



## Sample Lesson Plan for Sandcastle School Visits

2016 Sandcastle Classic Theme - Makers and Movers

*The following is a sample lesson plan for Sandcastle Teams, created to guide visits to their partner schools. It can be followed point by point, or used as a guide for teams who have prior classroom experience. **Ideally, your team will make three visits to your school partner** in order to provide students with a high-quality, meaningful experience. However, as some teams will only be able to visit twice, we've provided lesson plans for both a two visit and a three visit structure below.*

*The time allotted for each section below is just an estimate and might vary depending on the length allotted for your visit, the students' attention span, and their level of enthusiasm. Be sure to ask the classroom teacher for support where needed!*

### Where To Start? Plan with Classroom Teachers before School Visits

It's highly recommended that you discuss with the classroom teacher and share the lesson plans with them before your first visit. They are the best resource on how to engage students and help them get the most out of your lessons. Points to discuss with the classroom teacher:

- How is the classroom organized in terms of space and structure?
- What prior knowledge do students have of sketching, design, and modeling?
- What techniques do you use to gather students' attention and manage behavior?
- Here are our goals and outcomes for these two school visits...
- I could really use your help with...
- Anything else I should know/include to make this successful for your students?

### Lesson Plan for School Visit #1

#### **Step 1: Introductions & Today's Agenda (5 mins.)**

*Materials:*  Agenda/lesson plan written where students can see it  Name tags

Markers

Introduce yourselves to the class, and why your team is participating in Sandcastle Classic. Describe briefly what you will be doing with the students over the next two visits, and how it leads up to the Sandcastle Classic event. Review the agenda for today's lesson and answer any preliminary questions from students.

#### **Step 2: Brainstorming (10 mins.)**

*Materials:*  Board, flip chart or easel pad  Nametags  Markers

Take some time to discuss this year's theme, "Makers and Movers" with students. Students can raise quiet hands with names of objects, people, or concepts related to the theme or yell them out "popcorn style" while a team member writes them on the board. Guiding questions include:

- What keywords come to mind when you think of a "Maker" or "Mover"?
- Does a "Mover" have to be literal, like a machine, car, or can it be a person who inspires others and moves things along, like a president or school principal?
- Some words to get started: inventor, scientist, engineer, principal, president, historical heroes, motion, movement, mobility, machines, technology, computers, trains, planes...
- Remember there are no right or wrong answers, just ideas to get us thinking big!



### **Step 3: Solo Drawing (10 mins.)**

*Materials:* □ 1-2 sheets of 8x11 paper per student □ Markers □ Stopwatch/timer

Allow students to draw out their individual ideas on the Makers and Movers theme on a 8x11 paper. Encourage them to use the words and phrases from the brainstorming session as inspiration.

### **Step 4: Group Sketch (15 mins.)**

*Materials:* □ 1-2 sheets of 11x17 paper per group □ Markers □ Glue Sticks □ Cardstock □ Stopwatch/Timer

After solo drawing time, students will work together in groups of 4-5. Ask them to present their individual drawings to their group and then make a new drawing or collage out of all of their drawings combined. Provide them with a larger 11x17 paper or cardstock and glue sticks to glue parts of each student's drawings together to make a larger scene.

- **TIP:** Remind the students while they are sketching, think about how the drawing might look in 3D.

Ask each group to pin up their drawing or collage to the board and present to the class with a brief 2-4 sentence description of their scene of Makers and Movers. **Ask the classroom teacher to keep these drawings and collages for the next schools visit.**

## **Lesson Plan for School Visit #2**

### **Step 1: Introductions and Summary of Visit #1 (5 mins.)**

*Materials:* Nothing

Introduce yourselves again to the group and summarize what you accomplished during your first visit to the school. Break students in groups of 4-5.

### **Step 2: Model it as a Team (25 mins.)**

*Materials:* □ Clay, kinetic sand, or play dough (ask the classroom teacher which is best and select one material) □ Surface protection/newspaper □ 1-2 Sheets of paper □ Markers □ Cardboard

Lay out newspaper/surface protection on top of desks. You might want to ask the classroom teacher for help with this. Make sure to keep everything on the newspaper and off of the desks. Groups will build the scale models on top of a piece of cardboard for easy transport later. Pass back out the drawings and collages the students created in groups during visit #1 for inspiration for their scale model.

Tell students to use the clay, kinetic sand or play dough to create the drawing or collage in 3D. Remind them that they'll later be making the designs out of sand and they'll be much larger on the beach! The design can involve a scene, a single or group of objects, writing or other marks that can be made in sand. After the groups are done making the models, ask them write a team name for their group and a short description of their scale model on the sheet of paper next to the cardboard.



**Step 3: Gallery Walk** (20 mins. divided by the number of groups. A timer is recommended)

**Materials:** □ 6-8 Post-Its per student **Note:** Take pictures of these models so you can show them to the rest of your Sandcastle team members.

Each group takes a turn presenting their model and description to the class. Students write down their favorite things about the model on a Post-It and stick them to the sheet with the team name. After every team has presented for feedback, tape each team's paper with their team name and Post-Its to the board.

**Step 4: Rock the Vote** (5 mins.)

**Materials:** □ 1 Sticky dot/sticker per student

Each student gets one sticky dot to place onto the team's sheet corresponding to the model that they want to build on the beach. After everyone has cast their vote, tally them to see if there is a clear winner, or if students might want to blend some of the popular designs into a single design. End with:

- Thanking everyone for their collaboration on the design.
- Explain that you'll return with a finalized scale model of the sandcastle design which will take into consideration the ideas they presented today.
- Debrief with the classroom teacher on how it went; what to consider for visit #2.

**Lesson Plan for School Visit #3**

*If you are able to make a 3rd visit. Use this visit to show them the final design of the sandcastle. You will take the ideas from the previous sessions and narrow to the final. You can also explain how to build in sand or show them how big the sandcastle will be in their classroom or on the blacktop area.*

**Step 1: Design Presentation** (10 mins)

**Materials:** □ Scale model

Start off this lesson by presenting the final scale model for the sandcastle to the students. Ask them to describe how the design represents the Makers and Movers theme.

**Step 2: Reflection/Next Steps:** (10 mins)

**Materials:** None

Explain that the next challenge will be making some decisions and working together as a big group for the October 15 event. Discuss how everyone can get prepared to work together during the big day at the beach by talking about logistics around construction and day of event information. Discussion points include:

- What should students bring with them to the beach?
- Who are your team's key leaders?
- What role(s) might the classroom teacher play before/at the event?
- What tools will they use and how can they use them safely?
- What is your team's strategy for transporting water from the ocean to your building site?
- What is your team's plan around lunch/snacks/water?
- Can their families also participate in building?
- Where can students dispose of their trash?
- Be sure to confirm attendance, and remind team of the date/time.
- Most importantly, get them excited to participate!



**Materials Summary –**

**For your Team** - □ Agenda □ Board/Easel pad/flip chart □ Name tags □ Stopwatch/timer □ Tape

**For Your Students** - □ Markers □ Clay/Kinetic Sand/Playdough □ Surface Protection/Newspaper

□ 8x11 paper □ 11x17 paper □ Glue Sticks □ Cardboard □ Cardstock □ Pens/Pencils □ Post Its □ Sticky Dots