Trains

Lesson Overview: This is an interdisciplinary thematic unit on trains that includes four activity stations. Children will work on each station for five days.

Target Grade: Kindergarten

Sources Consulted: Freight Train by Donald Crews, I Love Trains by Philemon Sturges, MDE website for GLCE, Common Core State Standards.

Learning Objectives:
Kindergarten students will be able to:
- Math- compare and count train cars
- Science- describe push, pull, weight, and mass
- Social Studies- locate train tracks on a U.S. map
- Language Arts- write a sentence about trains

Benchmarks Addressed:
- **Math**: K.MD.A.1-Describe and compare attributes of objects such as length or weight. Describe several measurable attributes of a single object.
  - R.L.K.1- With prompting and support ask and answer questions about key details in a text.
  - R.L.K.9- With prompting and support compare and contrast the adventures and experiences of characters in familiar stories.
- **Writing**: W.K.8- With guidance and support from adults, recall information from experiences or gather information from provided sources to answer a question.
- **Science**: P.FM.E.3
  - P.FM.E.31
  - P.FM.E.32
  - P.FM.E.33
  - P.FM.E.34
- **Social Studies**: K-G1.0.2
  - K-G1.0.2
  - K-E1.0.2

Materials and Quantities:
Picture books, blocks, play dough, LEGO's, train set, U.S. maps, markers, pencils, journals, and paper
3 books for the centers:
- *Freight Trains* by Donald Crews
- *I Love Trains* by Philemon Sturges
- *Down by the Station* by Will Hillenbrand

Vocabulary: push  hoot  roar  rumble
pull  train  weight  map
engines  big  little  strong
weak  carry  freight  coal
Focus Questions: How do you get to the store to buy shoes? How did the shoes get to the store?

Classroom Center Activities:
Students will work on these stations for five days while the teacher observes each student. 

**Math**- children will group trains by their similar appearances, such as size, shape, color

**Science**- children will push trains of different weights and measure with a 12 inch ruler which goes the furthest

**Social Studies**- children use LEGO train sets to explore different areas on a U.S. traveling map

**Language Arts**- children will read books about trains and use journals to write and draw pictures of trains

Assessment: Classroom observation and journal entries, anecdotal notes, teacher will observe each center.