

**SPRING FLOWERING BULBS FOR NEW YORK CITY COMMUNITY GARDENS**

By Fred Rosenstiel

DESCRIPTION AND VARIETY OF BULBS

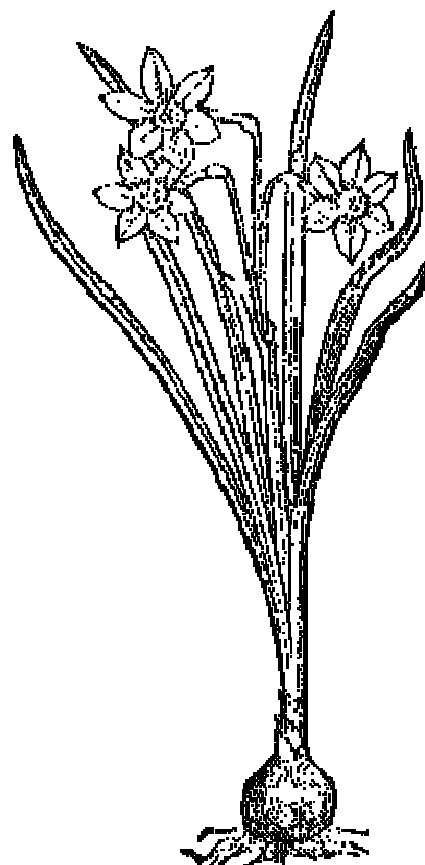
In the Fall, Spring flowering bulbs are worth planting because the reward will be a splash of color before almost anything else happens in the garden. There is such a wide choice of spring flowering bulbs that if some of every common representative group are planted there will be flowers for five months in succession – from February to June.

WHERE TO PLANT BULBS

Because such conditions as temperature, moisture and light influence the time of flowering, it is impossible to give exact dates for each species, but the following is a relative timetable of successive blooming periods for the more popular bulbs.

TIMETABLE\*

Galanthus (Snowdrop)
Eranthis (Winter Aconite)
Crocus
Scilla sibirica (Siberian Squill)
Iris reticulata
Chionodoxa (Glory-of-the-Snow)
Anemone blanda
Species Tulips (Kaufmanniana, Fosteriana, etc.)
Muscari (Grape-Hyacinth)
Trumpet Daffodils
Single and Double Early Tulips
Hyacinths
Large - and Medium - cupped Daffodils
Triumph Tulips
Darwin Hybrid Tulips
Daffodils: Short-cupped, Poet's
Double Late Tulips (peony-flowered)
Lily-flowered Tulips
Darwin Tulips
Cottage Tulips
Parrot Tulips
Breeder Tulips
Scilla campanulata (Wood-Hyacinth or Spanis Squill)
Dutch and Spanish bulb Irises
Ornamental Onions



\*from *The Complete Book of Garden Bulbs* by Marc Reynolds and William Meachem, (1967), Funk & Wagnalls, N.Y.

SELECTING THE LOCATION FOR YOUR BULB BED

Sunlight – During their growing season, bulbs need a reasonable amount of sunlight. Therefore, do not plant where a building will cast shade, bearing in mind that in March the building will cast the same amount of shade as it does in September. It is, however, possible and even recommended to plant Spring flowering bulbs under deciduous trees and shrubs. The reason is that during Spring growth, the sun penetrates through the bare branches or budding foliage. Planting near trees and shrubs looks good and provides some protection from children and dogs. In the heat

of the summer, the light shade of trees and shrubs in leaf also lengthens early summer vigor of the bulb foliage, which strengthens next year's bloom.

**SUNDRY IMPEDIMENTS**

Misuse – In the city, the bulb bed, if bare of vegetation all winter, may revert to a play area or dumping ground – an additional reason for planting near trees and shrubbery or along a fence or wall. Clumps of bulbs look good in small pockets of soil among rocks or pieces of concrete.

Pests – In the suburban areas of the city, mice eat the bulbs which they reach through mole tunnels. Rabbits enjoy the foliage.

Insects and Pigeons – In the spring, bulbs have already gone through their growth cycle before damaging insects are out in force. But pigeons can sometimes be seen pecking at tulip leaves. Black cotton thread stretched across the beds, frightens them away.

Dogs – Stakes with green garden string stretched at small dog height gives warning that business is not as usual.

Bikes, Snowmobiles, Motorcycles and Cars – Compaction of the soil will tend to ruin tender bulb roots. Heavy rocks strategically placed discourage vehicle traffic.

Neglect During Heavy Spring Snow Falls – It may be necessary to alert people that the tender bulb shoots are already sprouting under the snow. Pedestrians should be urged to keep to the paths.

TIME OF PLANTING

Bulbs can be planted when the ground is workable. As soon as purchased, plant small bulbs such as Winter aconite, snowdrops, squill, crocus, Glory-of-the-Snow, anemone blanda, grape hyacinths, etc., because they dry out in heated apartments. Larger bulbs like daffodils and hyacinths should be in the ground by the end of October. Tulips, though, can still be planted as late as Thanksgiving. The bulbs must form roots while the weather is mild in the Autumn and early Winter to ensure proper growth and flowering in the Spring.

WATERING

Moisture in the soils is essential for root growth. If the soil is dry it should be well watered after planting. Rain and snow in late Autumn and Winter, combined with low evaporation, provide enough water but during a dry Spring, watering may again be necessary.

CORRECT PLANTING DEPTH

Temperature stability requires correct planting depth. With the base of the bulb planted at six inches there is enough stability of temperature for most bulbs. But the smaller, minnow bulbs mentioned above need only three inches of depth. By planting the larger, deeper located bulbs first, it is possible to make a combined planting in one bed of such bulbs as red tulips – six inches, and grape hyacinths – three inches. In light sandy soil, plant one inch deeper; in heavy clay soil, plant one inch shallower than directed.



Mulching will help to stabilize temperature. A layer of mulch over a bulb bed does not serve to keep it warm, as one might think, but keeps it cold once the ground has frozen; this prevents alternate thawing and freezing which might heave the bulbs out of the ground, damaging their roots. The mulch also helps to conserve moisture. In the Spring, a light mulch such as sawdust or sifted compost (small in texture) can be left in place. Coarse material mulch such as leaves or branches must be removed so as to prevent distortion of emerging shoots. Another way of mulching bulbs is to plan them among low-growing, shallow-rooted ground cover plants, such as ajuga.

CORRECT SOIL FOR PLANTING

Since the food for growth is stored in the bulb, soil fertility will not affect blooming next Spring, but after flowering it will influence new bulb growth for the following Spring bloom. Consequently, for perfect bloom next Spring one need not fertilize when planting, but a slow acting fertilizer such as bone meal or wood ashes will improve the quality of bloom for successive years. If no fertilizer was used with Fall planting, a Spring dressing of potash and phosphate fertilizer will promote next year's growth. Compost, leaf mold and some well-decayed manure mixed in with the soil are beneficial, but fresh manure or quick acting nitrogenous fertilizer should never come in contact with freshly planted bulbs as they will burn the emerging tender rootlets. Because of soil exhaustion bulbs planted near trees and shrubs will have to be fertilized.

BULB LOCATION MARKERS

To prevent confusion, it is advisable to place a small visible object such as a white marble chip or old bottle cap over each tulip. It is a good idea to leave such objects in place for the following summer when the flowers are gone and the foliage had died back to prevent injury to the bulbs by planting or deep cultivation.

GOOD DRAINAGE is of more immediate importance than fertility. Bulbs will rot in poorly aerated waterlogged soil. An area with persisting puddles is unsuitable unless improved by draining systems or changed into a raised bed.

PLANTERS for bulbs have to be exceptionally well drained and since they dry out easily they must be kept well watered. They should be deep and wide enough not to freeze into a solid block of ice, which will destroy root growth. Most of the world's bulbs are grown and exported from a long narrow strip of sandy soil behind Holland's North Sea dunes. Beside a long cool spring the bulbs there are favored by a water table at just the correct height, which is maintained by drainage ditches and canals on which barges transport the bulbs. On this sandy strip are the bulb fields as far as the eye can see. Just beyond it where the land is a few inches lower, not a single bulb is found, only meadows with grazing cows.

HOW TO PLANT A BULB BED

To prevent confusion it is best to lay out all the bulbs on the surface of the soil, each one on the spot it is to be planted. For a moderate quantity plant them singly with a strong blunt-ended trowel, not a pointed one, as this might cause an air space under the bulb, preventing proper soil contact. SEE DIAGRAM below. A good method is to fill the hole above a bulb with soil scooped out from the next hole.



SPACING

In an informal community garden bulbs look good when planted in groups that are separated from one another, each group composed of not less than three bulbs identical in kind and color quite close together (for tulips, daffodils and hyacinths not more than 3" apart, for the minor bulbs not more than 2"). To save time the soil for a small group of bulbs, or a larger group of a dozen or more, can be scooped out to the required depth, the bulbs laid out on the bottom of this pit, which is then filled up. Especially on a former demolition site make sure that no brick, concrete or rock, but only loose soil is directly under each bulb. Mark each group with a sign with the name of the bulb.

For the purpose of this method of planting do not buy mixed bulbs of unnamed varieties as frequently offered in the trade, but always separate named varieties. An exception to this rule is anemone blanda of which the small bright flowers in March look good in mixed colors.

There are a few kinds of bulb flowers that by their appearance are more suited for a continuous edge in front of other flowers rather than in groups. Such are the short stemmed double early tulips in many different colors and the blue or white grape hyacinth (muscaria) which has an added edging advantage of green leaves appearing in autumn that last through winter.

Right Side Up. Never drop bulbs hurriedly in a hole but place each single bulb carefully in loose soil at the bottom, right side up which for the large and most small bulbs is the pointed side, for crocuses the growing tips. For Winter aconite and anemone blanda the right side up is not easy to tell. The Cooperative Extension (Cornell) suggests soaking these bulbs overnight to make rot remnants visible.

Deadheading. Cutting the flowers in the spring does no harm to the bulb and every single faded flower should be cut off before the seed starts to grow. Fruit formation, visible by a swelling at the base of the flower is at the expense of the vigor of next season's plant.

Sparing the Leaves. On the other hand, never damage or cut a leaf, for with the roots it forms the life support system of the growing new plant. Fewer leaves mean fewer and smaller flowers next Spring. Cutting off the chlorophyll-bearing green leaves of a growing bulb will as surely weaken it as draining off the hemoglobin-bearing blood will debilitate a human body, but human blood is more renewable than the chlorophyll of a tulip or daffodil. Therefore, all bulb leaves are to be left on until they naturally fade and lose all their green color in July. Grass in which crocuses, squills, daffodils, bluebells or other bulbs were naturalized should not be cut until all bulb leaves have faded. For tidiness, daffodil leaves can be loosely tied in knots. If enough light reaches the soil amongst the bulbs much garden space and time can be saved by sowing low, shallow-rooted annuals such as alyssum, portulaca or petunias amongst them.

REPLANTING

When the leaves have faded the bulbs can be dug up and store in a cool dry place for replanting in the fall. But if no change in garden design is wanted they can be left untouched. If planted at proper depth they will continue flowering for several years; some yellow hybrid Darwin President Kennedy tulips planted in 1964 flowered in 1976 in the Broadway Mall at 65<sup>th</sup> Street.

WHAT IS A BULB?

It is a fleshy subterranean bud, a complete plant carrying a supply of food with a timetable for growth this season, not next or any following season. A bulb is therefore not dormant like a seed. A bulb resembles more an embryo which grows to maturity within a certain time limit than a truly dormant seed, varieties of which have been known to sprout under ideal conditions after more than a thousand years. A bulb must grow leaves once every year or it will die.

WHAT TO DO WITH LAST YEAR'S LEFTOVER BULBS NOT PLANTED

From the foregoing it follows that they can be thrown away as they are worthless.

BULBS AND CORMS

Although for the sake of brevity all the above mentioned spring flowers have been called bulbs, some of them, notably crocuses, anemones and winter aconites are strictly speaking corms, while tulips, daffodils, hyacinths, squills, snowdrops are true bulbs, botanically speaking. In a true bulb of which the onion is a familiar example the young plant is enveloped by a number of fleshy leaves forming its protection and initial food supply, whereas in a corm, such fleshy leaves are absent. But for purposes of planting and cultivation bulbs and corms are treated alike, "right side up" for both kind being of prime importance.

CHOICE OF VARIETIES

Whereas in the minor bulbs the varieties of each species are relatively few, those of the larger bulbs – especially tulips and daffodils – are enormous and being increased every year by hybridization chiefly in Holland but also in other countries of Western Europe and in the United States and Canada. The novelties are generally very expensive but not necessarily better than the older proven varieties. Choice is a matter of taste and color combination. White hyacinths are more fragrant than the blue and pink. For New York spring weather, often of brief duration between

# THE CITY LOT

extremes of heat and cold, the low growing species tulips, double early tulips, cottage and Breeder tulips seem more suitable than the later flowering long stemmed Darwin varieties which are often blown down in our gusty winds.

All the well known varieties of daffodils and narcissi are excellent and recently a very graceful telescope - like yellow daffodil, named Peeping Tom, has proven its year to year vigor. It is deservedly becoming popular in Europe but still not much seen here and worth ordering from the Nursery in advance of the planting season.

