHEA PROJECT MA279

DESCRIPTION, GRADING TEMPLATE AND DIRECTIONS

DEPARTMENT OF MATHEMATICS (ULI WALTHER)

1. DEFINITION OF LEARNING OUTCOME

The students should be able to research a given mathematical topic online and in printed matter, identify the key issues, and weave them into a coherent story that reflects the topic as it is known today.

The written communication embedded outcome assessment evaluates the student's ability to carry out this programme on a wiki-style platform. Components of the evaluation are: completeness, style, citations.

2. DESCRIPTION OF ASSESSMENT AND TARGET OF EVALUATION

In the Department of Mathematics Great Issues Course MA27900, the students write an essay in teamwork on the computer system Rhea. The topics are chosen from a given list of possible choices that highlight the interaction of mathematics with science and society.

All students in the same team get the same score.

2.1. Key skills to be evaluated.

- (1) Uses appropriate organizational patterns (introduction, conclusion, sequenced material, transitions, references) that are clearly and consistently observable.
- (2) Uses language (flow of material, grammar, orthography) that is at the level of a popular science book.
- (3) Effectively uses supporting materials such as explanations, examples, illustrations, statistics, analogies, quotations, cross-links with other documents.
- (4) Clearly communicates the connections between the various parts of the essay, and to the literature.
- (5) Gives full credit to external sources, main part of the project written by students (negligible amounts of cut and paste, primarily for quotations).

2.2. Rubriks, grading categories, assessment. There are four grading categories: completeness; presentation; style; referencing.

- (1) Completeness:
 - (a) breadth: does the work reflect the topic in its entirety, are all important issues discussed?
 - (b) is the timeline of development of the topic visible?
 - (c) depth: does each facet of the topic receive the appropriate amount of attention?

- (2) Presentation:
 - (a) correct spelling, grammar?
 - (b) good segmentation, structuring, logic?
 - (c) incorporates images/tables/figures smoothly into the discussion?
- (3) Style:
 - (a) issues clearly stated?
 - (b) are transitions smooth and appropriate?
 - (c) flow of information at appropriate level?
- (4) Referencing:
 - (a) indications of cut and paste?
 - (b) detailed bibliography?
 - (c) cross-references and pointers to other sources for further reading?

Point scheme.

Each category has a maximum score of 2.5. Total max is 10.

Possible scores are 0, 1/2, 1, 3/2, 2, 5/2. The meaning of the numerical scores is as follows:

Point score	Verbal interpretation
0	absent
1/2	inadequate
1	poor
3/2	satisfactory
2	good
5/2	exemplary

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