## Jelly Bean Lesson Plan

Teacher
School

## writing,

 writing, and in graphic organizer, NS.1.4.8 Develop a hypothesis based on prior knowledge and observations, NS.1.4.11: Generate conclusions based on evidence, OV.1.4.1: Use subject-related information and vocabulary, OV.1.4.6: Communicate ideas and information with clarity
## Objectives:

Content: I will communicate observations orally, in writing, and in graphic organizers.
I will develop a hypothesis based on prior knowledge and observations.
I will generate conclusions based on evidence.
Language: I will use at least 3 subject-related pieces of information and/or vocabulary words while working with other students.
I will communicate ideas and information with clarity to the other people in my group and in my writing.
Assessment: The teacher will assess the students' participation based on a rubric. See attached rubric.

Technology/Materials: Jelly Bean Scientist by Gina Cervetti, Jelly Belly jelly beans, cups, hand lenses, Data table, and Jelly Belly classification key
Vocabulary:conclusion, evidence, observations, hypothesis, prediction, classify
Bloom's: $\square$ Remembering $\square$ Understanding $\square$ Applying $\square$ Analyzing $\square$ Evaluation $\square$ Creating Questions: How many of you have ever tried to classify an object? What were some of the characteristics you looked at while you were classifying? Predict what science you believe is behind the making of jelly beans. What do you think would happen if you had to classify a jelly bean that you could only look at but not smell or taste? Describe what you would do.
High Yield Strategies: $\square$ Identifying similarities \& Differences $\square$ Summarizing \& Note Taking $\square$ Cooperative Learning $\square$ Reinforcing Effort \& Providing Recognition $\square$ Setting Objectives \& Providing Feedback $\square$ Generating \& Testing Hypotheses $\square$ Cues, Questions \& Advanced Organizers $\square$ Homework \& Practice $\square$ Nonlinguistic Representations

## Instructional Strategies:

Set: I am going to read a book titled Jelly Bean Scientist by Gina Cervetti. What do you predict this book will be about? What observations did you make that helped you with your prediction? In this book, we're going to follow Ambrose Lee who is a Jelly Bean Scientist. Ambrose is going to walk us through the steps of creating jelly bean flavors and also jelly beans. As we read the book, I want you to think about a flavor of jelly bean that you would create and what materials you would use in order to create it. I also want you to think about which jelly bean color will show up the most in a bag of jelly beans.

Model and Guided Practice/Strategies: The teacher will show the class a picture of a jelly bean. As a whole group, the class will fill in the data table's first 2 columns. Then the teacher will walk the students through using the dichotomous key to classify the jelly bean. After the teacher models use of the key, the students will then classify their jelly beans.

Intervention Strategies: The teacher can assist students who need the help by modeling the key again, or walking around the room and assisting those students who need more help on a one on one basis.

Accommodations \& Modifications (IEPs) The teacher can pair or group students based on the needs of the classroom.

Independent Practice/Activities: The students will each get 5 jelly beans to classify using their dichotomous key. To start, the students should write a brief description of their jelly bean and make a prediction based on their description. After making their prediction, the students will use their key to find out what flavor of jelly bean it actually was. While the students are

Enrichment Activities: Students will then graph their results based on the following colors: black/purple, red/pink, yellow/orange, green, blue. Students will make tally marks for each one they had and then can create a bar graph. Students can also create their own bean, drawing a picture of it, naming it and describing the taste.

Closure: The teacher will have the students journal about the following questions: Predict what would have happened if you tried to classify the jelly beans without using a dichotomous key. How is this process similar to what scientists are doing with living organisms? If you had to create a dichotomous key to classify an alien, what key characteristics would you use to classify the alien?

Homework: See enrichment section above for homework.

