Spring 2016
By Topher Payne
Commissioned by Georgia Ensemble Theatre & Conservatory
Directed by Laurel Crowe
*Especially for Grades 3-8

Common Core Georgia Performance Standards:
- **SCIENCE:** S3CS1, S3CS2, S3CS3, S3CS4, S3E1, S4P3, S4L1, S5CS1, S5CS2, S5CS8, S6E2, S7L4, S8CS1
- **LANGUAGE ARTS:** ELAGSE3RL3, ELAGSE3RL4, ELAGSE3RL5, ELAGSE3RL6, ELAGSE3SL3, ELAGSE3SL4, ELAGSE3SL5, ELAGSE3SL6, ELAGSE6RL7, ELAGSE6RL6

**Georgia Ensemble Theatre and Conservatory** is the Resident Theatre Company at the Roswell Cultural Arts Center. 950 Forrest Street, Roswell, GA, 30075.
About Georgia Ensemble Theatre

The Georgia Ensemble Theatre (GET) in Roswell is a professional theatre company founded in 1992 under the direction of Artistic Director Robert J. Farley. Bob came to Atlanta with experience that spanned from Alaska to Broadway. He was first introduced to Atlanta theatre through the Alliance Theatre Company. While at the Alliance, Bob became very interested in taking theatre to outlying communities. GET’s first full season of plays began in 1993 and the 2015-16 Season includes a 5 play main stage series and, for the first time ever, a four-play Theatre for Young Audiences series: Junie B. Jones the Musical, The Lion, The Witch, and The Wardrobe, S.T.E.A.M.TEAM (an original play by Topher Payne as commissioned by Georgia Ensemble Theatre), and, now in its 19th year touring to metro-Atlanta schools, And Then They Came for Me: Remembering the World of Anne Frank. The GET Conservatory also provides theatrical training to adults and young people in the areas of acting, movement, vocal technique, and more.

About Theatre Etiquette

<table>
<thead>
<tr>
<th>It’s helpful to review the rules of theater etiquette before seeing a show, especially since this may be the first live theater experience for some of your students.</th>
</tr>
</thead>
<tbody>
<tr>
<td>● Please stay seated during the performance.</td>
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<tr>
<td>● Show respect to the performers and other people in the audience by not talking during the performance.</td>
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<tr>
<td>● Appropriate responses such as applause or laughter are always welcome.</td>
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<tr>
<td>● Use of cell phones (including text messaging) and cameras are not allowed during the performance at any time! Please turn them off.</td>
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Setting

The STEAM TEAM neighborhood and, the middle school media center, the “haunted” wrestling mat storage room, and the middle school café-atorium.

Characters

**Scout** – is a walking encyclopedia who applies a variety of scientific methods and predicts outcomes. Because he deals in probability, he tends to picture the worst-case scenarios.

**Taylor** – The gadget gal, the big idea kid, and the fearless STEAM TEAM leader. Student council president.

**Elliot** – Taylor’s right hand man. He implements designs, using whatever they have on hand. He gets the plan running, sometimes with daring ideas. Sports lover.

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Aubrey – The writer, narrator, photographer, drama kid. He writes and he sings, and is good with a craft. Always gives the final polish to whatever their grand plan is that day. He provides support for the other four, improving their efforts.

Misha – She likes numbers and precision. There is no arguing with numbers.

Katie Featherstone – The arch-nemesis of the STEAM TEAM. Katie has a wicked tongue and a unique view of the world. (Played by all actors)

Mrs. Pendergrass – a neighbor who is the media specialist at the middle school (represented with voice over and illustration)

Note: Cast Size and Doubling of Actors
This production of S.T.E.A.M. Team features only five actors, with most actors playing more than one role. Doubling of actors requires distinction between characters. In this production, characters will be distinguished by costume, voice and other physical character traits.

Synopsis
Scout, Taylor, Elliot, Aubrey, and Misha are five neighborhood friends who take their interests in science, technology, engineering, arts, and mathematics to solve mysteries and problems in their own back yards (and sometimes the back yards of their neighbors). When the group “grows up” and heads to middle school, though, their interests spread and they find themselves with a lot less time to play dress-up and solve cul-du-sac capers. When one of their own is targeted by a bully at the science fair, it is up to Aubrey to get the team back together for one last mystery...

Biography of the Playwright – Topher Payne
Topher Payne is the Atlanta-based author of more than a dozen plays, which have been produced across the United States. In 2014, The American Theatre Critics Association selected Topher as the country's Best Emerging Playwright. He is a two-time winner of the Gene-Gabriel Moore Playwriting Award, most recently for his play Perfect Arrangement, which debuted Off-Broadway in 2015. Three of his works had their World Premiere at Georgia Ensemble Theatre- Tokens of Affection, Swell Party, and The Only Light in Reno. The New York Times calls Topher "a deft and witty writer," and The Atlanta Journal-Constitution crowned him "Atlanta's own Tennessee Williams."

Biography of the Director- Laurel Crowe
Laurel holds a B.A. in Speech and Theatre Arts from the University of West Georgia. She has worked in the Georgia Ensemble Theatre Conservatory in every position including Director of the Performance Camp productions Seussical the Musical, Alice in Wonderland, Peter Pan, Willy Wonka Junior, and Disney’s The Little Mermaid Jr. Laurel appeared as “Mrs. Little” in the 2008 Theatre for Youth production of Stuart Little, and has directed the Theatre for Youth productions of River Rat and Cat, Ramona Quimby, James and the Giant Peach, Aesop’s Fables, and Beauty and the Beast, The Lion, the Witch, and The Wardrobe, Stuart Little, and Junie B. Jones the Musical. Laurel will be honored as the 2016 recipient of the University of West Georgia Theatre Department “Alumni of the Year” award. She is the proud mother of two amazing sons, William and Finley.

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Vocabulary Words: The following words are used in the play. Look them up and provide definitions!

Albatross  Abacus  Bait  Catapult  
Compost  Competition  Femur  Iguana  
Litter  Pulley  Rabid  Sample  
Suspect  Vengeance  Volunteer  

Word Search
Find the following words below: Albatross, Abacus, Bait, Catapult, Compost, Competition, Femur, Iguana, Litter, Pulley, Rabid, Sample, Suspect, Vengeance, Volunteer
Make Misha’s Abacus!

What You Need:

- Pencil
- 9 craft sticks
- 56 large pony beads
- 8, 4-inch bamboo skewers (if yours are longer, you can cut them to the right length)
- Wood glue

What You Do:

1. Lay three craft sticks down so they are parallel. Use the pencil to draw eight matching lines on each stick, evenly spaced and centered across the length of the craft sticks.
2. Take the bamboo skewers and align them with the pencil marks. There should be one craft stick at each end of the skewers. The third craft stick should be in the middle, about 1 inch away from one of craft sticks on the end.
3. Put a thin line of glue on each of the pencil lines you've drawn.
4. Carefully thread seven beads on each of the eight skewers. Place the skewers on the glue lines, arranging the beads so that two beads fall into the 1-inch space between the two closely-placed sticks and the other five fall into the larger space between the middle and end sticks. Let the sticks dry.
5. Glue three craft sticks on top of the bamboo skewers so they line up with the sticks below, taking care to keep the beads divided. Let the sticks dry.
6. Glue the last three craft sticks on top of the sticks you've just glued down. Let dry.
7. Flip the abacus over so that the stacked sticks are on the bottom. Depending on the size of the beads, you may have to add more craft sticks to the bottom. The stacked sticks let the beads slide smoothly on the skewers and prevent them from scraping along the surface you’re working on.

Now your child has a homemade abacus to practice important math skills! The abacus is a great tool to visually teach your child about addition, subtraction, multiplication, division, and even place value.
Create a Mystery Neighborhood:

1) Color and Label the Picture with the S.T.E.A.M. Team settings. Choose where all five members live, where Mrs. Pendergrass’ home is, and where the Middle School is located. Feel free to add to the picture with more homes, stores, a forest, park, etc.

2) Write three to five sentences that describe what you think is happening in this neighborhood. Example: Is there a lost cat? Did someone have a flat tire? Is the school bus late? Create an everyday scenario that needs to be solved. How would the five members of the S.T.E.A.M. Team try to solve it? Use your imagination!

What is Happening?-
How would the S.T.E.A.M. Team try to solve it?

1. Scout:

2. Taylor:

3. Elliot:

4. Aubrey:

5. Misha:
True and False
Write T if the statement is True and F if the statement is False.

1. ____ At the start of the play, the S.T.E.A.M. Team is in 9th grade.
2. ____ Katie Featherstone is Misha’s best friend.
3. ____ Scout’s favorite subject is Science.
4. ____ Elliot is afraid of taking risks.
5. ____ Taylor is the winner of the science fair.
6. ____ S.T.E.A.M. Team takes place in both the 4th grade and the 7th grade.
7. ____ Katie Featherstone is allergic to peanut butter.
8. ____ Scout’s project is about compost.
9. ____ Aubrey is the newest member of the team.
10. ____ Mrs. Pendergrass has a dog named Miss Kitty.
Scout’s Classroom Composting Project!

Subject Correlation:
Science, Writing

Objectives: Students will be able to:
1. Observe and describe the cyclic nature of life.
2. Appreciate the importance of a balanced ecosystem.
3. Compare and contrast biodegradable and non-biodegradable resources in nature.

Length:
45-60 minutes for initial compost lesson, then a few minutes a week or as needed to discuss progress of mini compost piles.

Teacher Preparation:
(Numbers will vary depending on whether the teacher prefers students to work individually or in groups.)
Each student (or group) will need: a clear plastic 2-liter bottle, scissors, tape, sandwich bag full of kitchen waste, sandwich bag full of garden waste, about two pounds of rich healthy soil, a water bottle, non-biodegradable items (like nails, part of an aluminum can, plastic), and several earth worms or red wiggler worms. (Worms are recommended, but optional. Many Web sites sell appropriate worms.)

Outline (with times)
10 minutes
Introduction: Why Compost?
As a class, look up the benefits of composting and what happens during the process. This will give students a background on what actually happens in a compost pile when it is done correctly, the benefits of composting, and instructions on how to create a compost pile. Also, consider assigning students and their families look this information up at home and then discuss their findings as a class.

30 minutes
Create a mini-compost pile
The teacher will break students into groups of three or four. One member of each group must bring:
• A clear and clean two-liter bottle.
• One sandwich bag full of organic food waste like vegetable peels, fruit peels, seeds, coffee grounds and filters, eggshells, nutshells, and other food scraps (Do not use dairy or meat products – they will smell and attract bugs!).

2 Classroom Composting
• One sandwich bag full of organic garden waste like grass clippings, sawdust, wood chips, straw, leaves, weeds, paper, and other garden wastes.
• A few small non-biodegradable items like glass, aluminum foil, and Styrofoam.
• Two pounds of rich, dark, healthy soil.

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10 minutes
Questions for students to answer after the reading, for homework, or after creating miniature compost pile.

1. What happens to your waste when you throw it in the garbage? Is it reused or recycled?

2. What are some advantages of composting and recycling waste instead of throwing it in the garbage?

3. How do you think the results of this experiment will affect your consumption habits?

4. How do you think the results of this experiment will affect how you dispose of your waste?

5. How does composting affect the size of your Ecological Footprint?

Additional Exercise: Students may want to describe the weekly progress in the mini compost pile in a weekly journal. Be sure the description includes a comparison between the biodegradable and non-biodegradable items. In their first journal entries, students should make predictions about what will and will not decompose and which items will decompose the quickest.
Matching!

Draw a line connecting the word on the left with its description on the right:

<table>
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<tr>
<th>Science</th>
<th>the science of numbers, quantities, and shapes and the relations between them</th>
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<td>Math</td>
<td>something that is created with imagination and skill and that is beautiful or that expresses important ideas or feelings</td>
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<td>Engineering</td>
<td>knowledge about or study of the natural world based on facts learned through experiments and observation</td>
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<tr>
<td>Arts</td>
<td>the use of science in industry, engineering, etc., to invent useful things or to solve problems: a machine, piece of equipment, method, etc.</td>
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<tr>
<td>Technology</td>
<td>the work of designing and creating large structures (such as roads and bridges) or new products or systems by using scientific methods</td>
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Questions/Activities (Critical Thinking)

1. Throughout the show, the S.T.E.A.M. Team works together and share ideas to solve problems. Why do you think that working together is a good way to find a solution? Is it sometimes better to work alone? Why?

2. Katie Featherstone doesn’t like the S.T.E.A.M. Team. She doesn’t always say very nice things to them. Why do you think Katie feels that way? Do you think that Katie exhibits bullying behavior? Is it ever okay to bully someone? Why? Discuss.

3. **Define the vocabulary words** found on the bottom of Pg. 4 then write sentences using them. Remember: anyone reading your sentence should be able to understand the word from the context in which it is used.

6. **Write a letter to your favorite actors/characters from this production.**
Tell them what you liked about the play, their performance, etc. Mail your letters to:
Georgia Ensemble Theatre
P.O. Box 607
Roswell, GA, 30077-0607
ATTN: The S.T.E.A.M Team

Suggested Further Reading/Links

- Encyclopedia Brown, Boy Detective by Donald J. Sobel
- Diary of a Wimpy Kid by Jeff Kinney
- Nancy Drew by Edward Stratemeyer

For more information about Georgia Ensemble Theatre and our upcoming Theatre for Young Audiences programming, please contact us at bookings@get.org or (770) 641-1260 ext. 223.

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