Hello!

Thank you for your interest in our products. Please find enclosed some notes regarding the different cultivars that we carry. The majority are cold hardy fruit bushes imported from Canada, but they also seem to do well in warmer zones. The smallest plants are usually shipped in 2.5" pots, having had one season of growth. It usually takes three years for these bushes to grow large enough to produce a significant amount of berries, but we are also gradually increasing our line of older plants to ship semi-bare root, as noted on the pricelist. Upon occasion we will use other suppliers which may ship bare root or in different sized pots.

Our normal shipping season runs April 1-June 30, depending on spring weather, and again in the fall (October) and we do our best to accommodate your schedule. Most of our plants usually transplant well late into spring even in warmer zones. We usually ship US Mail Priority Post, which is competitive with UPS, or Speedee Delivery around Minnesota and adjacent states. We try to use recycled or biodegradable shipping materials.

Sincerely,

Jim & Bernis Ingvaldson PO Box 512 Bagley, MN 56621 218-331-8070/218-694-3071 info@honeyberryusa.com / www.honeyberryusa.com

A few notes about **honeyberries** are in order:

- Tasty berries are higher in antioxidants than blueberries
- First fruit of spring (prior to strawberries)
- Cold hardy to -55 F
- Member of the honeysuckle family, found in Europe, Asia and North America
- Grows in most soils acidic to alkaline (4.5-7.5 pH), clay or sand
- Bears well in 4th year (on year-old wood), with a 50 year+ lifespan
- Produces 3-8 lbs of berries or more after 5 years, depending on variety
- Full sun northern climates, shade in warmer climates
- Thin skin, tiny seeds
- No suckering, disease resilient

How To Grow Honeyberries

This plant is very hardy, growing in sandy, loamy and even clay soils. A sunny to partly sunny location is best in northern zones, and shade in mid and southern zones. Moderate rainfall is sufficient. Both spring and fall planting are suitable. Aged manure is a great fertilizer in the spring. Plants need no fall fertilization.

Plant 2-4" of stem below surface for multiple shoot production the following year. Leave 3-5 feet of spacing between each plant and 8 -10 feet between rows. Water well every 4-5 days, 3 or 4 times, then as needed.

Honeyberries depend on pollinization from other varieties of honeyberry shrubs, so order at least one different variety per 3-4 of the same variety. It is very important to keep the grass away from the bushes the first few years. Let berries **fully ripen** (**dark purple throughout**) for maximum sweetness.



Birds like these berries too, so remember to cover shrubs with garden netting! Deer, rabbits and rodents also may munch shrubs when they are young.

Early blooming varieties

Early blooming varieties									
Haskap/Honeyberry	Taste		Characteristics	Width/ Height/Yield/ Berry size	/Form	RIDOM	Mildew resistance	Origin	
Aurora	Excellent sweet tangy Largest berry with sweetest taste			5'+/5' High	Upgright and spreading shape	Mid	High	U of S, Russia (Solovey) / Japan (MT46.55)	
Berry Smart Blue	Very good, tart tangy		Fast growing, early dormancy,	6-8'/6-7' High smaller berries than U of S varieties		Early and into the mid season	High	Russian (same origin as Berry Blue™)	
Borealis	Excellent, sweet tangy		Best suited for home gardeners who can hand pick the more delicate fruit	Medium 1.62 grams	Heavy foliage on dome shaped bush	Mid	Very High	U of S, Russia (Blue Belle/ Kiev#8)/Kuril (Blue Velvet/ Tomichka)	
Honey Bee	Very good but tart until fully ripe		Holds onto its fruit firmly until fully ripe		V-shaped bush with pretty foliage	Early- mid	High	U of S, Russia (Suvenir)/Kuril (Blue Pacific)	
Indigo Gem	Excellent sweet tangy chewy		One of the preferred fresh- eating berries for its sweetness and slightly chewy texture	Medium-	V-shaped, open bush		Medium-low	U of S, Russia (Blue Belle/ Kiev#8)/Kuril (Blue Velvet/ Tomichka)	
Svetlana	Very good, tart tangy		Fastest growing	Very High	Tall dome shaped bush	Early (1 week prior to Berry Blue)	Unknown	DNA Gardens, Canada from Russian seeds (Berry Blue/Blue Belle)	
Tundra	Good, mild tangy			1.49 grams	V-shaped, more open bush than Borealis		Medium	U of S, Russia (Blue Belle/ Kiev#8)/Kuril (Blue Velvet/ Tomichka)	

Note on Flavor: Honeyberries vary greatly in levels of sweetness. Even the sweetest berries are somewhat tangy. * accurate measurements of pounds of berries per plant are not currently available, but conservative estimates range from 3-8 lbs / 5 year old bush * Borealis, Tundra, and Indigo Gem are too closely related, so another companion variety needs to be planted in the proximity * At least one suitable companion variety per 3-4 other bushes is needed to ensure pollination, along with adequate insects at pollination time

Black Currants Ribes nigrum



Black currants are nutritional powerhouses! They have vitamin C concentrations four times higher than citrus fruit; double or triple the amount of potassium found in most fruit and 30-40 types of bioflavonoids. Most commercially available black currant cultivars contain 130-200 mg vitamin C/100 ml juice but some breeding lines contain up to 350 mg/100 ml juice.

We grow the 'Ben' series of black currants from the MyInefield Research Station in Scotland, estimated to

account for 50% of global production. Early breeding programmes at MRS sought to introduce early spring cold hardiness into cultivars, yet maintain heavy commercial production. The first cultivar was Ben Lomond, introduced in 1975 to good commercial success. Since then, newer cultivars with better attributes have replaced Ben Lomond. Ben Hope is now the most widely planted commercial cultivar in the UK and Europe because of its high yields, good flavour and reduced susceptibility to gall mite. Current breeding programs aim to introduce late flowering characteristics into cultivars so flowers are not damaged by late spring frosts. Disease resistance and fruit quality, flavour and nutritional aspects are also evaluated. Many black currant cultivars are used for processing into juices and jams but can also be used for fresh eating. Ben Connan and Ben Sarek are good fresh-eating choices with large, flavourful berries.

Ben Hope is widely planted commercially in Britain for several reasons. It is a tall, vigorous and upright plant with genetic resistance to black currant gall mite. Fruit is easy to mechanically harvest since the plant is taller and the fruit is at the right height on the plant. Yields are consistently high with medium sized currants that are good for juicing. It has good resistance to both mildew and leaf spot. Ben Hope is also suited for the fresh market because of its larger berries and good flavour.

Ben Tirran is a high yielding (15,100 lb/ac), late cultivar with pleasant tasting medium sized berries. It flowers a little later than other Ben series black currants so it has reasonable tolerance to spring frosts. Growth habit is upright and vigorous. Fruit is suitable for both juice and jams, for commercial and u-pick operations, and home gardens.

Ben Connan is an early variety of black currant with large berries that was released by Mylnefield specifically for the fresh market. It is high yielding and shows even and uniform ripening. It has large, deep black with a pleasant acid/sweet flavour. Its compact growth habit makes it suitable for both mechanical fruit harvesting, u-pick farms and the home garden market. Great for fresh eating, jams, preserves, canning but needs to be harvested good and ripe for best sweetness. Not recommended for juice.

Ben Sarek Another good cultivar for the fresh market with high yield and large berries. It forms a small, compact bush of medium vigour and would be suitable for the grower looking for high yield per unit area. Easy to manage and harvest. Not recommended for juice.

Tiben is known for its high yield, high levels of anthocyanins and vitamin C as well as its even ripening, upright growth and resistence to mildew. It is reported to be relatively resistant to White Pine Blister Rust in Poland. In comparative yield studies it was shown that Tiben recorded higher yields than 'Ben Lomond'. 'Tiben' ('Titania' × 'Ben Nevis') also had strong growth and a resistance to powdery mildew [Sphaerotheca mors-uvae] similar to 'Titania'.

Chernaya Lisovanko

Ripens mid season. Originally from Russia, this cultivar is a vigorous grower that produces brilliant red foliage in the fall. **Crandall** (*Ribes odoratum*) A native American fruit introduced in 1888. Vigorous plants grow 8' tall, producing large, juicy berries. Ornamental, fragrant, large yellow flowers bloom mid season. Fruits late. Resistant to White Pine blister rust and cane blight.

Red, White & Pink Currants (Ribes spp.)

These are among the most beautiful edible ornamentals, with shiny clusters of red, pink or white translucent fruit. See pricelist for complete list, but here are a few examples:



Red Currants – Rovada Grows 3-5'x3-5'

It can be eaten fresh or processed into sparkling red jams or jellies. Rovada was introduced from Holland in 1990. It produces heavy crops of large translucent berries born in long clusters. It can be eaten fresh or processed into sparkling red jams or jellies.



White Currants - White Pearl Grows 3-4'x3-4'

These currants produce heavy clusters of white, translucent berries with a pink blush. Delicious in jams or jellies, they can also be eaten fresh.



Pink Currants - Gloire des Sablons Grows 3-5'x3-5'

Produces long clusters of beautiful pink fruit. Productive, vigorous plant originated in France.

Gooseberries also available

DWARF TART CHERRIES

	Fruit	Flavor	HxW	Color	Harvest	Suckering	Pollinate	Zone
Carmine Jewel Prunus cerasus x P. Futicosa	4 grams, 15-17 Brix, 15-25+ Ibs yield after 6 years	eating and	5-6'	skin and	Early harvest, ripening first in the season, late July-early August in the north		Self- pollinating	2-8
crimson Passion Prunus cerasus x P. Stuticosa	6 gram, 22 Brix, 15-20+ Ibs after 6 years	Excellent for fresh eating, high sugar content	5.5-6'x 5-6'	Dark red fruit, flesh firmer than other cultivars	harvest	Lowest suckering of all the dwarf sour cherries	Self- pollinating	2-8
Ro Peo Prunus cerasus P. fruticosa	4 gram, 25+ lbs after 6 years	Excellent for fresh eating, high sugar content, one of the best for juice.	5-6'	Dark red, very similar to Carmine Jewel, but later harvesting	Mid season harvest	Low suckering	Self- pollinating	2-8
t Prunus cerasus x f. fruticosa	5 gram, 20 Brix, 25+ lbs after 6 years	Excellent for fresh eating, high sugar content	5.5-6'x 5-6'	Dark red fruit, flesh firmer than other cultivars	Mid season harvest	Low suckering	Self- pollinating	2-8
Prunus cerasus ustera L. 'Lutowka'	5-7 gram	Produces large fruit within 2-3 years after planting	5'x5'				Self- pollinating	3-8
Prunus cerasus caproniana , 'Evans Bali'		Begins producing in its 4th year, mildly tart flavor		Bright red fruit, long pits, translucent yellow flesh.	Ripens in late July in the north		Self- pollinating	2-8, no quite a hardy a U of S breeds



Goji Berry There has been a lot of buzz about this plant from China and Mongolia. The berries are reported to have a very high level of antioxidants, especially carotenoids, and can help the body adjust to stress and change. The leaves are great for eating as well. Coming from high altitudes, the plant is hardy, easy to grow and maintain, and drought tolerant once established. Goji plants can grow in a range of soils but prefer well-drained – they won't grow in wet conditions.

They prefer full sun. Plants are large shrubs that grow 7-10 ft tall. Pruning will keep the plant shorter and thicker and produce more flowers and fruit. The numerous trumpet-shaped flowers

seen in early summer develop into bright red berries by late summer. Flowering and fruiting will continue until the first heavy frost. Plants flower the year after planting with maximum fruit production in the 4th or 5th year.

Other

Viburnum trilobum **Highbush cranberry** boasts showy white flowers in the spring, followed by bright-red fruit in the fall. Likes a sunny location, self-fertile, hardy to minus 40F, grows to 10 ft. in height or more with no pest or disease problems.

<u>Rubus arcticus L. subsp. x stellarcticus</u> **Arctic raspberry** features attractive flowers and abundant, flavorful fruit. USDA zone 2-?. Grows 6" tall.

Need companion arctic raspberry to pollinate, such as "Anna" with "Beta".

<u>Actinidia kolomikta</u> **Red Beauty** – kiwi female. Use one "Arctic Beauty" as the male pollinator per up to five female "Red Beauties". Other kiwi male varieties may bloom too late to pollinate Red Beauty. USDA zone 3-9. Plants shipped in 2.5" pots

<u>Actinidia kolomikta</u> Arctic Beauty – kiwi male. Use one "Arctic Beauty" as the male pollinator per up to five female "Red Beauties". Other kiwi male varieties may bloom too late to pollinate Red Beauty. USDA zone 3-9. Plants shipped in 2.5" pots.

<u>Sambucus canadensis</u> American Elderberry, grows 10-12 ft. tall and produces abundant dark purple berries in the fall. Our varieties (Adam II, Bob Gordon, Ranch, Wyldewood) were selected for their large berries and abundant yields. USDA zone 3-8. Plants shipped bare root, pruned to 6-12" tall.

Sea Buckthorn



Sea buckthorn (sea berry) is considered a nutraceutical because the juice is very high in vitamins C and E, protein and organic acids. It is a very hardy plant that is well-adapted to growing on sandy soils, steep slopes and drought conditions. It tolerates low fertility because it can fix atmospheric nitrogen into a form plants can use. It provides good shelter for wildlife and is an attractive landscape shrub with bright orange berries. Plants are either male or female so males are needed for pollination. Produces

suckers so do not plant close to neighbors' property, and mow around plants.

Chuskaya (Star of Altai) boasts larger berries, very good cultivar in limited supply. Chuskaya originates from Russia and has been growing in North America since the mid 2000's.

Sunny features larger berries, very good cultivar in limited supply. Sunny oiginates from Latvia and as been growing in North America since the early 2000's. It is vigorous and well adapted for our climate. The fruits are a bright yellow.

N/A Trophy grows 6-8 ft. in height. This Finnish variety bears good crops of unusually sweet, large and reddish-orange berries, and grow better in colder and drier continental climates. Female.

N/A Orange Russian (Otradnaya cv) An attractive, vigorous, and productive, medium-size shrub, Orange Russian bears abundant crops of very large, flavorful, deep orange berries. Orange Russian also features unusually lush, grayish green foliage. This variety is well adapted to regions with long, cold winters and also grow well in mild climates. Female.

Male seaberry plants Males need to be planted at a rate of 1 male for every 5 females.

Saskatoon Variety	Fruit	Pro- ductivity	Form	Size (hxw)	Suckering	Harvest Period	Other Characteristics	Origin
Honeywood	13-15 mm 0.5-0.6 in	High	Upright & spreading	3.6m x 3.6m 11ft x 11ft	Low	Later; Uneven ripening in large clusters, suitable for U-Pick	Blooms late so less susceptible to spring frosts.	Parkside, Saskatchewan
JB-30	17 mm 0.7 in	High	Compact	5m x 6m 16ft x 20ft	Low	Mid-harvest; Uniform ripening	Juicy, freezes well	Langham, Saskatchewan
Lee 3	14 mm 0.5 in	Good	Compact	2.5m 8 ft	Low	Earlier	Slow growing; intense flavour & few seeds; believed to be Northline x Pembina cross.	
Lee 8	16 mm 0.6 in	Good	Compact	2m 6ft	Low	Earlier	Northline x Thiessen cross; slow growing; exceptional flavour	Barrhead, Alberta
Martin	15 mm 0.6 in	Medium	Round	3m x 4m 10ft x 13ft	Moderate	Earlier; uniform ripening.	Excellent flavour; Thiessen parentage	Langham, Saskatchewan
Nelson	13 mm 0.5 in	Compact	Uniform	1.5m x 1.5m 8 <i>ft x</i> 8 <i>ft</i>	Moderate	Mid-harvest; blossoms 3-7 days later than other cultivars; ripening somewhat unevenly;		Bradwell, Saskatchewan
Northline	16 mm 0.6 in	Very high;	Upright & spreading	4m x 6m 13ft x 20ft	High	Earlier	Tangy flavor, acidic, fleshy fruit; Popular cultivar for commercial production.	Beaverlodge, Alberta
Smoky	14 mm 0.5 in	Very high;	Upright & spreading	4.5m x 4.5m 15ft x 15ft	Profusely	Ripens mid- harvest; even ripening	Flowers bloom mid- season giving some protection against spring frosts; Round and sweet fruit; high sugar / acid ratio	Peace River, Alberta
Thiessen	17 mm 0.7 in	High	Tall and upright	4-4.5m 13ft x 15ft	Low	Earlier; uneven ripening; best for u- pick or home gardens; difficult to harvest mechanically; good flavour;	Blooms early so may lose some flowers to spring frosts.	North Saskatchewan River, Saskatchewan

Information based on <u>http://www.prairie-elements.ca/saskatoon/3.2-cultivars.pdf</u> and **Saskatoon Production Manual**, Alberta Government, 2013, Complete manual available from: HoneyberryUSA, PO Box 512, Bagley, MN 56621 Tel 218-694-3071 **info@honeyberryusa.com www.honeyberryusa.com**

LATE season selections of honeyberry

7-14 days later than Early/Mid season honeyberries Zones 7-8 prefer these selections



Solo[™] and Maxie[™] Yezberries®

MaxieTM

SoloTM

- * Large berries are sweet and juicy; enjoy them fresh or processed.
- * Fruit ripens a couple weeks after early ripening (Russian) honeyberries.
- * Cold hardy, but better suited to temperate climates than early blooming varieties.
- * Ancestry: 100% Japanese. Yezberry™ refers to germplasm source,
- Hokkaido Island, which was once called Yez or Yezo Island.

* **Origin:** Developed in the U.S. by Dr. Maxine Thompson. Released to market in 2016.

- * Shrub Type: Deciduous
- * Height: 5-6 feet
- * Spacing: 5-6 feet
- * Spread: 5-6 feet
- * Flower Colors: Pale yellow
- * Light Requirement: Part Sun to Sun
- * Blooms On: Old Wood
- * **Bloom Time:** Early spring, late blooming category (14 days or more later than the early bloomers)
- * **Pollination:** Solo[™] will bear fruit without another haskap for pollinization,

but gets larger and more numerous berries with a companion

pollenizer.

Maxie[™] needs a companio such as Solo[™] which blossoms at the same time.

Boreal Blizzard blossoms at a similar time.

* **Pollinizer ratio:** Opinions vary, though 1:3 or more should be adequate for home growers. (at least one companion per three of another single variety)

* **Hardiness Zones:** 3a - 7b; possibly tolerates colder and warmer conditions - feedback requested

* **Water Category:** Average. Water well first couple of years. Plants are more drought tolerant when mature.

- * Weeds: Critical to keep grass/weeds 2-3 feet away from young plants.
- * **Pruning:** Ater 4-5 years, do so after harvesting the fruit.

* **Predators:** Birds (net bushes when berries are green), deer (young bushes), fox and even Fido the dog may also like the berries.

* **Harvest:** Pick fruit 3 weeks after berries turn blue for maximum sweetness; taste one for sweetness first and if it is still green inside and on the sour side, give it a few more days.

* More Info

Plants shipped may be bare root or potted

Also:

Honey Bunch[™] 3-4 feet tall

Sugar Pie[™] 3-5 feet tall

Boreal Blizzard



Boreal Blizzard

- * 'Boreal Blizzard' was so named because the fruit size, productivity, and flavour stopped the University of Saskatchewan evaluators in their tracks.
- * Ancestry: 50% Japanese, 50% Russian
- * Origin: University of Saskatchewan, Dr. Bob Bors, released to market 2016
- * Fruit Weight: 2.8 grams avg., 3.9 grams max
- * Fruit Shape: 'Surfboard'. Rounded narrower ends, wide centre, a bit flattened
- * Fruit Firmness: Good
- * Flavour: Excellent, its 'tang' and 'zing' is possibly the best ever (similar to Aurora)
- * Sugars: 13.3 Brix pH: 3.3 Total Acidity: 1.08% Malic Equivalent
- * Bush Habit and Vigour: Upright and strong grower. The original seedling was 50% taller than 'Indigo Gem' planted at the same time, same field
- * Mildew and Sunscald Resistance: Excellent
- * Productivity: Heavy

* Bloom Time Category: Late. Peak bloom is 4 to 7 days after Tundra/Indigo series. Similar to many Japanese selections but there are many Japanese selections that bloom later.

* **Pollinizers:** <u>Solo™ and Maxie™ Yezberries®</u> may be the best, but the last of the Tundra/Indigo bloom should catch the first 60% of Blizzard (according to zone 2 bloom times). Beauty should overlap the last part of Blizzard. Aurora is too closely related to be a good pollenizer.

More Info



* 'Boreal Beauty' was so named as its heart or oval shaped berries should prove to be a beauty not only for their visual appeal but also for its firmness, fruit size, productivity, and flavour. Berries hold on to the bushes with just the right amount of force.

- * Ancestry: 37.5% Japanese, 37.5% Russian, 25% Kurile
- * Origin: University of Saskatchewan, Dr. Bob Bors, released from propagator 2016

Boreal Beauty

- * Fruit Weight: 2.6g avg., 3.7g max
- * Fruit Shape: Thick Heart or thick Oval
- * Fruit Firmness: Excellent
- * Flavour: Excellent, its 'tang' and 'zing' is possibly the best ever (similar to Aurora)
- * Sugars: 16.9 Brix pH: 1.87 Total Acidity:

* Bush Habit and Vigour: Upright and sturdy. The original seedling was 50% taller than 'Indigo Gem' planted at the same time, same field

* Mildew and Sunscald Resistance: Excellent

* **Productivity:** Heavy

* Bloom Time Category: Very Late. Blizzard and Aurora stopped blooming 4 days earlier than Beauty in zone 2 in 2016.

* **Pollinizers:** Solo™ and Maxie™ Yezberries® may be the closest in bloom time, but Aurora, Honey Bee and Blizzard may overlap a portion of Beauty (according to zone 2 bloom times).

* More Info