NE2220 Meeting November 9, 2023 Traverse City, MI

Attendees:

Terence Bradshaw (VT), Paul Read (NE), Jason Londo (NY), Harlene Hatterman-Valenti (ND), Anne Fennell (SD), Soon-Li Teh (KS), Amy Birk (MI), Derrick Vogel (industry), Patrick Murat (MT), Dennis Philips (industry), Michael Reinke (MI), Matt Clark (MN), Aude Watrelot (IA), Esmaeil Nasrollahiazar (MI), Tony Jacobson (MI industry),Virtual attendees: Scott Kohl (KS), Candice Fitch-Deitz (KS), Nicole Clark (KS), Andrej Svyantek

Not Present:

CO, MD, MA

Minutes taken by Aude Watrelot

State Reports:

IA (Aude):

* General update on 2023 seasons
* Japanese beetle challenge
* Cultivar planting trial
* Trellis system trial
* Enology: cultivar comparison, foliar sprays using ProCa and Phenylalanine; extended maceration project

KS (Candice):

* KS vineyard established in 2020, 3rd year vines
* Verona 2nd year vines, new plantings => no fruit yet
* 5ft HW with Vignoles on VSP; varieties on market and some tablegrapes for public education
* Research vineyard impacted by herbicide drift in 2022
* Frontenac blanc and gris to evaluate viability in KS and industry
* Traminette: production vines, to be replaced by Petite Pearl and Crimson Pearl
* Clarion: 24 cuttings, 10 survived
* Japanese beetle and drought challenges required irrigation and spraying
* No disease issues. Fungal control sprays used.
* Evaluating herbicide drift impact on vine survival

ND (Harlene):

* Vines in nursery rows
* Clarion received with issues
* Frontenac blanc and gris to see if viable in KS and industry

MN (Matt):

* Vines in nursery rows
* Clarion received with issues

MI (Michael Reinke):

* Focus on pest/disease management, autonomous sprayers (drones, intelligent sprayers)
* Working on sub-AVA designation (zone 3)
* Research projects: cold hardiness, canopy management, leaf removal for quality (USDA grant)
* Educational events: Orchard & Vineyard Show, Hort Days, Viticulture Field Day, Dirt to Glass conference

MI (Esmaeil Nasrollahiazar):

* Conducted a survey among industry members to identify educational, extension needs, and research focus.
* Proposed the development of an app to enhance accessibility to scouting reports.
* Introduced "Grapesense," an app aimed at providing reliable information for grape growers.
* Emphasized the app's features, including articles, podcasts, webinars, and a chat for information sharing.
* The app is currently free, with a potential future option for article access through purchase.
* Shared insights into the expression of genes related to anthocyanin biosynthesis, highlighting the use of ethanol at veraison to enhance UFCT gene expression.
* Discussed a project evaluating the efficacy of robotic laser bird control to reduce bird damage, with a focus on Chardonnay experiencing the most damage.
* Introduced the Cold Hardiness Project, featuring DTA plots created using 3D printing for precise temperature control.
* Announced a new project on sap analysis for vine nutrition, which will be offered to growers.
* Engaged in a discussion about sap analysis, exploring differences between leaves and considerations for data interpretation, particularly in relation to old versus young leaves.

MT (Andrej):

* Challenging climate extremes: spring frosts, winter damage, lack of water infrastructure
* 3 research vineyards established 2015-2022, evaluating cultivars
* Future plantings of Frontenac, etc.
* Trials of enzymes, skin contact, yeast strains, hyperoxidation in winemaking
* Developed FTIR wine analysis and fermentation monitoring methods

NE (Paul):

* ~35 wineries, some closures due to labor, retirement, death
* Multi-generational wineries persist
* Fruit drop trial did not improve wine quality in Norton
* High tunnel table grapes successful for 7 years, vinifera damaged by wind
* Itasca fruit drop study, resilience observed after herbicide drift
* Edelweiss, Petite Pearl popular and on high cordon or VSP
* Winter temps -30F to -14F east to west NE

NY (Jason):

* Retirements of key personnel, new hires, vineyard removals
* Planning Objective 1&2 trials for Spring 2024 planting
* Greenhouse study with VT

ND (Harlene):

* New research complex with sensory evaluation
* Macrobin sensory trials on 8 cultivars
* Two whites and two reds of interest
* Thoughts on Objective 2 cultivar selection

SD (Anne):

* 2.5 hrs south of ND, some Canadian fronts 18F recently
* Limited disease pressure
* New white evaluation planting with Itasca, ND cultivars, 3 MN seedless
* Rabbit issues
* Marquette trunk splitting if Fall rains
* Bird control trials of netting, lasers, bags

VT (Terence):

* Stable acreage, wineries. Largest grower expanding.
* Lake Champlain moderates cold to ~30F but vine damage occurs
* Historic flooding challenging
* Former NE1020 plantings used for disease assessment research
* Received Objective 1 cuttings for 2024 planting
* Objective 2 replicated trial planned with Brianna, Crimson Pearl, Foch, etc.
* No spray, conventional spray trials done 2017-2021. Yields compared.
* Natural wine, biofungicide trials and grower survey

MI Industry (Tony Jacobson):

* Focus on research and education
* 5th in wine production, diversity of hybrids and vinifera
* >10,000 acres, mostly small growers, some juice grape acres could convert
* Interest in new varieties for diversity and sustainability
* Cool climate varieties from Canada, Europe
* Consumer pressure for organic/natural but costs are high
* Metrics needed to define sustainability and organic
* Organic vs conventional tradeoffs
* Fair grape pricing a challenge

MI Industry (Amy Birk):

* Largest fruit region, 8600 acres total, juice grape acres declining
* 42" annual rainfall, winter lows around -10F
* Early budbreak moving earlier, harvest from August to October
* Cab Franc, Lemberger top wine grape varieties
* Many large juice grape vineyards remain
* Climate change challenges: early budbreak, drought, rain
* Clean nursery stock, new cultivars, soil health, rootstocks needed
* Increasing GDD documented since 1996

General Discussion:

* Consider involving more enologists in project
* Think about breeder's rights and how to best disseminate new varieties
* Phenology data format needs standardization for multistate data
* Enology data details: yeast, nutrients, etc.
* Objective 2 sites need coordination of planting years and cultivars
* Consumer perceptions of wine labels and organic/conventional tradeoffs