

PRUNING ROSES



Introduction

The job is best performed after the chance of frost has disappeared from the calendar. To ignore the pruning process will allow the plant to enlarge in size but some new stems, being so thin and weak, will be

unable to support the flowers. The result is a bigger bush that spreads along the ground. Moreover, the previous year's foliage can be a source of fungal infections from spores that survived the winter. Hence, roses require an annual cut back to ensure attractive and productive plants year after year. This article is primarily concerned with pruning roses.

AFTER PRUNING

1. To ensure the destruction of all insects and fungi, apply a dormant spray immediately after pruning. Spray immediately after pruning when there is no development of the eyes. A return to the old fashioned "oil and sulfur" spray technique may be a wise decision after pruning. A combination of horticultural oil and a lime-sulfur preparation should aid in the destruction of the spores (including both powdery and downy mildew) residing in the soil and on the immediate surface and sub-surface of the canes.

2. After brushing the bud union with a wire brush to remove the old bark, cover the bud union with about six to ten inches of the surrounding mulch. This protective mound of mulch keeps the bud union hopefully moist and therefore receptive to basal breaks and hence new canes. Additionally, this mound can protect the bud union from mild frost conditions and wind chill factors.

3. Avoid fertilization until about three or four weeks after pruning. Then apply one to two cups of solid rose food formulation around the base of the mound covering the bud union and then uncover the bud union. The mulch then covers the rose food and provides a clean landscaping surface to start the year off.

THE PROCESS

Of all gardening practices, pruning seems to create a sense of uneasiness because of a lack of appropriate logic and understanding. The art and technique of rose pruning is not a mystery. It is remembering to apply a few basic principles derived from practical experiences gathered over hundreds of years. Pruning know-how provides an annual opportunity for the gardener to correct, adjust and modify the growth patterns to increase flower production, and influence the plant architecture. Historically, emphasis has been mis-placed in that not performing the right steps will result in failure. Failure to follow the directions carefully will only translate into an awkward overall bush shape. However, the rose bush will still perform in the spring. While some measure of education can be learned from reading books and attending public pruning demonstrations, it is the practical aspects that will ultimately teach the finer points of rose pruning. Experimentation will offer guidance in which varieties can be pruned hard (canes of 2-3 feet or less) and which ones lightly (canes of 4 feet).

This basic understanding of rose varieties and their characteristics will enhance the enjoyment of rose growing bringing a degree of satisfaction and pride. Approaching rose pruning like an artist can result in creating the optimum bush shape. In warm climate zones, roses rarely experience the extended freezing conditions of winter that occur in temperate or cold climates. Practice of regulating the shape can enhance the landscape ambiance of the rose garden ensuring a vigorous first bloom that makes the effort all worthwhile. Pruning does encourage new basal growth from the bud union -usually regarded as strong evidence of good health. Pruning does permit a time period where the plant processes are slowed down and then redirected to produce that first magnificent spring bloom.

GENERAL GUIDELINES

1. Always prune cut to good healthy tissue easily recognized by the green bark on the outside of the cane and white pith core revealed after the cut is made. If the central pith is not pure white, it is an indication of necrosis (i.e. dead or dying tissue).

2. After the cut is made, a drop of wood glue can ensure a quicker recovery as well as provide an instant protective barrier against cane borers. Normally, the sap will rise containing a natural polysaccharide, pectin, which hardens to form a protective barrier.

3. Prune the center of the bush to open for maximum air circulation and light penetration. Creating the environment for good air circulation is crucial to avoid micro climatic conditions suitable for fungi growth.

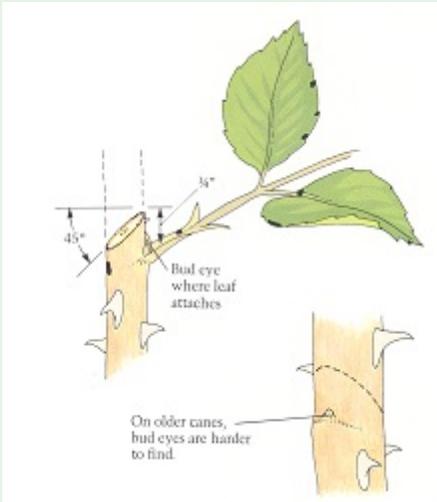
4. Plan to remove all growth on main canes that is not capable of sustaining a reasonable thickness of stem. The removal of stems no thicker than a pencil will ensure stronger straighter stems to support large blooms.

5. If suckers are present (i.e. growth from the root structure), remove them from as close to the main root cane below the bud union as possible. Failure to remove suckers from the shank of the understock may result in their re-occurrence.

6. Remove old canes that appear woody by sawing them off as close to the bud union as possible.

7. After pruning has been completed, remove any remaining foliage from the canes and clean up around the bush discarding all foliage as trash. Last year's foliage may contain dormant spores of various fungi and their retention can lead to infections.

CUTTING TECHNIQUE



By far the most important technique to master in pruning roses is the correct angle and direction of the primary cut. The final pruning cut should be made at approximately a 45° angle, about 0.5 cm above a leaf axil where there is a dormant eye. If the bush has further down canes where there is no foliage to guide to the appropriate cut. Under these circumstances look for the dormant eye on such canes by locating where foliage was once connected. The eye is normally visible as a slight swelling above the surface of the cane. Making these primary cuts correctly is the real key to success in pruning.

The cut should be made in such a way that the new growth eventually emerges from eyes that naturally point away from the center of the bush. This deliberate planning of new spring growth patterns gives the rose bush a pleasing overall circular shape that spreads from the center outwards. Such cuts should avoid the new growth from being directed inward and colliding with other stems. The logic behind making the cut slope down and away from the eye is that the excess natural sap that will rise from the inside of the cane to seal the cut naturally can pour down the opposing side of the cane and not interfere with the developing eye.



Pruning cut made too close to developing eye



Pruning cut made too far above the eye causing partial die-back



Pruning cut made too far above the bud eye causing severe die-back almost to the junction



Pruning cut made causing damage to outer epidermis and therefore permitting potential infection

Hybrid Teas & Grandifloras

Growth habit of hybrid teas and grandifloras is such that by winter they are generally 2.5 – 3 meters tall and looking very lanky. The height of the canes remaining after pruning on an established bush can be as tall as 60 – 120 cm in some instances. In general, about 4 to 5 major canes can remain with an average height of 90 cm tall. Removal of older canes is a trigger mechanism to the rose bush to attempt to promote basal breaks or new canes in the spring. This regenerative process is fundamental to the health of the bush and unless performed carefully, the rose bush will gradually become non-productive.

Floribundas

Since floribundas are mainly for garden display, many older canes are allowed to remain to permit a dense development of inflorescence. Therefore, the number of canes remaining after pruning is much greater than that recommended for hybrid teas. Two main reasons drive this strategy. First, there are considerably fewer potential dormant eyes for first growth because of the length of the canes. Second, the flowering habit emphasis of floribundas is to produce

large numbers of flower clusters but not always necessarily on long stems. Based on these logical parameters, the pruning of floribundas does not necessitate the removal of all growth to leave only 3 or 4 main canes. Leaving a greater number is advised.

Miniature Roses

First of all, the majority of miniature roses are grown on their own roots, i.e. no bud union and therefore no suckers. Because precise pruning when applied to miniature roses is very labor intensive, the majority of rosarians prefer to take garden clippers and trim off the tops at no greater than 30 cm above the soil level (height varies according to growth habit of the variety). However, after such treatment it is wise to remove, on an individual plant basis, any twiggy growth and open up the center of the plant to air circulation and light penetration.

Old Garden Roses

When attempting to prune old garden roses, avoid treating them as modern hybrid teas and floribundas. For maximum bloom production, pruning should be more of a

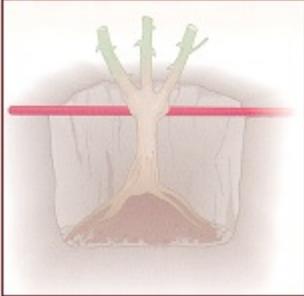
light grooming than a severe pruning. Prune only last year's growth. After a few years, however, this practice makes for a very lanky bush. Therefore, each year prune back some of the oldest canes to promote basal and post-basal breaks. Keeping a proper balance between new growth and continuing old growth patterns is the secret to growing old garden roses.

Climbers and Shrubs

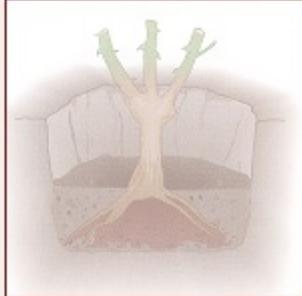
Climbers will generally not flower profusely unless the canes are trained into the horizontal position. Cut the ends of these long established canes to about the place where the canes are slightly larger than pencil thickness. Then, rather than remove each side stem that has flowered, cut them to the lowest possible five leaflet, i.e. about 2-4 cm from the main cane. This process will cause the cane to flower along its complete length for a terrific spring display.

PLANTING ROSES

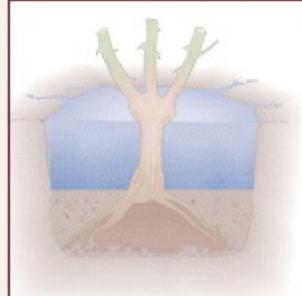
PLANTING A BAREROOT ROSE



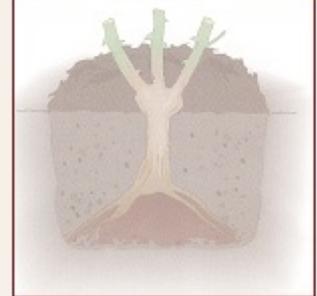
Set aside most of the soil. Form a cone in the bottom of the hole with the remaining soil. Use a broom handle to make sure that the bud union is at the correct level. Carefully fan out the roots over the cone of soil.



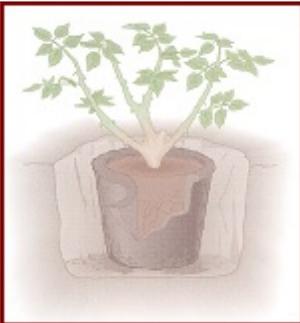
Slowly add the reserved soil to cover the roots. Do not compress the soil on top of the roots. Leave about 4 inches from the top of the hole still to be filled in.



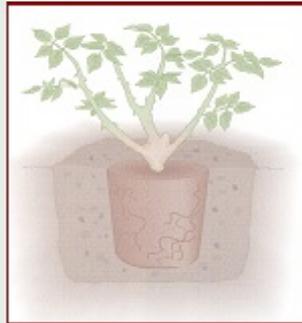
Add water to allow a slow and gentle settling of the soil. Water several times to let the soil fill in completely. Add the remaining soil and water once more.



Mound the exposed bud union with mulch to prevent moisture loss. Create a dam of soil around the plant to collect water. Roots will be established in a few weeks and the mound can be removed.



Remove the rest of the compressed fiber pot as if you were peeling an orange. Don't worry if some roots show on the surface of the root ball.



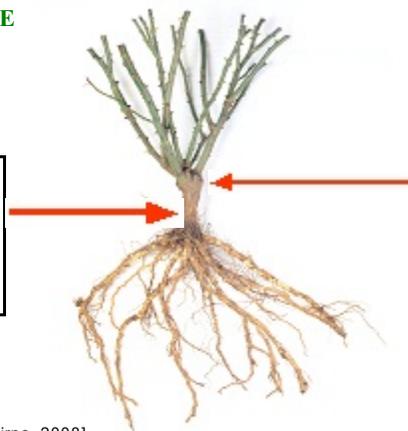
Fill the remaining space with a good potting soil or amended soil. Water, allow to settle, and finish off with more potting soil.

PLANTING A CONTAINER GROWN ROSE

Many roses are now sold as container grown either in a paper mache pot or similar degradable pot. The advantages of this method of selecting plants are obvious. The consumer can observe the growth to be healthy before purchase thus eliminating the guess work of selecting a bare root bush. It is recommended that you remove the paper mache or fiber container before planting. While it will degrade naturally in the soil, its removal will permit the root structure to expand much more quickly.

ANATOMY OF A ROSE

Shank
The portion of the original rootstock onto which the bud was placed.



Bud Union
The point from which new canes (basal breaks) will emerge. Generally planted at soil level in temperate climates, the bud union may be vulnerable in cold climates if it is not planted below soil level and protected with mulch.

SELECTING ROSES

Every year the flood of new varieties displaying a huge diversity of colors and shapes captures the human imagination bringing a strong impulse to buy! In 2009 the consumer will be treated to buying roses in four different offerings.

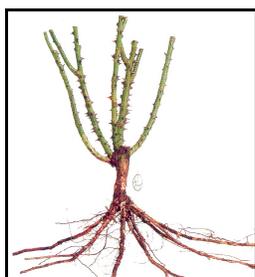
By far the most abundant offering is your local nursery for the native bareroots. This type of plant offers the advantages of examining the root structure as well as the health of the canes emerging from the bud union. Purchasing this type of plant does require some advance planning in preparation of the new holes and soil amendments.

The second option for buying roses is the prepackaged, most popular with many

local nurseries. This packaging provides an extended lifetime for the plant by encasing the bareroot in materials that hold moisture and hence ensure the plant does not dry out. Best purchased when they first appear on the shelves at the nursery, the only downside is that the roots have been trimmed, sometimes severely to fit into the package.

The third option is the availability of the bareroot already planted in a fiber pot ready for immediate planting. This is a convenience that makes the actual planting an easy process but many consumers then dig only a small hole to accommodate the pot. Selecting this type of package necessitates digging a large hole to accommodate a mature plant.

Lastly, the fourth option is a relatively new packaging strategy with limited selection available. Essentially a plant grown in a 5 gallon container ready to plant in the ground or into a more decorative patio container. Advantages to this option are the instant color added to the garden and the obvious health of the purchase without worrying about the survival of the bareroot via dehydration, the most common cause of losing a plant shortly after planting. These plants are generally on their own roots limiting their availability to vigorous shrubs and ground covers.



Perhaps the most convenient method of selecting roses is as a bareroot since it offers the widest selection of varieties and allows the consumer to inspect the root structure as well as the canes



Packaged roses are easy for your local nursery to handle for sale and display. The bag contains moist materials to maintain the hydration of the plant. The only drawback is that the roots have been trimmed to fit the bag.



This wrapped pot contains the growing plant in a fiber pot for ease of planting directly into the ground. This fiber pot will degrade rapidly in the soil.



Brand new for 2009 is the standard 5 gallon container with the plant in a leaf-and-bud stage. This plant can be planted in the ground immediately providing instant color in the garden.

THE 2009 AARS WINNERS

'Carefree Spirit'



Shrub Rose with medium-small cherry red blend bicolor single 5-petaled flowers (with a white eye) in large clusters.

PPAF; cv. MEIzmea; Meilland 2009 [(‘Red Max Graf’ x seedling) x (‘Pink Meidiland’ x ‘Immense’)]

'Cinco de Mayo'



Novelty multi-colored Floribunda boasting a blend of smoky lavender & rusty red-orange colored medium flowers in large clusters on a medium-sized glossy green bushy rounded shrub. PPAF; cv. WEKcobeju; Carruth 2009; (‘Topsy Turvy’ x ‘Julia Child’)

'Pink Promise'



Chosen to represent the National Breast Cancer Foundation with a portion of sales will go to the Foundation. Light pink blend Hybrid Tea is 5' tall with strong dark green foliage, and a strong fruity fragrance. It has elegant, shapely buds, and long stems. PPAF; cv. C0105R211 Coiner 2009; (seedling x seedling)