

Improving Childhood Immunization Rates in Maine: Joining Forces for Success

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Context

Decreasing vaccine-preventable diseases through the cost-effective practice of childhood immunization has been named one of the decade's top ten greatest public health achievements.^I

Despite this, Maine has experienced an increase in vaccine hesitancy, refusals and delays. As a result, its immunization rates have stagnated, hovering between 62-74% for a standard series of immunizations over the past ten years.^{II}

While many groups have supported improving childhood immunization rates for years, actions were often diffuse and lacked resources. In 2010, MaineHealth leaders chose childhood immunizations as one of the system's top six health improvement priorities and substantial resources were allocated to accelerate improvement. Due to healthcare's heightened focus on accountable care, patient-centered medical homes and population health, the time was right to align forces on this issue statewide.

Aim

MaineHealth is leading unique strategic partnerships with public and private stakeholders to forge a coordinated, focused initiative with the ultimate goal of increasing the state's childhood immunization rate to the highest in New England by 2016.

Strategies for Change

Employing a multi-sector approach to improvement, MaineHealth and its partners created a strategic plan to achieve outcomes in clinical, community and policy arenas.

Clinical

- Increasing use of Maine's Immunization Information System (IIS - ImmPact2) on a per-patient basis
- Testing best practice workflow and clinical quality improvement strategies in ambulatory and hospital-based practices through Improving Health Outcomes (IHOC) for Children's First STEPS pediatric immunization collaborative
- Procured grant funding to create and test a web-based toolkit for point of care family education by nurses and medical assistants

Community

- Pilot testing family educational resources
- Obtained grant resources to develop an actionable strategic plan to provide immunizations in non-traditional settings
- Creating a comprehensive social marketing campaign promoting vaccination safety and necessity
- Developing a process to discuss vaccination information during the prenatal period

Policy

- As part of the Maine Immunization Coalition, achieved successful passage of Maine's Universal Childhood Immunization Law and trained over 225 practices in its implementation
- Formation of MaineHealth Childhood Immunizations Task Force to gain consensus on priority strategies and action plans
- Opposition of bills requiring the disclosure of vaccine ingredients to parents and the prohibition of mandatory vaccination

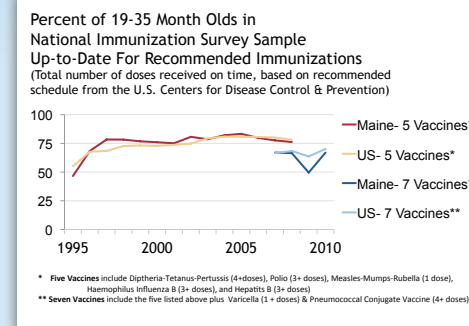
The Goal

Increase Maine's childhood immunization rate to the highest in New England by 2016

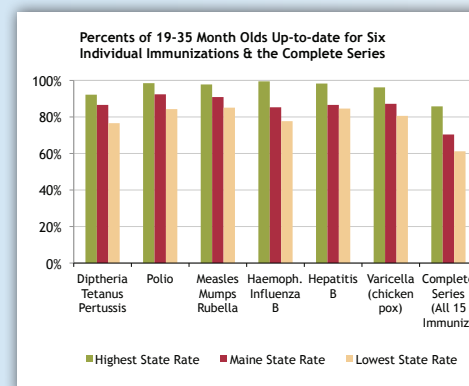
Lessons Learned

- 1. Accurate data collection and reporting is essential to measuring success.** Before beginning any improvement work, provider practices and others should be entering all data into the state IIS. Assisting them with historical data entry moves this process along more quickly and efficiently. Interfaces between electronic medical records and state IISs will help alleviate workflow issues related to double data entry.
- 2. Seek Grant Funding.** Grant funding is critical in developing and trialing innovative pilot programs. If implementation grants are not available, planning grants can be used to expand upon promising ideas.
- 3. Strike with information while the iron is hot.** Childhood immunizations are a popular discussion topic among parent groups, providers, clinicians and other community groups.
- 4. Pool resources and collaborate on quality improvement initiatives.** Collaborative partners get valuable information while ambulatory practices and hospital groups can focus on a specific project and communicating with one entity. For example, as a result of collaborating on IHOC's First STEPS collaborative, MaineHealth has begun to identify best practices and additional resources to achieve progress. Specifically, standardizing immunization schedules at practices, employing standing orders, and utilizing text messaging and traditional postcard reminder systems have been identified as promising strategies to increase rates of immunizations and well-child visits.

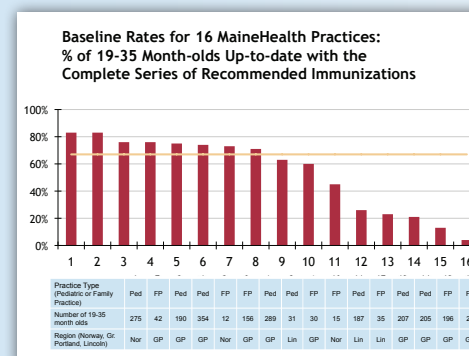
Graphs of Immunization Rates for the State of Maine and MaineHealth practices



In 2010, only 70% of Maine's 19-35 month olds were up-to-date on a series of six individual immunizations. A shortage of Haemophilus Influenza B vaccine contributed to Maine's low rate in 2009.



From 2004-2008, the state's up-to-date rates for the series only ranged from 73-76%. None of Maine's six individual immunizations in 2010 had up-to-date rates above 92%.



MaineHealth practices using the EPIC electronic medical record who had data for 10+ patients, 19-35 months old, in Maine's ImmPact2 registry, as of June 30, 2011. The state rate, represented by the yellow bar, is estimated from the 2010 National Immunization Survey. Data analysis showed that up-to-date rates varied widely across the practices reviewed and were not correlated with practice type, number of patients or geography.

I http://www.cdc.gov/media/releases/2011/p0519_publichealthachievements.html

II National Immunization Survey Data. Available at <http://www.cdc.gov/nis/>. Accessed 11/10/2011. Standard series of immunizations referenced is 4.3.1.3.3.1.4

III Partners include: Improving Health Outcomes for Children Project, Maine Immunization Coalition, Maine Primary Care Association, Maine Quality Counts, Maine CDC's Immunization Program, American Academy of Pediatrics, Maine Chapter, and others. For a complete list of partners, please contact Cassandra Cote Grantham.