

Course	Agricultural Science II
Unit	Forestry
Lesson	Identifying Missouri Trees
Estimated Time	Four 50-minute blocks

Student Outcome

Identify common Missouri trees.

Learning Objectives


1. Describe how to identify trees.
2. Identify the four major growing areas of trees in Missouri.
3. Identify some common trees of Missouri, their uses, and the areas in which they grow.

Grade Level Expectations

SC/LO/1/E/09-11/a SC/LO/1/E/09-11/b

Resources, Supplies & Equipment, and Supplemental Information

Resources

1. PowerPoint Slides
 - ☐ PPt 1 – Arrangement of Leaves on the Stem and Types of Leaves
 - ☐ PPt 2 – Lobes and Catkins
 - ☐ PPt 3 – The Four Growing Areas of Missouri
2. Activity Sheet
 -  AS 1 – Tree Identification Chart
3. *Forestry* (Student Reference). University of Missouri-Columbia: Instructional Materials Laboratory, 1986.
4. *Forestry Curriculum Enhancement*. University of Missouri-Columbia: Instructional Materials Laboratory, 2008.

Supplies & Equipment

- ☐ Pictures or samples of leaves, fruit, twigs, flowers, and bark

Supplemental Information

1. Internet Sites
 - ☐ Forestry. Missouri Department of Conservation. Accessed April 2, 2008, from <http://mdc.mo.gov/forest/>.
 - ☐ Missouri Forestry: Urban Trees. Missouri Department of Conservation. Accessed April 2, 2008, from <http://mdc.mo.gov/forest/urban/urbantree/>.
 - ☐ Missouri Trees and Shrubs. Missouri Department of Conservation. Accessed May 29, 2008, from <http://www.mdc.mo.gov/forest/landE/MOConservationTreesAndShrubs/>.
2. Print
 - ☐ Holland, I.I., G.L. Rolfe, and D.A. Anderson (ed.). *Forests and Forestry*. 5th ed. Danville, IL: Interstate Publishers, 1997.

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- ❑ Settergren, C., and R.E. McDermott. *Trees of Missouri* (Guide SB767). Columbia: University of Missouri Extension, reviewed 2000. Accessed May 27, 2008, from <http://extension.missouri.edu/explore/specialb/sb0767.htm>.
 - ❑ Slusher, J.P., and G. Hoss. *Before You Order Tree Seedlings* (Guide G5006). Columbia: University of Missouri Extension, revised 2000. Accessed May 27, 2008, from <http://extension.missouri.edu/explore/agguides/forestry/g05006.htm>.
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Interest Approach


There are over 180 species of native and commonly naturalized trees in Missouri. Identification and knowledge of some of these trees will be a valuable tool to the landowner when developing a forest management plan.

Communicate the Learning Objectives

1. Describe how to identify trees.
2. Identify the four major growing areas of trees in Missouri.
3. Identify some common trees of Missouri, their uses, and the areas in which they grow.

Instructor Directions	Content Outline
<p>Objective 1</p> <p><i>Ask the students about their favorite trees. Ask them how they recognize those trees. Write their answers on the board. Summarize the importance of knowing which trees are productively valuable and how to identify them. Refer to PPt 1 and PPt 2.</i></p> <p><input type="checkbox"/> PPt 1 – Arrangement of Leaves on the Stem and Types of Leaves</p> <p><input type="checkbox"/> PPt 2 – Lobes and Catkins</p>	<p>Describe how to identify trees.</p> <ol style="list-style-type: none">1. Leaves<ol style="list-style-type: none">a. Arrangement of leaves on stem<ul style="list-style-type: none">– Opposite– Alternate– Whorled (few Missouri trees)b. Simple or compound<ul style="list-style-type: none">– Simple: one leaf (oaks, maples, elms)– Compound: multiple leaflets (locust, walnuts)– Leaf margins: entire, lobed, toothed (serrated)2. Flowers3. Fruit<ol style="list-style-type: none">a. Dry: acorns, podsb. Fleshy: persimmon, wild plum4. Twigs<ol style="list-style-type: none">a. Especially important when there are no leavesb. Examination of color and sizec. Bud arrangement5. Bark<ol style="list-style-type: none">a. Ability to recognize range (old bark different from young bark)b. Some very distinctive barks<ul style="list-style-type: none">– River birch: papery– Shagbark hickory: peeling– Sycamore: color
<p>Objective 2</p> <p><i>Have students identify the four growing areas of Missouri and the characteristics of those areas. Pay particular attention to local areas. Refer to PPt 3.</i></p>	<p>Identify the four major growing areas of trees in Missouri.</p> <ol style="list-style-type: none">1. Areas – boundaries show major changes in growing conditions that should be considered in selecting species<ol style="list-style-type: none">a. Areas: similar soils and climates

Instructor Directions	Content Outline
<p>☐ PPT 3 – The Four Growing Areas of Missouri</p>	<ul style="list-style-type: none"> b. Considering specific sites (conditions will vary within an area) 2. Areas <ul style="list-style-type: none"> a. Ozark Area (A) <ul style="list-style-type: none"> - High priority area for tree planting - Extensive commercial timber planting - Often little or no site preparation needed before planting openings b. River Border Area (B) <ul style="list-style-type: none"> - Good soil potential for planting high quality hardwood species - Site preparation necessary before planting - Mowing or light disking after planting - Herbicides may be necessary c. Southeast Lowlands Area (C) – Bootheel <ul style="list-style-type: none"> - Feasibility of planting certain species in overflow land in this area - Site preparation is essential - High priority area for windbreaks - Mowing or light disking after planting - Herbicides may be necessary - Low grasses beneficial - Cultivation or regular mowing of weedy sites until trees are established d. Northern and Western Prairie Areas (D) <ul style="list-style-type: none"> - Generally soils and climate conditions of these areas not as favorable - Site and species selection extremely important - Extra precautions needed against insect and disease outbreaks - Wildlife foods and cover plantings moderately successful and much needed
<p>Objective 3</p> <p><i>The Student Reference includes 25 species of trees. It is not recommended that all species be included in this lesson. Choose 10 to 15 species of interest or importance in your area. Using the Student Reference and Trees of Missouri (from Extension) or</i></p>	<p>Identify some common trees of Missouri, their uses, and the areas in which they grow.</p> <p>Baldcypress Leaves: Needle-like and delicate, arranged in two ranks in a feather-like fashion, loses needles in winter Flowers: Male – long drooping clusters Female – globe-shaped at end of branch Twigs: Light green at first, becoming reddish brown by winter</p>

Instructor Directions	Content Outline
<p><i>Missouri Trees and Shrubs (from MDC), discuss the characteristics, importance, and areas in which these species grow. Have students complete AS 1 using information about the trees. If possible, have samples of leaves, fruit, twigs, flowers, or bark from these species. A walking tour of a local woodland area may help develop the tree identification skills of students.</i></p> <p> AS 1 – Tree Identification Chart</p>	<p>Baldcypress</p> <p>Bark: Cinnamon brown; divided by long, loose, shreddy ridges</p> <p>Area: Area C</p> <p>General: Baldcypress occurs naturally on deep swamps that are usually flooded for long periods of time. Baldcypress has been successfully planted along lakes and watercourses in central Missouri and has been very successful.</p> <p>Black Locust</p> <p>Leaves: Alternate, compound, 9 to 19 oval leaflets, droop at nightfall</p> <p>Flowers: Large clusters; creamy white, fragrant blooms in late spring</p> <p>Fruit: Thin, flat pod containing 4 to 8 kidney-shaped seeds</p> <p>Twigs: Dull brown, slender, some spiny</p> <p>Bark: Brown with yellow or orange inner bark; inner bark containing poison named “robin” (capable of killing livestock when eaten in large quantities)</p> <p>Area: Found in areas A, B, and D</p> <p>General: Primary uses are for posts, erosion control, fuelwood, and, because it is a legume, soil improvement. Branches are armed with pairs of short, sharp spines. Because it spreads easily from root runners, it can become a nuisance.</p> <p>Black Oak</p> <p>Leaves: Alternate, simple, roughly egg-shaped; 5 to 7 bristle tipped lobes, dark green, shiny</p> <p>Flowers: Male and female flowers on same tree Male – hairy catkins 4 to 6 inches long Female – red on short, hairy stalks</p> <p>Fruit: Acorn 3/4 inch long, bowl shaped, scales forming loose fringe on rim</p> <p>Twigs: Moderately stout, dark brown to black, smooth when mature</p> <p>Bark: Dark, black, rough, deeply furrowed, blocky on older trees, orange inner bark</p> <p>Area: All areas</p>

Instructor Directions	Content Outline
	<p>General: Black oak is second only to white oak in the amount of net board foot volume of commercial forest area. Black oak is frequently found on dry, rocky ridges and upper slopes. In southern Missouri, black oak competes with and often crowds out shortleaf pines. The wood of black oak is used for flooring, crating, railroad ties, and rough local construction.</p> <p>Black Walnut</p> <p>Leaves: Alternate, compound, 13 to 25 leaflets, spear-shaped, long, pointed tip</p> <p>Flowers: Male – catkins 3 to 5 inches long Female – 3 to 5 on spikes</p> <p>Fruit: Large, globe-shaped nut in thick, leathery, rough, green husk; shell hard and bony, rounded; kernel sweet and edible</p> <p>Twigs: Stout, brownish</p> <p>Bark: Variable; almost black, dark chocolate brown inner bark</p> <p>Area: All areas; prefers deep, well-drained, nearly neutral soils</p> <p>General: This is one of the best known and the most valuable trees in our state. Since 1899, one-fifth to one-sixth of all black walnut lumber comes from Missouri forests. On an individual tree basis, black walnut is the most valuable commercial lumber species in the United States. Its wood is highly valued for gun stocks, veneer, and fine furniture. Nuts are also sold commercially and the shells are used as an abrasive.</p> <p>Eastern Cottonwood</p> <p>Leaves: Alternate, simple, long, pointed tip, broadly rounded base</p> <p>Flowers: Male and female flowers on separate trees Male – red catkins Female – green catkins</p> <p>Fruit: Long cluster of alternately arranged capsules, each capsule containing many seeds in a cottony mass</p> <p>Twigs: Moderately stout, light brown or tan, shiny</p>

Instructor Directions	Content Outline
	<p> Bark: Greenish yellow and smooth on young stems; thick, dark, and deeply furrowed on old trunks Area: All areas except south central portion of A General: The cottonwood is a large spreading tree found along streams throughout the state. It is sometimes used as an ornamental tree where large spaces exist because it grows rapidly and requires minimal care. Its leaves turn bright yellow in the fall. It is used for excelsior, crates, and barrel staves. It has also become popular as a source of wood pulp for paper. </p> <p> Eastern Redcedar Leaves: Scale-like or awl-shaped, opposite around a four-angled central stem, dark green Flowers: Male and female flowers on separate trees Male – cone-like with 4 to 6 scales Female – structure with fleshy scales Fruit: A bluish berry, about the size of a pea, with a white frost-like shade Twigs: Slender, four-angled, becoming reddish brown Bark: Tan to reddish brown, shreddy Area: All areas General: Eastern red cedar is one of the most versatile trees in Missouri. It is found in every county in the state on nearly all classes and conditions of soil. It seems to thrive on barren soils where few other trees are found. Its heartwood is red, durable, and aromatic and is used in cedar chests, closets, and novelty items. Its dense evergreen foliage makes it a valuable windbreak, screen, or hedge tree. The fruit is a favorite food of birds. </p> <p> Flowering Dogwood Leaves: Opposite, simple, 3 to 5 inches long, egg-shaped, pointed at both ends Flowers: Appear before the leaves in small flat-topped clusters, greenish white or yellow with four white petal bracts beneath, occasionally bracts are red or pink Fruit: Borne in clusters, egg shaped, bright scarlet Twigs: Slender, purple </p>

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	<p> Bark: Reddish tan to dark brown; broken in square or round, blocky scales Area: All areas around or south of the Missouri River General: Missouri's "State Tree" is conspicuous in the early spring by its large, showy, white, petal-like bracts which give the appearance of large spreading flowers. The scarlet fruit is relished by birds, squirrels, and other animals. The Dogwood is a small tree commonly found in the understory of a woodland. It is found naturally south of the Missouri River but can be grown in selected sites. </p> <p>Green Ash</p> <p> Leaves: Opposite, compound, 7 to 9 spear-shaped leaflets Flowers: Male and female flowers on separate trees Male – wooly clusters Female – greenish red Fruit: Seeds with wings, paddle-shaped, narrow Twigs: Stout, velvety when mature Bark: Gray, the ridges crossing frequently to form a diamond pattern Area: All areas General: The green ash is often planted as a shade tree because it is rapid in growth. A bottomland species, its wood is used for many of the same purposes in the lumber industry as white ash. </p> <p>Hackberry</p> <p> Leaves: Alternate, simple, narrow egg-shaped, long points, often hooked in a sickle-like fashion Flowers: Male and female flowers on the same tree Male – green, borne in small clusters Female – green, borne singly Twigs: Slender, light brown, becoming gray at maturity (A very common disease of hackberry causes erratic twig growth called "witches broom.") Bark: Grayish, rough with warty projections Area: A, B, and D General: In rich bottomlands where hackberry is commonly found, it may grow 125 feet in height. Many people consider the hackberry a </p>

Instructor Directions	Content Outline
	<p>desirable shade tree. Insects may cause galls. The purple berrylike fruit is food for squirrels and birds.</p> <p>Northern Red Oak</p> <p>Leaves: Alternate, simple, 5 to 8 inches long</p> <p>Flowers: Male and female flowers on the same tree Male – 4 to 5 inches long; heavy, yellow catkins Female – 2 to 3 on short stems</p> <p>Fruit: An acorn 1 inch long, oblong, somewhat hairy at the cup end; cup end is saucer shaped, enclosing 1/4 to 1/3 of the nut</p> <p>Twigs: Slender, reddish-brown</p> <p>Bark: Dark brown or black, smooth on young trees, deeply furrowed on older trunks</p> <p>Area: All areas</p> <p>General: Northern red oak is a favorite wood for cross ties, rough lumber, flooring, and for certain types of barrels. The brilliant red color of its autumn leaves and the symmetrical form of the tree make the species a widely used shade tree where space is not limited.</p> <p>Osage Orange (Hedge Apple)</p> <p>Leaves: Alternate, simple, long pointed tip, dark green and lustrous</p> <p>Flowers: Male and female flowers born on separate trees Male – small, greenish cluster Female – globe-shaped, many-flowered head</p> <p>Fruit: A large globe-shaped, fleshy fruit resembling a rough, green orange; commonly called a hedge apple</p> <p>Twigs: Slender, orange-brown or tan in color</p> <p>Bark: Greenish, fissured when young with orange inner bark, shreddy, orange and brown when mature</p> <p>Area: D, B, parts of C and A</p> <p>General: In the past, Osage orange has been used as a “living fence.” The dense, compact, thorny branches and short trunk provide an excellent barrier to livestock. The wood of this species has properties which are ideal for making archery bows. In addition, its hardiness and durability</p>

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	<p>make this an excellent wood for fence posts and telephone pole insulator pins.</p> <p>Pecan</p> <p>Leaves: Alternate, compound, spear-like leaflets, lower leaflet hooks back toward the stem</p> <p>Flowers: Male – catkins in threes, 3 to 5 inches long Female flowers – in several flowered spikes on the tips of branches</p> <p>Fruit: In clusters of 3 to 12 oblong-shaped nuts in a thin husk, nut smooth with thin shell and sweet kernel</p> <p>Twigs: Stout, reddish-brown with large orange-brown lenticels</p> <p>Bark: Thick, light to dark reddish-brown, deeply furrowed to scaly on very old trees</p> <p>Area: B, D (southwestern), A (western)</p> <p>General: Pecan is a favorite nut, timber, and shade tree of Missouri. It occurs naturally in areas along certain large streams and rivers throughout the state. It is most common on well-drained loam soils not subject to prolonged overflow. It also occurs on certain heavy textured bottomland soils and some cool protected slopes. Although once used a great deal for flooring, the lack of adequate amounts of marketable pecan has prevented this use in recent years.</p> <p>Persimmon</p> <p>Leaves: Alternate, simple, oval-shaped, 4 to 6 inches long with pointed tips</p> <p>Flowers: Male and female flowers on separate trees Female flowers – solitary, yellow or creamy white, bell shaped</p> <p>Fruit: Large fleshy berry 1 to 1-1/2 inches in diameter, orange and wrinkled when ripe in autumn, edible but often astringent</p> <p>Twigs: Slender, brown becoming gray</p> <p>Bark: Dark, broken into thick blocks, with the inner block on young trees showing orange between blocks</p> <p>Area: A, B, D (mainly below Missouri River), and C</p>


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	<p>General: The wood of the persimmon tree, closely related to the tropical ebony, is very hard and heavy. It is often used for golf club heads and in weaving shutters where a resistance to splitting is necessary.</p> <p>Pin Oak</p> <p>Leaves: Alternate, simple, broadly oval in outline with 5 to 7 narrow lobes, forked lobes</p> <p>Flowers: Male and female flowers on the same tree Male – hairy catkins 2 to 3 inches long Female – on short, hairy stalks; reddish</p> <p>Fruit: Acorn, small 1/2 inch long; often striped with dark lines; enclosed 1/3 of the way with thin saucer-shaped cups</p> <p>Twigs: Slender, green at first becoming red-brown</p> <p>Bark: Thin and smooth when young, shallowly fissured and rough when mature</p> <p>Area: Parts of A, B, C, and D</p> <p>General: The pin oak is a wetland tree, growing in the bottomlands and borders of swamps (but also occurring in poorly-drained soils and along draws in nearly every county of the state). Because it is one of the fastest growing oaks, it is used extensively as a windbreak and as an ornamental tree. Pin oak has a single, upright stem with numerous long, tough branches. The lower branches usually droop. It produces very knotty, low-grade lumber. Acorns are a favorite food of waterfowl.</p> <p>Red Bud</p> <p>Leaves: Alternate, simple, heart-shaped, dark green in summer, yellow in fall</p> <p>Flowers: Purplish-red clusters along the stem, appear before leaves in early spring</p> <p>Fruit: A legume; oblong, flattened, multi-seeded pod; reddish color</p> <p>Twigs: Slender, brown, turning darker with maturity</p> <p>Bark: Covered with small, dark, loose scales; underbark reddish-brown</p> <p>Area: All areas</p>

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	<p>General: This understory tree is probably found in every county of our state. It is a small, flat-topped tree which grows in the shade of the larger oaks and hickories. This tree is valued for its beauty. The flowers and heart shaped leaves, as well as growth habits, make redbuds a desirable ornamental tree.</p> <p>River Birch</p> <p>Leaves: Alternate, simple, egg-shaped, 1-1/2 to 3 inches long, dark green and shiny</p> <p>Flowers: Male catkins – clustered 2 to 3 inches long Female catkins – short, 1/3 inch long</p> <p>Fruit: Cone-like in appearance, small winged seeds</p> <p>Twigs: Slender, dark red</p> <p>Bark: Thick and dark brown on old trunks, thin and papery on young trees, light pink to tan on outer surface</p> <p>Area: A (except south central), B (except extreme north), C, and D</p> <p>General: A medium-sized tree (rarely as tall as 8 feet or greater than 2 to 3 feet in diameter); more commonly found in clumps of several trunks.</p> <p>Shagbark Hickory</p> <p>Leaves: Alternate, compound, 5 leaflets, elliptical (broadest near pointed tip), dark yellowish-green crown turning rusty golden yellow in the fall</p> <p>Flowers: Male catkins – in threes, green, hairy Female flowers – on short spikes</p> <p>Fruit: 1 to 2-1/2 inches in diameter, nut in husk, nut flattened with 4 prominent ridges, pale tan in color, sweet kernel</p> <p>Twigs: Stout, reddish-brown</p> <p>Bark: Gray, smooth when young, shredding later into strips or shaggy plates, ends curving away from the tree</p> <p>Area: All areas except south central A</p> <p>General: The shagbark often becomes a nuisance around agricultural land since it is quick to invade open fields. The wood is heavy, strong, and flexible. It was once used for the spokes, hubs, and rims of</p>

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	<p>wagon wheels. Its principal uses today are for handles for hammers, axes, picks, and hatchets. A great deal of this wood is also made into charcoal for barbecue grills. Nuts are excellent wildlife food.</p> <p>Shortleaf Pine Leaves: Needles in bundles of 2 or 3 on the same tree Flowers: Male and female flowers cone-like, borne on the same tree Fruit: A cone maturing in two seasons; egg shaped; individual scales, each with a minute prickle Twigs: Moderately stout, purple with white frost-like shade Bark: Rough and scaly at first, thick and divided into large cinnamon-red plates on old trees Area: A, planted in C and D (southwest area) General: The shortleaf pine is the only pine native to Missouri. It is an important timber species, used largely for lumber, paper-pulp, and treated posts. Scattered stands of shortleaf pine furnish valuable wildlife cover. In many cases, large areas may be seeded, under a forester's direction, more economically than they can be planted.</p> <p>Silver (Soft) Maple Leaves: Opposite, simple, deeply 5-lobed, pale green above, silvery white beneath Flowers: Yellow-green to reddish Fruit: 2 single-winged seeds with wings wide spreading, largest of the native maples Twigs: Orange-brown to red, have a disagreeable odor when bruised Bark: Smooth and gray on young trees, scaly or with long thin plates on older trees Area: All areas General: Silver maple is the fastest growing of all maples and produces a shade tree in relatively few years. Commercially, this species has great potential. In certain parts of the state, its importance has risen due to its use as a</p>

Instructor Directions	Content Outline
	<p>furniture wood. It is also used for windbreaks and streambank protection.</p> <p>Sumac Leaves: Alternate, spear-shaped, compound, 9 to 27 Flowers: Small and green in dense clusters at the tip of the branch Fruit: Dense clusters of globe-shaped berries covered with crimson hair Twigs: Stout Bark: Thin, gray Area: All areas except extreme northwest B and D General: Sumac is a shrub up to 6 feet in height. Its fruit ripens from June through August and is eaten by many birds, including wild turkey.</p> <p>Sweetgum Leaves: Alternate, simple, star-shaped with 5 pointed lobes, turns brilliant red and yellow in the fall Flowers: Male and female flowers on the same tree Male – hairy clusters, 2 to 3 inches long Female – clustered on swinging globe-shaped head Fruit: A round globe-shaped cluster of capsules, these ball-like capsules persisting on trees over winter Twigs: Moderately stout, greenish-yellow with corky lenticels Bark: Light gray on young trees; dark brown, fissured and rough on older trees Area: C General: Sweetgum is restricted in range to the lowlands of the bootheel and scattered occurrences in upland swamps. Sweetgum is an excellent lumber species. Nationally, it is second only to oak on the hardwood market. It is made into veneer, furniture, interior trim, and numerous other products.</p> <p>Sycamore Leaves: Alternate, simple, large with 3 to 5 main lobes, very coarsely toothed, yellow-green Flowers: Male and female flowers on the same tree Male – short-stalked dark red clusters</p>

Instructor Directions	Content Outline
	<p>Female – long-stalked, ball-like green and red clusters</p> <p>Fruit: A ball-like multiple of many seeds, brown when mature, clusters hanging on tree throughout winter</p> <p>Twigs: Moderately stout, green</p> <p>Bark: Dark brown; broken into small, rounded scales; smooth and white with large, loose, olive-green, red, or brown scales on older trees</p> <p>Area: All areas</p> <p>General: Sycamores are very tolerant of wet soil conditions and fluctuations in the ground water table. Sycamores make excellent den trees for squirrels, raccoons, and birds and provide food for beavers and squirrels. The wood is hard, tough, and almost impossible to split. Although used in butcher blocks, tobacco boxes, furniture, crates, and barrels, its use in construction is limited due to its warping tendency.</p> <p>White Oak</p> <p>Leaves: Alternate, simple, 4 to 9 inches long, somewhat wider toward the tip end of the leaf, 7 to 9 smooth-edged lobes</p> <p>Flowers: Male flowers – hairy catkins Female flowers – inconspicuous</p> <p>Fruit: 3/4 inch long acorn, short-stalked cup covered with warty scales enclosing about 1/4 of the nut's length</p> <p>Twigs: Slender, greenish red with white frost-like shade, becoming reddish brown as it matures</p> <p>Bark: Light, rough with long loose scales, becomes blocky when older</p> <p>Area: All areas</p> <p>General: White oak can be found under a diversity of environmental conditions. It often grows in almost pure stands on loamy, well-drained soils in protected coves on cool slopes. Probably the most important use in Missouri is the cooperage industry for making barrels for distilleries. Nuts of the white oak are a choice food for squirrels. Leaves turn a deep red in autumn and persist on the tree during early winter.</p>

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	<p>Wild (American) Plum</p> <p>Leaves: Alternate, simple, oval in shape with long pointed tip</p> <p>Flowers: Clusters of several flowers, individual flowers about 1 inch in diameter, white</p> <p>Fruit: Globe-shaped, 1 inch diameter, red or orange colored, sweet and edible</p> <p>Twigs: Slender, dark reddish brown, smooth and shiny</p> <p>Bark: Thin; dark reddish brown; smooth when young; thin, dark plates when older</p> <p>Area: D (southwest), B, A (west), and C</p> <p>General: The wild American plum is a small tree commonly occurring in thickets throughout the state. It provides an excellent wildlife cover and erosion control when planted in the heads of washes in area D.</p>
<p>Application</p> <p> AS 1 – Tree Identification Chart</p>	<p>Answers to AS 1: Answers will vary.</p> <p>Other activities:</p> <ol style="list-style-type: none"> 1. Visit woodland areas to identify trees. 2. Visit the state Nursery at Licking, Missouri, or local private nurseries 3. Have students make a collection of pressed leaves, twigs, bark, fruit, and flowers of local trees.
<p>Closure/Summary</p>	<p>These are just a few of Missouri's numerous tree species. Being able to identify some of these common species is important to the tree farmer, who needs to know their potential uses and to know what species will grow best under given environmental conditions.</p>
<p>Evaluation: Quiz</p>	<p>Answers: Teachers should develop an answer key based on the trees which are selected for their evaluation.</p>