



FOR YOUTH DEVELOPMENT
FOR HEALTHY LIVING
FOR SOCIAL RESPONSIBILITY

YMCA Camp Cosby – Outdoor Classroom Curriculum Planning Guide

General Curriculum Topics

Forest Ecology

Classes provide an integrated look at an ecosystem of Southern Alabama by teaching students to become more aware of the interactions taking place around them. Students have the opportunity to identify different tree species, take an up-close look at decomposition, and study invertebrates under a stereoscope.

Wildlife Ecology

Experience the wild world of animals and discover the different adaptations that help them survive. Students are able to interact with some animals in our Life Learning Lab as they learn about predator-prey relationships and different animal adaptations.

Plant Ecology

This set of classes works well as an extension of forest ecology or earth sciences. Students learn new and interesting facts about the parts, inner workings, and uses of plants.

Water Topics

Lake Logan Martin provides an effective visual for students learning about the consequences of water pollution. Instructors teach about the values and impacts of the dam that created the lake, take students on a 'trip' through the water cycle, and discuss how aquatic organisms can indicate water quality.

Earth Sciences

Take a look at the inner workings of the Earth. Students will dive head first into learning about the Earth's layers, tectonic plates, different types of rocks and how they are formed. Students will then be able to be a part of the never ending game of ROCKITY ROCK ROCK ROCK!!

Outdoor Skills

Combining a mix of fun and interactive learning, these classes are an integral part of the spirit here at Camp Cosby. Students use map skills to find facts about animals hidden around camp, or master a compass and unscramble our orienteering course. Instructors teach basic canoeing skills in our most popular outdoor class.

Ways of the Old Days

This program gives students the opportunity to experience what pioneer life was like. Students learn about early settlers in the south and then travel back in time to make their living. (Grades 4-6)

Evening Programs

A wide variety of evening programs make for an exciting and entertaining time here at Camp Cosby. Debate dam values and impacts in a town meeting, watch bats swoop through the sky in search of prey, or learn about planets and constellations.

Detailed Class Summaries

These class summaries are designed so you can get an idea of what classes, games, and activities are offered at Camp Cosby. Take a few moments to peruse this helpful and informative packet to decide which classes would best fit the needs of your students.

Forest Ecology Topics

Professor Hike

Become a professor and teach about turkey-tail fungus, forest succession, and invasive species. In this activity, the students teach their peers about forest ecology. Also known as an each-one-teach-one, the professor hike provides the student with an opportunity to work on their speaking skills in a non-intimidating setting. After learning from their instructor/naturalist, students will be given the opportunity to teach a fact about forest ecology to their peers. (Grades 4 and 5)

Tree Species ID (Dichotomous Key)

Come and meet a tree! Hike the tree identification trail and 'leaf' the exploring to us! Students learn about the differences in leaves and how to identify trees using a dichotomous key (a key that allows you to pick from a pair of characteristics, until you have narrowed down the choices to the correct tree). This class works best when foliage is still on trees, but an adapted version of this class is available for winter. (Grades 4 and 5)

Invertebrate Study with Stereoscopes

The ants go marching one by one...students go on a short hike to collect small insects/invertebrates to examine under the stereoscopes. Students will be taught an introduction to insects and get an up-close look at the specimens they've collected. Students draw what they discovered for inclusion in their journals. Any stereoscopes class can be combined with one other topic. (Grades 5 and 6)

Sensory Awareness (Sensory Trail)

AUGH! What am I touching?! Students will walk blindfolded along a rope-guided trail encountering interesting objects along the way. They will use their sense of touch to try to decipher what each object is. Students have the chance to see what it is like to be blind for a short period of time. This activity is great for 4th grade and above. (Grades 4 and 5)

Wildlife Ecology Topics

Predator/Prey Relationships

You're a lion hunting in the savanna. You spot your prey, a herd of zebras, ahead of you through the thick grasses. You creep towards them, careful not to let your scent give you away. You get closer...closer...and then pounce! This is just one of the many exciting games students may experience. The connections between predator and prey animals are illustrated in a series of active games. This is a high-energy class where students take on the roles of animals in different stages of the food chain. This is a great class choice if you are interested in providing a chance for your students to expend some of their excess energy. (Grades 4-6)

Animal Adaptations (Games)

Who's hiding behind that tree? I can see you! Too bad you don't have a prehensile tail. Using a series of activities and games, students get a hands-on lesson about how animals must adjust to survive in their ecosystem. After learning about our own adaptations, students will discover what makes each animal; uniquely adapted to their own environment. (Grades 4-6)

Animal Adaptation (Handling Animals)

Come curl up with our ball python or wiggle your nose like a rabbit in our Nature Center. Students relate animal adaptations to real life while interacting with live animals. Animals in the Nature Center range from a three foot long ball python to turtles and sugar gliders. This class is an overwhelming favorite among students. Students will be given the opportunity to pet the animals and learn interesting facts about them. (Grades 4-6)

Plant Ecology Topics

Plant Physiology with Stereoscopes

Get to the root of things and see what 'stems' from your exploration! Students go on a short hike to collect plants to examine under stereoscopes. Students will be taught an introduction to plant parts, and then get an up-close look at their specimens. Students draw what they discovered for inclusion in their journals. Any stereoscopes class can be combined with one other topic. (Grades 5-7)

Water Topics

Aquatic Habitat and Organism Search (Boots)

Make a big SPLASH and jump into the water cycle. Explore with us as we plumb the depths of the lake using nets and big rubber boots. Don't forget your life jacket! In their hands-on investigative study, students explore the lake for a diversity of aquatic species. Students are introduced to a biotic index and discover how the organisms they find in the lake can be used to indicate the health of the lake. (Grades 4-7)

Earth Science Topics

Geology

Rock n' Roll! Sign up for our geology class and make the earth shake. In this class, students are introduced to tectonic plates, rock types, rock formation and composition. Rocks can be tested for calcium. Students may adopt a pet rock, or play the game rockity-rock-rock. Each activity gives the students a memorable way to learn about geology. (Grades 5-7)

Outdoor Skills

Maps

Don't lose your way! Discover the nuts and BOLTS of maps. This class familiarizes students with different types of maps and their features. After a session inside, students test their map skills with a map hunt around Camp Cosby. This is a popular class that leaves students wanting more.

Compasses/Orienteering Course

Still lost? Pick up a compass, put Red Fred in the shed, and unscramble our outdoor word puzzle. In this class, students are introduced to the parts of a compass, how it works, and how to take a bearing. After practicing with a compass, students learn about pacing and then spend time on the Cosby Orienteering course testing their skills. (Grades 5-7)

Canoeing

What floats your boat? After learning safe and proper canoeing techniques, students get the opportunity to test their canoeing skills on Lake Logan Martin. A naturalist will be in the water with the students. This class is a favorite of both students and chaperones. This class is not recommended from mid-November to mid-March due to cold weather/water temperatures. If chosen during this time, it is subject to cancellation when the combined air and water temperatures do not equal 100 degrees. (Grades 4-7)

Group Building Challenges

Do you want to be a Samurai-in-Training? Or do you think your group has the courage to take on the Toxic River Challenge? This series of games and initiatives is designed to build a sense of unity among students. Activities will focus on trust, leadership, and communication. Students learn to work together to achieve a goal and to confront issues as they arise. This class includes the use of props and portable initiatives to assist in the presentation of these principles. (Grades 4-7)

Evening Programs

Campfire

Come and join us for friendship, fire, fabulous songs and skits. This entertaining evening program turns your naturalist into a comedian as they perform skits and teach songs that students will be singing for weeks to come. The campfire program involves some students and adults in skits and engages students throughout the entire program. The campfire is usually held at GRACE chapel, but can be moved inside in the event of bad weather.

Night Hike

How good is your eye sight in the dark? Come discover the mystery and surprise of the woods at night. This popular evening program gives students the opportunity to experience Camp Cosby's nature at night. Through a series of activities, students will learn many interesting facts about nocturnal animals, the structures of our eyes, how we and animals use our senses, and will do a short solo hike in a supportive, safe environment.

Astronomy

How hot is a blue star? Where do constellations come from? Come and find out the answers to these questions as we present clear, concise information about astronomy through crafts, stories, trivia questions, and games. Students will participate in rotating activities that leave them with an incredible introduction to astronomy. If the skies are clear students will star gaze and our knowledgeable naturalist will point out constellations.

Activities for an Additional Fee:

Low Ropes

You're flying across the Swiss Alps for vacation with a group of friends when your plane crashes into a mountainside! You need to cross three mountaintops to reach the nearest village. How will you work together to get there? For an additional fee, participants can extend their group building experience on Camp Cosby's Low Ropes course. Elements constructed of wood, rope and steel cable challenge students to think critically and take a step past their comfort zones. Students will have the satisfaction and exhilaration of being able to accomplish a goal as a team.

Alpine Tower/Swing

Set your sights for high adventure! Tackle our Alpine Tower, a 55-foot outdoor structure made of telephone poles, rope ladders, swinging logs, and cable. Or take a ride on the GIANT Swing that will send you spirits soaring! Our trained instructors will teach students the proper safety rules. Participants are fitted with a harness and helmet and hooked into a rope or cable before climbing or swinging. Instructors work with students to create and accomplish their personal goals.

Square Dance

"Bow to your partner, do-si-do!" This high-energy evening program encourages students to try something new while introducing them to square dancing. The students learn modern square dancing techniques and history and even get to do some of today's most popular line dances. A professional caller teaches dance steps and makes this an entertaining night.