## Research Rubric

During the ELO process, the student will grow in their **targeted competencies** and build their base of knowledge through research. Research consists of an **active search for new information** and knowledge which includes a focused idea or **Essential Question**, an organized set of personal experiences which can expand or constrain their initial understanding, and the analysis, synthesis, and communication of these experiences.

	Beginning	Progressing	Proficient	Exemplary
Trait I: Does the student gather and use information to guide their learning? (e.g. Expand or refine/narrow learning goals, generate supporting questions or revise EQ, identify additional sources)	The student compiles information related to the general content of their learning goals.	The student uses an information-gathering strategy that allows them to add to their general body of knowledge. The student communicates the relationship between the information and the direction of their learning.	The student formulates information-gathering strategies to focus learning on targeted competencies. The student communicates how they refine their learning based on the information gathered.	The student evaluates and refines information-gathering strategies to maintain their focus on targeted competencies. The student elaborates on connections between the information gathered, how they refine their learning based on information gathered, and possible alternate directions for their learning.
Trait 2: Does the student integrate and apply the information from their research to the ELO processs? (e.g. Reflection, product, research notes, presentation, etc)	The student makes use of applicable terms, concepts, or ideas.	The student makes use of applicable terms, concepts, or ideas. The student describes connections they have found between the information, their EQ, and their learning/project goals.	The student demonstrates a command of applicable language, assesses and organizes the connections they have found between the information and their EQ, and describes how they apply this information to their learning/project goals.	The student demonstrates control of and fluency in applicable language, offers a synthesis of the information with their EQ, and defends how they apply this information to accomplishing their learning/project goals.



	Beginning	Progressing	Proficient	Exemplary
Trait 3: Does the student assess the relevance of the information?	The student uses information in their ELO.	The student identifies information connected to their learning goal and/or essential question.	The student describes their choices to include/exclude information based on relevance to their learning goals and/or essential question.	The student defends the inclusion/exclusion of information based on relevance to their learning goals and/or essential question.
Trait 4: Does the student assess and analyze the credibility of their information?	The student uses information from sources without checking credibility.	The student gathers information while checking credibility of sources.	The student analyzes the validity of information by investigating the degree of objectivity and accuracy of sources.	The student defends the validity of information by evaluating the degree of objectivity and accuracy of sources.
Trait 5: Does the student use a <b>variety</b> of information sources?	The student uses information from a single source.	The student uses information from sources representing a single perspective related to the learning goals.	The student uses information from a variety of documented sources that represent multiple perspectives related to the learning goals.	The student compares and contrasts information from a variety of documented sources that represent multiple perspectives related to the learning goals.



## **ELO Reflection Rubric**

Reflections allow students the opportunity to think about their experiences and "get the learning out" of these experiences. Through reflection, students develop and adjust their **short** and **long term goals**, explore **problems** and **solutions encountered** during their ELOs, and **connect** their experiences to their **learning goals**. Reflections are an important part of the feedback loop between the student and their HQT/mentor. Therefore, sharing the learning with the HQT/mentor in a **timely manner** allows the HQT/mentor to offer formative guidance through timely responses to the reflection, which increases student learning.

	Beginning	Progressing	<b>Proficient</b>	Exemplary
Trait I: How does the student use <b>goal setting</b> to manage his/her learning?	The student identifies short and long term goals.	The student occasionally refers to short-term and long-term goals, and uses them to determine work along the way.	The student regularly refers to short-term and long-term goals, outlines "next steps" for achieving their goals, and uses them to guide their work.	The student regularly evaluates their short-term goals and explains how this leads to successfully meeting their longterm goals, and, based on their evaluation, is able to make adjustments to their work along the way
Trait 2: How does the student connect their experiences with the learning goals?	The student reflects on experiences, but connections to learning goals are not made.	The student reflects on experiences and makes a connection to a learning goal.	The student reflects on and analyzes the connections between specific experiences and learning goal(s).	The student reflects on and analyzes the connections between experiences and learning goals and predicts future behaviors/decisions based on their analysis ("Next time,").



	Beginning	Progressing	Proficient	Exemplary
Trait 3: How does the student deal with the challenges/problems encountered during their ELO?	The student identifies problem(s) encountered during ELO work.	The student describes the identified problem(s) and states possible solution(s).	The student identifies and analyzes problem(s), states solutions, and assesses solutions for the problem(s).	The student identifies and analyzes problems, assesses solutions for the problems, identifies a chosen solution for a specific problem, and evaluates the effectiveness of their choice.
Trait 4: How does the student's thinking develop as a result of ELO experiences?	The student summarizes personal experiences.	The student makes connections between a personal idea and an experience to establish the basis of a reflection.	The student analyzes their own growth by making connections between personal ideas and their ELO experiences.	The student analyzes their own growth by making connections between personal ideas and their ELO experiences, leading them to new perspectives or insights.
Trait 5: How does the student use appropriate language, vocabulary, syntax, and grammar to communicate effectively with the mentor and HQT?	The student demonstrates a lack of control over media-appropriate language including vocabulary, syntax, and grammar. Reflection is not in an organized structure. Errors disrupt the flow of communication.	The student demonstrates inconsistent control of media-appropriate language including vocabulary, syntax, and grammar.  Organization of the reflection's structure may or may not be evident.  Errors detract from communication.	The student demonstrates control of media-appropriate language including vocabulary, syntax, and grammar within an organized structure. Errors do not interfere with communication.	The student demonstrates control of media-appropriate language including vocabulary, syntax, and grammar within an organized structure. Few, if any, errors. Intention of thought is clearly communicated.



## **ELO Project Rubric**

The project is the application of the student's learning and consists of the **process** of designing, creating, implementing, and assessing a **product**, which will be an **artifact** or **event** that the student uses to **demonstrate the culmination of their learning and/or achievement of competencies** related to the ELO. Targeted goals, competencies and Essential Question are identified in the student's ELO learning plan. The product will be an **original piece of work** designed to promote the student's personal growth and/or to benefit a larger community.

The product can be a physical artifact like an art, technical, or craft piece in any appropriate medium. It can be an event like a live or recorded performance or demonstration of skill/competency. The product may be a process, developing an original design of a device, procedure, or system. The product should meet **standards of quality** work deemed appropriate to the student's level of experience by the HQT and/or mentor. The product will be shared with an **authentic audience within an authentic context**. **Feedback** from the specialists, audience and users will be collected by the student.

	Beginning	Progressing	Proficient	Exemplary
Trait I: Does the product demonstrate <b>student achievement</b> of learning goals and targeted competencies?	The product is completed with little, if any, evidence of the targeted goals and competencies.	The product demonstrates connections to the targeted goals and competencies, dependent upon further explanation.	The product independently illustrates relevant connections to all the targeted goals and competencies.	The product illustrates discovery of complexity and/or connectivity of the targeted competencies.
Trait 2: Did the product meet the <b>quality criteria</b> set by the student, mentor and/or HQT?	The product has little, if any, evidence of meeting the design criteria established by the mentor, HQT and student in the plan.	The product meets half the design criteria established by the mentor, HQT and student in the plan.	The product meets all of the design criteria established by the mentor, HQT and student in the plan.	The product meets all of the design criteria established by the mentor, HQT and student in the plan and additionally reflects modifications made in response to authentic feedback.



	Beginning	Progressing	Proficient	Exemplary
Trait 3: How was the product shared with an authentic audience for feedback?	The product has been shared with mentor or HQT for evaluation.	The product has been shared with the mentor or HQT and an authentic user/audience within an appropriate context.  Possible sources of feedback are identified.	The product has been evaluated by the mentor or HQT and an authentic audience within an appropriate environment.  Feedback has been collected.	The product has been evaluated by the mentor or HQT and an authentic audience.  Modifications have been made based on feedback or expert critique and/or the product has been adopted for use by the authentic user/audience.
Trait 4: How does the product reflect the individual voice and worldview of the student?	The product was external to student interest and/or the needs of the user/audience. (product is the result of an assignment)	The product shows evidence of a design based either on the needs of an authentic user/audience or the interest of the student. The product is recognized by the mentor /HQT as an uncommon but successful solution to the design criteria.	The product reflects a fusion of student interest with the needs of the user/audience. The product is recognized by the mentor/HQT as a unique and original solution to the design criteria.	The product reflects a fusion of student interest with the needs of the user/audience. The product is recognized by the mentor/HQT as a unique and original solution to the design criteria and is adopted for use.
Trait 5: How well did the student document the design process (designing, creating, using, assessing and modifying) for their product?	The student creates a collection of artifacts and/or information used in creating the product.	The student creates a collection with appropriate student-created documentation that was used during or describes the process of creating the product.	The student creates a collection of artifacts that was used during or describes the process of creating the product and includes clear representation of feedback.	The student creates a collection of artifacts containing artifacts used during or describing the process of creating the product and includes clear representation of authentic feedback. Student's intentional selection of artifacts illustrates key learning breakthroughs.



## **ELO Presentation Rubric**

The Presentation is designed to assess the student's ability to **clearly communicate** their learning during the ELO process to an audience that could include members who are either expert or novice in the disciplines related to the ELO's goals and/or Essential Question (EQ) identified in the plan.

The presentation should clearly **describe the nature** of the particular ELO: its goals and EQ and the growth in the targeted competencies that resulted from their participation in the ELO process. The student should clearly and accurately **illustrate the development of this growth** during the ELO process (documentation). The student should be also be able to communicate what they learned through the successes and challenges of the ELO experience and **how they changed** as a result of it (**metacognition**).

	Beginning	Progressing	Proficient	Exemplary
Trait I: How well does the student communicate the information using a variety of strategies? (e.g. Eye contact, speaking rate, volume, articulation, enunciation, pronunciation, inflection, voice modulation, intonation, rhythm, and gesture)	The presentation does not communicate intended information because organization, and/or delivery interfere.	The presentation communicates the information, with inconsistent organization, and/or delivery.	The presentation communicates the information through logical organization and clear focus. The student's delivery is appropriate to the audience, context, and purpose.	The presentation communicates the information seamlessly through logical organization, introduction of and clear focus on the topic, smooth transitions, well-chosen supporting details, and a coherent conclusion. The student's delivery uses a variety of strategies to engage the audience and responds to audience cues.
Trait 2: How does the student use supporting materials (e.g. posters, graphics, illustrations, recordings, models, samples, miclamps, videos, PPT, etc.) as part of the presentation?	The student has materials that interfere with their presentation or are not referenced.	The student infrequently references supporting materials, which may or may not add information to the presentation.	The student integrates relevant supporting materials that add or clarify information for the presentation.	The student frequently integrates relevant supporting materials that add or clarify information for the presentation.



	Beginning	Progressing	<b>Proficient</b>	Exemplary
Trait 3: Does the student communicate why they chose this ELO and how they used it to target competencies?	The student identifies the goals of the ELO and/or the targeted competencies.	The student explains the reasons for choosing the goals of the ELO or the targeted competencies.	The student explains the reasons for choosing the goals of the ELO and how the student used the ELO to address the targeted competencies.	The student explains the reasons for choosing the goals of the ELO, communicates how the student used the ELO to address the targeted competencies, and makes further connections to prior and future learning.
Trait 4: Does the student communicate how they used inquiry to address the Essential Question*?	The student makes no reference to the Essential Question.	The student states their Essential Question, but is unable to articulate how it guided their work.	The student presents their response to the Essential Question. The student describes how it guided their work, and whether or not the question changed at all.	The student presents their response to the Essential Question and explains how they used it to generate emerging questions, extensions or crosscurricular relationships.
Trait 5: Does the student use prior work (e.g. reflections, research, and the project) in the presentation?	The student provides examples of 1 of the 3 prior ELO components in describing their learning goals.	The student provides examples of 2 out of the 3 prior ELO components in describing their progress toward achieving learning goals.	The student provides examples of how their research, reflection and project illustrate their progress toward achieving their learning goals.	The student selects and presents examples of how their research, reflection and project are interconnected and describes how each impacted their learning along the way.
Trait 6: Does the student communicate what they learned through their ELO experience?	The student identifies a success or a challenge of the ELO experience without any details.	The student identifies a success and a challenge of the ELO experience, with few details or commentary.	The student communicates what they learned through the successes and challenges of the ELO experience.	The student communicates what they learned through the successes and challenges of the ELO experience and how they changed as a result of their learning.



