

June 8, 2016

Central Oregon Edition

Jeremiah Dung¹, Navneet Kaur², Kenneth Frost², Darrin L. Walenta³, Stephen Alderman⁴, and Philip Hamm²

¹OSU Central Oregon Agricultural Research Center, Madras, OR; ²OSU Hermiston Agricultural Research and Extension Center, Hermiston, OR; ³OSU Union County Extension Office, La Grande, OR; ⁴USDA-ARS NFSPRC, Corvallis, OR.

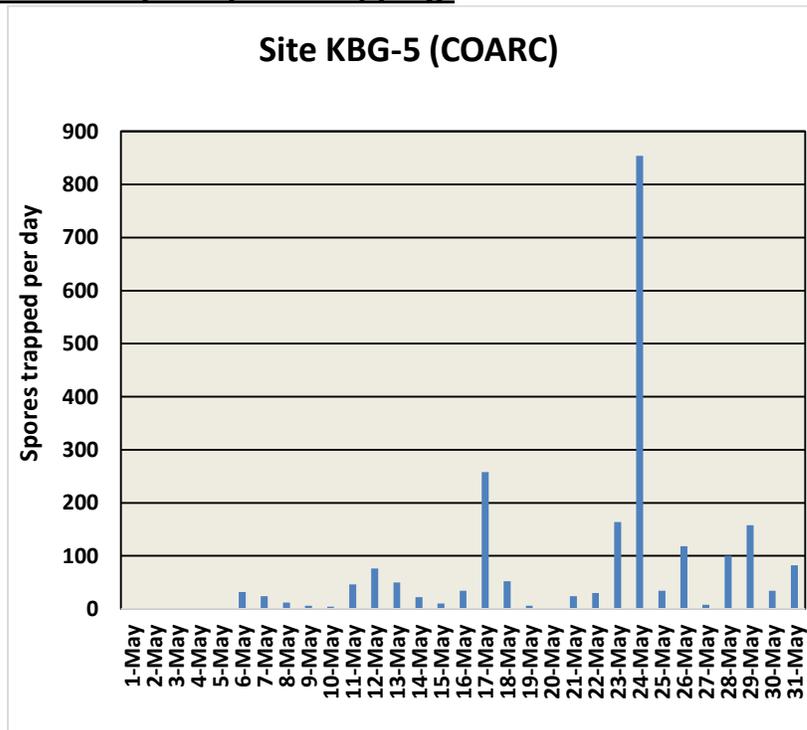
Welcome to the fifth issue of the 2016 Ergot Alert Newsletter, brought to you by Oregon State University Extension Service and USDA-ARS, and sponsored by the Washington Turfgrass Seed Commission, the Oregon Seed Council, the Oregon Department of Agriculture Alternatives for Field Burning Research Financial Assistance Program, the Columbia Basin Grass Seed Growers, the Jefferson County Seed Growers Association, and the Union County Grass Seed Growers Association. The goal of this newsletter is to provide timely information about ergot spore production to Kentucky bluegrass and perennial ryegrass seed growers and field personnel in central Oregon, the Columbia Basin, and the Grande Ronde Valley in an effort to aid in decisions related to ergot management during the course of the 2016 growing season.

April 19 thru May 31 Spore Trapping:

A spore trap was setup in artificially-infested plots located at the Central Oregon Agricultural Research Center (COARC) in Jefferson County, Oregon. Spore trapping was initiated on April 19, 2016 and spore trap drums are changed every Tuesday.

Spores were detected for the first time this season on May 1, 2016 and a total of 2,240 spores have been captured at the central Oregon KBG-5 site to date.

Spores were captured every day during the week of May 24-31, with over 300 spores captured during this period (Fig. 1).



Cumulative Degree Days (Jan 1 thru May 30):

Air: 625

Soil (4" depth): 777

In 2014-2015 ergot spores were first detected when cumulative air degree days were between 295 and 332 and cumulative soil degree days were between 176 and 257. This year, the first spore was observed when cumulative air degree days were 255 and cumulative soil degree days were 195. *Spore production in 2014 and 2015 continued until cumulative air degree days were between 582 and 657 and cumulative soil degree days were between 649 and 692.*

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Ergot Management Recommendations

- Although it is likely that spore production declined during the hot weather experienced in central Oregon from June 4-June 7 (trap results from this time period will be available next week), the cooler, wetter conditions expected over the next few days may trigger spore production if viable sclerotia are still present in fields.
- Most of the cultivars at the COARC Kentucky bluegrass cultivar evaluation trial have finished flowering (Table 1).
- Honeydew was observed over the last week in the following cultivars at COARC: Blue Ghost, Gateway, Shamrock, Merit, Gladstone, Fielder, Midnight II, Jumpstart, Right, and DB-1013.
- Sclerotia observed over the last week in the following cultivars at COARC: Gateway and Right
- **Although the most susceptible period (anthesis) has passed for many cultivars, cultivars with late emerging flowers may still be exposed to airborne spores or honeydew. Honeydew can be contact-, splash- or insect-dispersed. Infections that occur later in the season can result in the presence of honeydew at harvest, which can make swathing and combining more difficult.**
- Fields with honeydew should be monitored for development of sclerotia (before and after swathing).
- Late season scouting and field monitoring will help to: 1) develop harvesting/seed cleaning schedules and 2) identify potential problem fields or areas that will need increased monitoring in the 2017 season.
- Help prevent the development of fungicide resistance: If applying multiple fungicide applications for ergot this year please consult the label(s) to determine the maximum amount(s) of azoxystrobin and/or propiconazole that can be applied in a given season. Applications for powdery mildew and/or rust should also be included in your calculations.
- Please consult the PNW Plant Disease Management handbook for fungicide products available for ergot suppression in OR/WA grass seed crops or search the Pesticide Information Center Online.

Ergot Cultivar Evaluation Trial (thru June 7)

Table 1. Cultivar and growth stage of Kentucky bluegrass cultivars at the KBG-5 ergot spore monitoring site and Kentucky bluegrass cultivar evaluation trial in central Oregon (Jefferson County)

Cultivar	Feekes growth stage
Blue Ghost	10.51 to 11 (<5% of tillers at Feekes 10.51)
Gateway	11 (~0% of tillers at Feekes 10.51)
Shamrock	10.51 to 11 (<5% of tillers at Feekes 10.51)
Merit	10.51 to 11 (~5% of tillers at Feekes 10.51)
Gladstone	10.51 to 11 (<5% of tillers at Feekes 10.51)
PST-K4-7	10.51 to 11 (<5% of tillers at Feekes 10.51)
Fielder	11 (~0% of tillers at Feekes 10.51)
Midnight II	10.51 to 11 (~10% of tillers at Feekes 10.51)
Jumpstart	11 (~0% of tillers at Feekes 10.51)
Right	11 (~0% of tillers at Feekes 10.51)
DB-1013	10.51 to 11 (<5% of tillers at Feekes 10.51)

We need your input!

Earlier this year we obtained funding from the USDA Western IPM center to research potential biocontrol options for ergot. One component of this research involves a survey of growers and stakeholders to document the importance of ergot to the grass seed industry, learn about grower/stakeholder perceptions of biocontrol, and identify potential barriers that prevent the use of biocontrol options.

Please take a few minutes to complete the short, online (smartphone friendly) survey at:

http://survey.az1.qualtrics.com/jfe/form/SV_cx7QwGQUWjAvZl3