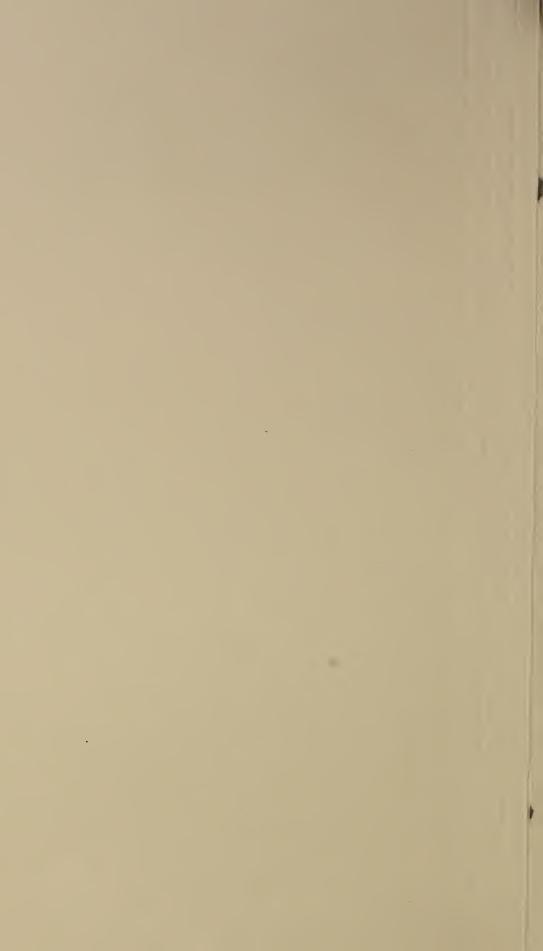
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# DANIELS' BERRY-GRAPHS

Pointed Paragraphs on Berry Culture FALL, 1921 LONG LAKE, MINNESOTA Issued from time to time by The Daniels Nursery

## FALL PLANTING SEASON IS HERE

### Many Advantages of Planting at This Time of Year

### Soil Conditions Unusually Favorable This Fall

There are two times of the year at which fruits are usually planted, the Spring, which is the most generally popular, and the Fall. Throughout a great part of our country fall planting has been successfully practiced but there has long been a wide-spread prejudice against it in many parts of the north. This prejudice is not without foundation for some plants, but in many instances the trouble has been more with the operator and his lack of understanding of how to handle fall planting than with any fault of the season. We do not advise fall setting of all nursery stock, but we do strongly recommend it for those plants we list in this little bulletin.

#### WHY PLANT IN FALL?

The advantages of fall setting are many. In the first place there is less rush work at this time and one can get at the planting easier, with time to do the work more carefully and thereby relieve the spring rush of that much burden. But more important is the fact that the plants will be in the ground ready to grow, with bruises and cuts caloused over and with perfect soil contact as soon as conditions allow growth in the spring. Then growth starts at once and there is no later check. Contrasted with this we have frequent delays in the spring due to waiting for rains to stop, for soil to dry out, and for soil preparation to be completed at a time when there is much other work to be done. During such periods of delay the fall set plant is making rapid growth. Waits of this sort often result in the setting out of plants that have already started to grow. This weakens the plant and causes a less strong subsequent growth. If the development is far advanced before planting the check is often serious, frequently resulting in the death of the plant.

#### DORMANT PLANTING ESSENTIAL.

Two important points that must be kept in mind if maximum success is to be attained, whether spring or fall planting is practiced, are that the plants should be set while dormant, and that they should be in the ground during as much cool, moist weather as possible before the hot, dry weather of summer begins. This latter is essential for the establishment of a good soil contact and root system, and the building up of a plant system that can grow rapidly and survive adverse conditions when summer's heat and drouth come. Both of these needs can be best served with fall planting.

#### DRYING OUT OFTEN FATAL.

Plants should never be allowed to dry out. Careless handling of nursery stock often allows drying out of roots and results in feeble growth and is an all too common cause of failure to start. We see to it that our plants at no time dry out when in our care, and ask that our customers do the same. All shipments

should be unpacked at once upon their arrival and the plants heeled in, and watered in the ground if the soil is not real moist. If there are only a few plants and they are to be set out immediately heeling in is not necessary, unless plants have been long delayed in transit and show signs of dryness therefrom.

#### HEEL IN WITH CARE.

Heeling in is really a temporary planting and the work should be done with great care. To heel in plants first select a shady place, preferably on a northern slope, and dig a slanting trench deep enough to admit the roots and lower parts of the stems, in which the plants are placed, opening the bunches and seperating the plants with roots spread so that the soil will come in contact with all parts of them. Then fill in the trench, working moist soil thoroughly about the roots, and firming well with the feet. Watering at this time is advisable. Lastly, as at field planting, leave loose soil on top for a mulch to prevent the escape of moisture. Many authorities advise fall purchase of trees and shrubs even if they are not to be planted until the following spring. In this case the heeling in is done more carefully and the entire top of the tree or shrub is bent down and covered with several inches of soil. A mulch of straw or other litter on top of this aids to preserve moisture and prevent alternate freezing and thawing.

#### FALL PLANTING LIKE HEELING IN.

Fall planting, properly done, is nothing more than a series of individual plants heeled in seperately,—right in the spot where they will start early growth the following spring and will remain permanently. Each one should be planted carefully, just as if it were spring time, and then, wherever possible, the top covered with soil. The short top of the raspberry cane is easily covered with a little mound of soil, as is the grape vine, while the top of the currant and gooseberry is generally only partially covered. A light covering of strawy manure or other litter over the soil will aid in carrying the plant through winter in ideal condition.

#### CULTIVATE EARLY IN SPRING.

In the spring, as soon as the ground is dry enough to cultivate, the mounds should be leveled down, the soil stirred around the plants, and, the litter worked in well. Cultivation should start at once. Already the plant is thoroughly established in the soil, the feeding roots have developed, and the bursting buds show that growth has started,—long before we would have been ready for spring planting. Then we can sit back with a satisfied smile, glad that our plants have such an early and vigorous start and happy that our time is free for other work.

#### USE GOOD PLANTS.

We are now growing about 18 acres of berries and, in so far as we can, we practice fall planting ourselves and recommend it to our customers as more satisfactory and more efficient than spring planting for those varieties listed in this issue of "DANIELS' BERRY-GRAPHS." Plant carefully in well prepared soil and at all times (even after setting) keep the plant from drying out, use DANIELS' high quality plants and success will be yours.

#### PLANTING CONDITIONS NOW IDEAL.

The recent fall rains have made soil conditions unusually favorable for planting now. No garden is complete without some of each of the UTILITY PLANTS we list here, for each will yield abundantly year after year for many seasons with little care and no winter protection, as all are perfectly hardy. Why delay? Plant now and in the coming years as you harvest your crops from these plants you will be ever grateful for your fall planting adventures of 1921.

#### RASPBERRY CULTURE ADVANCING. LATHAM THE NORTHWESTS' BEST. ST. REGIS YIELDS RASPBERRIES IN THE FALL.

The origination of the new red raspberry LATHAM was probably the biggest step forward in raspberry culture of the Northwest in the last few years. This berry, until last year called Minnesota No. 4, was developed a few years ago at the Minnesota State Fruit Breeding Farm. With us it averages larger and yields more heavily than any other red raspberry we have grown, but, what is even more important, it is absolutely hardy and needs no winter protection. It is equally suited to home and market production, having quality in addition to size and firmness. The plants are vigorous growers and resistant to disease. We consider Latham the best red raspberry at present available for the Northwest.

#### KING IS EARLY.

Coming slightly earlier than the Latham is the King. This is the leading early berry of the old reds and until the advent of the Latham was the most widely grown variety in Minnesota. It ripens early, is an easy picker and a good shipper. It is still popular with many growers in spite of the fact that in many parts of the north it is not fully hardy and requires some winter protection.

#### TWO RASPBERRY CROPS A YEAR.

No modern garden is now considered complete unless it contains a bed of everbearing strawberries, and those who once grow them are seldom satisfied to be without them. Many who grow fall strawberries have not yet realized that there are also fall or everbearing raspberries. St. Regis, sometimes called Ranere, is a berry of this type. In the spring it gives a good crop, even earlier than the King, and then in the fall produces another crop on the tips of the new growth. Its medium sized berries rank high in quality. We do not recommend a large St. Regis planting for a fall market crop, but they are excellent for a home patch where they will have a good moisture supply and should be in every garden. No one who really likes raspberries should be without a planting of this remarkable double cropper. Plants set this fall will yield delicious berries next fall, less than a year from the time of planting. Those who wish to have raspberries from their own garden next fall should plant some St. Regis now.

#### BASPBERRIES PLANTED DEEP.

Raspberries should be planted 4 by 6 feet apart for cross cultivation, or  $2\frac{1}{2}$  by 6 feet for hedge rows. Set the plants from 1 to 3 inches deeper than they grew in the nursery row and cut the stem to a stub of a few inches above the ground. This stem is to serve only as a marker, so for convenience at winter covering after fall planting can be cut to a couple of inches in length.

#### GRAPES FOR EVERY HOME.

HARDY GRAPES SIMPLIFY VITICUL-TURE IN NORTH.

#### BETA POPULARIZING HOME VINE-YARDS.

No longer need the grape lover refrain from growing grapes in his own garden because of the labor of laying the vines down and covering with earth each fall. He can now have grapes, grape juice to drink, or sauce or jelly grapes from his own garden. The Beta is the grape that has made this possible. It is a strong, vigorous grower and as hardy as the wild grape but, unlike the wild, is a regular annual yielder of very heavy crops. The fruit is black, of medium size and ripens so early that it can be grown safely even in the far north. There are other hardy grapes but Beta is the most popular and the most generally satisfactory. Seventy-five per cent of our own vineyard devoted to market fruit is Beta.

#### GRAPE GROWING PROFITABLE.

Grape growing is fast becoming a popular and profitable enterprise in the north for its fruit is easily sold at good prices and with a variety like the Beta a small vineyard will produce a very heavy yield at a low cost. We find that the fruit sells best in half bushel baskets. Good vines yield several such baskets each year. There is hardly a town in the northwest that will not furnish an excellent market for the product of even a large vineyard. A small planting of only 100 vines will occupy about an average city lot, will require but little attention, and should yield

several hundred such baskets annually, furnishing a welcome addition to almost any family income. The vines should be planted about 8 feet apart in North—South rows spaced at 8 feet. Plant deeper than they stood in the nursery in a hole that is large enough for a full spread of roots, and prune back to 2 or 3 buds. The second year a two wire trellis should be used for the training of the vines.

#### GRAPES UTILIZE WASTE CORNERS.

If there is not room to plant many vines there is always room for a few. They can be trained over a fence, or to cover an unsightly building, or as a shade for a porch or pergola. Here they stand year in and year out beautifying the home and furnishing the kitchen with an abundant supply of useful fruit.

## CURRANTS AND GOOSEBERRIES POPULAR.

## TWO COMMONLY NEGLECTED PLANTS THAT WILL REPAY GOOD CARE.

Few fruits are more neglected and less understood than the gooseberries and currants, but few fruits will yield better and give a more satisfactory response when given good culture. They will grow well even in neglect, and when given good culture will flourish on nearly any soil. In many respects the two are similar. They both prefer a cool soil and location and can therefor be grown on the north side of fences and buildings or in similar places in which other plants do not thrive because of the partial shade. They should be given thorough cultivation and be kept free from grass and weeds at all times. Liberal applications of barnyard manure will give good results. In pruning one should bear in mind that the best fruit is borne on young wood, and that all canes more than 4 or 5 years old should be cut out and burned, as should all but four or five of the young shoots that come up from the base of the plant each year. If these simple directions are followed currants and gooseberries will prove to be a most satisfactory home or commercial crop.

#### CURRANT WORM CONTROL.

The one serious insect pest affecting these plants is the currant worm. This worm works very rapidly and if the bushes are not sprayed will soon defoliate a patch. To control it, spray the foliage with arsenate of lead just after the fruit has set. If the work is thoroughly done there should be no need of later spraying.

#### DEEP PLANTING BEST.

The plants should be set about four feet apart in rows six feet apart, and placed a little deeper than they stood in the nursery, or so that the branching will take place below the surface of the ground. The tops are then headed in about one third.

#### PERFECTION NEARLY PERFECT.

The Perfection is easily the best red currant for home use. It yields freely good sized bunches of large bright red berries. There is probably no currant superior to Perfection for the home garden, and certainly there is none that we would prefer to have in our own home girden. As a commercial berry it also ranks high, for the large size and attractive appearance of the fruit insure that it will top the market.

#### THE THORNLESS GOOSEBERRY.

Originated in Minnesota a few years ago, the Carrie has now become the most popular gooseberry for Minnesota and the adjoining states. The berry is of good size and the plant a prolific yielder. The plant is perfectly hardy and the foliage resistant to mildew and other diseases that do such serious damage to some varieties. One of the big advantages Carrie has is that it is very free from thorns, those that they do have disappearing by the time the wood is two years old. For this reason it is often called the "Thornless Gooseberry." This is one factor alone makes it a popular berry wherever grown.

#### A PERENNIAL SAUCE SUPPLY. RHUBARB, OR PIEPLANT, GIVES EARLIEST SAUCE EACH YEAR.

Probably no vegetable plant grown is more universally liked than rhubarb, and certainly there are none than can be made to yield for such a long season. The plant is a perennial and comes up again each year from the root. From earliest spring until late fall fresh stems may be pulled from the garden, and if a few roots are dug and put in the cellar in the fall they can be made to produce all thru the winter as well.

#### A PLANT OF MANY USES.

Pieplant, or Wineplant as it is sometimes called, is a plant of many uses. Delicious health-giving sauces may easily be prepared from it. Pies that are second to none make it a popular vegetable with the pastry loving folk, and by some it is used as a source of satisfying beverages.

#### CULTURE VERY SIMPLE.

It is an extremely easy plant to grow, and will produce even when grossly neglected, but when well cultivated and fertilized liberally with barnyard manure it will yield abundantly of large tenderstalks. The common planting plan is 3 feet apart in rows 6 feet apart, placing the roots so that the bud or eye is about 1 inch below the surface of the ground. At least a dozen plants should be used for a continuous summer supply, and if they are to be forced in the winter 25 would be better.

# EARLY GREENS EVERY YEAR. ASPARAGUS FURNISHES GARDEN'S MOST CHERISHED GREEN.

Another valuable perennial that should be in every garden is the Asparagus. Once planted, it will be a recurring joy for many years to come as its tender shoots burst thru the ground each spring, furnishing us with our earliest and most cherished green. Whether served creamed, buttered on toast, or in soups its tender flesh and delicate flavor make it ever popular. Each year it can be used from earliest spring until late in June, after which it is allowed to grow without further cutting for the year.

#### ESTABLISHING THE BED.

The best way to establish a bed of asparagus is to dig a trench about eighteen inches deep. Into this solidly pack well rotted manure to a depth of one foot, on this put a few inches of soil and then place the plant, roots spread out, with the center of the crown, or bud, three or four inches from the top of the trench. Cover lightly at first, firming the soil well, and after growth has started fill the trench in gradually until level full. This trench-

ing is not essential, but will give a better bed than will ordinary planting, and as the bed is a permanent investment it pays to do the work well.

#### ASPARAGUS MAY BE FORCED.

Like rhubarb, this perennial too may be forced in the cellar, but the more common plan is to produce early shoots in the spring by placing a cold frame over certain plants in the garden. This will result in very early shoots and will in no way injure the plant. One hundred plants put in now cost but little and will be an annual source of satisfaction for many years to come. Why not take advantage of the favorable planting conditions existing now and get them in this fall?

### **FALL PRICE LIST FOR 1921 OF**

## THE DANIELS NURSERY

FRANC P. DANIELS, Proprietor

### Fruit Plant Specialists Long Lake, Minnesota

Fruit plants are our hobby. We specialize on their growing. We also grow fruit for market. We offer for sale here only those varieties of plants which have proven their superiority in our own trial grounds and commercial fields as well as thruout the entire northwest. We therefor offer them to our fruit growing friends with the recommendation that we consider them the best proven varieties in each of their respective classes for general northern growing. We can give them no better recommendation. Each is an UTILITY PLANT, which, when thoroughly established, will continue to yield useful fruit crops for many years to come. No yard is too small to grow some of them, and no family so small that it cannot use the fruit of some of each of these varieties. Fall is the best time to plant. We suggest ordering by return mail. We will appreciate your order and assure you that it will have our very best attention.

We employ no agents, but sell direct to the planter. This method has three great advantages over other methods. FIRST: We can sell at a lower price, as the agents' costs and profits are eliminated. Our prices are as low as they can be, consistent with the cost of production of high quality stock. SECOND: Plants reach our customers in the best possible condition, being shipped direct to the planter from our fields or cellar, removing the usual opportun'ty for drying out or other deterioration. THIRD: Chances for mixing or substitution of varieties are eliminated, as there is no intermediate handling of plants.

Our terms are cash with order. Planting time is at hand. An order sent now will reach you by return mail or express, for digging season starts the first of October and we can make immediate shipment any time after that. May we have your order to-day?

#### PRICE SHEDULE FOR FALL 1921.

Red Raspberry	1	12	25	100	1000
St. Regis (everbearing)\$		\$0.85	\$1.40 1.25	\$4.25 3.50	\$25.00
King Latham (Minn. No. 4)	.10	1.00	1.50 4.75	5.00 18.00	40.00
Grooseberry, Carrie	.30	$\frac{2.50}{3.00}$	5.75	20.00	175.00
Cultant, 1 circulon	.20	$egin{array}{c} 2.00 \ 1.00 \end{array}$	$\frac{3.75}{1.75}$	$\begin{array}{c} 13.50 \\ 6.00 \end{array}$	$120.00 \\ 50.00$
Asnaragus	.05	.50	.90	2.50	15.00

#### OUR GUARANTEE.

We exercise the utmost care in labeling and packing our plants and guarantee them to be true to name and correctly counted, and will replace free of charge any which prove to be otherwise. In no case will we be liable for more than the original cost of the plants. We deliver the plants to the transportation company in first-class condition and cannot be held responsible for damage to them after that time, nor for inability to make delivery because of strikes, act of nature or other causes beyond our control.