4-H Volunteer Leaders’ Conference

February 1, 2014

go.ncsu.edu/extensionforestry4h

Extension Forestry: Offerings for 4-H Youth & Adults
Do you like to......

... spend time outside?
... explore natural places?
... investigate and watch wildlife?
... learn new information that you can share with your family, friends & 4-Hers?
... be a lifelong learner?
... meet other 4-Hers?
Then one of these 4-H programs could be for you!

- Wildlife Projects
- Forestry and Wildlife Presentations and Project Record Books
- WHEP
- Forestry Invitational
Wildlife Projects

- Variety of interest areas
- Can be done with your family, your club, or by yourself
- Great ideas for presentations and project record books!

Butterfly Buffet

- **Life Skill:** Critical thinking
- **Project Skills:** Identifying butterfly species and their nectar sources
- **Objective:** Observe wild butterflies and their feeding habits, record findings, and make recommendations
- **Success Indicator:** Participants keep detailed records of observations and recommend which plants would be most beneficial to local butterflies

Turtle Tales

- **Life Skill:** Communication
- **Project Skill:** Researching and describing native turtles
- **Objective:** Educate peers about turtles found locally
- **Success Indicator:** Participants collect accurate and interesting information about turtles and communicate their findings to a group
Forestry and Wildlife Presentations

- Lots of different topics fit into this category
- Not many presentations in the older age categories
- Can use your experiences with wildlife projects, WHEP, and Forestry
Project & Cumulative Records

- Environmental Science is a catch-all category for Project and Cumulative Records
What is WHEP?

Wildlife
Habitat
Evaluation
Program
WHEP is...

(official program description - BORING)

.....a 4-H youth natural resource program dedicated to teaching wildlife and fisheries habitat management to junior and senior level (ages 9-19) youth in the United States.
WHEP is...

(unofficial North Carolina definition)

- A chance to learn about wildlife around you
- An opportunity to explore new places
- A way to work towards a team goal
- Career Exploration
- FUN!
North Carolina State Contest

- Four Activities
  - Wildlife Identification & Wildlife Knowledge
  - Identifying Wildlife Foods
  - Aerial Photos
  - On-site Wildlife Management Practices
Wildlife ID

- Do you know what this animal is?

CORRECT! NORTHERN CARDINAL
Wildlife ID

- How about me? What am I?

CORRECT! Eastern Box Turtle
Wildlife Foods

- What am I?

BARK
Wildlife Foods

What might like to eat me?
What do you see?
On-Site Management Practices

- Looks at everything you have learned and make recommendations on how the land should be managed for specific species.
State Contest

- A day full of fun contest activities
- Time to meet and hang out with other 4-H members from across the state
- Contest rotates across the state – visit new places!
- Scoring is based on worksheets that you will practice with your club
State Contest

- AWARDS!!!
  - Top 3 JR and SR teams receive awards
  - Awards for top scoring individuals
  - Participant ribbons
State Contest

- Top Scoring Senior Team has the opportunity to represent NC at NATIONAL WHEP INVITATIONAL, held in a different state every year.
2014 State Contest

- May 3, 2014 @ Carolina Beach State Park
- General Contest Day Schedule
  
  9:00 am ---------- Registration
  10:00 am -------- Contest Begins (Activity III then II & IV)
  12:00 pm -------- Lunch
  12:45 pm -------- Contest Resumes (Activity I)
  1:30 pm -------- Scoring and Activities for Contestants
  4:30 pm -------- Presentation of Awards

- Can our team come and watch?
Forestry Invitational

- The SUPER BOWL of 4-H Forestry!
- State contest
  - Held in Raleigh in late September
  - Five Events
- National Invitational
  - Held in West Virginia in July
  - Eight Events
Why Forestry??

Official Reasons (Boring!)

- Develop an appreciation of the importance of conserving forests as a source of income, raw materials, and enjoyment necessary for quality living
- Acquire information and understanding of practical forestry skills in forest management and the use of forest and wood products
Why Forestry??

Unofficial reasons - the NC version!

- Top manufacturing industry in North Carolina
- ~78% of forestland in NC is owned by Non-industrial Private Landowners (you, me and our families)
- NC ranked #4 in the % of forestland
- Jobs at all educational levels, pay scales
- Get to be outside!
Why Forestry??

- Opportunities to be on cool TV shows like Ax Men and Swamp Loggers!
- A good jumping off point for any youth that wants to be involved with natural resources
- Don’t forget our urban forests, too!
Forestry Events – State

- Five events
  - Tree ID
  - Insect ID
  - Disease ID
  - Tree Measurement
  - Compass & Pacing
Tree ID

- What am I?

CORRECT!! yellow-poplar or tulip poplar
Tree ID

- Can you guess me?

CORRECT!! white oak
Insect and Disease ID

- Need to know 10 insects & 10 diseases
- List is provided
- Flashcards available for study
Tree Measurement

- Learn to use a Biltmore Stick to measure height and diameter of a tree (15 trees total)
- Use table to discover how much wood is in the tree (volume)
Compass and Pacing

- Added in 2013
- Provides great map & compass skills to carry throughout life
- Hands-on
State Contest

- Top 3 JR and SR teams are recognized
- Top scoring individuals recognized
- Participant certificates
- Top Senior Division Team has the opportunity to represent North Carolina at the national contest in West Virginia
2014 State Contest

- September 13, 2014
  @ Schenck Forest in Raleigh
- Begins at 10am, wrap up by 4
- All events completed individually

- What more info?? Attend one of the
  Wanted: 4-H Forestry Coaches sessions led
  by two 4-H volunteers this afternoon!
Natural Resource 4-H Programs

Goals:

- Build upon what you already know
- Start small (maybe a presentation or project) and build up to something bigger (state contests)
- Work with your leader and club members to learn the information
- Start now! Go to a contest and see what is it about - then work hard on the information for the following year.
Whew? There is more???

YES!! For you, the volunteer leader, we have Project Learning Tree (PLT)!
Project Learning Tree

- Environmental Education Activity Guide
- 96 Activities
- Easy to use, hands-on
- Provided FREE of charge at workshop (mostly free)
- Workshops across the state
- Ask your 4-H agent to help you set up one!

www.ces.ncsu.edu/plt
Tree Factory

By acting out the parts of a tree, students will learn about the structure of a tree. They create a tree factory.

*Activity 63*

Levels
Activity: Grades 3-6
Variation: Grades PreK-2

Subjects
Science, Physical Education, Performing Arts

Concepts
- Populations of organisms exhibit variations in size and structure as a result of their adaptation to their habitats. (4.1)
- The structure and scale of an ecosystem are influenced by factors such as soil type, climate, availability of water, and human activities. (4.2)

Skills
Ordering and Arranging, Representing, Identifying Attributes and Components, Comprehending

Differentiated Instruction
Prior Knowledge, Curricular/Personal Connections, Paired/Cooperative Learning, Key Vocabulary, Higher Order Thinking, Oral/Reading/Writing Skills

Technology Connections
Digital/Video Cameras, Presentation Software, Graphic

OBJECTIVE
- Students will understand the structure of a tree and how different parts of a tree help the tree function.

ASSESSMENT OPPORTUNITY
- Pass out art supplies such as drawing paper, scissors, construction paper, toilet paper rolls, straws, aluminum foil, scissors, and tissue paper. Tell students to create a model of a tree. Explain that they should include and label all tree parts they’ve learned about and be able to explain what each part does. They may explain orally, or create labels that give these explanations. Encourage them to be as creative as possible while still being accurate.

BACKGROUND
From a tree’s tiny root hairs buried in the ground to the highest leaves in its crown, each part of a tree plays a role in helping it to function. Here’s a rundown of the various parts of a tree and what each one does:

Leaves
Leaves are the food factories of a tree. Using energy from the sun, which they capture with a pigment called chlorophyll, leaves convert carbon dioxide and water into oxygen and sugar (food!). This process is called photosynthesis. The gases needed for and generated by photosynthesis enter and exit through tiny holes called stomata, on the under-surface of the leaves. Water vapor also exits through the stomata in the process of transpiration.

Trunk and Branches
The trunk provides support for branches, which in turn support the tree’s leaves. The trunk and branches contain the tree’s “pipes”—the tubes that transport water and nutrients to the leaves, and sugar from the leaves to the rest of the tree. They also contain the growing layer of the tree that makes the trunk, branches, and roots of the tree thicker each year. Here’s a look at a tree trunk from the

Tree Trunk Layers
OH! One more great resource…. 

- Office of Environmental Education and Public Affairs
- Calendar Listing of events statewide
- Discover EE Centers in your backyard

eenorthcarolina.org
DISCOVER THE WORLD OUTSIDE!

**BE**

Become a certified environmental educator

**GO**

Explore one of our 200+ environmental education centers

**DO**

Search our calendar for events

Visit our calendar of EE events!

Learn about the Mountains to the Sea AmeriCorps Program!

Jobs

Newsletter

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EE News Posts from eenewstips.blogspot.com
Contact Me

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All things Extension Forestry 4-H

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