Healthcare-Associated Infection Prevention Plan

Oregon health Authority

Public Health Division

Executive Summary:
Oregon's first State Healthcare-Associated Infection (HAI) plan was created in 2009 to target HAIs in acute care, expanded in 2013 to include MDROs and non-acute care settings, and updated in 2014 to adopt prevention targets set by the US Department of Health and Human Services (HHS). The Oregon State HAI Plan was most recently updated in 2015 to include an Infection Control Assessment and Promotion (ICAP) program. The ICAP program will commence with assessment of infection prevention and control practices at Oregon's six Ebola Assessment Hospitals using a standardized tool adapted by CDC's Rapid Ebola Assessment teams to prepare hospitals during the 2014-15 Ebola outbreak. Next, the ICAP program will prioritize assessment of other inpatient, outpatient, and long-term care facilities, based on the following factors: NHSN-reported burden of infection, inclusion in a region that is the focus of MDRO prevention efforts, outbreaks reported to the Oregon Health Authority (OHA), and infection control citations noted by state surveyors. Through gap analysis, targeted training, evaluation, and targeted resource allocation, the ICAP seeks to enhance adherence to standard and transmission-based precautions, safe laboratory and waste management practices, and communication between healthcare and public health partners.

Background:
In June 2007, the Oregon legislature passed House Bill 2524 to create a mandatory HAI Reporting Program in Oregon. The bill stipulated that the Oregon Office for Health Policy and Research (OHPR) conduct the following activities: implement an HAI surveillance and prevention program; maintain a multi-disciplinary HAI Advisory Committee (HAIAC) to advise the OHPR regarding the mandatory HAI reporting program; require healthcare facilities to report metrics determined by OPHR with guidance from the HAIAC, prepare periodic public reports to summarize aggregate and facility-specific HAI data, and regularly evaluate the quality and accuracy of the data collected for the HAI reporting program. The HAIAC was established in October 2007, and at that time, eight of 57 Oregon hospitals were using a system for collecting HAI data. The committee observed that the CDC's National Health and Safety Network (NHSN) was emerging as the nationally preferred system for tracking HAIs. The committee partnered with Association for Professionals in Infection Control (APIC) and the Oregon Association of Hospitals and Health Systems (OAHHS) to provide training for all Oregon hospitals to use NHSN.

In September 2009, the Oregon Public Health Division (OPHD) was awarded a grant from the American Recovery and Reinvestment Act (ARRA), distributed through HHS, and managed by CDC's Epidemiology and Laboratory Capacity for Infectious Diseases (ELC) program. The funds were to

be used to enhance HAI infrastructure, surveillance, and reporting. These goals dovetailed with the activities currently underway as a result of Oregon's House Bill 2524, and the activities overseen by the HAIAC. In 2009, an HAI program manager was hired to build an HAI program within OPHD's Acute and Communicable Disease Prevention (ACDP). As of December 2009, all hospitals required to report HAI data stipulated by the HAI program were enrolled and reporting through NHSN. The first state plan, submitted to CDC in 2009, followed a standardized structure required of all states receiving ARRA funding for HAI program activities (details below). Since 2009, the HAIAC has expanded the number and types of HAIs that hospitals are required to report. Additionally, dialysis facilities are now required to report bloodstream infections, and hospitals, ambulatory surgical centers (ASC), and skilled nursing facilities (SNFs) are required to report healthcare personnel vaccination rates as part of HAI Reporting. Activities supported with ARRA funds were expanded in subsequent years by Affordable Care Act (ACA) funds; these funds continued to support basic HAI infrastructure (i.e., a coordinator and oversight of the HAIAC), expanded HAI surveillance and validation activities, and supported prevention collaborative activities in conjunction with partners such as the Oregon Patient Safety Commission and Oregon Health and Sciences University. In 2015, the OPHD received an ELC Ebola Supplement Grant to expand the coordination of HAI activities with preparedness, regulatory and laboratory communities. Specifically, funds were allocated for mapping and coordination activities to allow enhanced awareness and coordinated response potential throughout public health, regulatory, and healthcare communities. Additionally, the funds were designated for support of standardized assessments of Ebola Assessment Hospitals as well as other inpatient and outpatient facilities throughout the state. These activities – including the formation of an Infection Control and Assessment and Promotion sub-committee of the HAIAC – are reflected in updates to the Oregon State Plan detailed below.

Summary of Previous State HAI Plans:

- 2009: First official state plan
    - Submitted in standardized format to CDC as stipulation of ARRA funds
    - Publically available here: http://www.cdc.gov/HAI/pdfs/stateplans/or.pdf
    - Supported formation of official HAI Program within ACDP to conduct:
        - Infrastructure activities, including formation of state plan, hiring of a state HAI coordinator, and coordination of the HAIAC to build and solidify partnerships
        - Surveillance activities, including validation of NHSN data submitted to OHA per the requirements of the Oregon mandatory HAI reporting program
        - Prevention activities, including development of multi-facility collaboratives to introduce and champion HAI prevention strategies
- 2013: Update to initial plan with the following objectives:

- Detect and reduce the number of multidrug-resistant organisms (MDRO) and *Clostridium difficile* (CDI) circulating in Oregon healthcare facilities
- Improve antimicrobial stewardship and environmental cleaning standards
- Enhance surveillance and prevention of HAIs in non-hospital settings including:
  - SNFs through the state's Drop CRE program and inclusion in of influenza vaccination reporting requirement
  - ASCs through inclusion of influenza vaccination reporting requirement
  - Dialysis centers through addition of dialysis event reporting requirement
- Promote inter-facility transfer communication regarding patient infection or colonization with MDROs or *C. difficile*

- 2014: Update to include HHS reduction targets as part of HAI Program Goals
  - HHS Federal Steering Committee for the Prevention of Healthcare-Associated Infections developed the National Action Plan to Prevent Health Care-Associated Infections: Road Map to Elimination in 2009 with Target goals including
    - CLABSI: 50% reduction by 2013 from national baseline in 2006-2008
    - CAUTI in ICUs: 25% reduction by 2013 from national baseline in 2009
    - Hospital-onset MRSA BSI (LabID): 25% reduction by 2013 from national baseline in 2010-2011
    - Hospital-onset *Clostridium difficile* (LabID): 30% reduction by 2013 from national baseline in 2010-2011
    - SSI: 25% reduction by 2013 from national baseline in 2006-2008
  - Updated plan proposed using these targets to benchmark progress in Oregon and at specific facilities

<u>2015 Plan Updates:</u>

In 2015, the state HAI plan will incorporate goals set forth by the HAI program to enhance coordination with regulatory and preparedness communities, and to begin standardized HAI assessment at Oregon healthcare facilities. Expanded state plan goals will include:

- Expansion of the HAIAC to include an Infection Control Assessment and Prevention Committee (ICAP), comprised of the following multidisciplinary members:
  - Physician lead on infection prevention consultations
  - Infection Prevention Consultant
  - Industrial Hygienist
  - Healthcare Preparedness representative
  - Regulatory Representative
  - HAI Ebola Grant Oversight Staff
- The ICAP subcommittee responsibilities will include:

    - Aggregating findings from consultations
    - Presenting findings to the HAIAC
    - Making recommendations to facilities based on consultative assessments and guidance from the HAIAC
- Creation of an inventory of all healthcare facilities in the state by combining data from multiple sources; inventory will be updated annually to include accurate contact information and up-to-date information about publically reported infection rates as well as other metrics to be determined in consultation with the ICAP sub-committee of the HAIAC.
- Standardized assessment of and consultation with Oregon's six Ebola Assessment Hospitals on 12 domains defined by CDC's Rapid Ebola Preparedness tools.
- Standardized infection prevention assessment of and consultation with a targeted selection of hospitals, ASCs, and LTCFs throughout the state using CDC tools.

State Plan Objectives in Standardized Format

The following template provides choices for enhancing state HAI prevention activities in the six areas identified above. For each section, please choose elements which best support current activities or planned activities. Current activities are those in which the state is presently engaged and includes activities that are scheduled to begin using currently available resources. Planned activities represent future directions the state would like to move in to meet currently unmet needs, contingent on available resources and competing priorities. A section for additional activities is included to accommodate plans beyond the principal categories.

1. Enhance HAI program infrastructure

Successful HAI prevention requires close integration and collaboration with state and local infection prevention activities and systems. Consistency and compatibility of HAI data collected across facilities will allow for greater success in reaching state and national goals. Please select areas for development or enhancement of state HAI surveillance, prevention, and control efforts.

Table 1: Oregon infrastructure planning for HAI surveillance, prevention, and control.

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☒	☐	1. Establish statewide HAI prevention leadership through the formation of multidisciplinary group or state HAI advisory council i. Collaborate with local and regional partners (e.g., OAHHS, QIN partners, APIC, Oregon IHI network, representatives from provider communities).	Est. Oct., 2007, ongoing
		ii. NEW: Include hospital preparedness partners (e.g., hospital/healthcare coalitions funded through the ASPR Hospital Preparedness Program). Additional representation from accrediting and/or licensing agency with surveyor authority is ideal.	Jun. 1, 2015
		iii. NEW: Engage HAI advisory committee in potential roles and activities to improve antibiotic use in the state (antibiotic stewardship)	Dec. 16, 2015
☒	☐	iv. NEW: Engage HAI advisory committee in activities to increase health department's access to data and subsequently use those data in prevention efforts	Jun. 24, 2015
☒	☐	iv. Identify specific HAI prevention targets consistent with HHS priorities	Est. Jul., 2008 (updated Jul., 2014), ongoing

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
		Other activities or descriptions:	
		2. Establish an HAI surveillance prevention and control program	
☒	☐	i. Designate a State HAI Prevention Coordinator	Nov., 2009, ongoing
☒	☐	ii. Develop dedicated, trained HAI staff with at least one FTE (or contracted equivalent) to oversee HAI activities areas (Integration, Collaboration, and Capacity Building; Reporting, Detection, Response, and Surveillance; Prevention; Evaluation, Oversight, Communication, and Infection Control)	Nov., 2009 – Apr., 2010
		Other activities or descriptions:	

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☒	☐	3. Integrate laboratory activities with HAI surveillance, prevention, and control efforts. i. Improve laboratory capacity to confirm emerging resistance in HAI pathogens and perform typing where appropriate (e.g., outbreak investigation support, HL7 messaging of laboratory results)	Jan., 2011, ongoing
		Other activities or descriptions:	
☒	☐	4. Improve coordination among government agencies or organizations that share responsibility for assuring or overseeing HAI surveillance,	Jul., 2009,

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
		prevention, and control (e.g., State Survey agencies, Communicable Disease Control, state licensing boards)	ongoing
		Other activities or descriptions: Improve coordination between OHPR, OPHD, and OPSC in their HAI reduction efforts by developing statewide goals and objectives.	Jan. 2010, then ongoing
☐	☐	5. Facilitate use of standards-based formats (e.g., Clinical Document Architecture, electronic messages) by healthcare facilities for purposes of electronic reporting of HAI data. Providing technical assistance or other incentives for implementations of standards-based reporting can help develop capacity for HAI surveillance and other types of public health surveillance, such as for conditions deemed reportable to state and local health agencies using electronic laboratory reporting (ELR). Facilitating use of standards-based solutions for external reporting also can	

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
		strengthen relationships between healthcare facilities and regional nodes of healthcare information, such as Regional Health Information Organizations. (RHIOs) and Health Information Exchanges (HIEs). These relationships, in turn, can yield broader benefits for public health by consolidating electronic reporting through regional nodes.	
		Other activities or descriptions: Implement electronic transfer of laboratory data into NHSN at 5 to 6 institutions in the state.	Consider in 2016

2. Surveillance, Detection, Reporting, and Response

Timely and accurate monitoring remains necessary to gauge progress towards HAI elimination. Public health surveillance has been defined as the ongoing, systematic collection, analysis, and interpretation of data essential to the planning, implementation, and evaluation of public health practice, and timely dissemination to those responsible for prevention and control.[1] Increased participation in systems such as the National Healthcare Safety Network (NHSN) has been demonstrated to promote HAI reduction. This, combined with improvements to simplify and enhance data collection, and improve dissemination of results to healthcare providers and the public are essential steps toward increasing HAI prevention capacity.

The HHS Action Plan identifies targets and metrics for five categories of HAIs and identified Ventilator-associated Pneumonia as an HAI under development for metrics and targets (Appendix 1):

- Central Line-associated Blood Stream Infections (CLABSI)
- *Clostridium difficile* Infections (CDI)
- Catheter-associated Urinary Tract Infections (CAUTI)
- Methicillin-resistant *Staphylococcus aureus* (MRSA) Infections
- Surgical Site Infections (SSI)
- Ventilator-associated Pneumonia (VAP)

State capacity for investigating and responding to outbreaks and emerging infections among patients and healthcare providers is central to HAI prevention. Investigation of outbreaks helps identify preventable causes of infections including issues with the improper use or handling of medical devices; contamination of medical products; and unsafe clinical practices.

[1] Thacker SB, Berkelman RL. Public health surveillance in the United States. Epidemiol Rev 1988;10:164-90.

Table 2: Oregon planning for surveillance, detection, reporting, and response for HAIs

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
		1. Improve HAI outbreak detection and investigation	
☒	☐	i. Work with partners including CSTE, CDC, state legislatures, and providers across the healthcare continuum to improve outbreak reporting to state health departments	Aug., 2015—Jul., 2016
☒	☐	ii. Establish protocols and provide training for health department staff to investigate outbreaks, clusters, or unusual cases of HAIs.	Oct., 2015
☒	☐	iii. Develop mechanisms to protect facility/provider/patient identity when investigating incidents and potential outbreaks during the initial evaluation phase, where possible, to promote reporting of outbreaks	Dec., 2015
☒	☐	iv. Improve overall use of surveillance data to identify and prevent HAI outbreaks or transmission in HC settings (e.g., hepatitis B, hepatitis C, multi-drug resistant organisms (MDRO), and other reportable HAIs)	Jul., 2016
		Other activities or descriptions:	

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☒	☐	2. Enhance laboratory capacity for state and local detection and response to new and emerging HAI issues.	Jul., 2015 – Dec., 2016
		Other activities or descriptions:	
☒ ☒	☐ ☐	3. Improve communication of HAI outbreaks and infection control breaches i. Develop standard reporting criteria including, number, size, and type of HAI outbreak for health departments and CDC ii. Establish mechanisms or protocols for exchanging information about outbreaks or breaches among state and local	Aug., 2015 – Jul., 2017

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
		governmental partners (e.g., State Survey agencies, Communicable Disease Control, state licensing boards)	
		Other activities or descriptions:	
		4. Identify at least 2 priority prevention targets for surveillance in support of the HHS HAI Action Plan	Jul. 2008 See below. Jul. 2008, then ongoing
☒	☐	i. Central Line-associated Bloodstream Infections (CLABSI)	
☒	☐	ii. *Clostridium difficile* Infections (CDI)	
☒	☐	iii. Catheter-associated Urinary Tract Infections (CAUTI)	
☒	☐	iv. Methicillin-resistant Staphylococcus aureus (MRSA) Infections	
☒	☐	v. Surgical Site Infections (SSI)	

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☐	☒	vi. Ventilator-associated Pneumonia (VAP)	
		Other activities or descriptions:	
	v.	*Oregon has conducted surveillance for invasive cases of MRSA in 3 counties in the metropolitan Portland area since 2004 as part of the Active Bacterial Core surveillance of the Oregon Emerging Infections Program	2004
	vi.	*CRE is a reportable condition in Oregon; laboratories are required to report and submit CRE specimens for carbapenemase screening to the Oregon State Public Health Laboratory	2011
		5. Adopt national standards for data and technology to track HAIs (e.g., NHSN).	
☒	☐	i. Develop metrics to measure progress towards national goals (align with targeted state goals). (See Appendix 1).	Apr. 2010, then ongoing Apr. 2010, then review annually
☒	☐	ii. Establish baseline measurements for prevention targets	
		Other activities or descriptions:	

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☒	☐	6. Develop state surveillance training competencies i. Conduct local training for appropriate use of surveillance systems (e.g., NHSN) including facility and group enrollment, data collection, management, and analysis	2008, initial training of all hospitals
		Other activities or descriptions: After determining NHSN to be the surveillance system of choice for mandatory reporting of infections by hospitals in 2008, the HAIAC partnered with Association for Professionals in Infection Control (APIC) and the Oregon Association of Hospitals and Health Systems (OAHHS) to provide training for all Oregon hospitals to use NHSN. Future plans included assisting skilled nursing facilities with NHSN enrollment.	

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☒	☐	7. Develop tailored reports of data analyses for state or region prepared by state personnel	April 2010, then ongoing
		Other activities or descriptions:	
☒	☐	8. Validate data entered into HAI surveillance (e.g., through healthcare records review, parallel database comparison) to measure accuracy and reliability of HAI data collection	Dec. 2009 – Jan. 2010 (CLABSI) May 2010 - Sep. 2011 (CBGB) Aug. 2013-Jul. 2014 (CLABSI) Oct. 2014-Sep. 2015 (CDI)
☒	☐	i. Develop a validation plan	

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☒ ☒ ☒ ☒ ☒	☐ ☐ ☐ ☐ ☐	ii. Pilot test validation methods in a sample of healthcare facilities iii. Modify validation plan and methods in accordance with findings from pilot project iv. Implement validation plan and methods in all healthcare facilities participating in HAI surveillance v. Analyze and report validation findings vi. Use validation findings to provide operational guidance for healthcare facilities that targets any data shortcomings detected	
		Other activities or descriptions: External Validation of NHSN Data. Our goal is to ensure some level of external validation for all reportable HAIs at least once every 5 years. The level of validation depends on available resources; limited resources require a limited sampling frame, whereas validation specific funding allows for more robust validation and better quality assurance.	
☒	☐	9. Develop preparedness plans for improved response to HAI i. Define processes and tiered response criteria to handle increased reports of serious infection control breaches (e.g., syringe reuse), suspect cases/clusters, and outbreaks	DATE
		Other activities or descriptions:	

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☒	☐	10. Collaborate with professional licensing organizations to identify and investigate complaints related to provider infection control practice in non-hospital settings and set standards for continuing education and training	Jul., 2015
		Other activities or descriptions:	
		11. Adopt integration and interoperability standards for HAI information systems and data sources	

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☒ ☐	☐ ☐	i. Improve overall use of surveillance data to identify and prevent HAI outbreaks or transmission in HC settings (e.g., hepatitis B, hepatitis C, multi-drug resistant organisms (MDRO), and other reportable HAIs) across the spectrum of inpatient and outpatient healthcare settings ii. Promote definitional alignment and data element standardization needed to link HAI data across the nation.	Jan. 2011, ongoing
		Other activities or descriptions:	
☒	☐	12. Enhance electronic reporting and information technology for healthcare facilities to reduce reporting burden and increase timeliness, efficiency, comprehensiveness, and reliability of the data i. Report HAI data to the public	Apr. 2010, then ongoing 2016

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
		Other activities or descriptions: ii. See Section 1, Activity 5, part i.	
☒	☐	13. Make available risk-adjusted HAI data that enable state agencies to make comparisons between hospitals.	2010, ongoing
		Other activities or descriptions:	
☒	☐	14. Enhance surveillance and detection of HAIs in nonhospital settings	

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
		Other activities or descriptions: i. Evaluate adding measurements for long-term care facilities *ii.* ii. Evaluate adding measurements for ambulatory surgical centers and outpatient renal dialysis centers	2010-2011 2013

3. Prevention

State implementation of HHS Healthcare Infection Control Practices Advisory Committee (HICPAC) recommendations is a critical step toward the elimination of HAIs. CDC and HICPAC have developed evidence-based HAI prevention guidelines cited in the HHS Action Plan for implementation. These guidelines are translated into practice and implemented by multiple groups in hospital settings for the prevention of HAIs. CDC guidelines have also served as the basis for the Centers for Medicare and Medicaid Services (CMS) Surgical Care Improvement Project. These evidence-based recommendations have also been incorporated into Joint Commission standards for accreditation of U.S. hospitals and have been endorsed by the National Quality Forum. Please select areas for development or enhancement of state HAI prevention efforts.

Table 3: State planning for HAI prevention activities

Check Items Underway	**Check Items Planned**	**Items Planned for Implementation (or currently underway)**	**Target Dates for Implementation**
☒	☐	1. Implement HICPAC recommendations i. Develop strategies for implementation of HICPAC recommendations for at least 2 prevention targets specified by the state multidisciplinary group.	July 2010
		Other activities or descriptions:	

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☒	☐	2. Establish prevention working group under the state HAI advisory council to coordinate state HAI collaboratives i. Assemble expertise to consult, advise, and coach inpatient healthcare facilities involved in HAI prevention collaboratives	Feb. 2010, Ongoing
		Other activities or descriptions:	
☒ ☒	☐ ☐	3. Establish HAI collaboratives with at least 10 hospitals (this may require a multi-state or regional collaborative in low population density regions) i. Identify staff trained in project coordination, infection control, and collaborative coordination ii. Develop a communication strategy to facilitate peer-to-peer learning and sharing of best practices	Apr. 2010 Feb.-Apr. 201 , ongoing 2012-13 (antimicrobial stewardship) 2012-13 (Dialysis) 2013-14 (regional MDRO)

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☒	☐	iii. Establish and adhere to feedback from standardized outcome data to track progress	
		Other activities or descriptions:	
☐	☒	4. Develop state HAI prevention training competencies i. Consider establishing requirements for education and training of healthcare professionals in HAI prevention (e.g., certification requirements, public education campaigns, and targeted provider education) or work with healthcare partners to establish best practices for training and certification	2015-2016
		Other activities or descriptions: ii. See Section 2, Activity 6, part ii.	

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
		5. Implement strategies for compliance to promote adherence to HICPAC recommendations	
☒	☐	i. Consider developing statutory or regulatory standards for healthcare infection control and prevention or work with healthcare partners to establish best practices to ensure adherence	Jul., 2016
☒	☐	ii. Coordinate/liaise with regulation and oversight activities such as inpatient or outpatient facility licensing/accrediting bodies and professional licensing organizations to prevent HAIs	May, 2015, ongoing
☒	☐	iii. Improve regulatory oversight of hospitals, enhance surveyor training and tools, and add sources and uses of infection control data	Mar., 2016
☒	☐	iv. Consider expanding regulation and oversight activities to currently unregulated settings where healthcare is delivered and work with healthcare partners to establish best practices to ensure adherence	Mar., 2016
		Other activities or descriptions:	

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☐	☒	6. Enhance prevention infrastructure by increasing joint collaboratives with at least 20 hospitals (i.e. this may require a multi-state or regional collaborative in low population density regions)	
		Other activities or descriptions:	
☒	☐	7. Establish collaborative(s) to prevent HAIs in nonhospital settings (e.g., long term care, dialysis)	2012-13 (dialysis) 2013-2014 (MDRO regional collaborative including non-hospital partners)
		Other activities or descriptions:	

4. Evaluation and Communication

Program evaluation is an essential organizational practice in public health. Continuous evaluation and communication of findings integrates science as a basis for decision-making and action for the prevention of HAIs. Evaluation and communication allows for learning and ongoing improvement. Routine, practical evaluations can inform strategies for the prevention and control of HAIs. Please select areas for development or enhancement of state HAI prevention efforts.

Table 4: State HAI communication and evaluation planning

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☒	☐	1. Conduct needs assessment and/or evaluation of the state HAI program to learn how to increase impact i. Establish evaluation activity to measure progress toward targets and	Jun. 2010
☒	☐	ii. Establish systems for refining approaches based on data gathered	Aug. 2010
		Other activities or descriptions (not required):	

☒	☐	2. Develop and implement a communication plan about the state's HAI program and about progress to meet public and private stakeholders needs i. Disseminate state priorities for HAI prevention to healthcare organizations, professional provider organizations, governmental agencies, non-profit public health organizations, and the public	June 2010, then ongoing
		Other activities or descriptions:	
☒	☐	3. Provide consumers access to useful healthcare quality measures i. Disseminate HAI data to the public	Apr. 2010, then ongoing

		Other activities or descriptions:	
☒	☐	4. Guide patient safety initiatives i. Identify priorities and provide input to partners to help guide patient safety initiatives and research aimed at reducing HAIs	Aug. 2010
		Other activities or descriptions:	

Healthcare Infection Control and Response (Ebola-associated activities)

The techniques and practice on which infection control protocols are based form the backbone of infectious disease containment for pathogens that are otherwise amplified and accelerated in healthcare settings. Investments in a more robust infection control infrastructure will prevent many HAIs transmitted to, and among, patients and health care workers.

Table 5: Infection Control Assessment and Response

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☒	☐	1. Create an inventory of all healthcare settings in state. List must include at least one infection control point of contact at the facility	Dec., 2015
☒	☐	2. Identify current regulatory/licensing oversight authorities for each healthcare facility and explore ways to expand oversight	Oct., 2015, then ongoing
		Other activities or descriptions:	

☒ ☒ ☒	☐ ☐ ☐	3. Assess readiness of Ebola-designated facilities within the state i. Use CDC readiness assessment tool and determine gaps in infection control ii. Address gaps (mitigate gaps) iii. Conduct follow-up assessments	Oct. 30, 2015 Sept., 2015 2016, 2017
		Other activities or descriptions:	
☒ ☒	☐ ☐	4. Assess outbreak reporting and response in healthcare facilities i. Use standard assessment tool and determine gaps in outbreak reporting and response ii. Address gaps (mitigate gaps) iii. Track HAI outbreak response and outcome	Oct., 2015 – Mar., 2016

☒	☐		
		Other activities or descriptions:	

Table 6: Targeted Healthcare Infection Prevention Programs

Check Items Underway	Check Items Planned	Items Planned for Implementation (or currently underway)	Target Dates for Implementation
☒ ☒ ☐	☐ ☐ ☒	1. Expand infection control assessments i. Expand assessments to other additional facilities and other healthcare settings and determine gaps in infection control ii. Address gaps (mitigate gaps) iii. Conduct follow-up assessments	Sept., 2015 Sept., 2015, ongoing 2016-2017
		Other activities or descriptions:	

☒ ☐	☐ ☒	2. Increase infection control competency and practice in all healthcare settings through training i. Incorporate general infection control knowledge and practice assessments of competency into state licensing board requirements, credentialing, and continuing education requirements for clinical care providers (e.g., medical license, admitting privileges) and/or licensing/accreditation requirements for healthcare facilities. ii. Develop a sustainable training program based on CDC guidance and technical assistance to perform training, prioritizing on-site train-the-trainer programs in key domains of infection control, including the incorporation of hands on evaluations and competency assessments of best practices and a system to monitor ongoing compliance and competency.	Oct., 2015, then ongoing
		Other activities or descriptions:	
☒ ☒	☐ ☐	3. Enhance surveillance capacity to improve situational awareness, describe emerging threats, and target onsite assessments to implement prevention programs i. Build capacity to analyze data reported by facilities in a defined region to allow for a comprehensive assessment of potential healthcare-associated infection threats, and communicate results with healthcare facilities. ii. Work with CDC to guide analytic direction and identify facilities for prioritized assessments/response iii. Improve outbreak reporting capacity by developing an infrastructure that includes clear definitions of infectious threats of epidemiologic importance that are communicated to facilities	Oct., 2015, and then ongoing

☒ ☐	☐ ☒	iv. Implement a response plan to address potential emerging threats identified by using enhanced surveillance	
		Other activities or descriptions:	