Cornell AgriTech New York State Agricultural Experiment Station

Veraison to Harvest

Statewide Vineyard Crop Development Update #5
September 29, 2023
Edited by Chris Gerling

AROUND NEW YORK...

How do you feel about overtime? The game is tied at the end of regulation, and now there will be extra innings, a tiebreak, or another period. In situations where the next score wins, overtime has historically been called "sudden death," but is now more commonly referred to with the less-weighty "sudden victory." The ESPNU guys call it "bonus lacrosse" (at least during lacrosse games), which is positive and encouraging for both competitors and spectators. Spectators can generally be found in two main categories, and there are two major perspectives for each category, meaning there are Four General States of Overtime Spectating. A quick overview of each state:

- 1. Casual and excited. This spectator doesn't really care who wins but has been enjoying the game and/or has pledged to do a chore "as soon as this is over." Overtime is welcome in this case.
- 2. Casual and frustrated. This spectator doesn't care who wins and is only hanging on to the end as part of a more interested group or for closure. May also be hungry, tired, cold, hot, and in need of the bathroom. Overtime is unwelcome in this case.
- 3. Fan of team that just tied the game. This fan has been granted a new lease on life and all sins have been forgiven. In related news, this fan has probably made a number of promises about how the new life lease will be used, at least after the game and depending on outcome. Overtime is welcome in this case.
- 4. Fan of team that was just tied. This fan is second-guessing every recent action and decision, desperately trying to find the one that so angered Fate as to cause this cruel turn of events. Fan #4 may be taking off socks (if they're new) or trying to close the pop-top on any can opened in the last five minutes. Overtime is unwelcome in this case.

I mention overtime because it's starting to feel like we're headed there. Granted, plenty of grapes have already been picked and it's still September if you want to get really technical, but relatively late in a



14.0308.01 in the Viniifcation & Brewing Lab at Cornell AgriTech.

Photo by Luann Preston-Wilsey

season with plenty of twists and turns, I don't think we're that much closer to a result. We are used to spring and summer being inconclusive at best, but September generally has answers. Even If the harvest isn't actually taking place in September, September is where the outcome is often decided. In 2023, I think we'll need October to settle this. So, which type of fan are you right now?

If you're reading this newsletter, we can safely skip any scenario containing the word "casual," which leaves the last two cases. Following the September rain pattern, which has been heaviest in the east and lightest in the west, we can probably deduce some general mindsets. In Lake Erie, the start and middle of the season were like one of those games where it seems statistically impossible to get so far behind, and you keep watching more out of disbelief than anything else. September has turned things around,

Continued on page 2



however, and now you might be able to say you were watching when a historic comeback took place. Firmly in State #3. On Long Island, things were going relatively smoothly and a win seemed secure, and then September gave up a bloop double and hit the next batter. Things still look good, but State #4 vibes are a little stronger. The Finger Lakes has just been weird all year. There's no other way to describe it. Overtime seems to fit because every other box on the bingo card (frost, smoke, sunburn...) has been checked. The Hudson Valley is just hoping to get off the field without any more major injuries, and the north country would like a bit of this summer and fall heat everyone is talking about on the news. In these regions, people waver between States 3 & 4 depending on the day, the hour and sometimes the minute, which brings us back to the original question.

If the outcome of an entire game is generally thought to represent which team/player performed best, overtime seems like a coin toss, and we've already discussed why a coin toss may feel like unnecessary torture or a wonderful gift. Welcome or not, overtime is always compelling, increasing the drama and intensity for everyone involved, even when Taylor Swift isn't at the game. While I would prefer 100% comfortable wins for the Philadelphia Eagles, Prindle Family Dentistry Little League Baseball (Minor division) and the New York grape & wine industry, I also know where the best stories come from. Regardless, this isn't up to us. We're headed to October with a lot left to play for, so we might as well enjoy the ride.

Fruit Composition Report (pp. 5-8)

In almost every case, soluble solids (Brix) numbers are higher this week while titratable acidity (TA) is lower. In almost every case, these numbers trail where they were last year. Lake Erie Concord is now at least on the map while the Portland Cab Franc and Riesling are still a long way from ready. The Hudson Valley contains the highest proportion of harvested selections so far, and there are likely no more samples from the Capital District or Lake Champlain. We will get the Champlain varieties in the mix much earlier next year. There are not a lot of hybrids left while Chardonnay and Pinot Noir are mostly still in the mix, or at least were on Monday. We will see what next week brings.

Finger Lakes (Hans Walter-Peterson)

While it certainly hasn't been perfect, the month



Students from FLCC's Viticulture & Wine Technology Program processing Aravelle grapes from the Teaching & Demonstration Vineyard.

Photo by Finger Lakes Community College

of September has been pretty kind to Finger Lakes growers this year. The month started out warmer and wetter than normal, and then did a serious 180 in the middle of the month and turned cool and dry. Overall, we will end the month with average heat accumulation and about 1" less rain than our monthly average, which is always helpful during harvest. We're fortunate to be far enough to the west to avoid the rain events that are impacting vineyards in the Hudson Valley and on Long Island right now.

Ripening progress continued last week based on the results from our samples, although a few of them look a little wonky when compared to last week's results (i.e., sampling variation). Cooler temperatures kept Brix from moving much last week, but the warm and sunny "faux summer" weather that is coming for much of next week will probably give us one last boost of ripening before it looks like "real fall" weather settles back in.

Concord harvest has been underway in the Finger Lakes for a couple of weeks, as opposed to many growers in the Lake Erie region, many of whom will only be starting next week. Ripening has been a bit slower out there compared to here mostly because of the differences in crop load between the two regions. The Lake Erie

region was not impacted nearly as much by the spring freeze that hit many of our Concord blocks here in the Finger Lakes, so they are trying to ripen much larger crops than many of our growers here.

This is the point in the harvest season where it can be kind of a mixed bag as to what is being picked any given day. There have been a few final loads of Pinot noir coming in, along with Chardonnay, Gewürztraminer, Grüner Veltliner, and Pinot gris. At the Teaching Vineyard, we picked some more of our seedless table grapes, Jupiter and Marquis, and the FLCC program picked our one row of Aravelle, the latest release from the Cornell grape breeding program, for use in their winemaking classes this fall and next spring. At this point, our only remaining hybrid variety at the Teaching Vineyard is Corot noir.

Long Island (Alice Wise)

Harvest was in full swing on Long Island this week with Chardonnay, Sauvignon Blanc, Gewürztraminer, and Merlot for rosé making it to the crush pad. Fruit is ripening at modest Brix and low acids. Whites such as Chardonnay and SB were in remarkably good condition given the previous weekend. There were three days of dampness though only about 1" of total rainfall. Part of the scramble this week was to bring in ultra-ripe fruit before the predicted deluge of rain Sept. 29-30. Fortunately, the East End appears to be avoiding the worst of the rain. Most of the storm – incredibly, still remnants of TS

Ophelia – is skewing to the western part of the Island and areas west of the city. Not to wish the bad weather on our friends to the west, but local growers are likely relieved to be avoiding the major downpours. Next week looks to have sunny weather and warmer temperatures, perfect for ripening reds.

In the Cornell LIHREC vineyard, the yellow jacket populations were much reduced this week compared to the previous one. A range of white wine varieties were picked:

- •Albariño Beautiful, tasty fruit, though loose clusters and smallish berries due to suspected leafroll virus infection. Vines (not certified virus free) were planted before the most recent clean plant program was put in place. A good example of why investing in certified vines is worthwhile.
- •Aligoté A lesser variety from Burgundy, this ranks as the most productive variety in this vineyard. It annually requires heavy cluster thinning. By virtue of its location on the end of a row, a few vines were hammered by yellow jackets.
- •Arneis Grown in the Piedmont region, the expected cluster rot (clusters are compact) never materialized.
- •Chardonnay Fruit was golden, beautiful and full of flavor. An occasional cluster had yellow jacket-induced cluster rot, a mix of sour rot and Botrytis. Overall, surprisingly clean fruit given the weather, even the huge clusters of clone 5.



Preparing Chardonnay for harvest in the Cornell LIHREC vineyard, 9-28-23

Photo by Amanda Gardner

- •Semillon Native to the Bordeaux region. It is supposedly susceptible to cluster rot but fruit was minimally affected.
- •Tocai Friulano After years of abysmally low yields, vines finally approached the 3 t/a mark. That was without any cluster thinning. The challenge with yield was the motivation to plant two TF hybrids, Fleurtai and Soreli. Those vines are young, only the second year of a full crop, but are thus far extremely productive.
- •Verdejo An aromatic, fruity white, it suffered from a bit more yellow jacket damage than other whites. Who knew yellow jackets prefer Italian whites.

Hudson/Champlain (Jeremy Schuster)

As vineyards in the Capital District and Champlain Valley near the end of their harvest, harvest in the Hudson Valley marches on with thicker-skinned red varieties, such as Cabernet Franc and Frontenac, hold out for higher °Brix and lower pH if the fruit quality allows. For growers in the Capital District, this year has been a case of harvest when you need to rather than when you want to, with some fruit coming in at 19.2° Brix due to a rapid decline in fruit quality. Birds continue to make themselves a seemingly never-ending nuisance, with turkeys being one of the prime suspects. At the Hudson Valley Research Lab, bird feeding pressure has increased since last week but has not significantly impacted the yield thanks to the use of bird deterrents such as laser scarecrow, bird netting, and bird distress calls.

Both the Champlain Valley and Capital District were dry this past week, reaching 2360 and 2440 GDDs, respectively. The Hudson Valley, however, is a different story. Over the past weekend, the Hudson Valley received over 2 inches of rain, with some areas receiving over 3 inches! The Hudson Valley has accumulated 2663 GDDs since April 1st.

The upcoming weeks are going to be crucial for ripening and 'Brix accumulation to avoid the chances of early fall frost. The forecast looks promising for the Champlain Valley and Capital District to get some decent ripening if the canopy and fruit quality hold, of course. As for the Hudson Valley, don't put away the umbrellas yet, as another inch of rain is predicted to hit this weekend. This additional moisture can make accumulating the desired level of 'Brix challenging, and it may become necessary to harvest before the desired 'Brix level. Diligent

scouting of fruit rots and consistent measuring of initial berry chemistry, with an eye toward logistics, will be needed this week and in the weeks to follow.

This week's random fact: Do you know what temperature saltwater freezes at in Fahrenheit? Fresh water will freeze at 32° F, but saltwater freezes at 28.4° F as a result of the salt in the water.

Lake Erie (Terry Bates)

We had a healthy Brix jump last week with a current mean of 14.78 Brix (13.6-16.3 range). Berry weight continued to climb slightly with a current mean of 3.37 g. Therefore, we continue to see 2021 berry weights and 2003 ripening. Fortunately, there is very little precipitation in the forecast for the next 10 days and plenty of sun later in the week. The berry weight should at least flatten off or even dehydrate a little to help us get over the hump.

Concord Berry Curve (Terry Bates)

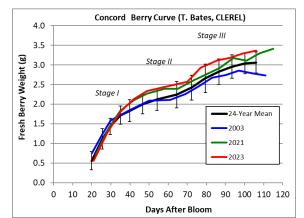


Figure 1. Cornell Lake Erie Research and Extension Laboratory's Concord Berry

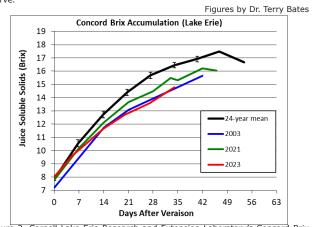


Figure 2. Cornell Lake Erie Research and Extension Laboratory's Concord Brix Accumulation.

Figure by Dr. Terry Bates

Fruit Composition Report - 9/25/2023

Note: Berry weights are the total for 100 berries. Yeast Assimilable Nitrogen (YAN) will be measured every other week.

	every		weer	ζ.												
Cabe	rnet Franc		0/40/00	0.107.100	0/0=		/00	0.10.5	0440	(00	2/25	0/10	(00	0.10.5	0///	(00
Danian	Decembelon	9/25/23	9/18/23	9/27/22	9/25	9/18	"22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22 VAN
Region	Description	Ber.wt.g	Ber.wt.g	Ber.wt.g	% Brix	% Brix	% Brix	pН	pН	рН	TA g/L	TA g/L	TA g/L	YAN (ppm)	YAN (ppm)	YAN (ppm)
FL	Keuka	156.8	142.0	148.7	17.5	16.7	19.2	3.03	3.01	3.11	10.1	11.0	9.0	30	33	50
FL	E. Seneca	145.7	150.9	110.7	18.0	16.7	20.8	3.08	3.05	3.13	10.3	10.1	6.9	44	56	128
FL	W. Seneca	138.1	137.0	128.5	17.5	16.6	20.8	3.10	3.06	3.12	9.5	9.3	7.3	88	67	14
FL	Cayuga	159.8	152.7	157.1	18.9	17.7	19.8	3.18	3.13	3.13	8.5	9.7	7.6	60	57	140
FL	Dresden	136.2	134.1	113.0	21.5	20.0	22.2	3.11	3.07	3.04	7.4		7.7	22	17	14
HV	Central HV	169.6	169.4		19.1	18.8		3.64	3.58		4.6	5.3		151	150	
LE	Portland	168.8	163.6	152.6	14.3	13.7	18.1	3.14	3.08	3.09	10.9	12.5	10.3	157	163	84
LI	LI-05	193.4	182.1	213.2	18.8	18.1	21.7	3.50	3.50	3.61	6.5	6.3	4.7	110	106	97
LI	LI-11	175.0	158.3	HARVEST	18.4	18.1		3.47	3.45		6.3	5.9		118	80	
Cabe	rnet Sauvi	ignon														
		9/25/23	9/18/23	9/27/22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Region	Description	Ber.Wt.g	Ber.Wt.g	Ber.Wt.g	% Brix	% Brix	% Brix	pН	pН	рН	TA g/L	TA g/L	TA g/L	YAN	YAN	YAN
	5 " 1	450.4	100.0		47.0	10.1		0.40	0.04			40.0		(ppm)	(ppm)	(ppm)
LE	Portland	159.4	162.3		17.6	16.4		3.10	3.04		11.5	13.8		154	154	
_																
Cayu	ga White															
		9/25/23	9/18/23		9/25	9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Region	Description	Ber.Wt.g	Ber.Wt.	g Ber.Wt.g	% Brix	% Brix	% Brix	pН	pН	pН	TA g/L	TA g/L	TA g/L	YAN (ppm)	YAN (ppm)	YAN (ppm)
FL	Keuka	293.1	273.9	HARVEST	Г 17.8	16.4		3.01	2.96		9.3	10.5		99	100	(- /
FL		HARVEST		HARVES1		17.1			3.15			7.2			199	
FL		HARVEST	HARVES	т								7.2			89	
	ļi															
Chardenney																
Char	donnay															
		9/25/23	9/18/23	9/27/22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Region	Description	Ber.Wt.g	Ber.Wt.g	Ber.Wt.g	% Brix	% Brix	% Brix	рН	pН	pН	TA g/L	TA g/L	TA g/L	YAN (ppm)	YAN (ppm)	YAN (ppm)
FL	Cayuga	164.3	157.1	HARVEST	17.5	16.0		3.21	3.13		8.4	9.5		115	145	(PP)
FL	W. Seneca	155.7	178.6	HARVEST	17.9	17.4		3.11	3.10		9.3	7.7		138	160	
FL	Dresden	172.6	158.8	119.3	21.1	20.4	22.4	3.19	3.14	3.10	7.2	7.6	6.1	33	34	28
HV	Central HV	HARVEST				17.9			3.82			5.6			356	
LE	Portland	190.1	175.9		17.4	17.3		3.07	3.13		12.6	10.6		194	246	
LI	LI-03	180.9	149.0	172.7	18.0	17.9	20.1	3.50	3.41	3.51	8.1	8.3	6.3	253	277	211
LI	LI-12	158.6	157.9		20.3	19.8		3.46	3.41		6.3	6.7		212	271	
Conc	ord															
000		9/25/23	9/18/23	9/27/22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Region	Description			Ber.Wt.g	% Brix	% Brix	% Brix	pH	pН	pH	TA g/L	TA g/L	TA g/L	YAN	YAN	YAN
. tog.o	2000	20	20	20g	70 D.I.K	70 D.I.X	70 DIIX	p	p	p	.,,,,,,	9	.,, 9,-	(ppm)	(ppm)	(ppm)
FL	Keuka	341.9	324.2	278.6	15.7	14.6	15.3	3.25	3.18	3.33	5.8		3.5	83	94	72
FL	Canandaigua	343.4	356.1	311.8	16.9	15.9	17.0	3.18	3.12	3.32	6.6	9.4	3.8	153	152	76
LE	Portland	395.7	399.9	364.3	15.3	13.8	18.0	3.09	3.07	3.25	11.3	12.3	8.9	180	207	191
Front	enac															
		9/25/23	9/18/23	9/27/22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Region	Description	Ber.Wt.g	Ber.Wt.g	Ber.Wt.g	% Brix	% Brix	% Brix	рН	pН	pН	TA g/L	TA g/L	TA g/L	YAN	YAN	YAN
CV	N. Champlain		126.9			21.0			2 1 1			14.4		(ppm)	(ppm)	(ppm)
HV	Northeast HV		126.9	94.3	20.7	21.9 20.8	20.9	3.29	3.11 3.21	3.15	14.9	14.4 17.8	10.4	510	547	275
LE	Sheridan	120.1		94.3 HARVEST	17.6	18.3	20.5	2.99	3.21	0.10	20.3	20.1	10.4	259	194	213
	Ononuan	120.1	121.2		17.0	10.0		2.33	0.01		20.0	20.1		200	104	
C	ny No!-															
Gama	ay Noir	0/05/00	0/40/00	0/07/00	0/05	0/40	(20	0/05	0/40	100	0/05	0/40	(00	0/05	0/44	(22
De ete	December	9/25/23	9/18/23	9/27/22	9/25	9/18	'22 % Brite	9/25	9/18	'22	9/25	9/18	'22 TA =//	9/25	9/11	'22 VAN
Region	Description	Ber.Wt.g	Ber.Wt.g	Ber.Wt.g	% Brix	% Brix	% Brix	рН	pН	pН	TA g/L	TA g/L	TA g/L	YAN (ppm)	YAN (ppm)	YAN (ppm)
		198.9	197.1		18.0	17.8		3.67	3.63		5.7	6.4		301	289	

Gowi	irztramine															
Gewi			9/18/23	9/27/22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Region	Description	Ber.Wt.g	Ber.Wt.g	Ber.Wt.g	% Brix	% Brix	% Brix	рН	рН	рН	TA g/L	TA g/L	TA g/L	YAN (ppm)	YAN (ppm)	YAN (ppm)
LE	Portland	161.0	169.8		18.2	16.7		3.30	3.27		7.5	8.4		178	238	(PPIII)
Itasca	3	0/05/00	0/40/00	0.107.100	0/05	0/40	(00	0/05	0/40	'00	0/05	040	'00	0/05	0/44	'00
Region	Description	9/25/23 Ber.Wt.a	9/18/23 Ber.Wt.	9/27/22 Ber.Wt.g	9/25 % Brix	9/18 % Brix	'22 % Brix	9/25 pH	9/18 pH	'22 pH	9/25 TA g/L	9/18 TA g/L	'22 TA g/L	9/25 YAN	9/11 YAN	ʻ22 YAN
			g								<u> </u>			(ppm)	(ppm)	(ppm)
HV	Capital District	HARVESI	149.6			20.2			3.21			13.5			344	
La Cr	escent															
		9/25/23	9/18/23	9/27/22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Region	Description	Ber.Wt.g	Ber.Wt.	Ber.Wt.g	% Brix	% Brix	% Brix	рН	рН	рН	TA g/L	TA g/L	TA g/L	YAN (ppm)	YAN (ppm)	YAN (ppm)
CV	N. Champlain		161.8			16.8			3.16			11.5				
	Capital District Northwest HV			HARVEST		20.5 21.5			3.13 2.84			15.0 13.7			266 50	
110	Northwestriv	TIAKVEST	130.0	TIAITVLST		21.5			2.04			13.7			30	
Lemb	erger															
			9/18/23		9/25	9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Region	Description	Ber.Wt.g	Ber.Wt.	Ber.Wt.g	% Brix	% Brix	% Brix	рН	рН	pН	TA g/L	TA g/L	TA g/L	YAN (ppm)	YAN (ppm)	YAN (ppm)
FL	Dresden	213.9		HARVEST	21.2	20.6		3.13	3.09		7.3			67	73	
FL LE	Wayne County Portland	/ 228.0 194.0	204.2 186.1	245.6	19.1 18	17.4 15.8	19.1	3.14 3.18	3.10 3.12	3.09	9.1 8.9	11.4 10.7	8.0	184 160	178 186	144
	Niagara Count		201.2		18.7	18.0		3.15	3.14		10.0	10.5		281	175	
Louise Swenson																
		9/25/2		23 9/27/22		9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Regio	n Description	n Ber.Wt	.g Ber.W	/t.g Ber.Wt g	. % Brix	% Brix	% Brix	pН	рН	pH	TA g/L	TA g/L	TA g/L	YAN (ppm)	YAN (ppm)	YAN (ppm)
HV	Capital Distri	ct HARVE	ST 349.	0		40.0										
	Gapital Biotil	OL I I I A I V L	31 349.	.9		18.3			3.38			7.0			170	
		ot price	31 349.	.9		18.3			3.38			7.0			170	
Malk				Ξ	0/25		(22	0/25		122	0/25		(22	0/25		122
Malk		9/25/23	9/18/23	9/27/22	9/25 % Brix	9/18	'22 % Brix	9/25 pH	9/18	'22 pH	9/25 TA g/L	9/18	'22 TA q/L	9/25 YAN	9/11 YAN	'22 YAN
Malk Region	Dec n Description	9/25/23 Ber.Wt.g	9/18/23 Ber.Wt.	9/27/22 g Ber.Wt.g	% Brix	9/18 % Brix	% Brix	рН	9/18 pH	рН	TA g/L	9/18 TA g/L	TA g/L	YAN (ppm)	9/11 YAN (ppm)	YAN (ppm)
Malk	pec	9/25/23 Ber.Wt.g	9/18/23	9/27/22		9/18			9/18			9/18		YAN	9/11 YAN	YAN
Malk Region	Dec Description	9/25/23 Ber.Wt.g 244.3	9/18/23 Ber.Wt.	9/27/22 g Ber.Wt.g	% Brix	9/18 % Brix	% Brix	рН	9/18 pH	рН	TA g/L	9/18 TA g/L	TA g/L	YAN (ppm)	9/11 YAN (ppm)	YAN (ppm)
Malk Region	Dec n Description	9/25/23 Ber.Wt.g 244.3	9/18/23 Ber.Wt.	9/27/22 g Ber.Wt.g	% Brix	9/18 % Brix	% Brix	рН	9/18 pH	рН	TA g/L	9/18 TA g/L	TA g/L	YAN (ppm)	9/11 YAN (ppm)	YAN (ppm)
Region Li Mare	Dec Description	9/25/23 Ber.Wt.g 244.3	9/18/23 Ber.Wt.s 223.5 3 9/18/2 g Ber.W	9/27/22 g Ber.Wt.g 258.2	% Brix 18.7 9/25	9/18 % Brix 18.0	% Brix 22.3	pH 3.55	9/18 pH 3.45	pH 3.58	TA g/L 7.1	9/18 TA g/L 7.7	TA g/L 5.0	YAN (ppm) 251 9/25 YAN	9/11 YAN (ppm) 139 9/11 YAN	YAN (ppm) 97 22 YAN
Region Li Mare	Description Long Island	9/25/23 Ber.Wt.g 244.3 9/25/23 Ber.Wt.	9/18/23 Ber.Wt.ş 223.5 3 9/18/2 g Ber.Wg	9/27/22 g Ber.Wt.g 258.2 3 9/27/22 /t Ber.Wt.g	% Brix 18.7 9/25	9/18 % Brix 18.0	% Brix 22.3	pH 3.55	9/18 pH 3.45	pH 3.58	TA g/L 7.1 9/25	9/18 TA g/L 7.7	TA g/L 5.0	YAN (ppm) 251	9/11 YAN (ppm) 139	YAN (ppm) 97
Region LI Mare	Description Long Island echal Foch	9/25/23 Ber.Wt.g 244.3 9/25/23 Ber.Wt.	9/18/23 Ber.Wt.ş 223.5 3 9/18/2 g Ber.Wg	9/27/22 g Ber.Wt.g 258.2 3 9/27/22 /t Ber.Wt.g	% Brix 18.7 9/25	9/18 % Brix 18.0 9/18 % Brix	% Brix 22.3 '22 % Brix	pH 3.55	9/18 pH 3.45 9/18 pH	pH 3.58 '22 pH	TA g/L 7.1 9/25	9/18 TA g/L 7.7 9/18 TA g/L	5.0 '22 TA g/L	YAN (ppm) 251 9/25 YAN	9/11 YAN (ppm) 139 9/11 YAN (ppm)	YAN (ppm) 97 '22 YAN (ppm)
Malk Region LI Mare Region	Description Long Island echal Foch	9/25/23 Ber.Wt.g 244.3 9/25/23 Ber.Wt.	9/18/23 Ber.Wt.ş 223.5 3 9/18/2 g Ber.Wg	9/27/22 g Ber.Wt.g 258.2 3 9/27/22 /t Ber.Wt.g	% Brix 18.7 9/25	9/18 % Brix 18.0 9/18 % Brix	% Brix 22.3 '22 % Brix	pH 3.55	9/18 pH 3.45 9/18 pH	pH 3.58 '22 pH	TA g/L 7.1 9/25	9/18 TA g/L 7.7 9/18 TA g/L	5.0 '22 TA g/L	YAN (ppm) 251 9/25 YAN	9/11 YAN (ppm) 139 9/11 YAN (ppm)	YAN (ppm) 97 '22 YAN (ppm)
Malk Region LI Mare Region HV	Description Long Island Cochal Foch Description Northeast HV	9/25/23 Ber.Wt.g 244.3 9/25/23 Ber.Wt.	9/18/23 Ber.Wt.s 223.5 3 9/18/2 GB Ber.W .g 3 175.0	9/27/22 g Ber.Wt.g 258.2 258.2 3 9/27/22 ft Ber.Wt.g 114.7	% Brix 18.7 9/25 % Brix	9/18 % Brix 18.0 9/18 % Brix 19.8	% Brix 22.3 '22 % Brix 22.2	9/25 pH	9/18 pH 3.45 9/18 pH 3.25	pH 3.58 '22 pH 3.38	TA g/L 7.1 9/25 TA g/L	9/18 TA g/L 7.7 9/18 TA g/L 11.4	TA g/L 5.0 '22 TA g/L 8.1	YAN (ppm) 251 9/25 YAN (ppm)	9/11 YAN (ppm) 139 9/11 YAN (ppm) 160	YAN (ppm) 97 97 '22 YAN (ppm) 71 '22
Malk Region LI Mare Region HV	Description Long Island echal Foch Description Northeast HV	9/25/23 Ber.Wt.g 244.3 9/25/23 Ber.Wt.	9/18/23 Ber.Wt.s 223.5 3 9/18/2 GB Ber.W .g 3 175.0	9/27/22 g Ber.Wt.g 258.2 258.2 3 9/27/22 ft Ber.Wt.g 114.7	% Brix 18.7 9/25 % Brix	9/18 % Brix 18.0 9/18 % Brix 19.8	% Brix 22.3 '22 % Brix 22.2	рН 3.55 9/25 рН	9/18 pH 3.45 9/18 pH 3.25	pH 3.58 '22 pH 3.38	7.1 7.1 9/25 TA g/L	9/18 TA g/L 7.7 9/18 TA g/L	TA g/L 5.0 '22 TA g/L 8.1	YAN (ppm) 251 9/25 YAN (ppm)	9/11 YAN (ppm) 139 9/11 YAN (ppm) 160	YAN (ppm) 97
Malk Region LI Mare Region HV Mare Region CV	Description Long Island Cechal Foch Description Northeast H	9/25/23 Ber.Wt.g 244.3 9/25/23 Ber.Wt. / HARVES	9/18/23 Ber.Wt.s 223.5 3 9/18/2 g Ber.W .g 5T 175.0 3 9/18, Ber.V	9/27/22 g Ber.Wt.g 258.2 258.2 3 9/27/22 /ft Ber.Wt.g 0 114.7 //23 9/27/ Wt.g Ber.V	% Brix 18.7 9/25 % Brix //22 9/25 Vt.g % Brix	9/18 % Brix 18.0 9/18 % Brix 19.8	% Brix 22.3 '22 % Brix 22.2	9/25 pH	9/18 pH 3.45 9/18 pH 3.25	pH 3.58 '22 pH 3.38	TA g/L 7.1 9/25 TA g/L	9/18 TA g/L 7.7 9/18 TA g/L 11.4 9/18 TA g/L	TA g/L 5.0 '22 TA g/L 8.1	YAN (ppm) 251 9/25 YAN (ppm) 9/25 YAN (ppm)	9/11 YAN (ppm) 139 9/11 YAN (ppm) 160	YAN (ppm) 97 97 '22 YAN (ppm) 71 '22 YAN
Mark Region HV Mark Region CV FL	Description Long Island Cechal Foch Description Northeast HV Quette Description N. Champlain Dresden	9/25/23 Ber.Wt.g 244.3 9/25/23 Ber.Wt. / HARVES 9/25/23 Ber.Wt.	9/18/23 Ber.Wt.s 223.5 3 9/18/2 g Ber.Wg 175.0 3 9/18 3 Ber.V 159 6T HARV	9/27/22 g Ber.Wt.g 258.2 258.2 3 9/27/22 /ft Ber.Wt.g 0 114.7 //23 9/27/ Wt.g Ber.V	% Brix 18.7 9/25 % Brix //22 9/25 Vt.g % Brix	9/18 % Brix 18.0 9/18 % Brix 19.8	% Brix 22.3 '22 % Brix 22.2	9/25 pH	9/18 pH 3.45 9/18 pH 3.25	pH 3.58 '22 pH 3.38	TA g/L 7.1 9/25 TA g/L	9/18 TA g/L 7.7 9/18 TA g/L 11.4 9/18 TA g/L 13.5 12.0	TA g/L 5.0 '22 TA g/L 8.1	YAN (ppm) 251 9/25 YAN (ppm) 9/25 YAN (ppm)	9/11 YAN (ppm) 139 9/11 YAN (ppm) 160	YAN (ppm) 97 97 '22 YAN (ppm) 71 '22 YAN
Malk Region LI Mare Region HV Mare Region CV	Description Long Island Cechal Foch Description Northeast H	9/25/23 Ber.Wt.g 244.3 9/25/23 Ber.Wt. / HARVES Ber.Wt. HARVES HARVES	9/18/23 Ber.Wt.s 223.5 3 9/18/2 g Ber.W .g T 175.0 3 9/18 Ber.W 159 ST HARV	9/27/22 g Ber.Wt.g 258.2 258.2 3 9/27/22 /ft Ber.Wt.g 0 114.7 //23 9/27/ Wt.g Ber.V	% Brix 18.7 9/25 % Brix //22 //22 //22 //23 //25 % Brix EST EST	9/18 % Brix 18.0 9/18 % Brix 19.8	% Brix 22.3 '22 % Brix 22.2	9/25 pH	9/18 pH 3.45 9/18 pH 3.25	pH 3.58 '22 pH 3.38	TA g/L 7.1 9/25 TA g/L	9/18 TA g/L 7.7 9/18 TA g/L 11.4 9/18 TA g/L	TA g/L 5.0 '22 TA g/L 8.1	YAN (ppm) 251 9/25 YAN (ppm) 9/25 YAN (ppm)	9/11 YAN (ppm) 139 9/11 YAN (ppm) 160	YAN (ppm) 97 97 '22 YAN (ppm) 71 '22 YAN
Malk Region LI Mare Region HV CV FL FL	Description Long Island Cechal Foch Description Northeast HV Quette Description N. Champlain Dresden Keuka	9/25/23 Ber.Wt.9 244.3 9/25/23 Ber.Wt. / HARVES HARVES HARVES / HARVES	9/18/23 Ber.Wt.s 223.5 3 9/18/2 g Ber.W .g T 175.0 3 9/18 Ber.W 159 ST HARV ST HARV	9/27/22 g Ber.Wt.g 258.2 258.2 3 9/27/22 ft Ber.Wt.g 114.7 114.7 Vt.g Ber.V 1.4 (EST HARV (EST HARV (EST HARV	% Brix 18.7 9/25 % Brix //22 //22 //22 //25 % Brix EST EST EST EST	9/18 % Brix 18.0 9/18 % Brix 19.8	% Brix 22.3 '22 % Brix 22.2	9/25 pH	9/18 pH 3.45 9/18 pH 3.25	pH 3.58 '22 pH 3.38	TA g/L 7.1 9/25 TA g/L	9/18 TA g/L 7.7 9/18 TA g/L 11.4 9/18 TA g/L 13.5 12.0	TA g/L 5.0 '22 TA g/L 8.1	YAN (ppm) 251 9/25 YAN (ppm) 9/25 YAN (ppm)	9/11 YAN (ppm) 139 9/11 YAN (ppm) 160 9/11 YAN (ppm)	YAN (ppm) 97 97 '22 YAN (ppm) 71 '22 YAN
Region HV Marc Region CV FL HV HV LE	Description Long Island Description Northeast HV Quette N. Champlain Dresden Keuka Northeast HV Northwest HV Portland	9/25/23 Ber.Wt.9 244.3 9/25/23 Ber.Wt. / HARVES HARVES HARVES / HARVES	9/18/23 Ber.Wt.e 223.5 3 9/18/2 g Ber.W .g ST 175.0 159 ST HARV ST HARV ST HARV ST HARV ST HARV	9/27/22 g Ber.Wt.g 258.2 258.2 3 9/27/22 ft Ber.Wt.g 114.7 114.7 Vt.g Ber.V 1.4 (EST HARV (EST HARV (EST HARV	% Brix 18.7 9/25 % Brix 722 9/25 Vt.g % Brix EST EST EST EST EST	9/18 % Brix 18.0 9/18 % Brix 19.8 9/18 % Brix	% Brix 22.3 '22 % Brix 22.2	9/25 pH	9/18 pH 3.45 9/18 pH 3.25 9/18 pH 3.13	pH 3.58 '22 pH 3.38	TA g/L 7.1 9/25 TA g/L	9/18 TA g/L 7.7 9/18 TA g/L 11.4 9/18 TA g/L 13.5 12.0 11.4	TA g/L 5.0 '22 TA g/L 8.1	YAN (ppm) 251 9/25 YAN (ppm) 9/25 YAN (ppm)	9/11 YAN (ppm) 139 9/11 YAN (ppm) 160 9/11 YAN (ppm) 200 436	YAN (ppm) 97 97 '22 YAN (ppm) 71 '22 YAN
Region HV Marc Region CV FL HV HV	Description Long Island Description Northeast HV Quette N. Champlain Dresden Keuka Northeast HV Northwest HV Portland	9/25/23 Ber.Wt.9 244.3 9/25/23 Ber.Wt. / HARVES HARVES HARVES HARVES HARVES	9/18/23 Ber.Wt. 223.5 3 9/18/2 g Ber.Wg T175.0 3 9/18.8 g Ber.V 159 ST HARV ST HARV ST HARV	9/27/22 g Ber.Wt.g 258.2 3 9/27/22 /t Ber.Wt.g 114.7 14.7 14.7 14.7 16.8 16.8 16.8 16.8 16.8 16.8 16.8 16.8	% Brix 18.7 9/25 % Brix 22 9/25 Wt.g % Brix EST EST EST EST EST	9/18 % Brix 18.0 9/18 % Brix 19.8 9/18 % Brix 18.5	% Brix 22.3 '22 % Brix 22.2 '22 % Brix	9/25 pH 9/25 pH	9/18 pH 3.45 9/18 pH 3.25 9/18 pH 3.13	9H 3.58 '22 pH 3.38 '22 pH	7.1 9/25 TA g/L 9/25 TA g/L	9/18 TA g/L 7.7 9/18 TA g/L 11.4 9/18 TA g/L 13.5 12.0 11.4 16.0	7A g/L 5.0 '22 TA g/L 8.1 '22 TA g/L	YAN (ppm) 251 9/25 YAN (ppm) 9/25 YAN (ppm)	9/11 YAN (ppm) 139 9/11 YAN (ppm) 160 9/11 YAN (ppm) 200 436 187 378	YAN (ppm) 97 97 '22 YAN (ppm) 71 '22 YAN (ppm)
Region LI Mare Region HV Mare CV FL FL HV HV LE Meri	Description Long Island Chal Foch Description Northeast HV Quette N. Champlaii Dresden Keuka Northeast HV Northwest HV Portland ot	9/25/23 Ber.Wt.9 244.3 9/25/23 Ber.Wt. / HARVES HARVES HARVES HARVES HARVES HARVES 9/25/23	9/18/23 Ber.Wt. 223.5 3 9/18/2 9 Ber.W. 9 BT 175.0 159 BT HARV 173 BT HARV 173 BT HARV 3 9/18/2	9/27/22 g Ber.Wt.g 258.2 3 9/27/22 /t Ber.Wt.g 0 114.7 114.7 123 9/27/ Wt.g Ber.V 1.4 125T HARV 126ST HARV 126	% Brix 18.7 9/25 % Brix 22 9/25 Wt.g % Brix EST EST EST EST 9/25	9/18 % Brix 18.0 9/18 % Brix 19.8 9/18 % Brix 18.5	% Brix 22.3 '22 % Brix 22.2 '22 % Brix	9/25 pH	9/18 pH 3.45 9/18 pH 3.25 9/18 pH 3.13	9H 3.58 '22 pH 3.38 '22 pH	7.1 9/25 TA g/L 9/25 TA g/L 9/25	9/18 TA g/L 7.7 9/18 TA g/L 11.4 9/18 TA g/L 13.5 12.0 11.4 16.0	TA g/L 5.0 '22 TA g/L 8.1 '22 TA g/L	YAN (ppm) 251 9/25 YAN (ppm) 9/25 YAN (ppm)	9/11 YAN (ppm) 139 9/11 YAN (ppm) 160 9/11 YAN (ppm) 200 436 187 378	YAN (ppm) 97 97 '22 YAN (ppm) 71 '22 YAN (ppm) 71 '22 YAN (ppm)
Region LI Mare Region HV Mare Region CV FL HV HV LE Meri	Description Long Island Chal Foch Description Northeast HV Quette N. Champlain Dresden Keuka Northeast HV Northwest HV Portland ot	9/25/23 Ber.Wt.9 244.3 9/25/23 Ber.Wt. / HARVES	9/18/23 Ber.Wt.e 223.5 3 9/18/2 g Ber.W .g ST 175.0 159 ST HARV	9/27/22 g Ber.Wt.g 258.2 3 9/27/22 /t Ber.Wt.g 114.7 114.7 123 9/27/ Wt.g Ber.Vt.g 4.4 (EST HARV (EST	% Brix 18.7 9/25 % Brix 722 9/25 % Brix EST EST EST EST EST 9/25 % Brix	9/18 % Brix 18.0 9/18 % Brix 19.8 9/18 % Brix 22.1	% Brix 22.3 '22 % Brix 22.2 '22 % Brix '22 % Brix	9/25 pH 9/25 pH 9/25 pH	9/18 pH 3.45 9/18 pH 3.25 9/18 pH 3.13	9H 3.58 '22 pH 3.38 '22 pH	7.1 9/25 TA g/L 9/25 TA g/L 9/25 TA g/L	9/18 TA g/L 7.7 9/18 TA g/L 11.4 9/18 TA g/L 13.5 12.0 11.4 16.0 9/18 TA g/L	'22 TA g/L 8.1 '22 TA g/L	YAN (ppm) 251 9/25 YAN (ppm) 9/25 YAN (ppm)	9/11 YAN (ppm) 139 9/11 YAN (ppm) 160 9/11 YAN (ppm) 200 436 187 378 9/11 YAN (ppm)	YAN (ppm) 97 '22 YAN (ppm) 71 '22 YAN (ppm) '22 YAN (ppm) '22 YAN (ppm) '22 YAN (ppm) '23 YAN (ppm) '24 YAN (ppm) '25 YAN (ppm) '26 YAN (ppm) '27 YAN (ppm) '28 YAN (ppm) '29 YAN (ppm) '20 YAN (ppm) '21 YAN (ppm) '22 YAN (ppm) '22 YAN (ppm) '23 YAN (ppm) '24 YAN (ppm) '25 YAN (ppm) '26 YAN (ppm) '27 YAN (ppm) '28 YAN (ppm) '29 YAN (ppm) '21 YAN (ppm) '22 YAN (ppm) '24 YAN (ppm) '25 YAN (ppm) '25 YAN (ppm) '26 YAN (ppm) '27 YAN (ppm) '28 YAN (ppm) '29 YAN (ppm) '20 YAN (p
Region LI Mare Region HV Mare CV FL FL HV HV LE Meri	Description Long Island Chal Foch Description Northeast HV Quette N. Champlaii Dresden Keuka Northeast HV Northwest HV Portland ot	9/25/23 Ber.Wt.9 244.3 9/25/23 Ber.Wt. / HARVES HARVES HARVES HARVES HARVES HARVES 9/25/23	9/18/23 Ber.Wt. 223.5 3 9/18/2 g Ber.W .g 6T 175.0 3 9/18.8 g Ber.V 159 6T HARV	9/27/22 g Ber.Wt.g 258.2 3 9/27/22 ft Ber.Wt.g 3 9/27/22 Mt.g Ber.Vt.g 6.4 (EST HARV	% Brix 18.7 9/25 % Brix 22 9/25 Wt.g % Brix EST EST EST EST 9/25	9/18 % Brix 18.0 9/18 % Brix 19.8 9/18 % Brix 18.5	% Brix 22.3 '22 % Brix 22.2 '22 % Brix	9/25 pH	9/18 pH 3.45 9/18 pH 3.25 9/18 pH 3.13	9H 3.58 '22 pH 3.38 '22 pH	7.1 9/25 TA g/L 9/25 TA g/L 9/25	9/18 TA g/L 7.7 9/18 TA g/L 11.4 9/18 TA g/L 13.5 12.0 11.4 16.0	TA g/L 5.0 '22 TA g/L 8.1 '22 TA g/L	YAN (ppm) 251 9/25 YAN (ppm) 9/25 YAN (ppm)	9/11 YAN (ppm) 139 9/11 YAN (ppm) 160 9/11 YAN (ppm) 200 436 187 378 9/11 YAN	YAN (ppm) 97 '22 YAN (ppm) 71 '22 YAN (ppm) 71 '22 YAN (ppm) '22 YAN (ppm) '22 YAN (ppm) '22 YAN (ppm) '23 YAN (ppm) '24 YAN (ppm) '25 YAN (ppm) '26 YAN (ppm) '27 YAN (ppm) '28 YAN (ppm) '29 YAN (ppm) '20 YAN (ppm) '20 YAN (ppm) '21 YAN (ppm) '22 YAN (ppm) '22 YAN (ppm) '23 YAN (ppm) '24 YAN (ppm) '25 YAN (ppm) '25 YAN (ppm) '26 YAN (ppm) '27 YAN (ppm) '28 YAN (ppm) '29 YAN (ppm) '29 YAN (ppm) '20 YAN

Niaga	ara															
			9/18/23	9/27/22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Region	Description	Ber.Wt.g	Ber.Wt.g	Ber.Wt.g	% Brix	% Brix	% Brix	рН	pН	pH	TA g/L	TA g/L	TA g/L	YAN (ppm)	YAN (ppm)	YAN (ppm)
LE	Portland	446.4	422.8	HARVEST	13.9	13.1		3.22	3.10		7.5	9.3		168	116	
Pinot	t Noir															
		9/25/23	9/18/2			9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Region	Description	Ber.Wt.g	Ber.Wt	t.g Ber.Wt.g	y % Brix	% Brix	% Brix	pН	pH	pH	TA g/L	TA g/L	TA g/L	YAN (ppm)	YAN (ppm)	YAN (ppm)
FL	W. Cayuga	166.1	166.9	HARVES		19.0		3.39	3.28		6.4	8.3		170	170	Wil
FL	E. Seneca	157.7	158.2	HARVES	T 17.0	16.6		3.21	3.15		8.5			86	69	
FL	Ontario	165.1	187.4		T 17.1	17.6		3.25	3.22		8.6	9.8		209	166	
HV	Central HV	HARVEST	T HARVE	ST												
Riesl	ing	0/05/00	0/40/00	0.107.100	0/05	0/40		0/05	040	'00	0/05	0/40	'00	0/05	0/44	100
Region	Description		9/18/23 Bor Wt	9/27/22 Ber.Wt.g	9/25 % Brix	9/18 % Brix	'22 % Brix	9/25 pH	9/18 pH	'22 pH	9/25 TA g/L	9/18 TA g/L	'22 TA g/L	9/25 YAN	9/11 YAN	ʻ22 YAN
rtegion	Description	Der.wa.g	g	Der. Wilg	, DIIX	/0 DITA	/0 DITX	рп	рп	рп	TA 9/L	TA 9/L	TA 9/L	(ppm)	(ppm)	(ppm)
FL	Keuka	150.2	157.3	125.0	16.9	16.0	18.7	2.93	2.93	2.89	11.4	12.7	10.4	65	84	39
FL	W. Seneca	135.2	166.5	143.2	16.6	15.6	20.3	2.89	2.91	2.91	12.1	10.8	9.2	59	118	20
FL FL	E. Seneca CL 90 Cayug	170.0 a 147.1	160.7 151.8	112.2 106.4	17.5 16.7	16.9 16.5	18.9 16.3	2.97 2.94	2.99 2.90	2.94 2.87	10.5 10.1	11.3 8.9	8.9 10.1	85 49	84 63	53 76
FL	W.	157 0	sprayed	146.1	16.2	10.5	16.5	2.88	2.30	2.81	12.5	7.4	10.7	124	137	85
FL	Canandaigua Dresden	153.7	143.3	132.3	19.2	18.3	18.1	2.99	2.99	2.79	9.1	8.2	9.6	34	39	14
FL	Wayne Count		140.2	164.6	16.9	15.9	18.4	3.00	2.99	3.05	10.3	9.2	8.0	162	167	138
HV	Central Hudso	*	147.2		17.3	17.1		3.53	3.49		5.1	5.9		156	167	
LE	Portland	171.7	170.5	190.7	14.0	13.2	17.4	3.12	3.06	3.10	11.0	13.0	9.2	268	221	138
Sauv	ignon Bla	9/25/23		9/27/22 Ber.Wt.g	9/25 % Brix	9/18 % Brix	'22 % Brix	9/25 pH	9/18 pH	'22 pH	9/25 TA g/L	9/18 TA g/L	'22 TA g/L	9/25 YAN (ppm)	9/11 YAN (ppm)	ʻ22 YAN (ppm)
LI	Long Island	HARVEST	140.6			21.7			3.53			5.3			230	
NI	Niagara	187.9	176.4		19.8	17.8		3.12	3.05		7.1	7.6		125	67	
•	. 51															
Seyv	al Blanc	9/25/23	9/18/23	9/27/22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Region	Description				9/25 % Brix	% Brix	% Brix	pH	pH	pH	TA g/L	TA g/L	TA g/L	YAN	YAN	YAN
								-		•				(ppm)	(ppm)	(ppm)
LE	Portland	162.8	164.6	HARVEST	16.6	16.5		2.96	2.95		8.9	9.8		84	73	
Siegf	fried															
Ū		9/25/23	9/18/23	9/27/22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Region	Description	Ber.Wt.g	Ber.Wt.g	Ber.Wt.g	% Brix	% Brix	% Brix	рН	pН	pН	TA g/L	TA g/L	TA g/L	YAN	YAN	YAN
NI	Niagara	112.7	110.7		14.5	13.4		2.88	2.84		13.1	15.3		(ppm) 147	(ppm) 80	(ppm)
St. C	roix															
			9/18/23		9/25	9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Region	Description	Ber.Wt.g	Ber.Wt.	Ber.Wt.g	% Brix	% Brix	% Brix	рН	pН	pH	TA g/L	TA g/L	TA g/L	YAN (ppm)	YAN (ppm)	YAN (ppm)
														(PP)	(PP:)	(Pp)
HV Capital District HARVEST 213.7 15.8 3.20 13.9 201										201						
HV	Capital Distric	HARVEST				15.8			3.20			13.9			201	
	Capital Distric	t HARVEST				15.8			3.20			13.9			201	
		HARVEST	213.7	9/27/22	9/25	15.8 9/18	'22	9/25	3.20 9/18	'22	9/25	9/18	'22	9/25	9/11	'22
	inette	9/25/23	9/18/23		9/25 % Brix		'22 % Brix	9/25 pH		'22 pH	9/25 TA g/L		'22 TA g/L	YAN	9/11 YAN	YAN
Tram	inette	9/25/23	9/18/23			9/18			9/18			9/18			9/11	

Vidal Blanc

		9/25/23	9/18/23	9/27/22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22
Region	Description	Ber.Wt.g	Ber.Wt.g	Ber.Wt.g	% Brix	% Brix	% Brix	рН	рН	pН	TA g/L	TA g/L	TA g/L	YAN	YAN	YAN
														(ppm)	(ppm)	(ppm)
NI	Niagara	201.4	198.4		15.9	14.1		2.99	2.96		10.5	11.6		170	207	

Vignoles

Boldly

		9/25/23	9/18/23	9/27/22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/18	'22	9/25	9/11	'22	ı
Region	Description	Ber.Wt.g	Ber.Wt.g	Ber.Wt.g	% Brix	% Brix	% Brix	рН	рН	рН	TA g/L	TA g/L	TA g/L	YAN (ppm)	YAN (ppm)	YAN (ppm)	
FL	Keuka	HARVEST	165.4			20.3	-	_	2.89	-		16.5		(P)	132	(- /	
LE	Portland	HARVEST	HARVEST	HARVEST											380		



Frontenac Gris shortly after inoculation ${\it I}$

Photo by Chris Gerling

is a joint publication of:

Cornell Enology Extension Program

Long Island Grape Program - Suffolk CCE

Finger Lakes Grape Program

Lake Erie Regional Grape Program

<u>Eastern NY Commercial Horticulture Program</u>



New York State Agricultural Experiment Station

The information, including any advice or recommendations, contained herein is based upon the research and experience of Cornell Cooperative Extension personnel. While this information constitutes the best judgement/opinion of such personnel at the time issued, neither Cornell Cooperative Extension nor any representative thereof makes any representation or warrantee, express or implied, of any particular result or application of such information, or regarding any product. Users of any product are encouraged to read and follow product-labeling instructions and check with the manufacturer or supplier for updated information. Nothing contained in this information should be interpreted as an endorsement expressed or implied of any particular product.