

Finding of No Significant Impact

Anastrepha spp. Cooperative Eradication Program Rio Grande Valley, Texas

Environmental Assessment May 2021

The U.S. Department of Agriculture's Animal and Plant Health Inspection Service (USDA APHIS) prepared an environmental assessment (EA) that analyzed alternatives for control of *Anastrepha* spp. (*A. ludens* (Loew), the Mexican fruit fly (Mexfly), *A. obliqua* West Indian fruit fly, and *A. serpentina* (Wiedemann), sapote fruit fly). *Anastrepha* fruit flies are exotic agricultural pests often detected at actionable levels in the Rio Grande Valley (RGV), Texas. USDA APHIS involvement in a modified *Anastrepha* spp. cooperative eradication program with the Texas Department of Agriculture (TDA) was triggered by the January 14, 2020 laboratory confirmation of a gravid wild Mexfly collected from a trap on January 13 in Harlingen, Cameron County; seven Mexfly larvae were found the next day at the same location. An EA (USDA APHIS 2020a, b) analyzed actions proposed for a Cooperative Eradication Program. USDA APHIS (2020a, b) was determined not sufficient in eradicating *Anastrepha* from the RGV, thus a new EA has been written, the subject of this document, to determine whether to incorporate additional treatments, primarily malathion, to ensure *Anastrepha* eradication in future outbreaks that occur in Brooks, Cameron, Hidalgo, Starr, Webb, Willacy and Zapata Counties, Texas. This EA is tiered to a final Environmental Impact Statement (EIS) and Record of Decision published in November 2018 (USDA APHIS 2018). The EA, and supporting environmental documentation, is available at the USDA APHIS website and from:

USDA-APHIS-PPQ
State Plant Health Director
903 San Jacinto Boulevard, Suite 270
Austin, TX 78701

or

USDA-APHIS-PPQ
Fruit Fly National Policy Manager
4700 River Road, Unit 26
Riverdale, MD 20737

Public Involvement

The draft EA was available for public comment March 18-April 18, 2021. One comment was received during the public comment period.

The one commenter was concerned that spraying pyrethroids had unacceptable risks to human health and safety especially children, bees and other pollinators, aquatic organisms, and other nontarget species. Lambda-cyhalothrin, a pyrethroid insecticide, was included in USDA APHIS (2020a, b), and this EA, as a soil drench to kill fruit fly larvae under specific conditions, resulting in negligible risks to human health and nontarget species, including pollinators. Risks were discussed in USDA APHIS (2020a, b), the final EIS, and also given in brief in the EA in Section III.E.1. The current EA included malathion aerial and ground-based spray applications, an organophosphate rather than a pyrethroid, that has different human and environmental risks with some being similar. Section III.E.1 discussed the chemical methods considered under the proposed action and discussed the human and environmental risks from these treatments, when

and where these treatments will be used, and mitigation measures to reduce potential impacts from their use. We believe the EA speaks for itself and will not pose unacceptable risks to people or the environment including nontarget species.

Major Issues

Major issues considered in the EA for a fruit fly cooperative program to protect agricultural products included:

- Impacts to agricultural products
- Environmental fate of chemical treatments
- Risks to human health
- Risk to historic properties
- Risks to minority and low-income human populations
- Risks to nontarget species

Alternatives

The EA for the *Anastrepha* cooperative program analyzed four alternatives:

- (1) No Action
- (2) Quarantine and Commodity Certification
- (3) Continuation of the RGV Mexfly Program
- (4) Modification of the *Anastrepha* RGV Program (Preferred Alternative).

Summary of Environmental Effects of the Alternatives

Each of the alternatives is associated with potential environmental consequences per the issues and were analyzed in the EA in Chapter III. Doing nothing, the No Action, could have significant consequences for the agricultural fruits produced in the RGV and impact the people relying on these products for income, especially rural communities. Unregulated pesticide applications to protect host plants could result in the development of pesticide resistance in *Anastrepha* populations and see the establishment of fruit fly populations in the RGV and elsewhere. Quarantine and commodity restrictions would likely result in similar effects as the first alternative and would require many more inspection and certification personnel, and harm agricultural trade. The continuation of the current fruit fly program without malathion treatments would require a longer timeframe to control fruit fly outbreaks in the RGV, especially those that are concurrent, require higher use of other techniques, and increase agricultural costs. The modification of the fruit fly program to include malathion treatments could have potential environmental affects, but these could be abated to minimize the effects. The addition of malathion would likely allow the *Anastrepha* RGV program to have a higher degree of success in eradicating fruit fly outbreaks. This would be very beneficial for the RGV agricultural community and costs, and reduce people attempting to control fruit fly outbreaks themselves, with unknown environmental consequences, and without coordinating efforts.

Finding of No Significant Impact

The analysis in the EA indicates that there will not be a significant impact on the quality of the human environment as a result of the proposed action, the preferred alternative. This determination is based on the following factors:

1. *Anastrepha* eradication efforts as conducted by USDA APHIS is localized in the RGV and not regional or national in scope, as discussed in Section I.A of the EA.
2. The methods used to manage fruit fly damage are fairly target-specific and are not likely to negatively affect public health and safety when used as discussed in Section III.E of the EA.
3. The proposed activities will not have an impact on unique characteristics of the geographic area such as park lands, prime farmlands, wetlands, wild and scenic rivers, or ecological critical areas. The nature of the methods proposed for alleviating damages are not likely to permanently affect the physical environment as discussed in Section III.E.3.
4. The effects on the quality of the human environment are not highly controversial. Although there is some opposition by some members of the public to insecticidal use, the actions are not highly controversial among the experts. Section III.E.1 discusses each method and application of these methods to assure minimal potential effects from their use.
5. Based on the analysis documented in the EA, the effects of the proposed activities are not highly uncertain and do not involve unique or unknown risks, except the potential of a full-blown fruit fly population in the RGV.
6. The proposed action would not establish a precedent for any future action with significant effects or represent a decision in principle about future considerations. The EA proposes the use of malathion be added to the arsenal to combat *Anastrepha* from getting a foothold in the RGV, a method that is well-established among professionals managing invasive insects.
7. Impacts to nontarget species, especially other insects, are expected to have a low to negligible impact based on the available information. Implementation of the preferred alternative is not expected to have any adverse effect on migratory birds or their flight corridors, or other nontarget species in the program area.
8. An evaluation of the proposed action and its effects on threatened and endangered species determined that the proposal would not have adverse effects on threatened and endangered species in RGV as discussed in Section III.E.4.b and the EIS. USDA APHIS completed a programmatic section 7 consultation under the Endangered Species Act with the U.S. Fish and Wildlife Service (FWS) for the seven-county *Anastrepha* RGV program area and determined that program activities may affect, but are not likely to adversely affect, federally listed species or critical habitat with the implementation of protection measures. USDA APHIS received concurrence from the FWS on December 21, 2020. USDA APHIS will coordinate with FWS if any changes are made such as an expansion of the *Anastrepha* management zone, or changes in the status of listed species in the action area, to ensure that federally listed species and critical habitat are protected.
9. The proposed activities would not affect districts, sites, highways, structures, or objects listed in or eligible for listing in the ational Register of Historic Places, nor would they likely cause any loss or destruction of signifiNcant scientific, cultural, or historical resources as discussed in Section III.E.3.
10. The proposed action would be in compliance with all Federal, State, and local laws imposed for the protection of the environment.

11. There are no irreversible or irretrievable resource commitments identified by this assessment, except for a minor consumption of fossil fuels for routine operations and work efforts conducted under USDA APHIS (2020a, b).

Decision

I have carefully reviewed the EA and the input resulting from the public involvement process. I believe the need for action and issues identified in the EA would be best addressed through implementation of Alternative 4, Modification of the *Anastrepha* RGV Program. I considered and based my finding of no significant impact on the quantitative and qualitative risk assessments of the proposed pesticides, the final EIS, the analysis in the referenced EA, and on my review of the program's operational characteristics. Alternative 4 is therefore selected because: (1) it offers the greatest chance of ensuring that *Anastrepha* fruit fly species do not become established in the RGV; (2) it will benefit the agricultural fruit crops in the RGV best for resource owners and managers within current program funding constraints; (3) it will maximize selectivity of methods available; (4) it will minimize risks and conflicts with the public; (5) it will minimize risks to nontarget and threatened and endangered species, (6) it will result in low magnitude or negligible effects on other insect populations, and (7) it would not result in any significant direct or indirect effects on the human environment. USDA APHIS will use an Integrated Pest Management approach which maximizes program effectiveness, while conforming to all relevant laws, regulations, policies, and procedures designed to protect the environment.

I have not found evidence of significant environmental impacts associated with this proposed program. Thus, the March 2021 EA is a Final EA with this FONSI and supercedes USDA APHIS (2020a, b).

May 17, 2021

Stuart W. Kuehn
State Plant Health Director, Texas
Animal and Plant Health Inspection Service
U.S. Department of Agriculture

Date

Literature Cited

U.S Department of Agriculture, Animal and Plant Health Inspection Service (USDA APHIS). 2020a. Mexcian Fruit Fly Cooperative Eradication Program, Rio Grande Valley, Texas. Environmental Assessment and Finding of No Significant Impact. Riverdale, MD. January.

USDA APHIS. 2020b. Mexican Fruit Fly Cooperative Eradication Program, Rio Grande Valley, Texas. Supplementary Environmental Assessment and Finding of No Significant Impact. Riverdale, MD. January.

USDA APHIS. 2018. Fruit fly Cooperative Control Program. Final Programmatic Environmental Impact Statement. Riverdale, MD. November.