



FY 2020 HOP INDUSTRY ANNUAL REPORT

2020 A LOOK BACK



This report provides Hop Growers of America members a summary of what is being done on their behalf throughout the year. We hope this will provide insight on programs and activities that showcase the best that the American hop industry has to offer to brewers worldwide, as well as programs to benefit US growers and the companies who support them. Members are always welcome to attend HGA Board meetings and we are happy to answer questions about these programs at any time.

As with all facets of life in 2020, HGA's operations and programs experienced impacts from the global pandemic. The administrative team worked remotely much of the year and all travel and events were suspended from mid-March through the end of the year. For the first time in history we planned and executed a *virtual* American Hop Convention in January 2021. We've mastered the art of Zoom and other virtual meeting platforms. While the inability to meet in person certainly had its challenges, "the show must go on" and many of HGA's programs continued without missing a beat. The biggest impacts were experienced by the TEC (Trade Education & Communications) program as our two major trade shows were canceled due to COVID-19. However, all other activities were successfully executed in 2020 including two new seminars in the Brazilian market despite additional hurdles doing a live sensory event virtually.

TABLE of CONTENTS

Key Events of 2020.....	2
Infrastructure.....	3
Annual Convention.....	7
Value Added.....	8
International Markets....	11
Scientific, Technical & Regulatory Work.....	19

2020 KEY EVENTS



January 20-24

Annual HGA
Meeting & Convention
Portland, Oregon



March 9-13

HGA & HRC
Congressional Visits
Washington D.C.



March 30

IHGC
Virtual Meeting



May 26

IHGC
Virtual Meeting



July 6-10

USAEDC
Virtual Conference



August 12

IHGC
Virtual Meeting



November 3

TU Berlin
Virtual Seminar



November 4

Heriot-Watt
Virtual Seminar



November 9

IHGC
Virtual Meeting



November 17-20

USAEDC
Virtual Conference



December 1

Sao Paulo, Brazil
Virtual Trade Seminar



December 3

Porto Alegre, Brazil
Virtual Trade Seminar



December 9

Doemens Academy
Virtual Seminar



December 10

Weihenstephan
Virtual Seminar



December 16

Euro IPA Contest
Virtual Award
Ceremony

Infrastructure Executive Committee & Boards

The Yakima team operates three organizations and several related committees benefitting the US hop industry. This includes Hop Growers of America.

HGA's scope includes national and international issues impacting US hop growers. Governance is provided by the HGA Board.

The HGA Board held regular meetings in March, May, July, October, and January. The Annual Meeting was held during the American Hop Convention in January.

HGA's primary areas of responsibility include promotion and foreign market development, education, industry education and communications, statistics, sustainability and best practices, legislative and regulatory issue management, maintaining the USA Hops website, and representation of the US hop industry at the International Hop Growers Convention. HGA is also responsible for the annual American Hop Convention, working closely with host organizations when not the host itself.

Board alternates are involved in all board discussions, but only vote in the absence of their respective Director.

2020 BOARD of DIRECTORS

***Blake Crosby, President - OR**

***Oliver Schroeder, Vice President - ID**

***Jared Favilla, Secretary-Treasurer - WA**

Kyle Shinn - WA

Jason Perrault - WA

Trishia Gasseling - WA

Nathan Jackson - ID

David Henze - OR

Annette Wiles - NE

Brent Christensen - MI

2020 Board Alternates:

Jeff Perrault - WA

Brandon Davidson - OR

Diane Gooding - ID

Colbie Libsack - ID

Dan Wiesen - MI

*** Executive Committee**

Infrastructure HGA Staff



Ann George, Executive Director

Ann George has served as the Executive Director of the Washington Hop Commission and Hop Growers of Washington since 1987. She has also fulfilled this role for Hop Growers of America since 2007. During her 33 years of service to the hop industry she was instrumental in the formation of the US Hop Industry Plant Protection Committee and international regulatory harmonization program, HGA Best Practices Committee and Good Bines educational platform. In addition to general program and office oversight, budgeting and planning for these three organizations and their committees, Ann manages Science and Technical programs, political and regulatory efforts, and has secured numerous grants to expand the hop industry's resources. A graduate of Washington State University, Ann holds a Bachelor of Science degree in Animal Science.



Jessica Stevens, Accounting & Compliance

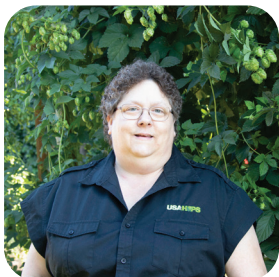
Jessica Stevens joined HGA with over 15 years of experience in compliance and accounting. Beginning her career in the US Navy, Jessica trained in compliance, payroll, travel and fiscal duties. Following this service, Jessica worked for Domex Superfresh Growers, the Washington State Department of Social & Health Services, and Yakima Valley College in a variety of capacities. Specializing in accounting, grant and contract management, and financial services, Jessica's specialized skills are unique to the HGA Team. Starting in January 2019, Jessica began managing HGA's finances and oversees finances for three organizations, all committees and programs: Washington Hop Commission, Hop Growers of America, Hop Growers of Washington, US Hop Industry Plant Protection Committee, HGA Best Practices Committee, and HGA TEC Program. Jessica also serves as the Washington Hop Commission's Contract Manager, Risk Manager and Records Officer. She holds a Bachelor of Arts Degree in Business Administration with a specialty in Accounting from Washington State University.

Infrastructure HGA Staff



Jaki Brophy, Communications & Marketing

Jaki Brophy joined the Washington Hop Commission, Hop Growers of America, and associated organizations in 2015. Focusing on the promotion of American-grown hops domestically and overseas through USDA's grant programs, Jaki also handles all press inquiries, works on special projects such as the website and other collaborative undertakings, while overseeing multiple domestic and overseas contractors, and working with HGA team members. With her first foray into promotions in 2003 and 10+ years post-grad experience, previous experience over the years has included product launches for a national brand; celebrity-focused events and donor thank you campaigns; a successful re-launch of a young professional's network in Chicago; an inter-corporation million-dollar safety campaign; the national launch of an independent musician; and a cross-country beer festival. She holds a Bachelor of Arts in Communication Studies, Public Relations from Eastern Illinois University.



Carol Camden, Accounting & Membership

Carol Camden has over 35 years of experience in Accounting. For 22 years, Carol has been the Accountant for the Washington Hop Commission, Hop Growers of Washington, and the US Hop Industry Plant Protection Committee. She also assists in various projects and events. Carol holds a Bachelor's degree in Accounting from Central Washington University.



Malissa Gatton, Special Projects & Events

Malissa joined the HGA team in December 2019 with over 5 years experience working within the local hop industry. Previous industry experience has included marketing and design/branding; communications; sales; event and project management. Malissa's fiancé is co-owner of Varietal Beer Co. in Sunnyside, Washington. Working at the brewery in her free-time, she enjoys everything from taking part in brew house production, to helping organize events, and hanging out in the beer garden practicing quality control. Malissa is a Fresh Hop Ale Festival board member, the Yakima Valley's annual post hop-harvest celebration and community fundraiser, and also a member of the Yakima chapter of the Pink Boots Society. She holds three technical degrees in Environmental Horticulture, Landscape Design, and Marketing & Graphic Design. She lives in Naches, Washington with her fiancé and four legged children.

Infrastructure Contractors

DOMESTIC

BRYANT CHRISTIE, INC. - US HOP INDUSTRY PLANT PROTECTION COMMITTEE

Bryant Christie works with the US Hop Industry Plant Protection Committee to manage the International Harmonization program, seeking harmonized Maximum Residue Levels in key customer countries, maintaining and expanding trade through regulatory channels, and allowing more pest management options for growers. Ann George oversees the Bryant Christie team, advised by USHIPPC members.

CALLANAN & CALLANAN CONSULTING - HOP GROWERS OF AMERICA

Hop Growers of America works with Callanan & Callanan Consulting to research and compose HGA's Country Progress Report (CPR), Quality Samples Program (QSP) Reports, and the Unified Export Strategy (UES) reports. These reports require considerable time, research, and are a requirement for receiving grant funds from USDA which funded 96% of all costs to the program for 2020. These funds vary year-to-year, but they consistently pay for over 70% of all program costs for HGA's international promotion program, otherwise known as the TEC (Technical Education & Communication) program. Also included in this contract is survey work to help HGA identify benchmarks to evaluate program success. This work also fulfills HGA's third-party evaluation requirement. Jaki Brophy and Jessica Stevens oversee Callanan & Callanan staff, advised by HGA Board members.

ABROAD

MK2 | EUROPE - HOP GROWERS OF AMERICA

Hop Growers of America contracts with Cologne-based mk2 agency to handle all European representation. mk2 executes all European brewing school seminars, BrauBeviale/Drinktec, the European IPA Contest, and other special projects as they arise, including media dinners in Munich, representation at special U.S. Embassy affairs, and other one-off projects. Jaki Brophy oversees mk2 staff, advised by HGA Board members.

RIVER GLOBAL | BRAZIL - HOP GROWERS OF AMERICA

Hop Growers of America contracts with São Paulo-based River Global to execute all Brazilian-based events such as Brasil Brau trade show and technical seminars which officially begun (virtually) in 2020. Jaki Brophy oversees River Global staff, advised by HGA Board members.

Annual Convention



*Scenes from 'Celebrate Oregon' at the
Crystal Ballroom - Portland, OR*

THE 64TH ANNUAL AMERICAN HOP CONVENTION

The annual event was hosted by the Oregon Hop Growers Association in beautiful Portland, Oregon - January 22-24, 2020. The theme was 'The Hop Pendulum' and highlights included: the welcome reception and HRC silent auction; 'Celebrate Oregon' event and Cascade Cup presentation at the historic Crystal Ballroom; and of course the annual Brewer and Merchant panels, research and speaker presentations. Topics of focus included: beer distribution; outlook of hemp production; EU MRL updates; HR on the farm; Best Practices, and more.

The 2020 event saw a record turnout with a total of 585 people in attendance throughout the full five days of the event. Congratulations to Michelle Palacios and the Oregon Hop Growers Association for a well-organized and thoughtful industry event.

In addition to the actual 2020 convention, the majority of HGA's 2020 Convention activities centered around the planning and preparation of the 2021 event. We could not have foreseen at the beginning of the year the final format the 65th Annual Convention would ultimately take. As such, the year's planning activities started out much like any other year. When the board decided in early October to pivot to a virtual format, it was decided the Idaho Hop Growers Association would relinquish host responsibilities to HGA to execute a virtual Convention. The final months of 2020 were spent re-organizing for and designing a virtual event, which included many new logistics to work through. This included the expedited design and launch of an entirely new website AmericanHopConvention.org, housing a virtual trade show and video archive.

Value Added usahops.org

GOOD BINES

HGA launched the USA Hops website's Member Area in 2018, providing infrastructure for HGA's Good Bines platform. Good Bines features educational and self-assessment modules addressing food safety, risk assessment and other best practices issues as an online resource for members. In 2019, we launched the Best Practices Directory, allowing farms to list their information on the public side of the website to showcase Good Bines modules completed and third party audited program participation.

In 2020, a new COVID Resources section was added to the public side of the website that had rolling updates for growers as they became available. Six other members-only resources were added to Good Bines resources this year: a case study on water quality and irrigation management, an allergen risk assessment, a COVID on-farm plan, a HACCP plan for hop growing and harvesting, and finally, two pest management modules: one for scouting, and one for resistance management. The Member Account page allows farm operators the ability to provide employee access to this content and delegate responsibilities on the website. This includes adding other employees and designating access to different functions like managing Good Bines module completion and training. Members or their designated employees can also manage the company's listing(s) on usahops.org's public directories, the supplier directory and the best practices directory.



GOOD BINES - PRO TIPS

- #1** For help navigating the Member Area of the website and how to make the most of it visit: www.usahops.org/members/help
- #2** List your farm on our website so breweries can see your 3rd party certifications and Good Bines self-certifications! Log into the member section and check out the videos for more help on this!

Value Added usahops.org



USAHOPS.ORG

Member-Exclusive Content

Pest Management Modules:

- Scouting
- Resistance Management

Plans:

- HACCP Plan for Hop Growing and Harvesting
- Allergen Risk Assessment
- COVID On-Farm Plan

Case Study:

- Water Quality and Irrigation Management*

*Sponsored by Anheuser-Bush



COST STUDIES

In 2020, two new cost studies were added to the Grower Tools section of the website, one for conventional hop growing in the U.S. and one for organic hop growing. These studies were updated from the previous studies released in 2015 to aid growers in business planning and to provide an estimate on the current costs of hop production. Additionally, while the EU Farm to Fork initiative and the rolling MRL changes for the market will not result in organic growing as defined by the cost study per-se, it will be a helpful tool in demonstrating the financial consequences of these policies. Both cost studies are posted in the Cost of Production section of the Grower Tools tab.

[Link here to visit the updated Cost Studies.](#)

Value Added



IHGC REPRESENTATION

The International Hop Growers Convention provides a forum for hop growers from across the globe to meet three times annually to share crop reports, statistics, and discuss issues of common concern. Hop Growers of America is a member, representing US hop growers at these meetings. Statistical estimates are provided for each meeting and compiled with those from other member countries by the Economic Commission. HGA distributed these reports to US growers following each meeting in 2020. During 2020 all meetings were held virtually.

The Scientific and Technical Commission provides a forum for hop researchers to collaborate internationally. This commission has also taken on the task of maintaining the international list of hop varieties and variety codes, to ensure these are harmonized worldwide.

The Regulatory Harmonization Commission, co-chaired by Ann George and Otmar Weingarten, Executive Director of the German Hop Growers Association, is focused on the harmonization of pesticide maximum residue levels (MRLs) and other trade issues. During 2020 this Commission worked to ensure all IHGC members were informed regarding the European Union's Farm to Fork Policy and hazard-based assessment of pesticide registrations, as well as collaborative efforts in other key markets worldwide.



STATISTICS

Hop Growers of America collaborates with USDA National Agricultural Statistics Service, state hop commissions, the International Hop Growers Convention, hop merchant companies, researchers, and other information sources to create some of the most accurate statistics available for US agricultural crops. USDA-NASS publishes five hop reports annually: March Hop Stocks, June Hop Acreage, August Pre-Harvest Estimates, September Hop Stocks, and the December National Hop Report. HGA utilizes these reports along with data from the IHGC and other sources to prepare the annual Statistical Packet, released in January.

International Markets

OVERVIEW

While growers continued operations in the fields here at home, adapting as needed to COVID-19, other sectors were not able to adapt their operations as quickly, either shutting down or shifting to remote work. Travel was and remains essentially shut down to many countries which provides particular challenges to a program based on in-person activities in different international locations. Europe was hit hard in the early months of this global pandemic with multiple waves of infections and shutdowns that were generally stricter abroad than they were domestically. Going back into the mindset at the time, COVID was something that many thought would be resolved some time in 2020. As our first activity was cancelled (CBC), new developments and data started to unfold, and goalposts on “re-opening” kept getting pushed here in the U.S. and across the globe as we learned more about the coronavirus. Even with some countries starting to open back up, international travel was uncertain and not allowable from the U.S. to many countries, not to mention something that speakers might not be comfortable with. It was apparent that for HGA to successfully hold events in 2020 they would need to pivot to virtual formats for all seminars and obtain extra help for booth staff at BrauBeviale through our contractor mk2. Organizers were adamant the trade show could go forward with reduced crowds due to travel bans and incorporated safety precautions, which included traffic flow management mimicking grocery store traffic flow already in utilization.



Opening presentation slide for the São Paulo virtual technical seminar

While BrauBeviale was cancelled at the last-minute due to another case spike in Germany (very close to the event, our beer had just gotten loaded onto the plane – we tried getting it back!), HGA was still able to execute all other non-trade show activities for the year. This included a new addition to the program: the launch of technical seminars in Brazil. While there were some considerable changes to successfully transfer to virtual seminars, ultimately, we were able to do so. A lot of this revolved around needing to assume that participants would be taking part in these seminars alone at home due to possible spikes and lock-down mandates. Many, but not all, ultimately did. This meant switching from working with dialed-in estimates to precise headcounts for beer purchasing and hop samples. We also switched from sending one larger bag of pellets broken up on the day into bowls for each table to share, to giving each participant individualized 1 oz. packets for sensory. Each person received a take-home sensory kit: 5 hop samples and 5 corresponding beer samples.

International Markets

Coordination of either couriered sample delivery (Brazil), or arrangement of sample pickup from schools was arranged, and HGA staff pulled samples to ship corresponding take-home kits to speakers; one kit was shipped per session to allow for simultaneous sensory between them and the students.

Additionally, many school schedules were disrupted or delayed. Paired with an initial “wait and see” approach – hopeful for travel and normalcy at the end of the year – by the time it was apparent that we would have to pivot to a virtual format, November and December events were the best options. This timeline worked with class syllabus schedules and Brazilian holidays, and also factored in enough time for a complicated beer import process to Brazil, allowing HGA enough time to handle logistics for successful on-time delivery and for in-country contractors to assemble and deliver the personalized sensory kits.

While these efforts provided extra challenges for HGA to host their seminars this year in the new virtual format, it provided a good opportunity to invite commercial brewers into a what is normally a student-exclusive seminar. It also provided a fresh perspective and will lead to improvements, such as moving towards hop samples being delivered in smaller package sizes to emphasize good packaging standards. Finally, with the reduction in travel we undertook additional projects this year, working to improve administrative functions related to hop procurement and inventory tracking, and printed assets. A total redesign of the Variety Snapshot and Merchant Guide, as well as creating a new printed piece, Hop Stats, was a project in 2020 carried into the new year and will be finalized in the first quarter of 2021.

USDA FUNDING INCREASES

2021 FUNDING: \$400,037

2020 FUNDING: \$398,002

2019 FUNDING: \$384,344

2018 FUNDING: \$369,840

2017 FUNDING: \$331,816



2020 >>> 2021 : 1 YEAR

+\$2,035

2016 >>> 2021 : 5 YEARS

+\$68,221 or +20.6%

*For main spending account, does not include funding for purchasing samples. Overall, most cooperators have been experiencing a decline in funding.

International Markets Technical Seminars - Europe

EUROPE

Four seminars in total occurred in 2020, two in November and two in December. John Mallett of Bell's Brewery was a speaker for students at Doemens and TU Berlin; Matt Brynildson of Firestone Walker was a speaker for students at Heriot-Watt and Weihenstephan. Both speakers had a lineup of 5 American hop varieties and 5 corresponding beers to evaluate live with the students along with other seminar topics such as growing conditions in the U.S., sensory, dry hopping techniques and overall advantages of sourcing hops from the U.S. Students interacted with the speakers in a more free-flowing discussion of observations and questions due to there being no language barriers for this market, and interaction was robust for the majority of these sessions and overwhelmingly positive feedback was collected from seminar participants. Highlights include 100% of respondents saying that they "Strongly Agree" – a 5 on a 1-5 scale – for the following questions for both Doemens and Weihenstephan seminars: the seminar increased their knowledge of American hop varieties; the seminar was a good use of their time; they would recommend attending a seminar or something similar from HGA to their colleagues; and that their brewery is likely to commercialize a new beer with relatively high American hopping rates within the next 6-12 months (some commercial brewers joined the seminars as this was possible with a virtual format). To add some additional formality to the event, USDA Foreign Service Agency (USDA-FAS) employees posted overseas gave opening remarks for webinars: Kim Sawatzki (Germany), and Ellen Wong (United Kingdom).

Post Seminar Evaluation Questions

???'s

Averaged response of all 4 seminar survey respondents that replied "Agree" or "Strongly Agree"

The seminar increased their knowledge of American hop varieties

98%

They are now more inclined to use American hop varieties

93%

They will now make recommendations to their brewing colleagues to try American hop varieties

88%

The seminar was a good use of their time

95%

They would recommend attending a seminar or something similar from HGA to their colleagues

97%

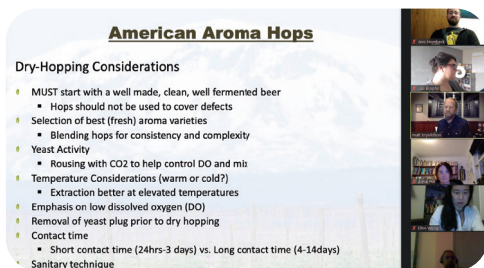
International Markets Technical Seminars - Europe



John Mallett // Bell's Brewery

TU Berlin - NOV 3 // Doemens - DEC 9

Amarillo® Megalodom Legendary IPA - Ninkasi Brewing Co.
Bravo™ Cozy Sweater - Iron Horse Brewery
Cascade Pale Ale - Sierra Nevada Brewing Co.
Citra® Brand HBC 394 Citra Slicker - Bale Breaker Brewing Co.
Comet Lucille - Georgetown Brewing Co.



Matt Brynildson // Firestone Walker Brewing Co.

Heriot-Watt - NOV 4 // Weihenstephan - DEC 10

Azacca® ADHA 483 Mel's Magic IPA - Iron Horse Brewery
Cascade Pale Ale - Sierra Nevada Brewing Co.
Cashmere Tripel Hop Cashmere - Duvel Moortgat Brewery
Comet Lucille - Georgetown Brewing Co.
Mosaic® Brand HBC 369 Joe IPA - 10 Barrel Brewing Co.

GOING VIRTUAL HAD ITS PERKS!

Commercial brewers from some of the leading European craft breweries joined us for the Doemens seminar, allowing us to survey them on their U.S. hop usage:

100% primarily use American hops in their breweries

70% reported they will maintain their usage rate of American hops; **30%** reported they will increase their usage rates

50% reported having 6-9 beers with U.S. hops

50% reported having 10+ beers with U.S. hops

International Markets Technical Seminars - Brazil

BRAZIL

2020 was the first year for technical seminars to be launched in this market and the reception was incredible! Despite challenges from COVID, HGA was still able to pull these off thanks to a pivot to virtual attendance, requiring some logistical changes as mentioned in the *International Markets* intro. Steve Dresler, recently retired from Sierra Nevada, was the speaker for both seminars and led participants through 5 hops and 5 corresponding beers after first speaking to them about various aspects of the U.S. Hop industry, sensory, and brewing techniques of which **100% of participants said they would participate in again if given the opportunity**. Combined audiences totaled: **95 participants** that were **trained**, 84 of them being brewery employees or owners, the remaining participants were from supply companies/stores, influential beer bars, sommeliers, journalists, brewing consultants, and a local USDA employee. In addition, the Agricultural Trade Office Director, Nicolas Rubio, provided opening comments and remarks to kick off both seminars, and Jaki Brophy briefly spoke about Hop Growers of America and showed participants features of HGA's website, most importantly demonstrating the features of the translate button so attendees could visit usahops.org after to learn even more and read the content in their native language.



Steve Dresler // Sierra Nevada Brewing Co. (Ret.)

São Paulo - DEC 1 // Porto Alegre - DEC 3

Azacca® ADHA 483 Mel's Magic IPA - Iron Horse Brewery

Cascade Mirror Pond Pale Ale - Deschutes Brewery

Comet Lucille - Georgetown Brewing Co.

Idaho 7® Mind Haze IPA - Firestone Walker Brewing Co.

Sabro® Brand HBC 438 Hazy L IPA - Bale Breaker Brewing Co.

The audience stayed engaged throughout the 2.5 hour presentation and were lively in their comments and questions, asking 58 questions total in the q&a box across both seminars, plus a few more in the chat box. Finally, in addition to the positive feedback received immediately in the comments and in the surveys afterwards, many participants shared overwhelmingly positive feedback on social media as well, using #usahops and tagging Hop Growers of America which extended the influence of the event beyond the reach of participants alone.

International Markets Technical Seminars - Brazil



Seminar participants received their hop & beer samples via courier in HGA branded cooler bags

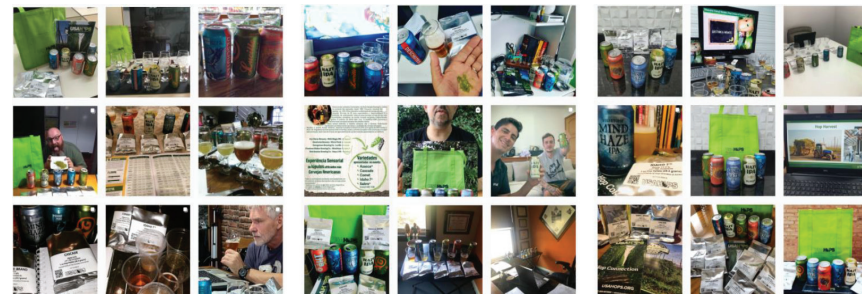
Post-Seminar Survey Results

40 Total Respondents

100%	Would participate in another USA Hops technical seminar, given the opportunity
90%	Said they would like to learn more about American hops after the presentation
100%	Said they would recommend the seminar to a colleague
92%	Said they learned a new technique or piece of information helpful to them or their brewery
4.8 / 5	Was the average rating of the event



Nicolas Rubio from USDA-FAS's São Paulo office provided opening remarks to kick-off both seminars



Participants were very active during and after the seminar on social media sharing the experience with their networks using #USAHOPS

International Markets IPA Contests

5TH ANNUAL EUROPEAN IPA CONTEST

The IPA contest forged on, with its best year yet in that feedback from judges relayed that this year's submitted beers was the highest quality they've seen, smelled, and – most importantly! – tasted. With the winning beer scoring 40 points on the BJCP scoresheet, and the tied third place breweries coming in at 35 points, the winning breweries ranged from “Excellent” to “Very Good” on the scoring guide. This progress shows increased familiarity, comfort level, and technical knowledge leading to better, high-hopping rate beers in the market. Positive news for growers and the industry overall.

For this year's iteration, brewers were challenged to create and submit a Session IPA and were supplied with **Cascade, Cashmere, Chinook, and Idaho 7®**. Beers were shipped to judges in the beer and hop industry – many who have served as judges previously – located in Europe, and the award ceremony was held virtually on December 16 in lieu of our usual ceremony concluding our Craft Beer Tasting at BrauBeviale. In addition to the exciting improvement we have seen with high hopping rate beers in the European market, the highpoint for us in this year's contest was the expressed thanks by the breweries for continuing the contest during Covid. One brewery in particular stated that this contest was a bright spot in the year for them, giving them an exciting project, and also something to look forward to while there was so much bad news ever-present throughout the year. To encourage these brewers to keep these newly developed recipes on tap, HGA picked up the tab in varying, respective amounts for first, second, and third place prizes, even furthering the benefit to growers with this activity. CHEERS!

2020 CONTEST WINNERS

1st Place - Pivo Falkon

2nd Place - Jopen Beer

3rd Place, tied - Hopfenstopfer
& Hophead Brewing



Participants:

Braukollektiv

Brauerei Lemke

Kehrweider Kreativebrauerei

Omnipollo

 Pivo Falkon
Dec 18, 2020 · Instagram · 🌐
Máme skvělé, ba přímo fantastické zprávy!
Zúčastnili jsme se pátého ročníku soutěže o
nejlepší IPA v EU, kterou zde pořádá... See More
See Translation



A social media post promoting Pivo Falkon's IPA contest win

International Markets IPA Contests & Hop/Beer Lineup

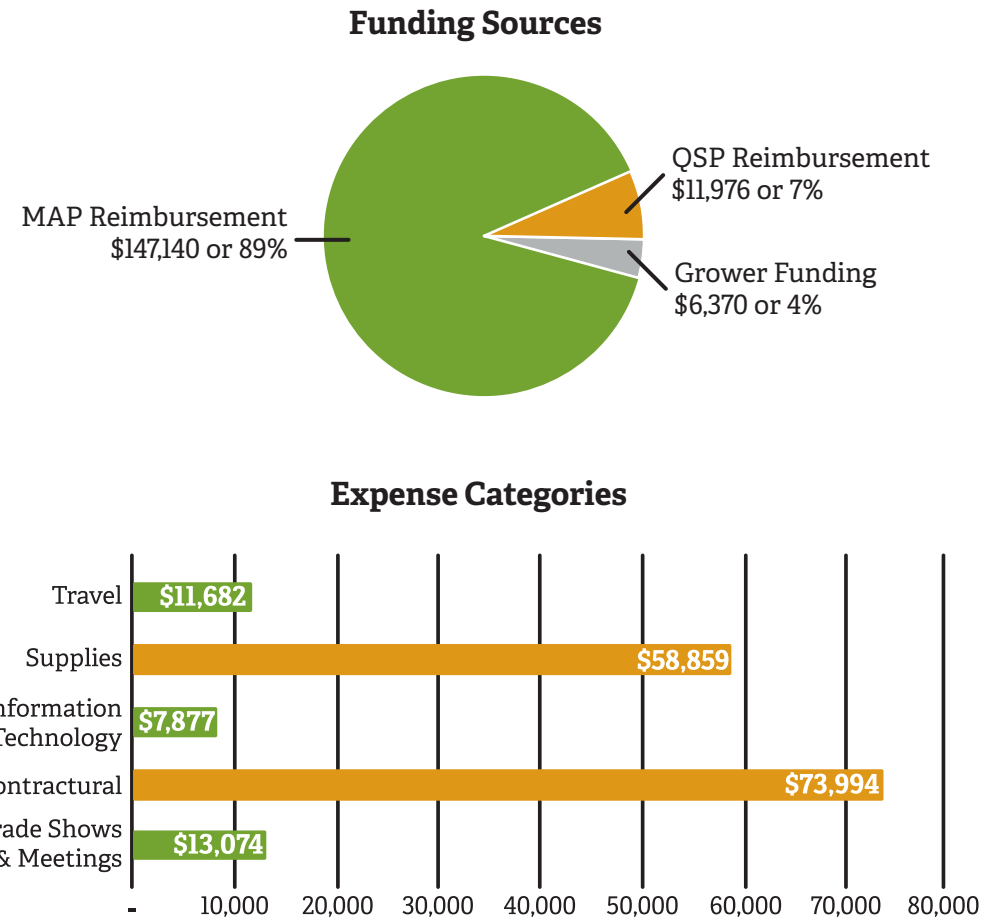
STUDENT BREWING CONTEST

In addition to our contest for commercial brewers, HGA did not want hops to go to waste, so they shipped out a large amount leftover from the two remaining slots not claimed in the commercial IPA contest along with some trade show hops, and hops requested from USDA early in the year for an event that was cancelled due to COVID. This was a fun project for the students, pairing up and competing against their classmates for their teachers to judge and give feedback on. Gift cards to a popular German homebrew supply shop was awarded to the winners.

2020 Event Hop & Beer Lineup

Amarillo® - Megalodom Legendary IPA - Ninkasi Brewing Co.
Azacca® ADHA 483 - Mel's Magic IPA - Iron Horse Brewery
Bravo™ - Cozy Sweater - Iron Horse Brewery
Cascade - Mirror Pond Pale Ale - Deschutes Brewery
Cascade - Pale Ale - Sierra Nevada Brewing Co.
Cashmere - Tripel Hop Cashmere - Duvel Moortgat Brewery
Citra® Brand HBC 394 - Citra Slicker - Bale Breaker Brewing Co.
Comet - Lucille - Georgetown Brewing Co.
Idaho 7® - Mind Haze IPA - Firestone Walker Brewing Co.
Mosaic® Brand HBC 369 - Joe IPA - 10 Barrel Brewing Co.
Sabro® Brand HBC 438 - Hazy L IPA - Bale Breaker Brewing Co.

FY 2020 – TEC Expenses: All Activity



Our TEC program spending for FY 2020 was drastically decreased due to pandemic challenges.

Scientific, Technical & Regulatory Work

RESEARCH

The Washington Hop Commission provided grants in 2020 to hop researchers at Washington State University, Oregon State University and USDA-ARS including Drs. Doug Walsh, Scott Harper, David Gent, and Marcelo Moretti, to address issues related to entomology, virus and viroids, pathology, and weed control. Washington, Oregon and Idaho Hop Commissions are also members of Hop Research Council, providing additional research funding through dues and assessments to that organization.

The hop industry's ongoing Congressional efforts over recent years have resulted in additional USDA-ARS hop research funding, bringing the total appropriation to \$2.6 million. This additional funding expanded existing pathology and public hop breeding efforts being conducted by Drs. David Gent and John Henning, allowing for the addition of two new scientific positions for the hop industry. Dr. Kayla Altendorf joined the USDA-ARS hop research team in 2020 as a hop geneticist/breeder, located at WSU-Prosser. A hop research physiologist dealing with abiotic stress will join the team in 2021, also stationed at WSU-Prosser.

Washington, Oregon and Idaho Hop Commissions are also active members of the National Clean Plant Network's Tier 2 Advisory Board for Hops and work closely with the Clean Plant Center Northwest, which is responsible for supplying virus-free foundation stock for propagation of clean planting material for the hop industry.

During 2019 and 2020 the Washington Hop Commission worked with 2nd Sight BioScience on a project to develop an automated hop twining machine, the MAV, or mul Commercial application of this technology is anticipated in 2021.



MAV
'Multifunctional
Agriculture Vehicle'

Scientific, Technical & Regulatory Work

LEGAL & REGULATORY ADVOCACY

The US hop industry's legislative and regulatory advocacy program is a broad, collaborative effort that includes Hop Growers of America, state hop grower organizations and Hop Research Council. We also collaborate closely with the Brewers Association and Beer Institute on issues of common concern. In recent years, targeted Congressional visits by representatives of the hop and brewing industries have resulted in the approval of an additional \$1.7 million appropriation for USDA-ARS hop research, bring the total appropriation to \$2.6 million. This funding expanded existing pathology and public hop breeding efforts, allowing for the addition of two new scientific positions for the hop industry (see discussion under Research section).

On the regulatory front, the hop industry has spent the past five years working with the US Food and Drug Administration regarding the Food Safety Modernization Act (FSMA). Although FDA included hops as a crop regulated under this rule, we have maintained that hops should have been classified as “rarely consumed raw” and exempted from FSMA. In March 2019 the FDA issued an Enforcement Policy for four crops including hops. This relieves entities growing, harvesting, packing, or holding hops from the requirements of the Produce Safety Rule while the agency further reviews the topic and considers possible rule making.

USHIPPC | 2 MEETINGS/YEAR

The US Hop Industry Plant Protection Committee (USHIPPC) was formed in 1988 to coordinate plant protection issues and pesticide registration efforts on behalf of the US hop industry. At the time, growers had experienced registration cancellations and resistance development that left them with a very limited plant protection toolbox.

The initial goal of seeking new registrations for hop plant protection products was expanded in 1992 with the launch of the International Harmonization program. The hop industry contracted with Bryant Christie Inc., a Seattle-based technical consulting firm specializing in international regulatory issues, phytosanitary barriers to trade and harmonizing global pesticide MRLs. Our contract with BCI has continued for 29 years, with the program expanding from initial focus on the European Union, Canada, Japan, and Codex (international standards developed under the World Health Organization) to its current ongoing efforts in 11 countries. A key resource is the Hop MRL Tracking Chart which monitors MRLs in these 11 markets. It is updated monthly and shared at www.usahops.org/growers/plant-protection.html. Matt Lantz, BCI's Vice President, Global Access, is a familiar face at hop industry meetings and the annual Hop Convention where his team reports on the global MRL and trade situation. BCI provides a detailed “Issues Review” publication in January and July discussing harmonization program details. These reports may be found in the USA Hops website's Member Area under Member News – Reports.

Scientific, Technical & Regulatory Work

USHIPPC | 2 MEETINGS/YEAR

USHIPPC's efforts are funded with annual contributions from the Washington, Oregon and Idaho Hop Commissions, along with donations from several hop merchants/processors – currently including John I. Haas, S.S. Steiner, Yakima Chief, Kalsec, Crosby Hop Farms, ADHA, Hollingbery & Son, and BSG Hops. Grants from multiple sources have provided funding for concentrated efforts in specific markets or to fund necessary studies required to move forward with import tolerance requests. In 2018, the German Hop Growers Association and German Hop Merchants formally joined the International Harmonization effort, now contributing half of the contract for Bryant Christie's base program, which was expanded to include German priorities as well as those of the US hop industry.

The committee is guided by 8 voting members: 2 representatives each for the three state hop commissions, and 2 representatives for Hop Growers of America. 2020 members included John Solt (Chair) and Michelle Gooding from Idaho; Fred Geschwill and Alexa Weathers from Oregon; Patrick Smith and Andrew Jaques from Washington; and Kyle Shinn and Jared Favilla representing HGA. Representatives of the merchant-processor companies who provide financial support also serve on the committee, which meets twice annually (at the American Hop Convention and in conjunction with the HRC Summer Meeting). Ann George has administered the committee and its programs since its inception.

In addition to managing domestic registration priorities and international harmonization efforts for the US hop industry, the committee has also represented the hop industry on specific plant protection and international regulatory issues over the years, communicating directly with EPA, Congress, US Embassies, and Consulates as needed. To further the collaboration of USHIPPC and US hop plant protection researchers with colleagues in Europe, Ann George and Matt Lantz serve as members of the European Union Commodity Expert Group for Hops, ensuring coordination on priorities and research plans/results. Recognizing the importance of international harmonization of regulations impacting the shipment of hops, IHGC established its Regulatory Harmonization Commission in 2014, co-chaired by Ann George and Otmar Weingarten, Executive Director of the German Hop Growers Association.

For the past three years, USHIPPC has added a key priority of seeking hop MRLs in the new Korean positive list system. We successfully secured a \$248,490 Specialty Crop Block Grant through Washington State Department of Agriculture in October 2019 to fund a focused three-year effort to achieve additional harmonized MRLs in Korea.

Scientific, Technical & Regulatory Work

BEST PRACTICES COMMITTEE | 2 MEETINGS/YEAR

The HGA Best Practices Committee formally represents US hop growers, merchants and brewers.

Voting members:

Oregon Hop Commission: Brian Bolduc (Chair) and David Henze
Idaho Hop Commission: Oliver Schroeder and Mark Hanson
Washington Hop Commission: Jessica Riel and Maria Nordberg
Hop Growers of America: Jenny Napier, Ohio Hop Growers Guild and Mark Trowbridge, Hop Growers of Michigan.

In addition, non-voting positions were held by:

Merchant-Processor Members: Kevin Madsen, Hopsteiner; Marisol Summers, John I. Haas; and Steve Carpenter, Yakima Chief Hops. *Brewing Sector Members:* Zac German, ABInBev; Kaylyn Kirkpatrick, Brewers Association; and Scott Dorsch, Odell Brewing Co.

With the Good Bines educational platform well-established in the USA Hops website Member Area, the Committee planned and prioritized future education and self-assessment materials. The platform now includes six modules, including Foundations of Food Safety, Risk Assessment, Irrigation Water Microbial Testing, Soil Fertility, Scouting, and Resistance Management.

The Best Practices Directory is located on the public side of the USA Hops website at <https://www.usahops.org/hop-finder/best-practices/>. It includes four icons for independent third-party programs and three Good Bines self-assessment modules. The directory provides US hop growers with a mechanism to communicate their commitment to best practices, food safety and sustainability to potential brewery customers. Each grower controls the information listed in the directory from their “My Account” page in the website’s Member Area. Listing in the directory is voluntary.

LIAISON COMMITTEE | 2 MEETINGS/YEAR

The Hop Liaison Committee coordinates hop inspection activities between the State Hop Inspection Labs (Washington, Oregon and Idaho), USDA, hop merchant companies, state hop commissions, and hop growers. The committee meets twice annually. This ensures consistent inspection practices, bale labeling and reporting across the industry.

During the past three years, the Hop Liaison Committee worked to harmonize bale stencil format across US hop production regions, including the application of bar-coding and ink-jet printer technology. They worked with the International Hop Growers Convention (IHGC) to implement harmonized hop variety codes worldwide. The committee is chaired by Missy Raver from Yakima Chief.