

ARUGULA

Eruca vesicaria ssp. Sativa

Final Crop Analysis

Estimated Harvest goals:

Market	Crop/Variety	Weeks Needed	Lbs. Requested each week	Total Pounds Requested per Market
CSA	Arugula	4	0.75	525
CSA	Braising Mix	3	1	525
Farmer's Market	Arugula	5	5	25
FM	Braising Mix	3	5	15
Big Y (A)	Braising Mix	4	20	80
Big Y (N)	Arugula	6	20	120
Efoods	Arugula	2	25	50
People's	Arugula	5	1	5
			Harvest Total:	Arugula: 725 Braising Mix: 620

Cultivars/varieties and seeds:

Seed Source	Suggested Variety	Cost	Pelleted or coated seed? Y/N	Organic? Y/N	Notes
High Mowing	Esmee	½ lb \$19.35	N	Y	*much more seed than needed
Johnny's	Tatsoi	1 oz, \$6.60	N	Y	
Johnny's	Red Giant	1 oz, \$8.10	N	Y	
Johnny's	Stir Fry Mix	1 oz - \$8.04	N	N	

Reasons for selecting these cultivars:

Esmee: Surrey variety (from 2016, 2017) was sold out and esmee has similar qualities. Great leaf shape and spicy flavor. Did very well last year.

Lee chose tatsoi for the braising mix because we have grown it the past 2 years and it is hearty, especially in cold weather, has a long growing period, and delicious!

Red Giant – has spicy flavor and has been good in the past

*STIR FRY MIX: (NOT ORGANIC) has tatsoi and red mustard greens already in it so it might make more sense just to buy this BUT it is not OG: it was grown in 2017 and did well.

Did the variety description meet your expectations? Why or why not?

Yes, the bed in SD C seems to be thriving. Easy to seed and grow.

Would you recommend these varieties again?

Note, we did not plant braising mix. Although it was planned in the Spring, it never made it into the ground. During the Fall CSA, we had leafy greens like arugula, salad mix, and lettuce heads different weeks. Some CSA members requested even more greens, so consider growing a braising mix in 2020.

Make suggestions for two other varieties you think would be interesting to try in 2020. List your reasons.

Astro seems like it would be a pretty easy grow. It is heat tolerant and could be seeded earlier in the season.

Wasabi – Unique, would be fun to grow a small amount of this as an experiment. Maybe the Stir Fry cooks at Hamp or Frank would be interested.

How and when the crop was seeded/transplanted

Arugula was seeded by the F24 Roller with the hang and a 6 seed roller during the week of August 19th.

Direct seeding

Planting #	Seed date	Seeder Used	Settings Used	Notes on germination
Esmee	8/19	F24 Roller with the Jang	6 seed roller	

Farmer Notes:

Later in the season, weed management in South Deerfield was more difficult. Arugula had to compete with weed growth.

Planting Information

Expected yield/ft: .25 lbs

Direct seed or transplant: DS

In-Row Spacing: ½ inch Spacing

Between Row Spacing: 8.5 inches. It was seeded in six rows with the F24 Roller with the Jang clean seeder.

Number of Rows Per Bed: 1000

Bed Feet planted: 6000

Field Planted In: SD C

Number of succession plantings: 2 August 19th and September 2nd

Broadcast Fertility: 1,000/A chicken manure 5/13/19

Additional Fertility: None

Cultural practices:

We did not weed the arugula as intensely as other summer crops. It was direct seeded and the I

and J toolbar cultivated weeds in between the beds of Block C. The I and J cannot be used with 6 row seeder, weeding in between these rows is not possible.

Notes on Irrigation:

None

Diseases observed:

None thus far

Potential Disease Threats: Bacterial Leaf Spot- Small water spots, could also be brown. The leaves may yellow. This is the result of cold temps and can spread from seeds or water. You should remove infected plants and harvest what is ready to bring to markets.

Downy Mildew- A fungal disease with symptoms included as random brown spots on the leaves or mold underneath. These can spread as spores travel through the air. Poor air circulation and moisture may result in more fungal growth.

White Rust- Determine if a plant has white rust if there are white blisters on the underside of leaves. Good management practices include crop rotation and plough plants into the soil after season.

Potential Insects:

Flea beetles- Will chew random holes on the leaf causing damage. This can result in stunted leaf growth or wilted plants. Flea beetles are many different colors from black to brown to blueish. They have large rear legs used for jumping to safety. Direct seeded crops are less tolerate against flea beetles because they are not as developed when the beetles can start munching.

Slugs- Prefer to eat old decaying materials. If the arugula is wet and moist and not being harvested, slug buildup may occur. Hand picking is most effective. Slugs can be trapped with cups of beer, milk or yeast dissolved in sugar water.

Do you think the production practices needed for this crop was worth the yield that we received?

Yes, these crops were direct seeded and did not require a lot of weeding or cultivation work. Harvest is quite quick with a knife or scissors. No real spacing issues, good green to offer later in season. People can get experience using the six row seeder.

Harvest & Storage

When was the crop ready for harvest? How did you know?

Arugula was harvested either Thursday or Friday morning before CSA pickups on October 11th and 25th . It can be harvested as baby greens and continue to grow. Harvest before it gets longer than 8 inches.

How was it harvested? [Give us the details, tools used, people needed to get it done, problems in the field] Arugula was harvested with harvest knives with as little as two people and as many as the whole crew. No real problems, it was harvested directly into lock tops for the CSA.

How was it washed at the wash station? See below

List different post-harvest practices for each market (if any) none

List different shipping practices for each market (if any) We only provided the CSA with arugula and it was brought in lock tops.

What different or improved harvest and shipping recommendations can you make? Harvest directly into bins, day before or morning of market.

Storage and post-harvest handling

Curing: We did not cure.

Washing before storage: 3 bay sink and the greens dryer.

Storage Requirements: 32 to 40 degrees at 95% relative humidity.

How this crop should be processed for long term storage: Unwashed in lock top bins!

Where your crop was stored this fall 2019? ALC Barn cooler

How well did this crop fair in storage and how did it enter storage? Arugula stored well in lock top bins. We took enough and used it up within a week to either CSA or for Student Farmers.

Were there any problems in storage? Nothing major.

What different or improved storage recommendations can you make? N/A harvest what you need, leave the rest in the field.

Gross Income

Actual Yields and Sales: CSA

Date	Week #	Unit lbs., bunches, bags	Amount Per share	Total brought to CSA	Notes
10/11	5	bags	1 Bag	4-5 lock tops	1 bag for ½ share too
10/25	7	bags	1 Bag	5 lock tops	1 bag for ½ share too

Total Gross Income Received From Your Crop: All to CSA

Review and Recommendations

What was different between what was done and what was planned?

Arugula was a successful addition to the CSA. We had a fair amount for consistent weeks. We did not grow enough for other markets.

What worked really well and should be continued?

Low time spent harvesting arugula.

What changes would you recommend for next year?

Consider growing more for other markets or expanding the amount offered to CSA.

Should we grow this crop again? Why or why not?

Yes, arugula was successful and did not require a lot of our time compared to other crops. You should definitely grow again.