Gypsy Moth (European) Eradication Program, Lincoln County

Decision Notice and Finding of No Significant Impact

Siuslaw National Forest
South Zone Ranger District
Lincoln County, Oregon

April 2003

Lead Agency: **USDA Forest Service**

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Project Background, Area, and Needs

The Gypsy Moth Eradication Program, Lincoln County (the Project) includes actions designed to eradicate an isolated breeding population of the European gypsy moth in the Fisher area of Lincoln County (see attached map). The Oregon Department of Agriculture (ODA) and the USDA Forest Service (Forest Service) are cooperating agencies on the Project.

Project description—Under the Project, three aerial applications of the bacterium-based insecticide *Bacillus thuringiensis* var. *kurstaki* (B.t.k.) will be implemented by helicopter over the 706-acre gypsy moth infestation site. Each application rate will be 0.5 gallon per acre, undiluted, resulting in 24 BIUs of B.t.k., or about 2.1% active ingredient. The application will be made by a licensed applicator. There are no known other pesticides being applied to this area. Applications are expected to begin in the latter portion of April 2003 and continue through most of May 2003, followed by intensive trapping in the summer of 2003 to determine success of eradication treatments. Applications would be spaced about 7 to 14 days apart. Each of the three aerial applications will generally begin in the early morning hours and take about 1 to 2 hours to complete (on very rare occasions up to 8 hours), depending on weather or other factors. Additional treatments may be needed in 2004 if the gypsy moth has spread into a larger area than expected, or in 2004 and beyond if treatments cannot be successfully implemented in 2003 due to weather or other factors. Should additional treatments be needed in 2004, up to about 3,820 acres may need to be treated.

No aerial treatments of B.t.k. will be applied when:

- Wind velocity is zero or exceeds 10 miles per hour.
- Air tempterature exceeds 80^0 F or is less than 38^0 F.
- Rain is predicted (>50% probability) to occur before adequate drying time has elapsed or within 6 hours of application.
- Foiliage is wet such that drops of water are present on needle or leaf ends or can be shaken from branches (B.t.k. will be applied only when the target foliage has dried sufficiently).
- There is fog or poor visibility on the spray block or helispot.
- Relative humidity is less than 50%.
- The air turbulence (such as thermal updrafts) seriously affects normal application.
- Temperature inversions are present with no air movement sufficient to interrupt the proper settling and penetration of material through the canopy.

The project area includes about 3,820 acres of the Five Rivers 5^{th}-field watershed about 14 miles southeast of Waldport, Oregon or about 35 air miles southwest of Corvallis, Oregon. The project area is located in Township 14 South, Range 10 West, sections 34, 35, and 36; Township 14 South, Range 9 West, section 31; Township 15 South, Range 10 West, sections 1, 2, and 3; and Township 15 South, Range 9 West, section 6; Lincoln County. National Forest system lands and private lands are affected by the Project.

Jurisdiction—USDA Animal and Plant Health Protection Service (APHIS), under the Plant Protection Act of 2000, has the responsibility for regulating, detecting and eradicating non-native plant pests. State Law ORS 570.305 authorizes and directs the director of the State Department

of Agriculture to prevent the introduction of dangerous insect pests and plant diseases and apply such measures as necessary to control and eradicate such pests that endanger the agricultural and horticultural interests of the state. Through an Agreement with the State of Oregon, APHIS has delegated authority to the State (Oregon Department of Agriculture) to carry out these responsibilities, consistent with State law.

Under the Cooperative Forestry Assistance Act of 1978, as amended through 2002, Part 1, Section 8—Forest Health Protection, the Forest Service has the responsibility for detecting, evaluating and controlling insects and diseases on National Forest System (NFS) lands and all federally managed lands. Under the Act, the Forest Service also has the responsibility, through cooperation with State agencies, for detecting, evaluating and controlling insects and disease outbreaks on State and private lands.

To help clarify the responsibilities for management of the gypsy moth, a Memorandum of Understanding (MOU) Between the APHIS and the Forest Service specifies when APHIS would be responsible for projects, and when the Forest Service would have responsibility. This MOU states that whenever a gypsy moth project is on federally managed lands, or adjacent to federally managed lands, or when the project was over 640 acres in size, the project becomes the Forest Service responsibility—all three of these points are met in the Fisher (Five Rivers) project area. The Forest Service has clear responsibility for the gypsy moth project on NFS land, and for proving assistance for insect control on the adjacent private lands. Thus, the Forest Service is providing funding for the project—both on NFS lands and on adjacent private lands. In essence, we are providing funding to the State to carry out our responsibilities on NFS lands, and are assisting them with funding to carry out their responsibilities on adjacent lands (per the Cooperative Forestry Assistance Act). The State is implementing treatment of the private land under a decision they made on March 13, 2003, within their authority.

Project-timeline summary—As a result of their ongoing, statewide trapping program, ODA discovered the European gypsy moth in the Project area during the fall of 2002. The proposed action to eradicate the infestation was developed in November 2002 and the Forest Service solicited public comment on the proposed action, beginning on December 11, 2002 and ending on COB January 8, 2003. Public comments were considered in developing the draft EA that was made available for a 30-day public comment period, beginning on January 26, 2003 and ending COB on February 27, 2003. An ODA-coordinated public meeting was held on February 13, 2003. A biological opinion was received from the US Fish and Wildlife Service on February 28, 2003. Public comments on the draft EA and those communicated at the public meeting were considered in developing the final EA that was made available for a 30-day public review and comment period by the US Forest Service, beginning on March 12, 2003 and ending April 11, 2003. The Director of ODA made her decision to implement the Project on March 13, 2003. DEQ held its public hearing regarding ODA's application for a National Pollutant Discharge Elimination System (NPDES) permit on April 10, 2003. The permit was issued to ODA on April 15, 2003. Finally, the Chief of the US Forest Service has determined that the gypsy moth infestation at the Fisher (Five Rivers) site is an emergency situation, and thus, this decision is exempt from the automatic stay of implementation (if appealed) as sited in CFR Part 215.10(d). Therefore, this project may be implemented immediately following the notice of decision publication date in the Corvallis Gazette-Times.

Need for action—The need requiring action in the Project area was identified in section A of the Project environmental assessment (EA). The need is to eradicate the isolated gypsy moth population from the Fisher (Five Rivers) area of in Lincoln County. The need is based on the potential ecological and economic effects of gypsy moth infestations on the surrounding areas, and ultimately, the entire state of Oregon and western United States.

Decision to be made—The decision to be made is whether to implement activities designed to meet the Project needs by selecting the proposed action—defined as the preferred alternative (EA, page 25)—or to postpone these actions by selecting the no-action alternative.

My Decision

My decision authorizes ODA to treat National Forest System land in the eradication analysis area as described for the preferred alternative in the Project EA. In making this decision, I have reviewed the Project EA, its appendices, comments received during the 30-day public comment period of March 13 to April 11, 2003, and other project-file documents.

Mitigation measures have been included to protect or minimize effects on human health, natural resources, and keep local residents informed. Mitigation includes measures such as coordinating with Oregon Health Services on measures that may be required to safeguard human health, notifying the public (especially directly affected residents) about spray dates, avoiding spraying of areas outside the designated eradication analysis area, and maintaining a minimum ¼-mile buffer zone around known marbled murrelet occupied sites to mitigate noise disturbance. The EA, pages 39 and 40, contains additional mitigation information. On page 19, the EA identifies some protective measures that can be taken by affected residents.

Effectiveness monitoring will include using spray deposition cards to monitor droplet size and coverage and conducting pheromone trapping for two years following the eradication project—a type of monitoring that has been conducted during the last 18 years in Oregon for all eradication projects—to determine that the gypsy moth infestation has been eradicated from the Fisher site. Implementation monitoring will be done to ensure that the mitigation measures specified in the EA on pages 39 and 40 are implemented.

Reasons for the Decision

During the decision process for this project, I realized I would not be able to fully satisfy all public concerns, as some of them are mutually exclusive. I have selected an alternative that is ecologically sound, for both the short and long term. In making this decision, I considered and balanced several factors, specifically whether the project will address the need to eradicate the gypsy moth population and potential effects on the forest environment, non-target species, and human environment. The remainder of this section describes my reasons for selecting the preferred alternative.

Organic vs. Foray 48B formulation—I know there is concern by some of the affected residents about the use of Foray 48B, especially its effects on domestic water systems and organic produce. I believe that the Oregon Department of Agriculture made a good-faith effort in trying to find an alternative B.t.k. formulation that is both acceptable for organic production and effective in

treating forest infestations. Based on ODA's research, my discussions with ODA and Forest Service scientists, and what is documented in the EA on pages 17 and 18, B.t.k formulations that are approved for organic production are currently limited to wetable-powder formulations that need to be mixed with water. Water as a carrier for B.t.k is acceptable when it is applied directly to foliage from a short distance. However, this project requires aerial application, using small droplets to ensure adequate coverage. Most likely, these small droplets would evaporate or partially evaporate before they reach the foliage. If an organic formulation is aerially applied, much of the application likely may not adhere well to the foliage, substantially reducing its ability to eradicate the gypsy moth infestation. Additionally, aerial applications of these organic B.t.k. formulations have not been tested during a pilot test or operational project. Therefore, I have no confidence that a formulation approved for organic production would be efficient in a forest environment.

The preferred alternative uses an insecticide that poses low human health and environmental risks—Several studies have been conducted to determine potential effects on human health, resulting from implementing large-scale eradication programs. No significant health effects attributable to the B.t.k treatments were found. One study, analyzing the effects of using the Foray 48B formulation did not show a relationship between aerial spraying of Foray 48B and short-term human health effects. The Environmental Protection Agency has concluded that B.t.k. products, manufactured, labeled, and used as specified in the Reregistration Eligibility Decision, will not pose unreasonable risks or adverse effects to humans or the environment (EA, pages 26 through 28). Domestic animals such as dogs, cats, and farm animals are not expected to be affected by applications of B.t.k. as proposed by the Project (EA, page 27).

Project officials will notify the public (including affected residents, selected groups, or organizations) by letter, radio, newspaper, or other means of spray dates and places, as appropriate, so that people can elect to exercise the precautionary measures identified in the EA (pages 27 through 28; appendix B).

The preferred alternative maintains the health of watersheds and associated aquatic ecosystems—The project area and surrounding areas contain streams that provide important fish habitat. Water quality is directly tied to watershed health. The actions in the preferred alternative are designed to maintain watershed health and water quality by, among other practices (e.g., EA page 40), applying B.t.k. only in accordance with its label instructions. Additionally, the actions in the preferred alternative are designed to avoid insect-caused defoliation and mortality of trees, which provide shade to the stream. Some of the streams are too warm to provide quality habitat for fish; they are on the 303(d) list (water-quality limited) for elevated summer water temperatures. The preferred alternative will avoid degradation of existing stream shade by eradicating the gypsy moth population. This is beneficial to fish, including the threatened coho salmon.

The preferred alternative maintains the development of late-successional habitat in late-successional and riparian reserves—The Forest's legacy lies in its abundance of land in late-successional and riparian reserves. Forests on the coast also have very high growth rates. The Siuslaw offers a rich potential for successfully maintaining and creating late-successional habitat with old growth characteristics at a landscape level. In addition to existing late-successional habitat, the Siuslaw also contains several thousand acres of younger stands (plantations). Both

the late-successional and younger stands are highly susceptible to gypsy moth infestations. Protecting the older and younger stands from tree defoliation and mortality caused by an introduced species, will avoid adverse effects on stand growth and development, benefiting species that prefer late-successional habitat such as the marbled murrelet and northern spotted owl. Although some tree mortality can be beneficial by providing snags for wildlife habitat, this introduced species would ultimately create artificially high numbers of snags beyond what would be expected naturally. I believe these actions, as described for the preferred alternative, are necessary to maintain the natural development of healthy late-successional habitat.

The preferred alternative avoids delays that make eradication more difficult to achieve and more costly to treat—The gypsy moth population will only spread over time if not treated. Delays in treatment will only serve to increase the size of the infestation and subsequent eradication areas. The larger the size of the infestation, the more likely that multi-year, more costly treatments will be required to eradicate the gypsy moth population, based on past similar projects.

Treatment effectiveness—Effectiveness of eradication treatments has been demonstrated from past similar projects in the State of Oregon. Therefore, I selected the preferred alternative because it is likely to meet the Project need to eradicate the European gypsy moth from the Fisher site in 2003 (EA, page 9).

Consistency with 1995 EIS and Forest plans—The Project conforms to the USDA's Final EIS for Gypsy Moth Management in the United States (1995) recommendation to eradicate isolated infestations found in the western United States.

The Siuslaw Forest Plan (1990), as amended by the Northwest Forest Plan (1994) is intended to provide for healthy forest ecosystems, including protecting riparian areas and waters. This decision is consistent with these plans as it will protect forested environments, including riparian vegetation that provides stream shade. The Project will also meet the Aquatic Conservation Strategy (ACS) objectives of the Northwest Forest Plan (EA, pages 35 and 36). By eliminating the potential for tree defoliation and mortality associated with the gypsy moth infestation, the preferred alternative will maintain existing conditions of or prevent adverse effects on the nine ACS objectives.

Effects analysis—Based on the EA, no unacceptable cumulative effects to any resource are expected. Many adverse effects will be avoided by implementing the Project, and the risk associated with any potential negative effects, discussed in the environmental consequences section of the Project EA, is acceptably low.

Sufficient information in the EA—In my review of the Project EA, its appendices, and other project-file documents, I believe the information provided to me is adequate for a reasoned choice of action. I am fully aware that the selected alternative will have some unavoidable adverse environmental effects such as disturbance to wildlife and loss of some non-target moths and butterflies (EA, pages 28, 29 and 37). I have determined, however, that these risks will be outweighed by the likely benefits.

Other information considered—In making this selection, I have also reviewed public and other agency comments and information in the administrative record, including but not limited to: the

Gypsy Moth Management in the United States Final EIS (1995); the Siuslaw Forest Plan (1990), as amended by the Northwest Forest Plan (1994); the Lobster-Five Rivers Watershed Analysis (1997); the Late-Successional Reserve Assessment, Oregon Coast Province Southern Portion (1997); consultation files and records involving other federal and state agencies; and applicable laws and regulations.

No-action alternative—I did not select the no-action alternative because, although it does not create any negative effects associated with aerial application of the spray, it also does not meet the Project need. And, without eradication of the gypsy moth population, some watershed conditions—including water quality and fish habitat—would degrade in the long term through loss of stream shading. Existing and developing late-successional forest habitat would continue to degrade through tree defoliation and mortality. The size of the infested area would continue to grow, impacting a larger environment (including more people) and costing much more to treat. In addition, if the gypsy moth breeding population is allowed to persist, the risk of the gypsy moth spreading to other areas in Oregon and the western United States would increase.

Alternatives Considered

Before selecting the preferred alternative, I considered the no-action alternative and four other treatment options (alternatives) that were eliminated from detailed study in the Project EA.

No-action alternative

The no-action alternative is described in section D of the Project EA. The analysis of the effects of this alternative is disclosed in section E of the Project EA. The no-action alternative forms the basis for a comparison between meeting the project need and *not* meeting the project need. This alternative provides baseline information for understanding changes associated with the preferred alternative and expected environmental responses if treatments are not implemented.

Alternatives considered but eliminated from detailed study

The USDA Forest Service and the Oregon Department of Agriculture considered several alternatives, largely based on the treatment options identified in the Gypsy Moth Management in the United States Final EIS (1995). The treatment options (alternatives) for the proposed eradication program at the Fisher site are analyzed in the 1995 EIS. These options are considered for any gypsy moth eradication programs in the USA. Six options are available to carry out an eradication program:

1) *Bacillus thuringiensis* var. *kurstaki*
2) Diflubenzuron (Dimilin)
3) Gypsy moth virus
4) Mass trapping
5) Mating disruption
6) Sterile insect release.

The following options (alternatives) were not considered in detail because the probability that they would achieve the program goal of eradication was judged to be too low or could not be determined:

2) *Diflubenzuron*—This insect growth regulator has a broader non-target host range than *B.t.k.* and can kill many other insects beside larvae of moths and butterflies. Its use may adversely affect populations of other insects including beneficial ones.
3) *Gypsy moth virus*—Gypchek is very host specific but is not widely available in the market and is still somewhat experimental for eradication programs. Results with gypcheck have been variable.
5) *Mating disruption*—This method is still experimental and its effect on gypsy moth infestations is variable. This alternative has been used more frequently in recent years in slow–the-spread programs in eastern states.
6) *Sterile insect releases*—This method is also experimental and its effect on gypsy moth infestations is variable.

Pesticide application: ground vs. air—Pesticide sprays can be applied from either ground (i.e., truck or trailer mounted sprayers) or air (i.e., helicopter or airplane mounted sprayers). Ground sprays are preferred for small eradication areas if the road system is adequate to allow access to all parts of the area. If access is restricted or if the area is large, then aerial sprays are usually more efficient, practical, and economical. Due to restricted access and geographical conditions at the Fisher site, a helicopter will be used to apply the pesticide effectively.

Help from the Public and Other Agencies

To help identify public concerns about the proposed project, interested citizens (including Five Rivers residents in the vicinity of the Project), organizations, regulatory agencies, and local governments were informed about this proposal. Public comment on the proposed project was solicited through public scoping letters. Scoping letters were mailed on December 10, 2002. News releases describing the proposed project and soliciting public comment were published in the Corvallis Gazette-Times and Newport News-Times newspapers in Corvallis and Newport, Oregon. The news release was published in the Corvallis Gazette-Times on December 11, 2002 and the Newport News-Times on December 18, 2002. Comments were requested by January 8, 2003. Fourteen (14) persons responded to these scoping efforts. Concerns have been summarized below and are organized by following categories:

- Human health and safety—What are the effects of aerial spraying on domestic water systems, organic produce certification, food crops, gardens, lawns, and people with chemical sensitivities such as those who have immune deficiencies and asthma?

- Forest resources—What are the effects of gypsy moth damage to forests, watersheds, and timber values?

- Domestic animals—What are the effects of aerial spraying on pastures, locally farmed livestock, and pets?

- Fish and wildlife—What are the effects of aerial spraying on fish and wildlife, including deer with immune deficiencies, the aquatic food chain, birds, and non-target moths and butterflies?

- Effectiveness and costs—What are the success rates associated with this type of treatment, how much will it cost, and how will it be funded?

- Other—What are the ingredients of Foray 48B? Is eradication necessary? Need to know dates of spraying. Is this insect the European gypsy moth or the Asian gypsy moth? Will this project require an NPDES permit? Don't eliminate areas that should be treated in an effort to reduce costs or public objection. Low level of risk to public health is vastly overshadowed by health risks that will result from destruction of our forests and watersheds across the state. Health and environmental costs are greater than costs associated with infestation. Don't spray undisclosed chemicals on private and public property. Who is assessing the potential effects of aerial spraying? Consider other types of treatment other than aerial spraying.

These comments, including those from past similar projects such as the Gypsy Moth Eradication Program for Jackson and Multnomah Counties (2001), were used to help identify concerns about the Project and helped guide the preparation of the draft Project EA (the ODA uses draft EAs to solicit public comment; the Forest Service does not prepare draft EAs).

Because the Forest Service and ODA are joint lead agencies for this project, the draft EA was also used by the Forest Service to solicit public comment. Upon completion of the draft Project EA, the Forest Service prepared a notice of availability that was published in the Corvallis Gazette-Times (paper of record) on January 26, 2003. The notice of availability informed the public that the draft Project EA is available for a 30-day review and comment period. Additionally, a news release announcing that the draft Project EA is completed and available for public review and comment was published in the Newport News-Times on January 24, 2003. Copies of the draft Project EA were made available at the Siuslaw National Forest Headquarters in Corvallis, Oregon; the Waldport Ranger District Office in Waldport, Oregon; and the Oregon Department of Agriculture Office in Salem. Copies of the draft Project EA and a cover letter announcing the 30-day review and comment period were sent on January 27, 2003 to those who commented on the Forest Service's proposed action during the scoping phase, to those who reside or own land in or near the project area (about 28 residents and landowners), and to those who requested a copy of the draft Project EA.

The legal notice and letters identified the proposed action as the preferred alternative and indicated the beginning and end of the comment period. The comment process was described and an Oregon Department of Agriculture contact person was identified. The 30-day comment period terminated close-of-business on February 26, 2003. Comments on the draft Project EA were received from six (6) parties and are documented in the Project EA, appendix E. Two comments were supportive of the preferred alternative; three preferred the use of a spray formulation that is certified for use on organic produce; and one questioned why other treatment types, application methods, or formulations were not fully developed. These concerns are addressed in the Project EA, pages 7 through 9 and 17 through 20.

An ODA-conducted public meeting was held in Waldport on February 13, 2003; about 16 concerned individuals and 13 federal, state, and local agency representatives attended. Agencies represented included ODA, USDA Forest Service, USDA Animal and Plant Health Inspection Service, Lincoln County Health and Human Services, Oregon Department of Human Services—

Health Services Division, and Oregon Department of Forestry. Several concerns, similar to those received from comments on the draft EA, were discussed. Although some people were supportive of the Project, several of the residents inside or near the project area were concerned about what chemicals may be in the inert ingredients of Foray 48B. Copies of the draft EA were made available at the meeting as well as information pamphlets concerning the gypsy moth and the pesticide Foray 48B. The Project EA, pages 15 through 20, contains additional information regarding meeting discussions.

Upon completion of the Project EA, a legal notice was published in the Corvallis Gazette-Times (paper of record) on March 12, 2003, informing the public that the Project EA is available for a 30-day review and comment period. Copies of the Project EA were made available at the Siuslaw National Forest Headquarters in Corvallis, Oregon and the Waldport Ranger District Office in Waldport, Oregon. Copies of the Project EA and a cover letter announcing the 30-day review and comment period were sent on March 12 and 13, 2003 to those who commented on the proposed action during scoping, to those who reside or own land in or near the project area, and to those who requested a copy of the Project EA. The legal notice and letters identified the proposed action as the preferred alternative and indicated the beginning and end of the comment period. The comment process was described and an USDA Forest Service contact person was identified. The 30-day comment period terminated close-of-business on April 11, 2003.

Public comments on the EA—Four parties (including two petition letters) responded to the solicitation for public comment on the Project EA. In summary, the respondents are supportive of eradicating the gypsy moth infestation. Based on the responses, residents that will be most affected by the Project are divided as to how best to deal with the infestation. Some are supportive of the methodology described for the preferred alternative; others prefer the use of a B.t.k. formulation that is certified for organic use, addressing their concerns about effects on domestic water quality, organic produce, and human health. Appendix F summarizes the comments on the EA and includes the responses to them.

Consultation with other agencies—In the US Fish and Wildlife Service (FWS) biological opinion (FWS reference: 1-7-03-F-0237), the FWS has concurred with our determination that the Project is not likely to adversely affect the bald eagle. Although the project area contains suitable bald eagle habitat, no bald eagle nest sites have been found. If the Project should change or create additional effects than expected, reinitiation of consultation would be required.

The FWS biological opinion determined that the project is not likely to jeopardize the existence of northern spotted owls or marbled murrelets. The FWS based these conclusions on the following factors:

- No spotted owl or murrelet habitat will be removed.
- Adverse effects to spotted owls or marbled murrelets due to noise disturbance will be confined to the two years of the action and adverse effects will not occur in subsequent years. Potential effects of disturbance on the survival and recovery of these species are considered to be much less important than the loss of suitable habitat.

The FWS term and condition was added to the Project's monitoring requirements:

- Adverse effects and any resulting incidental take shall be tracked and reported to the FWS using a Project Implementation and Monitoring Form.

The FWS has outlined when reinitiation of formal consultation is required:

"As provided in 50 CFR §402.16, reinitiation of formal consultation is required where discretionary Federal agency involvement or control over the action has been maintained (or is authorized by law) and if: (1) the amount or extent of incidental take is exceeded; (2) new information reveals effects of the agency action that may affect listed species or critical habitat in a manner or to an extent not considered in this opinion; (3) the agency action is subsequently modified in a manner that causes an effect to the listed species or critical habitat that was not considered in this opinion; or (4) a new species is listed or critical habitat designated that may be affected by the action. In instances where the amount or extent of incidental take is exceeded, any operations causing such take must cease pending reinitiation."

The USDA Forest Service fisheries report and biological evaluation (February 20, 2003) for the Lincoln County gypsy moth eradication program has found that the Project will have no effect on coho salmon. The report also found that essential fish habitat for coho salmon and other fish species in the Project area will not be adversely affected. The Endangered Species Act Coordinator for the Willamette and Siuslaw National Forests supports the findings of the fisheries report and biological evaluation. Because of these findings, consultation with the National Marine Fisheries Service was not needed.

Oregon Department of Environmental Quality (DEQ) held a public hearing concerning ODA's application for a National Pollutant Discharge Elimination System (NPDES) permit to aerially apply the pesticide B.t.k over public waters. The hearing was held at the Waldport Senior Center, April 10, 2003, beginning at 7:00 PM. About 21 people attended the hearing, including about 15 members of the public and 6 government agency representatives. Comments from four people were recorded for the public record. Comments centered on the concern about using Foray 48B and its effects on domestic water systems, people, plants, animals, and aquatic species. After review and consideration of all comments received during its comment period and at the public hearing, DEQ issued the permit to ODA on April 15, 2003. The permit will allow the application of the pesticide in a manner where some may unintentionally enter public waters.

In addition to NPDES general conditions, certain requirements and special conditions apply. According to Schedule A, ODA may only apply a Btk-based pesticide within the eradication analysis area and at rates not to exceed those approved by EPA. ODA must comply with other federal and state requirements, e.g., the Endangered Species Act, FIFRA, and ODA applicator licensing requirements. The applicator must be licensed and familiar with the application requirements and risks associated with the Btk product used. ODA is required to provide a phone number at which interested persons can access more information including the application schedule, which may be subject to change. ODA also must meet specified public notice requirements, e.g., press releases and letters to residents in the eradication area and to the Western Region DEQ office in Salem. Schedule B of the NPDES permit requires the permittee to monitor and record details about the gypsy moth spray operation on approved forms and submit them as well as specified information from the public notification process to DEQ. Schedule C indicates the compliance conditions and schedules to be met. Schedule D requires ODA to

submit its written contingency plan for the prevention, containment, and handling of any spills and unplanned discharges from the application, storage, and transportation of the Btk product or Jet-A fuel and to report to DEQ and to Oregon Emergency Management Division any spills or unplanned releases of reportable quantities. The plan must be updated as needed. The licensed applicator must have a copy of this contingency plan during the application. A continuing program of employee orientation and education is required.

Finding of No Significant Impact (FONSI)

Based on the site-specific environmental analysis documented in the Gypsy Moth Eradication Program for Lincoln County Environmental Assessment, I have determined that the activities described do not constitute a major Federal action and would not significantly affect the quality of the human environment; therefore, an Environmental Impact Statement is not needed. This determination was made in light of the following factors:

Context

This action is very small in terms of society as a whole. Project activities have been viewed and approved in a Regional context through the Siuslaw National Forest Land and Resource Management Plan (USDA 1990) as amended by the Final Supplemental Environmental Impact Statement on Management of Habitat for Late-Successional and Old-Growth Forest Related Species within the Range of the Northern Spotted Owl (USDA, USDI 1994). This action only affects a small portion of the Forest, which in turn, is a very small portion of the Region.

The site-specific activities that are authorized and guided by this decision are limited in scope and duration. Some minor adverse effects are expected in the short term. No long-term adverse effects are expected.

Intensity

1. Project actions will have both beneficial and adverse effects. Aerial spraying with *B.t.k* will have adverse effects on non-target lepidopterans. However, because the eradication area is relatively small, the likelihood for non-target lepidopterans to recolonize the area from surrounding areas is high. I have also considered other potential adverse effects and the benefits that the ecosystem will receive from implementing the Project actions and find that the overall beneficial effects to the ecosystem outweigh any short-term adverse effects. Further, I find that when considered alone, the adverse effects of this project are not significant (EA, section E).

2. No significant adverse effects to public health or safety have been identified (EA, pages 26 to 28, 32, 35, 38, 41, and 42).

3. The characteristics of the geographic area do not make it uniquely sensitive to the effects of project actions. Past actions of similar intensity in other forested and agricultural areas of western Oregon have not indicated any significant adverse effects (EA, sections D and E).

4. The Gypsy Moth Eradication Program for Lincoln County Environmental Assessment has disclosed direct, indirect, and cumulative effects to soil, water, aquatic and terrestrial species, and other components of the human environment. There are no significant direct, indirect, or cumulative effects anticipated from implementing project actions. The analysis of cumulative effects considered past, present, and reasonably foreseeable future actions on National Forest lands as well as for other ownerships in the affected watershed (EA, section E).

5. Because no new ground disturbance will occur, actions associated with the Project will have "no effect" (as defined in 36 CFR 800.5 [b]) on any listed or eligible heritage (cultural) resources. (EA, pages 37 and 38).

6. Based on the fisheries report and biological evaluation, wildlife biological assessment, and wildlife biological evaluation prepared for the Project, the effects on Federally listed aquatic and terrestrial species are not found to be significant (Gypsy Moth Eradication: Fisher Site, Lincoln County, Fisheries Report and Biological Evaluation, February 20, 2003; Biological Assessment for the Eradication of the Gypsy Moth Which May Disturb During Nesting Periods, Bald Eagles, Northern Spotted Owls, and Marbled Murrelets, February 6, 2003; Gypsy Moth Eradication Biological Evaluation and Landbird Assessment, January 21, 2003; EA, section E).

7. The Project is in compliance with relevant Federal, State and local laws, regulations and requirements designed for the protection of the environment. The Project will meet or exceed State water and air quality standards and is consistent with the Oregon Coastal Management Program as required by the Coastal Zone Management Act (EA, pages 12, 13, 30, 31, 32, 35, 36, 37, and 38 to 42).

8. There is concern by some local residents about the use of the unknown inert ingredients of Foray 48B, and their effects on organic production and domestic water systems. Because of this concern, efforts were made by the Oregon Department of Agriculture to investigate the availability of an organic-forestry formulation that is both approved for organic production and effective in treating forest infestations. Currently however, organic formulations are limited to dry formulations specifically designed for ground application. The effectiveness of these dry formulations is highly questionable if applied aerially in forested environments and using these formulations poses a risk of future spread of the gypsy moth. The Project will maintain the quality of the existing environment by eliminating the adverse effects of the introduced insect. Several studies about the effects of past similar projects have been conducted. Based on the results of these studies, the effects of the Project are not considered highly controversial (EA: pages 17, 18, and 19; sections E and F).

9. The Project's environmental effects are not uncertain or unknown. Planned actions are similar to those already accomplished on other forested watersheds in western Oregon (EA: pages 6 and 7, sections D, E, and F).

10. Actions that will be implemented by the Project do not set a precedent for future actions, because these actions are linked to the Gypsy Moth Management in the United States Final EIS (1995), and similar actions have been implemented in the past (EA: pages 6, 7, 24, 25, 39, and 41).

Other Disclosures

The Project will have no significant adverse effects on sensitive species, survey-and-manage species, management-indicator species, and land birds (EA, page 30); wetlands, floodplains, farm land, range land, or park land (EA, page 38); minority groups, civil rights, women, or consumers (EA, page 38); and Indian social, economic, subsistence rights, and sacred sites (EA, page 38).

The Project will have no effects on heritage resources, wilderness areas, inventoried roadless areas, and wild and scenic rivers (EA, section C and page 38). Actions are consistent with the scenic quality objectives for the planning area (EA, pages 30 and 38). Actions will prevent tree defoliation and mortality associated with defoliation, maintaining the existing level of invasive plants, including noxious and undesirable weeds (EA, section E).

Findings Required By Other Laws

Based on the analysis in the Gypsy Moth Eradication Program for Lincoln County Environmental Assessment, I find the selected alternative to be consistent with the Siuslaw National Forest Land and Resource Management Plan (USDA 1990), as amended by the Northwest Forest Plan (USDA, USDI 1994) and is designed to meet or exceed the objectives of the Aquatic Conservation Strategy as set forth in the Northwest Forest Plan (EA, pages 5, 35, 36, and 38).

The selected alternative is consistent with the National Forest Management Act implementing regulations, including the seven management requirements listed in 36 CFR 219.27, a through g:

a. *Resource protection*—The Project EA includes measures designed to protect resources and will apply practices as described in General Water Quality Best Management Practices (BMPs), Pacific Northwest Region, November 1988 (EA, section E);
b. *Vegetation manipulation of tree cover*—No vegetation manipulation of tree cover will be done. Activities are designed to prevent tree defoliation and mortality caused by the gypsy moth. This will help maintain stream shade. (EA, section E);
c. *Silvicultural practices that apply to timber harvest and cultural treatments*—No silvicultural practices will be implemented. (EA, section D);
d. *Even-aged management in the forest*—No even-aged management is proposed. (EA, section D);
e. *Riparian area protection*—Activities are designed to prevent tree defoliation and mortality in riparian areas. This will help to maintain existing shade for streams. These actions are expected to maintain water quality and fish habitat. (EA: pages 9 to 12, and section E);
f. *Conservation of soil and water resources*—The Project is consistent with the Aquatic Conservation Strategy objectives and includes best management practices (BMPs) and other measures designed to protect, enhance, or minimize effects to soil and water

resources. Actions are expected to maintain water quality and have no effects on the soil resource. (EA: pages 9 to 12, and section E); and

g. *Preserve and enhance the diversity of plant and animal communities*—The project is expected to maintain existing habitat conditions for several plant and animal species. (EA: pages 9 to 12, and section E).

Implementation Date

The Chief of the Forest Service has determined that the European gypsy moth infestation site near the Fisher (Five Rivers) area of is an emergency situation, and thus, is exempt from the automatic stay of implementation (if appealed) as sited in CFR Part 215.10(d). Therefore, this project may be implemented immediately following the notice of decision publication date in the newspaper of record (Corvallis Gazette-Times). The publication date is expected to be April 25, 2003.

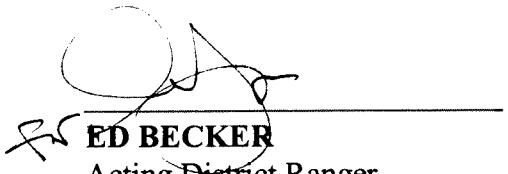
Administrative Review and Appeal

Although this decision is exempt from the automatic stay of implementation, it remains subject to appeal pursuant to Forest Service regulations at 36 CFR 215.7 because exemptions for emergencies apply only to stays of implementation and not to appeal. Written appeals must be sent to: Linda Goodman, Regional Forester, ATTN.: 1570 APPEALS, PO Box 3623, Portland, OR, 97208-3623. Any written appeal must be postmarked or received by the Regional Forester within 45 days of the date of publication of the notice for this decision in the Corvallis Gazette-Times. Appeals must meet the content requirements of 36 CFR 215.14.

Contact Person

For further information regarding this project, contact Bruce Buckley, South Zone Ranger District, Waldport Office, P.O. Box 400, Waldport, OR 97394; by phone at (541) 563-3211; or by e-mail at bbuckley@fs.fed.us.

Responsible Official:



April 23, 2003

ED BECKER
Date
Acting District Ranger
South Zone Ranger District
4480 Highway 101, Building G
Florence, OR 97439