

2018 is really moving along, with both cold, snow and a bit of in between weather to "satisfy" all tastes. The levels of insulating snow seem to be decent in most places, and were in place before the New Year's deep freeze. Hopefully the plants came through okay. With the arrival of another month means another edition of Hort Snacks.

In this edition, you'll find a huge variety of conferences, workshops and events to inspire and educate you, if that is what you need. You'll find a few different articles to hopefully do a bit of the same. There are 2 different pest pairs to compare or learn about, as well as some articles and tidbits that might spark a few new ideas or possibilities.

Hopefully we'll get a chance to see a number of you at the various events throughout February and March, as we'll be out working (speaking, facilitating, organizing, observing) at a number of them. Regardless, if you have ideas, suggestions or thoughts about the newsletter content, or anything related to your business and operation, give us a shout (phone or email) and we'll be happy to hear from you.

Rob Spencer/Dustin Morton, Commercial Horticulture Specialists Alberta Ag-Info Centre, Alberta Agriculture and Forestry 310-FARM (3276)

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#### **Featured APP**

Nutrient Flashcards – Soil nutrient information tool, which gives functions, antagonisms, general deficiency symptoms, factors affecting availability and sensitive crops for a range of different macro and micronutrients.

#### In this edition of Hort Snacks

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#### THINGS TO DO / THINGS TO THINK ABOUT THIS MONTH

- Plan to attend winter workshops / courses. At the same time, think about visiting another operation this summer [or attending some field day(s) or workshop(s)]
- Register for Alberta Farm Fresh School (agenda attached) connect with fellow producers, get answers and ideas and share your own thoughts with others
- Plan field layout of fields to be planted
- Check / Clean / Maintain Equipment
  - o irrigation connections, nozzles, filters, pump injectors
  - o sprayer nozzles, pumps, filters, lines, etc.
  - o planters, seeders, etc.
  - harvesters and tractors
- Check / Update signage
- Finalise plans and dates for advertising during season
- Plan for planting equipment and labour
- Prune Saskatoon berries (as able)
- Prune or mow primocane raspberry plants to the ground (as soon as can get to)
- Continue to monitor strawberry plant winter survival. Order extra if necessary.
- Ensure memberships in organizations are up to date (inclusion in websites, guides, etc.)
- Review production record notebook
  - o Fertilizer response?
  - o Pesticide response/efficacy?
  - Application dates
  - Pesticide applicator license update?
- Roundtable discussion with everyone involved in your operation
  - Review errors irrigation, fertilizer, pest management, staffing
  - Collect ideas for improvement, whether it is diversification, streamlined processes, new and interesting ways to reach customers, whatever.
     Pick a couple to try out and put whoever contributed the idea in charge of it.
- Inventory
  - Pesticide / fertilizer storage What do you have?
     Has anything expired? Does everything have the proper labels? Is everything stored correctly?
  - o Containers picking boxes, containers, pails, bags, etc.
- Complete order of fertilizer, pesticides, picking/packing containers, etc.

# \*\*No not bring firewood into Alberta \*\*Elm Pruning Ban is April 1-September 30 \*\*Elm trees from a DED infected province can not be shipped into Alberta \*\*For more information call 310-0000 and ask for 403-782-8613 \*\*WWW.STOPDED.org\*\*

#### Elm Pruning Ban in Alberta

- Pruning and sanitation is an essential part of Dutch Elm Disease prevention
- Pruning of elm trees is legal in
   Alberta from October 1 to March
   31
- The disease vectors (European elm bark beetles) are not active between these dates
- Proper pruning is very important consult a professional arborist to determine the nature and extent of pruning required

#### **NEWSLETTER USE RESTRICTIONS**

Please feel free to share all or portions of this newsletter with other interested parties. If you want to use content from this newsletter in other media, please request permission before doing so.

#### <u>Upcoming Conferences / Workshops</u> February 2018

 33<sup>rd</sup> Annual North American Farm Direct Marketing Association (NAFDMA) Convention
 Feb 1-7, 2018 – Los Angeles, California, USA http://www.farmersinspired.com/Convention/

 Explore Local Webinar – AHS Food Regulation for Farmers' Markets

Feb 7, 2018 - Register

Organic Alberta Conference – Sustainability & Profits –
Organic Ideas to Help You Grow
Feb 9-10, 2018 – Westerner Park – Red Deer, AB
<a href="http://organicalberta.org/news/2018-conference/">http://organicalberta.org/news/2018-conference/</a>

 2018 Manitoba Direct Farm Marketing Conference (Joint Prairie Fruit Growers Association / Direct Farm Manitoba)
 Feb 10, 2018 – Canad Inns Destination Centre Polo Park – Winnipeg, MB

www.directfarmmarketing.com

 Hort Snacks-to-Go Webinar – Nuts and Bolts of Running a Market Garden

Feb 12, 2018 - Register

 Explore Local Webinar – Empowered Employees: Strategies for Successful Onboarding
 Feb 14, 2018 – Register

Getting into Farmers' Markets Workshop
 Feb 15, 2018 – AFSC Boardroom – Camrose, AB
 To Register – 1-800-387-6030 or Register

 Ontario Berry Growers Association Annual Meeting Feb 20, 2018 – Niagara Falls, ON www.ontarioberries.com

Ontario Fruit & Vegetable Convention
 Feb 21-22, 2018 – Scotiabank Convention Centre – Niagara
 Falls, ON

www.ofvc.ca

 Sour Cherry / Haskap Production Workshop (+ Advanced Haskap Sessions)

Feb 21, 2018 – Pomeroy Olds Inn & Suites – Olds, AB To Register – 1-800-387-6030

Building a Working Destination Farm Workshop
 Feb 21, 2018 – Agriculture Business Centre – Leduc, AB
 To Register – 1-800-387-6030

 Alberta Farm Fresh School 2018 – Farm to Market Conference (AFFPA/AFMA)

Feb 22-23, 2018 – Pomeroy Olds Inn & Suites – Olds, AB

Biobest Growers Day

Feb 23, 2018 – Best Western Plus Lacombe Inn & Suites – Lacombe, AB

To register – contact Emiel Vanderwel or Edwin Hogendoorn

 Beyond Sticky Traps: Leveling Up Your Greenhouse Biocontrol (for greenhouse ornamental growers)
 Feb 28, 2018 – Thiel's Greenhouse – Bruderheim, AB To Register – 1-800-387-6030

#### Upcoming Conferences / Workshops March 2018

 Beyond Sticky Traps: Leveling Up Your Greenhouse Biocontrol (for greenhouse vegetable growers)
 Mar 1, 2018 – Gull Valley Greenhouses – Lacombe/Gull Lake, AB
 To Register – 1-800-387-6030

 Integrating Nutrition and Biology toward Plant and Soil Health (A workshop offered by Mans Organics)
 Mar 6, 2018 – Mans Organics – Coaldale, AB
 To register Eventbrite; Queries – mail@mansorganics.ca

Potato Pest Management Workshop
 Mar 6, 2018 – Festival Place – Sherwood Park, AB
 Mar 8, 2018 – Coast Lethbridge – Lethbridge, AB
 To Register – Call 1-800-387-6030

 Explore Local Webinar – Image-driven Marketing Mar 7, 2018 – Register

 Hort Snacks-to-Go Webinar – Crunching the Numbers on Biocontrol in Bedding Plant Production
 Mar 12, 2018 - Register

 2018 Canadian Horticultural Council (CHC) Annual Meeting

Mar 13-15, 2018 – Westin Ottawa – Ottawa, ON www.hortcouncil.ca/

Canada Blooms 2018
 Mar 9-18, 2018 – Enercare Centre – Toronto, ON www.canadablooms.com

 Tree Insect and Disease Management Course (Arboriculture Canada Training & Education Ltd Mar 21-23, 2018 – Red Deer, AB www.arborcanada.com

Explore Local Webinar – No Fear Farm Finance
 Mar 28, 2018 – Register

#### **April 2018**

Explore Local Webinar – Farm Direct Marketing Trends in Alberta

Apr 4, 2018 – Register

 Explore Local Webinar – The Alberta Employment Standards Code and You
 Apr 18, 2018 – Register

Canadian Produce Marketing Association (CPMA)
 Conference & Trade Show

Apr 24-26, 2018 – Vancouver Convention Centre – Vancouver, BC

http://convention.cpma.ca/

#### For Sale:

Joanna Half Row Berry Harvester for sale. Perfectly suited for harvesting Haskap, Red & Black Currants, and Saskatoon berries. Includes low bush attachment, rear light and custom made platform roof. Harvester has a newly installed electric oil cooler to replace the original passive cooler, and a new transverse belt and bearings. Machine is in excellent condition and ready to go to work. Contact Rick @ 403-333-9152 for further information.

# HortSnacks-to-Go: 2017/2018 Webinar Series





To register: Email: dustin.morton@gov.ab.ca

Time: 1:30 PM Cost: Free

#### October 16, 2017 – Dr. Bob Bors

Dr. Bors is an assistant professor at the University of Saskatchewan where his research focuses on prairie hardy fruit breeding. He'll be discussing some of the new haskap varieties they're working on and new innovations in the pipeline.

#### October 30, 2017 - Dr. Bridget Behe

Garden centre owners won't want to miss this one! Dr. Behe is a professor at Michigan State University where she studies marketing of horticultural crops. Bridget will be discussing the practical implications of her research using eye tracking technology in garden centres and how owners and operators can capitalize on this.

#### November 20, 2017 – Ron Valentin

Ron is Bioline AgroSciences technical lead for North America and is well known for his pragmatic, actionable approach to biological control. Ron will be discussing how other areas of the world are using biological controls in field scale vegetable and fruit crops and how Alberta producers can take advantage of this growing area.

## December 18, 2017 – Dr. Kate Congreves

Crop fertility is a balancing game; soil fertility, fertigation, top dressing, foliar fertilizer, the list goes on. Dr. Congreves research focuses on soil health and fertility and she'll break down each of these and how best to manage your crops growth.

### January 15, 2018 – Eric Doef, Doef's Greenhouses

Eric is the second generation of growers at Doef's Greenhouses in Lacombe, Alberta. Doef's own an 11 acre state of the art greenhouse in Alberta and will talk about the challenges and success of growing at that size in the Alberta climate.

#### January 29, 2018 – Dawn Boileau, Sunrise Gardens

Dawn and her partner Kate own and operate Sunrise Gardens in Onoway. Dawn and Kate have invested heavily into season extension and Dawn will discuss how this has allowed them to shrink their acreage while still sustaining the farm.

# February 12, 2018 – Chris Blanchard, Purple Pitchfork

Chris is the host of the popular "Farmer to Farmer" podcast and a former farmer. He'll be discussing the nuts and bolts of running a market garden including risk management, making a living, and how you have to work for the farm you want.

# March 12, 2018 – Graeme Murphy, bioLogical control solutions

Graeme has worked in floriculture production for his entire career and is an advocate for biocontrol solutions for common pest problems. Graeme will focus on the cost of biocontrol and how to best figure out the economics of it in the diverse world of bedding plant production.









# Sour Cherry and Haskap Production Workshop

This workshop provides new or potential dwarf sour cherry and Haskap producers with a detailed outline of all aspects of production in Alberta. Sessions include information on production, including varieties, establishment, maintenance and harvest, as well as the economics of dwarf sour cherries and Haskap. Advanced sessions on Haskap production will be included as part of an evening session.

**Registration Information** 

Dates: February 21, 2018

Pomeroy Inn & Suites at Olds College, 4601 46 Avenue, Olds, AB

Registration deadline: February 14, 2018

Time: 8 a.m. to 9 a.m. registration

9 a.m. to 12 noon - Dwarf Sour Cherry sessions

12 to 12:40 p.m. – Lunch (Lunch and snacks provided)

12:40 to 4 p.m. – Economics and Introductory Haskap sessions 4 to 5 p.m. and 6:30 to 8:30 p.m. – Advanced Haskap sessions

Cost: \$20/person (plus GST) (full day) or

\$10/person (plus GST) (advanced Haskap sessions only)

To register online visit:

https://eservices.alberta.ca/sour-cherry-haskap-workshop.html

Do not pay online if you are exempt from paying GST. Instead, call 1-800-387-6030 to register.







#### **Sour Cherry & Haskap Production Workshop**

#### Agenda

8:00 - 9:00 am - Registration

9:00am - 12:00 pm - Sour Cherry Production sessions - Rob Spencer - Alberta Agriculture &

Forestry

9:00 - 10:00 am - Sour Cherry Varieties

10:00 - 10:30 am - COFFEE BREAK

10:35 – 11:00 am – Sour Cherry Orchard Establishment

11:00 – 11:35 pm – Sour Cherry Orchard Maintenance through to Harvest

11:35 am – 12:00 pm – Economic Truths of Sour Cherry/Haskap Production (Sour Cherries &

Haskap)

12:00 - 1:00 pm - LUNCH

1:00 – 4:00pm – Haskap Production sessions – Rob Spencer – Alberta Agriculture & Forestry

1:00 - 2:00 pm - Haskap Varieties

2:05 – 2:45 pm – Orchard Planting and Maintenance

2:45 - 3:15 pm - COFFEE BREAK

3:15 – 4:00 pm – Harvesting and processing / Pest Management

4:00 – 4:30 pm – Planning on where your target market is and Return on Investment – Kreg

Alde – Broken Tine Orchards

4:30 – 4:45 pm – Open Q&A Session

4:45 - 6:30 pm - SUPPER BREAK - ON OWN

6:30 – 8:00 pm – Advanced Haskap sessions

6:30 – 7:30 pm – "Haskaps: A Crop You Can Believe In or Fake News" – Eric Gerbrandt (recorded

webinar)

7:30 – 8:00 pm – Haskap – A grower's perspective – Andrew Rosychuk – Rosy Farms

Introductory Workshop wraps up at 4:00pm







# Building a Working Destination Farm



#### **Workshop Featuring:**

Alf and Sandee Krause of Krause Berry Farms & Estate Winery

9 a.m. - 3:30 p.m., February 21, 2018

Agriculture Business Centre, 6547 Sparrow Drive, Leduc, Alberta



#### **Topics Include:**

- Vertically integrating on-farm enterprises
- Adding value to farm-made products
- Sharing the food experience with guests
- Developing an authentic brand
- Building a great team
- Growing collaboration and community

#### Alf and Sandee Krause

are the owners and operators of the award winning Krause Berry Farms & Estate Winery in Langley, BC. Producing over 100 products on site from their berries and vegetables, they encourage guests to participate in their food experience through U-pick berry fields, a market, bakery, estate winery, restaurants, and the farmer's table cooking school.

#### **Registration:**

Cost: \$25.00

(includes lunch and refreshments)
To register call the Ag-Info Centre at

1-800-387-6030

Registration deadline is February 14, 2018.



















#### **2018 FARM TO MARKET CONFERENCE**

presented in partnership by

# Alberta Farm Fresh Producers Association

#### Alberta Farmers' Market Association

February 22 & 23, 2018 Pomeroy Inn & Suites 4601-46 Ave, Olds AB Registration Form:

<u>www.albertafarmfresh.com</u> or www.albertafarmersmarket.com

#### Early Bird Registration until February 2, 2018

#### AFFPA/AFMA/4-H MEMBERS

Single Registration - 2 days

\$225.00 (until Feb 2)

\$275.00 (after Feb 2)

Single Registration – 1 day

\$125.00 (until Feb 2)

\$150.00 (after Feb 2)

#### **NON-MEMBERS**

Single Registration— 2 days

\$250.00 (until Feb 2)

\$300.00 (after Feb 2)

Single Registration – 1 day

\$135.00 (until Feb 2)

\$185.00 (after Feb 2)

#### **Business Unit Pair**

-\$20.00/day on second person

**Banquet Only or** 

**Extra Banquet tickets** 

\$50.00

#### **Plenary Speakers:**

Alf and Sandee Krause (Krause Berry Farms & Estate Winery)

#### **Topics include:**

Marketing (social media, web design, co-promoting)

Ethnic Diversity and new Cropportunities

Predator and pest control

Community Support Agriculture (CSA's)

Diversifying your Farm

**Small Business Accounting** 

Rules and Regulations for On-Farm Events

**Next Generation Farmers** 

Food Co-operatives

Safe Food Legislation

Soil Borne Disease

Livestock Nutrition

**Trade Show** 

#### Evening banquet includes:

AFFPA/AFMA Awards
Dining with Farm Direct Marketers and
Farmers' Market Vendors



#### AFFPA / AFMA presents ... "From Farm to Market 2018" – Tentative Agenda

	Thursday, February	/ 22, 2018 – Day 1				
Ballroom A	Ballroom B	Ballroom C	Wild Rose Room			
8:00 - 8:30 am REGISTRA	TION			•		
		wledgement of sponsors /	Intro by Olds College - Dalir	1		
Bullock; Welcome from AFF 9:05 – 10 am PLENARY –		rausa Barry Farms & Esta	ato Winory			
10 - 10:30 am – COFFEE B		iause berry i arms & Esta	de willery			
10:30 – 11:55 am						
Predator Management For Orchards & Livestock	Diversifying your Farm and using the Harvie CSA Software – Arlin Loewen – Summer's Gold	Starting a u-pick: Do's and Don'ts – Krause Berry Farms & Estate Winery	Social Media – Leona Staples – The Jungle Farm			
12 noon – 12:30	pm – LUNCH	12:30 – 1:30 pm – An	nual General Meetings AF	MA		NE
1:30 – 2:25 pm						<b>×</b>
Basic Farm Safety Management – Donna Trottier – Ag Safe Alberta	Integrated Pest Management – What we learned in Essen, Germany – Jason Andersen – Kathy's Greenhouse / Nadine Stielow – Thiel's Greenhouse	Marketing tips  – Krause Berry Farms  & Estate Winery	NAFDMA Presentation – TBD		TRADESHOW	NEW VENTURE CONSULTATIONS
2:30 – 3:25 pm						TA TA
Livestock Nutrition – Do you know what's in your feed? – Barry Yaremcio – AF	Strawberry Varieties and Tips to growing – Norcal Nursery	Beyond the Farmers' Market – How to sell beyond – Kathy Leskiw Confetti Sweets / Johwanna Alleyne – Mojojo Pickles	Market Budz – Christie Fleck – AFMA			SNC
3:30 – 4:00 pm – COFFEE E	3:30 – 4:00 pm – COFFEE BREAK & TRADE SHOW					
4:00 – 4:55 pm						
Agroforestry, Silviculture and Alley Cropping – Luke Wonneck – Agriforestry & Woodlot Extension Society	Creepers n' Crawlers n' Fliers – Insect Management in Vegetable Crops – Rob Spencer – AF	Co-operating and cross promoting with Alberta farms and local businesses  – Hells Basement Brewery	Labelling and Design: How I helped 8 new Canadians become successful Farmers' Market Vendors – Laura Rogerson			
5:00 – 5:30 pm	Networking & Trade Sho	ow				

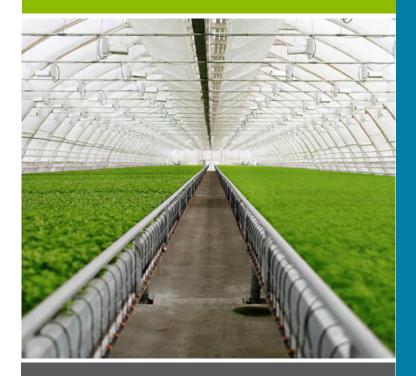
5:30 – 7:30 PM – Dinner & Awards (Cash Bar Available)
7:30+ PM – Informal Mixer / Social – The Alberta Wine and Beer tour – Ballrooms A, B, C

#### AFFPA / AFMA presents ... "From Farm to Market 2018" – Tentative Agenda

	Friday, Februar	ry 23, 2018 – Day 2				
Ballroom A	Ballroom B	Ballroom C	Wild Rose Room			
8:00 – 8:30 am REGISTRATION						
8:00 - 9:00 am Tradesho	W					
9:00 – 10:00 am						
Rules and Regs for on farm events and temporary kitchens – Kelly Bauer – Alberta Health Services	Evolution of a CSA (Community Supported Agriculture) - Tim & Brenda Vrieslaar (Noble Gardens CSA)	Portable Displays that Rock – Karie Wylie	New, Young and Diverse: How Aging Farmers Can Embody and Embrace the Next Generation – Nikki Wiart			N.
10:00 - 10:30 am - COFF	EE BREAK & TRADE SHO	W				NEW
10:30 am - 12:00 pm						\ E
Food Co-ops Innisfail Growers Celebrating 25 years – Shelley Bradshaw – Beck Farms / YYC Growers – Kye Kocher	Farmer Hacks – TBD	Small Business Accounting – Bookkeeping and Financials – Part 1  – Ian Stanley-Maddocks	Market Manager Meetup – Johwanna Alleyne – AFMA		TRADESHOW	VENTURE CONSULTATIONS
12:00 – 1:30 pm – LUNCH 12:30 – 1:30 pm – Annual General Meeting AFFPA						
1:30 – 2:25 pm						TA
What lurks beneath? – Soil borne diseases of Vegetables – Rob Spencer – AF	Creating a website that works for you – Dave Cruikshank Gaslamp Village Media Inc.	Small Business Accounting – Bookkeeping and Financials – Part 1 – Ian Stanley-Maddocks	Does and Don'ts at the Farmers Market – Kelly Bauer – Alberta Health Services (include textile labels)			SNOI
2:30 – 3:30 pm						
Events on your Farm – What you need to do to be successful – Nathan Zdrodowski – Shady Lane Estate	Ethnic Diversity and New Cropportunities – Rob Spencer – AF	Optimal Market Mix The 80/20 Rule – Eileen Kotowich – AF	Proposed Safe Food for Canadians Regulations and the PCP Plan – What will I need to do? – Craig Price – CFIA			
3:30 – Conference Ends						
Safe Travels						

#### **Beyond Sticky Traps:**

**Levelling Up Your Greenhouse Biocontrol** 



Two separate workshops, choose your date and stream when registering.

February 28, 2018 – Thiel's Greenhouses, Bruderheim (Floriculture Stream)

March 1, 2018 – Gull Valley Greenhouses, Lacombe (Vegetable Stream).

Time: 8:30a.m. to 4 p.m.

Cost: \$100 + GST

(Lunch and Coffee Included)

Do you carry your hand lens wherever you go? Get stoked over aphid mummies? Show everybody your banker plants? If so, you're not going to want to miss this workshop on advanced biocontrol. **Experts from all over North** America will be leading sessions on scouting, supplemental feeding of beneficial insects, nematodes and more, with an afternoon devoted to banker plant technology. Network with other growers and get all your questions answered by industry experts!



Register online or by calling

1-800-387-6030

(Do not pay online if you are exempt from paying GST. Instead, call to register.)









#### Integrating Nutrition and Biology toward Plant and Soil Health

Joel Williams | www.integratedsoils.com 6<sup>th</sup> March 2018, at the farm of Mans Organics, Coaldale AB

Some of the topics... also Vermicastings Extractor Demo... Greenhouse Tour... Compost Tea Brewing!

#### The Living Soil and Organic Carbon: The centrepiece of soil health

- · Defining a healthy soil in the context of soil chemistry, physics and biology.
- Functions, roles and interactions of life in agricultural soils.
- · Photosynthesis, root exudates and rhizosphere interactions.
- Mycorrhizal fungi, glomalin, aggregation and disease suppression.
- Supporting mycorrhizal fungi via management of environment, agronomics, rotations, inoculations, green manures and avoiding practices that suppress them.
- Soil disturbance cultivation and no-till, impacts on carbon cycling, aggregation, how to
  offset negative effects of tillage to support soil life.

#### Making the Most of Soil: Unlocking soil nutrients and improving input efficiency

- Leveraging existing soil fertility and optimising purchased inputs.
- · Understanding total, exchangeable, soluble nutrient pools.
- Cover crops and green manures diversity and digestion.
- · The role of carbon-input complexes in improving input efficiency and protecting soil life.
- The biological link to foliar applied inputs nutrition, photosynthesis and root exudates as drivers of soil health.

#### Plant Health and Integrated Pest Management

- Rethinking minerals and microbes optimising photosynthesis, crop quality and pest and disease resistance – are we 'thinking' the right way about plant health and pest problems?
- The management of disease, insects and weed pressure as an integrated nutritional and biological approach toward plant health.
- Plant nutrition functions of essential minerals, nutrient mobility, deficiency diagnosis.
- Weeds as indictors, fungal:bacterial ratio, detoxifying herbicides.







Joel Williams is an independent plant and soil health educator and consultant; a healthy soils advocate and passionate presenter on soil biology, plant nutrition and integrated approaches of sustainable farming. Joel has worked on conventional and organic farms improving biological practices in Australia and the UK where he integrates soil chemical and biological assessments along with plant nutritional analysis as a joined-up strategy for farm management. Joel has a Bachelor of Agricultural Science specializing in crop and soil sciences and a keen interest in managing soil microbial ecology and plant & soil nutrition to optimize crop immunity, soil health and soil carbon sequestration. He has a passion for teaching and sharing both scientific and practical knowledge on sustainable growing practices. Joel has recently relocated to Ontario and he has lectured to farming audiences in Australia, UK, Ireland, Netherlands, Latvia, South Africa, Kenya, Canada and the US.

Tickets: \$100/person - Coffee, Lunch, Snacks provided.

**Bookings:** Pre-Registration is required - <a href="https://www.eventbrite.ca/e/integrating-nutrition-and-biology-toward-plant-and-soil-health-tickets-42383587451">https://www.eventbrite.ca/e/integrating-nutrition-and-biology-toward-plant-and-soil-health-tickets-42383587451</a>

Location: Mans Organics, 102040 RR 200, Coaldale AB. Search for "Mans Organics" on Google Maps

Arrival/Registration: 8:00 am for an 8:30 am start. Finish: 4 - 4:30 pm

Queries: mail@mansorganics.ca









This workshop will provide potato growers with in-depth information on potato disease and insect pests, including identification, factors affecting incidence and severity, as well as management using a range of tools and techniques. Featuring both live and recorded speakers.

# Potato Pest Management



#### **Registration Information**

Dates: March 6, 2018

Sherwood Park and Ardrossan Rooms, Festival Place,

100 Festival Way. Sherwood Park, AB

March 8, 2018

Coast Lethbridge Hotel & Conference Centre, 526 Mayor Magrath Drive South, Lethbridge, AB

Registration deadline: February 27, 2018 Limit of 2 registrants per farm operation

Time: 8 a.m. registration. Sessions run 8:45 a.m. to 4 p.m.

Lunch and snacks provided, as well as reference material (one

copy per participant)

Cost: \$15/person (plus GST)

To register online visit:

https://eservices.alberta.ca/potato-pest-management-workshop.html

Do not pay online if you are exempt from paying GST.

Instead, call 1-800-387-6030 to register.









#### **Potato Pest Management – Tentative Agenda**

#### **Agenda**

8:00 - 8:45am - Registration / Mingling

8:45 - 9:00am - Welcome and Introductions

9:00 – 9:25am – The impact of pests in potatoes: Cost of control/management – Dr. Michele Konschuh (AAF) (LIVE)

9:30 – 9:50am – Late Blight – Dr. Khalil Al-Mughrabi (New Brunswick Department of Ag) (RECORDED)

#### 9:50 - 10:10am COFFEE BREAK

10:10 – 10:35am – Fusarium Dry Rot – Dr. Michael Harding (AAF) (LIVE)

10:35 - 11:00am - Potato Psyllids - Dr. Dan Johnson (U of L) (RECORDED/LIVE)

11:00 - 11:25am - Limiting Losses from Other Rots (Soft Rot, Pink Rot, Bacterial Ring Rot,

Pythium Leak) - Dr. Ron Howard (RJH Ag Research Solutions) (LIVE)

11:30 – 12:00pm – Wireworms – Management options – Dr. Wim Van Herk (RECORDED)

#### 12 - 12:45pm LUNCH

12:45 – 1:10pm – Blackleg – Dr. Ron Howard (RJH Ag Research Solutions) (LIVE)

1:10 – 1:35pm – Tuber Flea Beetle – Scott Gillespie (Scott C Gillespie Agronomy) (LIVE)

1:35 – 2:00 pm – Radar Pests (Verticillium Wilt, PVY, Colletotricum (Black Dot)) – Dr. Ron Howard (RJH Ag Research Solutions) (LIVE)

2:00 – 2:25pm – The role of weeds in pest management – Pam Hutchinson (U of Idaho) (RECORDED)

#### 2:25 - 2:45pm COFFEE BREAK

2:45 – 3:15pm – The importance of quality seed potatoes – Deb Hart (PGA) (LIVE)

3:15 - 4:00pm - Questions and Discussion - Q&A

Question Parking Lot (paper on each table) – read out during Q&A session









# (explore local 2018

# Webinar Series January - February

To register please visit our website at

www.explorelocal.ca/webinars

or online



#### January 9, 2018 – 9 a.m. MST

#### **Online Meat Marketing**

Farm direct meat producers know the importance of connecting to their customers online. Join Julia and Jered Serben, owners of Serben Farms near Smoky Lake, to discover how they sell pork, poultry, sausages and vegetables online, streamline customer connections and manage product deliveries and pick-ups. Julia and Jered will share the triumphs and challenges of building their online store.

#### January 17, 2018 - 9 a.m. MST

#### Staffing for a Seasonal Operation: Combining Agriculture + Guest Service = a Fun, Food, Experience for All

Sandee Krause of Krause Berry Farm in Langley, BC will share the human resource experiences & best practices they have gleaned from operating a farm direct marketing business for over 43 years. Sandee will discuss diverse topics from from attracting, on-boarding and retaining staff to effective communication.



#### January 31, 2018 – 9 a.m. MST Creating Top Notch Job Descriptions

Join HR industry expert Denise Burrell of The Performance Group as she shares insights and techniques for creating top notch job descriptions that deliver results. Denise will explore practical tools and techniques using simple templates to achieve the perfect combination of technical and performance factors for your business. Apply these techniques to build job descriptions that will attract new recruits to your business.

#### February 7, 2018 – 9 a.m. MST

#### Alberta Health Services Food Regulation for Farmers' Markets

Learn the ins and outs of the Food Regulation as it applies to food sold at Alberta approved farmers' markets. A public health inspector with Alberta Health Services will share the requirements you need to meet in order to sell your food products through this important sales venue.

#### February 14, 2018 – 9 a.m. MST

#### **Empowered Employees: Strategies for Successful Onboarding**

Please join us as HR industry expert Denise Burrell explores approaches addressing key challenges on-boarding new employees. Denise will provide insight on how good orientation practices can play a critical role in employee effectiveness and retention. Learn strategies to maximize your most important resource, your people.







# (explore local 2018)

# Webinar Series

March - April

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#### **Image-Driven Marketing**

Photographer and communications professional Bri Vos will demonstrate how to create and use images to draw customers in and strengthen your online marketing. Bri will touch on composition and characteristics of a strong photo, online resolution requirements, Facebook and Instagram analytics tools, online marketing strategies and much more.

#### March 28, 2018 – 9 a.m. MST

#### No Fear Farm Finance

What money do you have to invest in your local food business? What type of financing fits your business? How much credit should you carry? Join Ron Lyons as he demystifies the finance puzzle that many small agri-food producers, processors and local food entrepreneurs face as they grow their businesses.



#### April 4, 2018 – 9 a.m. MST

#### **Farm Direct Marketing Trends in Alberta**

Research tells us that in Alberta 78% of consumers made at least one purchase at a farmers' market in 2016. The value of food purchased at farmers' markets and farm retail exceeded one billion dollars and accounted for about 10 per cent of Alberta's annual household food expenditure. Join Mimi Lee to learn the key drivers for the increase in direct marketing sales and see recent statistics comparing direct marketing farms in Alberta with those in other provinces.

#### April 18, 2018 - 9 a.m. MST

#### The Alberta Employment Standard Code and You

With Alberta Labour opening a new office focusing on changes to the Employment Standards Code, this is your chance to learn how the changes will affect you as a local food business. Join Patricia Tolppanen to discover more about the Alberta Employment Standards Code.









#### Trends (and how to take advantage of them)

Lots of the time in conversation, when people start to talk about **trends**, the conversation leans over towards fashion or food, or these days, towards technology. Your "average Joe" generally won't be classified as a "trendsetter", but plays a role nonetheless. A trend is defined as "a general direction in which something is developing or changing", often associated with some object or tendency which a greater portion of the population picks up on and follows for a period of time; at least until the next trend current hits them.

Trends shift, change and happen all of the time. I'm not entirely sure who sets them. At times, I think it may well be a few groups of drunk/delusional monkeys housed in various regions of the world, but I can't confirm that impression, only present evidence gained at trips to various malls.

7 Food Trends on the Front Burner for 2018
Top 10 Megatrends in Agriculture
10 Food Trends That Will Shape 2018

Whether a trend develops in our horticultural world, or in our other circles of life, we are affected by them, directly or indirectly. People can, should and do spend a fair bit of time each year, looking at and analysing trends. Why? It is because trends represent potential opportunities for increased customers, sales and products. At a practical level, taking advantage of trends can range from actually shifting your practices or product offering(s) to capture the trend advantage all the way over to making no change, but simply shifting your wording, advertising or how you present yourself and your operation so as to shine the positive light of the trend on yourself.

For example, if one of the predominant trends (at a high level) is healthy eating, then this represents a chance for industry to 1) produce an assortment of recognizably healthy products, 2) add additional "trendy" or novel products that are right at the front of the curve or 3) spend some time promoting the health benefits of the various things that you are doing (which translates into a message that consumers should purchase said healthy stuff from you). You could grow kale (yuck), suggesting that you are a champion trend-follower and epic, or you could continue to grow broccoli and promote the (known) health benefits of broccoli, along with 10 other edible things.

Trends can also represent increased costs, expenses or barriers to what we do, so recognizing the ramifications of trends on your operation is critical. Some of the diet trends or health fad information can actually hurt your business, if you service the diet-trend-following crowd. For example, a few years back, there was some "literature" that suggested that potatoes were starchy and bad for you, rather than being a great source of nutrients and a healthy part of a balanced diet. Without recognizing and countering this information with factual information, it might have meant a decline in sales.

In lots of ways, working in, around and over changing trends is mostly about representing you, your business and what and why you do what you do to others. In some cases, you might add on things from time to time, but really, you mostly just have to explain yourself, so people understand how you fit into the trends. It isn't always easy to do, but by knowing and communicating with your customers, you can have a direct influence on how they fit you into their trend-following. Good luck.



# Q: What new trend do you see on the horizon? What are you doing to capitalize on it?

A: We are seeing more and more guests wanting smaller plants including trees and shrubs and I don't think this is going to go away. I am already working on bringing in smaller, more compact, trees and shrubs to help with this. (I know this is not new but it is what I am seeing in my department)

**A:** The new trend we are noticing is the use of social media to shop for plants. We have put in free Wi-Fi and use Facebook to advertise our specials, classes etc.

A: The local food movement is strengthening along

A: After Canada 150 with a lot of red and white, we see a lot of orders with a lot of other colors pink and orange leading the way, and then yellow. More large containers with high impact plans and flowers. Particularly the new Ipomea solar tower but also brugmansia and Canna. Ornamental grass remains popular as it offers variety in heights and color and texture. The grow-your-own edibles, this movement is alive and well. Educate the Millennials there are more of them than there were baby boomers. And we respond to all of these trends by offering products that fit the need and educate the Millennials so they can buy with confidence and succeed.

A: There seems to be a trend for people using kale less, especially last year. Will continue to plant less. Cauliflower and Brussels sprouts were hot last year. Will plant more cauliflower, especially the coloured cauliflower. We try not to get too worked up when some news article says \_\_\_\_\_\_ is going to be the next hot vegetable of the year. We go more by what has had an actual increase in sales and what feedback we are getting from customers.

**A**: I see ALOT of immigrants learning about Saskatoon Berries and U-Pick. Plan on taking time to teach them so bushes don't get wrecked and they tell all their new immigrant friends. Pin dropping is very useful to get new customers.

A: I think Haskaps will be a new fruit that can be grown and sold commercially. I've started an orchard of 1,200 plants to capitalize on this new fruit.

A: Robotics and artificial intelligence in agriculture, as well as increased automation. Currently, I'm learning - by searching the internet (especially YouTube), to see what is in use and what is on the horizon.

Next Month's ? → What is one thing that you do each winter which saves you time in the growing season?

#### Google Groups - HORT SNACKS FORUM

Google has all sorts of different features and tools. One that I ran across a couple of years ago is <u>Google Groups</u>. You can essentially create and join common interest groups or discussion forums and share information and ideas back and forth. You can alter the settings to get forum updates all the time, daily, weekly or whatever.

A few years ago, we created a HortSnacks Forum, tied to this newsletter. Anyone can submit posts (questions, comments, etc.) via Google or via email. To submit a question (or post), either log into the group using a Google account or simply send an email to <a href="hortsnacks-forum@googlegroups.com">hortsnacks-forum@googlegroups.com</a> and it'll send it to all members. You can reply from email or from Google.

To subscribe to the group, send an email from your email account to <a href="mailto:subscribe+hortsnacks-forum@googlegroups.com">subscribe+hortsnacks-forum@googlegroups.com</a>
Try it out today!

### <u>MENTAL SNACKTIME – Capitalization /</u> Advantage

"An organization's ability to learn, and translate that learning into action rapidly, is the ultimate competitive advantage." – Jack Welch

"Expect the best. Prepare for the worst. Capitalize on what comes." – Zig Ziglar

"One advantage of talking to yourself is that you know at least somebody's listening." – Franklin P. Jones

"What you have, what you are - your looks, your personality, your way of thinking - is unique. No one in the world is like you.

So capitalize on it." – Jack Lord

"A lot of people resist transition and therefore never allow themselves to enjoy who they are. Embrace the change, no matter what it is; once you do, you can learn about the new world you're in and take advantage of it." – Nikki Giovanni

"Hype is wonderful when it happens, and you should capitalize on it. But you shouldn't bank on it being the thing that will take you to the next step. Because it's fleeting. The blah-blah goes away, but you're still there." – Tatiana Maslany

#### Ideas from the GLEXPO 2017 Tradeshow

Every tradeshow has a few new things, a few familiar things and a few hidden gems that make you do a double-take. The Great Lakes Fruit, Vegetable and Farm Market Expo tradeshow always delivers. There wasn't anything earth-shattering, but there was some pretty nice looking equipment.

The following are a few of the things that stood out to me as having some potential for use in the Canadian Prairies.



#### Left: Industrial Cherry Pitter

This "little" beauty is probably beyond the size and scale that most prairie cherry growers would need, but it would be a nice fit if you had a good sized orchard. It would also meet every food safety requirement you could ever want.

#### Below: Backpack Sprayer

At first glance, this backpack sprayer looks like a leaf blower, but I suspect it acts a bit like a backpack air blast sprayer, although I'm not sure about the pressure and droplet size flexibility. Either way, it looked pretty compact and rugged.







#### Above: 3 Caps Mushrooms (www.3caps.com)

This operation was selling kits for growing mushrooms onfarm. It was presented as an income supplement or a fulltime venture, depending on preference. They sold kits for Shitake and Oyster mushrooms. Their tag line is "3 Caps handles the science – You handle the growing"



These sweepers can be used for a range of tasks in farm operations. They are versatile and thorough in their pick up, with disc and roller brushes. They are battery-operated, but can be run by hand with an empty battery.







# Below-Left: Terrainables Barrel Carts (www.terrainables.com)

I've seen dozens of versions of amateur professionally-built cart trains. These ones looked pretty simple and well-designed.

#### <u>Left: Cultivators /</u> Weeders

There are many different weeders/cultivators out there to work with a range of crops. I like how these 2 different ones could be ganged up and come at weeds in different ways. The basket/wire weeders are nice for small weeds between rows (I've seen them belly-mounted on a tractor). The Kult weeder does a few different things. They both looked sturdy and durable.





#### Left: Vacuum seeder:

These are a high quality vacuum seeder. There are other versions of them out there, but I liked the look of this one. Of course, when it comes to precision-seeding, you don't have to use a vacuum seeder, but you can.

# Left: Photo booth Outlines

Anywhere there is an agritourism component to an operation, there seems to be a need for photos. In a selfie-rich society, having places where people can take a picture that relates to your offering, is important. These could work.

#### Right: Short-bush fruit harvest-aid

This easy harvester, built and supplied by Phytocultures (<a href="www.phytocultures.com">www.phytocultures.com</a>) out of Cornwall, PEI, is several steps up from the kiddie pool or the umbrella, without the cost and automation of a full-blown harvester. It seems to be rugged and reasonably flexible, especially for low growing crops like Haskap.











#### Above: A&B Harvester

This in one of many types of self-propelled, over-the-row harvesters that you can find in the market. This one seemed to be a version of enclosed side row harvester. Instead of splitting and laying down half of the row at a time (requiring 2 passes), it did it all at once. I also liked how the fish plates and the machine were guite low to the ground, which would work for low crops.







#### Left/Below: Littau Harvester

I've seen some really old Littau harvesters in Alberta, but this new, over-the-row, self-propelled version was pretty spiffy. The beater/shaker rods were quite robust and chunky. It was a monster machine.



#### <u>Left: Sprayer Shields</u> (<u>www.carrarospray.it</u>)

This company makes a range of sprayers for vineyards, orchards, etc. These brushes seem like they go on a multi-armed shielded sprayer rig for multi-arm/multi-angle orchard spraying. The brush shields would appear to help contain the spray.



February 2018

# INSECTOFTHE MONTH

Cabbage / Root Maggots

A.K.A. Root maggots, Cabbage root maggots *Delia radicum* 

**Crops Affected:** Cruciferous crops (cabbage, cauliflower, Brussels sprouts, broccoli, radish, rutabaga, turnip, and other Cole crops); canola, mustard, cruciferous weeds

#### Life Cycle:

- 2-3 generations per season, depending on the year and the location
- Adults are flies
- Larvae are legless
- Flies emerge in spring from overwintered pupae (timing depends on the weather and soil conditions)
  - Fly emergence in the Prairies occurs around the time when Saskatoon berries and Pin cherries start to bloom
- Peak adult activity is generally from mid to late June to after mid-July
- Eggs are laid in the soil near host plants
  - Survival of eggs and new larvae is highest during cool, moist weather
- Larvae feed on fine root hairs of the plant and eventually burrow into the tap root

#### Symptoms:

- Larvae feed on host plant roots and burrow into the tap root
- Root damage is usually most severe during cool, wet weather
- Severe infestations will destroy or stunt young plants
- Growth, yield and quality will be reduced on larger plants
- Severity of damage is influenced by weather (temperature and moisture)

#### Monitoring:

- Use sticky traps or sweeps in spring to watch for adult flies
- Pull sample plants from across the field, ensuring tap root is left intact
  - o Look for signs of larval tunneling, with channels evident on the outside of the root
- Yellow-pan water traps can be used to monitor seasonal activity but they are unreliable indicators of overall infestation

#### Management:

- Application of registered insecticides at appropriate times (e.g. at or just after planting) to protect early and late crops, and all root crucifers (e.g. radish, rutabaga/turnip); subsequent treatments may be required
  - Typically a drench application (after transplanting)
  - o Subsequent treatments may be required
- Delayed plantings (approximately mid-June) may reduce incidence and severity, as plants and roots will be better developed when eggs are laid, and egg survival may be reduced by warmer/drier weather
- Use appropriate crop rotations
- Make control decisions based on the influence of weather on egg and larval survival – hot, dry weather favours reduced egg/larva survival
- Tillage prior to seeding or winter can reduce survival of pupae

#### **Onion Maggots**

Delia antiqua

**Crops Affected:** Onions, chives, garlic, leek and shallot Life Cycle:

- Overwinters in the top 15cm (6 inches) of the soil as a pupa
- Pupae start to develop in spring when soil temperatures go above 4°C
  - o Emergence of adults will vary with depth and temperature
  - Typically 300 degree days (base temperature = 4°C)
- Adults disperse until they are sexually mature (usually 5-7 days), then mate in and around onion fields (adults are drawn to onion odours)
- Females lay eggs around the stems of onion plants just below the surface of the soil
- Larvae (creamy white, legless and tapered to one end, with 2 black mouthhooks) crawl towards onion roots to feed until they are mature and then will pupate
- There may be more than one generation per year, depending on the location

#### Symptoms:

- Initial populations of larvae tend to be clumped, resulting in multiple plant death
- Plants are most sensitive when they are small
- Very young plants may wilt and disappear
- 2-3 leaf stage plants may turn grey, wilt and then turn pale green/yellow
  - o plants remain in the row but break off below the soil surface when pulled
  - feeding maggots may be visible inside the rotting stem
- Older plants may have few above ground symptoms but may have misshapen bulbs with secondary rots

#### Monitorina:

- In some regions, the use of yellow or white sticky traps can be used to detect peak population activity
- The use of traps in high wind environments is not likely to be useful

#### Management:

- Ensure plants are healthy, as this can reduce later generations (prefer to lay eggs on diseased or damaged plants)
- Avoid mechanical damage to bulbs throughout the season
- Remove cull onions from the field before later generation egg laving
- Working in cull onions in the fall should be delayed until after fall flight activity
- Encourage natural predators, parasites or control organisms through careful applications of pesticides
- Application of registered chemicals according to label instructions – most effective when applied in furrow at planting to control initial generations
- Foliar applications can control flying adults during peak periods

# DSESEOFTHE MONTH

#### Common Blight / Halo Blight

Causal Organisms: Xanthomonas campestris pv. phaseoli / Pseudomonas syringae pv. phaseolicola Crops Affected: beans (edible pod beans – green, yellow; dry beans)

#### Disease Cycle:

- Bacterial pathogens
- Seeds are the primary source of inoculum
  - Seeds may become infected on the plant or during harvesting or cleaning
  - o Bacteria can survive in/on the seed for prolonged periods (years)
- Contaminated soils, plant material (debris, trash, residues), or equipment may also provide an source of inoculum.
- Bacteria infected systemically (within) or over the surface of the plant, entering via wounds or natural openings
  - Spread by splashing water, contact with people, insects, animals or machinery
- Disease development is favoured by wet, windy weather conditions.
- Cooler temperatures (16-20°C) favour Halo Blight and warmer temperatures (25-30°C) favour Common Blight Symptoms:
- May be difficult to distinguish from each other in the field laboratory analysis is required
- Distinct areas of infection may be visible in the field

#### Common Blight

- Initial symptoms appear as water-soaked spots that gradually enlarge
- Lesions turn brown and have irregular margins with a narrow yellow border
  - o Lesions become larger and join together, giving the leaves a necrotic, burnt appearance
- Pods may be affected; lesions are circular and look greasy and grey initially, later become sunken and dark red-brown
- Seed may be shrunken and give poor germination
- A yellowish bacterial deposit may be seen on pods and seeds

#### Halo Blight

- Symptoms initially appear on lower leaf surfaces
- Small water-soaked spots that become necrotic and are surrounded by a yellow-green zone of tissue
- Severely infected plants may have a general chlorotic appearance
- Bacterial ooze can give the lesions a greasy, water-soaked appearance
- Pod lesions are generally red, brown or green and may appear water-soaked and may have a crusty white bacterial deposit
- Infected seeds may appear normal or may be shrivelled with poor germination

#### Management:

- Use disease-free seed
- Maintain an adequate crop rotation
- Bury crop residues to accelerate breakdown
- Control alternate host weeds or volunteers
- Sanitize equipment regularly, removing all soil and crop residues
- If infection is observed or conditions are suitable, minimize movement through the fields
- Chemical seed treatments or foliar sprays may reduce disease levels to some degree