



# MDPH Investigation of Type 1 Diabetes in Weston, Wellesley, and Newton, Massachusetts

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# Outline

- Recap of EPHT diabetes surveillance
- MDPH progress to date on investigation of type 1 diabetes in Weston, Wellesley, and Newton
- Next steps

## Environmental Public Health Tracking Diabetes Surveillance; K-8

- Nurses/administrative staff report diabetes diagnoses to MDPH/BEH
- Based on school health records
- 603 CMR 23.7 (4)(H)(1976) MA Student Health Regulations and 105 CMR 210.000 Administration of Prescription Medications in Schools
  - Address access to student health records by school health personnel and local and state health department personnel, without the consent of the eligible student or parent, when such access is required in the performance of official duties.
- Data collection began in 2007-2008 school year
- Currently collecting data for 2009-2010

## EPHT Diabetes Surveillance, cont.

- Includes approximately 2100 public and private schools
- Covers grades K through 8

# MDPH Progress on Next Steps Outlined in June 2009

Work with school nurses to coordinate mailing to all parents of children diagnosed with diabetes to complement information from Ann Marie Kreft

# MDPH Progress

- Letters to School Nurses
  - FERPA reminder
  - May 2009 – 1<sup>st</sup> mailing
    - Public Schools in 3 communities
      - Worked with nurse leaders
      - Nurses/school administrative personnel sent letters on MDPH's behalf to parents of children with type 1 diabetes
    - Private Schools
      - MDPH identified 27 schools in area
      - Contacted school nurses or appropriate administrators to ask their assistance in mailing
      - Sent mailing packets to all 27 schools

# MDPH Progress

- February/April 2010 – 2<sup>nd</sup> mailing
  - This was necessary due to lower than hoped for response in all 3 communities
  - Using EPHT surveillance data, identified schools where MDPH did not receive 100% participation
  - Worked with nurse leaders in public and private schools to send 2<sup>nd</sup> letter to families who had not responded

# Response to Date

## Newton

	Response	Expected
K-8	17	21
High School	8	11
Total	25	32

## Weston

	Response	Expected
K-8	6	7
High School	4	4
Total	10	11



# Response to Date (cont'd)

Wellesley



# MDPH Progress

- Letter to providers
  - Identified providers treating children/adolescents with type 1 diabetes in 3 community area
    - Allows for coverage of pre-schoolers
  - Prepared letters and provider survey
  - Encouraged providers to participate using an email appeal sent by Dr. Laffel prior to mailing
  - Mailed letters to nine providers early April 2010

# Providers contacted

- Joslin Diabetes Center
- Children's Hospital
- Massachusetts General Hospital
- Boston Medical Center
- BayState
- Tufts New England Medical Center
- UMass Memorial
- New England Diabetes & Endocrinology Center

# Provider survey form

Name of reporting party:

Best contact at your facility for follow-up:

Preferred contact method (email or phone):

DATE:

**Please provide a count of individuals with type 1 diabetes (ages 0 through 19) who you have treated in calendar year 2009 who reside in the three communities listed below (ICD-9 Codes-250.x1 and 250.x3). Please place in the age category as of 2009:**

Age Groups	0-4 Years		5-9 Years		10-14 Years		15-19 Years	
<b>Number of individuals</b>	M	F	M	F	M	F	M	F
Weston <sup>1</sup>	M	F	M	F	M	F	M	F
Wellesley	M	F	M	F	M	F	M	F
Newton <sup>2</sup>	M	F	M	F	M	F	M	F

# MDPH Progress on Next Steps Outlined in June 2009

Use data from the MA Department of Environmental Protection to identify 21 E sites that may contain petroleum distillates

# MDPH Progress

- DPH developed list of all 21E sites in Weston, Wellesley, and Newton
- Summer intern was able to geocode 98% of 21E sites in 3 communities
- Next step is to review DEP files to identify scope of release and type of contaminant involved

# MDPH Progress on Next Steps Outlined in June 2009

Evaluate data from Department of Agricultural Resources relative to pesticides applied to rights of way

# MDPH Progress

- MDPH GIS Center has prepared rights-of-way maps for Weston, Wellesley, and Newton
- MDPH has requested pesticide application data for these rights-of-way from the Department of Agricultural Resources



# MDPH Progress on Next Steps Outlined in June 2009

Continue meetings with Dr. Laffel from Joslin  
Diabetes Center and reaching out to Juvenile Diabetes  
Research Foundation

# MDPH Progress

- MDPH has had regular bi-monthly meetings with Dr. Laffel, Chief of the Pediatric, Adolescent and Young Adult Section at Joslin Diabetes Center

# MDPH Progress on Next Steps Outlined in June 2009

Establish communication plan to keep  
communities apprised of status of activities

# MDPH Progress

- DPH has developed a mailing list for communicating with residents and other interested individuals
- DPH issued status update in February 2010 with another one planned for June 2010

# Next Steps

- Complete school nurse outreach by June 30, 2010
- Complete provider outreach by September 30, 2010 or determine need for 2<sup>nd</sup> mailing

# Future Steps

- Data Analysis
  - Residential History
  - Family History of Diabetes
  - Comparison of prevalence estimates in the medical literature to prevalence estimates for Weston, Wellesley, and Newton