**Artifactual: 005.1 Adapting and/or modifying curriculum**

**Teacher Candidate:** Deidra Fifee  
**Date:** 5/5/2014

**Age Range/Grade Levels:** 3rd – 5th  
**Anticipated Lesson Duration:** 60min

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**Foundations of Lesson Plan**

**Curricular Focus, Theme, or Subject Area:**
Math – Measuring and graphing data

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**State/District Standards: TEKS (Technology and Math)**

3rd – 5th

(4) Critical thinking, problem solving, and decision making. The student researches and evaluates projects using digital tools and resources. The student is expected to:
(A) identify information regarding a problem and explain the steps toward the solution;
(B) collect, analyze, and represent data to solve problems using tools such as word processing, databases, spreadsheets, graphic organizers, charts, multimedia, simulations, models, and programming languages;
(C) evaluate student-created products through self and peer review for relevance to the assignment or task; and
(D) evaluate technology tools applicable for solving problems.

3rd – 5th

3.(8) Data analysis. The student applies mathematical process standards to solve problems by collecting, organizing, displaying, and interpreting data. The student is expected to:
(A) summarize a data set with multiple categories using a frequency table, dot plot, pictograph, or bar graph with scaled intervals; and
(B) solve one- and two-step problems using categorical data represented with a frequency table, dot plot, pictograph, or bar graph with categorical intervals.

4.(9) Data analysis. The student applies mathematical process standards to solve problems by collecting, organizing, displaying, and interpreting data. The student is expected to:
(A) represent data on a frequency table, dot plot, or stem-and-leaf plot marked with whole numbers and fractions; and
(B) solve one- and two-step problems using data in whole number, decimal, and fraction form in a frequency table, dot plot, or stem-and-leaf plot.
5.(9) Data analysis. The student applies mathematical process standards to solve problems by collecting, organizing, displaying, and interpreting data. The student is expected to:
(A) represent categorical data with bar graphs or frequency tables and numerical data, including data sets of measurements in fractions or decimals, with dot plots or stem-and-leaf plots;

Learning Objectives:
Goal(s): The Learner will use real-life experiences to collect, organize and analyze measurement data using technology.

- Objective(s): The student will use height to enhance their knowledge of measurement with the use technology to research and collect data using the internet, then format and analyze their data using an excel worksheet and chart/graph.

Student Performance Level/Adaptations for Individual Students with Special Needs:
(Alternatives)
Teacher and/or students can measure students in the class using a measuring tape using inches and convert to feet and document on paper then input the data into an excel chart.

Teacher can pair students.

Instead of the entire team, the student can select 3 players from the team and determine their height.

Teacher can toggle between sites and ask students to answer guided questions about the information displayed.

Students can take pictures of their classmates and estimate how tall they are, and then use a measuring tape to measure their exact height. The images are then arranged and order from tallest to shortest. The images and heights can be inserted into an excel worksheet or kidspiration software program and analyzed.

Pre-assessment:
The teacher will facilitate during the research and data collection process to assure students are on-task entering the correct information.
**Academic Vocabulary to be Taught or Reviewed:** units of measurement, height, graph conversion, inches and feet.

**Materials/Technology/Equipment/Resources:**
- Computer with access to the internet and Microsoft excel.
- I-pad with internet access
- Inspiration software program
- Kidspiration software program
- Measurement conversion chart
- Paper and pencil
  - [Graphing outline](#)

**Grouping Structures (e.g., whole-class, small groups, pairs, one-on-one):**
- Whole-class, small groups, and pairs.

**Lesson Sequence (Activities, Questions, Accommodations/Modifications)**

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<th>Introduction/Anticipatory Set</th>
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**Learning Activities:**
- Tease video on measurement. Image from the tease of the shortest man in the world with the tallest man in the world.

| Building/Applying Knowledge and Skills |
Learning Activities:
The teacher will engage students using Tease Video on Measurement Unit Plan. After the video presentation the teacher will display an image from the video that focuses on measuring height. The teacher will then show students a completed chart made using Excel then, model collecting data from the internet using the link: http://www.thetallestman.com/robertpershingwadlow.htm and typing, selecting, cutting, and pasting information in an Excel worksheet. After all information has been entered, the teacher will model selecting the entered data and inserting a chart. The teacher will model formatting labels and data, then display the information of the completed chart. After modeling the creation of chart in Excel, the teacher will assign students to use the following website:
http://sportsillustrated.cnn.com/basketball/nba/rosters/miami-heat/byLAST_NM.html which gives the details of the measurements of the Miami Heat Basketball team. Some students will work independently, some students will be paired, and some students will be in a small group facilitated by the teacher using an interactive Smart board. Students will then be required to enter or cut and paste (a minimum of five (5) for 2nd graders or up to ten (10) for 5th graders) the names of the basketball team players with their corresponding heights into an Excel worksheet.

Assessment/Evaluation Process
Description of Assessment Instruments/Procedures:
Completed graph in Microsoft Excel.

Learning Activities:
Students will visit the following sites to research data then input the data in Microsoft Excel and insert a chart.
http://0.tqn.com/d/weirdnews/1/5/r/X/-/-/PingPing-Sultan.jpg - image of the shortest and tallest man in the world.
http://youtu.be/j3v7qf7hbx8 - TEASe on measurement

http://www.thetallestman.com/robertpershingwadlow.htm

Synthesis/Closure
Learning Activities: Students will review graphed data and discuss the importance of measurement throughout the world. Students will then brainstorm using other information from the tease video that can be researched and graphed.
Extension/Enrichment/Transfer or Generalization of Knowledge:
Students will identify other units of measurement that can be collect and graphed, such as the player’s weight.

Homework Assignments:
None

Teacher Reflection on Lesson Planning and Implementation:
Reteach (alternative used as needed): Students who are having difficulty locating information or entering data will be called to a small group to review the steps using an interactive semantic map on inspiration. Steps would include opening an excel document, selecting, copying, pasting, inserting a chart, entering data, and toggling between the internet and excel document.

Describe: My analysis of using adaptations and modifications of the curriculum of the curriculum and instruction to critical to meeting the needs of various types of students and has enhanced my knowledge as an educational diagnostician. To facilitate closing the gap, increase use of technology is recommended. Instruction that is digitally enhanced and developmentally appropriate will produce greater achievement.

Analyze: a. The importance of increasing technology use has enhanced and defined my skills in recommending and adapting instruction.
b. My desired position as a future independent contractor will enable me to fulfill my mission as a life-long learner.
c. My experiences and previous knowledge has been enhanced by my education, research in the case studies I have reviewed, and direct on the job training with special education children.

Appraise: My findings are very beneficial because partnerships with the parent, school and community need to be improved.

Transform: a. Insights I have gained include a heightened awareness of due process implications.
b. My future plans are directly on target with the need to provide quality, individualized, education services for special needs citizens and increase parent and community involvement.