Hexagonal Thinking

PROJECT – Project Development Guide with Templates and Examples

ACTIVE LEARNING FOCUS **FEEDBACK FOCUS**

ABOUT THIS RESOURCE

This resource leads you through the process of developing and implementing a **Hexagonal Thinking project tailored to the learning and skill goals of your unit.**

The Hexagonal Thinking strategy combines discussion and debate, critical thinking, and problem-solving. Students move around hexagons labeled with concepts or terms, making connections to build a web from the identified patterns. Students reflect on the connections they identify and assess one another's arguments about how the web should be built. Webs evolve as students move, add, or remove tiles. This project can be done in groups or individually. It can be paired with a writing task or sketch note one pager to encourage reflection and deeper understanding. No two hexagonal webs will look the same, but students must be able to defend their choices, illustrating both the beauty and value of this strategy. (Here's a short video overview of the exercise in class.)

Learning Skill Focus

- Students **identify patterns** between multiple concepts,

- then **take a position** and **assess** one another's **arguments**.

- They practice effective **collaboration** while building web connections

- and **compose reflections** on group responses.

HOW TO USE THIS RESOURCE

Part 1: Review the Example Project to understand the structure and skill goals of the project.

Part 2: Brainstorm your learning goals and content parameters, develop your essential questions, and establish requirements for the final learning artifact.

Part 3: Edit and adapt templates to create your student facing materials for the project.

Part 4: Review the options for differentiation to further tailor the project as needed.

PROJECT DEVELOPMENT GUIDE—TEACHER RESOURCE

PART 1: EXAMPLE PROJECT

HEXAGONAL THINKING PROJECT: *1984* VS. *BRAVE NEW WORLD*

OVERVIEW

Your final project for the dystopian novel unit: *1984* vs. *Brave New World* is a group hexagonal thinking activity, reflection, and gallery walk.

Each group will consider the major themes and literary styles of both texts, **identifying patterns** and discussing connections that you find. You will use your findings to build a connective web of concepts with as many links as possible.

After completing the discussion and web build, you will **take a position** on one essential question and **compose** a response that defends this position with textual evidence while also explaining three of your group's web connections.

On the final day of the project, everyone will participate in a silent gallery walk. Each student will turn in a written "I like" and "I wonder" response related to the hexagonal webs.

ESSENTIAL QUESTIONS

- *What is the social function of the dystopian genre?*

- *How does the theme of a novel reveal an author's attitude towards the world?*

- *What aspect of a dystopia do we have in our society today?*

- *How does propaganda influence the actions of an individual?*

- *How might some aspects of human nature undermine our desire for peace, equality and justice?*

- *Do individuals have the power to change the society in which they live?*

- *What factors or situations combine to create a dystopia?*

PROJECT PROCESS AND REQUIREMENTS

1. I will provide you with twenty-four hexagons. Twelve hexagons will contain concepts from 1984 and twelve will contain concepts from Brave New World. Each hexagon can connect to up to six others.

2. Collaborate with your group to develop a web from the hexagons, by identifying patterns in concepts to form connections. **Your goal is to form the most connections possible, so make sure you rearrange and reconnect hexagons more than once.** Don't let the first arrangement be the only answer! Remember to take turns and listen, as you work to share ideas and assess one another's arguments.

   ○ **Engagement reminder:** the way you contribute may change throughout the activity. At times you should be actively listening. At other times you should be arranging and rearranging hexagons, asking others to explain their positions and/or explaining the position you've taken on the arrangement.

3. After your group feels finished with the hexagonal discussion, attach the hexagon web to the poster board with glue.

4. Compose an individual reflection that takes a position on *one* of the essential questions and explains *three* of the connection choices you made in your hexagonal web. How do the connections you made help you answer the essential question?

   Reflection options:
   ○ a written reflection (typed, double-spaced, 12 point, Times New Roman), or
   ○ a sketch notes one pager that contains a minimum of three drawings

5. Finally, as a class, we will conduct a silent gallery walk. As you walk around the room, review all the hexagonal webs from each group. Use the gallery walk slips to record your "I like" and "I wonder" responses to what you observe.

1984 HEXAGONS

Censorship

Doublespeak

Winston Simon

Big Brother

Surveillance

Propaganda

1984 HEXAGONS

Totalitarianism

"Freedom is Slavery"

Technology

Julia

Telescreens

Rebellion

BRAVE NEW WORLD HEXAGONS

Individuality

Soma

Bernard Marx

Lenina Crowe

Truth

Control

BRAVE NEW WORLD HEXAGONS

Conditioning

Consumerism

John

Caste System

Happiness

Shakespeare

HEXAGONAL THINKING GALLERY WALK SLIPS

HEXAGONAL THINKING GALLERY WALK NAME:	
I like: Group #____ hexagonal web	**I wonder about:** Group #____ hexagonal web

HEXAGONAL THINKING GALLERY WALK NAME:	
I like: Group #____ hexagonal web	**I wonder about:** Group #____ hexagonal web

HEXAGONAL THINKING GALLERY WALK NAME:	
I like: Group #____ hexagonal web	**I wonder about:** Group #____ hexagonal web

HEXAGONAL THINKING PROJECT FEEDBACK GUIDE

HEXAGONAL DISCUSSION

Criteria	Not Yet	On Your Way	Mission Accomplished	Above and Beyond
Focus: Participant focuses on relevant topics during the discussion and moves the groups' work forward towards the goal.	Not demonstrated	Somewhat demonstrated	Demonstrated	Demonstrated in an exemplary manner
Identify Patterns: Participant identifies similarities and draws connections among book concepts, such as setting, characters, and themes.	Not demonstrated	Somewhat demonstrated	Demonstrated	Demonstrated in an exemplary manner
Collaborate: Participant listens actively, asks questions, and shares their perspective, while building upon and integrating multiple views from other group members.	Not appropriate	Somewhat appropriate	Appropriate	Extremely appropriate

WRITTEN RESPONSE

Criteria	Not Yet	On Your Way	Mission Accomplished	Above and Beyond
Plan: Written response demonstrates preparation, organization, and effective use of time.	Not demonstrated	Somewhat demonstrated	Demonstrated	Demonstrated in an exemplary manner
Identify Patterns: Written response clearly and insightfully explains at least three connections from the hexagonal thinking activity.	Not at all clear or insightful	Somewhat clear and insightful	Appropriately clear and insightful	Extremely clear and insightful
Take a Position: Written response thoughtfully answers an essential question and effectively supports that position with references to the texts and the connections made in the hexagonal web.	Reflection is neither thoughtful nor effective.	Reflection is somewhat thoughtful and/or effective.	Reflection is thoughtful and effective.	Reflection is extremely thoughtful, effective, and persuasive.
Compose: Written response is clear, thorough, and focused; writing follows appropriate conventions throughout the response.	Not at all clear, thorough, and relevant. No attention paid to appropriate conventions.	Somewhat clear, thorough, and relevant. Some attention paid to appropriate conventions.	Clear, thorough, and relevant. Sufficient attention paid appropriate conventions.	Extremely clear, thorough, and relevant. Writing expertly follows appropriate conventions.

SKETCH ONE PAGER REFLECTION

Criteria	Not Yet	On Your Way	Mission Accomplished	Above and Beyond
Plan: One pager demonstrates preparation and effective use of time.	Not demonstrated	Somewhat demonstrated	Demonstrated	Demonstrated in an exemplary manner
Identify Patterns: One pager clearly and insightfully visualizes and explains least three connections from the hexagonal thinking activity.	Not at all clear or insightful	Somewhat clear and insightful	Appropriately clear and insightful	Extremely clear and insightful
Take a Position: One pager clearly and effectively answers an essential question and supports that position with references to the texts and the connections made in the hexagonal web.	Reflection is neither thoughtful nor effective	Reflection is somewhat thoughtful and/or effective	Reflection is thoughtful and effective	Reflection is extremely thoughtful and effectively persuasive
Compose: One pager clearly communicates the connection of ideas, including textual support and appropriate images/drawings.	Neither clear nor appropriate	Somewhat clear and/or appropriate	Clear and appropriate	Extremely clear, well-chosen, and appropriate textual supports and images

PART 2: PROJECT BRAINSTORM

Use the prompts below to develop your project and student facing materials

Backwards Design

1) **What should students know and be able to do by the end of the hexagonal thinking project?** Choose content-specific learning goals. (eg. students will be able to make connections between biological terms and concepts, identify and explain patterns in historical events, thematically connect different poetry from the same literary movement, etc.)

2) **What skills should students practice?** As written, the project asks students to collaborate, identify patterns, take a position, and reflect. Select from these or choose additional/different content-specific skill goals (incorporate evidence from a primary source, cite evidence from a peer-reviewed study, etc.).

3) **Develop essential questions related to the learning and skill goals.** Groups will use the list of essential questions as a guide for discussion and making connections. Each student will also choose one of the essential questions to answer in the reflection portion of this project. Check out this resource or this resource for a more thorough explanation and guidance for writing an essential question.

Essential questions should provoke genuine inquiry, be arguable and spark debate, and require students to weigh evidence and justify their answers in response.

-
-
-

4) **Identify your "text" or other content material to develop your hexagons.** This text serves as the source material for the concepts or terms on the hexagons. Typically, this will be a text that your students will have already encountered and worked with, so that this project can be both an assessment *of* learning, as well as an assessment *for* learning.

5) **Determine the format for discussion, reflection, and final response.**

    a) Will the students work as a group or will they be creating individual webs?

    b) Should students include written elements or visual notes along with the web?

    c) How many connections will be required to show evidence of mastery?

    d) What kind of reflection should students complete after making connections? Written response? Group presentation?

6) **How will students share their webs?** (eg. presentation, reading their written responses, gallery walks, etc.)

PART 3: STUDENT FACING MATERIALS

The following pages are templates for you to develop materials for your students. Follow the prompts and use these templates and examples to build a packet of student-facing materials for implementation.

- Complete the project overview page, using your answers to the brainstorm and referring to the example project as needed. Any text in [brackets] will need to be edited by you, according to your project parameters.

- Review the feedback guide templates and edit according to your learning and skill goals.

- Create your hexagons using one of the following resources:

    - hexagon template

    - online hexagon generator

    - Amazon dry erase hexagons

Hexagonal Thinking Project

PROJECT OVERVIEW

Your final project for our unit on [insert answer to 4 from the brainstorm] is a group hexagonal thinking activity, reflection, and gallery walk.

Each group will consider [insert answer to 1], identifying patterns and discussing connections that you find. You will use your findings to build a connective web of elements with as many links as possible.

After completing the discussion and web build, you will choose one essential question to answer and explain [insert answer to 4c] of your group's web connections in a [insert answer to 4d].

On the final day of the project, everyone will participate in a [answer to 7].

ESSENTIAL QUESTIONS

- [write your essential questions in a list here]

-

-

PROJECT PROCESS AND REQUIREMENTS

[Use this space to list specific directions and expectations for the project. See suggestions below as well as the example project for ideas and inspiration.]

1. [additional instructions for the work product as needed for students to demonstrate mastery of learning goals or skills]

2. [requirements for use of the original text or source material: citations, evidence, etc.]

3. [guidelines for group participation and effective collaboration]

4. [sharing or presentation guidelines and tips]

5. [information about target dates, rubrics, or any submission requirements]

<< TEMPLATE >>

HEXAGONAL THINKING FEEDBACK GUIDE

DISCUSSION

Criteria	Not Yet	On Your Way	Mission Accomplished	Above and Beyond
Skill or Learning Goal	Insert performance indicators.	Insert performance indicators.	Insert performance indicators.	Insert performance indicators.
Skill or Learning Goal	Insert performance indicators.	Insert performance indicators.	Insert performance indicators.	Insert performance indicators.
Skill or Learning Goal	Insert performance indicators.	Insert performance indicators.	Insert performance indicators.	Insert performance indicators.

REFLECTION

Criteria	Not Yet	On Your Way	Mission Accomplished	Above and Beyond!
Skill or Learning Goal	Insert performance indicators.	Insert performance indicators.	Insert performance indicators.	Insert performance indicators.
Skill or Learning Goal	Insert performance indicators.	Insert performance indicators.	Insert performance indicators.	Insert performance indicators.
Skill or Learning Goal	Insert performance indicators.	Insert performance indicators.	Insert performance indicators.	Insert performance indicators.

HEXAGON TEMPLATE

Opportunity Education
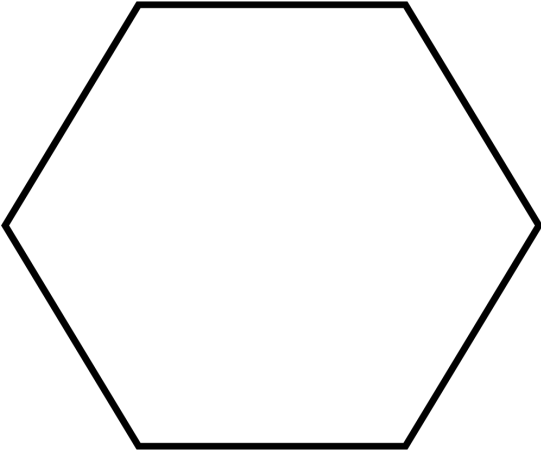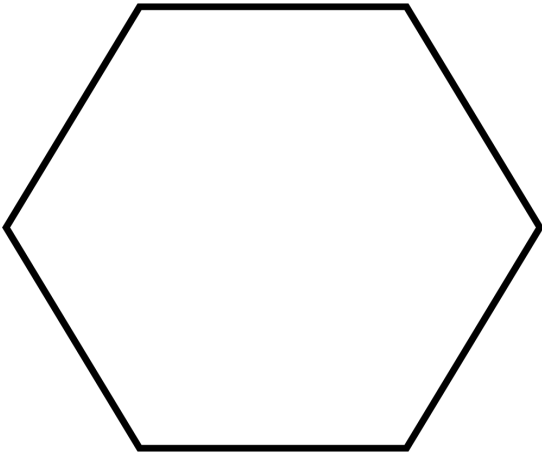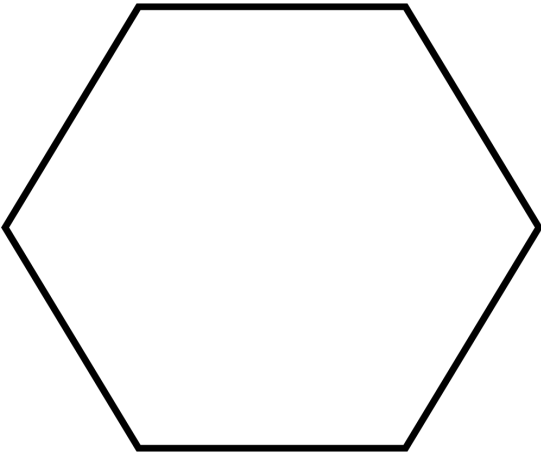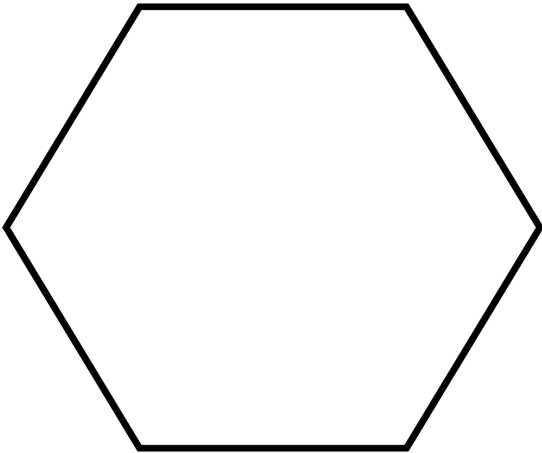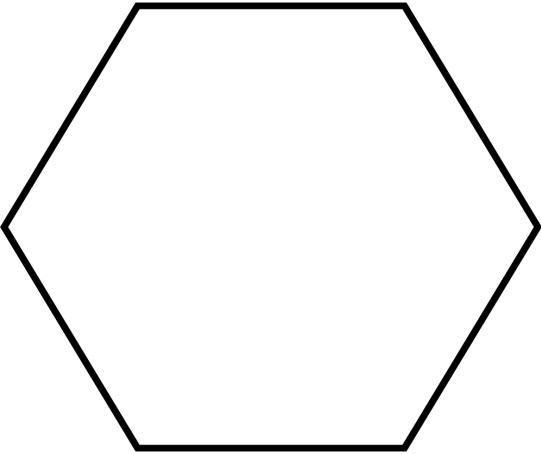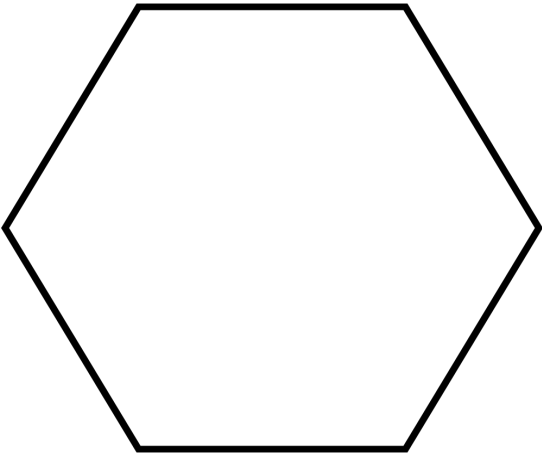
PART 4: DIFFERENTIATION AND FEEDBACK

DIFFERENTIATION

- Allow students to record an explanation instead of writing.

- Reduce the number of hexagons given to students.

- Reduce the number of connections that students have to make.

- Allow students to create their own hexagon concepts.

- Allow students to review a list of hexagon concepts in advance of the activity and review terms or texts as necessary.

FEEDBACK and REFLECTION

- Provide quick and quiet feedback during the discussions. (Circulate to each group; consider preparing questions to guide and structure your feedback.)

- Build in reflection breaks or periodic check-ins; ask students to reflect on how well they understand the concepts and terms in the webs they are building.

- Ask students to reflect on their own participation, and then evaluate how effectively their group collaborated during the activity. (In this case, consider sharing a rubric with students beforehand to make this process more effective.)

Get more resources like this at www.opportunityeducation.org/resources