The National Pollinator Health Strategy

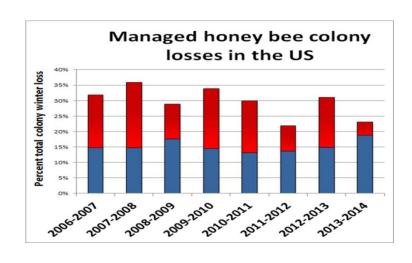


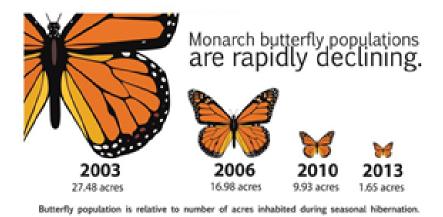
Rick Keigwin
Office of Pesticide Programs
US Environmental Protection Agency

March 2016

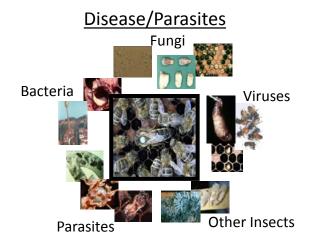
Background

- Pollinator declines have been at crisis levels for decades
- One-third of the U.S. food supply is dependent on pollinators
- Monarch Butterflies, hummingbirds, native bees and other pollinators declining





Factors Associated with Bee Declines





Agricultural Practices



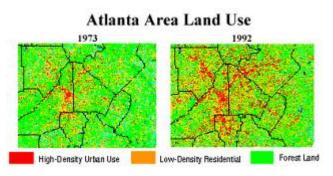
Pesticides



Source: USDA Agricultural Research Service



Nutrition



<u>Urbanization</u>

Presidential Memorandum:

Creating a Federal Strategy to Promote the Health of Honey Bees and Other Pollinators

On June 20, 2014, President Obama issued a memorandum calling on Federal agencies to increase and coordinate their efforts to improve bee health by developing an integrated strategy.

The strategy incorporates and identifies:

- Commitments from each Federal agency to promote health of honey bees and other pollinators
- 2. Pollinator Research Action Plan (PRAP)
- 3. Public Education Plan
- 4. Public/Private Partnerships



Photo courtesy of ARS

The Task Force











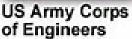






















Early Accomplishments

Federal Facility and Land Guidance

The Council on Environmental
 Quality released an addendum to its
 Guidance for Federal Agencies on
 Sustainable Practices for Designed
 Landscapes to promote pollinator
 habitat creation and maintenance.

Pollinator Garden

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Birds

Birds

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The Makes and multing materials for brade and insecus

 The General Services Administration prepared guidance for implementing pollinator habitat in Federal building construction.



Photos courtesy of CEQ and USDA

Listening Sessions November 2014

Solicit Feedback on:

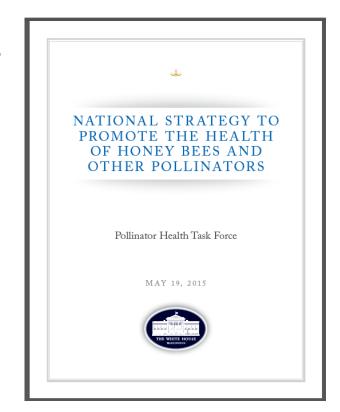
- Best management practices
- Pesticide risk mitigation
- Research
- Education opportunities
- Pollinator habitat improvements
- Public-private partnerships



National Strategy to Promote the Health of Honey Bees and Other Pollinators

The strategy was released on May 19, 2015 and incorporates and identifies:

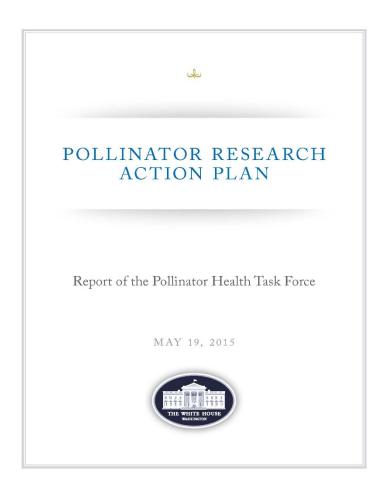
- 1. Commitments from each Federal agency to promote health of honey bees and other pollinators
- Pollinator Research Action Plan (PRAP)
- 3. Public Education Plan
- 4. Public/Private Partnerships



Strategy Overarching Goals

- 1. Reduce honey bee overwintering losses to no more than **15**% within **10** years
 - Compared to current 5-yr average rate of 30%
- Restore monarch butterfly populations to 225 million butterflies by 2020
 - Their historical average population size
- 3. Restore/enhance **7 million acres** of land for pollinators over the **next 5 years**
 - Federal action and public/private partnerships

Pollinator Research Action Plan



Sections covering:

- Habitat
- Nutrition
- Pollinator Pathogens and Pests
- Pesticides and Toxins
- Genetics, Breeding, and Biology
- Native Plant Development and Deployment
- Economics
- Collections and Informatics

Education Plan

Core principles

- Pollinator conversation is a shared goal and responsibility
- Requires multi-faceted and customizable strategies to reach diverse and multicultural audiences
- Actions of a single person can make a difference

Next Steps

- Education efforts needed across different and multiple audiences and multiple platforms
- Consolidate web resources and content to support goals.
- Core messages designed to raise awareness about pollinators

Partnerships

Benefits of public/private partnerships

- Enhance research effort
- Promote adoption of practices that benefit pollinators
- Increase public understanding of importance of pollinators

Leverage partnership networks

- Coordinate activities within the Federal government
- Coordinate with non-Federal entities
- Facilitate new partnership arrangements



EPA Commitments

- Assess the effect of pesticides on bees and other pollinators
- Restrict the use of products highly toxic to bees in crops with commercial pollination
- Engage State and tribal partners in the development of pollinator protection plans
- Expedite review of registration applications for new products targeting pests harmful to pollinators
- Encourage the incorporation of pollinator protection and habitat planting activities into green infrastructure and Superfund projects



USDA Commitments

- Enhance pollinator habitat in agricultural areas
- Produce Conservation Buffer Guide with guidelines for designing agroforestry practices including effective pollinator habitat
- As new pest control products become available, disseminate information through NRCS and FSA



DOI Commitments

- Enhance pollinator habitat on Federal lands
- Develop and Implement a National Native Seed Strategy
- Reduce, use of pesticides that are toxic to bees
- Include pollinator-friendly native species in restoration and reclamation projects
- Assist State Wildlife organizations to conserve pollinators



DOT Commitments

- Promote increased pollinator habitat along roadways
- Work with State Departments of Transportation to promote pollinator friendly practices and corridors



DOE Commitments

 Work with utilities to encourage pollinator friendly practices and increase pollinator habitat















Other Agencies



All: Include pollinator habitat into building projects

HUD/GSA: Incorporate pollinator awareness in training

DOD: Incorporate pollinator efforts into natural resource projects

NSF: Fund new projects focused on pollinators

Smithsonian: Expand education efforts

ACE: Improve pollinator habitat in conservation efforts

FEMA: Incorporate habitat into national disaster recovery efforts

What Have We Accomplished

for Rehabilitation and Restoration 2015-2020

DRAFT May 11, 2015

Pollinator-Friendly Best Management Practices for Federal Lands



Bumble bee foraging on goldenrod, Solidago sp.

17

What Have We Accomplished

- White House Transportation Summit on pollinator habitat
- Proposal to restrict the use of highly toxic pesticides to bees
- New hive management tools for beekeepers
- Collaboration with the Honey Bee Health Coalition to host the Managed Pollinator Protection Plan Symposium
- Assessments of potential pesticide impacts on bees
- Integration of pollinator habitat into federal land management decisions



Photo courtesy of ARS

Where Do We Go From Here?

Continue to implement the strategy

 Promote habitat enhancements across various landscapes

Build partnerships