“Just Passing Through: Designing Model Membranes”
Integration Notes

Lesson 1 (Juan Daniel’s Futbol Frog Storybook)

ELA
- Vocabulary
- Making predictions
- Non-fiction reports about membranes, frogs, animal skin
- Comprehension - Use in whole group literacy lesson

Math
- EDP used in math for problem solving

Social Studies
- Location El Salvador – ties in to geography social studies standards
- Map skills standards with map in book/DM
- Climates

Science
- Making predictions
- Habitats (e.g., Wood Lake field trip)

Miscellaneous
- Spanish language

Lesson 2 Biology Meets Technology

ELA
- Analogies
- Vocabulary
- Nonfiction research on games

Lesson 3 Exploring Membranes

ELA
- Reading skill – cause & effect; compare/contrast
- Writing – metacognition frame
- Tree map (properties)
- Circle map
- Real world connections: raisins & grapes
- Importance of predictions, categorizing, classifying
- Writing: journaling, parts of speech (verbs, adjectives), summarizing

Mathematics
- Rate

Science
- Observation, reflection
- Noting properties of each material reviews notion of “what is a property”?
- Importance of predictions, categorizing, classifying

Lesson 4 Designing a Model Membrane

ELA
- Journal writing

Mathematics
- count how many people used foil, how many used sponge, etc. make chart or graph
- 24 hours: discuss different measures of time – small to big
- Measurement
- Fractions – ¼; ½; convert to decimals

Miscellaneous
- Group cooperation – social skills