Goal

To provide a dynamic, interactive, online resource that will enhance and support teaching and learning in Georgia with the Georgia Performance Standards as the main focus.

Georgia teachers are committed to meeting the educational needs of their students and increasing student achievement.

GeorgiaStandards.Org provides the resources necessary for teachers to accomplish their goals.

One Stop Shop for Educators!
Each web page component in this illustration has been numbered. Please refer to these numbers in the pages that follow to locate the details about each web page component shown here.
The topics listed within this menu provide an overview about Georgia Performance Standards and how GPS will be implemented within the Georgia school systems.
Web Page Menus: English Lang. Arts Menu

ELA Frameworks, Plans & Matrices

English Language Arts Standards

These instructional frameworks are intended to be a model for articulating shared goals, assessment processes, and testing activities that can lead to student achievement. The goal is to enable teachers to implement the Georgia Performance Standards for English Language Arts and prepare students for the higher assessments associated with them.

Grades K-5
- Grade K Sample Test
- Grade 1 Sample Test
- Grade 2 Sample Test
- Grade 3 Sample Test
- Grade 4 Sample Test

Grades 6-8
- Grade 6 Sample Test
- Grade 7 Sample Test
- Grade 8 Sample Test

Grades 9-12
- Grade 9 Sample Test
- Grade 10 Sample Test
- Grade 11 Sample Test
- Grade 12 Sample Test

Detailed Lesson Plans for ELA

Georgia Department of Education
Kathy Cox, State Superintendent of Schools
Web Page Menus: Science Menu

Science Standards

Introduction to Science Performance Standards
- Executive Summary

GPS Revisions
- Science Revisions Approved on 7/13/2006

Grades K-5
- Grades K-5 Science Standards
- Aquatic Inquiry: Science Tasks
- Grade 1 Science Tasks
- Grade 2 Science Tasks
- Grade 3 Science Tasks
- Grade 4 Science Tasks

Grades 6-8
- Grades 6-8 Science Standards
- Grade 6 Science Tasks
- Grade 6 Sample Task 1
- Grade 6 Sample Task 2
- Grade 7 Science Tasks
- Grade 7 Sample Task 1
- Grade 7 Sample Task 2
- Grade 8 Science Tasks

Grades 9-12
- Biology Standards with Tasks
- Biology Performance Indicators
- Biology Sample Task 1
- Biology Sample Task 2
- Chemistry Standards with Tasks
- Chemistry Sample Task 1
- Chemistry Sample Task 2
- Earth Systems Standards
- Earth Systems Standards Benchmarks
- Earth Systems Standards Alignment to National Science Education Standards
- Environmental Science Standards
- Environmental Science Standards Benchmarks
- Environmental Science Standards Alignment to National Science Education Standards
- Human Anatomy and Physiology Standards
- Human Anatomy and Physiology Standards Benchmark
- Human Anatomy and Physiology Standards Alignment to National Science Education Standards
- Physical Science Standards with Tasks
- Physical Science Sample Task 1
- Physical Science Sample Task 2
- Physical Science Sample Task 3
Content Specific GPS Training Registration
Provides online registration for all content-specific GPS training sessions scheduled for the 2006-2007 school year.

GPS Redelivery Training Materials - Phase I
Provides access to Presentations, Participant’s Guides and Facilitator’s Guides used in the 2005 training including: Standards-Based Education and the new GPS; Unpacking Standards for Unit Development; Assessment for Learning; Making Instructional Decisions; Differentiation; Teacher Commentary; GeorgiaStandards.Org; and Administrators’ Content-Specific Training.

GPS Redelivery Training Materials - Phase II
Provides access to Presentations, Participant’s Guides and Facilitator’s Guides to be used in Phase II delivery of: Standards-Based Education and the new GPS; Unpacking Standards for Unit Development; Classroom Assessment and Instruction; Making Instructional Decisions; and Administrators’ Content-Specific Training.

School Improvement Division Leadership Training
Provides a link to the materials from training sessions held in Fall 2004 and Spring 2005. The School Improvement Division offers continued Leadership Development sessions for the 2005-2006 year. For details regarding registration for this training, please contact your local RESA.

Georgia Performance Standards Awareness Materials
Provides presentations that can be used in professional development sessions to spread awareness about the Georgia Performance Standards. These presentations explain the new standards, the purpose of the revision, the phase-in and implementation plan, and the redelivery of the initial training.
MyGaDOE Login
Provides access to your own professional workspace where you can search for instructional units, activities, assessments and other resources aligned with the Georgia Performance Standards. It also contains the Unit Builder, an online technology tool that helps you create units and other educational materials directly aligned with the Georgia Performance Standards for your grade and topic.

Feature Articles
Read about what's new and interesting on GPS.

GPS Website Finder
Provides quick access to a number of web locations used by teachers in preparing instructional materials.

Welcome To GeorgiaStandards.Org
Provides quick access to the Georgia Performance Standards in a printable PDF format for English, Mathematics, Social Science and Science in grades K-12.

Support Materials
Provides additional information about Georgia Performance Standards and how they are being phased-in and implemented within Georgia grades K-12.

Parent Information
Provides printable versions of brochures for parents of children K - 8, with a welcoming introduction from Kathy Cox, State Superintendent of Schools. The brochures also contain a listing of all the Georgia Performance Standards for each grade and subject, along with descriptions of the assessments that will be taken throughout the year.

Searchable Digital Library
Currently a placeholder for an easy-to-use tool that simplifies finding standards-based instructional plans and resources aligned to the Georgia Performance Standards.
**GSO Unit Builder Issues**
For any issues, problems or questions directly related to the GeorgiaStandards.Org web site or Unit Builder, please contact any of the department representatives listed under Content Issues.

**Georgia Performance Standards Issues**
For any issues, problems or questions directly related to the Georgia Performance Standards or how they might be implemented within the curriculum, please contact the department representative listed under Standards Issues.
Helpful Links
Provides quick access to a number of reference and resource sites used by teachers and administrators.

Georgia Standards News
Provides a series of news articles concerning a variety of subjects related to GeorgiaStandards.Org, GPS, and technology integration.

Top Picks
Provides quick access to a variety of web-based educational resources that support teachers in creating educational materials and activities.

Georgia Standards Calendar
A placeholder for a calendar that will announce dates concerning GeorgiaStandards.Org events, training schedule, etc.
The GSO Standards Search and Unit Builder offers Georgia educators the right tools for easily building standards-based instructional units as well as for finding standards-aligned resources that support the K-12 curriculum.

This multi-functional tool provides educators with the ability to search for standards using a keyword, subject, and/or grade level approach. Standards and elements are quickly retrieved and clearly displayed in a Results Portlet.

Finding a standard is just the beginning, though. Within the Results Portlet, a user can drill into the standard and find educational resources that are aligned to the GPS for curriculum content standards.

Resources include teaching and learning activities, assessment tools, audio and video files, and interactive instructional websites. All resources are evaluated for their educational relevance, and are hand-aligned by curriculum resource analysts to the GPS.
**GeorgiaStandards.Org Web Page**

1. From the GeorgiaStandards.Org Home web page, find the MyGaDOE LOGIN portal located in the right column.

2. At the bottom of this portal, click on the Sign Up link to create a new MyGaDOE account (see illustration above).

3. A new window now opens that will take you step-by-step through the easy process of signing up for a MyGaDOE account as illustrated in the next two pages.

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**Apply for MyGaDOE Account**

**Step 1**

**Enter User Information**

Type-in the appropriate information for the following fields:

- **First Name:**
- **Last Name:**
- **Email Address:**
- **Confirm Email:**

**Teacher ID:**

Certified teachers, type-in your social security number.
Step 2
Select Districts And Roles

District
Make a selection from the pull-down menu.

School
Make a selection from the pull-down menu.

Step 3
As a result of entering your Teacher ID, the options in Step 3 (Select Application And Roles) are automatically selected for you. Your roles are GSO Unit Builder and Unit Builder.

Step 4

Request Submission Summary

1. Check your entries. If you need to make corrections, click on the Back button and go back to make the corrections.

2. When your information is correct, click on the Submit button located in the lower right corner of the GaDOE Account screen (see illustration above).

3. You will receive an email providing confirmation of your account creation.
After you have received your email confirmation, go to the GeorgiaStandards.Org Home web page and locate the MyGaDOE LOGIN portal. **Type-in** your **Username** (your school email address) and **Password** (provided in the confirmation email). You should now have your own copy of MyGaDOE open on your computer screen (see the illustration below).

**Welcome To Your Own Portal - MyGaDOE**

**Your Own Copy of MyGaDOE**

During the remainder of this training material, we are going to briefly look at how to search for and create standards-based instructional plans.
Using The GSO Standards Search Engine
Search for Standards

**Navigation Menu**

1. Look for the Navigation Menu on the left-hand side of the screen, beneath the name of your school.

2. Move your **mouse over** the GSO menu option (see illustration on right).

3. In the pop-up menu that appears, you can see a number of options.

4. The first two options pertain to different methods to search for information.

5. We will take a brief look at each method.

6. We will start with a search for Standards. **Click on the Standards Search option** (see illustration on right).

7. The GPS Standards Search screen now opens (see the illustration below).

**Ways To Search For Standards**

A) You can search for standards using a criteria of keyword, subject, grade or differentiated. See A in the above illustration.

B) You can also search by browsing a subject area. See B in the above illustration.
Search Using Criteria

1. Using the pull-down menu for Subject, select ... Math.
2. Click your mouse in the check box next to 7 in the Grades section (see illustration on right).
3. The results of the search are now shown in the right-hand column of your computer screen.
4. Please note that 15 standards have been returned.

Closer Look At A Standard

You can now take a closer look at a standard and the instructional plans aligned with it by clicking on either of two Links. The first Link is the underlined alphanumeric abbreviation for any given standard, located in the upper-left corner of the standard listing in the Results Portal. The second Link is the magnifying glass icon located in the upper-right corner. Go ahead and click on either ... M7A3 ... or ... the magnifying glass icon (see the illustration below).

Resources Aligned With The Standard

You should now be looking at the standard and all the other instructional plans that have currently been aligned with it, including:

- Unit Development Template
- Assessment Development Tool
- Teaching Activity
- Performance Task
- Learning Activity
- Aligned Resources

The list of aligned instructional plans will increase over time.
Search by Using - Browse Standards

Now let’s take a quick look at the second way to search for standards, by browsing through a subject.

When you first view the Browse Standards Portlet, you will see four subject “folders” displayed (see illustration in upper right).

Search Using Major “Folder”

- Click on the main Math “folder”.
- The results are now displayed in the right-hand column.
- Note that 329 standards are associated with Math.
- See the illustration on the right.

Expand “Major Folder”

- In the section above, the Math “folder” automatically expanded as you clicked on it to search.
- If a “folder” is collapsed, you can expand it by clicking on the + symbol next any folder to expand it (see arrow).
- As you can see, there are many sub-folders within the Math “folder”.
- See the illustration on the right.

Search Using Sub-“Folder”

- Click on the Core Mathematics 1 sub-folder.
- The results are now displayed in the column on the right.
- Note that only 10 standards are associated with this sub-category.
- See the illustration on the right.
- As your search criteria become more focused, so do the results that stem from your search.
Search for Resources

Navigation Menu
1. Return to the main page on the MyGaDOE site.
2. Look for the Navigation Menu on the left-hand side, beneath the name of your school.
3. Move your mouse over the GSO menu option (see illustration on right).
4. In the pop-up menu that appears, select the Resource Search option.
5. The GPS Resource Search window now opens (see illustration below). It is very similar to the Search Standards window that you saw earlier.

GPS Resource Search
1. You can use the keyword, subject, Differentiate and Grades search criteria just as with the Search Standards window.
2. With Resource Search, you can also use the pull-down menu in the Format field as a search criteria (see illustration below).
Search for Units - Linked to Standards

Search for Standards First

1. Now let's search for instructional plans associated with a standard.
2. We are going to search for the standard first because they serve as the foundation upon which Units are built.
4. Look for the Navigation Menu on the left-hand side, beneath the name of your school.
5. Move your mouse over the GSO menu option.
6. In the pop-up menu that appears, select the Standards Search option. (see illustration in upper right).
7. You should now be looking at the GPS Standards Search screen, as shown in the illustration on the right.
8. Use the Subject pull-down menu and select ... Math (see * in illustration).
9. Click your mouse in the check box next to 7 in the Grades section.
10. Click on the Search button.
11. You should now see the results of the search, with 18 standards being displayed. See the illustration below.

12. For this example, let's assume that you are interested in finding Units aligned with standard M6A2. Click on the link ... M6A2 ... highlighted with an arrow in the illustration below. The result is displayed on the next page.
All Components Linked to Standard

13. You are now looking at all instructional plans that are associated with the standard you just selected. There are five portlets containing different instructional aspects. See the illustration and text display in A Closer Look below.

14. After you have read the text in the Closer Look section below, click on the Direct Proportion listing in the Unit Development Template Portal (B). See the arrow in the illustration.

15. The results are displayed on the next page.

A Closer Look
The letters below correspond to the letters in the illustration above.

A) The details of the M6A2 standard are displayed along with administrative data in the top Portlet.

B) The Unit Development Template Portlet displays all Units that are aligned to the given standard and that have been approved by the Georgia State Board of Education. Each Unit contains a number of related instructional plans as sub-sets of the Unit. These sub-sets include performance tasks, assessment tools and teaching activities, which can also be entered as independent instructional plans and will be displayed in portlets illustrated above in C, D, and E.

C) The Performance Task Portlet displays all approved Performance Tasks that are aligned to the given standard and that have been entered separately from the Unit Development Template. In the near future, performance tasks listed within Units will also be listed as separate items in this Portlet.

D) The Assessment Development Tool Portlet displays all approved Assessment tools that have been aligned to the standard and that have been entered separately from the Unit Development Template. In the near future, assessment tools listed within Units will also be listed as separate items in this Portlet.

E) The Teaching Activity Portlet displays all teaching activities that have been aligned to the standard and that have been entered separately from the Unit Development Template. In the near future, teaching activities listed within Units will also be listed as separate items in this Portlet.
16. The result from your selection in item 14 on the previous page should now be displayed on your screen and is represented in the illustration below. This screen displays the Unit Development Template aligned with the standard you started your search with.
Working With Groups

The MyGaDOE Portal provides the capability to create and join Groups so that you can work collaboratively with others to create or view instructional plans. On the Home page of MyGaDOE, within the Navigation menu - GSO pop-up menu, there are two options that address the needs of working with Groups (see illustration on right):

**Group Search** - Search for, list, join/leave all existing Public Groups.

**Manage Groups** - Provides the capability to create and set specifications for a Group.

In the current version of MyGaDOE, all Groups are designated as Public, which means anyone can join any group. In a future release, Private Groups will be implemented.

**Group Search**

1. From the Home page in MyGaDOE, place the mouse over the GSO option in the Navigation menu.
2. In the pop-up menu that appears, select the Group Search option.
3. The window that now appears displays a scrolling list of all Public Groups. As you can see, there are columns to help describe characteristics of each Group including; Group Name, Administrator, Subject; Grade, Join/leave, Access Type and Privileges. See the illustration below.

4. You can join a Group by clicking on the + icon in the Join/Leave Group column, corresponding to the group you want to join.
5. The Administrator (creator) of the Group determines what privileges the group will have. Please note the different icons in the Privileges column.
6. Click on the Legend icon in the upper right corner (see arrow in illustration) to see a list of what the various icons represent. Close the Legend window when finished.
Working With Groups

Manage Groups

1. From the Home page in MyGaDOE, place the mouse over the GSO option in the Navigation menu.
2. In the pop-up menu that appears, select the Manage Groups option (see illustration on right).
3. The window that now appears contains all the fields that you will need to create a new Group, including Group descriptors and privileges (see illustration below).

4. **Group Name field.** When you are ready to create a Group, please type-in a name that is both specific and descriptive of the primary purpose of the Group. Please take a moment and look on the previous page of this document to note that the listings for Group Search do NOT contain a description but rather do display ... Group Name, Subject and Grade ... to serve as descriptors of the Group.

5. **Group Description field.** In this version of MyGaDOE, this description field appears only on this screen.

6. **Names field.** Clicking on the Browse button opens a window that displays an indexed list of everyone who has a MyGaDOE account. Simply click on the name of the persons you want to add to the Group and their names will appear in the Names field.

7. **Grades field.** Click on the Grade you want to include as a Group descriptor and then click on the Right arrow button to add it. You can add multiple Grades.

8. **Subjects field.** Click on the Subject you want to include as a Group descriptor and then click on the Right arrow button to add it. You can add multiple Subjects.

9. **Privileges field.** Privileges are assigned to the group as a whole, not to individuals. Clicking on the pull-down menu provides the following options. **View** - group members can only look at postings, with the Administrator adding instructional plans. **Create** - can View and Create or include instructional plans. **Collaborate** - can View, Create and work collaboratively with other group members on instructional plans.

10. **Units field.** This is the area where a list of the group Units will be displayed.
GSO Unit Builder
My Unit Builder

Create New

In this section you will see how the Unit Builder is used to create new instructional plans.

1. From within the MyGaDOE workspace, select the GSO option in the Navigation Menu.

2. From the pop-up sub-menu that appears, select the Unit Builder option.

3. Click on the Create New pull-down menu and select ... Unit Development Template (see #1 in the illustration on the right).

4. Click on the Create button (#2 in illustration).

5. You should now see the Unit Development Template open on your computer screen (see the illustration below), in the form of a summary page view.

6. In the following pages we will go through each of the 8 sections listed here, looking at the type of information required within some of the more important fields within each section.

7. You can complete these sections in any order you wish. To follow the suggested approach to design, you might begin with the Understandings and Goals section, followed by Assessment, then flush out content and strategies.

Unit Development Template - 8 Sections
Introduction to the Text Editor

As you begin to work with the Unit Development Template and each of its eight sections, you will notice that one of the most common methods to make field entries is with the use of a text editor. The Unit Builder Text Editor includes the simple functions found in most text editors. The numbers below correspond to the Text Editor Tool icons in the illustration above.

1. **Cut** - First select text by highlighting it, then click on the Cut icon to cut the text from the Editor.
2. **Copy** - First select text by highlighting it, then click on the Copy icon to place it into the computer's Clipboard (memory). Then click the cursor where you would like the text. Now use one of the three Paste icons.
3. **Paste** - Paste function that carries over text formatting characteristics.
4. **Paste From Word** - Paste function that carries over formatting and Word objects like tables. Text copied from Word may contain many “hidden” Microsoft formatting characteristics that other programs may not interpret correctly.
5. **Paste Plain Text** - Paste function that completely strips out all formatting.
6. **Find & Replace** - A pop-up window opens providing the ability to search for or replace word(s). It is typical of what you find in most text and word editors.
7. **Hyperlink Manager** - Allows you to embed a link to an email address, URL or file.
8. **Remove Link** - Removes a selected link that has been previously created within the Editor.
9. **Bold** - Highlight text and click on this icon to convert to a bold font style.
10. **Italic** - Highlight text and click on this icon to convert to an italic font style.
11. **Underline** - Highlight text and click on this icon to convert to an underlined font style.
12. **Numbered List** - Highlight text and click on this icon to create a numbered list.
13. **Bullet List** - Highlight text and click on this icon to create a bulleted list.
14. **Print Content** - Click on this icon to print the contents of the Text Editor.
15. **Spellchecker** - Click on this icon to check the spelling within the Text Editor.
16. **Image Manager** - Click on this icon to insert an image into the Text Editor. The pop-up window provides the ability to Browse a public image folder associated with the Unit Builder. You can also upload an image from your computer into this public folder and insert it into the Editor.
17. **Text Field** - You can type-in or paste-in text and use any of the tools in the Editor.
Introduction Section

Purpose of Section
To provide a general description of the Unit Development Template and the Unit Development Template's author(s).

Although the Introduction section is listed first, if you are planning and designing as you type, you may want to start with the Understandings and Goals section, in order to clearly establish and identify enduring understandings and essential questions / primary learning goals.

Section Fields
The following fields are contained in the Introduction section. Details of the second filed - Annotation - are contained in the next few pages.

1) Unit Framework Title
2) Unit Development Template Annotation
3) This Unit Development Template is differentiated for (Optional)
4) Subject(s)
5) Topic(s)
6) Grade(s)
7) Approximate Duration for the Unit Development Template
8) Alternate E-mail Address (Optional)
9) Additional Authors (Optional)
10) Author

Please note that all fields marked with a red * are required if you plan to submit the Unit to the DOE for approval. Missing information will not prevent you from saving the Unit for your own use.
Introduction Section

Unit Development Template Annotation

This field is used to provide a summary of what the Unit is about. The first 150 characters are displayed in the results of a Unit Search. Best Practice Annotation Characteristics are provided along with representative examples from subject areas.

Editor for Unit Development Annotation

Best Practice - Annotation Characteristics

Consists of an overview that describes the primary focus of the unit with enough detail that another teacher will have a reasonable idea of the unit’s content and activities. At a minimum, this section should include the following characteristics:

- A sentence or two that briefly summarizes the unit content or provides a list of unit topics.
- Indication of grade level and placement of the material within the school year. Some subjects may require close alignment to specified units within the Year Curriculum Map.
- A sentence or two about the learning activities.
- A sentence or two about how mastery of learning will be demonstrated.

Example of Math Unit Annotation

This unit addresses concepts and applications of number theory. Number theory allows students to reason, discuss, make sense of and justify their thinking. This is the 2nd unit of the sixth grade mathematics framework within the Year Curriculum Map.

Students play games that are based on number theory, work and debate with their peers and share ideas through a teacher-facilitated whole class discussion.

In order to demonstrate mastery of the learning in this unit, students explain the Fundamental Theorem of Arithmetic to a friend who has been absent for the unit and also solve a puzzle involving factors, multiples and prime numbers.
Introduction Section

Unit Development Template Annotation

Example of English Language Arts Unit Annotation
The focus of this unit is the use of informational text in reading and writing. Students will investigate informational texts, using them to develop understandings and expertise on topics or areas of interest. This is the 2nd unit of the fourth grade English Language Arts framework within the Year Curriculum Map.

As part of this unit, students will analyze informational text structures and read and produce a series of informational writings, including reports, procedures, and types of correspondence. Small groups will discuss the various topics and offer suggestions for investigative research to advance the students' knowledge.

Students will also receive an introduction to the process of research and how it can be used as part of creating activities for Science Fairs and Social Science projects. Students will reinforce their speaking and listening skills by participating in a series of informal and formal presentations in which they present their reactions through electronic media and oral text. Students will also act as critical listeners and responders to these presentations by using scoring/evaluation rubrics for the presentations.

Example of Science Unit Annotation
This unit in Biology is focused on organization, that life is organized at all levels from cells to biosphere. It is the 1st unit in the Biology Course Map. The topics include: Cell structure and function; Evolutionary History; History of Life; Classification of Kingdoms; Ecosystem structure and Viruses.

There are several teaching strategies that are used throughout the course including: lab notebook or field sketchbook; ticket out the door; KIM diagrams; jigsaw activities; cloze; gallery or poster walk; flapbook or flipbook; 10-2 lecture format; glaze the doughnut; name jar; KWL; and acrostic.

Balanced assessment includes a variety of methods including informal observations; selected responses; constructed responses; and performance assessments.
Standards Section

Purpose of Section
To provide a list of the standards to which this Unit Development Template is aligned. Georgia Performance Standards are required.

Section Fields
The following fields are contained in the Standards section. An overview is presented on the next few pages.

1) Focus Standards
2) Complementary Standards (Optional)
3) National and/or Local Standards (Optional)

Please note that all fields marked with a red * are required if you plan to submit the Unit to the DOE for approval. Missing information will not prevent you from saving the Unit for your own use.
Focus Standards

Purpose
To search and select Georgia Performance Standards (GPS) from a list so that the primary focus of this Unit is clearly identified and aligned with the GPS. The Focus Standards field is shown in the illustrated below.

How To Use This Field
- The Focus Standards field is initially displayed as shown in illustration #1.
- **Click on the green Search button** (see * in #1).
- The Criteria Selection screen shown in illustration #2 now opens.

- For the purpose of this exercise, **select Math from the Subject pull-down menu**. See illustration #2.
- **Click the mouse in the check box for Grade 7**.
- **Click on the Search button**, located in the lower-left corner (see * in #2).
- The search results are now displayed based on the criteria selected. See illustration #3.
- During your own search, you would now carefully read the displayed list of standards.
- You would then click the mouse on the check box located to the left of each standard that you want to include with the Unit Development Template.
- Finally you would click on the **green Select button** located in the lower-left corner (see #3, lower-left).
- You have now indicated the Georgia Performance Standards that your Unit will be aligned with.
Understanding and Goals Section

Purpose of Section
To provide information about the Unit themes and concepts, primary learning goals, and additional learning goals.

If you are planning and designing as you type, you may want to start with this Understandings and Goals section, in order to clearly establish and identify enduring understandings and essential questions / primary learning goals.

Section Fields
The following fields are contained in the Understandings and Goals section. An overview is presented on the next few pages.

1) Unit Understandings, Themes, and Concepts
2) Primary Learning Goals
3) Additional Learning Goals

Please note that all fields marked with a red * are required if you plan to submit the Unit to the DOE for approval. Missing information will not prevent you from saving the Unit for your own use.
Understanding and Goals Section

Unit Understandings, Themes and Concepts

This field provides the deep understandings and concepts the student should retain as a result of this Unit. Best Practice “Understandings” Characteristics are provided along with representative examples from subject areas.

Best Practice - “Understandings” Characteristics

Statements of understandings are characterized as...

- A specific, full-sentence statement that summarizes an insight that a student is expected to take away
- A specific inference that students must draw, realize, or grasp, based on learning
- An insight that links particular facts and skills to "big ideas" in meaningful ways that relate to the “real-world”
- Priority insights students are expected to leave with

Try to avoid ...

- Vague generalities
- Truisms - statements true by definition
- Merely restating the topics or standards
- Using the word “understand” when you really mean “knowledge or skill”

Example of English Understandings, Themes and Concepts

- We can develop our knowledge and expertise of various topics by reading and writing informational texts.
- Interpreting graphic features leads to a deeper understanding of informational texts.
- The research process can help answer questions and solve problems.
- Using a variety of resource materials (electronic and print media) can enrich one’s understanding of a topic.

Example of Math Understandings, Themes and Concepts

Enduring Understandings

- Factors and multiples are related in ways that are similar to the way that multiplication and division are related.
- All natural numbers greater than one are either prime or can be written as a unique product of prime factors.
- The number 1 (one) is always a factor of any number.
Unit Understandings, Themes and Concepts

Example of Science Understandings, Themes and Concepts

Enduring Understandings

Students will understand that:

- Cells have particular structures that underlie their functions.
- All cells are composed of many different molecules that are organized into specialized structures that carry out cell functions.
- Cells can differentiate and complex, multi-cellular organisms are formed as highly organized arrangements of differentiated cells.
- Cellular processes of prokaryotic and eukaryotic cells are similar in spite of their structural differences.
- Organisms carry out common life processes differently.
- The millions of different species of plants, animals and microorganisms that live on earth today are related by descent from common ancestors.
- The great diversity of organisms is the result of more than 3.5 billion years of evolution that has filled every available niche with life forms.
- Modern classification systems, 6 kingdoms and 3 domains, are based upon biochemical and genetic evidence that indicates evolutionary relationships.
- Viruses are complex structures and their evolutionary relationship is still under investigation.
- All organisms and systems are organized from simple parts into complex systems that must maintain homeostasis.
Understanding and Goals Section

Primary Learning Goals

This field provides a list of the Essential Questions, Knowledge and Skills the student will know, understand, and be able to answer or demonstrate as a result of this Unit. All Primary Goals must be related to standards addressed in the Unit. Best Practice Primary Learning Goals Characteristics are provided along with representative examples from subject areas.

Best Practice - Primary Learning Goals Characteristics

Essential questions generally...
- Go to the heart of a discipline
- Address conceptual or strategic elements
- Promote inquiry and "uncoverage" of a subject
- Recur naturally
- Raise other important questions
- Do not yield a single straightforward answer (like yes or no answers)
- Elicit different plausible responses

Example of English Primary Learning Goals

Primary Learning Goals or Essential Questions:
- How do informational and narrative texts differ? What accounts for these differences?
- How do your goals and purposes for writing or reading shape and define how you approach these processes?
- How can you become an expert on a topic?
- How do text structures help you understand texts? How do the text structures of information texts differ from other forms of writing?
- How can we use the research process to communicate what we learn about a subject or issue?
- How can we become critical listeners and responders to presentations of information?

Example of Math Primary Learning Goals

Essential Questions:
- How are multiplication and division related?
- How are factors and multiples related to multiplication and division?
- When or why would it be useful to know the factors of a number?
- When or why would it be useful to know the multiples of a number?
- What features does a number have if the number is prime?
- What role does the number 1 have when you are finding factors of any number?
Primary Learning Goals

Example of Science Primary Learning Goals

Essential Questions:
- Why do scientists organize living things into groups?
- How do scientists organize living things into kingdoms?
- How do scientists collect and organize data?
- How do different types of evidence alter the way in which scientists organize living things?
- How does geologic evidence enable scientists to organize living as well as extinct organism?
- How are domains organized?
- How are molecules organized into living organisms?
- How are cells organized?
- How are simple organisms organized?
- How are prokaryotic and eukaryotic cells organized differently?
- How are plant and animal cells organized differently?
- How are cells organized into complex organisms?
- How is a scientific theory developed?
- How was information about evolution organized into a theory?
- How is the biosphere organized?
Purpose of Section
To list and describe the assessments for learning that will be used for this Unit Development Template. These may include formal, concrete methods and informal methods. Also list any attachments and web resources that will be used. Documents such as quizzes and checklists may be saved as separate files and attached.

Section Fields
The following fields are contained in the Balanced Assessment for Learning section.

1) Assessment Method/Type
2) Assessment Title
3) Description/Directions
4) Attachment Title (Optional)
5) Attachment Description (Optional)
6) Attachment (Optional)
7) Web Resource Title (Optional)
8) Web Resource Description (Optional)
9) Web Resources (Optional)

Please note that all fields marked with a red * are required if you plan to submit the Unit to the DOE for approval. Missing information will not prevent you from saving the Unit for your own use.
Assessment(s) for Learning Section

Best Practice - Assessment Characteristics

- Incorporate the six facets of understanding with a design that provides opportunities for students to explain, interpret, apply, shift perspective, empathize, and self-assess
- Use multiple forms of assessment to let students demonstrate their understanding in various ways
- Use authentic performance tasks asking students to demonstrate their understanding and apply knowledge and skills
- Use clearly stated performance criteria for teacher, peer, and self-evaluations of student products and demonstrations
- Use ongoing assessments for feedback and adjustment
- Use assessments to document and celebrate progress
Unit Performance Task(s) Section

Purpose of Section
To provide information about the culminating Unit Performance Task.

Section Fields
The following fields are contained in the Unit Performance Task section.

1) Unit Performance Task Title
2) Description/Directions
3) Rubric for Performance Task
4) Student Directions, Graphic Organizers, Templates, etc. (Optional)
5) Student Handout (Optional)
6) Web Resource Title (Optional)
7) Web Resource Description (Optional)
8) Web Resources (Optional)

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Unit Performance Task(s) Section

Description / Directions

Provide a detailed description and complete directions so the Unit Performance Task will provide accurate results for any teacher wishing to replicate it.

Best Practice - Unit Performance Task Characteristics

- Use authentic culminating performance tasks calling for students to demonstrate their understanding and apply knowledge and skills to “put together” the substance of the unit’s content
- Must include all Focus Standards for the unit and may also include Complementary Standards.
- Incorporate the six facets of understanding with a design that provides opportunities for students to explain, interpret, apply, shift perspective, empathize, and self-assess
- Use clearly stated performance criteria for all forms of evaluation of student products and demonstrations

Example of Science Unit Performance Task

Unit Performance Task One - Identification of a New Organism

Given the handout pertaining to the task, students will create a new organism. These organisms will need to have the following items addressed in the essay that will accompany the model or drawing:
- Classify into a Kingdom (this will include cell type, complexity, life processes)
- Create a cladogram to show evolutionary history of a derived characteristic
- Identify this organism’s role in the environment (what would be its niche)
- Provide it with a scientific name
- Provide a model or drawing depicting this organism

Unit Performance Task Two - Outbreak at Hightide High School

Given the handout pertaining to the task, students will ...
- Identify the organism that is responsible for the illness
- Classify organism into proper kingdom
- Describe cell type and life processes
- Describe best environment for this organism to thrive
- Format for submitting the findings should be in a “press release” or CNN style breaking news story
**Example of Math Unit Performance Task**

There are four children in the Archer family. All four children must take a bath prior to going to bed each night. Each child bathes separately and drains the tub before the next child takes a bath. Mom says each child may only fill the bathtub half full of water. Mom also says that she wants to make sure that all children spend enough time in the bathtub to bathe the entire body. Bedtime is 9:00 p.m. In this activity we will investigate what time the children would need to start bathing in order to be in bed on time. (Round answers to the nearest tenth).

a) What information is necessary to start solving this problem?

b) If their bathtub is 60 inches long, 32 inches wide, and 20 inches high, how many gallons of water will each child use? (One cubic ft of water is 7.48 gallons of water.)

c) If it takes 30 seconds for three gallons of water to enter the bathtub, what is the constant rate in gallons per minute at which the bathtub fills with water? Use an algebraic equation to express the relationship between volume and time.

d) Use a table and a graph to illustrate the relationship of the volume and time as the bathtub fills. Describe this relationship. Is this relationship directly proportional? Explain why or why not.

e) How many minutes would it take for the water to begin flowing over the top edge of the tub? Justify your answer.

f) The water will drain out of the bathtub twice as fast as it took to fill the bathtub. How long does it take to drain the bathtub after a bath?

g) As the tub drains, is the relationship between the time and the volume inversely proportional? Justify your answer.

h) What time would the children need to start to bathe to get to bed by 9:00 p.m.? What mathematical concepts/operations did you use to solve this problem?

i) On Saturday, the children are responsible for seeing that the bathroom is cleaned. If the job of cleaning the bathroom takes 60 minutes, find how long it will take if 1, 2, 3, or 4 children help clean the bathroom. Graph this data. Is the relationship between the number of children and the time to clean the bathroom an example of direct or inverse variation? Explain your answer.

<table>
<thead>
<tr>
<th># of children</th>
<th>Minutes</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td></td>
</tr>
<tr>
<td>2</td>
<td></td>
</tr>
<tr>
<td>3</td>
<td></td>
</tr>
<tr>
<td>4</td>
<td></td>
</tr>
</tbody>
</table>
Example of English Unit Performance Task

Unit Performance Task One
Students will select a fairy tale to rewrite from the villain’s/antagonist’s point of view. Students will develop a plot that allows the villain/antagonist to argue that he/she is innocent. Plot development will include evidence that supports this argument as well as stylistic devices common in narrative texts. Narrative will include: 1) strategies that engage the reader, 2) strategies that help the reader visualize what is going on.

Unit Performance Task Two
Students will select an issue to argue for or against in a persuasive essay. This essay will; clearly state their position, provide supporting evidence gathered from research and address possible counter arguments, and employ a variety of stylistic techniques found in effective persuasive texts.
Unit Performance Task(s) Section

Rubric for Performance Task

Best Practice - Rubric Characteristics

A rubric is a criterion-based scoring guide, which enables a person to make reliable judgments about student work. A rubric assesses one or more traits of performance. The rubric answers the question: What does understanding or proficiency for an identified result look like (and varying degrees thereof)?

A typical rubric:
• Identifies the key traits to be examined and assessed
• Uses a scale of different achievement levels to measure these key traits
• Provides indicators or key performance features for each achievement level to specify the minimum criteria necessary for that level
• Each level of scoring is labeled with a “descriptor” to facilitate communication regarding student performance

Some Unit Performance Tasks may not lend themselves to using a Rubric, perhaps because a definite correct/incorrect solution is required (e.g., in the case of a math problem). In other cases, you may feel that each teacher must determine the level of mastery, based on individual class needs. However, in all situations, it is recommended that criteria or guidelines be included to identify the appropriate process, procedure or salient characteristics for assessment.

Example of Science Rubric

Rubric for Outbreak at Hightide High School

<table>
<thead>
<tr>
<th></th>
<th>4</th>
<th>3</th>
<th>2</th>
<th>1</th>
</tr>
</thead>
<tbody>
<tr>
<td>Safety Procedures</td>
<td>At least four necessary safety procedures were correctly identified</td>
<td>Three safety procedures were correctly identified</td>
<td>Two safety procedures were correctly identified</td>
<td>One safety procedure was correctly identified</td>
</tr>
<tr>
<td>Outbreak Epicenter</td>
<td>The epicenter was correctly identified and at least three supporting facts were used to defend the choice.</td>
<td>The epicenter was correctly identified and at least two supporting facts were used to defend the choice.</td>
<td>An incorrect epicenter was identified and at least three supporting facts were used to defend the choice.</td>
<td>An incorrect epicenter was identified and at least two supporting facts were used to defend the choice.</td>
</tr>
<tr>
<td>Organism Identification</td>
<td>The kingdom was correctly identified and at least three supporting facts were used to defend the choice.</td>
<td>The kingdom was correctly identified and at least two supporting facts were used to defend the choice.</td>
<td>An incorrect kingdom was identified and at least three supporting facts were used to defend the choice.</td>
<td>An incorrect kingdom was identified and at least two supporting facts were used to defend the choice.</td>
</tr>
<tr>
<td>Initial Prediction</td>
<td>An initial prediction paragraph was turned in on Day One.</td>
<td>N/A</td>
<td>N/A</td>
<td>N/A</td>
</tr>
</tbody>
</table>
## Example of English Rubric

### Response to Literature

<table>
<thead>
<tr>
<th>5</th>
<th>4</th>
<th>3</th>
<th>2</th>
<th>1</th>
</tr>
</thead>
</table>

#### Engages the reader through establishing a context, creating a speaker’s voice and otherwise developing reader interest.

- The author uses a variety of strategies (such as anecdotes, imagery, significance, etc.) to engage the reader throughout the entirety of the piece; a clear and consistent speaker’s voice is evident throughout the piece.
- The author uses strategies to consistently engage the reader; there is consistent evidence of a speaker’s voice.
- The author uses strategies within different sections of the piece; however, the engagement level is not consistent or some strategies seem awkward or inappropriate; there is some evidence of a speaker’s voice, although it may be inconsistent.
- The author uses strategies to engage at one point in the piece, but does employ them again in other sections of the piece; there is little evidence of a speaker’s voice.
- There is little or no evidence of strategies that engage the reader; there is no apparent speaker’s voice.

#### Demonstrates an understanding of the literary work.

- The author correctly and/or thoroughly discusses elements of the literary work and makes connections between them and the judgment advanced.
- The author discusses the elements of the literary work and makes connections between them and the judgment advanced.
- The author attempts to discuss the elements of the literary work; however, the discussion may not include enough information or may include incorrect information; there is little or no evidence of a connection between the elements and the advanced judgment.
- There is little or no discussion of the elements of the literary work; there is no connection between the elements and the advanced judgment.

#### Supports a judgment through references to the text and personal knowledge.

- The author uses multiple references from the text and personal experience to support a judgment. The references logically and clearly connect to the judgment.
- The author uses references from the text and personal experience to support a judgment. The references logically connect to the judgment.
- The author bases his judgment on personal opinion only. There is no real connection between the opinion and any evidence to validate the opinion.
- There is no evidence of an attempt to support a judgment.

#### Provides a sense of closure to the writing.

- The author effectively uses a closing strategy (such as full circle, significance through connections, etc.); there is a satisfactory sense of completion.
- The author uses an effective closing strategy (such as full circle, significance through connections, etc.)
- The author uses a closing strategy; however, the reader may not be left with a sense of completion.
- The response ends abruptly with no sense of completion.

#### Conventions

- The author effectively demonstrates mastery of the conventions of Standard English; the use of conventions enhances the reader’s comprehension of the piece.
- The author effectively uses the conventions of Standard English; the use of conventions never hinders the reader’s comprehension of the piece.
- Generally, the author effectively uses the conventions of Standard English; however, errors might hinder the reader’s comprehension of the piece at times.
- There is frequently incorrect usage of the conventions of Standard English; errors often hinder the reader’s comprehension of the piece.
- There is little evidence of comprehension of the usage of Standard English; the errors greatly hinder the reader’s comprehension of the piece.
**Example of Math Rubric**

Rubric Scoring:
4= Exceeded expectations & required elements
3= Met expectations; fulfilled requirements
2= Fulfilled most requirements
0-1= Minimal effort shown; did not meet requirements

<table>
<thead>
<tr>
<th>Criteria or Element</th>
<th>Students’ Self-Assessment Score</th>
<th>Teacher Assessment</th>
</tr>
</thead>
<tbody>
<tr>
<td>The required constructions are included. Each is done carefully and correctly. All correct= 4; Only 1 incorrect= 3; Two incorrect= 2; Three incorrect= 1 point; More than three incorrect = 0 points</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Instructions for each construction are clear, detailed, and accurate.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>The diagrams and text are done neatly and are aesthetically pleasing. All illustrations and graphics contribute meaningfully; there is no gratuitous use of graphics.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Final Product shows effort and pride of workmanship.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Response to email is clear, detailed, and accurate.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total Score:</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Student Work Sample with Teacher Commentary

Purpose of Section
To enter the information for the attached Student Work Samples and Teacher Commentary. Additional samples are optional.

Section Fields
The following fields are contained in the Student Work Sample with Teacher Commentary section.

1) Title of the Student Work Sample
2) Student Work Sample Description
3) Student Work Sample
4) Title of Teacher Commentary (Optional)
5) Description of Teacher Commentary
6) Teacher Commentary Sample (Optional)
7) Additional Documents (Optional)

Please note that all fields marked with a red * are required if you plan to submit the Unit to the DOE for approval. Missing information will not prevent you from saving the Unit for your own use.
Sequence of Instruction and Learning

Purpose of Section
To list and briefly describe the sequence of teaching strategies, teaching activities, and learning activities that will guide students to attainment of the intended standards. All assessments and performance tasks should be listed in the sequence. Authors may wish to develop these strategies and activities in greater depth using other Unit Design Builder components: Teaching Activity, Learning Activity, Performance Task, etc.

Section Fields
The following fields are contained in the Student Work Sample with Teacher Commentary section.

1) Sequence of Instruction and Learning
2) Attachment Title (Optional)
3) Attachment Description (Optional)
4) Attachment (Optional)
5) Web Resource Title (Optional)
6) Web Resource Description (Optional)
7) Web Resources (Optional)

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Additional Elements Section

Purpose of Section
To provide information on technology integration, general classroom accommodations and other instructional notes and reflections for this Unit Development Template.

Section Fields
The following fields are contained in the Additional Elements section.

1) Technology Connection/Integration
2) General Classroom Accommodations
3) Notes and Reflections
4) Additional Resources

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