# Antibiotic Resistance and Stewardship Updates

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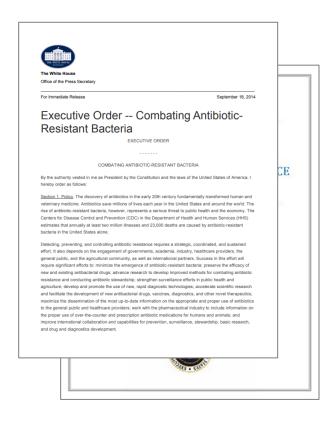


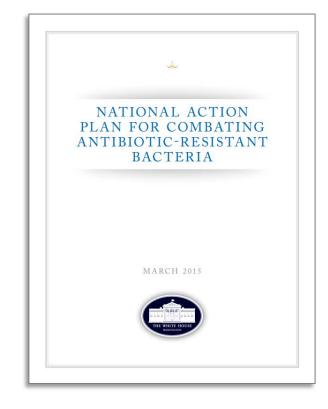


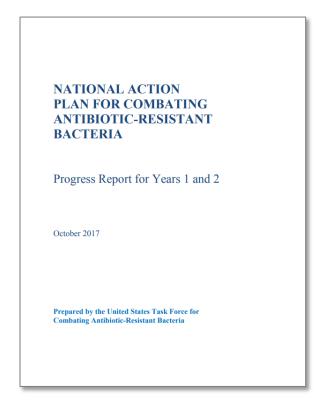
#### **Outline**

- National Action Plan (CARB)
  - Selected highlights
- CARB in New Jersey
- Antibiotic Stewardship Recognition Program

#### National "CARB" Action Plan







**September 2014** 

**March 2015** 

October 2017

#### Five CARB goals

Slow the emergence and prevent the spread of MDROs

Strengthen
One Health
surveillance



Advance development and use of rapid diagnostic tests

Accelerate R&D for new antibiotics, therapeutics, and vaccines



Improve collaboration for AR prevention, surveillance, and R&D

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### Goal 1: Slow the emergence of MDROs

SIR changes from 2015 to 2016	National	New Jersey
MRSA bacteremia events	↓ -6%	+1%
C. Difficile events	↓ -8%	<b>↓</b> -6%





### Goal 1: Slow the emergence of MDROs

Hospitals with Complete ASP	National	New Jersey
2014	39%	49%
2015	48%	58%
2016	64%	76%





## Goal 1: Slow the emergence of MDROs

AR Threat (2011-2014 data)	National	New Jersey
MRSA	46.4% (20104/43331)	47.8% (441/922)
CRE	3.5% (2826/80276)	9.6% (161/1681)
CRE CLABSI only	6.9% (945/13627)	20.9% (58/278)
CRAB (I + R)	25.7% (1596/3028)	71.4% (60/84)

#### **Goal 2: One Health surveillance**

- National Center for Biotechnology Information Isolate Browser
- National Antimicrobial Resistance Monitoring System for Enteric Bacteria (NARMS)
  - Human isolates
  - Retail meat and food-producing animals
- Antibiotic Resistance Patient Safety Atlas
  - Inpatient antibiotic stewardship
  - Outpatient prescribing
  - HAI and AR data from NHSN



#### **Goal 3: Rapid diagnostic tests**

- Commercial Carbapenemase PCR screening methods
- "Printed" AST panels
- In-house testing developments
  - MCR-1 and MCR-2 PCR
  - Candida auris Culture and PCR
  - OXA-23 screening PCR





#### "CARB" in New Jersey

- CDS AS activities run on a five-year funding cycle
  - Cycle ends July 2019
  - Unique changes: ICAR, AR additions cycle
- How can we plan ahead?
  - Align with CARB goals
  - Reflect local needs and challenges
  - Leverage unique role of NJDOH
- Think bigger!
  - "CARO": Combating Antimicrobial Resistant Organisms

#### Stewardship and resistance goals

Slow the emergence of drug resistance through antimicrobial stewardship

Prevent the spread of antimicrobial resistant organisms

Increase capacity to identify cases of novel resistance and characterize regional resistance

Improve collaboration to maximize local investments into AR/AS



## Stewardship and resistance goals

Antimicrobial Stewardship

**Infection Prevention** 

Surveillance and Reporting

Collaboration and Infrastructure

#### Goal 1: Antimicrobial stewardship

- Support partner initiatives for antibiotic stewardship
- ☐ Recognize accomplishments in antimicrobial stewardship and highlight local success stories
- Promote public awareness of antibiotics as a valuable resource
- ☐ Identify areas where antimicrobial stewardship interventions are most needed
- ☐ Identify pathways to collecting local prescribing data

#### **Goal 2: Infection prevention**

- ☐ Establish expectations and mechanisms for reporting AR threats
- ☐ Formalize public health response for novel AR threats and MDRO outbreaks
- ☐ Foster best practices for infection prevention

#### Goal 3: Surveillance and reporting

- ☐ Expand local and regional laboratory surveillance to ID novel MDROs
- ☐ Develop sustainable methods to monitor and describe AR in New Jersey

#### **Goal 4: Improve collaboration**

- Engage local stakeholders and leaders to identify areas for improvement and joint initiatives
- ☐ Facilitate distribution of local resources and opportunities

# NJ's New Antimicrobial Stewardship Recognition Program

#### Why a recognition program?

- Acknowledge our top performers and encourage developing stewardship programs
- Improve visibility of ASPs within their organizations
- Encourage new leaders and find unique initiatives
- Sustain current emphasis on stewardship in NJ
- Antimicrobial stewardship across the healthcare continuum

#### Our approach

- Review of existing stewardship recognition programs
- Compiled core elements, suggested initiatives, and minimum expectations for stewardship
- Focus group discussion to develop program plan
- Program launch (pilot) early 2019
  - Goal: 15 awardees
- Program expansions beginning in 2020

#### Recognition program pilot (2019)

- Three applications:
  - 1. Acute care hospitals
  - 2. Long-term care and long-term acute care
  - 3. Outpatient
- Recognition types:
  - Tiered recognition for inpatient facilities (gold, silver, bronze)
  - Single recognition level for outpatient for year 1

#### **Program requirements**

- Complete online application
- Achieve all CDC Core Elements
  - Higher-tiers require "higher-level interventions" in each element
- Supporting documentation for all elements
  - ASP policy, memo, etc.
  - ASP meeting minutes example
  - Data summary or rates
  - Descriptions of interventions

#### **Program timeline**

- Call for submissions: Spring
- Application review and awardee notification: Summer
- Awardee announcements: November (Antibiotics Awareness Week)
- Award will be given on an annual basis

### Why participate?



- "SWAG"
  - Program-specific awardee icons
  - Certificate of achievement from NJDOH
- Listing on NJDOH recognition program webpage
- Inventory and show off your ASP accomplishments
- Help NJDOH identify best practices for others to learn from

# Questions?

Thank you!

#### What do you think?

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