USA *PHYTOPHTHORA RAMORUM* NURSERY CHRONOLOGY

The following information is a summary of the status of *Phytophthora ramorum* in United States nurseries. For information on Europe's *Phytophthora ramorum* nursery infestations, please go to the United Kingdom's Department for Environment, Food and Rural Affairs (DEFRA), The Forestry Commission of Great Britain, or the European Union's Europe Agriculture website.

10/26

- Nine CA nurseries are undergoing enhanced inspections as part of post-confirmed nursery protocol requirements for nurseries that were previously *P. ramorum*-positive.

- After having tested positive for *P. ramorum*, eight OR interstate wholesale nurseries are in the process of compliance surveys, with an additional eight OR retail nurseries under compliance inspections as well.

- WSDA carried out Confirmed Positive Nursery Protocols at a municipal park after a symptomatic Rhododendron test positive for *P. ramorum*

8/26

- Eight California nurseries that were previously positive for *P. ramorum* underwent enhanced inspections in spring 2026. Six of the enhanced inspection nurseries were found positive, and an additional nursery was found to be positive through a trace back inspection from a California nursery. Trace forward inspections from positive nurseries found a positive plant at a residence in an infested county.

- Thirteen Oregon nurseries have had positive *P. ramorum* detections so far in 2026. Six interstate wholesale nurseries and seven intrastate retail nurseries were found to have positive plants. Eight nurseries had previous *P. ramorum* detections, while five nurseries were confirmed positive for the first time in 2026. Delimitation surveys were conducted at each nursery until negative survey results were achieved or the nursery elected to destroy the entire affected block. All positive nurseries have completed plant destruction, and many are proceeding with substrate solarization. Trace-forward and trace-back inspections were completed and did not result in any additional detections. Plants confirmed positive for *P. ramorum* in 2026 include *Rhododendron* spp., *Pieris* spp., *Camellia* spp., *Kalmia* spp., *Viburnum* spp., *Magnolia grandiflora*, *Arbutus unedo*, *Polystichum munitum*, *Myrica californica*, and *Ilex* × *meserveae*.

- WSDA received notice of multiple trace forwards in April and May 2026. One location yielded 2 positive rhododendron samples. Confirmed retail protocols were followed, and the location is waiting for steam treatment of soil. WSU staff sampled a suspect rhododendron in a new roadside landscape (5 months in ground) at a municipal park with abundant native vegetation and old growth. The sample was confirmed positive by WSDA and USDA.

5/26

- Sixteen Oregon nurseries (8 interstate shippers under federal compliance agreements and 8 intrastate shippers under state compliance agreements) are participating in ODA's *Phytophthora ramorum* Nursery Program. One interstate nursery was added to the program in February 2026 due to a traceback detection and is still under PASS delimitation. To date, four nurseries tested positive for *Phytophthora ramorum* during their spring survey. Of these, one nursery was negative for their first delimitation, one nursery was positive for first delimitation and undergoing a second delimitation, and one nursery is awaiting results for their first delimitation. One intrastate nursery was added to the program in summer of 2025 and is still under the PASS delimitation process. Additionally, four intrastate nurseries identified through trace-forward detections in February and March of 2026 completed their PASS surveys and delimitations and are eligible for fall compliance survey. The remaining three intrastate nurseries have completed their spring compliance surveys. Two of the nurseries tested positive; one nursery was negative for their first delimitation, and one nursery was positive for the first delimitation and negative for the second. One interstate nursery and one intrastate nursery are eligible to be released after two more negative surveys, and one interstate nursery is eligible after four more negative surveys.

4/26

- Four CA have had *P. ramorum*-positive plants so far in 2026: (1) in January, a previously *P. ramorum* positive production nursery in a quarantined county was again confirmed positive for *P. ramorum* after one *Camellia* plant was determined positive from a December 2025 inspection. No additional positive plants were detected during follow up delimitation inspections at that nursery; (2) a trace back inspection from that nursery led to another production nursery in a nonquarantine county where *P. ramorum* was confirmed on multiple varieties of *Camellia* plants, with trace investigations for this nursery are underway; (3) another production nursery in a quarantined county was confirmed positive on *Rhododendron* and *Pieris* species in January from samples collected in December 2025. During delimitation inspections, additional detections were made on *Michelia*, *Pieris*, and *Rhododendron* species. Trace forward inspections from this nursery detected a positive plant at a residence in a quarantined county, with the county agricultural department working with the homeowner on destruction of the positive plant at the residence; and (4) a previously positive production nursery in a quarantined county was determined to be positive again in April after detecting *P. ramorum* on three *Loropetalum chinense* plants during a spring 2026 inspection. All positive nurseries are undergoing the Confirmed Nursery Protocol. Three of the positive nurseries are production nurseries in quarantined counties and one is a production nursery in a nonquarantined county. Plants confirmed positive for *P. ramorum* in 2026 are: *Camellia* sp. varieties 'Debutante', 'Blood of China', 'Bob Hope', 'Cleopatra', 'Hana Jiman', 'Kramer's Supreme', 'Nuccio's Gem', 'Pearl Maxwell', 'Setsugekka', 'Silver Waves', 'Spellbound',

'Swan Lake', and 'White Doves'; *Loropetalum chinense*; *Pieris* sp., *Pieris japonica* 'Bisbee Dwarf'; *Michelia* x *foggii*, *Michelia* sp. 'Warm Fuzzies'; and *Rhododendron* sp., *Rhododendron* sp. 'Alice Eastwood', *Rhododendron fragrantissimum* 'Coastal Spice.'

- In January and February, WSDA conducted trace forward investigations on plants that shipped from two positive out-of-state nurseries. Follow up inspections and samples collected were negative for *P. ramorum*. In March, a positive *Rhododendron* was detected in the quarantine hold area at a botanical garden in Kitsap County. Garden staff hold and monitor incoming host plants for symptoms of *P. ramorum* prior to introduction into the garden, and contact WSDA when they see something suspicious. Twice in the past year, the quarantine hold area has functioned as intended. A positive *Garrya* was detected last November. In the March incident, all plants in the quarantine hold area were destroyed, and all perimeter samples were negative. WSDA is conducting a trace-back investigation on the positive Rhododendron. For more information, contact Scott Brooks, SBrooks@agr.wa.gov.

2/26

- In 2025, the USDA APHIS PPQ *Phytophthora ramorum* Program confirmed positive detections of *P. ramorum* at 24 nurseries across 7 states. Eleven were new locations, 10 were previously positive, and 4 were reconfirmed since they had a distant history in the program. Confirmation of 11 new nurseries are a result of effective trace forward and trace back protocols. Nine trace investigations occurred, impacting 17 states and 1 international province. Interstate operations (11 of the 24) were broken down as follows: 5 were previously positive and in compliance agreements; 2 were reconfirmed since they had a distant history with the program and will be reentering compliance; 4 are new to the program and will be under compliance; and 1 of the newly confirmed intrastate locations was both a nursery and a botanical garden. In 2025, 387 samples were confirmed positive across 14 genera. The *P. ramorum* Hosts and Associated Plants List (HAP), last published in 2022, has been updated.

- From mid-2024 through December 2025, the USDA Forest Service national stream monitoring program (focusing mostly on watercourses in the eastern U.S.) processed nearly 600 samples from nine eastern states, and all were negative for *P. ramorum.*

1/26

- In late 2025, researchers identified P. ramorum in a plant from a Minnesota (Hennepin County) nursery, the first detection of the pathogen in that state. The plant was destroyed and follow-up samples from plant hosts, water, and soil collected in September were all negative for the pathogen, though State officials will continue to monitor the site.

- In 2025, the California Department of Food and Agriculture monitored 308 establishments under compliance agreements for P. ramorum and processed 8,277

samples, yielding 20 positive results at 8 locations.

- In 2025, the Oregon Department of Agriculture held compliance agreements for P. ramorum with 12 establishments and processed 6,065 samples, yielding 327 positive results.

- In 2025, the Washington State Department of Agriculture processed over 1,110 plant, soil, and water samples, yielding 17 positive plant samples.

10/25

- In Oregon, one fall-surveyed nursery (in Lane County) has found *P. ramorum* onsite and the first delimitation will occur in early November. There have been no additional tracebacks or new nurseries since the summer. One nursery was released from ODA's program after the Fall survey.

- WSDA moved two retail nurseries through the Positive Nursery Protocols, after positives were found during trace forward investigations. One nursery voluntarily destroyed all plants in the quarantine zone and is no longer under an EAN. The other held on to non-host plants from the quarantine zone and is currently undergoing 90 surveillance protocols with the WSDA.

4/25

- The California Board of Forestry and Fire Protection added Del Norte County to its sudden oak death zone of infestation (ZOI), bringing the number of counties within the ZOI to fifteen full counties, plus a portion of a sixteenth (Trinity). *P. ramorum* was first detected in Del Norte County and added to the USDA APHIS list of quarantined areas in 2019. CAL FIRE waited until now to add the county to the sudden oak death ZOI because of early management activities undertaken in 2020 that aimed to contain the pest to a specific portion of the county. However, since that time the pest has slowly spread, and new strains of the pathogen have appeared, making the ZOI designation necessary for the county as a whole.

- In the first quarter of 2025, there has been one positive nursery found in California. One previously positive nursery was found to be positive for *P. ramorum* in January after its fall enhanced inspection, and is participating in the USDA's Protocol. Seven CA nurseries that were previously positive for *P. ramorum* in 2023 and 2024 are undergoing spring enhanced inspections. Plants confirmed positive for *P. ramorum* at California nurseries so far in 2025 are: *Camellia* sp. varieties: Pearl Maxwell, Debutante Light Pink, Yuletide, and Chansonette. Trace inspections have yielded no additional positive plants.

- There are six Oregon nurseries participating in ODA's *Phytophthora ramorum* Nursery Program. Four nurseries are interstate shippers under federal compliance agreements, in Washington (2), Clackamas (1), and Marion (1) counties. Two nurseries are intrastate shippers operating under state compliance agreements in Clackamas County. Six nurseries require a compliance inspection entering the sampling season. During the Fall season, five nurseries were negative and one came back with positive samples. One nursery was released from the program after the Fall survey. Two nurseries are eligible to be released after the Spring survey if results are negative.

- In January, WSDA received one new trace forward regarding a positive out-of-state

nursery. An inspection followed, all plants appeared free of symptoms and no samples were taken.

2/25

- In all of 2024, the CA Department of Agriculutre processed appoximately 7,900 samples for *P. ramorum*, resulting in 162 positive finds of the pathogen. One previously-positive nursery completed six negative inspections and was released from enhanced inspections; seven previously positive nurseries remain under enhanced inspections.

- In 2024, the OR Department of Agriculture worked with six interstate shippers under federal *P. ramorum* compliance agreements. A trace inspection in June 2024 resulted in a new addition to the program. In mid-November, one nursery completed the required survey protocols and exited the program.

- In 2024, the WA State Department of Agriculture processed over 450 plant, soil, and water samples, none of which required follow up.

11/24

- There are currently seven nurseries participating in the Oregon *Phytophthora ramorum* Nursery Program. Five nurseries [Washington (2), Columbia (1), and Marion (2) Counties] are interstate shippers under federal compliance agreements. One nursery is an intrastate shipper operating under state compliance agreements in Clackamas County. Another nursery located in Clackamas County was newly added in July 2024. The nursery was identified from a trace-back investigation and is currently going through the delimitation process. Six nurseries are required to complete a compliance inspection entering the sampling season. During the spring season, four nurseries were negative and two came back with positive samples. No nurseries are eligible to be released from the program this fall.

- WA State Dept. of Agriculture received trace-forward information in August 2024 due to a *P. ramorum* finding at an out-of-state nursery. Four Washington nurseries received plants as part of this trace-forward. Most of the plants were shipped in February 2024, and many had already been sold. All four nursery locations were inspected, and one secondary inspection took place at another nursery. No symptoms were found, and no samples were taken. The out-of-state nursery reported three of the four positive varieties were purchased from a Washington nursery three years prior. WSDA inspected the Washington nursery as part of a trace-back investigation. No symptoms were found, and no samples were taken.

6/24

- CDFA has confirmed five *P. ramorum* positive nurseries so far in 2024. Six CA nurseries that were previously positive underwent enhanced inspections in March and April. Of the six previously positive nurseries, three nurseries were again found positive; the other two positive nurseries were found during trace forward inspections or annual inspections. A trace forward inspection yielded additional positive plants at one retail nursery in a quarantine county. The fifth nursery, not previously positive, was found positive during an annual inspection.

- *P. ramorum* positive plants at California nurseries are: *Arbutus* x 'Marina' (1); *Camellia sasanqua* 'Shishi Gashira' (1); *Cornus capitata* 'Mountain Moon' (1); *Cornus capitata* 'Porlock' (1); *Cornus capitata* (1); *Cornus kousa* var. chinensis (1); *Hamamelis virginiana* (1); *Loropetalum chinense* (134); *Loropetalum chinense* var.

rubrum (3); *Rhododendron* sp. (3); *Rhododendron* sp. 'Aurora' (2); *Rhododendron* sp. 'Firestorm' (2); *Rhododendron* sp. 'Holden's Solar Flair' (3); *Rhododendron* sp. 'June Pink' (1); *Rhododendron macrophyllum* 'Pacific Rhododendron' (1); and *Viburnum* 'Mariesii' (2). Arbutus x 'Marina' is not on the USDA APHIS *P. ramorum* host or associated host list. Koch's postulates need to be completed prior to it being added to the host list.

- WSDA concluded trace-forward investigations from a March detection of an out-of-state nursery shipment which affected 70 homeowners. In total, 13 tissue samples and two soil samples were collected and all samples tested negative for *P. ramorum.*

4/24

- Six CA nurseries that were previously positive for *P. ramorum* are undergoing enhanced inspections this spring. Three nurseries, two of which were previously positive, were found positive for *P. ramorum* in the first months of 2024. All three 2024 positive nurseries are undergoing the confirmed nursery protocol. Plants confirmed positive for *P. ramorum* in 2024 are: *Cornus capitata* 'Mountain Moon', *Loropetalum chinense, Cornus* 'Porlock*', Rhododendron* sp., and *Camellia sasanqua* 'Shishi Gashira'. Trace forward investigations have yielded no additional positive plants that were shipped to other nurseries.

3/24

- WSDA received trace-forward information on plants that shipped to 70 homeowners from a positive out-of-state nursery. Of the specific varieties found positive at the nursery, only one plant was shipped into Washington.

- USDA APHIS PPQ revised the *P. ramorum* Domestic Regulatory Program Manual. The revisions updated figures and definitions, clarified operational steps, and revised Chapter 4, "Confirmed Retail Nursery and Retail Nursery Dealer Protocol. Protocol for Intrastate Retail Nurseries and Retail Nursery Dealers when *Phytophthora ramorum* is Present (rCNP)." For more details see the APHIS *P. ramorum* website, Information for Cooperators, https://www.aphis.usda.gov/plant-pests-diseases/pramorum.

2/24

- Approximately 7,400 *P. ramorum* program regulatory samples were submitted to the California Department of Food & Agriculture Plant Pest Diagnostics Laboratory in 2023, leading to 78 *P. ramorum* positives for the year. Two nurseries that were previously positive and receiving enhanced biannual inspections completed the required six negative inspections necessary to be released from the enhanced inspection portion of the program and will revert to annual inspections in 2024. There are currently six previously positive California nurseries receiving enhanced biannual inspections.

- In 2023, the Oregon Department of Agriculture *Phytophthora ramorum* Nursery Program worked with five interstate shippers [in Washington (2), Columbia (1), and Marion (2) counties] under federal compliance agreements. The ODA also held a compliance agreement with one intrastate shipper in Clackamas County, which is regulated under Oregon state quarantine requirements. The ODA tested 1,228 foliar samples for *P. ramorum*, of which ten tested positive. Delimitations resulted in an additional 334 foliar sample collected, 25 of which tested positive. The nursery incinerated all plants in the destruction and quarantine zones and will opt for non-

host placement as their soil mitigation method. An annual inspection at a Washington county nursery found plants impacted by *P. ramorum*, leading to 167 foliar samples and the detection of ten additional positive plants. All plants have been incinerated to ash on site, and soil mitigation included solarization and non-host placement to previously positive areas. Fall compliance surveys brought in 1,664 foliar samples, none of which tested positive for *P. ramorum*.

- In 2023, the Washington State Department of Agriculture (WSDA) processed over 300 plant, soil, and water samples. Washington's only regulated nursery for *P. ramorum* was released from its federal compliance agreement in March 2023 after six consecutive negative certification surveys. WSDA inspected five of the nine nurseries that 'opted-out' of the Federal regulations and can no longer ship interstate. Host material appeared free of symptoms and no samples were collected, and WSDA confirmed none of the 'opt-out' nurseries are shipping interstate. WSDA Plant Services staff conducted three trace-forward investigations and collected symptomatic plant samples from out of state positive nurseries; all samples were negative. Staff also conducted the required follow-up inspection at a residential site in Pacific County that was positive in 2022 as the result of a trace-forward. No symptoms were present on host plants in the perimeter of the property, and no samples were collected.

1/24

- USDA APHIS announced over $62 million for the Plant Pest and Disease Management and Disaster Prevention Program (PPDMDPP) portion of the Plant Protection Act, Section 7721 (PPA 7721, formerly known as "the Farm Bill"). The funds aim to strengthen U.S. infrastructure for pest detection and surveillance, identification, threat mitigation, and safeguarding of the nursery production system. For more details, view the fiscal year 2024 Plant Protection Act's Section 7721 spending plans online: www.aphis.usda.gov/ppa-projects.

6/23

- During a 2022 survey of native and invasive plants in Marin County, necrotic leaf spots were detected on *Cotoneaster pannosus* (silverleaf cotoneaster). Isolations yielded two *P. ramorum* isolates from different leaf samples from the same tree and were confirmed by sequence analysis of the ITS-region. The *Cotoneaster* sampled in 2022 was again symptomatic in spring 2023. Official regulatory samples were taken by the California Department of Food and Agriculture (CDFA) and submitted to USDA APHIS for confirmation. Other symptomatic *Cotoneaster* plants were also observed in 2023.

- CDFA has completed trace investigations searching for potentially positive plants shipped from the positive nurseries identified in spring 2023. Two positive plants from one nursery were detected at two retail nurseries. The USDA Retail Confirmed Nursery Protocol was performed at the two positive retail locations and no additional positive plants were detected. A *Cornus capitata* "Mountain Moon" dogwood sample from a nursery in a quarantined county tested positive for *P. ramorum* and was confirmed by the CDFA Plant Pest Diagnostic Center and the USDA APHIS PPQ Plant Pathogen Confirmatory Diagnostics Laboratory in April. This is the first record of *Cornus capitata* "Mountain Moon" dogwood in the U.S. It has been previously detected with *P. ramorum* in the U.K.

- Seven nurseries are participating in the Oregon *Phytophthora ramorum* Nursery Program: five (Washington (2), Columbia (1), and Marion (2) Counties) are

interstate shippers under federal compliance agreements and two (Clackamas and Linn Counties) are intrastate shippers operating under state compliance agreements. An additional twenty-six (Nursery A in Marion County) and ten (Nursery B in Washington County) were detected during delimitation surveys; all positive plants at both locations were incinerated to ash on site. Water samples at all locations tested negative for *P. ramorum*. No nurseries were eligible to be released from the program this spring.

- WSDA received trace-forward information on plants that shipped to three nurseries in Washington from a positive out of state nursery. Inspectors followed up at each location. Two samples of *Prunus laurocerasus* 'Schipkaensis' were collected and tested negative for *P. ramorum*.

- Recent EU legislation changes the regulatory status of *P. ramorum* based on the origin of the infected material. "Non-EU isolates" of *P. ramorum* are quarantine pests. These pests are treated as the most serious pests in the EU, and if detected, extensive control actions must be taken. The other legislative grouping is for *P. ramorum* "EU isolates" which are now treated as regulated non-quarantine pests (RNQP). The focus of the legislation on RNQP's is to limit the spread of these pathogens on plants for planting only.

5/23

- CDFA spring compliance inspections are complete. Earlier this year, regulated nurseries in counties quarantined for *P. ramorum* and five California nurseries that were previously positive for *P. ramorum* were inspected and sampled, with four nurseries (all in *P. ramorum* quarantine counties) confirmed positive for *P. ramorum*. Two additional nurseries were also confirmed positive after trace-forward investigations found positive plants at those nurseries, bringing the total to six positive nurseries in California for 2023.

- There are currently seven nurseries participating in the ODA *Phytophthora ramorum* Nursery Program. Five of the nurseries are interstate shippers under federal compliance agreements in Washington (2), Columbia (1), and Marion (2) Counties. One of the two nurseries in Washington County was newly added to the program in May 2023. Two nurseries are intrastate shippers operating under state compliance agreements in Clackamas and Linn Counties. Six nurseries required a compliance inspection entering the sampling season: one nursery tested positive with ten positive rhododendron plants detected; one additional delimitation has been completed with lab results pending; and all other nurseries tested negative. One interstate shipping nursery was added to the program in April after an ODA inspector observed host plants in poor health during an annual nursery inspection. A *Prunus laurocerasus* (cherry laurel) plant was confirmed positive with ten additional positives detected after delimitation. No nurseries were eligible to be released from the compliance program this spring.

- WSDA received trace-forward information on plants that shipped to ten homeowners from a positive out-of-state nursery. Inspectors are following up at each location and all samples collected so far have been negative.

3/23

- AmplifyRP® XRT has been released by Agdia as a fast lab or field assay for *P. ramorum* identification. The test can be performed on leaf tissue and run outside of a lab in less than 30 minutes; it is specific for *P. ramorum,* detects all European and

North American lineages, and is not known to cross react with other *Phytophthora* species, *Phytopythium,* or *Pythium.*

- WSDA received trace-forward information on plants that shipped to two homeowners from a positive out-of-state nursery. Inspectors will follow up at each location once the plants have broken dormancy and leaf material is present to inspect.

- WA's only regulated interstate shipping nursery was released from the *P. ramorum* program after testing negative for six consecutive compliance surveys.

2/23

- CDFA found one interstate shipping nursery positive for *P. ramorum* (it had not been positive previously), as well as another interstate shipping nursery that has been previously positive for *P. ramorum*. Both positive nurseries are undergoing or have completed the Confirmed Nursery Protocol and trace investigations are underway in 30 counties.

1/23

- In 2022, ten eastern states (AL, FL, GA, IL, MD, MS, NC, PA, SC, and TX) participated in the USDA Forest Service, Cooperative Sudden Oak Death Early Detection Stream Survey. A total of 650 bait samples were collected from 65 streams. PCR analysis of the samples detected *P. ramorum* from three streams in AL and one stream in SC. The positive streams in AL are associated with nurseries previously positive for *P. ramorum*. The SC stream is a first detection and is not known to be associated with a nursery. The watershed, comprising a residential neighborhood and streamside riparian vegetation, is being surveyed for *P. ramorum*. All samples collected so far have been negative with additional sampling planned. For the last four years (2019-2022), *P. ramorum* has been detected from eight streams in four states: five streams in AL, one stream in MS, one stream in NC, and one stream in SC. In some of these previously positive streams, the pathogen has been present for longer than ten years.

- In 2022, the USDA APHIS, PPQ *P. ramorum* Program supported compliance activities, diagnostics, and surveys in 25 states. *P. ramorum* was detected at 18 different establishments: 12 were new and six were previously positive. Confirmed positive samples were collected at interstate shipping nurseries, at intrastate shipping nurseries including big box stores, a small botanical garden and four residential locations.

- In 2022, approximately 7,200 *P. ramorum* program regulatory samples were submitted to the CDFA Plant Pest Diagnostics Laboratory for processing in 2022. No samples were determined to be positive for *P. ramorum* in 2022. Three nurseries that were previously positive and are receiving enhanced biannual inspections completed the required six negative inspections necessary to be released from the enhanced inspection portion of the program and will revert to annual inspections in 2023. There are currently five California nurseries receiving enhanced biannual inspections. In fiscal year 2022-2023, funding allocated to the CDFA for the *P. ramorum* program was reduced to $1,308,771.

- In 2022, the ODA *P. ramorum* Nursery Program worked with six interstate shippers [in Washington (2), Columbia (1), Linn (1) and Marion (2) counties] under federal compliance agreements. The ODA also held a compliance agreement with one

intrastate shipper in Clackamas County, which is regulated under Oregon state quarantine requirements. Three new nurseries were added to the program between March and June. One new nursery in Washington County was identified from a trace-forward investigation and was subject to its first compliance inspection in spring. The other new nurseries, in Linn and Clackamas Counties, were found to have plants infected with *P. ramorum* during routine annual inspections. The first compliance inspections for both nurseries were conducted in fall 2022. Spring compliance surveys were completed by the end of May. The ODA tested 1,633 foliar samples for *P. ramorum*, of which one tested positive. The Confirmed Nursery Protocol (CNP) delimitation resulted in an additional 19 foliar samples collected, none of which tested positive. The nursery incinerated all plants in the impacted block on site and removed and replaced the gravel substrate. Fall compliance surveys were completed by the end of November. The ODA tested 1,929 foliar samples for *P. ramorum*, of which three plants tested positive. One nursery still has compliance inspection results pending. The CNP delimitation work was completed at the two nurseries that tested positive. A total of 19 foliar samples were taken, of which three tested positive. The entire blocks of impacted plants at both nurseries were incinerated to ash on site. One nursery will solarize the impacted ground in summer 2023. The other nursery disinfested the ground and will not place host plants back in the impacted area. A nursery in Washington County fulfilled the CNP requirements and was released from the program in December. ODA detected the presence of *P. ramorum* at a botanic garden and private residence in Lincoln City, Oregon. In response, ODA and USDA APHIS surveyed the neighborhood around the confirmed positive locations. Results are being used to inform a mitigation plan. ODA and USDA APHIS suspect that the pathogen was introduced into Lincoln City through the planting of infested nursery stock several years ago. As a result of this work, western sword fern (*Polystichum munitum*) was confirmed positive for *P. ramorum* by USDA and added to the USDA *P. ramorum* associated host list.

- In 2022, WSDA assisted in the required certification sampling for Washington's only interstate shipping nursery under a federal compliance agreement for *P. ramorum*. Spring and fall surveys were conducted at the nursery. All foliar and water samples were negative in 2022. The nursery is scheduled to be released from the program in 2023. WSDA inspected four of nine 'opt-out' nurseries in 2022. These are nurseries that 'opted-out' of the Federal DA-2014-2 regulations and can no longer ship interstate. Host material appeared free of symptoms and no samples were collected. WSDA confirmed the nine 'opt-out' nurseries are not shipping interstate. WSDA conducted four trace-forward investigations from out of state positive nurseries: (1) in January 2022, two receiving nurseries in Washington were inspected during a trace-forward from an out-of-state positive nursery. Most host plants had been sold. Remaining plants on site were in good condition.; (2) In April, four big box stores in Washington were inspected during a trace-forward from an out-of-state positive nursery. Nine samples were collected with results being negative for *P. ramorum*. All other host plants were in good condition.; (3) In April, seven receiving locations in Washington were inspected during a trace-forward from an out-of-state positive nursery. Sixteen samples were collected. At a residence in Pacific County, a camellia tested positive for *P. ramorum*. A soil sample at the same location also tested positive. The Confirmed Residential Protocol was enacted and required follow-up inspections will occur over the next two years; (4) In September and October, WSDA conducted its largest trace-forward ever. Over 160 residential sites received host plants from an out-of-state positive nursery, but complete trace information was only provided for 64 locations. WSDA worked with PPQ personnel in Washington to complete the investigation with the information available. Twenty-

five samples were collected at 13 locations. All samples were negative for *P. ramorum*.

- For FY23, Plant Protection Act's Section 7721 (formerly called the Farm Bill) will support $642,775 for sudden oak death (*P. ramorum*) and related species projects. The work will be conducted in 15 states, and nationally, for survey, diagnostics, mitigation, probability modeling, genetic analysis, and outreach.

11/22

- ODA and USDA APHIS confirmed the presence of *P. ramorum* (provisionally EU1 lineage) at a botanical garden and private residence in Lincoln City, Oregon. This detection is well over 150 miles from the northernmost known wildland detection in Port Orford, OR. Officials suspect that the pathogen was introduced into Lincoln City through the planting of infested nursery stock several years ago.

- *P. ramorum* has been detected on *Polystichum munitum* (common names western swordfern or sword fern) very close to several heavily infected rhododendrons at a residence in Lincoln City, OR. The lineage of the positive fern sample has not yet been determined. The infected rhododendrons are not associated with recent nursery trade.

- There are currently seven nurseries participating in the Oregon *P. ramorum* Nursery Program. Six of the nurseries (in Washington [2], Columbia [1], Linn [1] and Marion [2] counties) are interstate shippers under federal compliance agreements; one nursery is an intrastate retail nursery in Clackamas County under a state compliance agreement. The intrastate retail nursery in Clackamas Co. and two other nurseries were found to be negative for *P. ramorum*. The nursery in Columbia Co. has fulfilled the program requirements and will be released from the program in mid-December. During its fall compliance inspection, one nursery was found to have two *Magnolia grandiflora* plants positive for *P. ramorum*. The delimitation discovered three additional positive *Magnolia grandiflora* plants. Delimitation work has been completed, and impacted plants are scheduled for incineration. The nursery grounds will not contain host plants until solarization work is completed in summer 2023.

- Since June, WSDA has conducted two trace-forward investigations from out-of-state positive nurseries. At one residential site in Pacific Co., a trace-forward camellia tested positive for *P. ramorum*, as did soil adjacent to the plant. During a separate trace-forward event, WSDA received limited customer information. This made contact difficult, so follow-up only occurred at 64 of 164 receiving locations, which were all residential. Samples were collected at 13 residential locations; all samples tested negative for *P. ramorum*.

- WSDA conducted the fall certification survey at Washington's only regulated interstate shipping nursery in late September. All plant and water samples were negative for *P. ramorum*.

9/22

- Eighty-one plant species have been added to the USDA APHIS Lists of Proven Hosts of and Plants Associated with Phytophthora ramorum: 30 plant species are new to the proven host plant taxa list, and 51 plant species have been added to the associated plant taxa list regulated for P. ramorum. Among the added species are more than 15 California manzanita (Arctostaphylos) species.

6/22

- Eight California nurseries that were previously positive for *P. ramorum* were inspected, sampled, and found to be free from *P. ramorum* during spring 2022 inspections. A trace-forward investigation from a positive nursery in Oregon that shipped plants to homeowners in California has been completed and yielded no positive samples. There have been no *P. ramorum* detections in nurseries in California in 2022.

- Currently, there are seven nurseries participating in the Oregon *P. ramorum* Nursery Program. Six of the nurseries are interstate shippers under federal compliance agreements (in Washington (2), Columbia (1), Linn (1) and Marion (2) counties); one is an intrastate retail nursery in Clackamas County under a state compliance agreement. The intrastate retail nursery was confirmed positive for *P. ramorum* for the first time in June during a routine nursery inspection and completed plant and soil mitigation; five OR nurseries were impacted as part of the ongoing traceback investigations. During a routine nursery inspection at a retail nursery in Marion County, inspectors observed rhododendron plants in poor health sourced from a nursery in the program in Columbia County, resulting in mitigation measures at both nurseries.

5/22

- Seven California nurseries that were previously positive for *P. ramorum* were inspected, sampled, and found to be free from *P. ramorum* during spring 2022 inspections. One previously positive nursery is still awaiting their spring inspection. Annual inspections at nurseries in quarantined counties that haven't been positive for *P. ramorum* are also underway. There have been no *P. ramorum* detections in California nurseries in 2022.

- Currently, there are six nurseries participating in the Oregon *P. ramorum* Nursery Program. Compliance surveys for the 2022 spring season for five of the nurseries have been completed, with a sixth still undergoing delimitation surveys and completing mitigation measures. One nursery was confirmed positive for *P. ramorum,* results are pending for another, and the other three compliance surveys were completed with no *P. ramorum* detected. The positive nursery was involved in a trace-forward investigation triggered by a positive confirmation in another state. As a result of the trace inspection, three foliar samples were found to be positive. After mitigation measures, all foliar samples collected during the second delimitation survey came back negative for *P. ramorum*. Trace-back investigations were completed at two other Oregon nurseries with no additional nurseries being added to the program - all samples were negative. Another nursery was confirmed positive for *P. ramorum* for the first time in April due to a single foliar sample taken during a routine annual nursery inspection. A CNP/delimitation survey found 18 more positive foliar samples. One water sample was collected and tested negative for *P. ramorum*. A second delimitation inspection was completed, and sample results are pending. Five nurseries were impacted as part of the trace-back investigations. One nursery is in Canada, the rest are in Oregon. Results from trace-back investigations are pending. To be released from the program, nurseries must have six consecutive negative results from compliance inspections over three years. No nurseries will be eligible to be released from the program this spring.

- This spring, WSDA conduced two separate investigations involving plants sent to big box stores. All samples collected were negative for *P. ramorum*. A third investigation is still in progress, with trace-forward plants installed in landscapes

at residential sites in Washington. So far, samples have been negative. A spring certification survey was conducted at Washington's only regulated interstate shipping nursery in early May. All plant samples were negative for *P. ramorum*. Water samples from the survey are still pending lab results. The next certification survey will take place in fall of 2022.

2/22

- In 2021, USDA APHIS PPQ surveyed 22 states and found *P. ramorum* at 17 different establishments: eight were new and nine were previously positive. Confirmed positive samples were collected at interstate shipping nurseries, at intrastate shipping nurseries including big box stores, and at a large managed landscape. A complete report with several tables is available HERE.

- In CA, 8 nurseries that were previously positive for *P. ramorum* are undergoing their first biannual inspection for 2022 in compliance with federal regulations. One nursery that had 145 positive *Viburnum tinus* plants detected in December 2021 is now undergoing a trace-back inspection after a positive trace-forward plant was detected at a nursery in another state.

- Five interstate shippers under federal compliance agreements are participating in the Oregon *P. ramorum* Nursery program. They are in Washington (2), Columbia (1), and Marion (2) counties.

- The Oregon Department of Agriculture was notified in February that five nurseries would be impacted from a trace-forward from another state. Inspectors followed the trace-forward protocol and detected no *P. ramorum* at four of the nurseries. One nursery in Washington County was found to have one positive foliar sample, so the nursery has been added to the program.

- In February, WSDA conducted two trace-forward investigations on plants that shipped from positive out-of-state nurseries. Inspectors followed up on high-risk genera at five receiving nurseries in Washington. Thirteen samples were collected at four locations and all samples tested negative for *P. ramorum*. In early May, a certification survey will be conducted at Washington's only regulated interstate shipping nursery.

1/22

- In California in 2021, three nurseries were confirmed with *P. ramorum* positive plants, down from five positive nurseries in 2020. The USDA Confirmed Nursery Protocol was implemented at all the positive nurseries. One nursery that shipped plants interstate was found to be positive. This nursery will continue to receive enhanced inspections where over 300 foliar samples are collected biannually. There are currently eight California nurseries receiving enhanced biannual inspections. Approximately 6,800 *P. ramorum* regulatory samples were submitted to the CDFA Plant Pest Diagnostics Laboratory. A total of 156 samples were determined to be positive for *P. ramorum*, all from foliar samples. Positive plant species consisted of *Camellia* sp., *Loropetalum chinense*, *Rhododendron* sp., and *Viburnum tinus*.

- In Oregon in 2021, the *P. ramorum* nursery program worked with eight interstate shippers under federal compliance agreements. Four nurseries tested positive for *P. ramorum,* and the Confirmed Nursery Protocol has been conducted at all the nurseries. ODA collected 3,547 foliar samples; 96 tested

positive for *P. ramorum*. Thirty soil samples and five water samples all tested negative. Most of the positive plants were rhododendrons or azaleas.

- In Washington in 2021, over 1,200 samples were taken with only three positives, all from water collected at a botanic garden in Kitsap Co.

12/21

- Eight California nurseries that were previously positive for *P. ramorum* and that ship host material interstate are being inspected and sampled in November and December for quarantine compliance.

- ODA's *P. ramorum* program includes four interstate shippers under federal compliance agreements located in Washington (1 facility), Marion (2 facilities), and Columbia (1 facility) Counties. During fall compliance testing in mid November, one nursery tested positive and one tested negative for *P. ramorum,* while two are pending results. The positive nursery had seven plants confirmed positive for *P. ramorum*, all Azalea and Rhododendron cultivars. In total 372 plants, and water from a drainage canal and two holding ponds, were sampled. Trace investigations are ongoing and will continue into 2022.

- The fall certification survey at the only regulated interstate shipping nursery in Washington was negative for *P. ramorum*.

9/21

- ODA's *P. ramorum* program included eight interstate shippers under federal compliance agreements located in Polk (1), Washington (1), Marion (4), Columbia (1), and Lane (1) Counties); and two intrastate shippers located in Clackamas and Lincoln Counties. The 2021 spring season marked the sixth consecutive inspection with no *P. ramorum* detected at the three interstate shippers and at both intrastate shipper nurseries. All were formally released of state and federal program inspection requirements.

- ODA completed steaming projects at three different nurseries where infested soil had been confirmed during previous delimitation inspections.

- WSDA conducted a fall certification survey in late September for an interstate shipping nursery under compliance. Lab results are pending.

8/21

- USDA APHIS and APHIS-accredited laboratories have confirmed 128 positive samples for *P. ramorum* in various establishments (regulatory incidents) thus far in 2021. Rhododendron plants continue to be the most commonly detected infected genus, comprising 61.7% of the positive samples confirmed so far this year. The next most common genera to test positive were *Pieris* and *Loropetalum*, with 13.3% and 9.4% respectively.

- In WA this May, regulatory staff performed a 2-day certification survey at a wholesale shipping nursery under compliance; 413 samples were collected and all samples tested negative for *P. ramorum*. In June, WSDA conducted a trace-forward investigation on plants shipped from a positive out-of-state nursery. Eight receiving locations in Washington were inspected. One sample was collected that tested negative for *P. ramorum*. All other inspected host plants were in good condition or had been sold.

- Cal Fire and CDFA have entered into an agreement to allow Cal Fire Forest Health Specialists to be considered "official" *P. ramorum* samplers. Diagnostic results for materials collected by official samplers are recognized by the State and USDA APHIS as data to inform regulations (quarantines). Without such an agreement, "official samplers" are limited to employees of agricultural regulatory agencies. All samples must be submitted and tested by a laboratory approved by APHIS, using methods approved by APHIS.

6/21

- The *P. ramorum* NA2 lineage has been detected infecting trees growing more than 20 miles north of the Oregon sudden oak death (SOD) quarantine area. Two infestations of *P. ramorum* have been found outside the SOD quarantine area in Oregon: (1) on national forest land on the north bank of the Rogue River, six miles north of any previously known infestation; and (2) just outside Port Orford, 21 miles northwest of the Rogue River and 13 miles south of the Coos County border. Previously found only in nurseries, this is the first time this lineage has been found infecting vegetation in wildlands.

- Del Norte County has been added to the *P. ramorum* quarantine area by the USDA Animal and Plant Health Inspection Service (APHIS) bringing the number of known wildland-infested, quarantine California counties to 16. This action is in response to the confirmation of *P. ramorum* in Del Norte County on tanoak on September 19, 2020.

- Nine previously positive nurseries in CA were inspected and sampled for *P. ramorum*; two had positive plants detected and at a third, nursery positives plants were found during a follow-up delimitation inspection triggered by a detection of positive plants in 2020. This brings the total number of known positive nurseries in California to three, with the *P. ramorum* positive plant genera detected in 2021 being *Loropetalum*, *Rhododendron,* and *Camellia*.

- Eleven OR nurseries took part in spring compliance inspections: of eight interstate shipping nurseries that were inspected, three nurseries were confirmed positive for *P. ramorum.* The 2021 spring season marked the sixth consecutive inspection with no *P. ramorum* detected at several nurseries, including two intrastate shippers (Clackamas and Lincoln Counties) and three interstate shippers (in Polk and Marion Counties).

5/21

- A survey was conducted at the Kitsap County Botanical Garden (WA), with all plant samples negative for *P. ramorum*. The last positive plant sample was detected in February 2016, and during the last 6 years, over 5,000 samples have been collected and 99.1% have tested negative for *P. ramorum*. USDA APHIS and WSDA are taking steps to deregulate this site.

3/21

- Ten nurseries are participating in OR's *P. ramorum* Nursery Program; of these, eight are interstate shippers under federal compliance agreements, in Polk (1), Washington (1), Marion (3), Columbia (1), Lane (1), and Linn (1) Counties. The ODA also holds compliance agreements with two intrastate shippers, in Clackamas and Lincoln Counties. To date, five nurseries have been inspected and sampled with results pending for three nurseries. Two nurseries had no detections, marking their sixth consecutive inspection with no *P. ramorum*

found. They will be formally released for successfully completing program requirements. One released grower is an intrastate shipper located in Clackamas County, first confirmed in 2012; the other is an interstate shipper located in Marion County, also first confirmed in 2012.

2/21

- Nine CA nurseries that were previously positive for *P. ramorum* are currently being inspected and sampled in compliance with federal regulations. At one previously positive nursery, 12 infected, 1-gallon *Loropetalum* sp. plants were detected in January. Four states and 41 counties were notified about required trace-forward inspections. Inspections have been completed in all 41 counties and there were no additional positive plants found.

- OR conducted delimitation work at an interstate shipper in Linn County that was confirmed positive in late November 2020. After two rounds of delimitation surveys, 26 plant, 1 water (taken from a puddle adjacent to a confirmed positive plant), and 18 soil samples were confirmed *P. ramorum* positive. After marking out destruction zones, the grower agreed to destroy all material within the quarantine and destruction zones around each confirmed positive plant. Approximately 2,000 plants were slated for destruction and the grower ultimately decided to close this growing location.

- WSDA conducted two trace-forward investigations on plants that shipped from positive out-of-state nurseries. Eight samples were collected at three locations and all samples tested negative.

- The Phytophthoras in Native Habitats Work Group was recognized with a 2020 IPM Achievement Award from the California Department of Pesticide Regulation.

1/21

- The 2020 summary of the USDA APHIS Plant Protection and Quarantine *P. ramorum* Program is as follows: *P. ramorum* was detected in 177 samples; the most common sample types were tissue samples from *Rhododendron* plants (49.4%), tissue samples from *Camellia* plants (15%), water (11%), soil (8%) and tissue samples from *Pieris* plants (7%). No samples were confirmed positive from the other genera considered high-risk, *Viburnum* or *Kalmia*.

- The 2020 ODA *P. ramorum* program update: the Nursery Program worked with

9 interstate shippers under federal compliance agreements and held compliance agreements with four intrastate shippers; 1 intrastate shipper nursery was confirmed positive; of 4,321 foliar samples collected during various inspections, 75 samples tested positive.

- The 2020 CDFA *P. ramorum* program summary: Program funding allocated to the CDFA for the *P. ramorum* program increased for fiscal year 20-21 to $1,505,591; approximately 8,200 *P. ramorum* program regulatory samples were submitted to the CDFA Plant Pest Diagnostics Laboratory for processing with a total of 49 samples were determined to be positive for *P. ramorum*.

- The 2020 WSDA *P. ramorum* program summary: all foliar samples were negative this year; host material at 7 opt-out nurseries surveyed appeared free of symptoms and no samples were collected.

12/20

- The EU1 strain of *Phytophthora ramorum* has been detected in forest trees in Del Norte County, the first time the EU1 strain has been detected in forest trees in CA as well as the first officially confirmed detection of the pathogen in Del Norte County. The EU1 infested trees were found uphill of State Route 197 (also called North Bank Road) in a ~70-year-old redwood forest with a minor tanoak component and minimal California bay laurel. This location is 1 mile from Highway 101, near the Smith River. The genotypes present in the new infestation match genotypes previously collected both from Oregon forest samples, and from Oregon and California ornamental nursery samples, but the pathway for introduction to this site is still not understood. Del Norte Co. will be added to the list of counties regulated for the movement of host plant material by CDFA, APHIS, and the California Department of Forestry and Fire Protection. The presence of *P. ramorum* in the county, which has the potential to threaten numerous agricultural and natural resource-based industries, increases the number of confirmed and regulated California counties with *P. ramorum* wildland infestations to 16.

- The new chairperson for the National Plant Board, USDA APHIS, PPQ, *P. ramorum* Regulatory Working Group is Megan Abraham, Director, Division of Entomology and Plant Pathology, Indiana Department of Natural Resources. The Working Group assists William Wesela, National Policy Manager, USDA APHIS *P. ramorum* program by reviewing and updating policies and manuals to assist in regulating and limiting the spread of *P. ramorum* within the USA and is made up of representative members including both State Plant Regulatory Officials (SPROs) and APHIS State Plant Health Directors (SPHDs) of the shipping states from the Pacific West and the receiving states throughout the nation.

- Nine CA nurseries that were previously positive for *P. ramorum* and that ship *P. ramorum* host material interstate are being inspected and sampled for quarantine compliance. One previously positive interstate shipping nursery successfully completed inspections and reverted back to annual sampling. This brought the total number of previously positive nurseries participating in increased sampling to nine and total positive nurseries in California in 2020 to five.

- Four residential sites in King County (WA) placed under the Confirmed Residential Protocol during the summer of 2020 have met requirements for

release from quarantine.

- The fall certification survey at the only regulated interstate shipping nursery in WA was negative for *P. ramorum*.

9/20

- WSDA has four residential locations in King Co. under the Confirmed Residential Protocol as a result of a trace-forward from an out-of-state positive nursery. Soil in the destruction and quarantine blocks at two of these residential sites tested positive. Steam treatment of the ground has been conducted at one location, with the second site to be steamed in October.

- This summer, a two-day survey was conducted at the Kitsap Co. (WA) botanic garden first found positive for *P. ramorum* in 2015. A total of 229 samples were collected near previously positive sites and around the perimeter of the garden. All samples were negative for *P. ramorum*.

7/20

- A North Carolina nursery reported positive *Rhododendron* plants that had been purchased from an Oregon nursery in Linn Co. During the traceback investigation, ODA detected positive *Rhododendron* plants at the site. The Linn Co. nursery has destroyed all material within quarantine and destruction zones and further tracebacks have been triggered at the locations where this material was purchased from. After a second round of delimitation surveys, no additional positive plants were found and no infested soil was detected.

- Two new Oregon nurseries in Marion Co. underwent the USDA Confirmed Nursery Protocol after they were confirmed positive during a traceback investigation and a routine inspection. Both nurseries completed the required mitigation measures and are under federal compliance agreements. The total number of nurseries in the Oregon *P. ramorum* Program is now up to 13.

6/20

- Spring compliance surveys of 10 nurseries (6 interstate and 4 intrastate shippers) in Oregon found no P. ramorum detected. One intrastate shipper located in Tillamook Co. successfully fulfilled program requirements and has been released. To date, this is the fourth nursery to have completed the program in Oregon.

- WSDA conducted a trace-forward investigation on plants from a positive out-of-state nursery. Most plants had been sold at the retail level and were untraceable. However, 37 Rhododendron 'Polarnacht' had been installed in several residential locations in King County. Inspections were performed and samples collected on symptomatic trace-forward plants. So far six positive 'Polarnacht' have been detected at four sites. The Confirmed Residential Protocol has been enacted at all four locations.

5/20

- APHIS posted a revised "APHIS List of Regulated Proven Hosts and Plants Associated with Phytophthora ramorum" consistent with 7 CFR §301.92-2 (Restricted, regulated, and associated articles; lists of proven hosts and associated plant taxa).

- Of the 10 CA nurseries that ship interstate and were previously positive for *P. ramorum*, *P. ramorum* was detected in 3 of the nurseries on *Loropetalum chinense* and *Camellia* sp. This brings the total number of positive nurseries in California to five so far in 2020.

4/20

- Surveys in WA found a positive water sample in one nursery and one wildland setting near a previously positive nursery.

- Four additional species of manzanita (*A. glauca, A. peninsularis A. viridissima,* and *A. viscida*) have been recognized as susceptible to *Phytophthora ramorum*, bringing the total to at least 18 manzanita species are now known to support the pathogen, including several rare, threatened or endangered species. The detections were made from native plant nurseries, botanic gardens and natural wildlands. CDFA has completed Koch's postulates on several of the species, with reports pending publication. It is worth noting that some of the detections were in areas with no associated California bay laurel (*Umbellularia californica* Lauraceae), a common source of the disease. Further work needs to be done to determine if these *Arctostaphylos* species sporulate and can contribute to the spread of *P. ramorum*.

- Two CA nurseries have been detected as positive for *P. ramorum* so far in 2020. One nursery in Santa Cruz County had a *P. ramorum* positive *Camellia*; the other positive nursery is in Contra Costa County had positive *Camellia* and *Loropetalum*.

- After a positive find during fall 2019 field testing, a nursery in Washington County, OR has taped off areas with infested soil (one in a greenhouse and

another in a gravel lot) to prohibit entry and will steam the soil as a mitigation option (estimated for July 2020).

- A retail nursery in Multnomah County, OR is currently laying cement over part of the nursery to treat a soil infestation. Trace-back investigations from this retail location led to a commercial interstate shipper in Marion County where positive *Camellia*, *Pieris*, and *Rhododendron* plants were found. This was a first detection for this location and the Confirmed Nursery Protocol (CNP) has been implemented. Additionally, as a result of a routine inspection, another interstate shipper in Marion County was confirmed positive in early March 2020.

- At a regulated botanic garden in Kitsap County, WA three confirmed water positives have been detected since the beginning of 2020. All positive water baits are from baiting sites previously found positive.

- USDA APHIS has updated the Potentially Actionable Suspect Sample (PASS) protocol for submission of official, regulatory samples where preliminary diagnostics indicate *P. ramorum* is present and confirmation is required by the USDA APHIS Plant Protection and Quarantine Science and Technology, Beltsville laboratory. Samples now need to include symptomatic plant tissues and DNA.

- For federal compliance agreements, USDA-APHIS increased the number of required samples for large nurseries that ship interstate from 199 to 332. The sampling is designed so the minimum number of regulated plants that must be sampled in a confirmed-positive nursery ensures detection at a 1.0% incidence with 95% confidence level.

- Over $1.2 million for *Phytophthora ramorum* projects has been awarded via the Plant Pest and Disease Management and Disaster Prevention Program (formerly referred to as the Farm Bill) administered by the USDA APHIS. The funds support *P. ramorum* nursery survey and research in 22 states.

3/20

- USDA APHIS Plant Protection and Quarantine (PPQ) released "*Phytophthora ramorum* 2019 Season Hotwash Report," a review of communications and operations for the *P. ramorum* regulatory program. In 2019, federal labs confirmed over 250 positive samples of *P. ramorum* from 14 states, with two nurseries acting as the major source of the positive plants. Trace-back information revealed that the two source nurseries had potentially shipped infected plants to 28 states, resulting in the largest trace-forward investigation for the U.S. *P. ramorum* program in any single year for over a decade. There have been no major trace forwards reported to date in 2020.

1/20

- Approximately 7,600 *P. ramorum* program regulatory samples were submitted to the CDFA Plant Pest Diagnostics Laboratory for processing in 2019. A total of 155 samples were determined to be positive for *P. ramorum*, 152 from leaves and three from soil. Fifteen nurseries were confirmed positive

for *P. ramorum* in California in 2019. This number is up from eleven positive nurseries in 2018. One interstate shipper was found to be positive for *P. ramorum* in 2019. The positive interstate shipper was previously positive and is already in compliance with quarantine regulations. Four nurseries found to be newly positive for *P. ramorum* in 2019 will begin receiving biannual inspections in 2020., bringing the total number of California nurseries receiving biannual inspections to 10.

- In 2019, fourteen nurseries in eight counties participated in the Oregon *Phytophthora ramorum* Certification Program. Of these, eight are interstate shippers regulated at the federal level and six nurseries are regulated by Oregon state quarantine requirements. Four nurseries - two interstate shippers (Washington and Marion Counties), one intrastate shipper (Marion County), and one retail nursery (Multnomah County) - were confirmed positive for *P. ramorum* in Oregon in 2019. Upon successfully fulfilling the program requirements, one nursery in Marion County was released from the *P. ramorum* certification program after nine years of inspections. To date, this is the third Oregon nursery to be released from the program.

- In 2019, USDA APHIS and state cooperators conducted *P. ramorum* nursery surveys in 14 states (AL, KY, LA, MI, NC, NV, NY, OH, OR, PA, SC, TN, VA, WV). The survey funds, totaling $352,945, were awarded to states as part of the Plant Protection Act, Section 7721, formerly called "The Farm Bill".

- The USDA APHIS posted "*Phytophthora ramorum* Domestic Regulatory Program Manual" First Edition, Issued 2020. The manual consists of 12 chapters explaining APHIS's *P. ramorum* protocols for inspection and sampling for nurseries, trace forwards and trace backs, confirmed nurseries, as well as background information and photos.

11/19

- The 2019 SOD Blitz survey reports an increase in *P. ramorum* infection rate in coastal California, from 3.5% in 2018 to 5.9% in 2019. The estimate reflects higher rates of infection on susceptible tree hosts, mostly California bay laurel and tanoak in the 15 known infested California counties. All isolates of the pathogen belong to the NA1 lineage.

- During the "*P. ramorum* in Commerce" trace investigations that were conducted in Oregon in summer 2019, one nursery in Multnomah County was confirmed positive with a single *Rhododendron* 'Holden' plant. The ODA has since monitored this property, finding no additional suspect plant material. However, this nursery has a sister location in the same county and at this second location, another *Rhododendron* 'Holden' plant was confirmed positive for *P. ramorum*. The retail USDA Confirmed Nursery Protocol is underway. Previously, it was verified that material is not moving between these two locations. The Multnomah County nursery purchased the plants from a local nursery in Marion County. The trace-back investigation is in progress. Additionally, after nine years, one nursery in Marion County was released from the nursery compliance program in November upon successfully fulfilling the program requirements. This is the third nursery in Oregon to have completed the program.

- In Washington state, a retail nursery found positive for *P. ramorum* during a trace-forward investigation in June was released from the Confirmed Nursery Protocol.

10/19

- In Washington state, a Critical Control Points assessment was conducted and a Federal compliance agreement signed at a wholesale shipping nursery found positive in May. Under the new compliance agreement, a certification survey was also conducted with a single detection on a *Kalmia latifolia* 'Firecracker'. The delimitation survey was negative.

9/19

- First detection of *P. ramorum* in Del Norte County from two tanoaks in Jedediah Smith Redwoods State Park. The infected trees are about five miles east of Crescent City, and distant from known *P. ramorum* infestations--to the north, more than 20 miles from Curry County, Oregon and to the south, approximately 50 miles from infested sites in northern Humboldt County.

- CDFA offered a voluntary inspection program specifically for *P. ramorum* to nurseries in counties not currently regulated for *P. ramorum*. The Voluntary *Phytophthora ramorum* Pre-Quarantine Program (PQP) requires the same inspection and sampling requirements as the Federal Domestic Quarantine 7 CFR 301.92. Participating nurseries with negative inspection results will avoid interruption of inter/intrastate shipping privileges of host and associated host plants if the partial state quarantine for *P. ramorum* expands to include their county.

- All of Oregon's results for "*P. ramorum* in Commerce" trace investigations were finalized, with one positive *P. ramorum* find from the 48 samples taken. The single positive *Rhododendron* 'Holden' was from a retail nursery in Multnomah County, in a discounted sale area on a concrete floor, so no environmental water or soil samples were taken. The nursery agreed to destroy it immediately.

- CFIA's 2019 national *P. ramorum* survey of will conclude this fall and to date has detected *P. ramorum* at three nurseries. Post-eradication surveys for 2019 are complete and resulted in the detection of *P. ramorum* at three nurseries. The CFIA "Regulatory Response Protocol for Nurseries Confirmed with *P. ramorum"* was implemented at all sites where the pathogen was detected. Trace investigations revealed that no trace-forward activities were required to the U.S. or to the rest of Canada. Additionally, trace-back investigations were conducted from detections of *P. ramorum* at U.S. nurseries. Based on information provided by USDA-APHIS, CFIA conducted trace-back investigations at two Canadian nurseries. *P. ramorum* was not detected. Last year, *P. ramorum* was detected at one nursery during the 2018 Canada *P. ramorum* national survey. Five nurseries are undergoing post-eradication monitoring. Eradication activities were implemented at each of the five sites. See more information on CFIA's *P. ramorum* program HERE.

8/19

- A Washington retail nursery had four Rhododendron samples confirmed positive for *P. ramorum.* The nursery was placed under the Confirmed Nursery Protocol and delimitation sampling found two additional positive

Rhododendrons. All Rhododendrons on site were destroyed. All of the positive Rhododendrons were traced to an out-of-state nursery.

7/19

- USDA-APHIS reported a large shipment of potentially *P. ramorum* infected plants, originating from nurseries in Washington State and Canada, was delivered to several Eastern and Midwestern states. Lab analyses indicate that many of the shipped plants were infected with the NA2 *P. ramorum* lineage. This is the first report of the NA2 clonal lineage outside of British Columbia, Washington, and California. The threat these shipments with the NA2 lineage pose to Midwestern and Eastern oaks is not fully understood. The incident, called "*P. ramorum* in Commerce", is still being investigated with trace-backs and trace-forwards being conducted by APHIS in cooperation with state agriculture departments.

- USDA APHIS confirmed that more than 50 rhododendron plants found in Indiana nurseries tested positive for *P. ramorum*. The infected rhododendron plants were part of a larger shipment that originated from nurseries in Washington State and Canada, with plants shipped sent to 18 states, including Alabama, Arkansas, Iowa, Illinois, Indiana, Kansas, Kentucky, Michigan, Missouri, Nebraska, North Carolina, Ohio, Oklahoma, Pennsylvania, Tennessee, Texas, Virginia, and West Virginia. *P. ramorum*-positive nursery stock was detected in nurseries in eight states (Iowa, Illinois, Indiana, Kansas, Missouri, Nebraska, Oklahoma, and Washington). Several major retailers have agreed to voluntarily recall plants from their stores. Further investigations resulted in 28 states receiving notices of shipment of potentially infected plants to their state.

- Five shipping nurseries positive for *P. ramorum* in 2019 are now under compliance in California and have completed or are undergoing the Confirmed Nursery Protocol per 7 CFR 301.92. One of the positive nurseries also had a positive soil sample and coordinated with the NORS-DUC to mitigate the pathogen by steaming the positive soil, with soil samples collected after steaming testing negative for *P. ramorum* at the CDFA Plant Pest Diagnostics Center.

- WSDA conducted a trace-back investigation at an interstate shipping nursery in Washington, finding a positive sample collected from a 3-gallon rhododendron in late May. Extensive delimitation surveys were conducted in June and July, wherein 852 samples were collected and 15 additional positive plants were discovered. The last delimitation survey, conducted on July 10 was negative for *P. ramorum*. All positive plants have been destroyed by steam treatment and the nursery has voluntarily destroyed many of the nursery blocks where the positives were detected.

6/19

- APHIS confirmed 15 rhododendron plants in an Indiana nurseries tested positive for *P. ramorum*. The plants were part of a larger shipment that originated from one nursery in Washington and two in Canada that was sent to Oklahoma for distribution to 18 other states. Agriculture officials in the 18 states are visiting nursery locations to sample the plants received from the three originating nurseries. A plant recall campaign has been issued in Indiana.

- APHIS updated U.S. domestic regulations for *Phytophthora ramorum* on May 20, 2019. The current quarantine revision codifies Federal Orders issued from 2004-2013 and commented on in 2018 with a final rule. APHIS has determined that updating the domestic regulations to include all Federal Orders issued in recent years will make it easier to find and comply with current restrictions which are necessary to protect the U.S. from the artificial spread of *P. ramorum*.

- The Canadian Food Inspection Agency (CFIA) stated that *P. ramorum* "response activities will be more targeted and will decrease the impact of a detection on an affected nursery. These changes align more closely with current U.S. survey and eradication methods." The revised response protocol, "PI-010: Regulatory response protocol for nurseries confirmed with *Phytophthora ramorum*" (replacing PI-010 and PI-011) is being issued for immediate implementation, at the start of the 2019 plant health survey season.

5/19

- ODA compliance inspections were completed in May, with no *P. ramorum* detected at 10 of the 11 nurseries surveyed. ODA tested 1,344 foliar samples, two water, and two soil samples during this time. One nursery in Marion County was confirmed positive and has since completed the Confirmed Nursery Protocol and signed a new compliance agreement.

- CDFA completed Federal *P. ramorum* regulation compliance inspections with two positive plants detected at interstate shipping nurseries. The detections arose during April inspections of six California nurseries that were previously positive for *P. ramorum* and ship host material interstate. One additional interstate shipping nursery was found positive for *P. ramorum* during an April 2019 traceback inspection. The addition of this nursery brings the 2019 total to 10 interstate shippers positive for *P. ramorum*, including two in non-quarantine counties. Six retail nurseries also tested positive for *P. ramorum* since April.

- ODA currently has eleven nurseries enlisted in their program: six are interstate shippers, regulated at the federal level and five intrastate shippers are regulated under State rules. So far, nine nurseries have been surveyed with two plants confirmed as *P. ramorum* positive. In April 2019, one nursery in Washington County successfully fulfilled the Certification Program requirements and has since been released. To date, this is the second nursery to have completed the program.

- A two-day survey at the botanical garden in Kitsap County where *P. ramorum* was first detected in 2015 found all 292 plant samples were negative for *P. ramorum* though a water-bait from a pond in the botanical garden was confirmed positive.

3/19

- In 2018, 47 streams in seven states (AL, GA, MS, NC, PA, SC, and TX) were surveyed in the USDA-Forest Service, Cooperative Sudden Oak Death Early Detection Stream Survey. Of 520 baited stream samples, *Phytophthora ramorum* was detected from six streams—four in Alabama, one in Mississippi,

and one in North Carolina. All positive streams were associated with previously *P. ramorum*-positive nurseries.

- A water bait sample from the Kitsap County Botanical Garden was confirmed positive for *P. ramorum*; this is the third confirmed positive water bait from the pond since June 2018.

- More than 15 *P. ramorum* projects totaling over $1 million have been awarded by the Farm Bill. Twelve states will receive funding for *P. ramorum* nursery-related surveys, and four research projects will improve diagnostic tools and knowledge about *P. ramorum* population structure.

2/19

- In 2018, 11 CA nurseries were confirmed positive for *P. ramorum*, down from sixteen positive nurseries in 2017. Three nurseries shipping *P. ramorum* host material interstate from California were found to be positive for *P. ramorum*; two were already under Federal Order DA-2014-02 compliance inspections, and the newly positive nursery will begin biannual DA-2014-02 compliance inspections. This brings the total number of California nurseries under DA-2014-02 compliance to six. Approximately 6,100 *P. ramorum* program regulatory samples were submitted to the CDFA Plant Pest Diagnostics Laboratory for processing in 2018. A total of 210 samples were determined to be positive for *P. ramorum:* 183 from foliage, 26 from soil, and one from water. Positive plant species consisted of *Camellia, Rhododendron* (azalea)*, Cinnamomum camphora* (camphor tree)*, Quercus agrifolia* (coast live oak)*, Laurus nobilis* (sweet bay)*,* and *Viburnum tinus* (laurustinus).

- In 2018, 14 nurseries participated in the Oregon Department of Agriculture (ODA) *Phytophthora ramorum* Nursery Certification Program. Of these, eight are interstate shippers and are regulated at the federal level (DA-2014-02); the other six nurseries are regulated by Oregon state quarantine requirements (7 CFR 301.92 and OAR 603-052-1230). A total of 1,779 foliar, one water, and no soil samples were collected and tested. Of this total, 1,601 were collected from eight interstate nurseries and 178 were collected from four intrastate nurseries. There were 27 confirmed positive plants from ten nurseries across six counties (Clackamas, Marion, Columbia, Polk, Washington, and Lincoln). The pathogen was detected in *Mahonia repens* (6), *Choisya ternate* (2), *Pieris japonica* (1), *Viburnum davidii* (1), *Rhododendron* spp*.* (16), and *Mahonia x media* (1)*.* One *Mahonia aquifolium* was confirmed as inconclusive by both the ODA and USDA. The plant was re-sampled and tested negative.

- The USDA Confirmed Nursery Protocol (CNP) was enacted at ten positive nurseries in OR. Through delimitation surveys, 26 plants, one soil sample, and one water sample were confirmed as positive. Twenty-four plants came from a nursery in Marion County (*Mahonia repens* and *Mahonia aquifolium*). The CNP was enacted at this property several times and ODA staff sampled ~1,359 plants as a result. Traceback investigations revealed that all plants in the blocks surveyed were part of a single shipment received from a nursery in Washington State. In response, Washington State Department of Agriculture staff conducted a traceback survey at the nursery, finding that most of the plants in the original beds had been pulled. They sampled four plants of those that remained and found no additional positive plants.

- The WA State Department of Agriculture Plant Pathology lab processed 1,197 regulatory samples in 2018. This includes nursery, botanical garden and other locations sampled for *P. ramorum*. Two water baits were determined to be positive in 2018; all other plant and water bait samples were negative. WSDA inspected eight of eleven 'opt-out' nurseries (nurseries that 'opted-out' of the Federal DA-2014-2 regulations and can no longer ship interstate). Host material appeared free of symptoms, and no samples were collected. One unofficial investigation was conducted when *Mahonia repens* from a Washington state nursery shipped to an Oregon landscape nursery were found positive after being in Oregon for six months. An investigation revealed that all of the *Mahonia repens* at the Washington nursery had been dug and sold, but a cohort bed of *Mahonia repens* grown from the same seed source was tested and found negative for *P. ramorum*.

- All plant samples from a botanical garden in Kitsap County found positive for *P. ramorum* in 2015 were negative for *P. ramorum* in 2018. In July 2018, a water bait from a small pond below the mitigated areas of the garden was confirmed positive. A second water bait at the same pond location was found positive through PCR by the WSDA Plant Path laboratory in December 2018 but is currently awaiting confirmation by the USDA.

11/18

- After more than 15 years, the California Oak Mortality Task Force (COMTF) bids farewell to Katie Harrell, public information officer. Katie now works for the California Board of Forestry in Sacramento but plans to keep in touch with the California Forest Pest Council and COMTF.

- William (Bill) Wesela has replaced Karen Maguylo as *P. ramorum* program, National Policy Manager, for the USDA APHIS, Plant Protection and Quarantine in Riverdale, Maryland.

9/18

- A two-day survey was conducted at the Kitsap County Botanical Garden in Washington state where *P. ramorum* was first detected in 2015. A total of 251 samples were collected, with all samples negative for *P. ramorum*, save for one inconclusive *Gaultheria* sample. The inconclusive sample was forwarded to the USDA for a final determination; results are still pending.

- Six California nurseries that were previously positive for *P. ramorum* and that ship *P. ramorum* host material interstate will participate in bi-annual sampling to be compliant with Federal Order DA-2014-02. The DA-2014-02 compliance inspections take place during times of the year when climatic conditions are most conducive to *P. ramorum* symptom expression, in October, November, and December 2018.

- Seven Eastern states participated in the 2018 Spring National *P. ramorum* Early Detection Survey of Forests: AL, GA, MS, NC, PA, SC, and TX. Of the 292 samples collected from 48 sites, *P. ramorum* was detected from three samples from two locations in AL (first detection in 2008 and 2009), two samples from one location in MS (first detection in 2008), and one sample from NC (first detection in 2010). All of the positive samples were collected from streams associated with previously positive nurseries.

7/18

- A water bait from a small pond downstream from the mitigated areas at a previously positive botanical garden in Kitsap County was confirmed positive on July 12, 2018. The pond is less than a mile from Puget Sound. The pathogen had not been detected in this managed landscape for approximately 2.5 years. Quarterly surveys of the Botanical Garden will continue in 2018.

- USDA-APHIS is proposing a revision to the domestic regulations for *P. ramorum* (7 CFR 301) which will codify the changes made in Federal Orders in 2013-2016 and deregulate low-risk areas and nurseries. The notice may be viewed in the Federal Register at http://www.regulations.gov/#!docketDetail;D=APHIS-2015-0101.

- CDFA issued Nursery Advisory No. 02-2018, which states: plants that are infested with *P. ramorum* do not meet the California Nursery Stock Standards of Cleanliness (FAC 6902 and 3 CCR 3060.2) and may not be offered for sale.

- *P. ramorum* has been found in 11 California nurseries in the first half of 2018. Six of the nurseries will be required to participate in bi-annual sampling to be compliant with Federal Order DA-2014-02; the remaining nurseries are retail facilities detected with infested trace-forward plants. One nursery in a quarantined county was positive for the first time.

5/18

- WA State Department of Agriculture conducted the required certification sampling for Washington's only nursery operating under the DA-2014-2 regulations. Sampling results were negative for *P. ramorum* at this 'opt-in' nursery. The nursery completed six consecutive surveys (bi-annually for 3 years since 2015) and was released from its required USDA compliance agreement.

- UK Forest Research reported that a survey in the Fansipan/Sapa area (Lào Cai Province) in Northwest Vietnam in March 2017 found samples that contained *P. ramorum* from natural vegetation and that the *P. ramorum* found in the area is not likely to be from a currently known lineage. Further analysis is needed to determine if they are genetically identical to the known clonal lineages of *P. ramorum* detected in Europe and North America.

- A Sacramento County nursery undergoing the Confirmed Nursery Protocol (since May 10, 2017) continues to have foliar and soil samples test positive for *P. ramorum*. Twenty-one soil samples tested positive for *P. ramorum* at the nursery in April. Trace-forward inspections from this nursery are underway in 40 counties and 3 states, with 7 retail nurseries confirmed positive as a result of these inspections.

- Under the USDA Farm Bill, Section 10007, $1,772,429 is being awarded in 2018 for *P. ramorum* and related species projects in 16 states. In California, $740,000 will be provided to develop best management practices for pest and disease mitigation at ornamental nurseries.

3/18

- Two WA waterways were found positive during the 2017 National

Phytophthora ramorum Early Detection Survey of Forests. The pathogen was detected for the first time in Issaquah Creek (King County) at a site downstream from a now-closed previously positive nursery; and also at the Sammamish Slough (King County), where it has been recovered since 2007.

- *Diplodia corticola* was recovered from symptomatic CA bay laurel and tanoak samples collected near the Stover Ridge area in the Redwood Creek drainage (one of the northernmost known *P. ramorum* infestations in California) in August 2017. This is the first time this fungal pathogen has been reported causing symptoms on bay that are indistinguishable in the field from *P. ramorum*. *D. corticola* is a known pathogen of several species of oaks as well as grapevines in California, and has also been isolated by several surveyors from tanoak, on which it can cause symptoms very similar to those caused by *P. ramorum,* including bleeding cankers, branch dieback, and in some cases tree mortality.

- The Phytophthoras in Native Habitats Work Group (www.calphyto.org) has joined the California Oak Mortality Task Force as an official committee. This "Other Phytophthoras" committee will focus on addressing threats to CA wildlands from Phytophthoras other than *P. ramorum.*

2/18

- A Sacramento County nursery undergoing the Confirmed Nursery Protocol (since May 10, 2017) had 5 samples test *P. ramorum* positive during their 90-day quarantine release inspection in early February. Since May 2017 there have been 159 positive plants in 8 locations at the nursery. All positive plants are Camellias.

1/18

- *P. ramorum* was not recovered from the 324 samples taken during the fall 2017 quarterly survey of the Kitsap County Botanical Garden in Washington (first found positive in 2015). Water baiting at nine locations throughout the garden was also negative for the pathogen.

11/17

- *Phytophthora ramorum* was recovered for the first time from seven *Arctostaphylos* species. Most of the samples tested were collected from field restoration plantings or native stands; some were collected from nurseries. Many of the new potential hosts are considered endangered or threatened, making material difficult to acquire. Prior to these detections, four *Arctostaphylos* species were federally regulated for *P. ramorum*. These recent findings suggest that *Arctostaphylos* susceptibility and infection levels may be greater than previously thought.

- *P. ramorum* was recovered from Brisbane box (*Lophostemon confertus,* syn. = *Tristania conferta*) for the first time from street trees in Sausalito (Marin Co.) in an area with *P. ramorum*-infected bay laurel trees. Symptoms included foliar spotting and necrosis, stem cankers, and overall canopy blight.

- The Kitsap County Botanical Garden, WA (first found positive in 2015) September *P. ramorum* survey was negative for the pathogen. In October, Washington's only *P. ramorum*-regulated interstate shipping nursery fall

certification survey was conducted; all samples were negative for the pathogen.

- One *P. ramorum* detection was made in Richmond, British Columbia (near the Vancouver airport) during the Canadian Food Inspection Agency (CFIA) 2016-2017 Survey for Horticultural Pests.

09/17

- So far in 2017, California has had 17 *P. ramorum* positive nursery finds. Twelve are retail nurseries that do not ship out of the quarantined area; the remaining 5 are undergoing the Confirmed Nursery Protocol. In all, 122 positive plants were discovered.

06/17

- Six new *P. ramorum*-positive nurseries were identified in California during spring surveys. Eight nurseries are currently known to be positive for the pathogen in the state. Two of the nurseries do not meet the federal *P. ramorum* program criteria and therefore will not default to federal regulation. The two previously positive interstate shipping nurseries in Sacramento and Santa Clara Counties that were under the biannual increased sampling protocol were found positive in April and May and will once again have to undergo the confirmed nursery protocol (CNP). Seven of the positive nurseries are in *P. ramorum* quarantine counties and one is in Sacramento County (non-quarantine county).

05/17

- The *P. ramorum* spring certification survey of Washington's one regulated interstate shipping nursery in Lewis County was conducted in May; all samples were negative for the pathogen.

- Japanese larch (*Larix kaempferi*) was found *P. ramorum* positive for the first time in France in the forest of Saint-Cadou, Finistère in May, in a 50-year-old pure larch plantation (located between Quimper and Morlaix). Previously *P. ramorum* had only been detected in understory vegetation in the natural environment, primarily on rhododendron in Brittany, Normandy, and Pays de la Loire.

- A new *Phytophthora* Research Centre (PRC) has been established at Mendel University in Brno, Czech Republic.

04/17

- A quarterly *P. ramorum* survey of the Washington Kitsap County Botanical Garden (first found positive in 2015) was conducted in April; all samples were negative for the pathogen.

03/17

- The Oregon Sudden Oak Death Task Force convened for the first time, under the leadership of Oregon State Representative David Brock Smith and US Senator Merkley. The Task Force is developing a collaborative action plan to secure adequate funding to contain the Oregon NA1 infestations and eradicate the EU1 lineage.

01/17

- USDA APHIS certification surveys for Washington's two "opt-in" *P. ramorum* host plant interstate shipping nurseries were negative for the pathogen in 2016. Additionally, all 1,338 samples taken in 2016 from the Kitsap County botanical garden were negative for the pathogen.

- California's 2016 fall federal *P. ramorum* compliance surveys of 7 previously positive nurseries were all negative for the pathogen. With the conclusion of the third year of negative results, four of these nurseries are pending release from the increased sampling protocol portion of the program, leaving three nurseries remaining with the additional oversight.

12/16

- In 2016, four previously positive opt-in CA nurseries were released from the federal *P. ramorum* compliance program confirmed nursery protocol (CNP). Another nursery found to have four positive samples in 2016 is currently undergoing the Confirmed Nursery Protocol and has decided to opt-out of the federal program, relinquishing interstate shipping rights. The remaining 2 nurseries in the compliance program are currently undergoing spring sampling. Pending successful sampling, one is scheduled to be released in 2017 and another in 2020.

09/16

- Water and soil samples at a Sacramento County nursery were found negative for *P. ramorum* following confirmation of infested camphor (*Cinnamomum camphora*) trees at the facility in August 2016.

- *Phytophthora quercina* was recently isolated from valley oaks (*Quercus lobata*) as part of an evaluation of restoration sites managed by the Santa Clara Valley Water District. It has been rated the #1 *Phytophthora* species of concern for introduction into the US in a USDA Plant Epidemiology and Risk Analysis Laboratory (PERAL) report.

- Nine samples from 4 locations were *P. ramorum* positive so far in the 2016 National *P. ramorum* Early Detection Survey of Forests. Three locations are in AL; one location with 3 positives is in MS. All positive samples were collected from streams associated with previously positive nurseries.

08/16

- The SANC Program had its first pilot facilities sign agreements with their respective state regulatory agencies, allowing them to ship interstate nursery stock certified under the SANC Pilot Program. There are currently eight facilities participating in the SANC Pilot Phase 1, three of which have signed SANC Agreements.

- A Sacramento County nursery had 2 camphor (*Cinnamomum camphora*) trees with branch cankers and foliar symptoms found to be *P. ramorum* positive in August. The nursery ships interstate and has been undergoing the confirmed nursery protocol (CNP) since June, 2016. A Santa Clara County nursery, currently part of the USDA *P. ramorum* program, was also found *P. ramorum* positive in May when one *Loropetalum* plant was identified as positive. The nursery completed the Alternative Quarantine Release Strategy

- A July survey of the Washington Kitsap County botanical garden (*P. ramorum* positive in 2015) was negative for the pathogen. Surveys have been conducted throughout 2016 near previously positive sites or in outlying areas of the garden, with all results negative since January.

07/16

- Two CA interstate shipping nurseries (Santa Clara and Sacramento Counties) were found *P. ramorum* positive during spring inspections.

- A retail nursery in Humboldt County was found with a *P. ramorum*-positive Leucothoe plant during a routine annual nursery inspection. This facility has previously been positive for the pathogen.

- Monthly surveys of the Kitsap County, WA botanical garden were negative for the pathogen throughout spring (April, May, June) sampling.

- Samples collected at WA's two nurseries participating in the USDA APHIS *P. ramorum* interstate shipping certification program (opt-in nurseries) were negative for the pathogen during their spring certification surveys. A previously positive King County nursery also completed its 2-year follow-up inspection with all samples were negative for the pathogen.

06/16

- As of June 1st, USDA APHIS revised conditions for the interstate movement of regulated soil from *P. ramorum* quarantined areas when the soil is moving to an APHIS-approved soil laboratory for physical or chemical analysis. This action removes the certification requirement and authorizes movement under a compliance agreement. The movement of bulk soil for other purposes (e.g., disposal, landscaping, use in potting media) is not included in this action and will continue to require certificates per the Code of Federal Regulations (7 CFR 301.92). This action does not include soil to be moved for the isolation of plant pests, which is regulated in accordance with 7 CFR, Part 330.

- The *P. ramorum* Safeguarding Working Group and the *P. ramorum* Regulated Plant Working Group met at NORS-DUC and formed a working group that will review plants currently on the regulated list.

- A patent (US 9,320,283 B2) has been approved for the use of *Trichoderma asperellum* to remediate *P. ramorum*-infested soil. Information is being assembled for EPA registration to license its commercial and public use as a biological control agent against *P. ramorum*.

05/16

- After a positive find in 2015, monthly surveys of the Kitsap County botanical garden were negative for *P. ramorum* in February and March; results from perimeter and riparian area surveys are pending.

- Eight eastern states (AL, FL, GA, MS, NC, PA, SC, and TX) participated in the 2015 National *P. ramorum* Early Detection Survey of Forests; 3 of the 566 samples taken were *P. ramorum* positive - two from AL (first detection in 2009) and one from NC (first detection in 2010). All samples were collected from streams associated with previously positive nurseries.

- Fifteen Oregon nurseries are participating in the 2016 annual *P. ramorum* re-certification process - 11 are a part of the federal (interstate) certification program and four are part of the state (intrastate) program.

- The Midpeninsula Regional Open Space District Board of Directors approved $524,000 for SOD and nursery-related Phytophthoras research and management over the next 10 years. Areas of focus will include SOD-related preventative treatments, tanoak resistance, and oak forest restoration, as well as further development of clean nursery practices.

02/16

- The 2016 Farm Bill, Plant Pest and Disease Management and Disaster Prevention Program (Section 10007) awarded $1,284,528 in *Phytophthora ramorum*-related program funding to 17 states with California receiving $692,308 of the available funds.

- The Systems Approach to Nursery Certification (SANC) initiative aims to improve the process for certifying nursery stock and reducing pest risk movement at the interstate shipping level. A pilot project to test the feasibility of the risk-based certification program was implemented 15 months ago at eight nursery and greenhouse facilities, all of which completed risk assessments. SANC program representatives are considering a Phase 2 Pilot Project which would include a second group of nurseries and greenhouses.

12/15

- Two new *P. ramorum*-positive plants were confirmed at the Kitsap County, WA botanical garden. Both plants were in close proximity to one another and to a previously positive site.

- In 2015, the CDFA Plant Pest Diagnostic Center tested 7,613 plant, water, and soil samples for *P. ramorum*. Two of the samples were positive and the result of a trace-forward investigation from a positive Washington nursery. Ninety-one nurseries in the quarantine area received monthly inspections to retain their *P. ramorum* clean nursery stock certification, allowing them to ship host material outside of the quarantine zone. The seven nurseries participating in the USDA's *P. ramorum* compliance program for previously positive nurseries were all negative for the pathogen.

- In 2015, *P. ramorum* was recovered from 18 nurseries (AL 1, CA 1, NY 1, OR 12, WA 1, VA 2), one commercial landscape (LA), two residences (OH, OR), and a botanic garden (WA) in non-quarantine areas. The pathogen was detected in *Arctostaphylos* (1); *Camellia* (3); *Gaultheria* (1); *Kalmia* (1); *Mahonia* (1); *Osmanthus* (1); *Pieris* (6); *Rhododendron* (57); soil samples (17); *Vaccinium* (6); *Viburnum* (9); *Vinca* (1); and water samples (3). Eight of the nurseries ship interstate and are in the USDA APHIS federal compliance program (Federal Order DA-2014-02). Six of the eight actually shipped interstate. The Confirmed Nursery Protocol has been completed in 16 of the 18 nurseries and resulted in two site detections (1 CA nursery, 1 OH residence) from one of the positive interstate shippers.

- The seven California nurseries that opted into the USDA Animal and Plant Health Inspection Service *P. ramorum* Compliance Program completed their

fall inspections, collecting a total of 3,073 plant, water, and soil samples, which all tested negative for the pathogen.

- Extensive surveys at the Kitsap County, WA botanical garden found no pathogen in the perimeter of the property or in the neighboring native woodland. Four new detections were found in the managed garden proper, on *Rhododendron* (2), *Camellia* (1), and *Vaccinium* (1), with a fifth positive on a *Gaultheria* was found during a delimitation survey. All detections were in close proximity to previously positive sites, and all infected plants were destroyed in November.

- So for in 2015, *P. ramorum* was reported in 13 nurseries (CA 1, NY 1, OR 9, WA 1, VA 1), one commercial landscape (LA), two residences (OH, OR), and a botanic garden (WA) in non-quarantine areas on plants (*Arctostaphylos* (1); *Camellia* (3); *Gaultheria* (1); *Kalmia* (1); *Mahonia* (1); *Osmanthus* (1); *Pieris* (5); *Rhododendron* (43); *Vaccinium* (5); *Viburnum (9); Vinca* (1)), soil samples (13), and water samples (2).

08/15

- The EU1 lineage has been recovered from a tanoak in Oregon, for the first time on US forest vegetation (previously only found in nurseries, streams, and European forests). The pathogen was first isolated by OSU in February 2015; in May 2015, USDA ARS completed their periodic genotyping and identified the EU1 clonal lineage. The lone EU1-infected tree was located on non-industrial private land, approximately 1 mile north of a small private (now closed) nursery near the Pistol River (Curry Co.) that had previous *P. ramorum* confirmations (August 2012). Comparison of the genotypes of the tanoak and nursery isolates suggests the nursery as the probable source for the forest infestation.

- From January 1 to August 6, 2015, *P. ramorum* has been reported in 13 nurseries (CA 1, NY 1, OR 9, WA 1, VA 1), one commercial landscape (LA), two residences (OH, OR), and a botanic garden (WA) in non-quarantine areas on *Arctostaphylos* (1); *Camellia* (2); *Kalmia* (1); *Mahonia* (1); *Osmanthus* (1); *Pieris* (5); *Rhododendron* (41); soil samples (8); *Vaccinium* (4); *Viburnum (9); Vinca* (1); and a water sample (1). The OH and OR residential confirmations were the result of trace-forward investigations from a positive WA nursery.

07/15

- The Kitsap County, WA botanical garden had a new *P. ramorum*-positive *Rhododendron* confirmation, from the same vicinity of the garden as all of the other hosts that have been found positive since March. The rhododendron and surrounding plants have been destroyed and steam treatment of the soil is underway.

- Trace-forward investigations from a WA nursery identified 8 *P. ramorum* positive plants at a Humboldt County nursery. All infested plants were destroyed and follow-up inspections were negative.

- A Critical Control Points (CCP) Assessment of the *P. ramorum*-positive Kitsap County botanical garden was performed. After the detection of *P. ramorum* on a *Pieris* plant at the garden in April 2015, a delimitation survey found 10

other plants in the same general area that were *P. ramorum* positive: rhododendron (3), viburnum (3), pieris (1) camellia (1), mahonia (1), and vinca (1). All positive plants and nearby host plants have been destroyed.

06/15

- Five new *Phytophthora ramorum* hosts were detected in February on Marin County Municipal Water District property: *Arctostaphylos virgata*, *Arctostaphylos glandulosa*, chinquapin (*Chrysolepsis chrysophylla*), blackberry (*Rubus ursinus*), and chaparral pea (*Pickeringia montana*).

- A Kitsap County botanical garden had additional *P. ramorum* positive plants found in May during a delimitation survey. All infected plants were destroyed and trace-back investigations are underway.

- *Vaccinium parvifolium* (red huckleberry) was found *P. ramorum* positive for the first time from two samples taken at a Lewis County, WA interstate shipping nursery during their 2015 spring Federal *P. ramorum* Certification Program survey.

- From January 1 to June 3, 2015, *P. ramorum* was reported in 10 nurseries (OR 8, WA 1, VA 1), one commercial landscape (LA), and a botanical garden (WA) in non-quarantine areas. *P. ramorum* was detected in *Camellia* (2), *Kalmia* (1), *Mahonia* (1), *Osmanthus* (1), *Pieris* (10), *Rhododendron* (40), *Viburnum* (4), *Vinca* (2), and soil samples (8).

- All seven California nurseries participating in the 2015 Federal *P. ramorum* Certification Program were negative for *P. ramorum*. Forty-seven nurseries in the quarantined counties also completed their annual inspection and all were negative for the pathogen.

- Fourteen native plant nurseries have joined the CDFA BMP for Ornamental and Native Plant Nurseries, joining 14 ornamental nurseries already participating.

- The Oak Phosphonate Application Recommendations for Sudden Oak Death were revised.

05/15

- *Phytophthora ramorum* has been detected in 4 of 10 Oregon nursery locations participating in the Federal *P. ramorum* Certification Program. In addition, 3 of 5 nurseries that opted out of the Federal Certification Program in 2014 have been surveyed, with pathogen detections in 2 of these nurseries.

- Two Puget Sound, WA residential landscapes were sampled as part of a *P. ramorum* trace-forward investigation from an out-of-state nursery; all samples were negative.

- A mature *Pieris* plant at a Kitsap County, WA botanical garden was found *P. ramorum* positive.

- California has completed inspecting 6 of the 7 nurseries participating in the Federal *P. ramorum* Certification Program, with all sampled nurseries negative for the pathogen. Forty-seven nurseries in the quarantined counties have

also completed their annual inspection, with all negative for the pathogen (to date). A total of 2,464 plant, water, and soil samples have been analyzed from CA nurseries so far.

- Two Washington waterways in Kitsap and Thurston Counties have been found positive for *P. ramorum*. Both waterways have been positive in previous years and are downstream from previously positive nurseries.

04/15

- APHIS issued a Federal Order on 4/3/15, expanding the area federally quarantined for *P. ramorum* in California to include Trinity County. Consequently, all interstate movement of *P. ramorum* regulated articles from Trinity County must be done in accordance with any applicable provisions of the Federal Order and the regulations promulgated pursuant to the Plant Protection Act found at 7 CFR 301.92 *et seq*.

- From January 1-March 25, 2015, *P. ramorum* was reported in six nurseries (OR) and one commercial business site (not a nursery; LA) throughout the US in non-quarantine areas.

03/15

- Washington received *P. ramorum* positive-plant shipments from three out of state nurseries in March.

- The 2014 Farm Bill awarded roughly $796,717 in *Phytophthora ramorum*-related program funding to 19 states for the 2015 federal fiscal year. California received $109,000 for survey efforts, confirming the pathogenicity and host range of the pathogen, and assessing disinfectants for *P. ramorum* control. The NORS-DUC site received separate funding of $474,303.

- Australia has issued a "Draft review of policy: importation of *Phytophthora ramorum* host propagative material into Australia." Proposed changes include updating the *P. ramorum* host list and adding additional hosts of *P. kernoviae*, *P. nemorosa*, and *P. pseudosyringae*; reducing the post-entry quarantine (PEQ) growth period for dormant cuttings and budwood; and allowing the importation of 1-year-old, bare-rooted plants without foliage.

- The 2014 National *P. ramorum* Early Detection Survey of Forests conducted stream surveys in CA, OR, WA, and 9 Eastern states. Positive samples were collected in CA (19), OR (6) WA (2), AL (4), FL (1), MS (2), and NC (2). Two of the positive streams (AL-1; FL-1) have not been previously positive and are each associated with a positive nursery; another Alabama positive stream has not been previously positive but is not associated with a positive nursery.

- Shrub tanoak (*Notholithocarpus densiflorus* var. *echinoides*) was confirmed as a *P. ramorum* host by the UC Davis Rizzo lab in collaboration with UC Cooperative Extension-Humboldt/Del Norte.

01/15

- In 2014, 146 California waterways were monitored for *P. ramorum*. The pathogen was detected for the first time in six watersheds (Beaver, Butte, and Cooper Creeks in Humboldt County; and North Fork of the Big River, Chamberlain and Hare Creeks in Mendocino County). Overall, recovery from

known positive watersheds was only 13 (54%) of 24 previously positive sites, likely because of low spring rainfall.

- Twenty-four Oregon nurseries participated in the USDA APHIS certification program in 2014, resulting in a total of 8 pathogen detections from plants, used pots, potting media, and water sources. Of the eight positive nurseries identified, 4 opted out of, or were removed from, the federal program and are now subject to Oregon's state quarantine requirements for *P. ramorum*, which includes mandatory testing to ensure there is no intrastate movement of the pathogen from these locations. The other 4 are currently operating under modified compliance agreements that include mandatory BMPs to address specific hazards at their nurseries. Seven nurseries tested pathogen free and continue to participate in the federal program.

- Native plant and restoration nurseries are joining the California Department of Food and Agriculture (CDFA) Best Management Practices (BMP) Program in response to detection of *Phytophthora tentaculata*.

12/14

- So far in 2014, *P. ramorum* was reported in 19 nurseries in 3 regulated states (CA, OR and WA) and 4 non-regulated states (ME, NY, TX, and VA). Of the 19 positive nurseries, 8 were interstate shippers and 11 were non-interstate shippers.

- Twenty-three nurseries in CA, OR, and WA underwent the enhanced USDA APHIS compliance program to continue shipping host nursery stock interstate. Four of the 23 facilities no longer ship interstate; however, two nurseries were added to the compliance program due to *P. ramorum* confirmations, bringing the total number of participating nurseries to 21. A total of 8 nurseries in the program had *P. ramorum* detections this year.

- So far in 2014, California has had one *P. ramorum*-positive nursery identified in Sacramento County. A total of 13,839 samples were taken from nurseries statewide but many of those were prior to the USDA Animal and Plant Health Inspection Service (APHIS) March 2014 rule change that only previously positive nurseries and interstate shipping nurseries within the quarantined area need to be inspected. Since the March rule, 3,360 samples have been taken from 7 previously positive nurseries.

10/14

- Thus far in 2014, *P. ramorum* has been reported in 18 U.S. nurseries. Ten facilities are in regulated states (CA-1, OR-7, and WA-2) and eight are in non-regulated states (ME-1, NY-2, TX-1, and VA-4). Eight of the 18 positive nurseries were interstate shippers (CA1; OR-4; WA-1; TX-1; VA-1) and 10 did not ship interstate. The Confirmed Nursery Protocol was conducted in all nurseries.

- Eight nurseries and greenhouses have agreed to participate in a pilot project to test the processes and procedures developed by the Systems Approach to Nursery Certification (SANC) program to implement a systems approach to nursery stock certification. The grower facilities and state regulatory staffs from Pennsylvania, New Jersey, Georgia, Oklahoma, Wisconsin, Missouri, Washington, and Oregon will be participating along with support staff from

Extension, AmericanHort, and the Society of American Florists.

- Thirteen Oregon nurseries (one with two locations) opted into the Federal *P. ramorum* Certification Program, while three nurseries opted out; all 17 nursery locations were surveyed, with *P. ramorum* detected in five opt-in nurseries. The positive nurseries were located in Washington (2), Clackamas (2), and Lane Counties. After the sampling, two of the positive nurseries decided to opt out of the federal program. In addition to the opt-in nurseries, *P. ramorum* was detected in an opt-out nursery on plants and in soil substrate beneath positive plants. The USDA CNP was enacted and the delimitation survey identified additional positive plants. After treatment, a positive *Rhododendron* sp. was identified at the nursery during the 90-day quarantine hold period, requiring the CNP to be completed a second time. Two *P. ramorum*-positive plants were also identified at a non-regulated Columbia County nursery during an annual inspection; the nursery ships interstate and will be considered an opt-in nursery for future regulatory activities. *P. ramorum* was detected in a Coos County residential landscape infecting a plant that had been purchased and imported from a positive Washington nursery.

08/14

- Of the 360 samples from 11 states (AL, CA, FL, GA, MS, NC, NY, OR, PA, TX, and WA) participating in the 2014 National *P. ramorum* Early Detection Survey of Forests, seven were found *P. ramorum* positive (AL-3; FL-1; MS-2; NC-1). Six of the positives were from streams and associated nurseries that had previous positives. One AL waterway had not been previously positive and was not associated with a stream or nursery that had previously been found positive.

- New Zealand has implemented emergency regulations as of August 14th regarding importation requirements for cut flowers and foliage of *Gaultheria* spp. from Canada and the US to mitigate risks of *P. ramorum*.

07/14

- From 1/1/14-6/30/14, *P. ramorum* was reported in 13 nurseries in 3 regulated states (CA, OR and WA) and 3 non-regulated states (NY, TX, and VA). Of the 13 positive nurseries, 7 were interstate shippers (CA-1; OR-4; WA-1; TX-1) and 6 were non-interstate shippers. The TX interstate shipping nursery was positive due to plants received from a positive CA nursery; measures were adopted to mitigate the risk. Three of the interstate shippers had shipped in the previous 6 months. *P. ramorum* was detected in *Camellia* (17), *Pieris* (8), *Rhododendron* (15), *Viburnum* (31), *Gaultheria* (14), *Prunus* (1), *Syringa* (2), and *Vaccinium* (1) as well as potting media (1), standing water on soil (6), and water (10).

- Of the 23 nurseries participating in inspections under the newly revised *P. ramorum* regulatory framework, 4 in the regulated states (CA, OR, and WA) were found *P. ramorum* positive. Until June 2014, *P. ramorum* has been detected in only one interstate shipper located in TX (noted above). Since the positive plant was received by the nursery within 2 months of shipping and was detected during a trace-forward investigation, APHIS determined this to be a regulatory incident and fully mitigated during the Confirmed Nursery Protocol and quarantine period.

06/14

- A new waterway in Kitsap County, Washington was found *P. ramorum*-positive twice from samples collected in March and May. The site is downstream from a previously positive nursery. Sixteen waterways in six counties were monitored in all for the pathogen from March to June (2014), with no other confirmations made.

- Since the revision of federal regulations in April 2014, *P. ramorum* has been detected at six interstate shipping facilities (CA-1, OR-4, and WA-1) and four retail nurseries (OR-1, WA-1, and VA-2). *P. ramorum* positives were detected on: *Viburnum* (29); *Gaultheria* (14); *Rhododendron* (14); *Pieris* (7); *Camellia* (5); water baiting (4); soil (3); *Syringa* (2); potting media (1); *Prunus* (1); and *Vaccinium* (1).

- Oregon has so far identified five *P. ramorum*-positive nurseries. One Marion County nursery is an intrastate (opt-out) shipper with infected *Pieris*, *Rhododendron*, *Leucothoe*, and *Viburnum*. The other four nurseries are interstate (opt-in) shippers in Tillamook (positive *Gaultheria* and *Rhododendron*), Washington (positive *Rhododendron* and used potting media), Clackamas (positive *Pieris* and retention pond water), and Lane Counties (positive *Rhododendron*).

05/14

- California had one *P. ramorum*-positive interstate (opt-in) shipping nursery, at a Sacramento County facility during a compliance agreement inspection. The facility was also found positive in 2009, 2010, and 2011. Infections were found on *Camellia japonica, Syringa vulgaris*, and *Viburnum tinus*.

02/14

- CDFA confirmed SOD has been found in Trinity County, less than 600 yards over the Humboldt County line, in an 80-acre BLM parcel adjacent to the Six Rivers National Forest. Trinity County is now the 15th California county known to have SOD. CDFA has submitted and finalized an emergency regulation change adding Trinity County to California Code of Regulations 3700, Oak Mortality Disease Control. As a regulated county, Trinity will be required to follow state and federal quarantine guidelines for the disease.

- In 2013, 11 *P. ramorum* stream baiting sites were established in western Washington waterways, of which two were identified as positive - one in Clallam County and one in Thurston County. Eleven additional sites were repeatedly sampled in Clallam County as the source of the inoculum there is unknown; however, results to date have been negative or inconclusive.

- Five new positive waterways were identified during the 2013 National *P. ramorum* Early Detection Survey of Forests conducted by US Forest Service, Forest Health Monitoring and cooperating states. Assays were conducted at 104 stream sites in 12 states nationwide. *P. ramorum* was confirmed at two new sites in CA, two new sites in WA, and one new site in TX. Sites previously positive for *P. ramorum* were confirmed in AL, MS, NC, and TX.

01/14

- USDA APHIS issued Federal Order DA-2014-02 on January 10, 2014 (implementation date of March 31, 2014). This Order requires an enhanced compliance program for high-risk nurseries while allowing nurseries without any positive pathogen detections in the last three years to be relieved of annual inspections and certifications.

- In 2013, the California Department of Food and Agriculture inspected 1,575 nurseries and processed 18,013 *P. ramorum* compliance samples. The pathogen was detected only once, on a *Loropetalum chinense* (5 gal) plant at one nursery (Gilroy, Santa Clara Co.) which was also positive in 2004 and 2005.

- The Oregon Department of Agriculture tested 22,550 samples from 552 grower sites for *P. ramorum* in 2013. *Phytophthora* species were detected at 238 of the sites surveyed with *P. ramorum* detected in 10 facilities. Two of the positive facilities that still have *P. ramorum* present in the native soil beneath infected plants have agreed to trial steam treatments of the infested soil to eradicate the pathogen.

12/13

- Washington identified six *P. ramorum*-positive nurseries in 2013. Of the 22 previously positive nurseries surveyed, four were found positive again for the pathogen. A retail garden center in Kitsap County with positive plants was also found to have infested runoff water and soil. A King County re-wholesaler was found to have positive soil as well as infected plants.

11/13

- Effective November 27, 2013, USDA APHIS added *Gaultheria procumbens* to the list of host plants regulated for *P. ramorum*.

- The Republic of Korea issued a Notification of Emergency Measures Addendum to their *P. ramorum* Phytosanitary measures, adding *Gaultheria procumbens* to their list of regulated associated host plants. As of November 22, 2013, all imported *Gaultheria procumbens* from prohibited and regulated areas must have a phytosanitary certificate verifying the shipment was inspected and found free of *P. ramorum*.

09/13

- *P. ramorum* detected infecting a *Parrotia persica* (Persian ironwood) plant in a Multnomah County, Oregon nursery during an annual compliance survey. This nursery was previously positive in 2010.

07/13

- USDA APHIS issued Federal Order DA-2013-27 on 7/3/13 so that nurseries located in the regulated areas of California, Oregon, and Washington that do not contain nor ship host or associated plant nursery stock are no longer required to comply with 7CFR 301.92. This Federal Order does not change the requirements for P. ramorum host nurseries in the regulated areas and all interstate shipping nurseries located in quarantine areas, including those that contain only non-host nursery stock.

- To date this year, 17 nurseries in four states have been found P. ramorum positive: CA(1), OR(9), WA(6), and NY(1). Twelve are interstate shippers and 5 are retail establishments.

06/13

- *P. ramorum*-positive water samples were identified at two new waterways in Washington, a river in Clallam County and a creek in Thurston County. The water positive in Thurston County was downstream from a previously *P. ramorum* positive nursery, while the Clallam County water positive was not.

- A Snohomish County, WA production nursery was found to have *P. ramorum*-positive *Viburnum tinus* and *Pieris japonica* on 6/20/13. The nursery was previously positive in 2011.

05/13

- *Rhododendron* plants found positive at a Lane County, OR retail nursery. This is a repeat find.

- *P. ramorum* was found at two Washington state nurseries (Thurston and King Counties) that sell to the landscape trade.

04/13

- A Gilroy nursery (Santa Clara County) was confirmed positive for *P. ramorum* on a *Loropetalum chinense* (5 g) plant. This facility was previously positive in 2004 and 2005.

- Oregon had three *P. ramorum*-positive nurseries identified: a Clackamas County facility was found to have infected *Camellia, Gaultheria, Pieris, Rhododendron, Trachelospermum*, and *Viburnum*; and two Washington County nurseries were also found with *P. ramorum*-positive *Rhododendron* sp., *Magnolia grandiflora*, and *Viburnum* 'Pink Dawn.'

- The Kitsap County, Washington retail garden center found positive in March 2013 had a positive soil sample confirmed at the nursery in April 2013.

02/13

- A new positive waterway outside a Houston nursery was detected in February. This was the first new positive site of the 2013 survey year and the second new site in the Houston area in the past three months. A second, separate positive was also obtained in February from a site first identified positive in December 2012.

01/13

- Thirty-three nurseries in eight states (CA, OR, WA, NC, ME, NY, PA. and IN) had *P. ramorum* confirmations in 2012 (up from 23 nurseries in 5 states in 2011), including 17 interstate shippers (16 in regulated states and 1 in NY) and 16 non-interstate shippers. Sixteen of the finds (48.5%) were first time detections (CA-3, OR-7, WA-2, NY-1, IN-1) and 17 (51.5%) were repeat nurseries. High-risk host plants comprised 85% of confirmations.

- California had seven *P. ramorum*-positive nurseries in 2012, of which four were previously positive. Five confirmations came from production facilities, two were retail, two were in the quarantine area, and five were in the

regulated area.

- Oregon detected 11 positive nurseries as part of the 2012 Federal *P. ramorum* Certification Program. The pathogen was detected on plants, as well as in potting media, soil, and a cull pile. This was the first time *Gaultheria procumbens* had ever been found positive for the pathogen.

12/12

- As of 12/10/12, the USDA Animal and Plant Health Inspection Service (APHIS) amended the federal order (FO) regarding advance notification for interstate shipments of P. ramorum high-risk host nursery stock.

11/12

- To date this year, *P. ramorum* has been reported in 8 (CA, OR, WA, NC, ME, NY, PA. and IN) states and 33 nurseries, including 17 interstate shipping facilities (CA-2, OR-7, WA-7, NY-1; 10 nurseries did ship material out of state) and 16 non-interstate shipping nurseries (CA-4, OR-4, WA-3, NC-1, ME-1, NY-1, PA-1, IN-1). Forty-seven percent (15) of the finds were first time detections (CA-3, OR-7, WA-2, NY-1, IN-1) and 48 percent (16) were repeat nurseries. In total, 10 trace investigations have been implemented. Host plants from *P. ramorum*-positive nurseries were shipped to 33 states, with positive finds in 2 (ME, PA traced-back to OR) non-interstate shipping nurseries and four residential locations. Of the four (ME, OR, WA, CA) residential confirmations, two (ME, CA) were traced back to a nursery in OR and two (OR, WA) were traced back to a WA nursery.

09/12

- A residential site in Placer County, California (regulated county) was found to have a *P. ramorum*-positive *Rhododendron* sp. plant on August 28th. The positive plant was traced back to a retail nursery in Auburn (Placer County), which was confirmed *P. ramorum* positive in 2006 and 2009.

- To date in 2012, the US has had 32 *P. ramorum*-positive nurseries in seven states (CA-6; OR-11; WA-10; NC-1; ME-1; NY-2; PA-1) as well as 4 positive residential/ landscape detections (CA, OR, WA, ME). Positive plants included: *Rhododendron* (51%); *Camellia* (13%); *Viburnum* (11%); *Pieris* (7%); *Kalmia* (3%); *Gaultheria* (4%); *Loropetalum* (3%); *Magnolia* (3%); *Hamamelis* (2%); *Cornus* (1%); *Prunus* (1%); and *Trachelospermum* (1%). Seventeen of the positive nurseries are interstate shippers (CA-2; OR-7; WA-7; NY-1) and 15 are retail facilities (CA-4; OR-4; WA-3; NC-1; ME-1; NY-1; PA-1). Collection ponds were positive at 2 retail nurseries (WA, NY) and 3 that ship interstate (2-WA, 1-NY). Soil was positive at 1 retail nursery (CA), 2 interstate shipping nurseries (CA, OR), and 1 landscape site (WA). Ten interstate trace-forward investigations were conducted this year: three with potentially infected plants shipped to 24-30 states and seven with potentially infected plants shipped to 1 to 3 states. As a result, *P. ramorum* was detected at retail nurseries in ME and PA that were shipped from OR, and from three residential/landscape sites in OR, WA, and ME that originated in WA.

08/12

- To date this year, the Oregon Department of Agriculture (ODA) has confirmed 11 *P. ramorum*-positive nurseries in Clackamas, Curry, Lane, Lincoln, Marion, Multnomah, Polk, Tillamook, and Washington Counties. The positive plants found in the Curry County nursery (now closed for business) were infected with the EU1 lineage. No infected plants were found at the nursery during inspection last year; however, 13 infected plants were found this year. This is the first report of the EU1 lineage in Curry County. *P. ramorum* was also detected at a private residence in Lane County (Oregon) based on trace-forward information received from USDA APHIS. The pathogen was detected infecting *Gaultheria shallon* and *G. procumbens* plants that had been imported from Washington and were still in their containers.

07/12

- A fourth, genetically distinct lineage of *Phytophthora ramorum* has been discovered in the United Kingdom on Japanese larch. Based on genetic analysis, it is believed that the previously unknown European type 2 (EU2) lineage has been newly introduced into southwest Scotland and Northern Ireland. The pathway by which the new lineage arrived into the UK is unknown, and researchers are assessing the extent of its distribution. Genetic analysis of the four lineages (EU2, EU1, NA2, NA1) indicates that the pathogen emanates from some unknown center of origin.

06/12

- Four California nurseries were found *P. ramorum* positive – two within the quarantine area (both Mendocino County) and two within the regulated area (both Sacramento County). The first confirmation was a Mendocino County retail nursery that was found to have a positive *Camellia* during a general nursery inspection. The nursery was also positive in 2008, 2010, and 2011; is not under compliance; and does not ship interstate. The second confirmation was made on a positive Camellia during a compliance agreement inspection at a Mendocino County production nursery. The nursery has not previously been positive and does not ship interstate. Following the confirmation, the facility chose to no longer participate in the *P. ramorum* host interstate shipping program. A *Viburnum tinus* 'Spring Bouquet' at a Sacramento County production facility during a compliance agreement inspection. The nursery was also found positive in 2005, 2006, 2007, and 2011, and does ship interstate (to Nevada). The fourth confirmation was at a Sacramento County retail nursery during a compliance agreement inspection. Positive plants included a *Rhododendron* sp. 'Boule de Neige' and a *Camellia japonica* 'Pink Parade.' The Nursery does not ship interstate and has not previously been positive.

- The Oregon Department of Agriculture 2112 Federal Order survey of nurseries shipping interstate is about 50 percent complete. To date, 7,841 samples have been analyzed, with nine nurseries (5 grower and 4 retail) in Clackamas, Lane, Lincoln, Marion, Polk, Tillamook, and Washington Counties found positive. Four of the nurseries ship interstate and four are repeat positives. Nursery stock found infected includes *Camellia, Cornus, Hamamelis, Kalmia, Magnolia, Pieris, Rhododendron*, and *Viburnum*.

- Washington has had 10 confirmed positive nurseries to date in 2012, the most in a single year since 2006. Counties with detections include King, Pierce, Thurston, Lewis, Clark, Clallam, and Skagit. Eight of the nurseries are repeat positives and six are certified interstate host shippers, three of which have shipped host and associated host plant material in the past six months. Positive plants have included *Rhododendron, Viburnum, Camellia, Magnolia*, two *Pieris*, and one *Gaultheria*.

- As of June 8, 2012, the Republic of Korea's Animal, Plant, and Fisheries Quarantine and Inspection Agency, Ministry for Food, Agriculture, Forestry, and Fisheries added six countries (Croatia, Czech Republic, Greece, Finland, Lithuania, and Serbia) to their "Phytosanitary measures to prevent the introduction of Sudden Oak Death Disease." These countries now must abide by the Republic of Korea's rule applying to any propagated host or associated host material such as nursery stock (including root stock), cuttings, and scions (except seeds and fruits) and wood (including logs) with bark. All shipments will be required to have phytosanitary certificates accompany *P. ramorum* host and associated host importation, with an additional declaration that, "The shipment was inspected and found free of *Phytophthora ramorum*."

- The Oregon Department of Agriculture 2012 Federal Order survey has identified six *P. ramorum*-positive nurseries so far this year in Lincoln, Marion, Washington, Tillamook, Polk, and Lane Counties. Three of the positive nurseries are wholesalers and three are retailers. Two of the six ship nursery stock out of state and four are repeat positives.

- Of the $15.5 million allocated to California in 2012 via the 2008 Farm Bill - Section 10201, $978,745 has been awarded for *P. ramorum* projects related to safeguarding nursery production and enhancing mitigation capabilities.

05/12

- Three Washington nurseries were confirmed positive for *P. ramorum* in May during interstate shipper annual compliance inspections. One was a wholesale producer with an attached retail yard in King County; the second was a Clallam County retail nursery with a separate production site; and the third confirmation was from a mail-order retail nursery in Lewis County which had a positive potentially actionable suspect sample in 2010 and tested negative in 2011.

- In Washington, holding pond water was found positive at two wholesale landscape nurseries – one in Clark County and the other in Thurston County. Both ponds have been positive in past years; clean-up has been difficult. Neither site uses the ponds for irrigation. Positive rhododendrons were also found in a commercial landscape in Pierce County. These plants were traced forward from the *P. ramorum*-positive wholesale landscape nursery in Thurston County (found positive 3/30/12).

- On May 3, 2012, a 5-gallon *Loropetalum chinense* 'Rubrum' was confirmed *P. ramorum* positive at a retail nursery in Sacramento County as a result of a follow-up inspection for a 2011 confirmation. The nursery is not under compliance and does not ship interstate.

- USDA APHIS issued a Federal Order on April 18, 2012, placing restrictions on the importation of *P. ramorum* host plants for planting into the U.S. The new order requires specific countries to have in place an annual pest exclusion program that incorporates monitoring, sampling, testing, and a validation process to verify the absence of *P. ramorum* in places of production.

- California's first *P. ramorum*- positive nursery for 2012 was identified on April 13th. The Orange County production nursery was found to have infected *Loropetalum chinense*, *Rhododendron*, and star jasmine (*Trachelospermum jasminoides*) during a compliance agreement inspection. The nursery ships interstate and had not been previously positive for the pathogen.

04/12

- On April 27, 2012, a San Joaquin County production nursery was found to have 5-gallon *P. ramorum*-positive *Camellia sasanqua* 'Cleopatra,' *Camellia japonica* 'Mathotiana Supreme,' and *Camellia japonica* 'Bella Rose' during a compliance agreement inspection. The nursery was previously positive in 2011 and has not made any interstate shipments since.

- *Phytophthora ramorum* was recovered from three native California plant species: *Cornus nuttallii* (western dogwood), *Trillium ovatum* (western wake robin), and *Garrya elliptica* (wavyleaf silk tassel). Koch's postulates still need to be performed to demonstrate that *P. ramorum* is causing disease in these three plant species, but the recoveries in 2011 are the first findings of the pathogen in members of the *Trillium* and *Garrya* genera. Several ornamental species of *Cornus* (*C. kousa* and the hybrid *C. kousa x C. capitata*) are already on the list of associated *P. ramorum* hosts, but the recovery of the pathogen from *C. nuttallii* marks the first instance of recovery from a North American dogwood species.

03/12

- Effective March 1, 2012, the USDA Animal and Plant Health Inspection Service will add eight plants to the list of *P. ramorum* associated hosts: *Ilex cornuta* (Buford holly, Chinese holly, horned holly); *Illicium parviflorum* (yellow anise); *Larix kaempferi* (Japanese larch); *Magnolia denudate* (lily tree); *Mahonia nervosa* (creeping Oregon grape); *Molinadendron sinaloense*; *Trachelospermum jasminoides* (star jasmine, Confederate jasmine); and *Veronica spicata* Syn. *Pseudolysimachion spicatum* (spiked speedwell). In addition, APHIS is moving *Cinnamomum camphora* from the associated host list to the proven and restricted host list. These changes bring the official U.S. *P. ramorum* host list to 137 plants. As of March 1, 2012 any nurseries within the regulated and quarantined areas containing these newly listed plants must be properly inspected, sampled, and tested in order to be able to move any plants interstate.

01/12

- In 2011, the California Department of Food and Agriculture detected *P. ramorum* in 12 nurseries as a result of compliance, trace-back, and nursery stock cleanliness inspections.

- The Oregon Department of Agriculture detected *P. ramorum* in six nurseries in 2011, infecting *Rhododendron, Viburnum, Camellia*, and *Pieris* plants. The pathogen was also detected in the soil substrate at one nursery, the soil substrate and potting media associated with an infected plant at another nursery, and in potting media associated with infected plants at two other nurseries. Four of these six nurseries were positive for *P. ramorum* in previous years.

- *Molinadendron sinaloense* was found to have *P. ramorum* symptoms in August by a county inspector. It was confirmed to be *P. ramorum* positive by USDA and classified as an associated host on January 25, 2012.

09/11

- The USDA APHIS P. ramorum Program 2011, 3rd Quarter Summary reported 25 nursery-related P. ramorum confirmations from January to September 30, 2011 in the following states: CA(12), OR (6), WA (5); SC (1); and CT (1 residential). Fourteen of the nurseries were interstate shippers and nine were retail. Positive plant detections were from the following plant species: Camellia (31%); Rhododendron (34%); Pieris (5%); Viburnum (5%); Magnolia (5%); Osmanthus (3%); Gaultheria (3%); Cinnamonum (3%); and 7 other species (11%).

08/11

- *Molinadendron sinaloense* was found *P. ramorum* positive for the first time on 6/30/11 during a routine light brown apple moth (LBAM) inspection at a research garden in Alameda County, CA. The sample was confirmed positive by the USDA Animal and Plant Health Inspection Service (APHIS) on 8/1/11.

07/11

- A Sacramento County, CA production nursery was found positive for P. ramorum. To date in 2011, P. ramorum has been confirmed in 21 US nursery locations: CA (11), OR (6), WA (3), and SC (1) ans well as one residential location in CT.

06/11

- California had two *P. ramorum*-positive in production nurseries, one in Mendocino County and another in San Joaquin County.

- The USDA Animal and Plant Health Inspection Service (APHIS) updated regulations governing international trade in plants used in gardening and landscape design (effective June 27, 2011). The rule change creates a new category, "Not Authorized for Importation Pending Pest Risk Assessment (NAPPRA)," which allows APHIS to quickly restrict the importation of plants suspected of being invasive or carrying pests until possible risks are understood and protective measures are put in place.

05/11

- California had four *P. ramorum*-positive nurseries confirmed, in San Joaquin (1 production nursery), Santa Cruz (1 production nursery), and Sacramento (1 retail and 1 production nursery).

- A wholesale/production nursery in Snohomish County, Washington was confirmed *P. ramorum* positive on May 27th during an Annual Compliance Inspection.

- The Oregon Department of Agriculture completed testing for the 2011 *P. ramorum* Federal Order Survey on 7,574 samples collected from 182 nursery grower locations. Four Oregon nurseries were found positive for the pathogen in May (2 wholesale nurseries in Clackamas County, a retail nursery in Lincoln County, and a wholesale nursery in Lane County).

- The Washington *P. ramorum*-positive soil confirmation in a Gig Harbor, Pierce County landscape (confirmed December 2010) has been identified as the NA2 lineage. This is the first time this strain has been found outside of a nursery in soil.

04/11

- A South Carolina retail nursery was found to have *P. ramorum*-positive soil on April 6th. Clemson University and the nursery owner are working to clean up the site and will soon be installing a sand filtration system in an effort to keep pathogen spores from entering the environment.

- California had four confirmed nurseries, three at production facilities and one at a retail nursery. Oregon retail nurseries in Washington County and Polk County were also found positive.

3/11

- The NA2 *P. ramorum* genotype has been detected in retail nurseries in five California counties. Originally only confirmed in Sacramento County in 2005, it has since been found there in 2008 and 2009. It has also been found in San Mateo (2008), Contra Costa (2009), Placer (2010), and Sonoma (2010) Counties.

- The USDA Animal and Plant Health Inspection Service (APHIS) will implement a Federal Order on 3/1/11 requiring interstate shipping nurseries in *P. ramorum* quarantine areas or in regulated counties that have previously tested positive for the pathogen to provide advance notification to destination states in non-regulated areas for certain high-risk plant species. Advanced notification is intended to enhance the traceability of potentially infected nursery stock. Under the new requirements, all nurseries located in a quarantine area that ship any species of *Camellia, Kalmia, Pieris, Rhododendro*n (including Azalea), and *Viburnum* interstate to non-regulated areas must provide advance notification. In addition, nurseries shipping any of these species interstate to non-regulated areas must provide advance notification if they are located in regulated counties with one or more interstate shippers that have tested positive for *P. ramorum* since 2003.

- An amendment has been made to the January 28, 2011 Federal Order (DA-2011-04) requiring advance notification for certain shipments of *P. ramorum*-host nursery stock. The counties of Santa Barbara (CA), Ventura (CA), Lincoln (OR), and Kitsap (WA) have been removed from the list of affected counties. This action was taken because Santa Barbara and Ventura Counties only detected *P. ramorum* on trace-forward plants and not on host plants grown within the interstate shipping nursery premises; Lincoln County has no *P. ramorum*-positive interstate shippers; and Kitsap County does not have an interstate shipping nursery that has previously tested positive for the pathogen. The amended Federal Order is immediately effective and supersedes the Federal Order dated January 28, 2011 (DA-2011-04). All other counties listed in the January 28 Federal Order (DA-2011-04) as an affected quarantined and regulated county in California, Oregon, and Washington remain the same.

1/11

- Fifteen *P. ramorum*-positive water samples were confirmed in Washington state in January 2011. A nursery in Cowlitz County, Washington that has had *P. ramorum*-positive water onsite since 2008 has been found to have a new positive water location on the southeast corner of the nursery along a county road right of way. The new location drains into two separate small streams.

12/10

- A Gig Harbor, Pierce County, WA landscape site adjacent to a previously positive repeat nursery has been found to have *P. ramorum*-positive soil. The confirmed site is along a drainage that had been found positive with infected salal plants in the summer of 2009.

- California had 874 establishments under compliance for *P. ramorum* in 2010, including 634 host nurseries. A total of 18,418 samples were taken in California nurseries, with 2,090 nursery sites found to be negative for the pathogen and eight sites found positive. Five of the confirmed locations were production facilities, two were retail sites (both in quarantined counties), and one was a residential location (regulated county).

- Nurseries identified as *P. ramorum* positive throughout the US in 2010 included: CA (7); OR (9); WA (6); IA (1-Trace Forward); IL (1-Trace Forward); AL (1); NC (1); SC (1); VA (1-hoop house leaf debris); NY (1-Collection Pond), MS (3); GA (1-irrigation pond); PA (1-greenhouse seeding flats). Confirmations by plant genera included: *Rhododendron/Azalea* (41); *Camellia* (18); *Viburnum* (7); *Pieris* (6); *Kalmia* (2); *Laurus noblis* (3); *Loropetalum chinensis* (1); *Magnolia* (2); *Tracheolospermum jasminoides* (2); *Osmanthus fragrans* (1); *Mahonia nervosa* (1); *Sequoia sempevirens* (1); and *Veronica spicata* (1). There were two positive residential landscape detections and one water-pond positive. Eighteen of the infested nurseries were interstate shippers and 13 were retail facilities. Subsequent plant and soil samples taken in each of the nurseries were all negative for *P. ramorum.*

9/10

- Washington has identified a Kitsap Peninsula creek *P. ramorum* water positive further downstream than previous detections. This creek is associated with a Peninsula nursery that has been free from the pathogen for several years following implementation of the Confirmed Nursery Protocol; however, the brackish creek water continues to be *P. ramorum* positive.

- Nurseries in California (Stanislaus County) and Washington (Pierce County) were found positive for *P. ramorum*.

8/10

- Retail nurseries in California (Mendocino County and Humboldt County), Washington (King County), and Oregon (Washington County) were confirmed positive for *P. ramorum*.

- The implementation of the Federal Order requiring pre-notification for shipping *P. ramorum* host nursery stock from regulated and quarantine areas has been delayed until further notice.

7/10

- Water draining an infested nursery in Mecklenburg County (Charlotte), NC has been found to have *Phytophthora ramorum* as a result of the 2010 National *P. ramorum* Early Detection Survey of Forests. This brings the total number of positive waterways to 10 in six states outside areas where *P. ramorum* is found in California and Oregon forest areas (WA [2], AL [4], MS [1], GA [1], FL [1], and NC [1]).

- USDA APHIS has delayed the effective date for implementation of the Federal Order requiring pre-notification for shipping *P. ramorum* host nursery stock from regulated and quarantine areas from June 21, 2010 to July 19, 2010.

6/10

- As of June 21, 2010, USDA APHIS will require written pre-notification to destination states of all interstate shipments that include *Phytophthora ramorum* host plants from quarantine or regulated areas. The new rule, under *Phytophthora ramorum* 7 CFR 301.92, is intended to allow states receiving *P. ramorum* host nursery stock to assign and prioritize resources, assure rapid response, and provide direct traceability for any nursery stock known to be positive for *P. ramorum*.

- The Oregon Department of Agriculture has completed testing for the 2010 *P. ramorum* Federal Order Survey on 12,101 samples collected from 299 nursery grower locations, and has detected six positive nurseries. During delimitation surveys at one of the Washington County nurseries, foliar samples were collected from a *Trachelospermum jasminoides* (star jasmine) plant exhibiting suspicious symptoms. The foliage was officially confirmed *P. ramorum* positive on 6/10/2010. Star jasmine was also found positive in June 2010 at a Sacramento County, CA production nursery. As there have been two independent confirmations of infected star jasmine, it is anticipated that APHIS will be adding this newly identified host to the *P. ramorum* list of regulated species.

- A Johnson County, Iowa retail nursery was confirmed *P. ramorum* positive on 6/22/10 as a result of a trace-forward inspection of plants shipped from a positive production nursery in Washington County, Oregon.

5/10

- Australia has adopted emergency measures prohibiting the importation of *P. ramorum* host species (other than tissue cultures) from Canada in an effort to minimize the risk of pathogen introduction into the country.

- California has had five *P. ramorum*-positive nurseries identified since April 30, 2010, and found *Trachelospermum jasminoides* (star jasmine) as *P. ramorum* positive for the first time.

- Two nurseries in Oregon (Marion County and Washington County) and two in Washington (Thurston County and Snohomish County) were found *P. ramorum* positive in May 2010.

4/10

- *P. ramorum* positives were found in a variety of nurseries, from Lancaster County, Pennsylvania (production); Mecklenburg County, North Carolina (retail); Greenville County, South Carolina (retail); Clackamas County, Oregon (wholesale); and Clark County, Washington (production).

- South Carolina rescinded its *P. ramorum* rule that required California and Oregon growers importing plants to the state to comply with additional guidelines which were more restrictive than the federal regulations. The repeal effectively ends the lawsuit filed on 3/8/10 by the California Association of Nurseries and Garden Centers (CANGC) and the Oregon Association of Nurseries (OAN) and restores the right of all nurseries in California, Oregon, and Washington to ship *P. ramorum* host and associated host plants to SC, provided they follow the federal rule.

- Korea updated its list of *P. ramorum*-regulated hosts to include: *Choisya ternate*, *Cornus kousa*, *Daphniphyllum glaucescens*, *Lithocarpus glaber*, *Magnolia cavalieri*, *Magnolia foveolata*, *Ribes laurifolium*, *Vaccinium myrtillus*, and *Vaccinium vitis-idaea*.

03/10

- The EU1 strain is now the most common *P. ramorum* lineage detected in WA state nurseries and non-nursery sites, with a concurrent rise in NA2 and decrease in NA1. Evaluation of genotypes over the past 5 years by Washington State University shows the reversal in genotype frequency occurred in 2008 and persisted into 2009. They detected EU1 in 99 positive samples at seven locations, NA1 in 17 samples at four sites, and NA2 in 48 samples at three sites in 2009. In contrast, the first year of the study (2005) identified four EU1 samples at one site, 103 NA1 samples at 14 sites, and 12 NA2 samples at five sites.

- A lawsuit was filed on 3/8/10 in Columbia, South Carolina by the California Association of Nurseries and Garden Centers (CANGC) and the Oregon Association of Nurseries (OAN), seeking to overturn a new South Carolina regulation that requires California and Oregon growers shipping plants to SC to comply with additional inspection, documentation and advance notice requirements which are more restrictive than the federal *P. ramorum* rules. The suit, which names the State of South Carolina and the South Carolina Department of Agriculture, challenges the new regulation as both unconstitutional and prohibited by the Plant Protection Act.

2/10

- As part of the perimeter survey conducted at a *P. ramorum*-positive retail nursery in Pierce County, Washington last summer, the Washington State Department of Agriculture identified infested salal (*Gaultheria shallon*) plants in the natural landscape. Follow-up analysis has resulted in the isolation of the NA2 lineage from the salal. This is the first detection of the NA2 lineage on native forest vegetation.

- Ten species have been added to the list of federally regulated *P. ramorum* associated host plants. The USDA Animal and Plant Health Inspection Service (APHIS) ADDED: Mexican-orange (*Choisya ternate*), kousa dogwood (*Cornus kousa*), *Daphniphyllum glaucescens*, European holly (*Ilex aquifolium*), Japanese-oak (*Lithocarpus glaber*), *Magnolia cavalieri*, *Magnolia foveolata*, bayleaf currant (*Ribes laurifolium*), bilberry (*Vaccinium myrtillus*), and lingon berry (*Vaccinium vitis-idaea*) to the list. Symptoms for each of the new hosts other than bilberry were leaf necrosis. Tip dieback occurs in infected bilberry as well as *Daphniphyllum glaucescens* These species were identified as susceptible by the Canadian Food Inspection Agency (CFIA) and the United Kingdom's Food and Environment Research Agency (FERA). Nurseries currently operating under an APHIS *P. ramorum* compliance agreement are able to continue shipping hosts and associated plants, including the newly listed plants; however, any nurseries not currently under a compliance agreement that contain these new species must be properly inspected, sampled, tested, and placed under a Compliance Agreement in order to be able to move any plants interstate.

01/10

- Washington had two *P. ramorum*-positive locations identified in January. Both sites have previously been found positive for the pathogen. One positive find was in retention pond water at a Pierce County retail nursery.

12/09

- Findings from the 2009 National *P. ramorum* Early Detection Survey of Forests have resulted in more stream detections outside of nurseries and to the east of the regulated states than in any other year. To date for the 2009 season, five new streams have been found positive – three in AL, one in OR, and one in GA. Since the inception of the survey in 2006, 15 positive streams have been identified, nine of which have been outside of the regulated areas in CA and OR. While the pathogen has been detected in streamside plants in MS, no established infections have been found.

- A Placer County, California retail nursery was confirmed positive for *P. ramorum* on 12/23/09. The positive sample was collected by the County during a compliance agreement renewal inspection; however, due to the find, the compliance agreement has been suspended. The positive sample was found on a 1-gallon coast redwood. The nursery does not ship host material interstate. The site was previously found positive in 2005 as a result of a positive trace-forward plant.

11/09

- In U.S. nurseries, *P. ramorum* is detected in 9 states at 26 sites. Positive nursery detections by state include: CA(4), OR(6), WA(6), AL(3), GA(2), MS(1), NJ(1), NC(2), and SC(1).

6/09

- Six streams outside of nurseries are found *Phytophthora ramorum* positive in five states: WA(1), MS(1), AL(2), GA(1), and FL(1). All confirmed locations have had more than one positive detection in 2009.

- *P. ramorum* is detected in 6 landscapes and 1 nursery perimeter. Washington has 3 trace-forward landscape detections and 1 nursery perimeter detection. The perimeter detection is the first documented case of the pathogen escaping a nursery and moving into a local environment. Maryland, Pennsylvania, and South Carolina each have 1 trace-forward landscape detection.

4/09

- Camfor tree (*Cinnamomum camphora*) is found *P. ramorum*-positive for the first time in the US at a Sacramento County, CA nursery.

3/09

- Ten new hosts are added to the federal list of regulated hosts: *Cornus kousa*, *Choisya ternate, Daphniphyllum glaucescens*, *Ilex aquifolium*, *Lithocarpus glaber*, *Magnolia cavalieri*, *Magnolia foveolata*, *Ribes laurifolium*, *Vaccinium myrtillus*, and *Vaccinium vitis-idaea*.

9/08

- A British Columbia (BC) production nursery was found to have *P. ramorum*-positive plants, including *Viburnum bodnantense*, *V. burkwoodii*, *V. carlesii*, and *Cornus kousa*. This nursery is undergoing eradication per the CFIA nursery eradication protocol. Seven nurseries in the state of Washington received shipments from this nursery. Four of the seven sites have been inspected to date. At those four sites, no symptoms were observed. Kousa dogwood (*Cornus kousa*) was also found *P. ramorum* positive at the BC nursery, approximately 50 – 100 meters from the *Viburnum* plants.

- *P. ramorum* has been detected at five Oregon nurseries and one landscape site in 2008. The most recent detection was made in early August at a retail nursery in Marion County, where the pathogen was detected by PCR infecting a *Rhododendron* and a *Corylopsis spicata*.

6/08

- As of 6/27/08, ODA has inspected and processed 13,797 samples from 336 grower sites. *Phytophthora* continues to be detected at high levels within the industry this year, having been detected at 57.1% of sites surveyed and in 8.4% of samples tested. At this same point during the 2007 survey, *Phytophthora* had been detected at 42.1% of the grower sites surveyed and in 4.5% of the samples tested.

- In mid-June 2008, a retail nursery in the greater-Charlotte area of North Carolina was found to have *P. ramorum* on two species of container-grown plants. Subsequently, a small retail nursery in the Greenville area of South Carolina was identified as a recipient of potentially infected plants as part of the trace-forward effort to locate plants that left the NC nursery.

5/08

- Multiple *P. ramorum*-positive plant samples have been confirmed outside of a Jackson, MS nursery. The samples were taken on two different dates, from three different host genera. An Emergency Action Notification has been issued; however, due to possible surface contamination 10 of the samples by silt from flooding prior to collection, further regulatory action has not yet been taken. Follow-up sampling is being conducted to determine the presence or absence of the pathogen in other vegetation near the original positive plants.

- *Cercis chinensis* (Chinese redbud) and *Magnolia* (*Michelia*) *figo* (banana shrub) have both been reported positive for *P. ramorum*. USDA APHIS is reviewing the findings, and plans to add each species to the list of hosts regulated for *P. ramorum* in early May. *Cercis chinensis* was found positive at a previously positive British Columbia nursery on November 16, 2007. Other genera found positive at the facility included *Magnolia*, *Salix*, *Rhododendron*, and *Vaccinium*.

- CA has had eleven positive nurseries (four producers, two wholesalers/producers, one production/retail, and four retailers) confirmed *P. ramorum*-positive in 2008. Four of the positive nurseries were located in Los Angeles (2), San Diego, and Santa Barbara Counties and five were located in the quarantined counties of Contra Costa (2), San Mateo, Alameda, and Humboldt.

- WSDA has completed sampling at 40% of Washington's 2008 USDA annual certification survey sites. *P. ramorum* has been found infecting *Viburnum tinus* plants at three nurseries, one in Snohomish County and two in Clark County. All three nurseries tested negative in previous years.

3/08

- ODA began inspections and testing for the 2008 USDA APHIS Annual Certification Survey in March. As of April 29th, testing has been completed on 6,279 samples collected from 153nursery growing areas. *Phytophthora* species have been detected at 60 percent of the sites surveyed, a 12 percent increase over last year. The number of *Phytophthora*-infected samples has also increased from 6 percent in 2007 to 9 percent in 2008.

2/08

- California has three *P. ramorum*-positive nursery confirmations. A Los Angeles County production nursery is found to have one *P. ramorum*-positive *Camellia sinensis* and a production/retail nursery in the county has one positive *Camellia japonica* 'Kramer's Supreme' confirmed. Both nurseries' compliance agreements have been suspended. CNP is underway at both facilities. The third confirmation is at a retail nursery in Humboldt County. Positive soil samples are found as a result of a soil delimitation sampling following a 2007 positive.

1/08

- Oregon's Curry County quarantine area is officially expanded to 162 square miles, following the State's amendment to their *P. ramorum* quarantine. For the first time, nurseries and a lumber mill are located within the quarantine area. ODA is working with affected businesses to set up the compliance agreements and inspection schedules necessary to meet federal interstate shipping requirements.

- A Florida nursery is found to have *P. ramorum*-positive *Camellia sasanqua* at two of its facilities. Both sites were found positive for the pathogen in 2007. The USDA CNP is under way at both locations.

12/07

- A total of 21 positive nursery finds are made in 2007. The states with positive detections are CA(7), OR(2), WA(7), FL(1), GA(3), and MS(1).

- *Corylopsis spicata* (spike witch hazel - Hamamelidaceae) and *Physocarpus opulifolius* (ninebark - Rosaceae) are added to the list of federally regulated associated host plants. The CFIA found both plants naturally infected in a BC, Canada nursery. Spike witch hazel symptoms were identified as leaf necrosis and ninebark symptoms included leaf necrosis and dieback.

- USDA APHIS issues a new protocol for retail nurseries found infested with *P. ramorum*, "Official Regulatory Protocol for Retail Nurseries Containing Plants Infected with *Phytophthora ramorum.*"

10/07

- *P. ramorum* inoculum was baited from Norton Creek (a small coastal stream in northern Humboldt County in the town of McKinleyville) early in the summer of 2006, with a repeat detection in the spring of 2007. The

recovered isolates have been genotyped, revealing that two lineages are present: the Northern American (NA1) and European (EU1). This is the first find in North America of the EU1 lineage in a wildland environment. Efforts are being made to determine the spore source location, including exhaustive streamside surveys. A small retail nursery in downtown McKinleyville has been found to have *P. ramorum*-positive plants, including three plants confirmed with the EU1 strain, but the nursery is located in a different watershed than the infested stream. No definitive linkages between the nursery and stream have been established.

9/07

- *Garrya elliptica* and *Mahonia aquifolium* are now regulated by the USDA APHIS for *P. ramorum*. Nurseries operating under a compliance agreement may continue to ship hosts and associated plants, including the newly listed plants. However, all other nurseries containing these newly listed plants must be properly inspected, sampled, tested, and placed under a Compliance Agreement by September 7, 2007 in order to be able to move regulated plants interstate.

8/07

- The EU implements changes to their *P. ramorum* regulations. The decision amends the list of plants, wood, and bark susceptible to *P. ramorum*; increases from one to two the number of official inspections of specific species of susceptible plants in places of production and extends eradication measures to cover growing media and plant debris as well as sanitizing the surface upon which infected plants have been standing.

- CDFA nursery inspectors are now conducting two inspections per year on "medium-risk" plants (*Viburnum*, *Pieris*, and *Kalmia*) and three inspections per year on "high-risk" plants (*Camellia* and *Rhododendron*).

7/07

- Rhododendrons planted along a residential roadway are found *P. ramorum* positive in Thurston County, WA. WSDA has implemented the landscape protocol; all rhododendrons along the roadway have been destroyed. The positive plants were provided to the landscaper from an out of state West Coast nursery.

- Canada sets aside more than $24 million in *P. ramorum* compensation funds for wholesale and retail nurseries as well as individuals impacted by pathogen eradication efforts. Compensation ranges from $4 for young plants to $300 for the largest trees. Affected parties can also claim costs incurred in the disposal and treatment of plants and related materials, either via incineration or deep burial.

6/07

- Following the April *P. ramorum*-positive stream baiting sample taken from the Sammamish River in King County, WA, WSU and WSDA collaborated with USDA ARS to genotype 40 isolates sampled from 12 nurseries both within and outside the Sammamish watershed in an attempt to trace the origin of the river isolate. Upon analysis, the Sammamish River isolate has a unique fingerprint that matches an isolate from a landscape supplier located outside of the watershed. While not a conclusive study, the finding does suggest the Sammamish River isolate may have been introduced from nursery stock originating from this wholesaler.

- Two California nurseries are identified as *P. ramorum*-positive. A San Diego County production nursery is found PCR-positive for *Pieris japonica* 'Amamiana'. This facility is under compliance for *P. ramorum* and does ship interstate. Trace-forward investigations include nurseries in seven western states and 10 CA counties. An Alameda County production nursery is also found infested with *Magnolia grandiflora*. The nursery is under compliance for *P. ramorum* and does not ship interstate.

- Oregon Grape (*Mahonia aquifolium* [Pursh] *Nutt*. - Berberidaceae Family) is found *P. ramorum*-positive for the first time at a Canadian nursery. Symptoms are primarily foliar, and include leaf spots and discoloration. This host species is native to the West Coast of the US. APHIS is reviewing the findings and anticipates adding Oregon Grape to the list of *P. ramorum*-regulated hosts soon.

5/07

- APHIS has updated the "Official Regulatory Protocol for Wholesale and Production Nurseries Containing Plants Infected with *Phytophthora ramorum.*" The revised CNP is to be used by any nursery found *P. ramorum*-positive.

- The first US findings of *P. ramorum*-positive *Loropetalum* are found at a Sacramento County, CA nursery that has previously been identified with the pathogen. Symptoms, unlike other foliar hosts, can include large and small pin-prick size lesions on the underside of leaves, surrounded by red rings.

4/07

- Four *P. ramorum*-positive nurseries are identified in CA. Three of the nurseries are retail facilities in quarantined counties. None of the three retailers are under compliance or ship out of the quarantined area. Two of the three sites have been *P. ramorum*-positive before. The fourth *P. ramorum* confirmation was made on *Loropetalum chinense* at a production nursery during an annual compliance agreement inspection. The nursery is under compliance and ships out of state (to NV only). This nursery was also found *P. ramorum*-positive in 2006 during a compliance agreement inspection.

- *P. ramorum* is found at two Oregon production nurseries. One nursery in Washington County was confirmed to have an infested block of *Camellia* and an infested block of *Rhododendron*. The second nursery, located in Clackamas County, had a *P. ramorum*-positive *C. sasanqua* 'Yuletide' plant.

- Twelve *P. ramorum*-positive nursery sites in five states have been identified to date in 2007 through federal or state inspections, nursery surveys, and/or other detections. Positive finds by state include: CA(5), FL(1), MS(1), OR(2), and WA(3).

3/07

- The European *P. ramorum* lineage has been reported for the first time in CA. It was recovered from three Humboldt County nursery isolates taken in spring of 2006 and analyzed as part of a genetic study of *P. ramorum* isolates from CDFA. Current samples have been taken at the nursery; results are pending. Trace-back investigations are underway for the 2006 confirmations.

- To date in 2007, WA has had three *P. ramorum*-positive nursery confirmations. The first two positive nurseries were found in King and Snohomish counties, and were discovered as a result of the new trace-back protocol, which requires trace-back nurseries to supply trace-forward information for a period of 30 days prior and 30 days after the shipments were sent to the positive nursery. The third *P. ramorum*-positive nursery was in Cowlitz County and was discovered as the result of a Compliance Certification Inspection.

- A Hinds County, MS nursery is found to have a *P. ramorum*-positive *Camellia* sp. The inspection was a follow-up inspection to eradication efforts performed last year.

2/07

- Sixteen silk tassel bush (Garrya elliptica) plants are found *P. ramorum*-positive for the first time in the UK. This host species is a West Coast US native. APHIS is reviewing the findings and anticipates adding silk tassel bush to the P. ramorum-regulated host list soon.

- The new USDA APHIS *P. ramorum* regulation "*Phytophthora ramorum*; Quarantine and Regulations" is published February 27, 2007 in the Federal Register. This rule primarily codifies the Federal Order issued in December 2004 that established restrictions on the interstate movement of nursery stock from nurseries in nonquarantined areas in CA, OR, and WA. The rule also incorporates all updates (SPROs) issued since the original APHIS regulation was published in 2002, most of which are updates to the host list.

1/07

- A retail nursery in Tallahassee, FL is found *P. ramorum*-positive. The nursery was also found positive in 2006. The confirmations were made on three cultivars of Camellia japonica. Trace-back surveys failed to identify a source for the infestation.

- The UK finds *Schima wallichii* (Chinese guger tree) to be a new *P. ramorum* host. The symptomatic foliar samples were taken outdoors from a historic garden near Cornwall in 2006. USDA APHIS is reviewing the findings and

anticipates adding Chinese guger tree to either the host or associated host list soon.

- *Arctostaphylos uva-ursi* (Kinnikinnik), *Prunus laurocerasus* 'Nana' (Dwarf English Laurel), and *Osmanthus delavayi* (Delavay Osmanthus) nursery stock are found *P. ramorum*-positive in King County, WA. As Koch's postulates have not been completed, all three species will be added to the "APHIS List of Regulated Hosts and Plants Associated with *Phytophthora ramorum*" as associated plants, and regulated only as nursery stock.

- Two new *P. ramorum* A2 isolates from the EU lineage are identified in Belgium. The finding was made as a result of a Belgian research project that began in 2006 and screened all stored Belgian isolates of *P. ramorum* for their mating types. Both new isolates originated from nurseries in northern Belgium from two separate sites and from different hosts *(Rhododendron* and *Viburnum*).

12/06

- In 2006, USDA APHIS reported 62 sites in 11 states as having had nursery-related *P. ramorum* detections. Positive findings by state are: AL(1), CA(28), CT(1), FL(2), GA(1), IN(1), ME(1), MS(1), OR(13), PA(1), and WA(12).

11/06

- A CA production nursery in Santa Clara County is confirmed *P. ramorum*-positive. The positive *Vancouveria planipetala* (redwood ivy) was collected during an initial compliance agreement inspection. The nursery is not currently under compliance and does not ship or intend to ship out of the quarantined counties.

10/06

- The CFIA detects *P. ramorum* at four retail garden centers (two sites have the same owner) in early September and October. *P. ramorum* was found at the sites in 2004; all four sites were found free of the pathogen in 2005. All four centers source plants both locally and from the US and were sampled as post eradication sites due to the previous detections. The plants found infected were *Rhododendron* and *Viburnum*.

- Eradication efforts continue at a wholesale nursery in British Columbia, where *P. ramorum* was detected in late 2005. As a repeat site, stringent controls have been implemented. Trace-forwards from this nursery site this year have detected two residential/commercial landscape sites with 11 positive *Gaultheria shallon* plants.

9/06

- A Santa Cruz County production nursery is identified as *P. ramorum*-positive as a result of a positive growing media sample collected from a camellia pot during CNP activities. The pot was located directly under a California bay

laurel tree which is rooted in a stream known to be positive for *P. ramorum*. The samples submitted from the bay tree are pending. This nursery also tested *P. ramorum*-positive in 2003, 2004, and 2005.

- Koch's postulates are completed for: *Acer pseudoplatanus, Aesculus hippocastanum, Laurus nobilis,* and *Michelia doltsopa*. Consequently, these hosts will be reclassified from the APHIS "Plants Associated with *P. ramorum"* list to the list of "Proven Hosts Regulated for *P. ramorum*.

- To date, 56 nurseries have been positive for *P. ramorum* in 2006. The breakdown by state is: CA (26), OR (13), WA (8), AL (1), CT (1), FL (2), GA (1), IN (1), ME (1), MS (1), and PA (1).

- Forty-six participating states have reported *P. ramorum* National Nursery Survey results. To date, 3,513 nurseries have been visited and 95,295 samples collected. Out of the samples collected, 352 have been confirmed *P. ramorum*-positive.

8/06

- *Ceanothus thyrsiflorus*, *Cinnamomum camphora*, *Kalmia angustifolia*, *Nerium oleander*, *Osmanthus fragrans*, *Osmanthus heterophyllus*, and *Quercus acuta* are officially added to the APHIS list of regulated "Plants Associated with *P. ramorum."*

- *Fagus sylvatica*, *Kalmia latifolia*, *Quercus cerris*, *Salix caprea*, and *Viburnum* spp. are transferred from the APHIS "Plants Associated with *P. ramorum"* list to the "Proven Hosts Regulated for *P. ramorum*" list, based on the completion of Koch's postulates.

- *Eucalyptus haemastoma* Sm. (Myrtle family), *Cornus kousa* x *Cornus capitata* (Dogwood family), and *Castanopsis orthacantha* Franchet (Beech family) are added to the UK DEFRA list of Plants Reported as Natural Hosts of *P. ramorum.* All three hosts were found *P. ramorum*-positive in the UK. APHIS is researching the findings and anticipates adding these plants to APHIS "Plants Associated with *P. ramorum*" list soon.

- Canada adds five new genera to the CFIA *P. ramorum* host list: *Loropetalum*, *Distylium*, *Manglietia*, *Parakmeria*, and *Ilex*. These additions are the result of positive confirmations from the species: *Loropetalum chinese, Distylium myricoides*, *Manglietia insignis*, *Parakmeria lotungensis*, and *Ilex purpurea*. APHIS is reviewing the findings and anticipates adding the new hosts to the APHIS "Plants Associated with *P. ramorum*" list in the near future.

- Researchers report findings of *P. ramorum* infecting Camellia flower buds. This is the first report of camellia flower bud infection in the field with the North American genotype of *P. ramorum*.

- A San Joaquin County, CA production nursery is found to have five *P. ramorum*-positive Camellia varieties ('Jean May,' 'Bonanza,' 'Showa-no-sakae,' 'Chansonette' and 'Nuccio's Pearl') during a compliance agreement

inspection. The facility was also found to be *P. ramorum* positive in 2004. CNP is under way.

7/06

- An Alabama retail nursery is confirmed positive for *P. ramorum.* The infected Camellia sp. is found on the nursery cull pile during a *P. ramorum* National Nursery Survey inspection.

- A *P. ramorum*-positive *Viburnum mariesii* is found at a small Indiana retail outlet as the result of a trace-forward investigation from a production nursery in Clackamas County, OR.

- *P. ramorum*-positive *Pieris* sp. 'Mountain Fire' is found at a Georgia retail nursery during a trace-forward investigation from a production nursery in Clackamas County, OR. CNP is underway.

- *P. ramorum*-positive *Syringa vulgaris* 'Ludwig Spaeth' is identified at a small Maine retail nursery as a result of a trace-forward investigation from a production nursery in Clackamas County, OR.

- A MS retail nursery is confirmed to have *P. ramorum*-positive *Camellia* sp. during a *P. ramorum* National Nursery Survey inspection. Trace-back investigations are being conducted. CNP is underway at the facility.

- *P. ramorum* federal order compliance agreements, trace-forward/-back investigations, the USDA APHIS National Nursery Survey, and other investigations are ongoing. To date, 48 sites in 9 states have had *P. ramorum* detections. Positive findings by state are: AL(1), CA(25), FL(2), GA(1), IN(1), ME(1), MS(1), OR(13), and WA(3).

- *P. ramorum*-positive *Camellia japonica* 'Kramer's Supreme' is detected at a Napa County production nursery as a result of a Sacramento County nursery trace-forward investigation. The addition of this facility brings California's 2006 total number of confirmed nurseries to 25.

6/06

- *Osmanthus fragrans* (sweet olive) and *Osmanthus heterophyllus* (false holly), are found *P. ramorum*-positive in a Humboldt County nursery. APHIS is reviewing the findings and anticipates adding these new species to the APHIS "Plants Associated with *P. ramorum*" list in the near future.

- APHIS confirms *Nerium oleander* (Oleander) to be a new *P. ramorum*-associated host when delimitation survey samples from the Humboldt County facility are confirmed positive.

- Forty-three states have reported compliance inspection or National Nursery Survey results. Puerto Rico, AK, IA, and MO are not participating in the Survey, and WI is looking for *P. ramorum* as part of their regular nursery inspection process. To date in 2006; 2,786 nurseries have been visited, with

88,973 samples collected. Out of the samples collected, 327 have been confirmed *P. ramorum*-positive, totaling 42 positive sites in five states (CA, OR, WA, FL, and MS).

- CA has six *P. ramorum*-positive nursery confirmations. Two of the confirmations are in production facilities and four are retail nurseries. Affected counties include: Sonoma, San Joaquin, Sacramento, and San Mateo. Four of the nurseries have had prior *P. ramorum* confirmations. These new finds bring the State's 2006 total number of *P. ramorum*-positive nurseries to 24.

- ODA completes its *P. ramorum* Federal Order certification for 2006. Of the 62,045 samples collected from 1,112 growing areas, *P. ramorum* was found at 13 nurseries (about 1.0 percent). CNP has been enacted at all 13 sites. A total of 938 host and 1,000 non-host nurseries in OR now qualify for certification under the Federal Order certification program.

- ODA completes its statewide survey of Christmas tree plantations. A total of 4,480 samples were collected from 113 plantations; no *P. ramorum* was found at any of the sites surveyed. This is the fifth consecutive year no *P. ramorum* has been found in OR Christmas trees.

- A *P. ramorum* survey of OR retail nurseries is now underway. ODA plans to survey and sample approximately 150 retail nurseries that sell *P. ramorum*-susceptible plants.

5/06

- Six California nurseries are identified as *P. ramorum*-positive, bringing the State's 2006 total number of positive nurseries to 18. Confirmations are made in Humboldt, Marin, Mendocino, Los Angeles, Tulare, and Santa Clara Counties. Two of the nurseries do ship interstate and two of the nurseries have had *P. ramorum* detections in previous years. Positive plants include: *Viburnum tinus*, *Camellia sasanqua*, *Camellia japonica*, *Rhododendron, Laurus nobilis*, and *Magnolia grandiflora.*

- The first detection of *P. ramorum* on *Magnolia grandiflora* in a US nursery is made at a Santa Clara County, CA production facility. The nursery does ship interstate, and was also found *P. ramorum*-positive in 2005.

4/06

- Four CA *P. ramorum* nursery confirmations are made, including: a San Mateo County producer, a Sacramento County producer, and two Alameda County retail nurseries. All four sites identified have positive Camellia, with one facility also having positive *Rhododendron* and *Pieris*. Three of the four nurseries have previously been found to have *P. ramorum*-positive plants. These 4 confirmed facilities bring the State's 2006 total to 12.

- As of April 14th, ODA has identified *P. ramorum* at 4 sites surveyed as part of the *P. ramorum* 2006 Federal Order Inspection. Three of the sites are small

grower facilities located in Polk, Washington, and Lane Counties. The fourth site is a small retail facility located in Lane County. Positive plants include *Camellia japonica*, *Rhododendron*, and *Pieris japonica*. Two of the small grower nurseries ship a small volume of host plants out-of-state; trace-forward investigations are underway. CNP has been initiated at all sites.

3/06

- New Zealand issues a public notice addressing nursery stock importation concerns, including risk mitigation measures and the host list for *P. ramorum*. With the exception of high-value plants for which the risk of *P. ramorum* is mitigated, hosts of *P. ramorum* are only permitted to be imported from countries recognized by New Zealand as Pest-Free Areas, which currently include: Australia, Canada, Israel, and South Africa. The proposed date of adoption and enforcement is May 29, 2006.

- Taiwan, Penghu, Kinmen, and Matsu issue a public notice proposing a draft amendment of the "Quarantine Requirements for the importation of plants or plant products." Among the changes is the designation of *P. ramorum* as a quarantine pest, whereby: "The importation of living plants (excluding flowers, fruits and seeds) of its hosts will be prohibited. Regions or countries affected include: Belgium, British Channel Islands, Denmark, France, Germany, Ireland, Italy, Netherlands, Norway, Poland, Slovenia, Spain, Sweden, Switzerland, UK, BC, CA, FL, GA, OR, and WA.

- CA confirms three nurseries to be *P. ramorum*-positive, including: a Sacramento production facility, a retail nursery in Alameda County, and a Solano County production facility. All confirmations made were on *Camellia*. One facility has previously been found positive. *P. ramorum*-positive nurseries for CA in 2006 now total eight.

- Florida confirms two *P. ramorum*-positive nurseries. Of the 23 *Camellia* plants found infected, five species were identified, including *japonica*, *sasanqua*, *sinesis*, *hiemalis*, and *vernalis*. Both of the Tallahassee nurseries were also found positive in 2004 surveys, following trace-forward investigations from a Southern California wholesale facility. It has not been determined if the pathogen was re-introduced or if it has persisted at the nurseries in soil and/or water since the initial findings.

2/06

- A water sample taken from a seasonal stream in Pierce County, WA is confirmed *P. ramorum*-positive. Plants from the adjacent nursery tested positive in 2004 and 2005. Agencies are monitoring the water upstream and downstream from the positive site to determine the extent of water contamination. Monitoring for signs of infestation throughout the immediate watershed area outside of the nursery will also be conducted.

- APHIS issues a SPRO Letter, adding 13 new plant species to the federal *P. ramorum* associated host list. The SPRO can be found on the APHIS website under "Revision of Listed and Regulated Articles" dated 2/10/06 at:

http://www.aphis.usda.gov/plant_health/plant_pest_info/pram/regulations.shtml.

- Koch's postulates are completed for *Frangula purshiana* (formerly listed as *Rhamnus purshiana*), *Adiantum aleuticum*, and *Adiantum jordanii*. Consequently, APHIS reclassifies these associated hosts as hosts.

- APHIS issues a Trace-Forward Protocol for Nurseries that Received Plant Material Shipped from a Confirmed *P. ramorum*-Infested Nursery. The new protocol is intended to establish a set of procedures that are used to determine if a nursery that has received plants from a *P. ramorum*-positive nursery acquired infected nursery stock, thus becoming infested as well.

- CDFA identifies four *P. ramorum*-positive nurseries: a production facility in Contra Costa County, a retail nursery in Alameda County, a retail nursery in Nevada County, and a Napa County retail nursery. Plants found positive for the pathogen included *Camellia* and *Pieris*; all four nurseries have previously been identified as having *P. ramorum*-positive plants.

1/06

- The first 2006 *P. ramorum*-positive nursery is identified during a CA compliance agreement inspection. The find was made on a *Camellia japonica* in a Los Angeles County production nursery that only sells plants to local landscapers and does not do any shipping of plant material. This nursery was also found *P. ramorum*-positive during last year's compliance agreement inspection, and had completed CNP in May 2005.

- The Canadian nursery industry implements a *P. ramorum* Nursery Certification Program. Key program components include annual sampling and testing, training, and independent audits. For more information, go to the CNLA website: http://www.canadanursery.com/Page.asp?PageID=122&ContentID=750&SiteNodeID=102.

11/05

- A WSU researcher isolates *P. ramorum* from California red fir *(Abies magnifica)* symptomatic shoots at a Christmas tree farm near Los Gatos, CA. Koch's Postulates have not been completed. The findings are being evaluated and considered by APHIS for the potential addition of California red fir to the regulated host list.

10/05

- For the fourth year in a row, *P. ramorum* has not been found in OR Christmas tree plantations. Based on these results, Christmas tree plantations in all OR counties surveyed are officially declared *P. ramorum*-free for 2005.

- *Viburnum opulus* (=*V. trilobum*), or American cranberry viburnum, is found to be *P. ramorum*-positive at a nursery in Clackamas County, Oregon on June 6,

2005. APHIS has reviewed the findings and expects to add American cranberry viburnum to the *P. ramorum* associated host list soon.

- Real-time PCR is validated by USDA APHIS PPQ CPHST for providing diagnostic determinations for the *P. ramorum* federal emergency program.

- The HRI (research division of the ANLA) convenes a national working group to explore the role of nursery management practices in the battle to limit *P. ramorum* spread. The group will develop RMPs that can be used by nurseries nationwide to establish or improve management plans. Long-term goals include building a working model for response to emerging plant pests.

- APHIS confirms the detection of *P. ramorum* at two nurseries in Washington State. These two additional infested nurseries are located in Snohomish County and King County. Infected species at both nurseries are varieties of Rhododendron.

- To date this year, 99 sites in seven states have had nursery-related *P. ramorum* detections. Positive findings by state are: CA(55), GA(4), LA(2), OR(20), TN(1), SC(1), and WA(16).

9/05

- CDFA confirms the detection of *P. ramorum* on *Abies concolor* (white fir) at a Christmas tree farm in the quarantined county of Santa Clara. This is the first report of the pathogen on this species of *Abies*. With Koch's Postulates not complete, APHIS expects to add *A. concolor* to the official list of associated host plants soon.

- APHIS issues an updated SPRO Letter, adding the eight new associated host plants to the list of *P. ramorum*-regulated plants. The addition of these eight plants brings the list of regulated *P. ramorum* host and associated hosts to 83. To access the SPRO, go to the APHIS website and refer to the 9/14/05 SPRO at: http://www.aphis.usda.gov/ppq/ispm/pramorum/.

- The USDA issues a strategic plan for *P. ramorum* titled: "Plant Diseases Caused by *Phytophthora ramorum*: A National Strategic Plan for USDA." The report addresses the goals for the *P. ramorum* detection, control, management, research, and restoration programs of the Department.

- As of 9/05, England has had 380 *P. ramorum* retail and nursery confirmations, and Wales has had 26.

8/05

- A Nursery Pest Advisory Task Force (NPATF) is created at the request of California's Secretary of Agriculture, A.G. Kawamura. The Task Force is comprised of representatives from the USDA, CDFA, CDF, UC Davis, county agricultural commissioners, and the nursery industry. The group will address issues related to new and/or emerging nursery pests. Their present focus is working in concert with the California Oak Mortality Task Force in its efforts to

address *P. ramorum* issues.

- CDFA has identified 53 *P. ramorum*-positive CA nurseries in 2005. Ten of the confirmed nurseries ship interstate, with two of the ten shipping only to Nevada outside of California's borders. Eight of the confirmed nurseries have had recurrent infestations.

- USDA APHIS issues an updated State Plant Regulatory Official (SPRO) Letter, adding eight new associated host plants and two new host plants to the list of plants regulated for *P. ramorum*. The addition of these 10 plants brings the list of regulated *P. ramorum* host and associated hosts to 75. To refer to the SPRO, go to: http://www.aphis.usda.gov/ppq/ispm/pramorum/.

- Six hosts are moved from the associated host list to the host list, with all having Koch's Postulates complete and having been approved by USDA APHIS. The six newly classified hosts are: *Castanea sativa*, *Fraxinus excelsior*, *Quercus falcata*, *Quercus ilex*, *Syringa vulgaris*, and *Taxus baccata*.

- The UK officially identifies and reports to USDA APHIS three new *P. ramorum*-infected plants. *Acer laevigatum* (Evergreen maple), *Michelia doltsopa* (Michelia), and *Quercus petraea* (Sessile oak) were found in outdoor, green areas with natural infection. Koch's Postulates have not been completed, so these plants will join the APHIS associated host list.

- Five new *P. ramorum* hosts are identified in California's quarantined county forests. The newly confirmed *P. ramorum*-susceptible plants are: *Adiantum aleuticum* (Maidenhair fern), *Fraxinus latifolia* (Oregon ash), *Osmorhiza chilensis* (Sweet Cicely), *Torreya californica* (California nutmeg), and *Vancouveria planipetala* (Redwood ivy). Koch's Postulates have not been completed, so these plants will be added to the USDA APHIS associated host list.

- A South Carolina wholesale nursery/broker is found to have a *P. ramorum*-positive *Camellia japonica*. The nursery is part of a chain of 25 nurseries in five states, all of which deal primarily with the landscape industry. Surveys of the remaining 24 related nurseries are underway.

- WSDA identifies eight additional *P. ramorum*-positive nurseries, bringing the total number of confirmed WA nurseries to 10 in 2005. Eight of the 10 positive WA nurseries in 2005 were found positive for *P. ramorum* in 2004. Of the eight new confirmations, six were retail nurseries and two were wholesale facilities. Identified hosts included primarily *Rhododendron*, but also *Kalmia*, *Viburnum*, and *Pieris*.

- Oregon confirms six new *P. ramorum* findings, bringing the state's 2005 confirmation total to 20. Four of the *P. ramorum*-positive sites were wholesale nurseries and 13 were retail facilities. Three of the *P. ramorum*-positive nurseries do ship out-of-state; all three ship primarily to the West Coast.

- *P. ramorum* federal order compliance agreements, trace-forward/-back investigations, the USDA APHIS National Nursery Survey, and other

investigations are ongoing. To date, 91 sites in seven states have had *P. ramorum* detections. Positive findings by state are: CA(53), GA(4), LA(2), OR(20), TN(1), SC(1), and WA(10).

7/05

- The first *P. ramorum*-infected *Taxus media* is reported from the Netherlands, making this the third yew to be identified as susceptible to *P. ramorum*. With Koch's postulates not completed, this plant is being added to the USDA APHIS list of *P. ramorum*-regulated associated host plants

- ODA identifies five additional nurseries in four counties with *P. ramorum*-confirmations. Affected plants include: *Pieris*, *Rhododendron*, and *Magnolia*. The *Magnolia* confirmation is the first to be reported in the US.

- WSDA confirms two *P. ramorum*-positive nurseries during the National Nursery Survey. One facility has infected *Rhododendron* and the other has infected *Viburnum*, *Rhododendron*, and *Pieris*.

- Two additional retail garden center nurseries are found infested with *P. ramorum* in Georgia. One has infected *Rhododendron* and *Camellia*, while the other has infected *Camellia sasanqua*.

6/05

- A retail nursery in Bradley County, Tennessee is confirmed to have *P. ramorum*-positive *Rhododendron elegans* "Elegans" and *Rhododendron* spp. "Boursault" during their *P. ramorum* National Nursery Survey inspection.

- A production nursery in Lincoln County, Oregon is found with *P. ramorum*-infected *Rhododendron* sp. The confirmation is made during a compliance agreement renewal.

- A Los Angeles County, CA retail nursery is found to have *P. ramorum*-positive plants that have been shipped directly to customers, not nurseries or garden centers. Shipments went to 32 states nationwide as well as 9 foreign countries. Regulatory officials are informing affected states of the shipments.

- Six additional California nurseries are identified as *P. ramorum*-positive; one had been found positive for the pathogen previously. Five of the nurseries are production facilities and one is a retail site. Of the two nurseries that ship interstate, one only ships stock to Nevada.

- To date this year, 62 sites in 5 states have had *P. ramorum* detections. Positive findings by state are: CA(48), GA(2), LA(2), OR(9), and TN(1).

5/05

- *P. ramorum*-positive mountain laurel (*Kalmia latifolia*) and camellia are confirmed at a Gwinnett County, GA wholesale nursery. The plants are

identified as a result of the USDA APHIS National Nursery Survey. The nursery had a previous camellia *P. ramorum* confirmation in 2004.

- A second GA retail nursery is found positive for *P. ramorum*. The facility was a positive trace-forward in 2004.

- Two LA nurseries are found to have *P. ramorum*-positive camellias during the USDA APHIS National Nursery Survey. One of the nurseries was found to have the pathogen in 2004; the other is an initial find.

- CDFA identifies 16 additional CA nurseries with *P. ramorum*-positive plants; four of the nurseries ship interstate. Two of these confirmations are from previously positive nurseries.

- An updated "Nursery Guide for Diseases Caused by *Phytophthora ramorum* on Ornamentals: Diagnosis and Management" is available free of charge at the University of California Agriculture and Natural Resources website.

4/05

- APHIS confirms the presence of *P. ramorum* on an OR jasmine plant sample. As a result, ODA, APHIS, and others are working to determine jasmine's status as a host of *P. ramorum*.

- Monrovia implements a plant replacement program for retail customers whose plants originated from their Azusa facility. Customers replacing plants should **NOT** bring them to garden centers.

- ODA identifies two *P. ramorum*-positive nurseries while conducting Federal Order compliance surveys. One was a small retail nursery in Washington County with infected *Pieris japonica* and the other a production and wholesale facility in Clackamas County with infected *Rhododendron* 'Unique.'

- OR reports four trace-forward positives in residential settings. The residential finds originated at a nursery found positive in 2004. Delimitation surveys confirmed the disease has apparently not spread to other plants already in the landscapes. Infected plants have been removed and incinerated.

- CDFA reports additional *P. ramorum*-positive plants found at the Sacramento, CA, retail nursery found positive in March. Infected plants include rhododendron, camellia, viburnum, and pieris.

- CDFA has confirmed 32 *P. ramorum*-positive California nursery in 2005. Twenty-two of the confirmations have been made outside of the 14-county quarantined area, while ten have been found within it. Of those nurseries found to be infested, seven have previously tested positive for the pathogen.

- The first *P. ramorum*-positive *Acer pseudoplatanus* (Planetree maple) is confirmed at a *P. ramorum* woodland garden site in Cornwall, UK. Pending USDA review and approval, it will be added to the US list of *P. ramorum*-regulated plants.

- The UK completes Koch's postulates on: sweet chestnut (*Castanea sativa*), Holm oak (*Quercus ilex*), and European ash (*Fraxinus excelsior*). Following USDA review and approval, plants will be moved to the US *P. ramorum* host list.

- The CFIA issues an updated *P. ramorum* directive 3/1/05, superseding the 9/25/03 order in response to the USDA APHIS 12/21/04 Emergency Order. USDA APHIS is provided $9.5 million in emergency funds through the USDA CCC to help support *P. ramorum* regulatory activities in 2005.

3/05

- A Sacramento, CA retail nursery is found to have *P. ramorum*-infested *Rhododendron* sp. v. Colonel Coen. CDFA has delimited the infestation and destroyed infected lots. Trace-back investigations are underway.

- 2004 *P. ramorum* nursery detection statistics are updated to account for an additional bonsai camellia confirmed positive in February 2005. The Pennsylvania sample was confiscated in June 2004. With this new confirmation, the total number of USDA APHIS *P. ramorum*-positive detections (in or associated with nurseries) for 2004 has been adjusted to 177 positive finds in 22 states, with Pennsylvania having 2 detections.

2/05

- CDFA completes delimitation and perimeter surveys of the Los Angeles County, CA nursery confirmed to have *P. ramorum* in January. To date, one culture sample from a block of 898 *Camellia japonica* plants has been confirmed positive by APHIS. Four other samples from the block have tested positive by CDFA. All 898 plants in the infected block have been destroyed. The nursery has resumed shipping non-host plants from outside the destruction block and buffer areas. Host and associated host plants, to the genera level, are still being held and will not be released until all test results are complete. No plants from trace-forward investigations have tested positive to date.

1/05

- A previously identified *P. ramorum*-positive nursery in Los Angeles County, CA has detected infection on camellia. The symptomatic plant was identified following a series of rainstorms. Leaf samples were taken and cultured on-site. Following the CDFA review and confirmation of the nursery's camellia culture sample, the USDA's Confirmed Nursery Protocol (CNP) was implemented.

- The Canadian Food Inspection Agency (CFIA) lifts its restriction on *P. ramorum* host cut flowers (including roses) from non-quarantine California counties as a result of the new USDA Animal and Plant Health Inspection Service (APHIS) Federal Emergency Order.

- The UK's Department of Environment, Forestry, and Rural Affairs (DEFRA) has identified six new plants associated with *P. ramorum*: *Griselinia littoralis* – Cornaceae (NZ privet); *Hamamelis mollis* – Hamamelidaceae (Chinese witch-hazel); *Magnolia stellata* – Magnoliaceae (star magnolia); *Magnolia x loebneri* – Magnoliaceae (Loebner magnolia); *Magnolia x soulangeana* – Magnoliaceae (saucer or Japanese magnolia); and *Parrotia persica* – Hamamelidaceae (Persian Parrotia or irontree). It is anticipated that APHIS will soon be adding these species to their official *P. ramorum* associated host list. Once included on the US list, these plants will fall under federal *P. ramorum* regulations.

12/04

- The Animal and Plant Health Inspection Service (APHIS) issues an emergency federal order that will take effect on 1/10/05, superseding the 4/22/04 emergency order. The new order regulates the interstate movement of host and non-host plants from nurseries in California, Oregon, and Washington to help prevent the spread of P. ramorum to uninfested areas of the US.

- False Solomon's seal *(Maianthemum racemosum*, formerly *Smilacina racemosa), Calluna vulgaris* (Scotch heather), and *Photinia fraseri* (Red tip photinia*)* are moved from the APHIS associated host list to the host list in the 12/21/04 Federal Order. These changes are made because of the completion of Koch's postulates for each species.

- With the new USDA APHIS emergency P. ramorum order taking effect, Canada will rescind regulations implemented as a result of the Monrovia event last March. Following the Monrovia confirmations, Canada quarantined rose plants and cut roses as well as all host genera plants and plant parts from anywhere in CA. Canada's updated regulation will only affect CA's 14 quarantined counties. Additionally, Canada is no longer considering quarantine regulations for WA and OR. With the new federal order in place, Canada will accept any material that is in compliance with US rules.

- Currently there are 176 USDA APHIS confirmed positive P. ramorum sites in 22 states from trace-forward, national, and other surveys. The breakdown per state is: AL(3), AR(1), AZ(1), CA(55), CO(1), CT(3), FL(6), GA(16), LA(5), MD(3), NC(9), NJ(1), NM(1), NY(1), OK(1), OR(24), PA(1), SC(4), TN(2), TX(11), VA(2), and WA(25). The newly identified Maryland nursery tested positive after being sampled as part of the Hines Nursery (OR) trace-forward investigation.

11/04

- Omnibus appropriations for federal *P. ramorum* funding in 2005 is $9.89 million. The Agricultural Appropriations Bill earmarked $1.45 million for the Agricultural Research Service; $94,000 for the Cooperative State Research, Education, and Extension Service; and $3 million to the Animal and Plant Health Inspection Service. The Interior Appropriations Bill earmarked $2 million to USDA Forest Service (FS) Cooperative Lands Forest Health Management and $2.5 million to USDA FS Forest and Range Land Research.

- The Oregon Department of Agriculture receives and approves a revised federal label for the use of Agrichem's Agri-Fos® on landscape, golf course, nursery, forestry, and park sites for Phytophthora and Pythium diseases, including Sudden Oak Death. Oregon will allow all uses listed on the approved product label. Note: California currently has a Special Local Needs registration for Agri-Fos® use on oaks and tanoaks to prevent *P. ramorum*.

- *P. ramorum* is detected at six additional Oregon nurseries while conducting compliance agreement surveys. *P. ramorum* has now been found at 13 nurseries as a result of the survey. No infected plants were found at Christmas tree plantations. Additionally, trace-forward investigations from a positive nursery in Forest Grove, OR results in pathogen identifications in three Connecticut nurseries.

- The Washington State Department of Agriculture (WSDA) inspects more than 100 Christmas tree plantations for *P. ramorum* on a fee-for-service basis. Additionally, WSDA and the Department of Natural Resources complete surveys on 98 Noble fir (*Abies procera*) sites. As part of the *P. ramorum* National Wildland Survey, 93 nursery perimeters and 26 wildland sites have been surveyed. *P. ramorum* was not found. To date, no Washington conifers have been found to harbor the pathogen.

- The federal "Confirmed Residential Protocol for *P. ramorum* Detections in Landscaped Residential or Commercial Settings" is now posted to the USDA APHIS PPQ website. The protocol describes actions to be taken by regulatory officials when *P. ramorum*-positive plants are found in home gardens and other landscaped areas.

10/04

- Four additional Oregon nurseries are identified with *P. ramorum*-positive plants. Three of the nurseries are small and do not routinely ship interstate, while the fourth does do some out-of-state shipping. Three of the nurseries are located in the northern part to the Willamette Valley and the fourth is in southwestern Oregon.

- "*P. ramorum* – a guide for Washington nurseries" is now available. The guide covers host and associated plant species, host symptoms, pathogen biology, disease prevention, cultural management, protection and suppression with fungicides, and detection and eradication.

- The USDA APHIS PPQ *P. ramorum* National Nursery Survey activities are complete in 38 states and Puerto Rico. To date, participating states throughout the US have surveyed 3,095 sites and have collected 50,820 samples. Fifteen survey sites have been confirmed positive.

- UK Minister for Plant Health and Forestry Ben Bradshaw announces conditional financial assistance for nurseries suffering hardships related to actions taken to protect the wider UK environment from *P. ramorum*.

9/04

- The Oregon Department of Agriculture Plant Division posts a list of 119 nurseries and 287 Christmas tree growers that are participating in Oregon's *P. ramorum*-free program. To be posted to the list, nurseries and Christmas tree growers must have been inspected, tested, and found *P. ramorum*-free, and must have signed a compliance agreement with the state.

- APHIS PPQ *P. ramorum* National Nursery Survey activities are complete in AK, AR, AZ, CA, IA, ID, LA, MO, MT, NE, ND, OK, and SD; diagnostic results are pending. To date, participating states have surveyed 2,166 sites and have collected 39,406 samples, with 15 sites being confirmed positive (total positive national survey sites have been adjusted downward due to re-categorization of WA finds).

- The US Forest Service *P. ramorum* Nursery Perimeter Survey is underway. To date, 2,430 samples have been taken from 610 locations. All completed results have been reported as negative for *P. ramorum*.

- USDA APHIS PPQ confirms *P. ramorum* at two production areas owned by a large wholesale nursery in Washington County, OR, and at a bark supply company in Columbia County, OR.

- The Washington State Department of Agriculture begins testing symptomatic and asymptomatic plants coming into the state before unloading shipments in an effort to prevent new *P. ramorum* introductions on host nursery stock.

- Effective September 9, 2004, the National Plant Quarantine Service, Ministry of Agriculture and Forestry, Republic of Korea (NPQS), modified its "Tentative phytosanitary measures to prevent the introduction of Sudden Oak Death (SOD) Disease." Updates to the regulation include the addition of Nassau County, NY, as well as 22 new plant species. These emergency measures prohibit the importation of any propagative host material, such as nursery stock and cuttings, as well as wood (with bark) and growing media from the prohibited areas.

8/04

- The Oregon Department of Agriculture (ODA) lifts its quarantine of Columbia County nurseries and compost production facilities after determining that the pathogen did not spread beyond the initial confirmation location identified in May 2004. However, ODA will continue to inspect and test all Oregon nurseries with hosts as part of its statewide *P. ramorum* nursery certification program.

- The USDA Animal and Plant Health Inspection Service (APHIS) adds *Calluna vulgaris* – Scotch Heather (Ericaceae), *Drimys winteri* - Winter's-bark (Winteraceae), *Laurus nobilis* – Sweet bay laurel (Lauraceae), and *Salix caprea* – Kilmarnock willow (Salicaceae) to the *P. ramorum* associated host plant list.

- APHIS removes *Vaccinium vitis-idaea* (lingonberry) from the *P. ramorum* associated host plant list because the Plant Protection and Seed Service of

Poland is unable to validate their original association of lingonberry with *P. ramorum*.

- To date, 157 *P. ramorum*-positive locations in 21 states have been identified via trace-forward, national, and other surveys. This total includes three residential finds (two in GA and one in SC) as well as one find in a natural setting in NY.

7/04

- The California Association of Nurserymen (CAN) files a federal suit against Kentucky, charging the state with violating federal law by banning the importation and sale of California's *Phytophthora ramorum* host and associated plants. The lawsuit is based on a provision in the federal Plant Protection Act that gives the USDA authority over interstate plant movement. A federal district judge for the Eastern District of Kentucky signs a consent decree on 7/30 permanently enjoining Kentucky from having *P. ramorum* regulations that are inconsistent with the federal standard.

- The states of AK, AR, AZ, CA, LA, OK, and SD complete their *P. ramorum* National Nursery Survey sampling.

- Mississippi updates its emergency *P. ramorum* regulations on 7/9/04. The newly expanded regulation prohibits the importation of California, Washington, and Oregon *P. ramorum* host and associated plants at the genus level.

- The Canadian Food Inspection Agency's (CFIA) national survey for *P. ramorum* is underway. To date, survey results have identified 7 infected plants, including Viburnum, Arbutus, Rhododendron, and Camellia, at 3 facilities. One of the BC *P. ramorum*-positive nurseries shipped potentially infected plants to Washington (9 recipients), Oregon (4 recipients), and California (6 recipients); these shipments are being investigated. While both the North American (A2) and European (A1) *P. ramorum* mating types were found in BC during the national survey, only the North American type was potentially shipped to the US.

- British Colombia conducts a recall of *P. ramorum* host plants sold from retail centers that received trace-forward material from Monrovia Nursery. An estimated 50% of the plants sold were returned from private residences. Of the 1,400 plants recovered and sampled, 9 *Camellias* were found to be positive. CFIA estimates that an additional 1,500 plants are still unaccounted for in the greater Vancouver area.

- Mexico is considering quarantining Douglas-fir (Pseudotsuga) and fir (Abies) Christmas trees from areas with *Phytophthora ramorum* to prevent introduction of the pathogen into Mexico.

- The states of DE, FL, KY, LA, MS, and WV request a Special Needs Exemption from the current *P. ramorum* federal regulations. USDA APHIS denies the requests. Some states plan to appeal the decision.

- PPQ *P. ramorum* National Nursery Survey sampling is complete in AK, AR, AZ, CA, IA, ID, LA, MO, OK, and SD; diagnostic results are pending. To date, participating states have surveyed 1,573 sites and have collected 31,230 samples; 18 sites have been confirmed positive.

- The first finding of *P. ramorum* in Switzerland is found in a Swiss Plateau nursery on a wilting viburnum plant.

- There currently are 147 positive *P. ramorum* confirmations in 21 states.

6/04

- The USDA Animal and Plant Health Inspection Service (APHIS) announces the regulation of *Camellia spp.* (including all species, hybrids, and cultivars) at the genus level.

- *Clintonia andrewsiana* (Andrew's clintonia bead lily), *Dryopteris arguta* (California wood fern), *Smilacina racemosa* (false Solomon's seal), and *Taxus brevifolia* (Pacific yew) are added to the *P. ramorum* associated host list.

- The Oregon Department of Agriculture (ODA) adopts a temporary rule calling for all Oregon growers and dealers of *P. ramorum*-susceptible plants to be annually inspected, tested, and certified free from the pathogen before host plants are allowed to be sold.

- Genotyping of *P. ramorum* isolates linked to the Monrovia infestation verifies the pathogen is the North American population type (A2).

- The ODA adopts an emergency 90-day quarantine for all nurseries and compost production facilities in Columbia County.

5/18/04

- US Department of Agriculture Secretary Ann Veneman transferred $15.5 million from the USDA Commodity Credit Corporation (CCC) to Plant Protection and Quarantine (PPQ), Animal and Pland Health Inspection Service (APHIS), to help halt the spread of *Phytophthora ramorum* to non-infested areas of the United States. When added to the $2.5 million that APHIS has already provided for the national survey and the $2 million of appropriated funds, the USDA PPQ has committee $20 million to the program in fiscal year 2004. USDA PPQ will apply the funds to quarantine actions, nursery inspections, sampling and testing, and Sudden Oak Death education and outreach. The PPQ Western Region received more than $12 million dollars; with nearly $7 million going to support activities in California. The Eastern Region received $2.5 million to support emergency actions and the national survey in states east of the Mississippi River. Additionally, nearly $500,000 has been dedicated to laboratory diagnostics through the National Plant

Diagnostic Network and other laboratories.

- P. ramorum is confirmed at a Columbia County nursery. The pathogen is recovered from a composite potting media sample taken from several plants in one hoop house. It is also confirmed on three rhododendron plants at a neighboring business. The plants had been donated to the business from the nursery.

5/10/04

- North Carolina confirms a ninth *P. ramorum*-positive nursery. The find is on trace-forward plants from California's Monrovia Nursery.

5/4/04

- A fifth retail nursery in Louisiana is found to have *P. ramorum* on Monrovia Nursery trace-forward stock.

5/04

- *P. ramorum* is detected at a Pennsylvania nursery on a bonsai camellia house plant. The plant was from a San Diego County mail-order nursery.

- Twenty-five states have begun conducting National Nursery Survey activities. The 15 eastern states underway with survey activity are AL, CT, DE, FL, GA, KY, MD, MS, NJ, NC, RI, SC, TN, VA, and WV. The 10 western states underway with survey activity are AZ, AR, CA, ID, IA, LA, MO, OK, OR, and WA.

- West Virginia revises its *P. ramorum* quarantine, allowing nursery stock from certified nurseries to ship into West Virginia. Pre-notification of all nursery stock as well as non-host nursery stuck certification are required.

- North Carolina and Oregon enact regulations that parallel the USDA Animal and Plant Health Inspection Service (APHIS) Plant Protection and Quarantine (PPQ) emergency order for *P. ramorum.*

- Alabama detects *P. ramorum* in 3 nurseries.

- Arkansas detects *P. ramorum* in 1 nursery.

- A Columbia County, Oregon nursery is found to have *P. ramorum* on four rhododendron plants following a trace-back survey from a Maryland nursery found to have the disease in late April. Following delimitation surveys within and outside the nursery, *P. ramorum* was also recovered from the potting media of a single plant as well as three plants in nearby landscaping that were form the nursery.

4/30/04

- The USDA APHIS amends the *P. ramorum* Federal Confirmed Nursery Protocol of 4/7/04 pertaining to holding and stopping of nursery sales for nurseries

that only state intrastate. Under the new amendment, nurseries that are found to be positive, and only ship intrastate, are only required to place host nursery stock on hold until delimitation with and outside of the nursery are complete.

4/27/04

- *Phytophthora ramorum* is confirmed at a Colorado nursery. The find is on a trace-forward stock from Monrovia Nursery.

4/26/04

- The week of 4/26 - Louisiana's ban on CA nursery stock now allows for the shipment of plant material from nurseries that have undergone sampling and testing according to the protocols outlines in the USDA APHIS April 22, 2004 Order and are certified to be free from *P. ramorum.* Prior notification of each shipment is to be provided to Louisiana Department of Agriculture and Forestry (LDAF), along with a copy of the Compliance Agreement between CDFA/USDA and the nursery.

4/22/04

- USDA APHIS issues an amended emergency order. The amended order restricts the movement of nursery stock from California nurseries, requiring nurseries that ship *P. ramorum* hosts or associated plants interstate to be inspected by a regulatory official, sampled, and tested for the disease before shipping. Until testing is complete and the nursery is found to be free from the pathogen, all out-of-state shipments of host nursery stock and associated articles, as well as plants within the same genus as any host or associated article, and any plant located within 10 meters of a host or associated article, must remain on hold.

- A Butte County nursery in Chico is found to have *P. ramorum* during California's Statewide Detection Survey, part of the National *P. ramorum* Nursery Survey.

4/19/04

- A Stanislaus County nursery previously found to be infested with *P. ramorum* in 2002 is confirmed to have new *P. ramorum* -infected plants. The find came during California's Statewide Detection Survey.

- A Sonoma County nursery in Santa Rosa is confirmed to have *P. ramorum* on trace-forward stock from Monrovia Nursery.

- The Georgia Department of Agriculture verifies the presence of *P. ramorum* in eight more Georgia nurseries on camellias imported from Monrovia Nursery.

- The week of April 19th, *P. ramorum* samples from two Tennessee nurseries are confirmed positive. The infected plants originated from California. Tennessee is participating in the *P. ramorum* National Nursery Survey and will continue to monitor these sites.

4/15/04

- USDA Undersecretary Hawks hosts a National Association of State Departments of Agriculture meeting to discuss the Emergency *Phytophthora ramorum* Order in Riverdale, Maryland.

- *P. ramorum* is detected in one nursery in New Mexico. The plants are trace-forwards from Monrovia Nursery.

4/13-14/04

- The National Plant Board calls an emergency meeting at USDA Headquarters, Riverdale, Maryland to discuss the April 9 USDA APHIS PPQ *Phytophthora ramorum* order.

4/9/04

- The USDA Animal and Plant Health Inspection Service (APHIS) issues an emergency order restricting the interstate movement of hosts and associated plants from commercial nurseries in California located outside of the 12 quarantined counties. Nurseries wishing to ship hosts and associated plants must first be visually inspected and determined to have no evidence of *P. ramorum* infection before shipping can occur.

- Through the California Statewide Nursery Survey, a nursery in Linden, San Joaquin County, is found to have camellia plants positive for *P. ramorum.*

- *P. ramorum*-infected rhododendron plants were detected in a nursery in Livermore, CA (Alameda County) as part of a trace forward done from Monrovia nursery.

- *P. ramorum* is confirmed at a retail garden center in Virginia; the infected plants came from Monrovia Nursery.

4/8/04

- Oregon issues an emergency quarantine of California nursery stock, prohibiting shipment of susceptible plant material unless the nursery or area from which it is grown has been inspected, tested, and found free of *Phytophthora ramorum.* Each shipment itself must also be inspected and found free of the pathogen before being allowed into Oregon. Soil must also be sterilized.

- Alabama updates its quarantine, removing Oregon, Washington, and British Columbia from their regulation. California remains banned from shipping into Alabama.

4/6/04

- Georgia verifies the presence of Phytophthora ramorum at five of its nurseries on plants imported from Monrovia Nursery in California.

- Washington issues an emergency rule requiring susceptible species of nursery plants from California be inspected and issued a certificate confirming they are free of *Phytophthora ramorum* before shipment. A copy of the certificate must be sent to Washington regulatory officials prior to shipment.

4/4/04

- A nursery in Lodi, San Joaquin County, is found to have *Phytophthora ramorum* on camellia and viburnum plants during inspection as part of the California Statewide Nursery Survey.

- CDFA issues a Pest Exclusion Advisory regarding shipments into California from other states and Canada, requiring all shipments containing *Phytophthora ramorum* hosts and associated plants to be visually inspected for *Phytophthora ramorum* symptoms upon arrival.

4/2/04

- Florida confirms *Phytophthora ramorum*-infected camellias in two more nurseries that received shipments from Monrovia, bringing the total number of infested nurseries in Florida to five.

- A Napa County nursery is found to have *P. ramorum* -infected nursery stock that originated from Monrovia Nursery.

4/1/04

- *P. ramorum* is found at a San Mateo County garden center and an Alameda County nursery. Both finds are on Monrovia Nursery trace-forward stock.

- A Santa Clara County nursery under a compliance agreement is found to have *P. ramorum* -infected plants that originated from Monrovia Nursery.

4/04

- A nursery in Sonoma County is found positive for *P. ramorum* during its initial annual inspection. The inspection was the result of the nursery's interest in entering into a compliance agreement, allowing for shipment of *P. ramorum* host and associated host material out of the regulated area. The nursery had not shipped out of the regulated area before the inspection.

- It is announced that State and federal personnel will be conducting a survey in 37 states during the 2004 *P. ramorum* National Wildland Survey. The highest priority for survey sampling will be forests adjacent to nurseries that may have received infected CA nursery plants. The USDA Forest Service, Forest Health Protection is spending $1,084,200 for the surveys, including an emergency supplemental allocation of $530,000 for follow-up efforts on trace-forward surveys from infested CA nurseries.

- Formosa firethorn (*Pyracantha koidzumii*) is added to the *P. ramorum* associated host list, following a Canadian Food Inspection Agency CFIA) find at a Vancouver area nursery. The infected nursery stock was detected as part of the Monrovia trace-forward inspections. If Koch's postulates results are positive for *P. ramorum,* Formosa firethorn will be transferred to the USDA APHIS regulated host list.

- Texas confirms the presence of *P. ramorum* at five nurseries on trace-forward stock from Monrovia.

- Louisiana confirms the presence of *P. ramorum* at four retail nurseries. The finds are trace-forward stock from Monrovia Nursery.

- The North Carolina Department of Agriculture and Consumer Services confirms the presence of *P. ramorum* at eight North Carolina nurseries. The infected plants were shipped from Monrovia Nursery.

- *P. ramorum* is confirmed on a rhododendron from a retail garden center in Maryland. The plant has been traced to a nursery in Columbia County, OR.

3/31/04

- Florida confirms that 3 of its nurseries, having received shipments from California's Monrovia Nursery, have *Phytophthora ramorum*-infected plants.

3/30/04

- Indiana quarantines all plants in the genera of host and associated host plants unless certified to be free from the pathogen.

3/29/04

- Kentucky issues a quarantine banning all plants and nursery stock from California. The ban includes soil and unprocessed wood or wood products.

- Virginia enhances their current inspection process, requiring nurseries to report receiving California shipments of *P. ramorum* regulated plant material, so that regulatory officials can conduct visual surveys for *P. ramorum* symptoms.

3/26/04

- Montana quarantines all hosts and associated plants from California; Curry County, Oregon; and Washington's King, Pierce, and Pacific Counties unless

certified to be *Phytophthora ramorum*-free. Host and associated host plants originating from a nursery with a compliance agreement are able to ship. Prior notification of arrival must be given to the Montana Department of Agriculture.

- *P. ramorum* is confirmed at a Contra Costa County nursery and a San Mateo County nursery. The finds are on Monrovia Nursery trace-forward stock.

3/24/04

- Alabama updates its quarantine to prohibit shipments of soil, humus, compost, manure, and regulated host plants from California, Oregon, Washington, and British Columbia.

3/23/04

- Louisiana bans all California nursery stock shipments.

- West Virginia bans all plants and nursery stock from California as well as all soil and wood products.

3/19/04

- U.S. Department of Agriculture Plant Protection and Quarantine program announces a Sudden Oak Death (SOD) hotline (1-888-703-4457). Specialists are staffing the Animal and Plant Health Inspection Service Emergency Operations Center in Riverdale, MD to handle nationwide calls from the nursery and landscape industry, news organizations, and the general public in response to positive *Phytophthora ramorum* confirmations in two Southern California nurseries.

- Statewide *Phytophthora ramorum* Survey information is posted to the California Department of Food and Agriculture (CDFA) website at: http://www.cdfa.ca.gov/phpps/pe/sod_survey, providing current information on California's *Phytophthora ramorum* nursery situation.

- Tennessee announces a ban on new imports of selected plant materials from California and halts the movement of susceptible nursery stock that may have already reached Tennessee nurseries and plant dealers.

- Utah prohibits incoming shipments of soil, humus, compost, manure, and 28 regulated host plants from California, Oregon, Washington, British Columbia, and all other areas found to have *Phytophthora ramorum.* This Prohibition is changed to include both hosts and associated hosts shortly thereafter.

- Georgia updates its quarantine, banning the 59 regulated and associated hosts instead of all nursery stock from California.

3/18/04

- Florida stops the importation of all plant nursery stock from California, as well as the sale of products that have already reached Florida nurseries.

- Mississippi announces a quarantine of all *Phytophthora ramorum* host plants into Mississippi from California.

- Delaware quarantines shipments of all regulated and associated *Phytophthora ramorum* host plants that originate from and/or are shipped from California. Nurseries within Delaware that have received shipments of nursery stock from California are prohibited from selling, moving, or transporting this material until being released from Plant Industries, Delaware Department of Agriculture.

3/17/04

- The Alabama Department of Agriculture issues a stop sale of certain camellia plants that have been shipped to Alabama from California.

3/15/04

- Georgia issues a quarantine against all nursery plants from California.

3/12/04

- *Phytophthora ramorum* is confirmed via culture and PCR at Specialty Plants Inc., San Marcos, California. The survey was part of the California's National *Phytophthora ramorum* nursery survey.

3/10/04

- Washington issues an emergency order requiring nurseries receiving trees and plants from out-of-state to hold them for 24 hours until the state Department of Agriculture is notified.

3/8/04

- *Phytophthora ramorum* is confirmed on several varieties of camellia at Monrovia Nursery, Azusa, California. The nursery was surveyed as part of the National *Phytophthora ramorum* Survey.

3/4/04

- The Oregon Department of Agriculture confirms the presence of *P. ramorum* in nine nurseries on trace-forward Monrovia Nursery Stock.

- Three Alameda County nurseries are confirmed to have *P. ramorum*-positive Monrovia trace-forward stock.

2/27/04

- The Oregon Department of Agriculture (ODA) finalizes an interim rule requiring recipients of out-of-state tree and shrub nursery stock deliveries to notify ODA of the shipment within 24 hours for possible inspection of the plants.

2/23/04

- Several varieties of *Camellia japonica* and *Kalmia latifolia* plants at a nursery in Sonoma County were found to have *Phytophthora ramorum.* The infected plants were detected as part of a routine quarantine inspection required for all nurseries moving host plants out of the regulated area.

2/17/04

- *Phytophthora ramorum* is detected on five, 5-gallon containerized *Camellia japonica* "Shiro Chan" plants at a wholesale nursery in San Mateo County. The infected plants were detected as part of a routine quarantine inspection required for all nurseries moving host plants out of the regulated area.

2/04

- The Gig Harbor Washington nursery found to have *Phytophthora ramorum* in December 2003 is found to have new infections on fifteen variety blocks of camellia. Two of the recently identified infected variety blocks were received in October and November, 2003, from California nurseries outside of the *Phytophthora ramorum* quarantine area. These new finds were not detected until early 2004 and were not located near the other infected blocks.

1/28/04

- The California Oak Mortality Task Force offers its first *Phytophthora ramorum* nursery training session in Watsonville, CA. A January 2004 draft California *Phytophthora ramorum* nursery diagnostic guide is distributed.

1/04

- Phytophthora ramorum a guide for Oregon nurseries, by J. Parke, J. Pscheidt, and R. Linderman is published by Oregon State University Extension Service.

- *Camellia sasanqua* and *Camellia japonica* plants at a Marin County nursery are found to have *Phytophthora ramorum*. The nursery had also been found to have infected plants the previous spring.

- The Washington State Department of Agriculture (WSDA) detects *Phytophthora ramorum* in a third Washington nursery near Long Beach, Pacific County. The positive *Rhododendron* v. Unique finds came as the result

of a trace-back survey from a King County Washington nursery found to have *Phytophthora ramorum* in fall, 2003.

12/03

- As a result of the National *Phytophthora ramorum* Nursery Survey, a retail nursery in Gig Harbor, Pierce County, Washington, is found to have *Phytophthora ramorum*-infected host plants.

11/03

- CDFA's revised enforcement guideline policy for California's *Phytophthora ramorum* regulation goes into effect. The revisions allow unrestricted movement of host plants and most nursery stock within the 12 regulated counties. Nurseries within the regulated area shipping out of the regulated area continue to be inspected, and infected nursery stock still cannot be shipped.

10/03

- California, Oregon, Washington, the United States Department of Agriculture (USDA), and Canada agree to protocols for nursery delimitation, eradication, post-treatment monitoring, investigations of sources of infected plants, and notification. The plan will be used by USDA Animal and Plant Health Inspection Service (APHIS) and the states to respond to new *P. ramorum* nursery detections (outside of California's 12-county regulated area) as guidance for the federal *Phytophthora ramorum* quarantine.

9/03

- Canada releases the 9th revision of its *P. ramorum* regulations

- *Phytophthora ramorum* was detected on two, 5-gallon Camellia sasanqua "Showa-no-Sakae" plants at a retail nursery in Placer County. The finding came as the result of a trace-forward survey being conducted to locate infected varieties of camellia from an infested Stanislaus nursery. The Placer County shipment was received in March, 2003.

8/03

- The Oregon Department of Agriculture (ODA) adopts an emergency rule that requires all recipients of out-of-state tree and shrub nursery stock to notify ODA of the shipment for possible inspection of the plants. The requirement is in response to several instances of *Phytophthora ramorum-i*nfected nursery stock entering Oregon this year.

- Plants from a nursery in Oregon and its sister nursery in Washington are found to have both the North American *Phytophthora ramorum,* A2 mating type, and the European *Phytophthora ramorum*, A1 mating type. This is the first report of the European A1 mating type in the United States. It is also the first time both mating types have been found in close proximity to one

another in the U.S. All plants sold from the Oregon nursery are traced down, confiscated, and destroyed.

7/03

- The Oregon Department of Agriculture (ODA) recalls camellia plants sold in retail nurseries in Oregon that may have been infected with *Phytophthora ramorum.* A trace-back survey identifies an infested nursery in Stanislaus County, California, as the location from which the camellias originated.

- CDFA issues a Pest Exclusion Advisory requiring incoming shipments of *Phytophthora ramorum* hosts and associated plants from Oregon, Washington, and British Columbia to be visually inspected by California county inspectors at the destination location before being released for sale.

6/03

- *Phytophthora ramorum* is detected on *Camellia sasanqua* container plants at two nursery locations in Jackson County, Oregon, as the result of trace-forward information received from CDFA. The plants originated from an infested nursery in Stanislaus County, CA.

- *Phytophthora ramorum* is detected on rhododendron container plants at a nursery in King County, Washington. This is the first detection of *Phytophthora ramorum* in Washington State.

- *Phytophthora ramorum* (European, A1 mating type) is detected on a rhododendron container plant at a nursery in Greater Vancouver, B.C.

- The Czech Republic imposes a quarantine for *Phytophthora ramorum*-susceptible plants from the U.S., Germany, and The Netherlands.

- *Camellia sasanqua* at a Sacramento County nursery is found to have *Phytophthora ramorum.* It is intercepted via a trace-forward.

5/03

- *Phytophthora ramorum* is confirmed on containerized *Viburnum bodanantense, Pieris japonica, Pieris japonica* x *formosa*, *Viburnum plicatum tomentosum,* and *Rhododendron* 'Unique' at a nursery in Clackamas County, Oregon.

- *Camellia sasanqua* "Bonanza" plants from a wholesale nursery in Stanislaus County are found to have *Phytophthora ramorum* as the result of a trace-back survey from a Santa Cruz County nursery found positive for the pathogen in April.

4/03

- A rhododendron shipped from a Santa Cruz County nursery to a Berkeley nursery in Alameda County tests positive for *Phytophthora ramorum.* It was one of five rhododendrons and three camellias shipped to Berkeley. Alameda County inspectors detected the symptomatic leaves the day the shipment arrived.

- The first report of *Phytophthora ramorum* on *Camellia japonica* and *Viburnum tinus* in the U.S. is confirmed at a nursery in Marin County. The portion of the holding area where the symptomatic material was detected is adjacent to a stand of *Phytophthora ramorum*-infected California bay laurel trees.

- A 5-gallon *Camellia sasanqua* "Bonanza" tested positive for *Phytophthora ramorum* at a nursery in Soquel, Santa Cruz County. The symptomatic plant material was detected during an annual inspection. A trace-back survey found that the infected camellia was shipped from a nursery in Stanislaus County.

- The United Kingdom has 264 *Phytophthora ramorum* outbreaks recorded on *rhododendron* (7 species), *viburnum* (11 species), *Camellia japonica*, *Kalmia latifolia, Pieris japonica*, *Pieris Formosa* var. *forestii*, *Arbutus,* and *Syringa*. Some of the findings have been in large gardens open to the public and associated with plant nurseries or garden centers. An intensive survey is ongoing.

12/02

- *Phytophthora ramorum* is isolated from over 150 nurseries in the United Kingdom. France, Belgium, The Netherlands, Sweden, Germany, and other European countries also report widespread nursery infestations.

11/02

- The European Union issues regulations for *Phytophthora ramorum* to prevent pathogen spread within the Union and importation of the North American genotype and A2 mating type.

10/02

- The Canadian Food Inspection Agency adds a certification program to their *Phytophthora ramorum* regulations allowing shipments of field-grown plants into Canada from uninfested counties of California following inspection.

9/02

- Australia introduces regulations preventing the import of host species from countries known to have *Phytophthora ramorum.*

- The California Oak Mortality Task Force establishes a Nursery Subcommittee for all interested industry members to use as a forum for coordinating *Phytophthora ramorum* efforts.

5/02

- The United Kingdom bans imports of plants and wood from infested counties in California and Oregon to prevent spread of *Phytophthora ramorum.*

3/02

- *Phytophthora ramorum* is officially linked to Sudden Oak Death in Plant Disease 86: 205-214. 2002. *Phytophthora ramorum* as the cause of extensive mortality of *Quercus* spp. and *Lithocarpus densiflora* in California. D.M. Rizzo, M. Garbelotto, J.M. Davidson, G.W. Slaughter, and S.T. Koike.

2/02

- 2.27.2002 – The first of two public hearing on California's interim APHIS Sudden Oak Death regulations is held in Petaluma, CA. The second hearing was held shortly after in Riverdale, MD.

- 2.14.2002 - USDA APHIS releases interim federal regulations that will oversee interstate movement of *Phytophthora ramorum* host material from the California counties known to be infested.

8/01

- South Korea imposes *a Phytophthora ramorum* quarantine on infested counties in California and Oregon prohibiting the importation of known host species.

7/01

- Oregon discovers *Phytophthora ramorum* infesting 40 acres in Curry County.

5/01

- The California Department of Food and Agriculture enacts emergency regulations, requiring permits to be issued by an authorized agricultural official before moving *Phytophthora ramorum* host plants or materials within or from infested areas.

4/01

- The new *Phytophthora* is formally named *Phytophthora ramorum* in Mycological Research 105(10): 1155-1165. 2001. *Phytophthora ramorum* sp. nov: a new pathogen on *Rhododendron* and *Viburnum*. Werres S., R. Marwitz, W.A. Man in 't Veld, A.W. De Cock, P.J.M. Bonants, M. De Weerdt, K. Themann, E. Ilieva, and R.P. Baayen.

3/01

- Canada issues a quarantine against California for the new *Phytophthora*.

- Oregon's emergency quarantine becomes permanent.

1/01

- The new *Phytophthora* associated with dying oaks is recovered from rhododendron container plants in a Santa Cruz nursery.

- Oregon bans the new *Phytophthora*'s host plants and other plant products coming from California unless they have been treated. This emergency rule applies for 90 days.

11/00

- Clive Brasier, UK Forestry Commission, recognizes that an unknown *Phytophthora* from rhododendron in Germany and the Netherlands, that had been originally isolated in 1993-94, appears identical to the new *Phytophthora* isolated from dying oak trees in CA.

7/00

- U.C. researchers identify the cause of Sudden Oak Death to be a previously unknown *Phytophthora* species.

1995

- Arborists, urban foresters, and others begin to report unusual tanoak mortality and symptoms, including bleeding cankers and rapid crown color change from green to brown in a few weeks.