|  |
| --- |
| Debbie McCormack  12/7/2008 |

|  |
| --- |
|  |
| MODIFIED ISD/PEBBLES MODEL  Instructional Design 667  Animal Research Project |
|  |

MODIFIED ISD/PEBBLES MODEL

Animal Research Project

Instructional Design 667

1. **Instructional Goal**

Through collaboration between the librarian and a 2nd grade teacher, students will find three sources of information in the Media Center to use for their required classroom animal report.

|  |
| --- |
| AASL Standards |
| Standard 1.1: Efficient and ethical information seeking behavior.  Standard 2: Teaching and Learning. Model and promote collaborative planning with classroom teachers in order to teach concepts and skills of information processes integrated with classroom content.  Standard 2.2: Effective and knowledgeable teacher. Implement instruction that engages the student’s interests, passions, and needs which drive their learning. |

|  |
| --- |
| Maryland Technology Literacy Standards for Students |
| Standard 1.0 – Technology Systems: Develop foundations in the understanding and uses of technology systems.  Standard 3.0 – Technology for Learning and Collaboration: Use a variety of technologies for learning and collaboration.  A. Learning  1. Use and understand how technology enhances learning.  a) Use technology tools, including software and hardware, from a range of teacher-selected options to learn new content or reinforce skills  B. Collaboration  1. Use and understand how technology encourages collaboration.  b) Participate in a class lesson using technology tools to collect, display, and interpret  data. |

|  |
| --- |
| VSC Science Curriculum |
| 1.0 Skills and Processes – Students will demonstrate the thinking and acting inherent in the practice of life science.  A. Constructing Knowledge  1. Raise questions about the world around them and to seek answers.  b. Seek information through reading, observation, exploration, and [investigations](javascript:openPopupWH('/share/vsc/glossary/science/investigation.html',200,200)). |
| MSDE School Library Media Voluntary Curriculum |
| Goal 2: Students will be able to locate information to meet an identified need.  Expectation 2.2: Students will define and refine an information need.  Goal 3: Students will be able to collect information relevant to their current information need.  Expectation 3.1: Students will collect information using multiple resources, involving a variety of formats. |

2. **Learner Population**

The target population consists of approximately 20 second grade students of mixed (above, on, and below grade level) reading and aptitude abilities. There are no special needs children in the 96% Caucasian and 4% African American group. These students are currently enrolled in a rural elementary school in Wicomico County, Maryland. As part of the Science curriculum in April, each student will choose an animal to research and write a one or two page report on in their classrooms. The librarian will work with the teacher to find resources to use in their reports. Once the teacher approves the student’s animal choice, the correct spelling is written on a note card for student use, and the learners will be ready to utilize the Media Center.

Each student in second grade has a general, working knowledge of the three computer databases that might possibly be accessed during their research. Students regularly attend technology classes in a computer lab setting and are exposed to a wide variety of software purchased by the county. The databases, SIRS Discover, Nettrekker, and Grolier, all have an elementary component and are easily accessed through the school’s portal.

Additionally, second grade students know the difference between fiction and nonfiction books and are able to locate them, as well as the magazine shelf, within the library.

Prior Knowledge:

* The student knows the difference between fiction and nonfiction books.
* The student has a general knowledge of computer use.
* The student has used school databases.
* The student knows the correct spelling of their chosen animal.

Materials Needed:

* Document camera
* LCD projector
* Printer
* Computers
* Nonfiction animal books
* Magazines – Zootles, Zoobooks, Your Big Backyard

3. **Progression of Problems**

1. *There will be a review of the Media Center layout.*

In the center of the library are six round tables, with four chairs each. Students will use their assigned seating arrangement as their main base when they travel throughout the Media Center. The magazine section is close to one of the main two entrance doors, on a wooden shelf, sorted in stacks by their titles. The students will be reminded of the three magazines that would possibly provide information on their particular animals: Zoobooks, Zootles, and Your Big Backyard. Because the magazine subscriptions were stopped and started during various years and a possibility of missing or damaged issues, there will not be a simple way to search, other than taking the time to glance through the publications. Zootles and Zoobooks are designed to feature only one animal in each issue.

The nonfiction area of the library is located against one long wall. As the 597, 599, and 636 animal sections are the all-time favorite browsing area for every student in the school, this area is easily found by our second grade class. The librarian, in preparation for this unit, and armed with an animal list compiled by the teacher, will reserve a variety of books that might be selected as resources.

There are nine computers for student use lined along another wall in the library. Each of these computers sit ready for use throughout the day. There is no need for students to login or use a password. A Novell screen sits open on the desktop, filled with the various icons representing software, available to the school.

2. *The librarian will explore and give an overview of the three databases available to students.*

Learners have had at least a minimal exposure in the use of each of these three databases…SIRS, Grolier, and Nettrekker…in prior computer lab classes. Therefore, the features of each one will be reviewed by the Librarian, using an LCD projector. The SIRS discoverer database will be approached emphasizing its collection of primarily magazine articles, with particular emphasis on its many available pictures; Grolier will be cited as an encyclopedia, and Nettrekker, as a reliable internet source. The librarian will have on hand hard copies of magazines and encyclopedia samples to contrast with their digital counterparts.

3. *The librarian will choose a sample animal (elephant) and specifically search each database using the LCD projector, in order to model the research process.*

* SIRS is a database of magazine, newspaper, and reference articles. For this research project, the available pictures accompanying magazine articles will be most students’ target. The librarian will enter the website through the school’s portal by clicking on the globe icon, typing in the word *elephant,* and choosing *search*. As one of the primary intents of using SIRS is to access a picture that would be included in the final animal report, the camera icon at the top of the page will be clicked and a list of pictures by name will be displayed. The student may open as many as desired and choosing one, will right click the picture, choose *print*, and a beautiful picture will be printed off. If desired, a student may note the EASY level color code and locate an article with the teal color book next to it, and open it up. The *print* icon is positioned at the top of the page, if the article looks interesting to the student, and be one they would like to use as a resource.
* Grolier Kids is an online encyclopedia. From this homepage, choose NBK (New Book of Knowledge) on the left side of the page. This will take a student exclusively into Grolier’s most elementary encyclopedia, type *elephant* into the search bar and a page of article titles appear. It is up to the student to take their best guess, by reading the titles, as to an article that might be used as one of their resources. Every use of the word *elephant* within the large-print article will be highlighted in red. If desired, the word *print* is on the top of the page and the article can be sent to the library printer.
* Nettrekker is a database of appropriate internet sites. Once on the home page, the *elementary* tab will be the default. *Elephant* is again typed into the search bar. Readability levels are listed next to each site on the right of the page. The student should choose a #1 or #2 reading level, and also as an option, choose *Read Aloud* at the top of the page, if the text proves too difficult to read. Text just needs to be highlighted and a ‘reader’ will read as much, or as little, as desired. If an article is chosen to be a resource and if there is not a *print article* icon, then the student should ask help from the librarian in order to print a portion of the website.

4. *Learners will spent time deciding which three digital articles, books, or*

*magazines they want to use as their resources for their animal reports.*

This part of the project will take at least one 45 minute class period. The librarian will divide the 20 member class into three groups: one group of 9 will work on the computers, 5 will go through magazines, and 6 will look through nonfiction books. The librarian will observe, provide oral feedback, and assist students in deciding which information will be most valuable to them. The students on the computers will find one article and one picture, and then trade places with a student looking through magazines or books. If more time is needed for any student, the media center is available in the morning, before school, or during lunch/recess, with the librarian present to help any student complete the research portion of their animal report assignment.

5. *Assessment: Students will return to their classrooms with three sources of information.*

Formative Assessment:

* Librarian will observe students using the databases to see if there are any difficulties.
* Oral feedback will be provided on acquired information, such as:
* Why does your animal live in their environment?
* Does the animal hibernate in winter?
* What kind of food does the animal require?
* Where more information could be found?
* The second grade students will decide which sources of information they are most comfortable using. It may be that the learner would choose to use just books and magazines; others may choose to use primarily digital resources.
* Books and magazines will then be checked out to students and printed pages retrieved from the printer.

Summative Assessment:

* Each student will fill out a worksheet with:
* The name of their animal.
* The three sources of information that will be used in their reports.
* Teacher will determine if enough information was found in the resources.
* If there are some students unable to complete this task, they will return to the Media Center the next morning or at lunch time to complete their assignment.

4. **Instructional Strategies**

|  |  |
| --- | --- |
| Steps of the Lesson | |
| TELL | * The students will be told that the librarian will work with their teacher to help them find information that they can use for their animal reports. * The students will be reminded that the library houses many different types of information. * The students will understand that books, magazines, and computer databases are all excellent sources of information. * The students will be shown that the project they are about to undertake is called ‘research.’ |
| ASK | * Ask the students what the end result of their research will be? * Ask the students to share the animal they have chosen to research. * Ask the students to explain what nonfiction books are. * Ask the students to share their ‘understanding’ of the school’s databases. * Ask the students where magazines are shelved in the library. |
| SHOW | * Show students how each database is used (Grolier, Nettrekker, SIRS) with an overhead LCD projector attached to a computer. Demonstrate how to print from each database. * Show the students how and where to look at nonfiction books in order to find one on their chosen animal. * Show the students how to leaf quickly through magazines to find one that would feature the animal desired. |
| DO | * Students will take turns using the computers and will access a database. They will print any articles or a picture that they like. * Students will look at the nonfiction books available on their animal and decide if they are able to read the words and therefore utilize the information. * Students will look through Zootles, Zoobooks, and Your Big Backyard to find some interesting information on their animal. * Students will decide what three pieces of information that they will use for their reports. |