



Country Living

Provided to you by the

OSU Extension Service Columbia County

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Office hours: Monday-Friday, 8 a.m. to 5 p.m.

The office will be closed Fridays from Noon to 1 p.m.

Website: <http://extension.oregonstate.edu/columbia/>

April 2014

Programs for you . . .

Listen to the Gardening Spot on KOHI (1600 am) radio - Every Saturday, 8:05 to 8:15 a.m.

- Apr. 1..... Scappoose Bay Watershed Council. 7 p.m., Scappoose Bay Watershed Council's office, Warren
- Apr. 3..... Demonstration Garden and other MG Extension Projects Planning Meeting. 3:15 p.m., OSU Extension Classroom, St. Helens
- Apr. 3..... Master Gardener™ Board Meeting. 3:45 p.m., OSU Extension Classroom, St. Helens
- Apr. 5..... Nob Hill Nature Park Volunteer work party. 1-4 p.m., pre-registration requested 503-397-7904
- Apr. 5..... 9th Annual 2014 Small Acreage Expo. 8:30 am to 3:30 pm, Vancouver WA \$10 fee or \$20 w/lunch. Register at smallacreageexpo.brownpapertickets.com - view session topics at www.facebook.com/smallacreageprogram
- Apr. 8..... Lower Columbia Watershed Council. 7 p.m., SWCD office-35285 Millard Rd., St. Helens
- Apr. 12..... Nob Hill Nature Park Stroll. 2-4 p.m., call for directions: Caroline Skinner 503-248-9719
- Apr. 16..... Soil & Water Conservation District. 7:30 p.m., SWCD office-35285 Millard Rd., St. Helens
- Apr. 24..... Master Gardener™ Chapter Meeting. 6:30 p.m. Speaker will be Jenny Rudolph, "Drying Fruit," OSU Extension Classroom, St. Helens. **The public is invited. Free.**
- Apr. 24..... Upper Nehalem Watershed Council. 7 p.m., Vernonia Grange, <http://nehalem.org/> 503-429-0869
- Apr. 26..... 19th Annual Spring Garden Fair, by Columbia County Master Gardeners™. 9 a.m. to 3 p.m. St. Helens High School. Over 5,000 tomato plants from 30 varieties at \$1.50 a plant.

Chip Bubl

Chip Bubl, OSU Extension Faculty, Agriculture



Agriculture, Family and Community Development, 4-H Youth, Forestry, and Extension Sea Grant Programs. Oregon State University, United States Department of Agriculture, and Columbia County cooperating. The Extension Service offers its programs and materials equally to all people.

In the garden

Vegetable gardening tips

☐ To give seedlings and transplants a “jump start”, make sure phosphorus is available in cold soils. Do this by banding super phosphate (0-20-0) under the seeds or transplants. Make a three inch deep furrow (for seed) or a six inch deep furrow for transplants in the planting area. Into this furrow, evenly sprinkle one-half cup of super phosphate per 40 linear feet of bed. Cover the band of phosphate with two inches of soil. You can use a high phosphorus transplant drench several times as a substitute. African violet fertilizers would work well.

☐ You can warm soils with clear plastic a week or so before planting. This can raise the temperatures by 15-20 degrees. If using transplants, cover them with row covers after you remove the plastic to plant. If planting peas, corn, squash, cucumber, or bean seeds, cover the plot with the plastic until the seeds just start to emerge. Pay attention. Make sure the plot stays watered. Then remove the plastic and put on row cover if you have some.

☐ For best results, select transplants that are about as tall as they are wide, dark green in color, vigorously growing, and free of spots on the leaves.

☐ When thinning larger plants, use a knife or scissors to cut the stem at ground level. This thins the plant population effectively (which you need to do to get good plant vigor) and does not damage the root systems of the remaining vegetables. Pulling plants can damage the remaining plants.

It's all about heat

Some years ago, I watched an experiment in Cowlitz County conducted by the now retired

WSU Extension agent Joe Kropf. Row covers were new and he wanted to see whether they made a difference in growth and maturity for vegetables like peas that are often planted when soil temperatures are quite cool.

Two plots were laid out and one row was covered in row cover after planting. The cover was kept in place for about 40 days and then permanently removed to trellis the peas. The other row was trellised but had no row cover. Planting time was early March.



Both rows were evaluated in late May. The uncovered peas were starting to bloom and set peas and had a height of about 36 inches on the trellis. The row-covered peas were in full production and had been for several weeks. They had climbed to over five feet on the trellis! Yield when all the picking was done was about 40% greater on the row-covered peas. This was a graphic demonstration of the value of early heat for “cool-season” vegetables.

Below are some minimum soil temperature and ideal soil temperature comparisons for vegetable seed germination:

<u>Vegetable</u>	<u>Minimum</u>	<u>Optimum</u>
Peas	40°	75°
Beans	50°	80°
Corn	50°	90°
Squash	60°	95°
Peppers	60°	85°
Onion	35°	75°
Spinach	35°	70°

The closer you get to the ideal temperature, the faster seeds emerge and start growing.

More from the garden

Squeeze soil before rototilling or spading

Don't get too ambitious with your rototiller. Working wet soil can really ruin soil structure and leave you problems you will fight all summer.

Tilling wet soil compacts clay into hard clods and damages natural drainage. You don't want brick-like clods. And when



drainage is degraded, moisture is held longer in the soil profile and soil temperature increases slowly. Our vegetables like

warm soils and a nice mix of oxygen and moisture around their roots.

If your soil contains even moderate amounts of clay (and most in Columbia County do), tilling with the right moisture content is critical. To find out whether the soil is ready for tilling, take a handful of soil and squeeze it into a ball. If slight pressure from your fingertips causes the soil to crumble, the moisture content is just right. If it holds together in a tight ball, wait to till. It is not enough to check the top several inches of soil. You need to check soil as deep as you intend to till. Patience is a virtue.

Adding organic matter to garden soils

Organic matter is a valuable addition to all gardens. It improves soil textures and adds nutrient holding capacity to the soil. The stimulation of biological life as the material breaks down can reduce disease problems.

However, adding organic matter can tie up nitrogen for a period of time. This can hurt plant growth, especially annual flowers and vegetables. The degree of tie-up relates to the relative amounts of humus and undecomposed residues in the material. If the material has completely composted, there is almost no tie-up. If the material is mostly "raw", the tie-up can be substantial.

The way around the problem is to add extra nitrogen to feed the decomposer organisms. A standard recommendation is to add an extra 3#s of actual nitrogen for each cubic yard of organic matter. This is in addition to the fertilizer needed for the crop itself.

So how do you figure how much to add? If you use a synthetic source of nitrogen like urea (46-0-0) or ammonium sulfate (21-0-0), calculate the extra N based on the percentages in the material. For ammonium sulfate that would be $3/.21 = 14$ pounds. Urea would be $3/.46 = 6.5$ pounds. Some organic fertilizers have about 7% N, thus you need $3/.07 = 43$ pounds of the fertilizer.

Remember, these amounts are in addition to the fertilizer you planned to apply to feed your vegetables (usually another 3-4 # of actual nitrogen/1000 square feet) or flowers.

We have a great publication called *Fertilizing Your Garden* available on-line at <http://ir.library.oregonstate.edu/xmlui/bitstream/handle/1957/19239/ec1503.pdf>.

Blackberry varieties for Oregon

Raspberries can be exasperating due, mainly, to root disease problems. But the blackberry group (Marion, Boysen, Logan, Triple Crown, etc.) is very adapted to Columbia County. Here is a new pub *Blackberry Cultivars for Oregon* from OSU on the subject:

<http://ir.library.oregonstate.edu/xmlui/bitstream/handle/1957/44998/ec1617.pdf>



That's the Way it Grows

Spring Bulbs are A-bloomin!

Spring has finally poked its head out from under the umbrella. I see blooms and new growth all over now.

I so love to see all the spring bulbs up and blooming. The clumps of cheery daffodils are such a welcome sight, heralding in the beginning of spring. Too soon they all are gone, along with the hyacinths and tulips. The Great Camas will be showing up soon. A native NW bulb, it sends up small, periwinkle blue star-shaped flowers en masse. The muscari, or grape hyacinths, have naturalized themselves in my lawn from the hillside above. Like the camas, they propagate from bulb and seed.



I plant tete-a-tete daffodils in my lawn every few years. They come up before the first mowing and look so pretty. But the mower gets them eventually, and they don't survive. Bulbs need the top growth to feed them. Ideally, the foliage should be left until it withers, indicating the bulb is hardened off, like an onion for storage. That's not really possible in a lawn that is mown, so I just replant.

Most spring flowering bulbs require little maintenance, but if you notice that you are not getting as much bloom this year, then dig and divide this fall to renew vigor.

Spring Gardening Begins

Somehow, all the mundane tasks that go along with having a yard or garden seem fun in the spring. Well, maybe just a little. It just feels so wonderful to get outside on a warm, sunny day and dig in the dirt. After so many months of cold, dark and wet, a beautiful sunny day requires that you go outside and do *something*.

We spent the first weekend of spring break clipping, pruning, mowing, weeding and transplanting, and it was great! The yard looks amazing again and the fruit trees are already

starting to bloom.

Blooming fruit trees means time to put out the bees. I hung up my mason bee house and set the little box of bee cocoons out to hatch. Within an hour of taking the bees out of the refrigerator, I already had one hatched. By now, they have used up their fat stores and need to get out and feed. The boys are the first to emerge, and they are buzzing around the bee house, poking their heads into tunnels, looking for the girls right now.

I have many other spring tasks to get done:

Cut back the coreopsis and Shasta daisies. Herbaceous perennials die back in the fall, after going to seed. They provide food for wildlife over the winter. Now is a good time to trim them back, before the new growth gets in the way of clippers. The same goes for ornamental grasses.

Seed bare patches of lawn. I am moving a raised bed frame to another location, which leaves a 4x4 bare spot in the middle of the lawn. I need to seed this now, before weeds start. Early spring is a great time for it.

Plant potato seed in the relocated raised bed frame. Last year's spuds did fantastic, but I was only able to mulch them about 16 inches deep, so they fell over. This year, I am stacking two frames so I can bury the stems even deeper this year.

Remove the black plastic from the vegetable garden and plant onions and cool season crops. The soil is perfect right now. Having been protected from the rain and compaction, it is loose and just damp, not wet. And the best part may be that there are no weeds!

Buy my tomato starts from the Master Gardeners' Spring Garden Fair. All that variety and those gorgeous plants...gotta get them! The hardest part is narrowing down what varieties I want.

Happy Spring at last!

—Lisa M. Long
Columbia County Master Gardener™
Smashwords.com/profile/view/LisaMarieLong

APRIL 2014



Garden hints from your OSU Extension Agent

Oregon State University Extension Service encourages sustainable gardening practices. Always identify and monitor problems before acting. First consider cultural controls; then physical, biological, and chemical controls (which include insecticidal soaps, horticultural oils, botanical insecticides, organic and synthetic pesticides). Always consider the least toxic approach first.

All recommendations in this calendar are not necessarily applicable to all areas of Oregon. For more information, contact your local office of the OSU Extension Service.

Planning

- Write in your garden journal throughout the growing season.
- Prepare garden soil for spring planting. Incorporate generous amounts of organic materials and other amendments, using the results of a soil analysis as a guide.
- Prepare raised beds in areas where cold soils and poor drainage are a continuing problem. Incorporate generous amounts (at least 2") of organic materials.
- Use a soil thermometer to help you know when to plant vegetables. When the soil is consistently above 60°F, some warm season vegetables (beans, sweet corn) can be planted.

Maintenance and Clean Up

- Allow foliage of spring-flowering bulbs to brown and die down before removing.
- Apply commercial fertilizers, manure, or compost to cane, bush (gooseberries, currants, and blueberries), and trailing berries.
- Place compost or well decomposed manure around perennial vegetables, such as asparagus and rhubarb.
- Cut back ornamental grasses to a few inches above the ground, in early spring.
- Cover transplants to protect against late spring frosts.
- Optimum time to fertilize lawns. Apply 1 lb. nitrogen per 1,000 sq.ft. of lawn. Reduce risks of run-off into local waterways by not fertilizing just prior to rain, and not over-irrigating so that water runs off of lawn and onto sidewalk or street.
- Optimum time of year to dethatch and renovate lawns. If moss was a problem, scratch surface prior to seeding with perennial ryegrass.
- Prune and shape or thin spring-blooming shrubs and trees after blossoms fade.

Planting/Propagation

- Plant gladioli, hardy transplants of alyssum, phlox, and marigolds, if weather and soil conditions permit.
- It's a great time to start a vegetable garden. Among the vegetables you can plant, consider:
 Broccoli, Brussels sprouts, cabbage, carrots, cauliflower, chard, chives, endive, leeks, lettuce, peas, radishes, rhubarb, rutabagas, spinach, turnips.

Pest Monitoring and Management

- Clean up hiding places for slugs, sowbugs, and millipedes. Bait for slugs; iron phosphate baits are safe to use around pets.
- Monitor strawberries for spittlebugs and aphids; if present; wash off with water or use insecticidal soap as a contact spray. Follow label directions.
- If necessary, spray when flower buds appear for apple scab, cherry brown rot, and blossom blight. See EC 631, Controlling Diseases and Insects in Home Orchards
- Cut and remove weeds near the garden to remove potential sources of plant disease.
- Use floating row covers to keep insects such as beet leaf miners, cabbage maggot adult flies, and carrot rust flies away from susceptible crops.
- Help prevent damping off of seedlings by providing adequate ventilation.
- Manage weeds while they are small and actively growing with light cultivation or herbicides. Once the weed has gone to bud, herbicides are less effective.
- Spray stone fruits, such as cherries, plums, peaches, and apricots for brown rot blossom blight, if necessary.

Columbia County Master Gardener™ Association's
19th Annual

Spring Garden Fair

April 26, 2014

9:00 AM – 3:00 PM

St. Helens High School Commons

2375 Gable Road, St. Helens, Oregon

free parking - - please carpool
free admission - - ATM on-site - - shop indoors & out

Dozens of local vendors will offer annuals, trees, perennials, shrubs, trellises, garden art, vegetables, ceramics, herbs, containers, hanging baskets and more.



Certified Master Gardeners will offer 5,000 tomatoes in 30 varieties for only \$1.50 per plant, tomato and general gardening information, raffle tickets, hourly prizes and displays.

Raffle tickets are on sale now for \$1 each from many Master Gardeners and at the OSU Extension Service in St Helens.

Visit our website: www.ColumbiaCountyMasterGardeners.org
Click on the *Chapter News* tab > *Photo Galleries* > *Spring Fair*



Presented in cooperation with
OSU Extension Service, Columbia County
505 N. Columbia River Highway, St. Helens, Oregon 97051
(503)397-3462



The Grapevine
 News for Columbia County Master Gardeners™
www.columbiacountymastergardeners.org
April 2014



Deadline for THE GRAPEVINE - All materials will need to be into the OSU Extension office no later than the 20th of each month.

President's Corner

Greetings! What a busy (almost) Spring it has been. We held two grafting classes - Clatskanie and St. Helens. Thanks to all the help from LeRoy Schmidt, Ross Carter, Kathy Phelan and my wife Susan, the classes went smoothly.

Last weekend we had the pruning clinic at the Demonstration Garden, 25 to 30 of the public attended. Thanks to Ross, LeRoy, Kathy Johnson and Susan this event went well also. We also had Lavina Patterson and the bug crew with display and information. We were blessed with good weather - no rain.

Earlier (late January) Ross, myself and our wives went down to Yoncalla to collect scion wood from the Nick Botner orchard. What an experience this was! Nick has a collection of over 4400 varieties of apples, plus over 200 varieties of grapes. This was a mind boggling experience. He is 87 years old and the farm is for sale. The Home Orchard Society has been hard at work duplicating all of the trees and they will be relocated on 40 acres between Canby and Molalla. This collection is a treasure and it is wonderful that it won't be lost.

Last weekend was the Home Orchard Society scion wood exchange at Canby; Ross, myself and our wives attended. Who did we see collecting more scions? Nick Botner - I guess I'm not too old to add a couple more apples to my collection.

Happy Gardening!
 --Dennis Snyder

Volunteer Payback

LOG YOUR HOURS, and turn them into Extension office. Hours worked by veteran as well as new Master Gardeners™ accumulate to justify continuance of our program through OSU.

To get a form off the web:
<http://extension.oregonstate.edu/columbia/master-gardener-volunteer-program> choose Master Gardener™ Volunteer Log Sheet – word document or PDF.

Calendar: At-A-Glance

- || Apr. 3.. Demonstration Garden and other MG Extension Projects Planning meeting, 3:15 p.m., Extension office
- || Apr. 3.. Board Meeting, 3:45 p.m. Extension office
- || Apr. 7.. Demo Garden works begin on Mondays, 10 a.m. to Noon
- || Apr. 24. Chapter Meeting, 6:30 p.m., Speaker: **Jenny Rudolph, Dennis Snyder and Ross Carter**, OSU Extension Classroom, St. Helens (Dennis and Ross are avid fruit dryers and will demonstrate food dryers.
- || Apr. 25 Spring Fair Set-up
- || Apr. 26 Spring Fair, St. Helens High School



Notes from your Treasurer

If you will make approved purchases and will expect reimbursement, remember to hang on to those receipts get them to me within 90 days.

As of this writing we have 92 members. For those of you who have not yet sent your \$10.00 checks, make them payable to CCMGA, mail to me at 265 S.13th St., St. Helens, 97051, turn them in at chapter meetings, or drop them off at the Extension Office. Remember to include any changes in your contact information.

Gail Martyn, Treasurer
 CCMGA.Treasurer@comcast.net
 503-397-5537

Saturday Market

The start date for the Scappoose Saturday Market is May 17th (MG plant clinics go thru July) from 9 a.m. to 2 p.m. The Master Gardeners will have an information booth again this year. Please call or e-mail me if you can work in the booth on Saturdays during the season.

--Dennis Snyder - 503-366-5332 or dcsnyde44@hotmail.com





Calling All Master Gardeners

Raffle tickets are now available for the **Columbia County Master Gardener Annual Spring Fair** to be held April 26 at the St. Helens High School from 9:00 a.m. to 3:00 p.m. More than ever we need the support of all Master Gardeners to sell tickets. The contributions from the proceeds we receive from the Spring Fair raffle help us continue our educational programs. Tickets are available to sell or for purchase at the county extension office as well as the next Master Gardener meeting. Help make this year's fair the best ever. Your support is appreciated.

--Spring Fair Raffle Committee: *Debbie Broberg at 503-366-7850*

SPRING FAIR, APRIL 26th

The Columbia County Master Gardener's Association 19th annual fundraiser is *a mere few weeks away!*



There are about 32 varieties of tomatoes, Over 5000 tomatoes to be sold for \$1.50 each

It is with great pleasure that I THANK the COMMITTEE CHAIRS for their Extensive Hours and Tireless Efforts to make this event a success. They have done a **GREAT JOB!**

If you haven't had the opportunity and you would like to sign up to work at the Spring Fair - It's not too late.

All Volunteers who have signed up to work the morning hours are to report to the High School at 7 a.m. on April 26th. Mid-day Volunteers are to come at noon.

Please remember to wear your Master Gardener Badge and your Master Gardener T-shirt should you have one. Ladies, remember to leave your purses home.

From 6 a.m. on the April 26th until 9 a.m. we will be setting up the Spring Fair.

Doors to the Public will open at 9 a.m. and close at 3 p.m.

When the doors close at 3 p.m. Clean-up of the high school will begin.

All Committee Chairs will have prepared for each of the Volunteers a "TO DO" List that will be handed out either at the business meeting on April 24th or in the morning of Saturday, April 26th.

Any Volunteers who wish to help with the setup on Friday April 25 at the High School may

show up at 3:15 pm and work until finished. If you work with us to setup on Friday night, you will be able to purchase tomatoes. Otherwise, you will not be able to purchase your tomatoes till 9 am on Saturday. Otherwise, you will not be able to purchase your tomatoes until 9 a.m. on Saturday.

Remember to keep track of the hours spent working the Spring Fair! This can be used as payback.

Have fun everyone, I and the Spring Committee Chairs will see you at the Spring Fair!

--*Katherine Johnson, Spring Fair Coordinator*

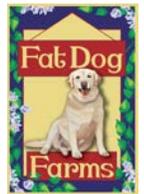
Save those boxes!

The Spring Fair Committee are asking you to do us a favor and start saving boxes for us to use at Spring Fair. Customers of Spring Fair last year truly appreciated having the boxes to use for all of their shopping enjoyment. Thank You, --*Spring Fair Committee*

Fat Dog Farms Annual Spring Sale,

May 17, 9am-4pm. 32134 Cater Road in Warren, OR. There will be several vendors that sell a variety of plants, veggie starts, mason bees, mason bee supplies, unique handmade garden art, homemade soaps, and lots more!. Visit

www.fatdogfarms.com



Master Gardeners Contacts Officers for 2014

Title	Name
President.....	Dennis Snyder
Vice President.....	Wes Bevans
Past President.....	LeRoy Schmidt
Secretary	Susan Snyder
Treasurer	Gail Martyn
Historian	Kit Gardes
OMGA Rep	Kathy Johnson
OMGA Alt. Rep.	Larry Byrum
Demo Garden.....	Linda Bainbridge
.....	Kit & Chip Gardes
Spring Fair.....	Kathy Johnson

CCMG website: www.columbiacountymastergardeners.org

Webmaster

OSU Extension Service:

Extension Faculty ..

Secretary

Guide to Plant Disease Control:

OSU <http://plant-disease.ippc.orst.edu>

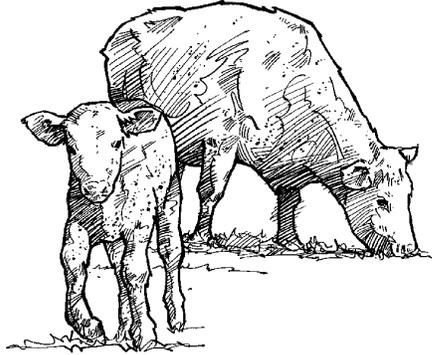
Farm and livestock notes

Spring weed control and other topics

If we get a few dry days, you should be prepared to get some weed spraying done in the next two months. Prime targets include tansy ragwort, Canada and bull thistle, horsetail (a long-term project) and perhaps oxeye daisy. Depending on the size of your pastures and the weed density, you may need a boom sprayer set-up or you might be able to get by with a backpack sprayer. Tansy is best sprayed by mid-May in the St. Helens area and perhaps a week later in Vernonia and Clatskanie/Rainier. Once it really starts bolting to flower, herbicides lose their effectiveness. Canada thistle and horsetail control is complicated. Stage of growth and herbicide applied has to be in sync for good results. For more information on specific products you might use, talk to your ag rep, give me a call, or go to our PNW Weed Handbook on line at <http://pnwhandbooks.org/weed/>.

A strong grass pasture is the best defense against many weeds. Fewer bare spaces leads to less opportunity for weed seeds to germinate. It isn't too late to fertilize your pasture. Rotating your livestock on small pasture blocks for short periods of time can improve your pasture. Moveable electric fencing makes this fairly easy. If you are thinking about replanting, give me a call. It is difficult to over-seed a pasture unless there are lots of bare areas and you can keep the livestock off of it through the early summer.

Make sure to provide magnesium blocks and/or supplements to prevent grass tetany. April, May, and June are the most common months for this often fatal disorder.



The evidence that cow disposition makes a difference in breeding success, gain of her calves, and other areas of cow performance continues to accumulate. Cows that are flighty or just plain ornery should be culled for the sake of your bottom line and your personal safety when handle the herd.

Plan now for fall pasture seeding

Ground that you intend to plant to a new pasture this fall should be worked this spring. This gives the existing sod and weeds some time to decompose. Grass doesn't usually do well seeded into freshly tilled sod. Often there is an advantage to planting a crop of oats after plowing and disking this spring. The oats can handle the rough seed bed and should produce a nice crop of oat hay in July/August. You will need some nitrogen fertilizer to get good tonnage. After the oats are removed, continue to disk periodically to kill the weeds and further break down the sod. Plan on seed the pasture mid to late September.

Other livestock chores

- ✓ Get hay equipment tuned up or someone to bale your hay lined up.
- ✓ Worm livestock now. Talk to your vet.
- ✓ Get any vet work for bull done.
- ✓ Stay current on vaccination programs for calves and lambs.

New publication for feeding meat chickens

Dr. Jim Hermes has revised his OSU pub on feeding meat chickens. You can access it at <http://extension.oregonstate.edu/catalog/html/pnw/pnw658/>

Porcine Epidemic Diarrhea Virus (PEDv)

PEDv has been relatively common in Asia and Europe since the 1970s. The first US case appeared in Iowa last May (2013) and has now spread to 26 states, some of them close to Oregon such as California, Idaho, and Montana. To date, this disease has killed an estimated one million pigs in the US alone.

Clinical Signs

The clinical signs of disease are very age-specific; being much more severe in younger animals. In suckling pigs (less than 7 days old) there is profuse, watery diarrhea which is often yellow in color. In many cases, the pigs also vomit, lose their appetite, become dehydrated and die. It generally affects entire litters and up to 50-100% of the litter may die. Pigs over a week of age typically recover.

When older animals (nursery, grower, finisher, sows, boars) become infected they may go off feed for 2-4 days, have loose manure (similar to a cow pie) and vomit. The death rate is very low in post-weaning animals (1-3%) but the entire herd may have clinical signs after initial exposure. In herds where the disease has become established only suckling and recently weaned pigs become ill. The incubation in individual animals is as short as 22-36 hours and the first cases are usually observed 4-5 days after exposure. The disease will spread rapidly within a herd.

There are other diseases that cause very similar clinical signs, such as coccidiosis, transmissible gastroenteritis, rota viral diarrhea, *Clostridium perfringens* enterotoxemia, and *E. coli* scours. It is essential to submit proper samples to a veterinary diagnostic laboratory for diagnosis.

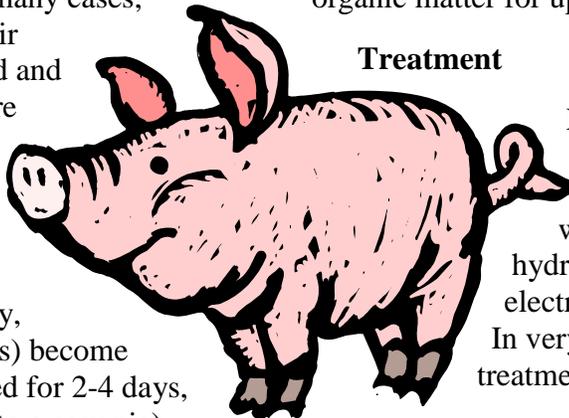
It is important to note that PEDv only affects swine and cannot spread to humans, nor does it cause a health risk to those who consume pork products derived from infected animals.

Transmission

The virus is spread by a fecal-oral route. Infected pigs shed enormous amounts of viruses for 7-9 days. Infection may be through direct contact with infected pigs or indirectly by exposure to manure on boots and clothing, farm supplies and equipment, or trucks/trailers used to move pigs. The virus is killed by common disinfectants such as bleach, Virkon® S, 1-Stroke, Environ, and drying. It may persist in cool, damp organic matter for up to a month.

Treatment

No specific treatment is available. Affected pigs should be kept warm, dry, and well hydrated with oral electrolyte supplementation. In very young animals treatment is usually futile.



Prevention

Strict biosecurity and sanitation are the best means of prevention. It is important to know the PEDv status of herds where pigs are purchased and avoid those that have had the virus. Be sure trucks and trailers used to haul pigs have not been contaminated by infected pigs. It takes a very small amount of manure for infection to occur. Do not commingle pigs from multiple sources or groups of pigs. Do not take boots, clothing, or equipment between pig farms. There are currently no effective vaccines available.

Diagnosis

Diagnostic tests are available to confirm PEDv infection in pigs. The following samples should be collected from acutely-affected pigs within the first 24 hours after onset of diarrhea. Please consult your

veterinarian for assistance with sample collection.

PCR testing

Feces: a minimum of 10 ml of feces collected in a leak-proof container.

Intestine: segments of fresh jejunum, ileum, and colon (each approx. 10 inches) placed in separate leak proof containers. These specimens should be refrigerated and transported on frozen gel packs.

Immunohistochemistry testing:

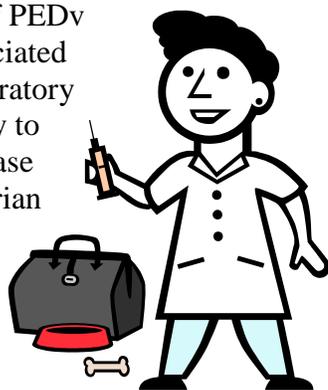
Formalin-fixed segments of jejunum, ileum, and colon (each approx. 1 inch, opened to expose mucosa to fixative) placed in leak proof containers.

The Veterinary Diagnostic Laboratory at Oregon State University does not currently offer the diagnostic tests for PEDv.

However, you may deliver your specimens to the VDL and they will arrange for their transport and submission to another accredited diagnostic laboratory for testing.

If you suspect your pigs are infected

Because clinical signs of PEDv are similar to those associated with other diseases, laboratory diagnosis is the only way to confirm a diagnosis. Please work with your veterinarian if you have scouring pigs to determine the cause and prevent spread of disease.



Importing pigs into Oregon

This disease has not yet been diagnosed in Oregon. The main goal of the Oregon Department of Agriculture is to ensure the health of our state's pork industry. To accomplish this goal, a special Oregon

Department of Agriculture directive went into effect February 10, 2014. This directive requires that Certificates of Veterinary Inspection accompanying hogs entering Oregon, for purposes other than immediate slaughter, contain the following statement from the issuing veterinarian:

"To the best of my knowledge, swine represented on this certificate have not originated from a premise known to be affected by Porcine Epidemic Diarrhea virus (PEDv), and have not been exposed to PEDv within the last 30 days."

Producers importing animals from PEDv affected states are strongly encouraged to voluntarily quarantine their new arrivals for at least three weeks and call their veterinarian immediately if the animals show any signs of disease.

Special considerations for show pigs

Exhibitors and their leaders should carefully weigh the risks associated with comingling pigs from multiple sources at shows and fairs. There should be a discussion regarding the risks associated with weigh-ins and exhibition events. To add another layer of biosecurity, the discussions by county fair boards, market program organizers and other events where swine are exhibited, should include considerations for the following during the 2014 show season:

1. Cancelling the pre-fair weigh-in of market hogs
2. Cancelling youth swine breeding shows
3. Implementing a terminal show for market hogs

Detailed information can be found at the National Pork Board link below:
<http://www.pork.org/filelibrary/RecommendExhibitor.pdf>

Homesteading in St. Helens: Producing Food on a Small Lot - Thursday, April 3, 7 p.m.

This program will cover producing and preserving food for your family and friends. Topics covered will include vegetable crops for small spaces, extending the gardening year, soil preparation, growing fruit in small places, foraging beyond your yard and food preservation options. Speakers are Chip Bubl, Dennis Snyder and Sue Snyder. Held at the St. Helens Public Library, 375 S. 18th St., St. Helens, 503-397-4544.

Certified Tractor Safety Program For Youth 14 to 17 years old

April 22, 29 & May 6, 13, 2014 - Driving Practicum – May 31

The 4-H Youth Development Program, Columbia County OSU Extension Service will be offering this program with *Mike Greisen* as instructor. The classes will be held at the Scappoose Fire Station on Tuesday evenings from 6 to 9:30 pm.

Driving practicum will be held on May 31st (required) time and place TBA. Register at the OSU Extension office by **April 11, 2014**. A minimum of four will be required to hold the class. The course is \$15.00, which includes the material and program supplies. Call or email to register (503-397-3462 or kara.orr@oregonstate.edu)



Joy Creek Nursery Seminars

We are fortunate to have such an exceptional nursery like Joy Creek in our county. They have an outstanding series of seminars most Sundays throughout the summer. You can visit their website www.joycreek.com for a complete list and description. The April seminars (which begin at 1:00 pm and are free unless otherwise indicated) are as follows: **April 6** – “*Gardening with What You’ve Got*” – Leslie Gover; **April 13** – “*Flying Jewels: Keeping Hummingbirds Happy in Your Garden*” – Ramona Wulzen; **April 20** – “*Mixed Shrub Border*” – Andy Stockton; and **April 27** – “*Great Plant/Lower Water Bills*” – Maurice Horn. NOTE: *There will be some Saturday workshops; because of the nature of these workshops, they can only accommodate 20 attendees per workshop. They will take registration beginning May 1st. Visit their website for a list of the Saturday Workshops.*

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