CORONA®

SEASON AFTER SEASON

PRINCIPLES OF PRUNING

Definitive Guide for Pruning Confidence



THE PRINCIPLES OF PRUNING

Proper pruning improves shrubs and trees in a number of different ways, but improper pruning can be even more harmful than none at all. Skill and confidence in your pruning abilities are gained through experience, so it's important to put in the time and effort to learn the basics before proceeding.

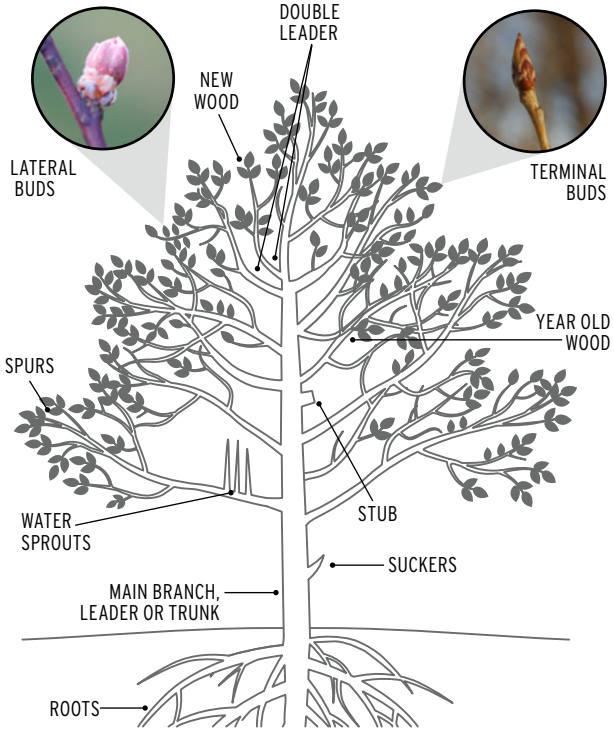
Principle reasons for pruning include:

- Producing more or better blooms and/or fruits.
- Developing or maintaining a desired size or appearance.
- Saving room for interesting varieties of plants.
- Keeping plants from becoming leggy or scrubby.
- Re-establishing balance between root and branch systems after transplanting.
- Training a young plant by pruning early to encourage balanced, open growth.
- Rejuvenating older, neglected shrubs or removing overcrowded stems and limbs to encourage the growth of younger ones.
- Maintaining the health of plants by removing dead or diseased wood.
- Removing dense growth to let light and air reach the inner and lower stems.
- Repairing injuries to damaged wood to reduce the risk of disease-causing organisms.

Download the companion guide
Principles of Planting
at *coronatools.com*

HOW PLANTS GROW

Before you set out to prune, learn how plants grow. Trees and shrubs put on new growth each year from the ends of the branches (terminal buds) and from side branches (lateral buds). A plant's direction and rate of growth are determined by its terminal buds. Lateral buds form branches and twigs that fill in the skeleton of major branches. Dormant buds, which are much less obvious and sometimes hidden below the bark in reserve, only begin to grow if the plant suffers injury to its terminal and lateral buds. A key to skillful pruning is learning how to take advantage of lateral and dormant buds in redirecting growth or rejuvenating a plant.



PRUNING TOOLS

When selecting a pruning tool, the most important thing to consider is the right tool for the job. This will ensure that you are successful and allow you to get the job done confidently while preserving the plant or tree and your tool. Remember, pruning tools are an investment, so it's in your best interest to purchase the best tool you can afford. Quality tools, when properly cared for, will last many seasons and do a far better job than their cheaper counterparts.

All backyard pruning can be completed with just three or four single-handed tools. If a job calls for power tools, it is likely time to seek out a certified professional.

Recommended tools for proper pruning

A pair of hand pruners is a necessity. Choose them carefully and select the pruner that is comfortable in your hand and is best suited for the job you intend to do.

Learn more on
Selecting a Hand Pruner
at *coronatools.com*

There are two styles of hand pruners:

Bypass Pruners have a cutting blade that passes the non-cutting hook, much like a pair of scissors. The blade is beveled and sharpened on one side, with the other flat and unsharpened. These tools make the cleanest cuts on live branches and stems without causing any damage to the remaining stem. This is important as it helps the plant heal from the cut and encourages new growth.

Anvil Pruners have a blade that is sharpened on both sides. It closes down on a flat anvil, which typically has a narrow channel for the cutting blade so as not to damage its sharpened edge. What makes this great for cutting hard deadwood is that there is no risk of crushing any stems. In fact, removing the old deadwood helps the plant direct energy toward new growth.



BP 7100
Bypass Pruner



AP 3234
Anvil Pruner

PRUNING TOOLS

NOTE: *Bypass and anvil pruners serve two different purposes and should not be considered interchangeable. In the worst case, the blade could snap and become a sharp projectile. This not only means losing your hand pruner but also risking bodily injury and voiding the warranty due to misuse.*

Be sure to also pay attention to the pruner's rated cutting capacity. You should not attempt to cut stems that have a larger diameter than the recommended cutting capacity. If you have to open the tool wider than its natural open position, the limb is likely bigger than the pruner is designed to cut. When in doubt, go with a larger cutting tool, like a lopper.



Loppers are long-handled pruning shears that require two hands to use, providing additional leverage while making larger cuts up to 3 inches depending on the recommended cutting capacity. Loppers are useful for pruning hard-to-reach or thorny growth and cutting up discarded branches for the green waste bin.

Pruning Saws are for branches greater than 1 inch in diameter. Pruning saws have curved blades designed to cut on the pull stroke to help remain in the cutting channel, making cuts quickly and evenly.

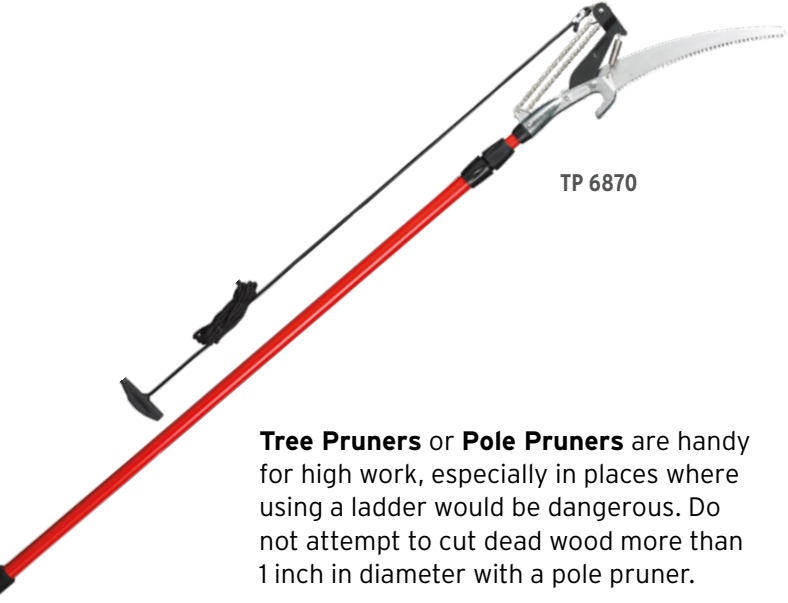


SL 7180
Lopper



RS16150
Pruning Saw

PRUNING TOOLS



TP 6870

Tree Pruners or **Pole Pruners** are handy for high work, especially in places where using a ladder would be dangerous. Do not attempt to cut dead wood more than 1 inch in diameter with a pole pruner.



HS 4344

Hedge Shears are long-handled shears with straight blades at least 8 inches long designed to clip soft young growth on hedges and smaller vines. They will not cleanly cut older, harder wood and should not be used in place of hand shears or loppers.

TIPS FOR MAINTAINING YOUR TOOLS

Pruning tools that are dull, rusted or coated in sap or debris will not cut cleanly and will make it harder to make cuts, which can present opportunities for disease and pests.

Clean tools after each use with a moistened cloth or towelette and mild cleaner like Lysol® or Pine-Sol® to remove loose debris. For harder, caked-on debris, use a stiff, wire brush before wiping tools down with a moist cloth.

Sharp tools will make better cuts and require less effort to power through cuts. Use our Carbide Sharpening Tool (AC 8300) to safely and efficiently sharpen and increase the precision and strength of your pruning tools. Make four to five passes on the cutting side of the blade and one pass on the flat edge to remove metal burrs. It takes only a few seconds, but will help keep your tools cutting like new.

TIP: *Sharpening is crucial for maintaining your pruning tools and the same principle applies to digging tools. Sharpening shovels and hoes makes it easier to cut through hard soils and roots.*



TIPS FOR MAINTAINING YOUR TOOLS

Protect the Metal

Apply a generous coat of machine or natural oil on the exposed metal. It will form a protective coating that prevents moisture and water from collecting on the metal. It also helps prevent debris from sticking to the tools during use, making them easier to wipe clean. Give wood handles a coat of linseed oil to protect the finish and prevent moisture from getting on the wood.

Disinfecting Blades

To prevent the spread of diseases from one plant to another, exposed tools should be disinfected. Avoid using harsh chemicals, such as bleach, as studies show that they can break down or degrade metal over time. Rubbing alcohol will evaporate quickly, disinfecting the tool and protecting it from rust.

Rust Removal

It happens—if your pruner or lopper spends a season out in the elements or was not properly cleaned after use, it will likely rust. Light rust can be removed with a fine grit sandpaper. If the rust is severe and the tool allows for it, you may need to replace the blade. Many Corona tools offer genuine replacement parts available on our website.

TIP: *Do not use steel wool, it can introduce metal burrs into the blade that are prone to rust.*

Inspection

Before the season begins or before putting your tools up at the end of the season, inspect them for signs of wear that will affect performance. Check for stress cracks in wooden handles and loose pivot bolts and springs.

Warranty

Our lifetime warranty guarantees products are free of material and workmanship defects for the life of the tool or we'll replace it free of charge when returned along with the original proof of purchase.

Look for our genuine
Replacement Parts
at *coronatools.com*

PRUNING CUTS EVERY GARDENERS SHOULD KNOW

Pruning is necessary to promote good plant health, remove damaged limbs encourage new growth and maintain shape. There are four basic pruning cuts, each aimed at producing a different effect. Use sharp, clean tools and wipe down blades with a clean cloth when moving from plant to plant.

TIP: *For cuts that involve cutting above a growth bud, angle your tool at about 45 degrees, with the lowest point of the cut opposite and even with the bud and the highest point about 1/4 inch above the bud.*

Pinching

To stop a stem from growing longer, help shape a small-leafed shrub and to encourage bushy growth, pinch the terminal bud (the new clusters of leaves at the tip of a stem) with your thumb and forefinger. Do this with annual and perennial flowers.

Heading

To encourage dense growth, shorten branches, redirect growth and help shape small shrubs and flowering perennials, cut further back on the shoot than with pinching. Use hand pruners to remove a portion of the branch to just above a healthy bud or side branch.

Thinning

To shorten limbs, improve light penetration into plants and to direct the growth of shoots or limbs, remove an entire limb or branch either back to its point of origin on the main stem or to the point where it joins another branch. Use handheld pruners, loppers or a pruning saw to make thinning cuts, depending on the thickness of the branch being cut.

Shearing

To create a hedge or bush with a spherical or square form on small-leafed plants, such as boxwoods, use hand held hedge shears to closely trim leaves until the desired shape is achieved. Shearing stimulates many buds to produce new growth, so you'll be repeating the job regularly once you start.

Source: Monrovia®

PRUNING THROUGH THE LIFE OF A TREE

Proper pruning will get a tree off to a good start and keep it safe and healthy through its life.

There are several reasons to prune a tree:

Structure - To make sure a young tree develops a strong, balanced structure.

Sight Lines - To remove branches that would impede roads, signs or sidewalks.

Safety - To keep branches from growing into buildings or power lines.

Health - To remove dead, cracked or diseased branches before they fall.

Let's dig a little deeper to learn more about each of these reasons for tree pruning:

Structure

Pruning a young tree to encourage the right structure can eliminate many problems later on. Most tree species are strongest when they have a strong central leader—one stem that leads straight up through the center, with other branches spaced more or less evenly around it. Good nurseries prune saplings properly, so when you buy a young tree, check for that strong central stem.

Bear in mind, though, that each kind of tree has a characteristic form, which may be very different between species. This form may not be as apparent in a young tree as it will be later on. Before you buy a tree, research the species you're considering so you know what shape and size to expect and how it should be pruned.

Clearance

As the tree grows, it may become necessary to remove some side branches to keep a sidewalk, sign or driveway clear or to prevent branches from coming into contact with buildings or power lines.

Source: National Association of Landscape Professionals

PRUNING THROUGH THE LIFE OF A TREE

It's best to anticipate problems and prune out these branches when they're small enough to remove easily and safely. Once a tree is large enough that pruning would require a ladder, your wisest move is to call in a professional. Pruning without the proper knowledge and training can not only lead to accidents, but do long-term damage to a tree, causing it to decline or die.

Certified arborists are trained in both safety and tree care. They know how each kind of tree needs to be pruned to preserve its characteristic form.

Eliminating Hazards

As a tree grows, it becomes more beautiful, casts more shade and adds property value. However, it also becomes larger and heavier. Over time, some branches may crack in high winds, become infected with disease or start to rot. Rather than waiting for large trees to fall and cause damage, have a professional arborist check them regularly.

A professional can remove problem branches before they become unstable, as well as check the tree's overall health.

Each species has a different natural lifespan; some trees naturally begin to decay in just a few decades and others may live for hundreds of years. A trained professional will know what hazards and stresses to look for in each species. Regular professional pruning can often extend the life of a tree so you can enjoy its beauty safely for many years to come.



Source: National Association of Landscape Professionals

TREE PRUNING METHODS

Proper pruning is an art based on scientific principles of plant physiology. At its most basic level, pruning trees involves removing damaged, dead or structurally weak limbs, which will improve a tree's health and reduce the chances of personal or property damage caused by falling limbs. More advanced pruning methods aid in improving the tree's structure and long-term health.

There are four basic methods for tree pruning:

Clean

Removing one or more dead, diseased or broken branches reduces the risk of falling branches and the movement of decay, insects and diseases from dead or dying branches to the rest of the tree. Cleaning is the preferred pruning method for mature trees because it does not remove live branches unnecessarily.

Thin

Thinning trees reduces the density of live branches at the edge of the crown instead of the interior, which increases sunlight penetration and improves airflow.

Raise

Crown raising shortens or removes the lower branches of a tree to provide vertical clearance for buildings, signs, vehicles, pedestrians and vistas.

Reduce

Reduction pruning reduces tree height or spread for utility line clearance, to clear vegetation from buildings and other structures or to improve the general appearance of the plant. Not all trees and shrubs can tolerate reduction pruning, so the species and plant health should be considered.

Source: TCIA®

TREE PRUNING METHODS

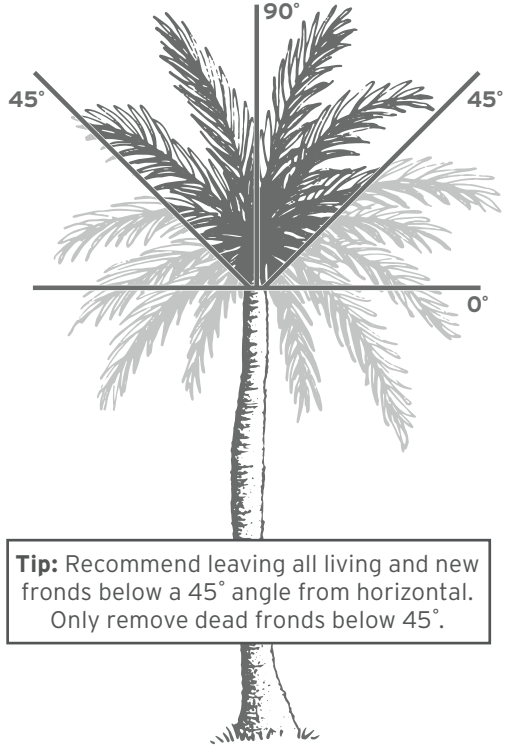
There are also certain pruning practices that are not acceptable and can injure trees:

Topping is the reduction of a tree's size using cuts that shorten limbs or branches to a predetermined crown limit, often leaving large stubs.

Lion's Tailing is the removal of an excessive number of inner branches from the tree.

Rooster Tailing is the over-thinning of palms by removing too many lower fronds.

An understanding of the end goal lies at the heart of good pruning. Before beginning work, it is imperative that your plans include pruning objectives, the pruning types to be used, the size range of branches for removal, the percentage of live crown for removal and the location of each branch.



Tip: Recommend leaving all living and new fronds below a 45° angle from horizontal. Only remove dead fronds below 45°.

Source: TCIA®

PRUNING DOS AND DON'TS

DOS

- Ask your arborist or tree care company if they prune according to the American National Standards Institute standard for tree pruning (ANSI A300). This standard recommends and in some case requires, that the use of certain tools, cutting techniques and pruning methods be followed. It also sets the standard definitions for terms the arborist will use in your estimate. Properly written work estimates for tree pruning should be written in accordance with ANSI A300 standards.
- Remember that poor pruning can cause damage that lasts for the life of the tree.
- Assess your trees after a storm to see if there is pruning needed.



Source: TCIA®

PRUNING DOS AND DON'TS

DON'TS

- Prune without good reason.
- Remove more than 25% of foliage during a growing season.
- Prune a newly planted tree for the first year unless you are removing dead or broken branches.
- Prune within 10 feet of a utility conductor.
- Attempt pruning jobs that require a chainsaw or ladder.
- Leave branch stubs or cut off the branch collar.
- Climb trees with climbing spikes.
- Use wound paint.



Source: TCIA®

PRUNING FAQS

Q: What is the best time of year to prune?

Although it all depends on your pruning objectives, most trees can be pruned year-round, if pruned properly. In fact, winter can often be the best time for an arborist to prune. Since the leaves are off, the view of the entire tree's architecture is clear and a thorough check can be performed. They can locate deadwood by looking for changes in branch color, fungus growth, cracks and other symptoms that can help them make this determination. It's worth noting that some areas may have pruning restrictions in place if a particular insect or disease is a problem. Contact your local county extension office to find any pruning restrictions.

Q: How often do I need to have my trees pruned?

Trees should have deadwood pruned out regularly, at least once per year.

Q: What tools do I need to prune my own trees?

If you are pruning a smaller tree, the three basic tools are hand pruners, loppers and hand saws. Remember that these tools need to be sharp and clean to ensure success. Do not use shears to shape young trees. If the tree is larger and requires more attention, contact an arborist or tree care company.

Q: What is the difference between pollarding, reducing and topping?

These three practices are often confused. Some disreputable tree care companies will purposefully use the wrong term to confuse the homeowner.

TOPPING IS FOR ICE CREAM, NOT TREES!

Tree topping is the practice of removing large branches or whole tops from mature trees, leaving behind stubs, smaller lateral branches or even just the trunk. It's also known by many other names, including heading, stubbing and tipping.

It's a controversial and outdated tree care practice that many claim reduces tree size. However, studies show that topped trees often grow larger over time due to the fact that severe cuts can cause several fast-growing sprouts to take the place of the cut branch.

Not to mention, topping can also be harmful to a tree's health and structural integrity. Open tree wounds are difficult to heal and leave branches susceptible to insects and disease, causing deadwood that could become dangerous if not properly removed.



Source: TCIA®

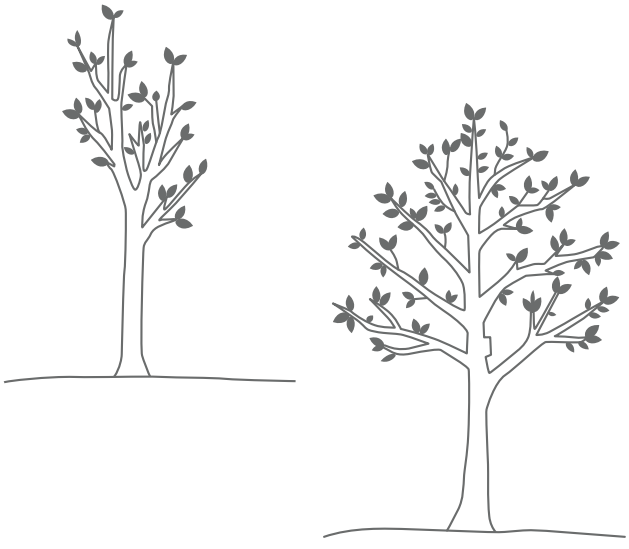
SHADE TREES

A tree's first few years are critical. Pruning then has a profound effect on the ultimate size, shape and health of the mature tree.

Pruning When Planting

Shade trees are usually sold balled and burlapped, with most of their roots intact and surrounded by soil. They require little pruning when planted. Simply remove any twiggy growth that won't become part of the tree's framework of branches. Container-grown trees also require almost no pruning since none of their roots have been removed. Prune only to remove dead or broken branches. Trees that have spent too long in the container can form circling roots. Prune these so they don't become girdling roots.

Bare root trees, in which many of the roots have been removed or damaged, may require some pruning when planted. However, the practice of removing one third of the stem and half of each branch is outdated. Instead, prune only broken branches or roots before planting. You may want to cut back the main stem of an especially spindly bare-root plant to encourage branching.

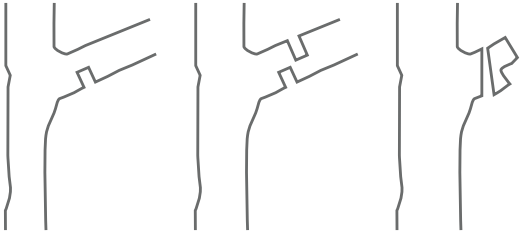


Prune young shade trees to establish branch patterns that preserve the natural habit of the tree. Certain trees – pin oaks, birches, poplars and the like – form a single central trunk with clearly subsidiary side branches. Any tendency of such trees to produce more than one leader calls for removal of the weaker ones.

SHADE TREES

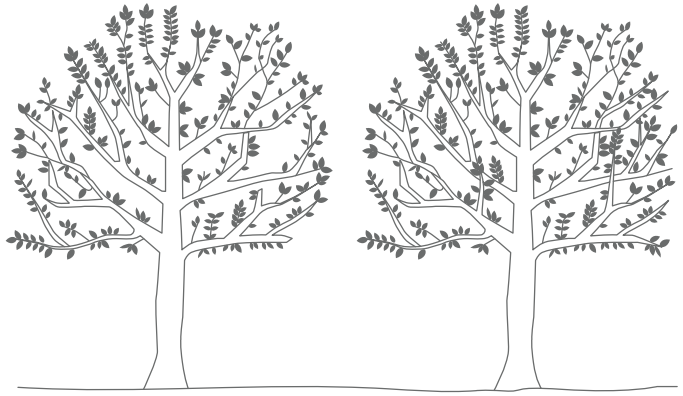
Mature Trees

Mature trees that have been properly pruned since planting require little besides maintenance care, like the removal of dead or damaged wood or the occasional thinning to allow more air into the crown. Always cut large limbs back to a live branch or the main trunk.



Use the tree-cut method when sawing off a large branch. First make an undercut at least 6 inches from the bark collar. Then, about an inch beyond that, remove the limb with a top cut. Finally, remove the remaining stub with one smooth cut from top to bottom just outside the bark collar. With a very big limb, first reduce its length by removing it in sections.

Most branches have an obvious, sometimes wrinkled, swelling at their base. This is the barkcollar, an area where cell growth is especially abundant and wound closure is rapid. Make your final cut just outside this collar.



If possible, remove branches that form a deep V-shaped crotch. Such crotches are vulnerable to wind damage and can cause rot. Wide crotch angles are stronger.

PRUNING FRUIT TREES

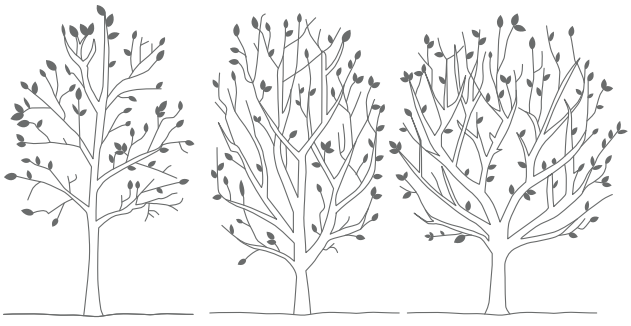


The reasons for pruning fruit trees are the same as those for pruning any tree or shrub. Pruning of two-year-old whips is important to the shape, health and productivity of the mature tree. Regular maintenance pruning to remove dead or diseased wood or wood that is growing in awkward directions is also important. Unlike pruning ornamental trees and shrubs, properly pruning fruit trees makes a difference between large, annual crops of excellent fruit and spotty, intermittent crops of variable quality. Fruit trees are encouraged to bear lots of large fruits, so pruning to develop a strong branch system capable of withstanding the annual load of ripe fruit is also critical. For tips on basic pruning techniques and the best times to prune, see "Pruning Methods" and "When to Prune".

Most fruit trees are sold as two-year-old bare-root whips and must be pruned when planted. Cut the main stem back by about one third to a fat bud and prune side branches until you have removed about a third of the total wood. Such severe pruning of small, newly purchased trees is always difficult for beginners, but years of experience have shown that it is beneficial and will get your tree off to a faster, healthier start.

Prune fruit trees to allow ample sunlight to reach into the middle of the tree, otherwise fruits will not ripen properly and will lack good color. This can mean removing many more lateral branches and stems to make the most attractive, bushy plant. Such pruning also allows for good air circulation through the crown, which prevents disease.

PRUNING FRUIT TREES



There are three generally accepted systems for pruning fruit trees, each designed to produce a different configuration of main branches and secondary and lateral branches.

Central Leader

Apples and pears, which bear large crops of heavy fruit, should be pruned to form a central leader. This system encourages the growth of strong side branches from one main trunk. Remove branches growing from the trunk to maintain open space between limbs and thin the secondary branches that grow from these limbs. Prune to allow sunlight and air to reach the center of the tree.

Open Center

Also called the vase system, this method lets plenty of light and air into the center of the tree, but it also makes for weaker branches and is not recommended for apples and pears. It is well suited to quinces, crabapples, plums, cherries, peaches, nectarines and apricots. Be sure to prune in a way that avoids lots of limbs originating from the same point of the trunk to avoid weak crotches.

Modified Leader

This method starts the same as the central leader system, with one strong central trunk.

Eventually though, you must prune the central leader to form several leaders. The modified leader system is generally easier to maintain because most fruit trees tend to grow in this way naturally.

PRUNING FRUIT TREES

A fruit tree allowed to bear all the fruit it sets in the spring will produce scads of poor-quality fruit or it will produce well only every other year. For consistently good crops, you must thin clusters of young fruit to a single fruit. Do this when the fruit is still small (marble to golf-ball size). Each fruit should be 6 inches or more from its neighbor. Such thorough fruit thinning is time consuming, but you will appreciate the effort come fall.

Pears, plums and cherries produce most of their fruit on stubby growths between the branches called spurs.

Peaches grow on one-year limb growth and apples grow on both spurs and limbs. Spur-type trees produce less limb growth and require less pruning, but even spurs must be thinned periodically. A spur will produce good fruit for two or three years. Then it should be removed to encourage new, more vigorous spurs.

Try to maintain a strong central leader on young apples, switching to a modified leader form as the trees age. Prune them lightly every year by removing dead or damaged wood, thinning branches for open growth and removing suckers and water sprouts. Moderate annual pruning is far better for the tree than irregular severe pruning. As with all fruit trees, thinning of young fruits ensures a much finer crop.

Cherries need less pruning than other fruit trees. They tend toward an open-center growth habit, but it is still a good idea to encourage a central-leader habit when the tree is young, changing over to a modified leader or open-center system.

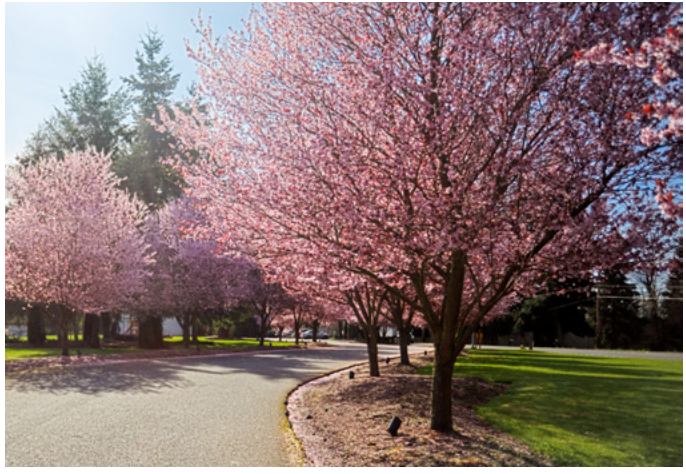
Peaches, nectarines and apricots are all vigorous and therefore need regular, careful pruning to produce well. They are also relatively short-lived (about 10 years), another reason pruning is so important, since it stimulates new, vigorous growth. Train all three to an open-central growth habit. They tend to grow tall and the best fruit forms at the top of the tree, so prune to keep the top in bounds. Prune in late winter while the trees are dormant yet when you can remove any cold-damaged wood.

PRUNING FRUIT TREES

Train a pear tree in much the same manner as an apple, with a central leader that can be allowed to form a modified leader as the tree matures. As with apples, a light annual pruning to remove dead or damaged wood and suckers and encourage spreading form is preferable to occasional heavy pruning. Thin spurs and young trees annually to keep them from setting too much fruit.

Prune plums to an open center. Japanese plums, like peaches, require lots of pruning. Keep after them every year in late winter. European and American plums need much less pruning; an occasional thinning is all that is needed. Many plums bear heavily only every other year. To encourage good annual crops thin young fruit so that the plums are at least 5 inches apart.

Bare-root citrus fruit trees, including grapefruits, lemons, limes and oranges, should be pruned at planting time, while containerized ones rarely require any pruning. Where occasional frosts occur be sure to wait to prune until any danger of a freeze is past in the spring. And postpone fall or early-winter pruning until spring, since it can make fruit trees more cold sensitive. Citrus trees tend to grow unevenly, sending out the odd long limb. These should be pruned back to a good bud. Citrus trees lose vigor and productivity as they age, but because frigid winters are not a problem, they can withstand severe rejuvenation pruning. After such pruning be prepared to wait two or three years for good fruit production to resume.



SYMMETRY AND BALANCE

Overall, shearing shrubs into uniform balls and transforming trees into green lollipops should be avoided. Such pruning produces an overly dense canopy of vigorous but weak branches that hinders sunlight and air from reaching into the interior of the plant. Some species can tolerate this, but most become more prone to disease and breakage.

Instead, take a critical look at deciduous trees and shrubs to get an idea of where branches are headed as they grow. Ideally, each plant should look something like a roughly symmetrical river and tributary system, regardless of which side you are viewing it from. If there are branches that really throw off the symmetry, they should be removed to keep the canopy balanced. Also, remove any branches that are going to make contact with a wall or roof of adjacent buildings or other structures as they grow.

If branches have begun to shade a shrub or smaller tree that needs more light, strategically remove branches to allow more sunlight to penetrate. Pay special attention to trees that are growing near the edge of densely shaded wooded areas. These trees are quite likely to be one-sided and are often the first to fall when weighted with snow or ice. If the branch structure is so unbalanced that pruning won't improve the symmetry of these trees, it may be best to remove them entirely, particularly if they could damage structures or bring down power lines when they fall.



ORNAMENTAL VINES

Whether they climb, creep, cling, twine or flop and scramble, vines have one thing in common given favorable conditions they grow like crazy. Pruning vines is largely a matter of keeping them in bounds and that is best done by controlling growth from the day you plant a vine.

When planting, select several of the strongest shoots and prune them back to half their length to encourage new shoots to grow from the base.

As a vine grows, keep it in check. If you want it to be compact, continually prune terminal growth during the growing season. If you want it to ramble, cut to the base all but three or four of the strongest shoots. Be sure to prune to let light reach the base of the vine or it will become bushy on top and bare below.

Most flowering vines bloom on wood formed the previous year, so try to avoid drastic pruning in early spring or you will remove the flower buds. On the other hand, all drastic pruning of vines should be done when the plants are dormant.



When planting a vine, prune about half the strongest shoots to half their original length. This will encourage growth at the bottom of the vine as well as above.

SMALL-BERRY FRUITS

Small-berry fruits require regular pruning. Without annual pruning, grape vines bear many small, poor fruits and bramble fruits become unapproachable and much less harvestable masses of prickly brambles.

Grapes produce fruit on new, lateral growth from year-old stems. Prune grapes to limit the number of new laterals and the number of fruit clusters per lateral. As with fruit trees, it is best to thin young fruits to direct more of the plants' strength into producing fewer, better fruits.

Prune grapes in late winter or early spring before buds swell. When planting grape vines, leave only one or two buds above the soil. During the first winter select the longest, strongest stem to become the main stem and remove all other stems. During the second spring, allow one terminal and two lateral buds to form shoots.

For European table and wine grapes, four permanent lateral stems are maintained on either side of the main stem. During the second winter, prune back to this framework. In the third year, remove all growth except for a series of strong stems spaced 6 to 10 inches apart



along the four lateral stems. Prune these spurs back to within two buds of the lateral stems. In subsequent years, prune all growth back to the spurs.

For American grape varieties, use the cane pruning system, in which the four main stems are replaced each season. During the second winter, remove all growth except for four lateral shoots. Prune these back to two buds.

SMALL-BERRY FRUITS

In the third winter, cut back the upper cane of each pair to two buds so they can become next year's replacement canes. Cut the lower cane back to 12 buds. This year's fruit will be borne on these canes.

In subsequent years, remove the cane that bore fruit the previous year. Cut the upper cane of the replacement pair back to two buds and the lower cane back to 12 buds.

Whichever pruning method you choose, you will have better harvests if you limit each cane to one or two clusters of grapes. After four years of bearing, you can leave half of the grape clusters.

Bramble fruits, including blackberries, boysenberries, black raspberries and red raspberries, require the same simple annual pruning. All bear fruit on year-old canes. The canes grow from the ground and bear fruit in their second summer. After bearing, they become barren or die and should be removed immediately after harvest. Clean up the plants in late winter or early spring before they begin to put on new growth.

New canes sprouting from the ground should be thinned. Remove all but four or five of the strongest new canes. With blackberries or boysenberries—whose vine-like canes trail—let these new canes grow on the ground until the two-year-old canes are cut after harvest. Then tie the new canes to a wire trellis or stake for support. When the new canes are about 30 inches long, tip them back to stimulate fruit-bearing lateral growth.



WORKING WITH WOODY SHRUBS

Shrubs can vary greatly in their pruning needs. Even shrubs in the same genus (hydrangeas or roses, for example) may have very different requirements. This is why it's always a good idea to seek out in-depth instructions for a particular plant to ensure you are giving it the most appropriate care.

That said, most deciduous shrubs tend to be fairly forgiving when it comes to pruning. Preventive pruning involves removing a few of the oldest or weakest branches from the crown of the shrub close to the soil surface. When spring arrives, this will stimulate vigorous growth from the crown of the shrub to keep it looking its best. This method works well for plants such as lilacs, red-osier dogwoods (Cornus sericea), blueberries and nandinas.

Be aware that some flowering shrubs that bloom on old wood—forsythias ornamental quinces (Chaenomeles spp.), weigelas and ninebarks (Physocarpus spp.), to name a few—should be allowed to bloom prior to pruning. Then, just as the flowers are fading, cut them back to a height of 6 inches or a foot from the ground.



Source: American Horticultural Society

ACKNOWLEDGMENTS

This booklet is the result of a collaborative effort on the part of numerous individuals and horticultural organizations throughout the United States. Their knowledge and experience in pruning techniques have helped make the "Principles of Pruning" a clear, concise guide to pruning that is both informative and easy to use.

Our thanks to:

The Chicago Botanic Garden

The Fort Worth Botanic Garden

The Florida Cooperative Extension Service of Orange County

Bonnie J. S. Day-M.S. Ornamental Horticulture, University of Delaware Longwood Program

Albert Wilson-M.A. Botany, Stanford University

American Horticultural Society
7931 East Boulevard Drive
Alexandria, VA 22308
ahs.org

Monrovia
817 E. Monrovia Place
Azusa, California 91702-1385
monrovia.com

National Association of Landscape Professionals
950 Herndon Parkway, Suite 450
Herndon, VA 20170
loveyourlandscape.org

Tree Care Industry Association
670 N. Commercial Street, Suite 201
Manchester, NH 03101
tcia.org

CORONA®

SEASON AFTER SEASON

Headquarters & Distribution Center West
22440 Temescal Canyon Road, Corona, CA 92883

Distribution Center East
6574 Lewis Lane, Louisville, KY 40272

951-737-6515 | 800-847-7863 | sales@coronatools.comm

coronatools.com

Connect with Corona Tools.

©2025 Corona Tools

0 38313 09312 9

CC 9312 - X/XX - XXK