

OHIO DEPARTMENT OF HEALTH

# ANNUAL SUMMARY OF INFECTIOUS DISEASES OHIO 2009

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REPORTED INCIDENCE OF SELECTED  
NOTIFIABLE DISEASES



PREPARED AND DISTRIBUTED BY:

BUREAU OF INFECTIOUS DISEASES

DIVISION OF PREVENTION

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# INTRODUCTION

The *Annual Summary of Infectious Diseases, Ohio, 2009* provides an overview of the incidence of selected notifiable infectious diseases. The report includes tables of disease by year of onset, age group, sex, month of onset, county of residence, *Salmonella* serotypes and meningococcal disease serogroups. In addition, there are profiles of selected diseases, outbreaks and health events detected in EpiCenter that feature recent epidemiologic trends.

The sources of these data are individual case and laboratory reports submitted to the Ohio Department of Health (ODH) by infection preventionists, health care providers, laboratories and city, county and combined health districts throughout the state and entered into the Ohio Disease Reporting System (ODRS). Data reflect disease incidence for Ohio residents only, but include diseases (malaria, for example) acquired by Ohio residents while traveling out of state or overseas and diseases diagnosed in non-United States citizens while visiting Ohio.

This summary includes confirmed, probable and suspected cases. For all diseases, the case criteria used are those provided in:

- The ODH Infectious Disease Control Manual (IDCM) available online at <http://www.odh.ohio.gov/pdf/IDCM/sect3TOC.pdf> and
- The Centers for Disease Control and Prevention (CDC) Division of Integrated Surveillance Systems and Services' nationally notifiable infectious disease case definitions available online at <http://www.cdc.gov/ncphi/disss/nndss/phs/infdis2009.htm>.

HIV/AIDS, sexually transmitted diseases and tuberculosis surveillance data are not included in this report. Please refer to the ODH Web site for summary reports of these diseases as well as previous annual summaries at <http://www.odh.ohio.gov/healthStats/disease/id1.aspx>.

Thanks to all Ohio infection preventionists, health care providers, laboratories and local health departments for their hard work and dedication to reporting infectious diseases in the most accurate, complete and timely manner. These efforts are essential in protecting and improving the health of all Ohioans.

Questions or comments regarding this annual summary may be directed to the Bureau of Infectious Diseases at (614) 995-5599.

# OHIO NOTIFIABLE DISEASES

Ohio Administrative Code 3701-3, effective Jan. 1, 2009

The following infectious diseases were reportable to the Ohio Department of Health Jan. 1, 2009 through Dec. 31, 2009:

## CLASS A

Diseases of major public health concern because of the severity of disease or the potential for epidemic spread. Report by telephone immediately upon recognition that a case, a suspected case or a positive laboratory result exists.

- Anthrax
- Botulism, foodborne
- Cholera
- Diphtheria
- Influenza A, novel virus
- Measles
- Meningococcal disease
- Plague
- Rabies, human
- Rubella, not congenital
- Severe acute respiratory syndrome
- Smallpox
- Tularemia
- Viral hemorrhagic fever
- Yellow fever
- Any unexpected pattern of cases, suspected cases, deaths or increased incidence of any other disease of major public health concern because of the severity of disease or potential for epidemic spread, which may indicate a newly recognized infectious agent, outbreak, epidemic, related public health hazard or act of bioterrorism

## CLASS B(1)

Diseases of public health concern needing timely response because of the potential for epidemic spread. Report by the end of the next business day after the existence of a case, a suspected case or a positive laboratory result is known.

- Arboviral neuroinvasive and non-neuroinvasive disease:
  - Eastern equine encephalitis virus disease
  - LaCrosse virus disease
  - Powassan virus disease
  - St. Louis encephalitis virus disease
  - West Nile virus infection
  - Western equine encephalitis virus disease
  - Other arthropod-borne disease
- Chancroid
- Coccidioidomycosis
- Cyclosporiasis
- Dengue
- *Escherichia coli*, Shiga toxin-producing
- Granuloma inguinale
- *Haemophilus influenzae*, invasive disease
- Hantavirus
- Hemolytic uremic syndrome
- Hepatitis A
- Hepatitis B, perinatal
- Influenza-associated pediatric mortality
- Legionellosis
- Listeriosis
- Malaria
- Meningitis, aseptic
- Meningitis, other bacterial
- Mumps
- Pertussis
- Poliomyelitis
- Psittacosis
- Q fever
- Rubella, congenital
- Salmonellosis
- Shigellosis
- *Staphylococcus aureus*, vancomycin resistant or intermediate resistant
- Syphilis
- Tetanus
- Tuberculosis
- Typhoid fever

# OHIO NOTIFIABLE DISEASES

Ohio Administrative Code 3701-3, effective Jan. 1, 2009

## CLASS B(2)

Diseases of significant public health concern. Report by the end of the work week after the existence of a case, a suspected case or a positive laboratory result is known.

- |                               |  |  |
|-------------------------------|--|--|
| • Amebiasis                   | • Hepatitis B, non-perinatal                     | • Streptococcal disease, group A, invasive           |
| • Botulism, infant            | • Hepatitis C                                    | • Streptococcal disease, group B, in newborn         |
| • Botulism, wound             | • Hepatitis D                                    | • Streptococcal toxic shock syndrome                 |
| • Brucellosis                 | • Hepatitis E                                    | • <i>Streptococcus pneumoniae</i> , invasive disease |
| • Campylobacteriosis          | • Herpes, congenital                             | • Toxic shock syndrome                               |
| • Chlamydia infections        | • Influenza-associated hospitalization           | • Trichinosis  |
| • Creutzfeldt-Jakob disease   | • Leprosy  | • Typhus fever                                       |
| • Cryptosporidiosis           | • Leptospirosis                                  | • Varicella  |
| • Cytomegalovirus, congenital | • Lyme disease                                   | • Vibriosis  |
| • Ehrlichiosis/Anaplasmosis   | • Mycobacterial disease, other than tuberculosis | • Yersiniosis  |
| • Giardiasis                  | • Rocky Mountain spotted fever                   |  |
| • Gonococcal infections       |  |  |

## CLASS C

Report an outbreak, unusual incidence or epidemic (e.g., histoplasmosis, pediculosis, scabies or staphylococcal infections) by the end of the next business day.

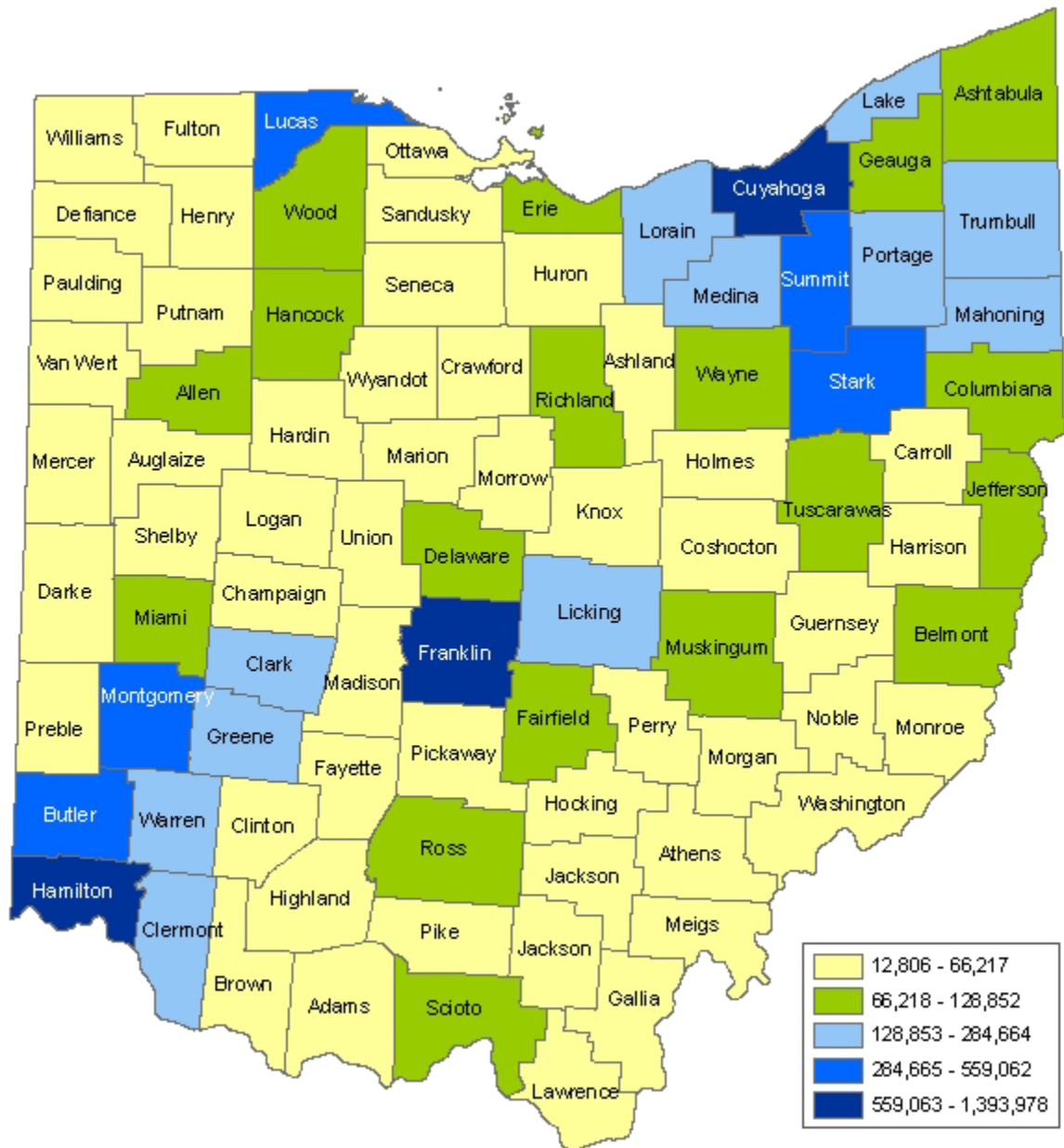
- |             |                         |              |
|-------------|-------------------------|--------------|
| • Community | • Healthcare-associated | • Waterborne |
| • Foodborne | • Institutional         | • Zoonotic   |

## AIDS AND HIV REPORTING

Cases of AIDS (acquired immune deficiency syndrome), AIDS-related conditions, HIV (human immunodeficiency virus) infection, perinatal exposure to HIV and CD4 T-lymphocyte counts less than 200 or 14 percent must be reported on forms and in a manner prescribed by the director.

For the current list of reportable diseases in Ohio, please see page 4 at <http://www.odh.ohio.gov/pdf/IDCM/intro1.pdf> or OAC 3701-3-02 and 3701-3-13.

# OHIO COUNTY POPULATION MAP



Source of population data: 2000 U.S. Census.

# TABLES OF SELECTED NOTIFIABLE DISEASES

## **BY YEAR OF ONSET TABLE**

*Pages 6-8*

This table displays case counts and rates for five years of data in addition to the median and mean counts and rates during 2005-2009. Medians and means were calculated only when five years of data were available. Population data come from the U.S. Census midpoint estimates for each year. Data are by year of onset with the exception of acute hepatitis B, chronic hepatitis B, perinatal hepatitis B, acute hepatitis C, past or present hepatitis C, outbreaks and varicella. Hepatitis B and C and outbreaks are shown by date of report for all years, while varicella is shown by date of report for 2005 only. Data in previous annual summaries 1992-2003 were by date of report.

## **BY AGE TABLE**

*Pages 9-12*

This table provides case counts and rates by age group (in years) for 2009. Age refers to the patient's age at the earliest known date associated with the case. Population data come from the 2000 U.S. Census. Outbreak data are not included in this table.

## **BY SEX TABLE**

*Pages 13-14*

This table contains case counts and rates by sex for 2009. Population data come from the 2000 U.S. Census. Outbreak data are not included in this table.

## **BY MONTH OF ONSET TABLE**

*Pages 15-18*

Case counts and percents by month of onset for 2009 are presented in this table. Month refers to the month of symptom onset except for hepatitis B and C conditions and all outbreaks, which are by month of report, and for influenza-associated pediatric mortality, which is by month of death. Population data are not available by month, so rates were not calculated.

## **BY COUNTY OF RESIDENCE TABLE**

*Pages 19-44*

This table displays case counts and rates by county for 2009. County refers to the patient's county of residence. If the county of residence is unknown, then the county in which the physician, hospital or local health department is located is used. Population data come from the 2000 U.S. Census.

## **SALMONELLA SEROTYPES TABLE**

*Pages 45-48*

*Salmonella* case counts by serotype during 2005-2009 are contained in this table. Serotypes, untyped serogroups and untyped/ungrouped isolates are provided. The bacteriology laboratory at ODH performs serotyping of *Salmonella* isolates.

## **MENINGOCOCCAL SEROGROUPS TABLE**

*Page 49*

This table shows meningococcal disease case counts by serogroup during 2005-2009. The bacteriology laboratory at ODH performs serogrouping of *Neisseria meningitidis* isolates.



# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY YEAR OF ONSET, OHIO, 2005-2009

GENERAL INFECTIOUS DISEASES	2005		2006		2007		2008		2009		MEDIAN		MEAN	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	17	0.1	14	0.1	33	0.3	34	0.3	22	0.2	22	0.2	24	0.2
Botulism	0	0.0	2	0.0	4	0.0	4	0.0	6	0.1	4	0.0	3	0.0
Foodborne	0	0.0	0	0.0	3	0.0	3	0.0	1	0.0	1	0.0	1	0.0
Infant*	0	*	2	*	1	*	1	*	5	*	1	*	2	*
Campylobacteriosis	1,174	10.2	1,129	9.8	1,083	9.4	1,215	10.6	1,262	10.9	1,174	10.2	1,173	10.2
Cholera	0	0.0	0	0.0	1	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Coccidioidomycosis*	–	–	8	0.1	11	0.1	14	0.1	18	0.2	–	–	–	–
Creutzfeldt-Jakob Disease (CJD)	10	0.1	15	0.1	10	0.1	5	0.0	12	0.1	10	0.1	10	0.1
Cryptosporidiosis	782	6.8	366	3.2	611	5.3	704	6.1	386	3.3	611	5.3	570	4.9
Cyclosporiasis	1	0.0	0	0.0	0	0.0	1	0.0	0	0.0	0	0.0	0	0.0
Cytomegalovirus (CMV), Congenital*	18	*	13	*	16	*	15	*	19	*	16	*	16	*
Encephalitis	26	0.2	40	0.3	29	0.3	15	0.1	–	–	–	–	–	–
Post Other Infection*	9	0.1	10	0.1	5	0.0	3	0.0	–	–	–	–	–	–
Primary Viral	17	0.1	30	0.3	24	0.2	12	0.1	–	–	–	–	–	–
<i>Escherichia coli</i> , Shiga Toxin-Producing	169	1.5	211	1.8	138	1.2	209	1.8	128	1.1	169	1.5	171	1.5
O157:H7	150	1.3	160	1.4	80	0.7	161	1.4	87	0.8	150	1.3	128	1.1
Not O157:H7	13	0.1	20	0.2	19	0.2	20	0.2	26	0.2	20	0.2	20	0.2
Unknown Serotype	6	0.1	31	0.3	39	0.3	28	0.2	15	0.1	28	0.2	24	0.2
Giardiasis	820	7.2	806	7.0	833	7.3	891	7.8	816	7.1	820	7.2	833	7.3
<i>Haemophilus influenzae</i> , Invasive Disease	107	0.9	93	0.8	114	1.0	128	1.1	98	0.8	107	0.9	108	0.9
Hemolytic Uremic Syndrome (HUS)	8	0.1	16	0.1	12	0.1	8	0.1	14	0.1	12	0.1	12	0.1
Herpes, Congenital*	6	*	*	*	*	*	*	*	*	*	*	*	*	*
Kawasaki Disease	55	0.5	35	0.3	38	0.3	27	0.2	–	–	–	–	–	–
Legionellosis	206	1.8	237	2.1	231	2.0	248	2.2	274	2.4	237	2.1	239	2.1
Leprosy (Hansen's Disease)	0	0.0	0	0.0	1	0.0	2	0.0	2	0.0	1	0.0	1	0.0
Listeriosis	36	0.3	43	0.4	33	0.3	29	0.3	29	0.3	33	0.3	34	0.3
Meningitis, Aseptic	1,469	12.8	905	7.9	816	7.1	770	6.7	828	7.2	828	7.2	958	8.3
Meningitis, Other Bacterial*	45	0.4	68	0.6	49	0.4	59	0.5	68	0.6	59	0.5	58	0.5
Meningococcal Disease	45	0.4	50	0.4	32	0.3	42	0.4	42	0.4	42	0.4	42	0.4
Rheumatic Fever	1	0.0	0	0.0	4	0.0	2	0.0	–	–	–	–	–	–
Salmonellosis	1,343	11.7	1,299	11.3	1,323	11.5	1,378	12.0	1,377	11.9	1,343	11.7	1,344	11.7
Shigellosis	140	1.2	200	1.7	1,277	11.1	1,954	17.0	1,050	9.1	1,050	9.1	924	8.0
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0.0	3	0.0	2	0.0	4	0.0	3	0.0	3	0.0	2	0.0
Streptococcal Disease, Group A, Invasive	199	1.7	245	2.1	226	2.0	265	2.3	208	1.8	226	2.0	229	2.0
Streptococcal Disease, Group B, in Newborn*	61	*	63	*	49	*	51	*	63	*	61	*	57	*
Streptococcal Toxic Shock Syndrome (STSS)	17	0.1	18	0.2	12	0.1	12	0.1	11	0.1	12	0.1	14	0.1
<i>Streptococcus pneumoniae</i> , Invasive Disease	1,221	10.7	1,306	11.4	1,155	10.1	1,240	10.8	1,358	11.8	1,240	10.8	1,256	10.9
Ages < 5 Years*	134	*	144	*	117	*	123	*	139	*	134	*	131	*
Drug Resistant, Ages 5+ Years*	351	*	396	*	302	*	338	*	343	*	343	*	346	*
Drug Susceptible, Ages 5+ Years*	736	*	766	*	736	*	779	*	876	*	766	*	779	*
Toxic Shock Syndrome (TSS)	4	0.0	7	0.1	2	0.0	4	0.0	2	0.0	4	0.0	4	0.0
Typhoid Fever	2	0.0	11	0.1	11	0.1	10	0.1	11	0.1	11	0.1	9	0.1
Vibriosis	6	0.1	5	0.0	6	0.1	9	0.1	6	0.1	6	0.1	6	0.1
<i>Vibrio parahaemolyticus</i> Infection	2	0.0	2	0.0	3	0.0	4	0.0	0	0.0	2	0.0	2	0.0
<i>Vibrio vulnificus</i> Infection	0	0.0	1	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Other (Not Cholera)	4	0.0	2	0.0	3	0.0	5	0.0	6	0.1	4	0.0	4	0.0
Yersiniosis	45	0.4	41	0.4	52	0.5	48	0.4	44	0.4	45	0.4	46	0.4
<b>SUB-TOTAL</b>	<b>8,033</b>	<b>70.1</b>	<b>7,249</b>	<b>63.2</b>	<b>8,214</b>	<b>71.6</b>	<b>9,397</b>	<b>81.8</b>	<b>8,157</b>	<b>70.7</b>	<b>8,157</b>	<b>70.7</b>	<b>8,210</b>	<b>71.5</b>

N = number of cases reported.

Rates use U.S. Census midpoint estimates and are per 100,000 population.

n/a = not applicable.

(–) indicates a condition not reportable at that time.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY YEAR OF ONSET, OHIO, 2005-2009

HEPATITIS	2005		2006		2007		2008		2009		MEDIAN		MEAN	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Hepatitis A	51	0.4	49	0.4	69	0.6	54	0.5	34	0.3	51	0.4	51	0.5
Hepatitis B*	995	8.7	512	4.5	2,551	22.2	1,681	14.6	1,794	15.5	1,681	14.6	1,507	13.1
Acute*	136	1.2	126	1.1	124	1.1	131	1.1	213	1.8	131	1.1	146	1.3
Chronic*	858	7.5	386	3.4	2,427	21.2	1,549	13.5	1,581	13.7	1,549	13.5	1,360	11.8
Perinatal Infection*	1	*	0	*	0	*	1	*	0	0.0	0	*	0	*
Hepatitis C*	8,592	74.9	8,080	70.4	11,338	98.9	9,112	79.3	10,615	92.0	9,112	79.3	9,547	83.1
Acute*	9	0.1	7	0.1	19	0.2	41	0.4	64	0.6	19	0.2	28	0.2
Past or Present*	8,583	74.9	8,073	70.3	11,319	98.7	9,071	79.0	10,551	91.4	9,071	79.0	9,519	82.9
Hepatitis E	4	0.0	1	0.0	3	0.0	2	0.0	0	0.0	2	0.0	2	0.0
<b>SUB-TOTAL</b>	<b>9,642</b>	<b>84.1</b>	<b>8,642</b>	<b>75.3</b>	<b>13,961</b>	<b>121.8</b>	<b>10,849</b>	<b>94.5</b>	<b>12,443</b>	<b>107.8</b>	<b>10,849</b>	<b>94.5</b>	<b>11,107</b>	<b>96.7</b>

OUTBREAKS*		2005		2006		2007		2008		2009		MEDIAN		MEAN	
		N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Community*		-	-	-	-	-	-	-	-	26	n/a	-	n/a	-	n/a
Conjunctivitis*		1	n/a	0	n/a	2	n/a	1	n/a	-	-	-	n/a	-	n/a
Foodborne*		79	n/a	115	n/a	87	n/a	92	n/a	56	n/a	87	n/a	86	n/a
Healthcare-Associated*		-	-	-	-	-	-	-	-	55	n/a	-	n/a	-	n/a
Institutional*		-	-	-	-	-	-	-	-	64	n/a	-	n/a	-	n/a
Nosocomial*		0	n/a	4	n/a	8	n/a	12	n/a	-	-	-	n/a	-	n/a
Pediculosis*		0	n/a	0	n/a	1	n/a	4	n/a	-	-	-	n/a	-	n/a
Scabies*		7	n/a	8	n/a	18	n/a	14	n/a	-	-	-	n/a	-	n/a
Staphylococcal Skin Infections*		10	n/a	18	n/a	39	n/a	21	n/a	-	-	-	n/a	-	n/a
Unspecified*		4	n/a	9	n/a	28	n/a	69	n/a	-	-	-	n/a	-	n/a
Unusual Incidence of Non-Class A, Class B or Class C Disease*		30	n/a	70	n/a	117	n/a	73	n/a	-	-	-	n/a	-	n/a
Waterborne*		5	n/a	5	n/a	9	n/a	4	n/a	2	n/a	5	n/a	5	n/a
Zoonotic*		-	-	-	-	-	-	-	-	9	n/a	-	n/a	-	n/a
<b>SUB-TOTAL</b>		<b>136</b>	<b>n/a</b>	<b>229</b>	<b>n/a</b>	<b>309</b>	<b>n/a</b>	<b>290</b>	<b>n/a</b>	<b>212</b>	<b>n/a</b>	<b>229</b>	<b>n/a</b>	<b>235</b>	<b>n/a</b>

VACCINE-PREVENTABLE		2005		2006		2007		2008		2009		MEDIAN		MEAN	
		N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Influenza-Associated Hospitalization*		-	-	-	-	-	-	-	-	3,818	33.1	-	-	-	-
Influenza-Associated Pediatric Mortality*		2	*	1	*	2	*	1	*	15	*	2	*	4	*
Influenza A Virus, Novel Human Infection*		-	-	-	-	-	-	-	-	240	2.1	-	-	-	-
Measles		3	0.0	0	0.0	0	0.0	0	0.0	1	0.0	0	0.0	1	0.0
Imported		1	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Indigenous		2	0.0	0	0.0	0	0.0	0	0.0	1	0.0	0	0.0	1	0.0
Mumps		8	0.1	45	0.4	26	0.2	17	0.1	6	0.1	17	0.1	20	0.2
Pertussis		1,094	9.5	594	5.2	837	7.3	628	5.5	1,100	9.5	837	7.3	851	7.4
Tetanus		1	0.0	3	0.0	0	0.0	0	0.0	2	0.0	1	0.0	1	0.0
Varicella*		2,021	17.6	8,859	77.2	4,364	38.1	2,392	20.8	1,829	15.8	2,392	20.8	3,893	33.9
<b>SUB-TOTAL</b>		<b>3,129</b>	<b>27.3</b>	<b>9,502</b>	<b>82.8</b>	<b>5,229</b>	<b>45.6</b>	<b>3,038</b>	<b>26.4</b>	<b>7,011</b>	<b>60.7</b>	<b>5,229</b>	<b>45.6</b>	<b>5,582</b>	<b>48.6</b>

N = number of cases reported.

Rates use U.S. Census midpoint estimates and are per 100,000 population.

n/a = not applicable.

(-) indicates a condition not reportable at that time.

\* Please see Technical Notes (pp. 72-76).

# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY YEAR OF ONSET, OHIO, 2005-2009

ZOO NOSES	2005		2006		2007		2008		2009		MEDIAN		MEAN	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Brucellosis	2	0.0	0	0.0	0	0.0	0	0.0	4	0.0	0	0.0	1	0.0
Dengue	11	0.1	9	0.1	11	0.1	7	0.1	3	0.0	9	0.1	8	0.1
Ehrlichiosis/Anaplasmosis	3	0.0	6	0.1	3	0.0	12	0.1	13	0.1	6	0.1	7	0.1
<i>Anaplasma phagocytophilum</i> *	2	0.0	1	0.0	2	0.0	1	0.0	1	0.0	1	0.0	1	0.0
<i>Ehrlichia chaffeensis</i> *	1	0.0	5	0.0	1	0.0	11	0.1	11	0.1	5	0.0	6	0.0
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	1	0.0	0	0.0	0	0.0
LaCrosse Virus Disease*	15	0.1	11	0.1	9	0.1	6	0.1	5	0.0	9	0.1	9	0.1
Leptospirosis	0	0.0	0	0.0	0	0.0	1	0.0	1	0.0	0	0.0	0	0.0
Lyme Disease	42	0.4	36	0.3	34	0.3	45	0.4	56	0.5	42	0.4	43	0.4
Malaria	29	0.3	28	0.2	28	0.2	31	0.3	36	0.3	29	0.3	30	0.3
Q Fever	2	0.0	3	0.0	2	0.0	1	0.0	0	0.0	2	0.0	2	0.0
Rabies, Animal*	70	n/a	59	n/a	86	n/a	64	n/a	47	n/a	64	n/a	65	n/a
Rocky Mountain Spotted Fever (RMSF)	20	0.2	26	0.2	9	0.1	31	0.3	17	0.1	20	0.2	21	0.2
St. Louis Virus Disease*	0	0.0	1	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Toxoplasmosis, Congenital*	0	*	1	*	1	*	0	*	-	-	-	-	-	-
Trichinosis	1	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Tularemia	1	0.0	0	0.0	0	0.0	0	0.0	1	0.0	0	0.0	0	0.0
Typhus Fever, Murine	0	0.0	1	0.0	0	0.0	0	0.0	1	0.0	0	0.0	0	0.0
West Nile Virus Infection*	61	0.5	48	0.4	23	0.2	15	0.1	2	0.0	23	0.2	30	0.3
<b>SUB-TOTAL</b>	<b>257</b>	<b>1.6</b>	<b>229</b>	<b>1.5</b>	<b>206</b>	<b>1.0</b>	<b>213</b>	<b>1.3</b>	<b>186</b>	<b>1.2</b>	<b>213</b>	<b>1.3</b>	<b>218</b>	<b>1.3</b>
<b>GRAND TOTAL</b>	<b>21,197</b>	<b>183.1</b>	<b>25,851</b>	<b>222.7</b>	<b>27,919</b>	<b>240.0</b>	<b>23,787</b>	<b>204.0</b>	<b>28,009</b>	<b>240.4</b>	<b>25,851</b>	<b>222.7</b>	<b>25,353</b>	<b>218.1</b>
<b>POPULATION</b>	<b>11,464,042</b>		<b>11,478,006</b>		<b>11,466,917</b>		<b>11,485,910</b>		<b>11,542,645</b>		<b>11,478,006</b>		<b>11,487,504</b>	

N = number of cases reported.

Rates use U.S. Census midpoint estimates and are per 100,000 population.

n/a = not applicable.

(-) indicates a condition not reportable at that time.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY AGE IN YEARS, OHIO, 2009

GENERAL INFECTIOUS DISEASES	0-4		5-9		10-14		15-19		20-29		30-39	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	1	0.1	0	0.0	0	0.0	0	0.0	7	0.5	2	0.1
Botulism	5	0.7	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Foodborne	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Infant*	5	0.7	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Campylobacteriosis	159	21.1	62	7.6	56	6.8	66	8.1	132	9.0	142	8.5
Coccidioidomycosis*	0	0.0	0	0.0	0	0.0	1	0.1	1	0.1	3	0.2
Creutzfeldt-Jakob Disease (CJD)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Cryptosporidiosis	54	7.2	31	3.8	29	3.5	32	3.9	36	2.5	35	2.1
Cytomegalovirus (CMV), Congenital*	19	2.5	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Escherichia coli</i> , Shiga Toxin-Producing	28	3.7	14	1.7	13	1.6	18	2.2	17	1.2	6	0.4
O157:H7	21	2.8	13	1.6	10	1.2	10	1.2	9	0.6	3	0.2
Not O157:H7	5	0.7	1	0.1	3	0.4	5	0.6	5	0.3	2	0.1
Unknown Serotype	2	0.3	0	0.0	0	0.0	3	0.4	3	0.2	1	0.1
Giardiasis	186	24.6	81	9.9	54	6.5	46	5.6	87	5.9	90	5.4
<i>Haemophilus influenzae</i> , Invasive Disease	18	2.4	3	0.4	0	0.0	2	0.2	2	0.1	2	0.1
Hemolytic Uremic Syndrome (HUS)	5	0.7	4	0.5	2	0.2	3	0.4	0	0.0	0	0.0
Legionellosis	0	0.0	0	0.0	0	0.0	1	0.1	6	0.4	13	0.8
Leprosy (Hansen's Disease)	0	0.0	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0
Listeriosis	6	0.8	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Meningitis, Aseptic	260	34.4	27	3.3	35	4.2	38	4.7	129	8.8	110	6.6
Meningitis, Other Bacterial*	4	0.5	1	0.1	2	0.2	1	0.1	6	0.4	8	0.5
Meningococcal Disease	8	1.1	1	0.1	1	0.1	10	1.2	6	0.4	1	0.1
Salmonellosis	246	32.6	97	11.9	67	8.1	75	9.2	184	12.6	129	7.7
Shigellosis	394	52.2	257	31.5	60	7.2	41	5.0	105	7.2	75	4.5
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	1	0.1	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcal Disease, Group A, Invasive	13	1.7	7	0.9	2	0.2	1	0.1	12	0.8	23	1.4
Streptococcal Disease, Group B, in Newborn*	63	8.3	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcal Toxic Shock Syndrome (STSS)	0	0.0	0	0.0	0	0.0	1	0.1	1	0.1	2	0.1
<i>Streptococcus pneumoniae</i> , Invasive Disease	139	18.4	22	2.7	12	1.4	14	1.7	44	3.0	82	4.9
Ages < 5 Years*	139	18.4	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Drug Resistant, Ages 5+ Years*	0	0.0	2	0.2	2	0.2	4	0.5	9	0.6	20	1.2
Drug Susceptible, Ages 5+ Years*	0	0.0	20	2.4	10	1.2	10	1.2	35	2.4	62	3.7
Toxic Shock Syndrome (TSS)	1	0.1	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0
Typhoid Fever	2	0.3	0	0.0	1	0.1	0	0.0	3	0.2	0	0.0
Vibriosis	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0	0	0.0
Other (Not Cholera)	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0	0	0.0
Yersiniosis	15	2.0	3	0.4	1	0.1	3	0.4	3	0.2	2	0.1
<b>SUB-TOTAL</b>	<b>1,627</b>	<b>215.5</b>	<b>611</b>	<b>74.8</b>	<b>335</b>	<b>40.5</b>	<b>353</b>	<b>43.2</b>	<b>783</b>	<b>53.5</b>	<b>725</b>	<b>43.5</b>

### HEPATITIS

Hepatitis A	1	0.1	0	0.0	1	0.1	2	0.2	2	0.1	5	0.3
Hepatitis B*	12	1.6	10	1.2	14	1.7	48	5.9	386	26.4	426	25.5
Acute*	0	0.0	0	0.0	0	0.0	2	0.2	45	3.1	67	4.0
Chronic*	12	1.6	10	1.2	14	1.7	46	5.6	341	23.3	359	21.5
Hepatitis C*	34	4.5	4	0.5	3	0.4	170	20.8	2,115	144.4	1,737	104.1
Acute*	0	0.0	0	0.0	0	0.0	1	0.1	27	1.8	6	0.4
Past or Present*	34	4.5	4	0.5	3	0.4	169	20.7	2,088	142.6	1,731	103.8
<b>SUB-TOTAL</b>	<b>47</b>	<b>6.2</b>	<b>14</b>	<b>1.7</b>	<b>18</b>	<b>2.2</b>	<b>220</b>	<b>26.9</b>	<b>2,503</b>	<b>170.9</b>	<b>2,168</b>	<b>130.0</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY AGE IN YEARS, OHIO, 2009

VACCINE-PREVENTABLE	0-4		5-9		10-14		15-19		20-29		30-39	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Influenza-Associated Hospitalization*	729	96.6	413	50.6	282	34.1	209	25.6	424	29.0	317	19.0
Influenza-Associated Pediatric Mortality*	3	0.4	4	0.5	5	0.6	3	0.4	0	0.0	0	0.0
Influenza A Virus, Novel Human Infection*	26	3.4	26	3.2	56	6.8	35	4.3	35	2.4	18	1.1
Measles	1	0.1	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Indigenous	1	0.1	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Mumps	1	0.1	0	0.0	1	0.1	1	0.1	0	0.0	0	0.0
Pertussis	351	46.5	261	32.0	281	33.9	63	7.7	32	2.2	40	2.4
Tetanus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.1
Varicella*	200	26.5	773	94.7	656	79.2	104	12.7	68	4.6	20	1.2
<b>SUB-TOTAL</b>	<b>1,311</b>	<b>173.7</b>	<b>1,477</b>	<b>180.9</b>	<b>1,281</b>	<b>154.7</b>	<b>415</b>	<b>50.8</b>	<b>559</b>	<b>38.2</b>	<b>396</b>	<b>23.7</b>

ZOO NOSES												
Brucellosis	0	0.0	0	0.0	0	0.0	0	0.0	1	0.1	1	0.1
Dengue	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.1
Ehrlichiosis/Anaplasmosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	2	0.1
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia chaffeensis</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	2	0.1
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
LaCrosse Virus Disease*	1	0.1	2	0.2	1	0.1	0	0.0	0	0.0	0	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.1
Lyme Disease	3	0.4	4	0.5	8	1.0	4	0.5	6	0.4	9	0.5
Malaria	1	0.1	2	0.2	4	0.5	0	0.0	6	0.4	7	0.4
Rabies, Animal*	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Rocky Mountain Spotted Fever (RMSF)	1	0.1	0	0.0	1	0.1	1	0.1	2	0.1	2	0.1
Tularemia	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0	0	0.0
Typhus Fever, Murine	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
West Nile Virus Infection*	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>6</b>	<b>0.8</b>	<b>9</b>	<b>1.1</b>	<b>15</b>	<b>1.8</b>	<b>5</b>	<b>0.6</b>	<b>15</b>	<b>1.0</b>	<b>23</b>	<b>1.4</b>

<b>GRAND TOTAL</b>	<b>2,991</b>	<b>396.2</b>	<b>2,111</b>	<b>258.6</b>	<b>1,649</b>	<b>199.2</b>	<b>993</b>	<b>121.6</b>	<b>3,860</b>	<b>263.6</b>	<b>3,312</b>	<b>198.6</b>
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<b>POPULATION</b>	<b>754,930</b>	<b>816,346</b>	<b>827,811</b>	<b>816,868</b>	<b>1,464,510</b>	<b>1,668,083</b>
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY AGE IN YEARS, OHIO, 2009

GENERAL INFECTIOUS DISEASES	40-49		50-59		60 +		Unknown		TOTAL	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	2	0.1	2	0.2	8	0.4	0	n/a	22	0.2
Botulism	0	0.0	0	0.0	1	0.1	0	n/a	6	0.1
Foodborne	0	0.0	0	0.0	1	0.1	0	n/a	1	0.0
Infant*	0	0.0	0	0.0	0	0.0	0	n/a	5	0.7
Campylobacteriosis	202	11.5	194	15.1	247	12.6	2	n/a	1,262	11.1
Coccidioidomycosis*	2	0.1	6	0.5	5	0.3	0	n/a	18	0.2
Creutzfeldt-Jakob Disease (CJD)	1	0.1	0	0.0	11	0.6	0	n/a	12	0.1
Cryptosporidiosis	35	2.0	48	3.7	85	4.3	1	n/a	386	3.4
Cytomegalovirus (CMV), Congenital*	0	0.0	0	0.0	0	0.0	0	n/a	19	2.5
<i>Escherichia coli</i> , Shiga Toxin-Producing	5	0.3	10	0.8	16	0.8	1	n/a	128	1.1
O157:H7	3	0.2	6	0.5	11	0.6	1	n/a	87	0.8
Not O157:H7	1	0.1	2	0.2	2	0.1	0	n/a	26	0.2
Unknown Serotype	1	0.1	2	0.2	3	0.2	0	n/a	15	0.1
Giardiasis	99	5.6	63	4.9	110	5.6	0	n/a	816	7.2
<i>Haemophilus influenzae</i> , Invasive Disease	7	0.4	11	0.9	53	2.7	0	n/a	98	0.9
Hemolytic Uremic Syndrome (HUS)	0	0.0	0	0.0	0	0.0	0	n/a	14	0.1
Legionellosis	45	2.6	74	5.8	135	6.9	0	n/a	274	2.4
Leprosy (Hansen's Disease)	0	0.0	1	0.1	0	0.0	0	n/a	2	0.0
Listeriosis	1	0.1	0	0.0	22	1.1	0	n/a	29	0.3
Meningitis, Aseptic	93	5.3	66	5.1	67	3.4	3	n/a	828	7.3
Meningitis, Other Bacterial*	16	0.9	10	0.8	20	1.0	0	n/a	68	0.6
Meningococcal Disease	3	0.2	2	0.2	10	0.5	0	n/a	42	0.4
Salmonellosis	152	8.7	156	12.1	268	13.6	3	n/a	1,377	12.1
Shigellosis	36	2.0	48	3.7	30	1.5	4	n/a	1,050	9.2
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0.0	0	0.0	2	0.1	0	n/a	3	0.0
Streptococcal Disease, Group A, Invasive	27	1.5	20	1.6	103	5.2	0	n/a	208	1.8
Streptococcal Disease, Group B, in Newborn*	0	0.0	0	0.0	0	0.0	0	n/a	63	8.3
Streptococcal Toxic Shock Syndrome (STSS)	3	0.2	0	0.0	3	0.2	1	n/a	11	0.1
<i>Streptococcus pneumoniae</i> , Invasive Disease	147	8.4	294	22.9	602	30.7	2	n/a	1,358	12.0
Ages < 5 Years*	0	0.0	0	0.0	0	0.0	0	n/a	139	18.4
Drug Resistant, Ages 5+ Years*	38	2.2	79	6.1	188	9.6	1	n/a	343	3.2
Drug Susceptible, Ages 5+ Years*	109	6.2	215	16.7	414	21.1	1	n/a	876	8.3
Toxic Shock Syndrome (TSS)	0	0.0	0	0.0	0	0.0	0	n/a	2	0.0
Typhoid Fever	3	0.2	1	0.1	1	0.1	0	n/a	11	0.1
Vibriosis	1	0.1	3	0.2	1	0.1	0	n/a	6	0.1
Other (Not Cholera)	1	0.1	3	0.2	1	0.1	0	n/a	6	0.1
Yersiniosis	3	0.2	4	0.3	10	0.5	0	n/a	44	0.4
<b>SUB-TOTAL</b>	<b>883</b>	<b>50.3</b>	<b>1,013</b>	<b>78.8</b>	<b>1,810</b>	<b>92.2</b>	<b>17</b>	<b>n/a</b>	<b>8,157</b>	<b>71.8</b>

HEPATITIS										
Hepatitis A	10	0.6	4	0.3	9	0.5	0	n/a	34	0.3
Hepatitis B*	397	22.6	282	22.0	214	10.9	5	n/a	1,794	15.8
Acute*	50	2.8	30	2.3	19	1.0	0	n/a	213	1.9
Chronic*	347	19.8	252	19.6	195	9.9	5	n/a	1,581	13.9
Hepatitis C*	2,843	161.9	2,870	223.4	774	39.4	65	n/a	10,615	93.5
Acute*	20	1.1	8	0.6	2	0.1	0	n/a	64	0.6
Past or Present*	2,823	160.7	2,862	222.8	772	39.3	65	n/a	10,551	92.9
<b>SUB-TOTAL</b>	<b>3,250</b>	<b>185.0</b>	<b>3,156</b>	<b>245.7</b>	<b>997</b>	<b>50.8</b>	<b>70</b>	<b>n/a</b>	<b>12,443</b>	<b>109.6</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY AGE IN YEARS, OHIO, 2009

VACCINE-PREVENTABLE	40-49		50-59		60 +		Unknown		TOTAL	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Influenza-Associated Hospitalization*	435	24.8	529	41.2	478	24.3	2	n/a	3,818	33.6
Influenza-Associated Pediatric Mortality*	0	0.0	0	0.0	0	0.0	0	n/a	15	0.1
Influenza A Virus, Novel Human Infection*	23	1.3	15	1.2	6	0.3	0	n/a	240	2.1
Measles	0	0.0	0	0.0	0	0.0	0	n/a	1	0.0
Indigenous	0	0.0	0	0.0	0	0.0	0	n/a	1	0.0
Mumps	1	0.1	1	0.1	1	0.1	0	n/a	6	0.1
Pertussis	28	1.6	17	1.3	27	1.4	0	n/a	1,100	9.7
Tetanus	0	0.0	0	0.0	1	0.1	0	n/a	2	0.0
Varicella*	4	0.2	3	0.2	1	0.1	0	n/a	1,829	16.1
<b>SUB-TOTAL</b>	<b>491</b>	<b>28.0</b>	<b>565</b>	<b>44.0</b>	<b>514</b>	<b>26.2</b>	<b>2</b>	<b>n/a</b>	<b>7,011</b>	<b>61.8</b>

ZOO NOSES										
Brucellosis	0	0.0	0	0.0	2	0.1	0	n/a	4	0.0
Dengue	0	0.0	2	0.2	0	0.0	0	n/a	3	0.0
Ehrlichiosis/Anaplasmosis	2	0.1	4	0.3	5	0.3	0	n/a	13	0.1
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	1	0.1	0	n/a	1	0.0
<i>Ehrlichia chaffeensis</i> *	2	0.1	3	0.2	4	0.2	0	n/a	11	0.1
<i>Ehrlichia ewingii</i> *	0	0.0	1	0.1	0	0.0	0	n/a	1	0.0
LaCrosse Virus Disease*	0	0.0	0	0.0	1	0.1	0	n/a	5	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	0	n/a	1	0.0
Lyme Disease	9	0.5	9	0.7	4	0.2	0	n/a	56	0.5
Malaria	2	0.1	10	0.8	4	0.2	0	n/a	36	0.3
Rabies, Animal*	n/a	n/a	n/a	n/a	n/a	n/a	47	n/a	47	n/a
Rocky Mountain Spotted Fever (RMSF)	3	0.2	2	0.2	5	0.3	0	n/a	17	0.1
Tularemia	0	0.0	0	0.0	0	0.0	0	n/a	1	0.0
Typhus Fever, Murine	0	0.0	1	0.1	0	0.0	0	n/a	1	0.0
West Nile Virus Infection*	0	0.0	0	0.0	1	0.1	0	n/a	2	0.0
<b>SUB-TOTAL</b>	<b>16</b>	<b>0.9</b>	<b>28</b>	<b>2.2</b>	<b>22</b>	<b>1.1</b>	<b>47</b>	<b>n/a</b>	<b>186</b>	<b>1.2</b>

<b>GRAND TOTAL</b>	<b>4,640</b>	<b>264.2</b>	<b>4,762</b>	<b>370.7</b>	<b>3,343</b>	<b>170.3</b>	<b>136</b>	<b>n/a</b>	<b>27,797</b>	<b>244.4</b>
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<b>POPULATION</b>	<b>1,756,376</b>	<b>1,284,727</b>	<b>1,963,489</b>	<b>0</b>	<b>11,353,140</b>
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY SEX, OHIO, 2009

GENERAL INFECTIOUS DISEASES	Female		Male		Unknown		TOTAL	
	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	9	0.2	13	0.2	0	n/a	22	0.2
Botulism	2	0.0	4	0.1	0	n/a	6	0.1
Foodborne	0	0.0	1	0.0	0	n/a	1	0.0
Infant*	2	*	3	*	0	n/a	5	*
Campylobacteriosis	609	10.4	647	11.7	6	n/a	1,262	11.1
Coccidioidomycosis*	4	0.1	14	0.3	0	n/a	18	0.2
Creutzfeldt-Jakob Disease (CJD)	6	0.1	4	0.1	2	n/a	12	0.1
Cryptosporidiosis	219	3.7	162	2.9	5	n/a	386	3.4
Cytomegalovirus (CMV), Congenital*	8	*	11	*	0	n/a	19	*
<i>Escherichia coli</i> , Shiga Toxin-Producing	74	1.3	54	1.0	0	n/a	128	1.1
O157:H7	49	0.8	38	0.7	0	n/a	87	0.8
Not O157:H7	15	0.3	11	0.2	0	n/a	26	0.2
Unknown Serotype	10	0.2	5	0.1	0	n/a	15	0.1
Giardiasis	359	6.1	444	8.1	13	n/a	816	7.2
<i>Haemophilus influenzae</i> , Invasive Disease	58	1.0	39	0.7	1	n/a	98	0.9
Hemolytic Uremic Syndrome (HUS)	8	0.1	6	0.1	0	n/a	14	0.1
Legionellosis	99	1.7	172	3.1	3	n/a	274	2.4
Leprosy (Hansen's Disease)	0	0.0	2	0.0	0	n/a	2	0.0
Listeriosis	14	0.2	15	0.3	0	n/a	29	0.3
Meningitis, Aseptic	480	8.2	341	6.2	7	n/a	828	7.3
Meningitis, Other Bacterial*	23	0.4	43	0.8	2	n/a	68	0.6
Meningococcal Disease	18	0.3	24	0.4	0	n/a	42	0.4
Salmonellosis	761	13.0	608	11.0	8	n/a	1,377	12.1
Shigellosis	566	9.7	476	8.6	8	n/a	1,050	9.2
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0.0	3	0.1	0	n/a	3	0.0
Streptococcal Disease, Group A, Invasive	112	1.9	96	1.7	0	n/a	208	1.8
Streptococcal Disease, Group B, in Newborn*	28	*	34	*	1	n/a	63	*
Streptococcal Toxic Shock Syndrome (STSS)	5	0.1	6	0.1	0	n/a	11	0.1
<i>Streptococcus pneumoniae</i> , Invasive Disease	698	12.0	642	11.6	18	n/a	1,358	12.0
Ages < 5 Years*	69	*	70	*	0	n/a	139	*
Drug Resistant, Ages 5+ Years*	188	*	148	*	7	n/a	343	*
Drug Susceptible, Ages 5+ Years*	441	*	424	*	11	n/a	876	*
Toxic Shock Syndrome (TSS)	0	0.0	2	0.0	0	n/a	2	0.0
Typhoid Fever	4	0.1	7	0.1	0	n/a	11	0.1
Vibriosis	1	0.0	5	0.1	0	n/a	6	0.1
Other (Not Cholera)	1	0.0	5	0.1	0	n/a	6	0.1
Yersiniosis	19	0.3	25	0.5	0	n/a	44	0.4
<b>SUB-TOTAL</b>	<b>4,184</b>	<b>71.6</b>	<b>3,899</b>	<b>70.7</b>	<b>74</b>	<b>n/a</b>	<b>8,157</b>	<b>71.8</b>

### HEPATITIS

Hepatitis A	16	0.3	18	0.3	0	n/a	34	0.3
Hepatitis B*	727	12.4	1,050	19.0	17	n/a	1,794	15.8
Acute*	97	1.7	114	2.1	2	n/a	213	1.9
Chronic*	630	10.8	936	17.0	15	n/a	1,581	13.9
Hepatitis C*	3,352	57.4	7,207	130.7	56	n/a	10,615	93.5
Acute*	22	0.4	41	0.7	1	n/a	64	0.6
Past or Present*	3,330	57.0	7,166	130.0	55	n/a	10,551	92.9
<b>SUB-TOTAL</b>	<b>4,095</b>	<b>70.1</b>	<b>8,275</b>	<b>150.1</b>	<b>73</b>	<b>n/a</b>	<b>12,443</b>	<b>109.6</b>

### VACCINE-PREVENTABLE

Influenza-Associated Hospitalization*	2,000	34.2	1,793	32.5	25	n/a	3,818	33.6
Influenza-Associated Pediatric Mortality*	8	*	7	*	0	n/a	15	*
Influenza A Virus, Novel Human Infection*	117	2.0	123	2.2	0	n/a	240	2.1
Measles	0	0.0	1	0.0	0	n/a	1	0.0
Indigenous	0	0.0	1	0.0	0	n/a	1	0.0
Mumps	2	0.0	4	0.1	0	n/a	6	0.1
Pertussis	584	10.0	510	9.3	6	n/a	1,100	9.7
Tetanus	0	0.0	2	0.0	0	n/a	2	0.0
Varicella*	857	14.7	958	17.4	14	n/a	1,829	16.1
<b>SUB-TOTAL</b>	<b>3,568</b>	<b>61.1</b>	<b>3,398</b>	<b>61.6</b>	<b>45</b>	<b>n/a</b>	<b>7,011</b>	<b>61.8</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).



## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY SEX, OHIO, 2009

ZONNOSES	Female		Male		Unknown		TOTAL	
	N	Rate	N	Rate	N	Rate	N	Rate
Brucellosis	0	0.0	4	0.1	0	n/a	4	0.0
Dengue	2	0.0	1	0.0	0	n/a	3	0.0
Ehrlichiosis/Anaplasmosis	5	0.1	8	0.1	0	n/a	13	0.1
<i>Anaplasma phagocytophilum</i> *	0	0.0	1	0.0	0	n/a	1	0.0
<i>Ehrlichia chaffeensis</i> *	5	0.1	6	0.1	0	n/a	11	0.1
<i>Ehrlichia ewingii</i> *	0	0.0	1	0.0	0	n/a	1	0.0
LaCrosse Virus Disease*	1	0.0	4	0.1	0	n/a	5	0.0
Leptospirosis	0	0.0	1	0.0	0	n/a	1	0.0
Lyme Disease	27	0.5	29	0.5	0	n/a	56	0.5
Malaria	15	0.3	21	0.4	0	n/a	36	0.3
Rabies, Animal*	n/a	n/a	n/a	n/a	47	n/a	47	n/a
Rocky Mountain Spotted Fever (RMSF)	9	0.2	8	0.1	0	n/a	17	0.1
Tularemia	1	0.0	0	0.0	0	n/a	1	0.0
Typhus Fever, Murine	0	0.0	1	0.0	0	n/a	1	0.0
West Nile Virus Infection*	0	0.0	2	0.0	0	n/a	2	0.0
<b>SUB-TOTAL</b>	<b>60</b>	<b>1.0</b>	<b>79</b>	<b>1.4</b>	<b>47</b>	<b>n/a</b>	<b>186</b>	<b>1.2</b>
<b>GRAND TOTAL</b>	<b>11,907</b>	<b>203.9</b>	<b>15,651</b>	<b>283.9</b>	<b>239</b>	<b>n/a</b>	<b>27,797</b>	<b>244.4</b>
<b>POPULATION</b>	<b>5,840,878</b>		<b>5,512,262</b>		<b>0</b>		<b>11,353,140</b>	

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY MONTH OF ONSET, OHIO, 2009

GENERAL INFECTIOUS DISEASES	January		February		March		April		May		June		July	
	N	%	N	%	N	%	N	%	N	%	N	%	N	%
Amebiasis	3	14%	3	14%	3	14%	2	9%	2	9%	2	9%	3	14%
Botulism	1	17%	1	17%	0	0%	0	0%	1	17%	0	0%	0	0%
Foodborne	1	100%	0	0%	0	0%	0	0%	0	0%	0	0%	0	0%
Infant*	0	0%	1	20%	0	0%	0	0%	1	20%	0	0%	0	0%
Campylobacteriosis	66	5%	48	4%	69	5%	79	6%	79	6%	147	12%	210	17%
Coccidioidomycosis*	2	11%	3	17%	0	0%	2	11%	0	0%	1	6%	1	6%
Creutzfeldt-Jakob Disease (CJD)	0	0%	1	8%	1	8%	1	8%	0	0%	1	8%	0	0%
Cryptosporidiosis	28	7%	21	5%	23	6%	29	8%	39	10%	50	13%	53	14%
Cytomegalovirus (CMV), Congenital*	2	11%	3	16%	3	16%	1	5%	0	0%	0	0%	1	5%
<i>Escherichia coli</i> , Shiga Toxin-Producing	7	5%	4	3%	8	6%	15	12%	10	8%	16	13%	11	9%
O157:H7	4	5%	1	1%	3	3%	10	11%	9	10%	12	14%	8	9%
Not O157:H7	3	12%	1	4%	3	12%	3	12%	0	0%	3	12%	1	4%
Unknown Serotype	0	0%	2	13%	2	13%	2	13%	1	7%	1	7%	2	13%
Giardiasis	73	9%	53	6%	55	7%	66	8%	59	7%	65	8%	74	9%
<i>Haemophilus influenzae</i> , Invasive Disease	11	11%	4	4%	8	8%	8	8%	10	10%	13	13%	6	6%
Hemolytic Uremic Syndrome (HUS)	0	0%	0	0%	0	0%	1	7%	3	21%	4	29%	4	29%
Legionellosis	16	6%	4	1%	11	4%	7	3%	18	7%	43	16%	37	14%
Leprosy (Hansen's Disease)	0	0%	1	50%	0	0%	0	0%	0	0%	1	50%	0	0%
Listeriosis	2	7%	0	0%	0	0%	1	3%	1	3%	4	14%	4	14%
Meningitis, Aseptic	56	7%	40	5%	56	7%	42	5%	54	7%	70	8%	123	15%
Meningitis, Other Bacterial*	6	9%	8	12%	6	9%	2	3%	11	16%	3	4%	9	13%
Meningococcal Disease	5	12%	5	12%	6	14%	1	2%	2	5%	4	10%	1	2%
Salmonellosis	117	8%	66	5%	68	5%	115	8%	128	9%	175	13%	174	13%
Shigellosis	188	18%	118	11%	103	10%	94	9%	79	8%	103	10%	146	14%
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0%	0	0%	1	33%	0	0%	0	0%	1	33%	1	33%
Streptococcal Disease, Group A, Invasive	32	15%	34	16%	33	16%	25	12%	19	9%	7	3%	15	7%
Streptococcal Disease, Group B, in Newborn*	6	10%	5	8%	9	14%	6	10%	4	6%	6	10%	4	6%
Streptococcal Toxic Shock Syndrome (STSS)	2	18%	2	18%	2	18%	1	9%	1	9%	1	9%	1	9%
<i>Streptococcus pneumoniae</i> , Invasive Disease	125	9%	163	12%	171	13%	146	11%	105	8%	75	6%	32	2%
Ages < 5 Years*	15	11%	15	11%	14	10%	10	7%	11	8%	8	6%	6	4%
Drug Resistant, Ages 5+ Years*	28	8%	39	11%	37	11%	42	12%	34	10%	17	5%	11	3%
Drug Susceptible, Ages 5+ Years*	82	9%	109	12%	120	14%	94	11%	60	7%	50	6%	15	2%
Toxic Shock Syndrome (TSS)	0	0%	0	0%	0	0%	0	0%	0	0%	0	0%	0	0%
Typhoid Fever	1	9%	1	9%	1	9%	0	0%	0	0%	1	9%	1	9%
Vibriosis	2	33%	0	0%	0	0%	0	0%	0	0%	0	0%	1	17%
Other (Not Cholera)	2	33%	0	0%	0	0%	0	0%	0	0%	0	0%	1	17%
Yersiniosis	3	7%	2	5%	3	7%	4	9%	4	9%	6	14%	2	5%
<b>SUB-TOTAL</b>	<b>754</b>	<b>9%</b>	<b>590</b>	<b>7%</b>	<b>640</b>	<b>8%</b>	<b>648</b>	<b>8%</b>	<b>629</b>	<b>8%</b>	<b>799</b>	<b>10%</b>	<b>914</b>	<b>11%</b>

### HEPATITIS

Hepatitis A	5	15%	4	12%	3	9%	7	21%	0	0%	2	6%	1	3%
Hepatitis B*	211	12%	160	9%	132	7%	150	8%	204	11%	135	8%	128	7%
Acute*	68	32%	24	11%	10	5%	21	10%	21	10%	17	8%	9	4%
Chronic*	143	9%	136	9%	122	8%	129	8%	183	12%	118	7%	119	8%
Hepatitis C*	1,000	9%	2,359	22%	895	8%	766	7%	842	8%	763	7%	910	9%
Acute*	10	16%	17	27%	8	13%	5	8%	6	9%	3	5%	11	17%
Past or Present*	990	9%	2,342	22%	887	8%	761	7%	836	8%	760	7%	899	9%
<b>SUB-TOTAL</b>	<b>1,216</b>	<b>10%</b>	<b>2,523</b>	<b>20%</b>	<b>1,030</b>	<b>8%</b>	<b>923</b>	<b>7%</b>	<b>1,046</b>	<b>8%</b>	<b>900</b>	<b>7%</b>	<b>1,039</b>	<b>8%</b>

N = number of cases reported.

% = percentage of cases occurring in the month for the disease.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY MONTH OF ONSET, OHIO, 2009

OUTBREAKS*	January		February		March		April		May		June		July	
	N	%	N	%	N	%	N	%	N	%	N	%	N	%
Community*	5	19%	2	8%	5	19%	3	12%	1	4%	3	12%	2	8%
Foodborne*	7	13%	4	7%	7	13%	5	9%	4	7%	3	5%	2	4%
Healthcare-Associated*	13	24%	6	11%	8	15%	6	11%	5	9%	0	0%	3	5%
Institutional*	4	6%	3	5%	7	11%	7	11%	4	6%	0	0%	14	22%
Waterborne*	0	0%	0	0%	0	0%	1	50%	0	0%	0	0%	0	0%
Zoonotic*	0	0%	0	0%	1	11%	1	11%	1	11%	1	11%	0	0%
<b>SUB-TOTAL</b>	<b>29</b>	<b>14%</b>	<b>15</b>	<b>7%</b>	<b>28</b>	<b>13%</b>	<b>23</b>	<b>11%</b>	<b>15</b>	<b>7%</b>	<b>7</b>	<b>3%</b>	<b>21</b>	<b>10%</b>

### VACCINE-PREVENTABLE

Influenza-Associated Hospitalization*	72	2%	210	6%	255	7%	52	1%	9	0%	4	0%	11	0%
Influenza-Associated Pediatric Mortality*	0	0%	3	20%	2	13%	0	0%	0	0%	0	0%	0	0%
Influenza A Virus, Novel Human Infection*	0	0%	0	0%	0	0%	7	3%	37	15%	108	45%	84	35%
Measles	0	0%	0	0%	0	0%	0	0%	0	0%	0	0%	0	0%
Indigenous	0	0%	0	0%	0	0%	0	0%	0	0%	0	0%	0	0%
Mumps	1	17%	1	17%	0	0%	0	0%	2	33%	1	17%	0	0%
Pertussis	93	8%	57	5%	79	7%	129	12%	88	8%	114	10%	117	11%
Tetanus	0	0%	0	0%	0	0%	1	50%	0	0%	0	0%	0	0%
Varicella*	245	13%	210	11%	259	14%	240	13%	212	12%	63	3%	33	2%
<b>SUB-TOTAL</b>	<b>411</b>	<b>6%</b>	<b>481</b>	<b>7%</b>	<b>595</b>	<b>8%</b>	<b>429</b>	<b>6%</b>	<b>348</b>	<b>5%</b>	<b>290</b>	<b>4%</b>	<b>245</b>	<b>3%</b>

### ZOO NOSES

Brucellosis	1	25%	0	0%	0	0%	1	25%	0	0%	0	0%	1	25%
Dengue	0	0%	0	0%	0	0%	0	0%	0	0%	1	33%	0	0%
Ehrlichiosis/Anaplasmosis	0	0%	1	8%	2	15%	0	0%	3	23%	2	15%	3	23%
<i>Anaplasma phagocytophilum</i> *	0	0%	0	0%	0	0%	0	0%	1	100%	0	0%	0	0%
<i>Ehrlichia chaffeensis</i> *	0	0%	1	9%	2	18%	0	0%	2	18%	2	18%	2	18%
<i>Ehrlichia ewingii</i> *	0	0%	0	0%	0	0%	0	0%	0	0%	0	0%	1	100%
LaCrosse Virus Disease*	0	0%	0	0%	0	0%	0	0%	0	0%	1	20%	0	0%
Leptospirosis	0	0%	0	0%	0	0%	0	0%	0	0%	0	0%	0	0%
Lyme Disease	1	2%	0	0%	0	0%	2	4%	2	4%	18	32%	11	20%
Malaria	3	8%	3	8%	2	6%	2	6%	2	6%	3	8%	8	22%
Rabies, Animal*	0	0%	0	0%	0	0%	0	0%	9	19%	10	21%	3	6%
Rocky Mountain Spotted Fever (RMSF)	0	0%	1	6%	2	12%	2	12%	3	18%	3	18%	0	0%
Tularemia	0	0%	0	0%	0	0%	0	0%	1	100%	0	0%	0	0%
Typhus Fever, Murine	0	0%	0	0%	0	0%	0	0%	0	0%	1	100%	0	0%
West Nile Virus Infection*	0	0%	0	0%	0	0%	0	0%	0	0%	0	0%	0	0%
<b>SUB-TOTAL</b>	<b>5</b>	<b>3%</b>	<b>5</b>	<b>3%</b>	<b>6</b>	<b>3%</b>	<b>7</b>	<b>4%</b>	<b>20</b>	<b>11%</b>	<b>39</b>	<b>21%</b>	<b>26</b>	<b>14%</b>

<b>GRAND TOTAL</b>	<b>2,415</b>	<b>9%</b>	<b>3,614</b>	<b>13%</b>	<b>2,299</b>	<b>8%</b>	<b>2,030</b>	<b>7%</b>	<b>2,058</b>	<b>7%</b>	<b>2,035</b>	<b>7%</b>	<b>2,245</b>	<b>8%</b>
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## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY MONTH OF ONSET, OHIO, 2009

GENERAL INFECTIOUS DISEASES	August		September		October		November		December		TOTAL	
	N	%	N	%	N	%	N	%	N	%	N	%
Amebiasis	1	5%	1	5%	1	5%	1	5%	0	0%	22	100%
Botulism	0	0%	0	0%	1	17%	2	33%	0	0%	6	100%
Foodborne	0	0%	0	0%	0	0%	0	0%	0	0%	1	100%
Infant*	0	0%	0	0%	1	20%	2	40%	0	0%	5	100%
Campylobacteriosis	176	14%	119	9%	97	8%	88	7%	84	7%	1,262	100%
Coccidioidomycosis*	0	0%	3	17%	2	11%	2	11%	2	11%	18	100%
Creutzfeldt-Jakob Disease (CJD)	0	0%	3	25%	1	8%	1	8%	3	25%	12	100%
Cryptosporidiosis	38	10%	33	9%	30	8%	21	5%	21	5%	386	100%
Cytomegalovirus (CMV), Congenital*	3	16%	1	5%	0	0%	2	11%	3	16%	19	100%
<i>Escherichia coli</i> , Shiga Toxin-Producing	27	21%	7	5%	8	6%	9	7%	6	5%	128	100%
O157:H7	18	21%	6	7%	6	7%	7	8%	3	3%	87	100%
Not O157:H7	6	23%	0	0%	2	8%	1	4%	3	12%	26	100%
Unknown Serotype	3	20%	1	7%	0	0%	1	7%	0	0%	15	100%
Giardiasis	90	11%	86	11%	72	9%	63	8%	60	7%	816	100%
<i>Haemophilus influenzae</i> , Invasive Disease	7	7%	7	7%	7	7%	6	6%	11	11%	98	100%
Hemolytic Uremic Syndrome (HUS)	1	7%	0	0%	0	0%	1	7%	0	0%	14	100%
Legionellosis	55	20%	32	12%	32	12%	9	3%	10	4%	274	100%
Leprosy (Hansen's Disease)	0	0%	0	0%	0	0%	0	0%	0	0%	2	100%
Listeriosis	5	17%	7	24%	1	3%	2	7%	2	7%	29	100%
Meningitis, Aseptic	133	16%	119	14%	75	9%	26	3%	34	4%	828	100%
Meningitis, Other Bacterial*	5	7%	5	7%	2	3%	5	7%	6	9%	68	100%
Meningococcal Disease	0	0%	6	14%	4	10%	6	14%	2	5%	42	100%
Salmonellosis	164	12%	123	9%	92	7%	80	6%	75	5%	1,377	100%
Shigellosis	49	5%	34	3%	41	4%	35	3%	60	6%	1,050	100%
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0%	0	0%	0	0%	0	0%	0	0%	3	100%
Streptococcal Disease, Group A, Invasive	11	5%	4	2%	4	2%	6	3%	18	9%	208	100%
Streptococcal Disease, Group B, in Newborn*	8	13%	4	6%	1	2%	4	6%	6	10%	63	100%
Streptococcal Toxic Shock Syndrome (STSS)	0	0%	1	9%	0	0%	0	0%	0	0%	11	100%
<i>Streptococcus pneumoniae</i> , Invasive Disease	36	3%	69	5%	125	9%	148	11%	163	12%	1,358	100%
Ages < 5 Years*	7	5%	7	5%	6	4%	23	17%	17	12%	139	100%
Drug Resistant, Ages 5+ Years*	9	3%	21	6%	31	9%	32	9%	42	12%	343	100%
Drug Susceptible, Ages 5+ Years*	20	2%	41	5%	88	10%	93	11%	104	12%	876	100%
Toxic Shock Syndrome (TSS)	1	50%	0	0%	0	0%	1	50%	0	0%	2	100%
Typhoid Fever	1	9%	0	0%	1	9%	2	18%	2	18%	11	100%
Vibriosis	1	17%	1	17%	1	17%	0	0%	0	0%	6	100%
Other (Not Cholera)	1	17%	1	17%	1	17%	0	0%	0	0%	6	100%
Yersiniosis	4	9%	5	11%	1	2%	1	2%	9	20%	44	100%
<b>SUB-TOTAL</b>	<b>816</b>	<b>10%</b>	<b>670</b>	<b>8%</b>	<b>599</b>	<b>7%</b>	<b>521</b>	<b>6%</b>	<b>577</b>	<b>7%</b>	<b>8,157</b>	<b>100%</b>

### HEPATITIS

Hepatitis A	3	9%	4	12%	1	3%	1	3%	3	9%	34	100%
Hepatitis B*	170	9%	109	6%	139	8%	90	5%	166	9%	1,794	100%
Acute*	8	4%	7	3%	8	4%	9	4%	11	5%	213	100%
Chronic*	162	10%	102	6%	131	8%	81	5%	155	10%	1,581	100%
Hepatitis C*	720	7%	474	4%	723	7%	574	5%	589	6%	10,615	100%
Acute*	1	2%	0	0%	1	2%	2	3%	0	0%	64	100%
Past or Present*	719	7%	474	4%	722	7%	572	5%	589	6%	10,551	100%
<b>SUB-TOTAL</b>	<b>893</b>	<b>7%</b>	<b>587</b>	<b>5%</b>	<b>863</b>	<b>7%</b>	<b>665</b>	<b>5%</b>	<b>758</b>	<b>6%</b>	<b>12,443</b>	<b>100%</b>

N = number of cases reported.

% = percentage of cases occurring in the month for the disease.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY MONTH OF ONSET, OHIO, 2009

OUTBREAKS*	August		September		October		November		December		TOTAL	
	N	%	N	%	N	%	N	%	N	%	N	%
Community*	1	4%	0	0%	1	4%	1	4%	2	8%	26	100%
Foodborne*	6	11%	1	2%	2	4%	4	7%	11	20%	56	100%
Healthcare-Associated*	3	5%	2	4%	6	11%	0	0%	3	5%	55	100%
Institutional*	3	5%	4	6%	5	8%	4	6%	9	14%	64	100%
Waterborne*	0	0%	0	0%	1	50%	0	0%	0	0%	2	100%
Zoonotic*	0	0%	0	0%	0	0%	3	33%	2	22%	9	100%
<b>SUB-TOTAL</b>	<b>13</b>	<b>6%</b>	<b>7</b>	<b>3%</b>	<b>15</b>	<b>7%</b>	<b>12</b>	<b>6%</b>	<b>27</b>	<b>13%</b>	<b>212</b>	<b>100%</b>

VACCINE-PREVENTABLE												
Influenza-Associated Hospitalization*	37	1%	248	6%	2,220	58%	632	17%	68	2%	3,818	100%
Influenza-Associated Pediatric Mortality*	0	0%	0	0%	5	33%	4	27%	1	7%	15	100%
Influenza A Virus, Novel Human Infection*	4	2%	0	0%	0	0%	0	0%	0	0%	240	100%
Measles	0	0%	0	0%	1	100%	0	0%	0	0%	1	100%
Indigenous	0	0%	0	0%	1	100%	0	0%	0	0%	1	100%
Mumps	0	0%	0	0%	1	17%	0	0%	0	0%	6	100%
Pertussis	98	9%	84	8%	76	7%	69	6%	96	9%	1,100	100%
Tetanus	1	50%	0	0%	0	0%	0	0%	0	0%	2	100%
Varicella*	65	4%	134	7%	149	8%	120	7%	99	5%	1,829	100%
<b>SUB-TOTAL</b>	<b>205</b>	<b>3%</b>	<b>466</b>	<b>7%</b>	<b>2,452</b>	<b>35%</b>	<b>825</b>	<b>12%</b>	<b>264</b>	<b>4%</b>	<b>7,011</b>	<b>100%</b>

ZONOSESES												
Brucellosis	1	25%	0	0%	0	0%	0	0%	0	0%	4	100%
Dengue	2	67%	0	0%	0	0%	0	0%	0	0%	3	100%
Ehrlichiosis/Anaplasmosis	0	0%	0	0%	1	8%	0	0%	1	8%	13	100%
<i>Anaplasma phagocytophilum</i> *	0	0%	0	0%	0	0%	0	0%	0	0%	1	100%
<i>Ehrlichia chaffeensis</i> *	0	0%	0	0%	1	9%	0	0%	1	9%	11	100%
<i>Ehrlichia ewingii</i> *	0	0%	0	0%	0	0%	0	0%	0	0%	1	100%
LaCrosse Virus Disease*	3	60%	0	0%	1	20%	0	0%	0	0%	5	100%
Leptospirosis	1	100%	0	0%	0	0%	0	0%	0	0%	1	100%
Lyme Disease	10	18%	8	14%	2	4%	2	4%	0	0%	56	100%
Malaria	7	19%	1	3%	1	3%	3	8%	1	3%	36	100%
Rabies, Animal*	17	36%	5	11%	2	4%	0	0%	1	2%	47	100%
Rocky Mountain Spotted Fever (RMSF)	4	24%	1	6%	1	6%	0	0%	0	0%	17	100%
Tularemia	0	0%	0	0%	0	0%	0	0%	0	0%	1	100%
Typhus Fever, Murine	0	0%	0	0%	0	0%	0	0%	0	0%	1	100%
West Nile Virus Infection*	2	100%	0	0%	0	0%	0	0%	0	0%	2	100%
<b>SUB-TOTAL</b>	<b>47</b>	<b>25%</b>	<b>15</b>	<b>8%</b>	<b>8</b>	<b>4%</b>	<b>5</b>	<b>3%</b>	<b>3</b>	<b>2%</b>	<b>186</b>	<b>100%</b>

<b>GRAND TOTAL</b>	<b>1,974</b>	<b>7%</b>	<b>1,745</b>	<b>6%</b>	<b>3,937</b>	<b>14%</b>	<b>2,028</b>	<b>7%</b>	<b>1,629</b>	<b>6%</b>	<b>28,009</b>	<b>100%</b>
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# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

GENERAL INFECTIOUS DISEASES	Adams		Allen		Ashland		Ashtabula		Athens		Auglaize		Belmont	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Botulism	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Foodborne	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Infant*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
Campylobacteriosis	4	14.6	25	23.0	7	13.3	6	5.8	0	0.0	18	38.6	1	1.4
Coccidioidomycosis*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Creutzfeldt-Jakob Disease (CJD)	0	0.0	0	0.0	0	0.0	0	0.0	1	1.6	0	0.0	0	0.0
Cryptosporidiosis	1	3.7	3	2.8	7	13.3	2	1.9	0	0.0	11	23.6	0	0.0
Cytomegalovirus (CMV), Congenital*	0	*	0	*	0	*	1	*	0	*	0	*	0	*
<i>Escherichia coli</i> , Shiga Toxin-Producing	0	0.0	5	4.6	0	0.0	2	1.9	2	3.2	0	0.0	1	1.4
O157:H7	0	0.0	5	4.6	0	0.0	1	1.0	2	3.2	0	0.0	0	0.0
Not O157:H7	0	0.0	0	0.0	0	0.0	1	1.0	0	0.0	0	0.0	1	1.4
Unknown Serotype	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Giardiasis	0	0.0	14	12.9	2	3.8	0	0.0	3	4.8	2	4.3	2	2.8
<i>Haemophilus influenzae</i> , Invasive Disease	0	0.0	1	0.9	0	0.0	0	0.0	0	0.0	0	0.0	2	2.8
Hemolytic Uremic Syndrome (HUS)	0	0.0	0	0.0	0	0.0	1	1.0	0	0.0	0	0.0	0	0.0
Legionellosis	0	0.0	2	1.8	0	0.0	0	0.0	2	3.2	1	2.1	0	0.0
Leprosy (Hansen's Disease)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Listeriosis	0	0.0	0	0.0	0	0.0	1	1.0	0	0.0	1	2.1	0	0.0
Meningitis, Aseptic	1	3.7	20	18.4	1	1.9	3	2.9	6	9.6	4	8.6	12	17.1
Meningitis, Other Bacterial*	0	0.0	4	3.7	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Meningococcal Disease	0	0.0	0	0.0	0	0.0	0	0.0	5	8.0	1	2.1	0	0.0
Salmonellosis	1	3.7	14	12.9	4	7.6	12	11.7	5	8.0	5	10.7	7	10.0
Shigellosis	0	0.0	0	0.0	1	1.9	2	1.9	0	0.0	7	15.0	0	0.0
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcal Disease, Group A, Invasive	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	3	6.4	6	8.5
Streptococcal Disease, Group B, in Newborn*	0	*	1	*	0	*	0	*	1	*	2	*	2	*
Streptococcal Toxic Shock Syndrome (STSS)	0	0.0	0	0.0	0	0.0	1	1.0	0	0.0	0	0.0	0	0.0
<i>Streptococcus pneumoniae</i> , Invasive Disease	2	7.3	17	15.7	1	1.9	4	3.9	4	6.4	11	23.6	15	21.4
Ages < 5 Years*	0	*	4	*	0	*	1	*	0	*	2	*	3	*
Drug Resistant, Ages 5+ Years*	1	*	4	*	0	*	0	*	0	*	1	*	3	*
Drug Susceptible, Ages 5+ Years*	1	*	9	*	1	*	3	*	4	*	8	*	9	*
Toxic Shock Syndrome (TSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhoid Fever	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Vibriosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Other (Not Cholera)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Yersiniosis	0	0.0	0	0.0	0	0.0	0	0.0	1	1.6	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>9</b>	<b>32.9</b>	<b>106</b>	<b>97.7</b>	<b>23</b>	<b>43.8</b>	<b>35</b>	<b>34.1</b>	<b>30</b>	<b>48.2</b>	<b>66</b>	<b>141.6</b>	<b>48</b>	<b>68.4</b>

## HEPATITIS

Hepatitis A	0	0.0	1	0.9	0	0.0	1	1.0	0	0.0	0	0.0	0	0.0
Hepatitis B*	0	0.0	14	12.9	1	1.9	5	4.9	3	4.8	1	2.1	8	11.4
Acute*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	1.4
Chronic*	0	0.0	14	12.9	1	1.9	5	4.9	3	4.8	1	2.1	7	10.0
Hepatitis C*	14	51.2	75	69.1	16	30.5	48	46.7	31	49.8	7	15.0	32	45.6
Acute*	0	0.0	1	0.9	0	0.0	0	0.0	0	0.0	1	2.1	0	0.0
Past or Present*	14	51.2	74	68.2	16	30.5	48	46.7	31	49.8	6	12.9	32	45.6
<b>SUB-TOTAL</b>	<b>14</b>	<b>51.2</b>	<b>90</b>	<b>83.0</b>	<b>17</b>	<b>32.4</b>	<b>54</b>	<b>52.6</b>	<b>34</b>	<b>54.6</b>	<b>8</b>	<b>17.2</b>	<b>40</b>	<b>57.0</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

OUTBREAKS*	Adams		Allen		Ashland		Ashtabula		Athens		Auglaize		Belmont	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Community*	0	n/a	2	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Foodborne*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Healthcare-Associated*	0	n/a	3	n/a	0	n/a	0	n/a	1	n/a	1	n/a	0	n/a
Institutional*	0	n/a	2	n/a	2	n/a	0	n/a	0	n/a	1	n/a	0	n/a
Waterborne*	0	n/a	1	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Zoonotic*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
<b>SUB-TOTAL</b>	<b>0</b>	<b>n/a</b>	<b>8</b>	<b>n/a</b>	<b>2</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>2</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>

VACCINE-PREVENTABLE														
Influenza-Associated Hospitalization*	0	0.0	42	38.7	6	11.4	16	15.6	4	6.4	14	30.0	5	7.1
Influenza-Associated Pediatric Mortality*	0	*	0	*	0	*	0	*	1	*	0	*	0	*
Influenza A Virus, Novel Human Infection*	0	0.0	2	1.8	0	0.0	0	0.0	5	8.0	0	0.0	1	1.4
Measles	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Indigenous	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Mumps	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Pertussis	0	0.0	0	0.0	22	41.9	0	0.0	2	3.2	5	10.7	1	1.4
Tetanus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Varicella*	0	0.0	13	12.0	75	142.8	20	19.5	16	25.7	8	17.2	4	5.7
<b>SUB-TOTAL</b>	<b>0</b>	<b>0.0</b>	<b>57</b>	<b>52.5</b>	<b>103</b>	<b>196.1</b>	<b>36</b>	<b>35.0</b>	<b>28</b>	<b>45.0</b>	<b>27</b>	<b>57.9</b>	<b>11</b>	<b>15.7</b>

ZOO NOSES														
Brucellosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Dengue	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Ehrlichiosis/Anaplasmosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia chaffeensis</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
LaCrosse Virus Disease*	0	0.0	1	0.9	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Lyme Disease	0	0.0	1	0.9	0	0.0	0	0.0	1	1.6	0	0.0	0	0.0
Malaria	0	0.0	0	0.0	0	0.0	0	0.0	1	1.6	0	0.0	0	0.0
Rabies, Animal*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Rocky Mountain Spotted Fever (RMSF)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Tularemia	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhus Fever, Murine	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
West Nile Virus Infection*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>0</b>	<b>0.0</b>	<b>2</b>	<b>1.8</b>	<b>0</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>2</b>	<b>3.2</b>	<b>0</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>

<b>GRAND TOTAL</b>	<b>23</b>	<b>84.2</b>	<b>263</b>	<b>235.1</b>	<b>145</b>	<b>272.3</b>	<b>125</b>	<b>121.7</b>	<b>95</b>	<b>151.1</b>	<b>103</b>	<b>216.7</b>	<b>99</b>	<b>141.0</b>
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<b>POPULATION</b>	<b>27,330</b>	<b>108,473</b>	<b>52,523</b>	<b>102,728</b>	<b>62,223</b>	<b>46,611</b>	<b>70,226</b>
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

GENERAL INFECTIOUS DISEASES	Brown		Butler		Carroll		Champaign		Clark		Clermont		Clinton	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	0	0.0	0	0.0	0	0.0	1	2.6	0	0.0	0	0.0	0	0.0
Botulism	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Foodborne	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Infant*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
Campylobacteriosis	4	9.5	18	5.4	3	10.4	6	15.4	30	20.7	16	9.0	2	4.9
Coccidioidomycosis*	0	0.0	1	0.3	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Creutzfeldt-Jakob Disease (CJD)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Cryptosporidiosis	2	4.7	0	0.0	8	27.7	1	2.6	4	2.8	0	0.0	5	12.3
Cytomegalovirus (CMV), Congenital*	0	*	0	*	1	*	1	*	0	*	0	*	0	*
<i>Escherichia coli</i> , Shiga Toxin-Producing	0	0.0	4	1.2	0	0.0	1	2.6	4	2.8	4	2.2	0	0.0
O157:H7	0	0.0	3	0.9	0	0.0	1	2.6	3	2.1	3	1.7	0	0.0
Not O157:H7	0	0.0	0	0.0	0	0.0	0	0.0	1	0.7	0	0.0	0	0.0
Unknown Serotype	0	0.0	1	0.3	0	0.0	0	0.0	0	0.0	1	0.6	0	0.0
Giardiasis	2	4.7	13	3.9	5	17.3	2	5.1	5	3.5	16	9.0	0	0.0
<i>Haemophilus influenzae</i> , Invasive Disease	0	0.0	1	0.3	1	3.5	0	0.0	0	0.0	3	1.7	1	2.5
Hemolytic Uremic Syndrome (HUS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Legionellosis	0	0.0	3	0.9	0	0.0	3	7.7	1	0.7	0	0.0	0	0.0
Leprosy (Hansen's Disease)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Listeriosis	0	0.0	1	0.3	0	0.0	0	0.0	0	0.0	1	0.6	0	0.0
Meningitis, Aseptic	1	2.4	31	9.3	0	0.0	4	10.3	12	8.3	16	9.0	1	2.5
Meningitis, Other Bacterial*	0	0.0	2	0.6	0	0.0	0	0.0	3	2.1	0	0.0	0	0.0
Meningococcal Disease	1	2.4	0	0.0	0	0.0	0	0.0	2	1.4	1	0.6	0	0.0
Salmonellosis	3	7.1	33	9.9	5	17.3	1	2.6	13	9.0	22	12.4	5	12.3
Shigellosis	1	2.4	4	1.2	1	3.5	4	10.3	58	40.1	1	0.6	0	0.0
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcal Disease, Group A, Invasive	0	0.0	2	0.6	1	3.5	0	0.0	3	2.1	3	1.7	2	4.9
Streptococcal Disease, Group B, in Newborn*	0	*	2	*	0	*	0	*	1	*	0	*	1	*
Streptococcal Toxic Shock Syndrome (STSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Streptococcus pneumoniae</i> , Invasive Disease	5	11.8	33	9.9	4	13.9	5	12.9	23	15.9	17	9.6	2	4.9
Ages < 5 Years*	2	*	4	*	0	*	0	*	2	*	2	*	1	*
Drug Resistant, Ages 5+ Years*	0	*	5	*	1	*	1	*	0	*	8	*	1	*
Drug Susceptible, Ages 5+ Years*	3	*	24	*	3	*	4	*	21	*	7	*	0	*
Toxic Shock Syndrome (TSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhoid Fever	0	0.0	1	0.3	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Vibriosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Other (Not Cholera)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Yersiniosis	0	0.0	1	0.3	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>19</b>	<b>44.9</b>	<b>150</b>	<b>45.1</b>	<b>29</b>	<b>100.6</b>	<b>29</b>	<b>74.6</b>	<b>159</b>	<b>109.9</b>	<b>100</b>	<b>56.2</b>	<b>19</b>	<b>46.9</b>

## HEPATITIS

Hepatitis A	0	0.0	0	0.0	0	0.0	0	0.0	2	1.4	0	0.0	0	0.0
Hepatitis B*	1	2.4	40	12.0	1	3.5	2	5.1	20	13.8	13	7.3	8	19.7
Acute*	0	0.0	8	2.4	0	0.0	0	0.0	9	6.2	2	1.1	2	4.9
Chronic*	1	2.4	32	9.6	1	3.5	2	5.1	11	7.6	11	6.2	6	14.8
Hepatitis C*	19	44.9	131	39.4	12	41.6	16	41.1	130	89.8	68	38.2	14	34.5
Acute*	4	9.5	0	0.0	0	0.0	1	2.6	1	0.7	1	0.6	1	2.5
Past or Present*	15	35.5	131	39.4	12	41.6	15	38.6	129	89.1	67	37.6	13	32.1
<b>SUB-TOTAL</b>	<b>20</b>	<b>47.3</b>	<b>171</b>	<b>51.4</b>	<b>13</b>	<b>45.1</b>	<b>18</b>	<b>46.3</b>	<b>152</b>	<b>105.0</b>	<b>81</b>	<b>45.5</b>	<b>22</b>	<b>54.3</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).



## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

OUTBREAKS*	Brown		Butler		Carroll		Champaign		Clark		Clermont		Clinton	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Community*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Foodborne*	0	n/a	4	n/a	0	n/a	0	n/a	1	n/a	0	n/a	0	n/a
Healthcare-Associated*	0	n/a	0	n/a	0	n/a	0	n/a	1	n/a	0	n/a	0	n/a
Institutional*	0	n/a	1	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Waterborne*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Zoonotic*	0	n/a	0	n/a	1	n/a	0	n/a	1	n/a	0	n/a	0	n/a
<b>SUB-TOTAL</b>	<b>0</b>	<b>n/a</b>	<b>5</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>3</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>

VACCINE-PREVENTABLE														
Influenza-Associated Hospitalization*	2	4.7	76	22.8	11	38.1	13	33.4	65	44.9	60	33.7	9	22.2
Influenza-Associated Pediatric Mortality*	1	*	0	*	0	*	0	*	0	*	0	*	0	*
Influenza A Virus, Novel Human Infection*	0	0.0	9	2.7	0	0.0	2	5.1	6	4.1	4	2.2	0	0.0
Measles	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Indigenous	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Mumps	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.6	0	0.0
Pertussis	3	7.1	9	2.7	0	0.0	6	15.4	16	11.1	14	7.9	4	9.9
Tetanus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Varicella*	11	26.0	29	8.7	5	17.3	1	2.6	11	7.6	32	18.0	1	2.5
<b>SUB-TOTAL</b>	<b>17</b>	<b>40.2</b>	<b>123</b>	<b>37.0</b>	<b>16</b>	<b>55.5</b>	<b>22</b>	<b>56.6</b>	<b>98</b>	<b>67.7</b>	<b>111</b>	<b>62.4</b>	<b>14</b>	<b>34.5</b>

ZOO NOSES														
Brucellosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Dengue	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Ehrlichiosis/Anaplasmosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia chaffeensis</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
LaCrosse Virus Disease*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Lyme Disease	0	0.0	2	0.6	1	3.5	1	2.6	1	0.7	0	0.0	0	0.0
Malaria	0	0.0	1	0.3	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Rabies, Animal*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	1	n/a	0	n/a
Rocky Mountain Spotted Fever (RMSF)	1	2.4	1	0.3	0	0.0	0	0.0	0	0.0	1	0.6	0	0.0
Tularemia	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhus Fever, Murine	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
West Nile Virus Infection*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>1</b>	<b>2.4</b>	<b>4</b>	<b>1.2</b>	<b>1</b>	<b>3.5</b>	<b>1</b>	<b>2.6</b>	<b>1</b>	<b>0.7</b>	<b>2</b>	<b>0.6</b>	<b>0</b>	<b>0.0</b>

<b>GRAND TOTAL</b>	<b>57</b>	<b>134.8</b>	<b>453</b>	<b>134.6</b>	<b>60</b>	<b>204.6</b>	<b>70</b>	<b>180.0</b>	<b>413</b>	<b>283.3</b>	<b>294</b>	<b>164.6</b>	<b>55</b>	<b>135.7</b>
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<b>POPULATION</b>	<b>42,285</b>	<b>332,807</b>	<b>28,836</b>	<b>38,890</b>	<b>144,742</b>	<b>177,977</b>	<b>40,543</b>
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

GENERAL INFECTIOUS DISEASES	Columbiana		Coshocton		Crawford		Cuyahoga		Darke		Defiance		Delaware	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	0	0.0	0	0.0	0	0.0	3	0.2	0	0.0	0	0.0	1	0.9
Botulism	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0
Foodborne	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0
Infant*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
Campylobacteriosis	10	8.9	5	13.6	2	4.3	172	12.3	14	26.3	6	15.2	14	12.7
Coccidioidomycosis*	0	0.0	0	0.0	1	2.1	3	0.2	0	0.0	0	0.0	0	0.0
Creutzfeldt-Jakob Disease (CJD)	0	0.0	0	0.0	0	0.0	5	0.4	0	0.0	0	0.0	0	0.0
Cryptosporidiosis	4	3.6	5	13.6	4	8.5	15	1.1	7	13.1	2	5.1	6	5.5
Cytomegalovirus (CMV), Congenital*	0	*	0	*	0	*	1	*	0	*	0	*	0	*
<i>Escherichia coli</i> , Shiga Toxin-Producing	1	0.9	0	0.0	0	0.0	11	0.8	4	7.5	1	2.5	2	1.8
O157:H7	1	0.9	0	0.0	0	0.0	11	0.8	3	5.6	0	0.0	2	1.8
Not O157:H7	0	0.0	0	0.0	0	0.0	0	0.0	1	1.9	1	2.5	0	0.0
Unknown Serotype	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Giardiasis	13	11.6	4	10.9	0	0.0	81	5.8	6	11.3	0	0.0	15	13.6
<i>Haemophilus influenzae</i> , Invasive Disease	2	1.8	0	0.0	0	0.0	7	0.5	0	0.0	0	0.0	0	0.0
Hemolytic Uremic Syndrome (HUS)	1	0.9	0	0.0	0	0.0	8	0.6	1	1.9	0	0.0	1	0.9
Legionellosis	2	1.8	0	0.0	0	0.0	58	4.2	1	1.9	0	0.0	4	3.6
Leprosy (Hansen's Disease)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Listeriosis	0	0.0	0	0.0	0	0.0	4	0.3	0	0.0	0	0.0	0	0.0
Meningitis, Aseptic	0	0.0	2	5.5	3	6.4	72	5.2	4	7.5	6	15.2	13	11.8
Meningitis, Other Bacterial*	0	0.0	0	0.0	0	0.0	5	0.4	1	1.9	1	2.5	0	0.0
Meningococcal Disease	0	0.0	0	0.0	0	0.0	6	0.4	0	0.0	0	0.0	0	0.0
Salmonellosis	18	16.1	7	19.1	7	14.9	206	14.8	9	16.9	4	10.1	23	20.9
Shigellosis	0	0.0	0	0.0	0	0.0	244	17.5	2	3.8	1	2.5	3	2.7
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0.0	0	0.0	0	0.0	2	0.1	0	0.0	0	0.0	0	0.0
Streptococcal Disease, Group A, Invasive	1	0.9	0	0.0	0	0.0	24	1.7	2	3.8	2	5.1	3	2.7
Streptococcal Disease, Group B, in Newborn*	0	*	0	*	0	*	8	*	0	*	0	*	2	*
Streptococcal Toxic Shock Syndrome (STSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Streptococcus pneumoniae</i> , Invasive Disease	16	14.3	3	8.2	4	8.5	105	7.5	11	20.6	3	7.6	21	19.1
Ages < 5 Years*	2	*	1	*	1	*	11	*	0	*	0	*	4	*
Drug Resistant, Ages 5+ Years*	2	*	0	*	0	*	28	*	3	*	0	*	9	*
Drug Susceptible, Ages 5+ Years*	12	*	2	*	3	*	66	*	8	*	3	*	8	*
Toxic Shock Syndrome (TSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhoid Fever	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0
Vibriosis	0	0.0	0	0.0	0	0.0	2	0.1	0	0.0	0	0.0	0	0.0
Other (Not Cholera)	0	0.0	0	0.0	0	0.0	2	0.1	0	0.0	0	0.0	0	0.0
Yersiniosis	1	0.9	0	0.0	0	0.0	5	0.4	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>69</b>	<b>61.6</b>	<b>26</b>	<b>70.9</b>	<b>21</b>	<b>44.7</b>	<b>1,049</b>	<b>75.3</b>	<b>62</b>	<b>116.3</b>	<b>26</b>	<b>65.8</b>	<b>108</b>	<b>98.2</b>

## HEPATITIS

Hepatitis A	0	0.0	0	0.0	0	0.0	4	0.3	0	0.0	0	0.0	2	1.8
Hepatitis B*	8	7.1	2	5.5	2	4.3	257	18.4	0	0.0	4	10.1	18	16.4
Acute*	0	0.0	0	0.0	0	0.0	34	2.4	0	0.0	0	0.0	1	0.9
Chronic*	8	7.1	2	5.5	2	4.3	223	16.0	0	0.0	4	10.1	17	15.5
Hepatitis C*	20	17.8	7	19.1	23	49.0	1,484	106.5	9	16.9	4	10.1	35	31.8
Acute*	1	0.9	0	0.0	0	0.0	9	0.6	1	1.9	0	0.0	2	1.8
Past or Present*	19	17.0	7	19.1	23	49.0	1,475	105.8	8	15.0	4	10.1	33	30.0
<b>SUB-TOTAL</b>	<b>28</b>	<b>25.0</b>	<b>9</b>	<b>24.6</b>	<b>25</b>	<b>53.2</b>	<b>1,745</b>	<b>125.2</b>	<b>9</b>	<b>16.9</b>	<b>8</b>	<b>20.3</b>	<b>55</b>	<b>50.0</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

OUTBREAKS*	Columbiana		Coshocton		Crawford		Cuyahoga		Darke		Defiance		Delaware	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Community*	0	n/a	0	n/a	0	n/a	2	n/a	0	n/a	0	n/a	1	n/a
Foodborne*	0	n/a	1	n/a	1	n/a	6	n/a	1	n/a	0	n/a	4	n/a
Healthcare-Associated*	0	n/a	0	n/a	0	n/a	17	n/a	0	n/a	0	n/a	0	n/a
Institutional*	0	n/a	0	n/a	0	n/a	14	n/a	0	n/a	0	n/a	1	n/a
Waterborne*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Zoonotic*	0	n/a	0	n/a	0	n/a	1	n/a	0	n/a	0	n/a	0	n/a
<b>SUB-TOTAL</b>	<b>0</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>40</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>6</b>	<b>n/a</b>

### VACCINE-PREVENTABLE

Influenza-Associated Hospitalization*	53	47.3	3	8.2	4	8.5	791	56.7	6	11.3	2	5.1	38	34.5
Influenza-Associated Pediatric Mortality*	0	*	0	*	0	*	3	*	0	*	0	*	0	*
Influenza A Virus, Novel Human Infection*	2	1.8	0	0.0	0	0.0	51	3.7	0	0.0	0	0.0	4	3.6
Measles	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Indigenous	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Mumps	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	1	0.9
Pertussis	3	2.7	1	2.7	0	0.0	20	1.4	1	1.9	1	2.5	89	80.9
Tetanus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Varicella*	17	15.2	12	32.7	4	8.5	78	5.6	21	39.4	23	58.2	17	15.5
<b>SUB-TOTAL</b>	<b>75</b>	<b>66.9</b>	<b>16</b>	<b>43.7</b>	<b>8</b>	<b>17.0</b>	<b>944</b>	<b>67.7</b>	<b>28</b>	<b>52.5</b>	<b>26</b>	<b>65.8</b>	<b>149</b>	<b>135.5</b>

### ZOO NOSES

Brucellosis	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0
Dengue	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Ehrlichiosis/Anaplasmosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia chaffeensis</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
LaCrosse Virus Disease*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	2.5	0	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0
Lyme Disease	0	0.0	0	0.0	0	0.0	8	0.6	0	0.0	0	0.0	3	2.7
Malaria	0	0.0	0	0.0	0	0.0	5	0.4	0	0.0	0	0.0	0	0.0
Rabies, Animal*	2	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	6	n/a
Rocky Mountain Spotted Fever (RMSF)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Tularemia	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhus Fever, Murine	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
West Nile Virus Infection*	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>2</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>16</b>	<b>1.1</b>	<b>0</b>	<b>0.0</b>	<b>1</b>	<b>2.5</b>	<b>9</b>	<b>2.7</b>

<b>GRAND TOTAL</b>	<b>174</b>	<b>153.5</b>	<b>52</b>	<b>139.1</b>	<b>55</b>	<b>115.0</b>	<b>3,794</b>	<b>269.3</b>	<b>100</b>	<b>185.7</b>	<b>61</b>	<b>154.4</b>	<b>327</b>	<b>286.4</b>
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<b>POPULATION</b>	<b>112,075</b>	<b>36,655</b>	<b>46,966</b>	<b>1,393,978</b>	<b>53,309</b>	<b>39,500</b>	<b>109,989</b>
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

GENERAL INFECTIOUS DISEASES	Erie		Fairfield		Fayette		Franklin		Fulton		Gallia		Geauga	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	0	0.0	5	4.1	0	0.0	5	0.5	0	0.0	0	0.0	0	0.0
Botulism	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Foodborne	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Infant*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
Campylobacteriosis	7	8.8	11	9.0	2	7.0	89	8.3	14	33.3	3	9.7	14	15.4
Coccidioidomycosis*	0	0.0	0	0.0	0	0.0	3	0.3	0	0.0	0	0.0	0	0.0
Creutzfeldt-Jakob Disease (CJD)	1	1.3	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0
Cryptosporidiosis	1	1.3	5	4.1	0	0.0	22	2.1	1	2.4	0	0.0	2	2.2
Cytomegalovirus (CMV), Congenital*	0	*	0	*	0	*	5	*	0	*	0	*	0	*
<i>Escherichia coli</i> , Shiga Toxin-Producing	1	1.3	0	0.0	0	0.0	20	1.9	0	0.0	0	0.0	0	0.0
O157:H7	0	0.0	0	0.0	0	0.0	13	1.2	0	0.0	0	0.0	0	0.0
Not O157:H7	0	0.0	0	0.0	0	0.0	2	0.2	0	0.0	0	0.0	0	0.0
Unknown Serotype	1	1.3	0	0.0	0	0.0	5	0.5	0	0.0	0	0.0	0	0.0
Giardiasis	3	3.8	5	4.1	4	14.1	188	17.6	3	7.1	1	3.2	8	8.8
<i>Haemophilus influenzae</i> , Invasive Disease	1	1.3	1	0.8	1	3.5	8	0.7	0	0.0	0	0.0	0	0.0
Hemolytic Uremic Syndrome (HUS)	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0
Legionellosis	0	0.0	2	1.6	0	0.0	57	5.3	1	2.4	0	0.0	2	2.2
Leprosy (Hansen's Disease)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Listeriosis	0	0.0	0	0.0	0	0.0	1	0.1	1	2.4	0	0.0	0	0.0
Meningitis, Aseptic	2	2.5	14	11.4	3	10.6	122	11.4	0	0.0	0	0.0	0	0.0
Meningitis, Other Bacterial*	0	0.0	0	0.0	0	0.0	3	0.3	0	0.0	0	0.0	1	1.1
Meningococcal Disease	0	0.0	1	0.8	0	0.0	4	0.4	0	0.0	0	0.0	0	0.0
Salmonellosis	7	8.8	19	15.5	2	7.0	138	12.9	5	11.9	4	12.9	12	13.2
Shigellosis	0	0.0	8	6.5	0	0.0	234	21.9	4	9.5	0	0.0	6	6.6
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcal Disease, Group A, Invasive	0	0.0	1	0.8	0	0.0	31	2.9	1	2.4	1	3.2	1	1.1
Streptococcal Disease, Group B, in Newborn*	0	*	0	*	0	*	2	*	0	*	0	*	0	*
Streptococcal Toxic Shock Syndrome (STSS)	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0
<i>Streptococcus pneumoniae</i> , Invasive Disease	13	16.3	1	0.8	3	10.6	176	16.5	4	9.5	2	6.4	4	4.4
Ages < 5 Years*	0	*	0	*	1	*	16	*	0	*	1	*	1	*
Drug Resistant, Ages 5+ Years*	2	*	1	*	0	*	41	*	1	*	0	*	1	*
Drug Susceptible, Ages 5+ Years*	11	*	0	*	2	*	119	*	3	*	1	*	2	*
Toxic Shock Syndrome (TSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhoid Fever	0	0.0	0	0.0	0	0.0	4	0.4	0	0.0	0	0.0	0	0.0
Vibriosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Other (Not Cholera)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Yersiniosis	0	0.0	0	0.0	0	0.0	5	0.5	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>36</b>	<b>45.3</b>	<b>73</b>	<b>59.5</b>	<b>15</b>	<b>52.8</b>	<b>1,120</b>	<b>104.8</b>	<b>34</b>	<b>80.8</b>	<b>11</b>	<b>35.4</b>	<b>50</b>	<b>55.0</b>

## HEPATITIS

Hepatitis A	0	0.0	2	1.6	0	0.0	7	0.7	0	0.0	0	0.0	0	0.0
Hepatitis B*	4	5.0	19	15.5	2	7.0	371	34.7	2	4.8	4	12.9	4	4.4
Acute*	0	0.0	0	0.0	0	0.0	33	3.1	0	0.0	1	3.2	1	1.1
Chronic*	4	5.0	19	15.5	2	7.0	338	31.6	2	4.8	3	9.7	3	3.3
Hepatitis C*	49	61.6	115	93.7	0	0.0	769	71.9	8	19.0	20	64.4	35	38.5
Acute*	2	2.5	2	1.6	0	0.0	0	0.0	0	0.0	0	0.0	3	3.3
Past or Present*	47	59.1	113	92.1	0	0.0	769	71.9	8	19.0	20	64.4	32	35.2
<b>SUB-TOTAL</b>	<b>53</b>	<b>66.6</b>	<b>136</b>	<b>110.8</b>	<b>2</b>	<b>7.0</b>	<b>1,147</b>	<b>107.3</b>	<b>10</b>	<b>23.8</b>	<b>24</b>	<b>77.2</b>	<b>39</b>	<b>42.9</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

OUTBREAKS*	Erie		Fairfield		Fayette		Franklin		Fulton		Gallia		Geauga	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Community*	0	n/a	0	n/a	0	n/a	1	n/a	3	n/a	0	n/a	0	n/a
Foodborne*	0	n/a	0	n/a	1	n/a	6	n/a	0	n/a	0	n/a	0	n/a
Healthcare-Associated*	0	n/a	0	n/a	0	n/a	6	n/a	0	n/a	0	n/a	0	n/a
Institutional*	0	n/a	0	n/a	0	n/a	17	n/a	0	n/a	0	n/a	0	n/a
Waterborne*	0	n/a	0	n/a	0	n/a	1	n/a	0	n/a	0	n/a	0	n/a
Zoonotic*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
<b>SUB-TOTAL</b>	<b>0</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>31</b>	<b>n/a</b>	<b>3</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>

### VACCINE-PREVENTABLE

Influenza-Associated Hospitalization*	19	23.9	33	26.9	9	31.7	509	47.6	20	47.5	28	90.1	16	17.6
Influenza-Associated Pediatric Mortality*	0	*	0	*	1	*	2	*	0	*	0	*	0	*
Influenza A Virus, Novel Human Infection*	1	1.3	2	1.6	2	7.0	36	3.4	2	4.8	1	3.2	2	2.2
Measles	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Indigenous	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Mumps	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Pertussis	2	2.5	37	30.1	5	17.6	211	19.7	0	0.0	0	0.0	0	0.0
Tetanus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Varicella*	3	3.8	37	30.1	2	7.0	133	12.4	24	57.0	15	48.3	10	11.0
<b>SUB-TOTAL</b>	<b>25</b>	<b>31.4</b>	<b>109</b>	<b>88.8</b>	<b>19</b>	<b>66.8</b>	<b>891</b>	<b>83.4</b>	<b>46</b>	<b>109.3</b>	<b>44</b>	<b>141.6</b>	<b>28</b>	<b>30.8</b>

### ZOO NOSES

Brucellosis	0	0.0	0	0.0	0	0.0	3	0.3	0	0.0	0	0.0	0	0.0
Dengue	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Ehrlichiosis/Anaplasmosis	1	1.3	0	0.0	0	0.0	1	0.1	0	0.0	2	6.4	0	0.0
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia chaffeensis</i> *	1	1.3	0	0.0	0	0.0	1	0.1	0	0.0	1	3.2	0	0.0
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	3.2	0	0.0
LaCrosse Virus Disease*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Lyme Disease	0	0.0	1	0.8	0	0.0	6	0.6	0	0.0	0	0.0	0	0.0
Malaria	0	0.0	1	0.8	0	0.0	13	1.2	0	0.0	0	0.0	0	0.0
Rabies, Animal*	0	n/a	0	n/a	0	n/a	2	n/a	0	n/a	0	n/a	1	n/a
Rocky Mountain Spotted Fever (RMSF)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Tularemia	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0
Typhus Fever, Murine	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
West Nile Virus Infection*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>1</b>	<b>1.3</b>	<b>2</b>	<b>1.6</b>	<b>0</b>	<b>0.0</b>	<b>26</b>	<b>2.2</b>	<b>0</b>	<b>0.0</b>	<b>2</b>	<b>6.4</b>	<b>1</b>	<b>0.0</b>

<b>GRAND TOTAL</b>	<b>115</b>	<b>144.6</b>	<b>320</b>	<b>260.7</b>	<b>37</b>	<b>126.6</b>	<b>3,215</b>	<b>297.7</b>	<b>93</b>	<b>213.9</b>	<b>81</b>	<b>260.7</b>	<b>118</b>	<b>128.7</b>
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<b>POPULATION</b>	<b>79,551</b>	<b>122,759</b>	<b>28,433</b>	<b>1,068,978</b>	<b>42,084</b>	<b>31,069</b>	<b>90,895</b>
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

GENERAL INFECTIOUS DISEASES	Greene		Guernsey		Hamilton		Hancock		Hardin		Harrison		Henry	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0	0	0.0
Botulism	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Foodborne	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Infant*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
Campylobacteriosis	14	9.5	7	17.2	45	5.3	1	1.4	1	3.1	0	0.0	4	13.7
Coccidioidomycosis*	0	0.0	0	0.0	2	0.2	0	0.0	0	0.0	0	0.0	0	0.0
Creutzfeldt-Jakob Disease (CJD)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Cryptosporidiosis	2	1.4	1	2.5	6	0.7	9	12.6	0	0.0	0	0.0	1	3.4
Cytomegalovirus (CMV), Congenital*	0	*	0	*	1	*	0	*	0	*	0	*	0	*
<i>Escherichia coli</i> , Shiga Toxin-Producing	2	1.4	0	0.0	4	0.5	0	0.0	0	0.0	0	0.0	0	0.0
O157:H7	2	1.4	0	0.0	2	0.2	0	0.0	0	0.0	0	0.0	0	0.0
Not O157:H7	0	0.0	0	0.0	2	0.2	0	0.0	0	0.0	0	0.0	0	0.0
Unknown Serotype	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Giardiasis	2	1.4	3	7.4	70	8.3	3	4.2	0	0.0	2	12.6	0	0.0
<i>Haemophilus influenzae</i> , Invasive Disease	1	0.7	0	0.0	12	1.4	0	0.0	0	0.0	0	0.0	0	0.0
Hemolytic Uremic Syndrome (HUS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Legionellosis	3	2.0	0	0.0	14	1.7	0	0.0	0	0.0	0	0.0	0	0.0
Leprosy (Hansen's Disease)	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0	0	0.0
Listeriosis	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0	0	0.0
Meningitis, Aseptic	10	6.8	3	7.4	82	9.7	3	4.2	0	0.0	3	18.9	1	3.4
Meningitis, Other Bacterial*	4	2.7	0	0.0	2	0.2	1	1.4	0	0.0	0	0.0	1	3.4
Meningococcal Disease	0	0.0	0	0.0	5	0.6	0	0.0	0	0.0	0	0.0	0	0.0
Salmonellosis	14	9.5	2	4.9	67	7.9	12	16.8	0	0.0	4	25.2	3	10.3
Shigellosis	23	15.6	1	2.5	95	11.2	0	0.0	0	0.0	0	0.0	0	0.0
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcal Disease, Group A, Invasive	5	3.4	0	0.0	29	3.4	0	0.0	0	0.0	1	6.3	0	0.0
Streptococcal Disease, Group B, in Newborn*	3	*	0	*	5	*	0	*	0	*	0	*	0	*
Streptococcal Toxic Shock Syndrome (STSS)	0	0.0	0	0.0	5	0.6	0	0.0	0	0.0	0	0.0	0	0.0
<i>Streptococcus pneumoniae</i> , Invasive Disease	19	12.8	7	17.2	116	13.7	5	7.0	1	3.1	0	0.0	1	3.4
Ages < 5 Years*	5	*	1	*	9	*	0	*	0	*	0	*	0	*
Drug Resistant, Ages 5+ Years*	3	*	0	*	45	*	0	*	0	*	0	*	1	*
Drug Susceptible, Ages 5+ Years*	11	*	6	*	62	*	5	*	1	*	0	*	0	*
Toxic Shock Syndrome (TSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhoid Fever	1	0.7	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Vibriosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Other (Not Cholera)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Yersiniosis	1	0.7	0	0.0	6	0.7	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>104</b>	<b>70.3</b>	<b>24</b>	<b>58.8</b>	<b>569</b>	<b>67.3</b>	<b>34</b>	<b>47.7</b>	<b>2</b>	<b>6.3</b>	<b>10</b>	<b>63.1</b>	<b>11</b>	<b>37.7</b>

## HEPATITIS

Hepatitis A	0	0.0	0	0.0	2	0.2	0	0.0	0	0.0	0	0.0	0	0.0
Hepatitis B*	18	12.2	3	7.4	173	20.5	7	9.8	1	3.1	1	6.3	1	3.4
Acute*	2	1.4	0	0.0	16	1.9	0	0.0	0	0.0	0	0.0	0	0.0
Chronic*	16	10.8	3	7.4	157	18.6	7	9.8	1	3.1	1	6.3	1	3.4
Hepatitis C*	87	58.8	21	51.5	565	66.8	22	30.9	5	15.7	5	31.5	6	20.5
Acute*	0	0.0	0	0.0	1	0.1	1	1.4	0	0.0	3	18.9	0	0.0
Past or Present*	87	58.8	21	51.5	564	66.7	21	29.5	5	15.7	2	12.6	6	20.5
<b>SUB-TOTAL</b>	<b>105</b>	<b>71.0</b>	<b>24</b>	<b>58.8</b>	<b>740</b>	<b>87.5</b>	<b>29</b>	<b>40.7</b>	<b>6</b>	<b>18.8</b>	<b>6</b>	<b>37.8</b>	<b>7</b>	<b>24.0</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

OUTBREAKS*	Greene		Guernsey		Hamilton		Hancock		Hardin		Harrison		Henry	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Community*	1	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Foodborne*	1	n/a	0	n/a	3	n/a	0	n/a	0	n/a	1	n/a	0	n/a
Healthcare-Associated*	0	n/a	0	n/a	1	n/a	0	n/a	0	n/a	0	n/a	1	n/a
Institutional*	1	n/a	0	n/a	4	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Waterborne*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Zoonotic*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
<b>SUB-TOTAL</b>	<b>3</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>8</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>

VACCINE-PREVENTABLE														
Influenza-Associated Hospitalization*	56	37.9	8	19.6	256	30.3	6	8.4	1	3.1	4	25.2	4	13.7
Influenza-Associated Pediatric Mortality*	0	*	0	*	2	*	0	*	0	*	0	*	1	*
Influenza A Virus, Novel Human Infection*	3	2.0	0	0.0	18	2.1	1	1.4	0	0.0	0	0.0	0	0.0
Measles	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Indigenous	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Mumps	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Pertussis	4	2.7	13	31.9	73	8.6	0	0.0	0	0.0	1	6.3	1	3.4
Tetanus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Varicella*	33	22.3	6	14.7	83	9.8	12	16.8	1	3.1	4	25.2	22	75.3
<b>SUB-TOTAL</b>	<b>96</b>	<b>64.9</b>	<b>27</b>	<b>66.2</b>	<b>432</b>	<b>51.1</b>	<b>19</b>	<b>26.6</b>	<b>2</b>	<b>6.3</b>	<b>9</b>	<b>56.8</b>	<b>28</b>	<b>95.9</b>

ZOO NOSES														
Brucellosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Dengue	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0	0	0.0
Ehrlichiosis/Anaplasmosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia chaffeensis</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
LaCrosse Virus Disease*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Lyme Disease	1	0.7	0	0.0	4	0.5	0	0.0	0	0.0	0	0.0	0	0.0
Malaria	0	0.0	0	0.0	5	0.6	0	0.0	0	0.0	0	0.0	0	0.0
Rabies, Animal*	2	n/a	2	n/a	4	n/a	1	n/a	0	n/a	0	n/a	0	n/a
Rocky Mountain Spotted Fever (RMSF)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Tularemia	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhus Fever, Murine	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
West Nile Virus Infection*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>3</b>	<b>0.7</b>	<b>2</b>	<b>0.0</b>	<b>14</b>	<b>1.2</b>	<b>1</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>

<b>GRAND TOTAL</b>	<b>311</b>	<b>206.9</b>	<b>77</b>	<b>183.9</b>	<b>1,763</b>	<b>207.1</b>	<b>83</b>	<b>115.0</b>	<b>10</b>	<b>31.3</b>	<b>26</b>	<b>157.7</b>	<b>47</b>	<b>157.5</b>
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<b>POPULATION</b>	<b>147,886</b>	<b>40,792</b>	<b>845,303</b>	<b>71,295</b>	<b>31,945</b>	<b>15,856</b>	<b>29,210</b>
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

GENERAL INFECTIOUS DISEASES	Highland		Hocking		Holmes		Huron		Jackson		Jefferson		Knox	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Botulism	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Foodborne	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Infant*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
Campylobacteriosis	7	17.1	2	7.1	4	10.3	7	11.8	1	3.1	4	5.4	5	9.2
Coccidioidomycosis*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Creutzfeldt-Jakob Disease (CJD)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Cryptosporidiosis	0	0.0	0	0.0	0	0.0	2	3.4	1	3.1	2	2.7	19	34.9
Cytomegalovirus (CMV), Congenital*	0	*	1	*	0	*	0	*	1	*	0	*	0	*
<i>Escherichia coli</i> , Shiga Toxin-Producing	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
O157:H7	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Not O157:H7	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Unknown Serotype	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Giardiasis	5	12.2	3	10.6	1	2.6	7	11.8	0	0.0	1	1.4	2	3.7
<i>Haemophilus influenzae</i> , Invasive Disease	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Hemolytic Uremic Syndrome (HUS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Legionellosis	0	0.0	1	3.5	0	0.0	2	3.4	1	3.1	2	2.7	1	1.8
Leprosy (Hansen's Disease)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Listeriosis	0	0.0	0	0.0	0	0.0	1	1.7	0	0.0	1	1.4	0	0.0
Meningitis, Aseptic	3	7.3	2	7.1	1	2.6	1	1.7	2	6.1	5	6.8	3	5.5
Meningitis, Other Bacterial*	0	0.0	0	0.0	0	0.0	0	0.0	1	3.1	1	1.4	0	0.0
Meningococcal Disease	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Salmonellosis	3	7.3	1	3.5	1	2.6	9	15.1	2	6.1	6	8.1	14	25.7
Shigellosis	0	0.0	1	3.5	0	0.0	3	5.0	0	0.0	0	0.0	0	0.0
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcal Disease, Group A, Invasive	0	0.0	0	0.0	0	0.0	1	1.7	0	0.0	1	1.4	0	0.0
Streptococcal Disease, Group B, in Newborn*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
Streptococcal Toxic Shock Syndrome (STSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Streptococcus pneumoniae</i> , Invasive Disease	5	12.2	0	0.0	1	2.6	3	5.0	5	15.3	18	24.4	11	20.2
Ages < 5 Years*	1	*	0	*	0	*	0	*	0	*	0	*	1	*
Drug Resistant, Ages 5+ Years*	1	*	0	*	0	*	2	*	2	*	8	*	4	*
Drug Susceptible, Ages 5+ Years*	3	*	0	*	1	*	1	*	3	*	10	*	6	*
Toxic Shock Syndrome (TSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhoid Fever	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Vibriosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Other (Not Cholera)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Yersiniosis	0	0.0	0	0.0	1	2.6	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>23</b>	<b>56.3</b>	<b>11</b>	<b>39.0</b>	<b>9</b>	<b>23.1</b>	<b>36</b>	<b>60.5</b>	<b>14</b>	<b>42.9</b>	<b>41</b>	<b>55.5</b>	<b>55</b>	<b>100.9</b>

## HEPATITIS

Hepatitis A	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Hepatitis B*	2	4.9	0	0.0	1	2.6	1	1.7	1	3.1	7	9.5	1	1.8
Acute*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	1.8
Chronic*	2	4.9	0	0.0	1	2.6	1	1.7	1	3.1	7	9.5	0	0.0
Hepatitis C*	12	29.4	4	14.2	5	12.8	30	50.4	24	73.5	50	67.7	16	29.4
Acute*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	1.4	1	1.8
Past or Present*	12	29.4	4	14.2	5	12.8	30	50.4	24	73.5	49	66.3	15	27.5
<b>SUB-TOTAL</b>	<b>14</b>	<b>34.3</b>	<b>4</b>	<b>14.2</b>	<b>6</b>	<b>15.4</b>	<b>31</b>	<b>52.1</b>	<b>25</b>	<b>76.6</b>	<b>57</b>	<b>77.1</b>	<b>17</b>	<b>31.2</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).



## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

OUTBREAKS*	Highland		Hocking		Holmes		Huron		Jackson		Jefferson		Knox	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Community*	1	n/a	0	n/a	0	n/a	0	n/a	1	n/a	0	n/a	0	n/a
Foodborne*	0	n/a	2	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Healthcare-Associated*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Institutional*	0	n/a	0	n/a	1	n/a	0	n/a	0	n/a	1	n/a	0	n/a
Waterborne*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Zoonotic*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	1	n/a
<b>SUB-TOTAL</b>	<b>1</b>	<b>n/a</b>	<b>2</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>

### VACCINE-PREVENTABLE

Influenza-Associated Hospitalization*	3	7.3	9	31.9	1	2.6	15	25.2	15	46.0	24	32.5	5	9.2
Influenza-Associated Pediatric Mortality*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
Influenza A Virus, Novel Human Infection*	1	2.4	0	0.0	1	2.6	1	1.7	0	0.0	2	2.7	1	1.8
Measles	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Indigenous	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Mumps	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Pertussis	16	39.1	1	3.5	30	77.0	3	5.0	0	0.0	0	0.0	0	0.0
Tetanus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Varicella*	17	41.6	3	10.6	54	138.7	7	11.8	11	33.7	6	8.1	22	40.4
<b>SUB-TOTAL</b>	<b>37</b>	<b>90.5</b>	<b>13</b>	<b>46.0</b>	<b>86</b>	<b>220.8</b>	<b>26</b>	<b>43.7</b>	<b>26</b>	<b>79.7</b>	<b>32</b>	<b>43.3</b>	<b>28</b>	<b>51.4</b>

### ZOO NOSES

Brucellosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Dengue	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Ehrlichiosis/Anaplasmosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia chaffeensis</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
LaCrosse Virus Disease*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Lyme Disease	0	0.0	1	3.5	1	2.6	1	1.7	0	0.0	0	0.0	1	1.8
Malaria	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Rabies, Animal*	0	n/a	1	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Rocky Mountain Spotted Fever (RMSF)	0	0.0	0	0.0	0	0.0	0	0.0	5	15.3	0	0.0	0	0.0
Tularemia	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhus Fever, Murine	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
West Nile Virus Infection*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>0</b>	<b>0.0</b>	<b>2</b>	<b>3.5</b>	<b>1</b>	<b>2.6</b>	<b>1</b>	<b>1.7</b>	<b>5</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>1</b>	<b>1.8</b>

<b>GRAND TOTAL</b>	<b>75</b>	<b>181.0</b>	<b>32</b>	<b>102.7</b>	<b>103</b>	<b>261.9</b>	<b>94</b>	<b>158.0</b>	<b>71</b>	<b>214.5</b>	<b>131</b>	<b>175.9</b>	<b>102</b>	<b>185.3</b>
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<b>POPULATION</b>	<b>40,875</b>	<b>28,241</b>	<b>38,943</b>	<b>59,487</b>	<b>32,641</b>	<b>73,894</b>	<b>54,500</b>
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

GENERAL INFECTIOUS DISEASES	Lake		Lawrence		Licking		Logan		Lorain		Lucas		Madison	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Botulism	0	0.0	1	1.6	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Foodborne	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Infant*	0	*	1	*	0	*	0	*	0	*	0	*	0	*
Campylobacteriosis	31	13.6	8	12.8	19	13.1	5	10.9	32	11.2	80	17.6	4	9.9
Coccidioidomycosis*	1	0.4	0	0.0	1	0.7	0	0.0	0	0.0	1	0.2	0	0.0
Creutzfeldt-Jakob Disease (CJD)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Cryptosporidiosis	3	1.3	1	1.6	5	3.4	0	0.0	21	7.4	26	5.7	1	2.5
Cytomegalovirus (CMV), Congenital*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
<i>Escherichia coli</i> , Shiga Toxin-Producing	0	0.0	1	1.6	0	0.0	0	0.0	3	1.1	4	0.9	0	0.0
O157:H7	0	0.0	1	1.6	0	0.0	0	0.0	3	1.1	1	0.2	0	0.0
Not O157:H7	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	2	0.4	0	0.0
Unknown Serotype	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.2	0	0.0
Giardiasis	15	6.6	4	6.4	9	6.2	4	8.7	15	5.3	8	1.8	0	0.0
<i>Haemophilus influenzae</i> , Invasive Disease	3	1.3	2	3.2	1	0.7	0	0.0	0	0.0	11	2.4	1	2.5
Hemolytic Uremic Syndrome (HUS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Legionellosis	1	0.4	0	0.0	3	2.1	1	2.2	1	0.4	11	2.4	1	2.5
Leprosy (Hansen's Disease)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Listeriosis	1	0.4	1	1.6	0	0.0	0	0.0	0	0.0	3	0.7	0	0.0
Meningitis, Aseptic	6	2.6	2	3.2	12	8.2	3	6.5	9	3.2	46	10.1	4	9.9
Meningitis, Other Bacterial*	0	0.0	0	0.0	1	0.7	2	4.3	1	0.4	2	0.4	0	0.0
Meningococcal Disease	1	0.4	0	0.0	1	0.7	0	0.0	0	0.0	1	0.2	0	0.0
Salmonellosis	32	14.1	9	14.4	24	16.5	4	8.7	37	13.0	40	8.8	6	14.9
Shigellosis	5	2.2	4	6.4	7	4.8	0	0.0	39	13.7	16	3.5	2	5.0
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcal Disease, Group A, Invasive	1	0.4	1	1.6	3	2.1	2	4.3	3	1.1	7	1.5	0	0.0
Streptococcal Disease, Group B, in Newborn*	3	*	1	*	1	*	0	*	0	*	7	*	0	*
Streptococcal Toxic Shock Syndrome (STSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.2	0	0.0
<i>Streptococcus pneumoniae</i> , Invasive Disease	19	8.4	9	14.4	28	19.2	8	17.4	15	5.3	76	16.7	3	7.5
Ages < 5 Years*	3	*	1	*	2	*	2	*	2	*	11	*	0	*
Drug Resistant, Ages 5+ Years*	4	*	1	*	12	*	0	*	2	*	19	*	0	*
Drug Susceptible, Ages 5+ Years*	12	*	7	*	14	*	6	*	11	*	46	*	3	*
Toxic Shock Syndrome (TSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhoid Fever	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.2	0	0.0
Vibriosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Other (Not Cholera)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Yersiniosis	2	0.9	0	0.0	2	1.4	0	0.0	0	0.0	4	0.9	0	0.0
<b>SUB-TOTAL</b>	<b>124</b>	<b>54.5</b>	<b>44</b>	<b>70.6</b>	<b>117</b>	<b>80.4</b>	<b>29</b>	<b>63.0</b>	<b>176</b>	<b>61.8</b>	<b>345</b>	<b>75.8</b>	<b>22</b>	<b>54.7</b>

## HEPATITIS

Hepatitis A	0	0.0	0	0.0	1	0.7	0	0.0	1	0.4	1	0.2	0	0.0
Hepatitis B*	18	7.9	3	4.8	20	13.7	1	2.2	57	20.0	68	14.9	16	39.8
Acute*	1	0.4	0	0.0	4	2.7	0	0.0	15	5.3	6	1.3	0	0.0
Chronic*	17	7.5	3	4.8	16	11.0	1	2.2	42	14.8	62	13.6	16	39.8
Hepatitis C*	123	54.1	49	78.6	97	66.7	16	34.8	1,062	373.1	165	36.3	143	355.6
Acute*	1	0.4	4	6.4	0	0.0	0	0.0	2	0.7	0	0.0	0	0.0
Past or Present*	122	53.6	45	72.2	97	66.7	16	34.8	1,060	372.4	165	36.3	143	355.6
<b>SUB-TOTAL</b>	<b>141</b>	<b>62.0</b>	<b>52</b>	<b>83.4</b>	<b>118</b>	<b>81.1</b>	<b>17</b>	<b>37.0</b>	<b>1,120</b>	<b>393.4</b>	<b>234</b>	<b>51.4</b>	<b>159</b>	<b>395.4</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

OUTBREAKS*	Lake		Lawrence		Licking		Logan		Lorain		Lucas		Madison	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Community*	0	n/a	0	n/a	0	n/a	1	n/a	0	n/a	3	n/a	1	n/a
Foodborne*	3	n/a	0	n/a	0	n/a	1	n/a	0	n/a	1	n/a	0	n/a
Healthcare-Associated*	1	n/a	0	n/a	0	n/a	1	n/a	0	n/a	0	n/a	0	n/a
Institutional*	0	n/a	0	n/a	0	n/a	0	n/a	1	n/a	1	n/a	2	n/a
Waterborne*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Zoonotic*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
<b>SUB-TOTAL</b>	<b>4</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>3</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>5</b>	<b>n/a</b>	<b>3</b>	<b>n/a</b>

### VACCINE-PREVENTABLE

Influenza-Associated Hospitalization*	51	22.4	37	59.4	55	37.8	4	8.7	69	24.2	151	33.2	6	14.9
Influenza-Associated Pediatric Mortality*	0	*	0	*	1	*	0	*	0	*	0	*	0	*
Influenza A Virus, Novel Human Infection*	1	0.4	3	4.8	3	2.1	2	4.3	5	1.8	8	1.8	0	0.0
Measles	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Indigenous	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Mumps	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Pertussis	4	1.8	1	1.6	116	79.7	2	4.3	1	0.4	7	1.5	15	37.3
Tetanus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Varicella*	23	10.1	4	6.4	33	22.7	3	6.5	24	8.4	19	4.2	15	37.3
<b>SUB-TOTAL</b>	<b>79</b>	<b>34.7</b>	<b>45</b>	<b>72.2</b>	<b>208</b>	<b>143.0</b>	<b>11</b>	<b>23.9</b>	<b>99</b>	<b>34.8</b>	<b>185</b>	<b>40.7</b>	<b>36</b>	<b>89.5</b>

### ZOO NOSES

Brucellosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Dengue	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Ehrlichiosis/Anaplasmosis	0	0.0	0	0.0	1	0.7	0	0.0	0	0.0	0	0.0	0	0.0
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia chaffeensis</i> *	0	0.0	0	0.0	1	0.7	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
LaCrosse Virus Disease*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Lyme Disease	0	0.0	0	0.0	1	0.7	0	0.0	0	0.0	0	0.0	0	0.0
Malaria	0	0.0	0	0.0	0	0.0	0	0.0	1	0.4	0	0.0	0	0.0
Rabies, Animal*	3	n/a	0	n/a	0	n/a	0	n/a	0	n/a	2	n/a	0	n/a
Rocky Mountain Spotted Fever (RMSF)	0	0.0	0	0.0	1	0.7	0	0.0	0	0.0	0	0.0	1	2.5
Tularemia	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhus Fever, Murine	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.2	0	0.0
West Nile Virus Infection*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.2	0	0.0
<b>SUB-TOTAL</b>	<b>3</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>3</b>	<b>2.1</b>	<b>0</b>	<b>0.0</b>	<b>1</b>	<b>0.4</b>	<b>4</b>	<b>0.4</b>	<b>1</b>	<b>2.5</b>

<b>GRAND TOTAL</b>	<b>351</b>	<b>151.2</b>	<b>141</b>	<b>226.3</b>	<b>446</b>	<b>306.5</b>	<b>60</b>	<b>123.9</b>	<b>1,397</b>	<b>490.4</b>	<b>773</b>	<b>168.3</b>	<b>221</b>	<b>542.1</b>
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<b>POPULATION</b>	<b>227,511</b>	<b>62,319</b>	<b>145,491</b>	<b>46,005</b>	<b>284,664</b>	<b>455,054</b>	<b>40,213</b>
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

GENERAL INFECTIOUS DISEASES	Mahoning		Marion		Medina		Meigs		Mercer		Miami		Monroe	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	0	0.0	0	0.0	1	0.7	0	0.0	0	0.0	0	0.0	0	0.0
Botulism	2	0.8	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Foodborne	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Infant*	2	*	0	*	0	*	0	*	0	*	0	*	0	*
Campylobacteriosis	12	4.7	14	21.1	15	9.9	0	0.0	48	117.3	16	16.2	1	6.6
Coccidioidomycosis*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	1.0	0	0.0
Creutzfeldt-Jakob Disease (CJD)	1	0.4	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Cryptosporidiosis	2	0.8	7	10.6	3	2.0	0	0.0	41	100.2	2	2.0	0	0.0
Cytomegalovirus (CMV), Congenital*	0	*	0	*	0	*	0	*	0	*	1	*	0	*
<i>Escherichia coli</i> , Shiga Toxin-Producing	1	0.4	0	0.0	3	2.0	0	0.0	4	9.8	0	0.0	0	0.0
O157:H7	0	0.0	0	0.0	3	2.0	0	0.0	3	7.3	0	0.0	0	0.0
Not O157:H7	1	0.4	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Unknown Serotype	0	0.0	0	0.0	0	0.0	0	0.0	1	2.4	0	0.0	0	0.0
Giardiasis	3	1.2	3	4.5	8	5.3	2	8.7	4	9.8	7	7.1	2	13.2
<i>Haemophilus influenzae</i> , Invasive Disease	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	2	2.0	0	0.0
Hemolytic Uremic Syndrome (HUS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Legionellosis	12	4.7	1	1.5	3	2.0	0	0.0	1	2.4	1	1.0	0	0.0
Leprosy (Hansen's Disease)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Listeriosis	0	0.0	0	0.0	1	0.7	0	0.0	0	0.0	0	0.0	0	0.0
Meningitis, Aseptic	22	8.5	7	10.6	8	5.3	3	13.0	0	0.0	1	1.0	0	0.0
Meningitis, Other Bacterial*	3	1.2	0	0.0	0	0.0	0	0.0	0	0.0	1	1.0	0	0.0
Meningococcal Disease	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Salmonellosis	30	11.6	9	13.6	45	29.8	1	4.3	10	24.4	9	9.1	1	6.6
Shigellosis	13	5.0	2	3.0	4	2.6	0	0.0	8	19.5	0	0.0	0	0.0
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcal Disease, Group A, Invasive	10	3.9	0	0.0	2	1.3	0	0.0	1	2.4	3	3.0	0	0.0
Streptococcal Disease, Group B, in Newborn*	2	*	0	*	0	*	0	*	1	*	0	*	0	*
Streptococcal Toxic Shock Syndrome (STSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	1.0	0	0.0
<i>Streptococcus pneumoniae</i> , Invasive Disease	43	16.7	3	4.5	8	5.3	0	0.0	3	7.3	17	17.2	2	13.2
Ages < 5 Years*	2	*	0	*	2	*	0	*	0	*	0	*	1	*
Drug Resistant, Ages 5+ Years*	15	*	0	*	4	*	0	*	0	*	7	*	0	*
Drug Susceptible, Ages 5+ Years*	26	*	3	*	2	*	0	*	3	*	10	*	1	*
Toxic Shock Syndrome (TSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	1.0	0	0.0
Typhoid Fever	0	0.0	0	0.0	1	0.7	0	0.0	0	0.0	0	0.0	0	0.0
Vibriosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Other (Not Cholera)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Yersiniosis	1	0.4	0	0.0	2	1.3	0	0.0	0	0.0	2	2.0	0	0.0
<b>SUB-TOTAL</b>	<b>157</b>	<b>61.0</b>	<b>46</b>	<b>69.5</b>	<b>104</b>	<b>68.8</b>	<b>6</b>	<b>26.0</b>	<b>121</b>	<b>295.7</b>	<b>65</b>	<b>65.7</b>	<b>6</b>	<b>39.5</b>

## HEPATITIS

Hepatitis A	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Hepatitis B*	13	5.0	16	24.2	8	5.3	1	4.3	1	2.4	7	7.1	0	0.0
Acute*	4	1.6	2	3.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Chronic*	9	3.5	14	21.1	8	5.3	1	4.3	1	2.4	7	7.1	0	0.0
Hepatitis C*	97	37.7	122	184.2	46	30.4	7	30.3	4	9.8	45	45.5	3	19.8
Acute*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Past or Present*	97	37.7	122	184.2	46	30.4	7	30.3	4	9.8	45	45.5	3	19.8
<b>SUB-TOTAL</b>	<b>110</b>	<b>42.7</b>	<b>138</b>	<b>208.4</b>	<b>54</b>	<b>35.7</b>	<b>8</b>	<b>34.7</b>	<b>5</b>	<b>12.2</b>	<b>52</b>	<b>52.6</b>	<b>3</b>	<b>19.8</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

OUTBREAKS*	Mahoning		Marion		Medina		Meigs		Mercer		Miami		Monroe	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Community*	1	n/a	0	n/a	1	n/a	0	n/a	3	n/a	0	n/a	0	n/a
Foodborne*	6	n/a	0	n/a	3	n/a	0	n/a	1	n/a	1	n/a	0	n/a
Healthcare-Associated*	0	n/a	0	n/a	4	n/a	1	n/a	0	n/a	0	n/a	0	n/a
Institutional*	0	n/a	2	n/a	1	n/a	0	n/a	0	n/a	1	n/a	0	n/a
Waterborne*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Zoonotic*	0	n/a	0	n/a	1	n/a	0	n/a	0	n/a	0	n/a	0	n/a
<b>SUB-TOTAL</b>	<b>7</b>	<b>n/a</b>	<b>2</b>	<b>n/a</b>	<b>10</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>4</b>	<b>n/a</b>	<b>2</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>

### VACCINE-PREVENTABLE

Influenza-Associated Hospitalization*	76	29.5	17	25.7	33	21.8	12	52.0	8	19.5	26	26.3	2	13.2
Influenza-Associated Pediatric Mortality*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
Influenza A Virus, Novel Human Infection*	7	2.7	0	0.0	1	0.7	0	0.0	1	2.4	0	0.0	0	0.0
Measles	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Indigenous	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Mumps	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Pertussis	8	3.1	8	12.1	3	2.0	0	0.0	4	9.8	1	1.0	1	6.6
Tetanus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Varicella*	9	3.5	11	16.6	39	25.8	3	13.0	10	24.4	44	44.5	0	0.0
<b>SUB-TOTAL</b>	<b>100</b>	<b>38.8</b>	<b>36</b>	<b>54.4</b>	<b>76</b>	<b>50.3</b>	<b>15</b>	<b>65.0</b>	<b>23</b>	<b>56.2</b>	<b>71</b>	<b>71.8</b>	<b>3</b>	<b>19.8</b>

### ZOO NOSES

Brucellosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Dengue	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Ehrlichiosis/Anaplasmosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia chaffeensis</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
LaCrosse Virus Disease*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Lyme Disease	4	1.6	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Malaria	0	0.0	0	0.0	1	0.7	0	0.0	0	0.0	0	0.0	0	0.0
Rabies, Animal*	1	n/a	1	n/a	1	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Rocky Mountain Spotted Fever (RMSF)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Tularemia	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhus Fever, Murine	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
West Nile Virus Infection*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>5</b>	<b>1.6</b>	<b>1</b>	<b>0.0</b>	<b>2</b>	<b>0.7</b>	<b>0</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>

<b>GRAND TOTAL</b>	<b>379</b>	<b>144.0</b>	<b>223</b>	<b>332.2</b>	<b>246</b>	<b>155.5</b>	<b>30</b>	<b>125.7</b>	<b>153</b>	<b>364.1</b>	<b>190</b>	<b>190.2</b>	<b>12</b>	<b>79.1</b>
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<b>POPULATION</b>	<b>257,555</b>	<b>66,217</b>	<b>151,095</b>	<b>23,072</b>	<b>40,924</b>	<b>98,868</b>	<b>15,180</b>
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

GENERAL INFECTIOUS DISEASES	Montgomery		Morgan		Morrow		Muskingum		Noble		Ottawa		Paulding	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	0	0.0	0	0.0	0	0.0	2	2.4	0	0.0	0	0.0	0	0.0
Botulism	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Foodborne	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Infant*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
Campylobacteriosis	50	8.9	2	13.4	3	9.5	10	11.8	1	7.1	3	7.3	6	29.6
Coccidioidomycosis*	2	0.4	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Creutzfeldt-Jakob Disease (CJD)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Cryptosporidiosis	6	1.1	0	0.0	2	6.3	0	0.0	1	7.1	0	0.0	2	9.9
Cytomegalovirus (CMV), Congenital*	3	*	0	*	0	*	0	*	0	*	0	*	0	*
<i>Escherichia coli</i> , Shiga Toxin-Producing	6	1.1	1	6.7	0	0.0	0	0.0	0	0.0	0	0.0	1	4.9
O157:H7	4	0.7	1	6.7	0	0.0	0	0.0	0	0.0	0	0.0	1	4.9
Not O157:H7	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Unknown Serotype	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Giardiasis	28	5.0	0	0.0	0	0.0	9	10.6	0	0.0	0	0.0	4	19.7
<i>Haemophilus influenzae</i> , Invasive Disease	11	2.0	0	0.0	0	0.0	2	2.4	0	0.0	0	0.0	0	0.0
Hemolytic Uremic Syndrome (HUS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Legionellosis	5	0.9	0	0.0	2	6.3	4	4.7	0	0.0	0	0.0	0	0.0
Leprosy (Hansen's Disease)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Listeriosis	2	0.4	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Meningitis, Aseptic	54	9.7	3	20.1	1	3.2	4	4.7	1	7.1	0	0.0	1	4.9
Meningitis, Other Bacterial*	9	1.6	0	0.0	0	0.0	1	1.2	0	0.0	0	0.0	1	4.9
Meningococcal Disease	1	0.2	1	6.7	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Salmonellosis	38	6.8	0	0.0	4	12.6	14	16.6	1	7.1	5	12.2	3	14.8
Shigellosis	25	4.5	0	0.0	5	15.8	13	15.4	0	0.0	2	4.9	0	0.0
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcal Disease, Group A, Invasive	10	1.8	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcal Disease, Group B, in Newborn*	4	*	0	*	0	*	0	*	0	*	0	*	0	*
Streptococcal Toxic Shock Syndrome (STSS)	2	0.4	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Streptococcus pneumoniae</i> , Invasive Disease	81	14.5	2	13.4	5	15.8	12	14.2	2	14.2	1	2.4	1	4.9
Ages < 5 Years*	11	*	0	*	1	*	3	*	0	*	1	*	0	*
Drug Resistant, Ages 5+ Years*	21	*	0	*	0	*	0	*	0	*	0	*	0	*
Drug Susceptible, Ages 5+ Years*	49	*	2	*	4	*	9	*	2	*	0	*	1	*
Toxic Shock Syndrome (TSS)	0	0.0	0	0.0	0	0.0	1	1.2	0	0.0	0	0.0	0	0.0
Typhoid Fever	2	0.4	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Vibriosis	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Other (Not Cholera)	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Yersiniosis	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0	1	2.4	0	0.0
<b>SUB-TOTAL</b>	<b>342</b>	<b>61.2</b>	<b>9</b>	<b>60.4</b>	<b>22</b>	<b>69.6</b>	<b>72</b>	<b>85.1</b>	<b>6</b>	<b>42.7</b>	<b>12</b>	<b>29.3</b>	<b>19</b>	<b>93.6</b>

## HEPATITIS

Hepatitis A	0	0.0	0	0.0	1	3.2	0	0.0	0	0.0	0	0.0	0	0.0
Hepatitis B*	117	20.9	0	0.0	2	6.3	6	7.1	1	7.1	2	4.9	3	14.8
Acute*	11	2.0	0	0.0	0	0.0	1	1.2	0	0.0	0	0.0	0	0.0
Chronic*	106	19.0	0	0.0	2	6.3	5	5.9	1	7.1	2	4.9	3	14.8
Hepatitis C*	426	76.2	2	13.4	10	31.6	13	15.4	15	106.7	14	34.2	5	24.6
Acute*	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Past or Present*	425	76.0	2	13.4	10	31.6	13	15.4	15	106.7	14	34.2	5	24.6
<b>SUB-TOTAL</b>	<b>543</b>	<b>97.1</b>	<b>2</b>	<b>13.4</b>	<b>13</b>	<b>41.1</b>	<b>19</b>	<b>22.5</b>	<b>16</b>	<b>113.8</b>	<b>16</b>	<b>39.0</b>	<b>8</b>	<b>39.4</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

OUTBREAKS*	Montgomery		Morgan		Morrow		Muskingum		Noble		Ottawa		Paulding	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Community*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Foodborne*	1	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Healthcare-Associated*	4	n/a	1	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Institutional*	2	n/a	0	n/a	0	n/a	1	n/a	0	n/a	0	n/a	0	n/a
Waterborne*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Zoonotic*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
<b>SUB-TOTAL</b>	<b>7</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>

### VACCINE-PREVENTABLE

Influenza-Associated Hospitalization*	222	39.7	4	26.9	8	25.3	18	21.3	1	7.1	4	9.8	3	14.8
Influenza-Associated Pediatric Mortality*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
Influenza A Virus, Novel Human Infection*	8	1.4	0	0.0	0	0.0	0	0.0	0	0.0	2	4.9	0	0.0
Measles	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Indigenous	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Mumps	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	2.4	0	0.0
Pertussis	30	5.4	0	0.0	0	0.0	88	104.0	0	0.0	0	0.0	0	0.0
Tetanus	0	0.0	0	0.0	0	0.0	1	1.2	0	0.0	0	0.0	0	0.0
Varicella*	49	8.8	5	33.6	5	15.8	12	14.2	1	7.1	3	7.3	17	83.8
<b>SUB-TOTAL</b>	<b>309</b>	<b>55.3</b>	<b>9</b>	<b>60.4</b>	<b>13</b>	<b>41.1</b>	<b>119</b>	<b>140.7</b>	<b>2</b>	<b>14.2</b>	<b>10</b>	<b>24.4</b>	<b>20</b>	<b>98.6</b>

### ZOO NOSES

Brucellosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Dengue	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Ehrlichiosis/Anaplasmosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	4.9
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia chaffeensis</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	4.9
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
LaCrosse Virus Disease*	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Lyme Disease	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Malaria	2	0.4	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Rabies, Animal*	2	n/a	0	n/a	0	n/a	2	n/a	0	n/a	0	n/a	0	n/a
Rocky Mountain Spotted Fever (RMSF)	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Tularemia	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhus Fever, Murine	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
West Nile Virus Infection*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>7</b>	<b>0.9</b>	<b>0</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>2</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>1</b>	<b>4.9</b>

<b>GRAND TOTAL</b>	<b>1,208</b>	<b>214.5</b>	<b>21</b>	<b>134.3</b>	<b>48</b>	<b>151.8</b>	<b>213</b>	<b>248.3</b>	<b>24</b>	<b>170.7</b>	<b>38</b>	<b>92.7</b>	<b>48</b>	<b>236.5</b>
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<b>POPULATION</b>	<b>559,062</b>	<b>14,897</b>	<b>31,628</b>	<b>84,585</b>	<b>14,058</b>	<b>40,985</b>	<b>20,293</b>
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

GENERAL INFECTIOUS DISEASES	Perry		Pickaway		Pike		Portage		Preble		Putnam		Richland	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	1	2.9	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Botulism	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Foodborne	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Infant*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
Campylobacteriosis	3	8.8	4	7.6	6	21.7	12	7.9	7	16.5	6	17.3	10	7.8
Coccidioidomycosis*	0	0.0	0	0.0	0	0.0	1	0.7	0	0.0	0	0.0	0	0.0
Creutzfeldt-Jakob Disease (CJD)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Cryptosporidiosis	0	0.0	0	0.0	1	3.6	6	3.9	1	2.4	1	2.9	3	2.3
Cytomegalovirus (CMV), Congenital*	0	*	0	*	0	*	0	*	1	*	0	*	0	*
<i>Escherichia coli</i> , Shiga Toxin-Producing	0	0.0	1	1.9	0	0.0	1	0.7	4	9.4	0	0.0	0	0.0
O157:H7	0	0.0	1	1.9	0	0.0	0	0.0	2	4.7	0	0.0	0	0.0
Not O157:H7	0	0.0	0	0.0	0	0.0	1	0.7	2	4.7	0	0.0	0	0.0
Unknown Serotype	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Giardiasis	1	2.9	2	3.8	0	0.0	5	3.3	0	0.0	1	2.9	11	8.5
<i>Haemophilus influenzae</i> , Invasive Disease	0	0.0	0	0.0	0	0.0	2	1.3	0	0.0	0	0.0	0	0.0
Hemolytic Uremic Syndrome (HUS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Legionellosis	0	0.0	1	1.9	0	0.0	6	3.9	1	2.4	0	0.0	2	1.6
Leprosy (Hansen's Disease)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Listeriosis	0	0.0	0	0.0	0	0.0	0	0.0	1	2.4	0	0.0	0	0.0
Meningitis, Aseptic	5	14.7	4	7.6	1	3.6	5	3.3	2	4.7	4	11.5	5	3.9
Meningitis, Other Bacterial*	0	0.0	1	1.9	1	3.6	0	0.0	2	4.7	0	0.0	0	0.0
Meningococcal Disease	0	0.0	0	0.0	0	0.0	1	0.7	0	0.0	0	0.0	0	0.0
Salmonellosis	7	20.5	4	7.6	2	7.2	22	14.5	2	4.7	4	11.5	12	9.3
Shigellosis	2	5.9	2	3.8	3	10.8	24	15.8	2	4.7	1	2.9	14	10.9
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcal Disease, Group A, Invasive	1	2.9	0	0.0	0	0.0	1	0.7	1	2.4	1	2.9	1	0.8
Streptococcal Disease, Group B, in Newborn*	0	*	0	*	1	*	0	*	0	*	0	*	2	*
Streptococcal Toxic Shock Syndrome (STSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Streptococcus pneumoniae</i> , Invasive Disease	2	5.9	13	24.7	2	7.2	20	13.2	3	7.1	3	8.6	14	10.9
Ages < 5 Years*	0	*	0	*	0	*	1	*	0	*	0	*	0	*
Drug Resistant, Ages 5+ Years*	0	*	4	*	0	*	3	*	1	*	0	*	0	*
Drug Susceptible, Ages 5+ Years*	2	*	9	*	2	*	16	*	2	*	3	*	14	*
Toxic Shock Syndrome (TSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhoid Fever	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Vibriosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Other (Not Cholera)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Yersiniosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>22</b>	<b>64.6</b>	<b>32</b>	<b>60.7</b>	<b>17</b>	<b>61.4</b>	<b>106</b>	<b>69.7</b>	<b>27</b>	<b>63.8</b>	<b>21</b>	<b>60.5</b>	<b>74</b>	<b>57.4</b>

## HEPATITIS

Hepatitis A	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.8
Hepatitis B*	2	5.9	30	56.9	2	7.2	11	7.2	3	7.1	2	5.8	17	13.2
Acute*	0	0.0	3	5.7	1	3.6	3	2.0	0	0.0	2	5.8	1	0.8
Chronic*	2	5.9	27	51.2	1	3.6	8	5.3	3	7.1	0	0.0	16	12.4
Hepatitis C*	7	20.5	1,435	2,721.6	41	148.0	46	30.3	13	30.7	4	11.5	135	104.8
Acute*	1	2.9	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Past or Present*	6	17.6	1,435	2,721.6	41	148.0	46	30.3	13	30.7	4	11.5	135	104.8
<b>SUB-TOTAL</b>	<b>9</b>	<b>26.4</b>	<b>1,465</b>	<b>2,778.5</b>	<b>43</b>	<b>155.3</b>	<b>57</b>	<b>37.5</b>	<b>16</b>	<b>37.8</b>	<b>6</b>	<b>17.3</b>	<b>153</b>	<b>118.7</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).



# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

OUTBREAKS*	Perry		Pickaway		Pike		Portage		Preble		Putnam		Richland	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Community*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Foodborne*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Healthcare-Associated*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Institutional*	0	n/a	0	n/a	0	n/a	1	n/a	0	n/a	1	n/a	0	n/a
Waterborne*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Zoonotic*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
<b>SUB-TOTAL</b>	<b>0</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>

VACCINE-PREVENTABLE														
Influenza-Associated Hospitalization*	3	8.8	16	30.3	18	65.0	21	13.8	5	11.8	6	17.3	21	16.3
Influenza-Associated Pediatric Mortality*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
Influenza A Virus, Novel Human Infection*	0	0.0	0	0.0	0	0.0	1	0.7	1	2.4	0	0.0	2	1.6
Measles	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Indigenous	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Mumps	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Pertussis	7	20.5	13	24.7	6	21.7	0	0.0	1	2.4	2	5.8	11	8.5
Tetanus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Varicella*	4	11.7	18	34.1	13	46.9	25	16.4	15	35.4	12	34.6	29	22.5
<b>SUB-TOTAL</b>	<b>14</b>	<b>41.1</b>	<b>47</b>	<b>89.1</b>	<b>37</b>	<b>133.6</b>	<b>47</b>	<b>30.9</b>	<b>22</b>	<b>52.0</b>	<b>20</b>	<b>57.6</b>	<b>63</b>	<b>48.9</b>

ZOO NOSES														
Brucellosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Dengue	1	2.9	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Ehrlichiosis/Anaplasmosis	0	0.0	0	0.0	1	3.6	0	0.0	0	0.0	0	0.0	0	0.0
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia chaffeensis</i> *	0	0.0	0	0.0	1	3.6	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
LaCrosse Virus Disease*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Lyme Disease	1	2.9	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.8
Malaria	0	0.0	0	0.0	0	0.0	1	0.7	0	0.0	0	0.0	0	0.0
Rabies, Animal*	1	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Rocky Mountain Spotted Fever (RMSF)	0	0.0	1	1.9	2	7.2	0	0.0	0	0.0	0	0.0	0	0.0
Tularemia	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhus Fever, Murine	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
West Nile Virus Infection*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>3</b>	<b>5.9</b>	<b>1</b>	<b>1.9</b>	<b>3</b>	<b>10.8</b>	<b>1</b>	<b>0.7</b>	<b>0</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>1</b>	<b>0.8</b>

<b>GRAND TOTAL</b>	<b>48</b>	<b>137.9</b>	<b>1,545</b>	<b>2,930.2</b>	<b>100</b>	<b>361.1</b>	<b>212</b>	<b>138.8</b>	<b>65</b>	<b>153.5</b>	<b>48</b>	<b>135.3</b>	<b>291</b>	<b>225.8</b>
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<b>POPULATION</b>	<b>34,078</b>	<b>52,727</b>	<b>27,695</b>	<b>152,061</b>	<b>42,337</b>	<b>34,726</b>	<b>128,852</b>
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

GENERAL INFECTIOUS DISEASES	Ross		Sandusky		Scioto		Seneca		Shelby		Stark		Summit	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	2	0.4
Botulism	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.2
Foodborne	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Infant*	0	*	0	*	0	*	0	*	0	*	0	*	1	*
Campylobacteriosis	7	9.5	14	22.7	7	8.8	7	11.9	10	20.9	55	14.5	46	8.5
Coccidioidomycosis*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Creutzfeldt-Jakob Disease (CJD)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.3	0	0.0
Cryptosporidiosis	6	8.2	12	19.4	0	0.0	3	5.1	4	8.3	17	4.5	9	1.7
Cytomegalovirus (CMV), Congenital*	0	*	0	*	0	*	0	*	0	*	1	*	1	*
Escherichia coli , Shiga Toxin-Producing	0	0.0	2	3.2	1	1.3	0	0.0	2	4.2	7	1.9	3	0.6
O157:H7	0	0.0	0	0.0	1	1.3	0	0.0	2	4.2	4	1.1	1	0.2
Not O157:H7	0	0.0	1	1.6	0	0.0	0	0.0	0	0.0	3	0.8	2	0.4
Unknown Serotype	0	0.0	1	1.6	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Giardiasis	4	5.5	3	4.9	1	1.3	1	1.7	2	4.2	53	14.0	55	10.1
Haemophilus influenzae , Invasive Disease	0	0.0	0	0.0	2	2.5	1	1.7	1	2.1	8	2.1	4	0.7
Hemolytic Uremic Syndrome (HUS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Legionellosis	1	1.4	2	3.2	3	3.8	1	1.7	1	2.1	19	5.0	14	2.6
Leprosy (Hansen's Disease)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.2
Listeriosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	4	1.1	1	0.2
Meningitis, Aseptic	7	9.5	1	1.6	6	7.6	1	1.7	1	2.1	23	6.1	48	8.8
Meningitis, Other Bacterial*	2	2.7	2	3.2	0	0.0	0	0.0	0	0.0	4	1.1	3	0.6
Meningococcal Disease	1	1.4	0	0.0	2	2.5	0	0.0	0	0.0	0	0.0	4	0.7
Salmonellosis	2	2.7	13	21.0	6	7.6	12	20.4	5	10.4	36	9.5	77	14.2
Shigellosis	1	1.4	2	3.2	1	1.3	1	1.7	0	0.0	27	7.1	94	17.3
Staphylococcus aureus , Intermediate Resistance to Vancomycin (VISA)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcal Disease, Group A, Invasive	2	2.7	0	0.0	2	2.5	1	1.7	3	6.3	6	1.6	10	1.8
Streptococcal Disease, Group B, in Newborn*	0	*	1	*	0	*	0	*	0	*	5	*	1	*
Streptococcal Toxic Shock Syndrome (STSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcus pneumoniae , Invasive Disease	12	16.4	9	14.6	2	2.5	7	11.9	12	25.0	48	12.7	72	13.3
Ages < 5 Years*	1	*	0	*	1	*	0	*	1	*	1	*	6	*
Drug Resistant, Ages 5+ Years*	7	*	5	*	0	*	2	*	4	*	15	*	15	*
Drug Susceptible, Ages 5+ Years*	4	*	4	*	1	*	5	*	7	*	32	*	51	*
Toxic Shock Syndrome (TSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhoid Fever	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Vibriosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	2	0.4
Other (Not Cholera)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	2	0.4
Yersiniosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	3	0.6
<b>SUB-TOTAL</b>	<b>45</b>	<b>61.4</b>	<b>61</b>	<b>98.7</b>	<b>33</b>	<b>41.7</b>	<b>35</b>	<b>59.6</b>	<b>41</b>	<b>85.6</b>	<b>314</b>	<b>83.0</b>	<b>451</b>	<b>83.1</b>

## HEPATITIS

Hepatitis A	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.3	0	0.0
Hepatitis B*	13	17.7	7	11.3	30	37.9	1	1.7	2	4.2	34	9.0	93	17.1
Acute*	0	0.0	0	0.0	8	10.1	0	0.0	0	0.0	1	0.3	18	3.3
Chronic*	13	17.7	7	11.3	22	27.8	1	1.7	2	4.2	33	8.7	75	13.8
Hepatitis C*	149	203.1	34	55.0	234	295.5	20	34.1	25	52.2	192	50.8	315	58.0
Acute*	1	1.4	0	0.0	0	0.0	0	0.0	1	2.1	3	0.8	3	0.6
Past or Present*	148	201.8	34	55.0	234	295.5	20	34.1	24	50.1	189	50.0	312	57.5
<b>SUB-TOTAL</b>	<b>162</b>	<b>220.9</b>	<b>41</b>	<b>66.4</b>	<b>264</b>	<b>333.4</b>	<b>21</b>	<b>35.8</b>	<b>27</b>	<b>56.4</b>	<b>227</b>	<b>60.0</b>	<b>408</b>	<b>75.2</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

OUTBREAKS*	Ross		Sandusky		Scioto		Seneca		Shelby		Stark		Summit	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Community*	0	n/a	1	n/a	0	n/a	0	n/a	0	n/a	1	n/a	0	n/a
Foodborne*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	1	n/a
Healthcare-Associated*	1	n/a	1	n/a	0	n/a	0	n/a	0	n/a	2	n/a	4	n/a
Institutional*	0	n/a	1	n/a	1	n/a	0	n/a	0	n/a	0	n/a	2	n/a
Waterborne*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Zoonotic*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
<b>SUB-TOTAL</b>	<b>1</b>	<b>n/a</b>	<b>3</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>3</b>	<b>n/a</b>	<b>7</b>	<b>n/a</b>

### VACCINE-PREVENTABLE

Influenza-Associated Hospitalization*	22	30.0	32	51.8	37	46.7	5	8.5	11	23.0	194	51.3	152	28.0
Influenza-Associated Pediatric Mortality*	0	*	0	*	0	*	0	*	0	*	0	*	2	*
Influenza A Virus, Novel Human Infection*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	2	0.5	14	2.6
Measles	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Indigenous	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Mumps	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Pertussis	15	20.5	1	1.6	8	10.1	0	0.0	0	0.0	36	9.5	17	3.1
Tetanus	0	0.0	0	0.0	1	1.3	0	0.0	0	0.0	0	0.0	0	0.0
Varicella*	9	12.3	15	24.3	37	46.7	4	6.8	34	71.0	60	15.9	80	14.7
<b>SUB-TOTAL</b>	<b>46</b>	<b>62.7</b>	<b>48</b>	<b>77.7</b>	<b>83</b>	<b>104.8</b>	<b>9</b>	<b>15.3</b>	<b>45</b>	<b>93.9</b>	<b>292</b>	<b>77.2</b>	<b>265</b>	<b>48.8</b>

### ZOO NOSES

Brucellosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Dengue	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Ehrlichiosis/Anaplasmosis	0	0.0	0	0.0	5	6.3	0	0.0	0	0.0	0	0.0	1	0.2
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	1	1.3	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia chaffeensis</i> *	0	0.0	0	0.0	4	5.1	0	0.0	0	0.0	0	0.0	1	0.2
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
LaCrosse Virus Disease*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Lyme Disease	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	4	1.1	4	0.7
Malaria	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	3	0.8	0	0.0
Rabies, Animal*	4	n/a	0	n/a	1	n/a	1	n/a	0	n/a	1	n/a	0	n/a
Rocky Mountain Spotted Fever (RMSF)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Tularemia	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhus Fever, Murine	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
West Nile Virus Infection*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>4</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>6</b>	<b>6.3</b>	<b>1</b>	<b>0.0</b>	<b>0</b>	<b>0.0</b>	<b>8</b>	<b>1.9</b>	<b>5</b>	<b>0.9</b>

<b>GRAND TOTAL</b>	<b>258</b>	<b>344.9</b>	<b>153</b>	<b>242.7</b>	<b>387</b>	<b>486.1</b>	<b>66</b>	<b>110.8</b>	<b>113</b>	<b>235.9</b>	<b>844</b>	<b>222.2</b>	<b>1,136</b>	<b>208.0</b>
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<b>POPULATION</b>	<b>73,345</b>	<b>61,792</b>	<b>79,195</b>	<b>58,683</b>	<b>47,910</b>	<b>378,098</b>	<b>542,899</b>
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

GENERAL INFECTIOUS DISEASES	Trumbull		Tuscarawas		Union		Van Wert		Vinton		Warren		Washington	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Botulism	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.6	0	0.0
Foodborne	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Infant*	0	*	0	*	0	*	0	*	0	*	1	*	0	*
Campylobacteriosis	20	8.9	5	5.5	5	12.2	6	20.2	0	0.0	20	12.6	10	15.8
Coccidioidomycosis*	0	0.0	1	1.1	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Creutzfeldt-Jakob Disease (CJD)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.6	0	0.0
Cryptosporidiosis	27	12.0	0	0.0	2	4.9	0	0.0	0	0.0	2	1.3	0	0.0
Cytomegalovirus (CMV), Congenital*	0	*	0	*	0	*	0	*	0	*	0	*	0	*
<i>Escherichia coli</i> , Shiga Toxin-Producing	1	0.4	0	0.0	0	0.0	1	3.4	0	0.0	2	1.3	2	3.2
O157:H7	0	0.0	0	0.0	0	0.0	1	3.4	0	0.0	1	0.6	1	1.6
Not O157:H7	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.6	1	1.6
Unknown Serotype	1	0.4	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Giardiasis	7	3.1	14	15.4	3	7.3	5	16.9	0	0.0	12	7.6	2	3.2
<i>Haemophilus influenzae</i> , Invasive Disease	2	0.9	0	0.0	0	0.0	0	0.0	0	0.0	2	1.3	0	0.0
Hemolytic Uremic Syndrome (HUS)	0	0.0	0	0.0	0	0.0	1	3.4	0	0.0	0	0.0	0	0.0
Legionellosis	0	0.0	4	4.4	3	7.3	0	0.0	0	0.0	2	1.3	0	0.0
Leprosy (Hansen's Disease)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Listeriosis	0	0.0	2	2.2	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Meningitis, Aseptic	10	4.4	5	5.5	2	4.9	3	10.1	0	0.0	17	10.7	1	1.6
Meningitis, Other Bacterial*	1	0.4	0	0.0	0	0.0	0	0.0	0	0.0	1	0.6	0	0.0
Meningococcal Disease	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.6	0	0.0
Salmonellosis	17	7.6	23	25.3	9	22.0	5	16.9	0	0.0	16	10.1	5	7.9
Shigellosis	17	7.6	2	2.2	2	4.9	0	0.0	0	0.0	4	2.5	0	0.0
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Streptococcal Disease, Group A, Invasive	4	1.8	0	0.0	1	2.4	0	0.0	0	0.0	4	2.5	0	0.0
Streptococcal Disease, Group B, in Newborn*	1	*	1	*	0	*	1	*	0	*	1	*	0	*
Streptococcal Toxic Shock Syndrome (STSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Streptococcus pneumoniae</i> , Invasive Disease	34	15.1	10	11.0	1	2.4	0	0.0	0	0.0	34	21.5	1	1.6
Ages < 5 Years*	3	*	1	*	0	*	0	*	0	*	2	*	0	*
Drug Resistant, Ages 5+ Years*	12	*	1	*	1	*	0	*	0	*	4	*	0	*
Drug Susceptible, Ages 5+ Years*	19	*	8	*	0	*	0	*	0	*	28	*	1	*
Toxic Shock Syndrome (TSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhoid Fever	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Vibriosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.6	0	0.0
Other (Not Cholera)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.6	0	0.0
Yersiniosis	0	0.0	2	2.2	2	4.9	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>141</b>	<b>62.6</b>	<b>69</b>	<b>75.9</b>	<b>30</b>	<b>73.3</b>	<b>22</b>	<b>74.2</b>	<b>0</b>	<b>0.0</b>	<b>121</b>	<b>76.4</b>	<b>21</b>	<b>33.2</b>

## HEPATITIS

Hepatitis A	0	0.0	0	0.0	0	0.0	1	3.4	0	0.0	1	0.6	0	0.0
Hepatitis B*	16	7.1	3	3.3	27	66.0	0	0.0	0	0.0	22	13.9	2	3.2
Acute*	8	3.6	0	0.0	3	7.3	0	0.0	0	0.0	3	1.9	0	0.0
Chronic*	8	3.6	3	3.3	24	58.7	0	0.0	0	0.0	19	12.0	2	3.2
Hepatitis C*	116	51.5	19	20.9	568	1,388.4	11	37.1	6	46.9	96	60.6	24	37.9
Acute*	2	0.9	0	0.0	5	12.2	1	3.4	1	7.8	0	0.0	1	1.6
Past or Present*	114	50.6	19	20.9	563	1,376.2	10	33.7	5	39.0	96	60.6	23	36.4
<b>SUB-TOTAL</b>	<b>132</b>	<b>58.6</b>	<b>22</b>	<b>24.2</b>	<b>595</b>	<b>1,454.4</b>	<b>12</b>	<b>40.5</b>	<b>6</b>	<b>46.9</b>	<b>119</b>	<b>75.1</b>	<b>26</b>	<b>41.1</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

OUTBREAKS*	Trumbull		Tuscarawas		Union		Van Wert		Vinton		Warren		Washington	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Community*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Foodborne*	0	n/a	0	n/a	1	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Healthcare-Associated*	1	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	1	n/a
Institutional*	0	n/a	0	n/a	1	n/a	1	n/a	0	n/a	0	n/a	0	n/a
Waterborne*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a
Zoonotic*	0	n/a	0	n/a	1	n/a	0	n/a	0	n/a	0	n/a	0	n/a
<b>SUB-TOTAL</b>	<b>1</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>3</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>1</b>	<b>n/a</b>

### VACCINE-PREVENTABLE

Influenza-Associated Hospitalization*	33	14.7	25	27.5	10	24.4	1	3.4	10	78.1	60	37.9	18	28.5
Influenza-Associated Pediatric Mortality*	0	*	0	*	0	*	0	*	0	*	1	*	0	*
Influenza A Virus, Novel Human Infection*	3	1.3	0	0.0	0	0.0	0	0.0	6	46.9	2	1.3	5	7.9
Measles	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.6	0	0.0
Indigenous	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	0.6	0	0.0
Mumps	0	0.0	0	0.0	1	2.4	0	0.0	0	0.0	0	0.0	0	0.0
Pertussis	28	12.4	2	2.2	14	34.2	2	6.7	1	7.8	21	13.3	0	0.0
Tetanus	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Varicella*	81	36.0	42	46.2	6	14.7	23	77.5	9	70.3	22	13.9	0	0.0
<b>SUB-TOTAL</b>	<b>145</b>	<b>64.4</b>	<b>69</b>	<b>75.9</b>	<b>31</b>	<b>75.8</b>	<b>26</b>	<b>87.7</b>	<b>26</b>	<b>203.0</b>	<b>107</b>	<b>67.6</b>	<b>23</b>	<b>36.4</b>

### ZOO NOSES

Brucellosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Dengue	1	0.4	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Ehrlichiosis/Anaplasmosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia chaffeensis</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
LaCrosse Virus Disease*	0	0.0	0	0.0	0	0.0	0	0.0	1	7.8	0	0.0	0	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Lyme Disease	1	0.4	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	1	1.6
Malaria	0	0.0	0	0.0	1	2.4	0	0.0	0	0.0	1	0.6	0	0.0
Rabies, Animal*	0	n/a	1	n/a	0	n/a	0	n/a	0	n/a	0	n/a	1	n/a
Rocky Mountain Spotted Fever (RMSF)	0	0.0	1	1.1	0	0.0	0	0.0	0	0.0	0	0.0	1	1.6
Tularemia	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Typhus Fever, Murine	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
West Nile Virus Infection*	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
<b>SUB-TOTAL</b>	<b>2</b>	<b>0.9</b>	<b>2</b>	<b>1.1</b>	<b>1</b>	<b>2.4</b>	<b>0</b>	<b>0.0</b>	<b>1</b>	<b>7.8</b>	<b>1</b>	<b>0.6</b>	<b>3</b>	<b>3.2</b>

<b>GRAND TOTAL</b>	<b>421</b>	<b>186.6</b>	<b>162</b>	<b>177.1</b>	<b>660</b>	<b>1,606.0</b>	<b>61</b>	<b>202.3</b>	<b>33</b>	<b>257.7</b>	<b>348</b>	<b>219.7</b>	<b>74</b>	<b>113.8</b>
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<b>POPULATION</b>	<b>225,116</b>	<b>90,914</b>	<b>40,909</b>	<b>29,659</b>	<b>12,806</b>	<b>158,383</b>	<b>63,251</b>
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

# REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

GENERAL INFECTIOUS DISEASES	Wayne		Williams		Wood		Wyandot		Unknown		TOTAL	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Amebiasis	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	22	0.2
Botulism	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	6	0.1
Foodborne	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	1	0.0
Infant*	0	*	0	*	0	*	0	*	0	n/a	5	*
Campylobacteriosis	24	21.5	1	2.6	12	9.9	0	0.0	0	n/a	1,262	11.1
Coccidioidomycosis*	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	18	0.2
Creutzfeldt-Jakob Disease (CJD)	0	0.0	0	0.0	1	0.8	0	0.0	0	n/a	12	0.1
Cryptosporidiosis	1	0.9	0	0.0	6	5.0	1	4.4	0	n/a	386	3.4
Cytomegalovirus (CMV), Congenital*	0	*	0	*	0	*	0	*	0	n/a	19	*
<i>Escherichia coli</i> , Shiga Toxin-Producing	5	4.5	0	0.0	3	2.5	0	0.0	0	n/a	128	1.1
O157:H7	2	1.8	0	0.0	2	1.7	0	0.0	0	n/a	87	0.8
Not O157:H7	2	1.8	0	0.0	0	0.0	0	0.0	0	n/a	26	0.2
Unknown Serotype	1	0.9	0	0.0	1	0.8	0	0.0	0	n/a	15	0.1
Giardiasis	8	7.2	2	5.1	2	1.7	1	4.4	0	n/a	816	7.2
<i>Haemophilus influenzae</i> , Invasive Disease	1	0.9	0	0.0	0	0.0	0	0.0	0	n/a	98	0.9
Hemolytic Uremic Syndrome (HUS)	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	14	0.1
Legionellosis	2	1.8	1	2.6	1	0.8	0	0.0	0	n/a	274	2.4
Leprosy (Hansen's Disease)	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	2	0.0
Listeriosis	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	29	0.3
Meningitis, Aseptic	5	4.5	1	2.6	12	9.9	0	0.0	0	n/a	828	7.3
Meningitis, Other Bacterial*	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	68	0.6
Meningococcal Disease	1	0.9	0	0.0	0	0.0	1	4.4	0	n/a	42	0.4
Salmonellosis	24	21.5	6	15.3	16	13.2	1	4.4	0	n/a	1,377	12.1
Shigellosis	2	1.8	0	0.0	0	0.0	0	0.0	0	n/a	1,050	9.2
<i>Staphylococcus aureus</i> , Intermediate Resistance to Vancomycin (VISA)	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	3	0.0
Streptococcal Disease, Group A, Invasive	2	1.8	0	0.0	1	0.8	0	0.0	0	n/a	208	1.8
Streptococcal Disease, Group B, in Newborn*	0	*	0	*	0	*	0	*	0	n/a	63	*
Streptococcal Toxic Shock Syndrome (STSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	11	0.1
<i>Streptococcus pneumoniae</i> , Invasive Disease	3	2.7	0	0.0	16	13.2	1	4.4	0	n/a	1,358	12.0
Ages < 5 Years*	2	*	0	*	2	*	0	*	0	n/a	139	*
Drug Resistant, Ages 5+ Years*	1	*	0	*	4	*	0	*	0	n/a	343	*
Drug Susceptible, Ages 5+ Years*	0	*	0	*	10	*	1	*	0	n/a	876	*
Toxic Shock Syndrome (TSS)	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	2	0.0
Typhoid Fever	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	11	0.1
Vibriosis	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	6	0.1
Other (Not Cholera)	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	6	0.1
Yersiniosis	0	0.0	0	0.0	0	0.0	1	4.4	0	n/a	44	0.4
<b>SUB-TOTAL</b>	<b>78</b>	<b>69.9</b>	<b>11</b>	<b>28.1</b>	<b>70</b>	<b>57.8</b>	<b>6</b>	<b>26.2</b>	<b>0</b>	<b>n/a</b>	<b>8,157</b>	<b>71.8</b>

## HEPATITIS

Hepatitis A	5	4.5	0	0.0	0	0.0	0	0.0	0	n/a	34	0.3
Hepatitis B*	5	4.5	3	7.7	9	7.4	1	4.4	68	n/a	1,794	15.8
Acute*	0	0.0	0	0.0	2	1.7	0	0.0	5	n/a	213	1.9
Chronic*	5	4.5	3	7.7	7	5.8	1	4.4	63	n/a	1,581	13.9
Hepatitis C*	48	43.0	3	7.7	28	23.1	3	13.1	536	n/a	10,615	93.5
Acute*	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	64	0.6
Past or Present*	48	43.0	3	7.7	28	23.1	3	13.1	536	n/a	10,551	92.9
<b>SUB-TOTAL</b>	<b>58</b>	<b>52.0</b>	<b>6</b>	<b>15.3</b>	<b>37</b>	<b>30.6</b>	<b>4</b>	<b>17.5</b>	<b>604</b>	<b>n/a</b>	<b>12,443</b>	<b>109.6</b>

N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

## REPORTED CASES OF SELECTED NOTIFIABLE DISEASES BY COUNTY OF RESIDENCE, OHIO, 2009

OUTBREAKS*	Wayne		Williams		Wood		Wyandot		Unknown		TOTAL	
	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate	N	Rate
Community*	1	n/a	0	n/a	0	n/a	0	n/a	0	n/a	25	n/a
Foodborne*	1	n/a	0	n/a	2	n/a	0	n/a	0	n/a	54	n/a
Healthcare-Associated*	0	n/a	0	n/a	0	n/a	2	n/a	0	n/a	55	n/a
Institutional*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	64	n/a
Waterborne*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	2	n/a
Zoonotic*	0	n/a	0	n/a	0	n/a	0	n/a	0	n/a	6	n/a
<b>SUB-TOTAL</b>	<b>2</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>2</b>	<b>n/a</b>	<b>2</b>	<b>n/a</b>	<b>0</b>	<b>n/a</b>	<b>206</b>	<b>n/a</b>

### VACCINE-PREVENTABLE

Influenza-Associated Hospitalization*	11	9.9	6	15.3	26	21.5	7	30.6	0	n/a	3,818	33.6
Influenza-Associated Pediatric Mortality*	0	*	0	*	0	*	0	*	0	n/a	15	*
Influenza A Virus, Novel Human Infection*	1	0.9	0	0.0	2	1.7	0	0.0	0	n/a	240	2.1
Measles	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	1	0.0
Indigenous	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	1	0.0
Mumps	0	0.0	0	0.0	1	0.8	0	0.0	0	n/a	6	0.1
Pertussis	29	26.0	0	0.0	1	0.8	2	8.7	0	n/a	1,100	9.7
Tetanus	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	2	0.0
Varicella*	23	20.6	7	17.9	24	19.8	5	21.8	0	n/a	1,829	16.1
<b>SUB-TOTAL</b>	<b>64</b>	<b>57.4</b>	<b>13</b>	<b>33.2</b>	<b>54</b>	<b>44.6</b>	<b>14</b>	<b>61.1</b>	<b>0</b>	<b>n/a</b>	<b>7,011</b>	<b>61.8</b>

### ZOO NOSES

Brucellosis	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	4	0.0
Dengue	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	3	0.0
Ehrlichiosis/Anaplasmosis	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	13	0.1
<i>Anaplasma phagocytophilum</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	1	0.0
<i>Ehrlichia chaffeensis</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	11	0.1
<i>Ehrlichia ewingii</i> *	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	1	0.0
LaCrosse Virus Disease*	1	0.9	0	0.0	0	0.0	0	0.0	0	n/a	5	0.0
Leptospirosis	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	1	0.0
Lyme Disease	2	1.8	0	0.0	2	1.7	0	0.0	0	n/a	56	0.5
Malaria	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	36	0.3
Rabies, Animal*	0	n/a	1	n/a	2	n/a	0	n/a	0	n/a	47	n/a
Rocky Mountain Spotted Fever (RMSF)	0	0.0	0	0.0	1	0.8	0	0.0	0	n/a	17	0.1
Tularemia	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	1	0.0
Typhus Fever, Murine	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	1	0.0
West Nile Virus Infection*	0	0.0	0	0.0	0	0.0	0	0.0	0	n/a	2	0.0
<b>SUB-TOTAL</b>	<b>3</b>	<b>2.7</b>	<b>1</b>	<b>0.0</b>	<b>5</b>	<b>2.5</b>	<b>0</b>	<b>0.0</b>	<b>0</b>	<b>n/a</b>	<b>186</b>	<b>1.2</b>

<b>GRAND TOTAL</b>	<b>205</b>	<b>182.0</b>	<b>31</b>	<b>76.6</b>	<b>168</b>	<b>135.5</b>	<b>26</b>	<b>104.8</b>	<b>604</b>	<b>n/a</b>	<b>28,003</b>	<b>244.4</b>
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<b>POPULATION</b>	<b>111,564</b>		<b>39,188</b>		<b>121,065</b>		<b>22,908</b>		<b>0</b>		<b>11,353,140</b>	
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N = number of cases reported.

Rates use 2000 U.S. Census counts and are per 100,000 population.

n/a = not applicable.

\* Please see Technical Notes (pp. 72-76).

**SALMONELLA SEROTYPES BY YEAR OF ONSET,  
OHIO, 2005-2009**

SEROTYPE	2005	2006	2007	2008	2009
Abaetetuba	0	0	0	0	1
Aberdeen	0	2	0	0	0
Adelaide	0	2	1	0	1
Agama	0	0	0	0	1
Agbeni	5	8	3	3	3
Ago	0	1	0	0	1
Agona	14	17	22	19	8
Ajiobo	0	0	0	0	1
Albany	0	2	1	1	1
Altona	0	0	0	1	0
Amager	0	0	0	1	0
Anatum	7	8	5	5	6
Anatum, var 15 +	0	0	0	0	2
Apapa	0	0	1	1	0
Apeyeme	1	0	0	0	0
Aqua	1	0	0	0	0
Augustenborg	1	0	0	0	0
Baildon	16	2	0	2	0
Bareilly	3	3	3	2	3
Barranquilla	0	0	1	0	0
Benin	0	0	0	0	1
Berta	1	15	10	9	15
Blockley	3	2	0	1	2
Bonariensis	0	1	0	0	0
Bovis-morbificans	11	4	2	7	7
Braenderup	57	20	12	18	11
Brandenburg	1	0	3	1	0
Brazil	1	0	0	0	0
Brazzaville	0	0	0	1	0
Bredeney	0	2	0	1	0
Carmel	0	1	0	1	0
Cerro	0	1	0	0	0
Chester	0	1	3	1	1
Choleraesuis	1	0	0	1	1
Colindale	1	0	0	0	0
Corvallis	0	0	0	1	1
Cubana	0	1	1	0	2
Derby	3	5	5	6	6
Dublin	0	0	5	6	3
Durban	1	0	2	0	0
Duval	0	0	0	0	1
Ealing	1	0	1	0	2
Eastbourne	0	0	1	1	1
Edinburg	1	1	0	0	0
Enteritidis	284	280	268	293	379
Fluntern	0	0	0	1	0
Gallinarum	0	0	0	0	1
Gaminara	1	1	0	1	1
Georgia	0	0	0	1	0
Give	4	2	1	2	4
Give, var 15 +	0	0	1	0	0
Glostrup	0	0	0	1	0
Grumpensis	1	1	0	0	0
Guinea	0	1	1	0	0
Hadar	5	9	6	9	4
Haifa	0	0	1	0	0
Hannover	0	0	0	0	1
Hartford	21	27	25	12	22
Havana	2	0	0	3	2
Heidelberg	66	46	47	57	50
Hermannswerder	0	0	0	0	1
Herston	0	0	0	0	1
Hindmarsh	1	2	0	0	0
Holcomb	1	1	1	0	0
Hull	0	0	0	1	0
Hvittingfoss	1	1	1	0	2



**SALMONELLA SEROTYPES BY YEAR OF ONSET,  
OHIO, 2005-2009**

SEROTYPE	2005	2006	2007	2008	2009
Indiana	0	1	0	0	0
Infantis	18	8	12	7	15
Inverness	0	0	0	1	0
Irumu	0	0	1	0	0
Isangi	0	1	0	1	0
Jangwani	0	0	0	1	0
Javiana	26	44	15	11	36
Johannesburg	2	1	2	1	0
Kaduna	0	1	0	0	0
Kedougou	1	0	0	1	0
Kentucky	1	3	0	2	1
Kiambu	2	1	0	1	4
Kingabwa	1	0	2	0	1
Kingston	1	0	0	0	0
Kintambo	0	0	0	0	1
Kottbus	0	0	0	0	1
Kotu	1	0	0	0	0
Labadi	0	0	2	0	1
Lexington	0	0	0	1	0
Lindenburg	1	0	0	0	0
Litchfield	1	6	10	6	2
Liverpool	1	0	1	0	0
Livingstone	0	1	0	0	2
Loma Linda	1	0	1	0	0
London	1	1	1	1	0
Madelia	0	1	0	0	0
Manhattan	0	4	3	0	1
Matadi	0	0	1	0	0
Mbandaka	11	8	6	1	5
Meleagridis	0	5	4	1	0
Mendoza	1	0	0	0	0
Miami	6	1	0	2	1
Michigan	0	1	0	1	0
Minnesota	3	2	1	1	0
Mississippi	3	9	3	2	1
Monschau	2	0	0	0	2
Montevideo	24	25	19	15	25
Muenchen	11	17	17	56	11
Muenster	2	3	1	0	1
Muenster, var 15 +	1	0	0	0	1
Newport	80	71	58	52	72
Nima	2	0	0	0	0
Oakland	0	0	0	1	0
Ohio	1	1	5	1	1
Oranienburg	23	30	51	34	56
Orion, var 15 +	0	0	0	0	1
Oslo	1	0	0	2	1
Othmarschen	1	0	0	0	0
Quakam	0	0	0	0	1
Overschie	0	1	0	0	0
Panama	2	1	12	4	2
Paratyphi A	2	6	7	4	3
Paratyphi B	1	1	1	2	2
Paratyphi B, var L - Tartrate +	38	15	11	41	54
Paratyphi B, var Tartrate +	0	28	40	3	1
Paratyphi C	0	0	0	0	1
Pomona	4	1	1	0	0
Poona	6	5	10	21	7
Potsdam	0	0	1	1	2
Putten	0	0	0	0	1
Reading	2	0	2	2	0
Roodepoort	1	0	0	0	0
Saint Paul	23	16	9	22	26
Sal. (I) 1,9,12:-:-	0	0	0	0	1
Sal. (I) 1,9,12:-:5	0	0	0	0	2
Sal. (I) 1,9,12:I,z28:-	1	0	0	1	0

**SALMONELLA SEROTYPES BY YEAR OF ONSET,  
OHIO, 2005-2009**

SEROTYPE	2005	2006	2007	2008	2009
Sal. (I) 3,10:-:-	0	0	0	0	1
Sal. (I) 4,5,12:-:-	0	0	0	0	1
Sal. (I) 4,5,12:i:-	0	30	88	91	46
Sal. (I) 4,5,12:2:-	0	0	0	0	1
Sal. (I) 6,7:-:-	0	0	0	0	1
Sal. (I) 6,7:-:5	0	0	4	0	3
Sal. (I) 6,7:b:-	0	0	1	0	0
Sal. (I) 6,8:d:-	0	0	1	0	0
Sal. (I) 9,12:-:-	1	0	0	0	0
Sal. (I) 43:k:-	0	1	0	0	0
Sal. (I) 44:z4	1	0	0	0	0
Sal. (I) Rough Os:d:1,2	1	0	0	0	0
Sal. (I) Rough Os:r:e,n,x	0	1	0	0	0
Sal. (II) 21:z10:-	0	0	1	0	0
Sal. (II) 47:a:1,5 (Bilthoven)	1	0	0	0	0
Sal. (II) 50:b:z6	0	0	0	0	1
Sal. (III) Arizona	0	4	0	5	1
Sal. (IIIa) 13,23:z4:-	0	0	1	0	1
Sal. (IIIa) 21:g,z51:-	1	0	0	0	0
Sal. (IIIa) 35:z4,z23:-	1	0	0	0	0
Sal. (IIIa) 41:z4,z23:-	2	0	1	2	0
Sal. (IIIa) 42:z4,z23:-	0	2	0	0	0
Sal. (IIIa) 42:z4,z24:-	0	1	0	0	0
Sal. (IIIa) 44:z4,z24:-	0	0	0	0	1
Sal. (IIIa) 53:z4	0	2	0	0	0
Sal. (IIIa) 53:z4,z23:-	1	0	0	0	0
Sal. (IIIb) 48:i:z	0	2	0	0	2
Sal. (IIIb) 50:k:z	0	0	0	0	1
Sal. (IIIb) 50:z:z52	0	0	0	1	1
Sal. (IIIb) 53:z10:z	0	1	0	0	0
Sal. (IIIb) 61:-:1,5	1	0	1	0	0
Sal. (IIIb) 61:c:z35	2	2	0	0	0
Sal. (IIIb) 61:i:z53	0	0	0	0	1
Sal. (IIIb) 61:k:1,5	1	0	0	0	0
Sal. (IIIb) 61:l,v,z13:z35	0	0	0	0	1
Sal. (IIIb) 61:r:z	0	0	0	0	1
Sal. (IIIb) 61:z52:z53	0	0	0	0	1
Sal. (IIIb) 65:(k):z	0	0	0	0	1
Sal. (IIIb) 65:(k):z53	0	1	0	0	0
Sal. (IV)	0	1	0	0	0
Sal. (IV) 16:z4,z32:- (Chameleon)	2	0	1	0	0
Sal. (IV) 40:z4,z32:-	1	0	0	0	0
Sal. (IV) 41:z4,z23:-	1	0	0	0	0
Sal. (IV) 44:z4:-	0	1	0	0	0
Sal. (IV) 44:z4,z23:-	1	2	1	2	2
Sal. (IV) 44:z4,z32:-	1	0	1	0	0
Sal. (IV) 45:g,z51:-	2	3	1	2	1
Sal. (IV) 48:g,z51:- (Marina)	1	2	4	3	0
Sal. (IV) 50:g,z51:- (Wassenaar)	1	0	2	0	0
Sal. (IV) 50:z4,z23:- (Flint)	0	2	0	2	1
Sal. Rough Os:d,x	0	0	0	2	0
Sal. Rough Os:d:1,2	0	0	0	0	1
Sal. Rough Os:e,h:l,w	0	0	0	1	0
Sal. Rough Os:e,h:z15	0	0	0	0	1
Sal. Rough Os:f,g:-	0	0	1	0	0
Sal. Rough Os:g,m:-	0	0	0	1	0
Sal. Rough Os:g,m,s:-	0	0	1	1	0
Sal. Rough Os:m,t,-	0	0	0	3	0
Sal. Rough Os:z:6	0	0	0	1	0
Sal. Rough Os:z4,z23:-	0	0	1	0	0
Sal. Rough Os:Non-motile	0	0	0	4	2
San Diego	6	9	3	5	6
Saphra	0	0	0	1	0
Schwartzengrund	0	7	13	4	6
Senftenberg	1	2	6	6	3
Senftenberg, var Rz27	1	0	0	0	0

**SALMONELLA SEROTYPES BY YEAR OF ONSET,  
OHIO, 2005-2009**

SEROTYPE	2005	2006	2007	2008	2009
Shubra	1	1	0	2	1
Singapore	2	0	0	1	0
Sinstorf	0	0	1	1	0
Stanley	4	5	12	10	5
Stanleyville	0	1	0	0	0
Stoneferry	0	0	0	0	1
Suelldorf	0	0	0	0	2
Sundsvall	0	0	0	1	0
Takoradi	0	0	0	1	0
Teitelkebir	7	1	0	1	1
Tennessee	10	13	20	4	3
Thompson	17	18	28	18	17
Tucson	2	0	0	0	0
Typhimurium	207	177	182	229	212
Typhimurium, var Copenhagen	42	45	37	55	51
Uganda	0	1	0	0	0
Urbana	1	2	1	2	1
Uzaramo	0	0	1	0	0
Virchow	2	2	2	5	7
Waycross	1	0	0	0	0
Weltevreden	1	0	1	2	2
Worthington	0	1	1	4	1
<b>SUB-TOTAL</b>	<b>1,155</b>	<b>1,133</b>	<b>1,163</b>	<b>1,248</b>	<b>1289</b>

SEROGROUP					
Group A	0	1	2	0	0
Group B	83	53	11	20	13
Group C	4	7	8	4	3
Group C1	5	1	4	1	1
Group C2	2	3	2	2	0
Group D	19	13	11	16	11
Group E	0	1	0	0	0
Group G	0	0	1	0	0
<b>SUB-TOTAL</b>	<b>113</b>	<b>79</b>	<b>39</b>	<b>43</b>	<b>28</b>

<b>UNGROUPED, UNTYPED</b>	75	87	121	87	60
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<b>GRAND TOTAL</b>	<b>1,343</b>	<b>1,299</b>	<b>1,323</b>	<b>1,378</b>	<b>1,377</b>
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**MENINGOCOCCAL DISEASE SEROGROUPS BY  
YEAR OF ONSET, OHIO, 2005-2009**

<b>SEROGROUP</b>	<b>2005</b>	<b>2006</b>	<b>2007</b>	<b>2008</b>	<b>2009</b>
Group A	0	0	0	0	0
Group B	19	16	6	11	13
Group C	9	10	7	6	4
Group W-135	1	2	2	0	1
Group Y	9	8	10	17	10
Group Z	1	0	0	0	0
Not Groupable	0	0	0	1	0
Unknown	6	14	7	7	14
<b>TOTAL</b>	<b>45</b>	<b>50</b>	<b>32</b>	<b>42</b>	<b>42</b>

# PROFILES OF SELECTED NOTIFIABLE DISEASES

## ESCHERICHIA COLI, SHIGA TOXIN-PRODUCING

<i>Number of cases in 2009:</i>	128	<i>Rate in 2009:</i>	1.1
<i>Number of cases in 2008:</i>	209	<i>Rate in 2008:</i>	1.8

\* Rates are based on U.S. Census midpoint estimates for each year and are per 100,000 population.

*Escherichia coli* (*E. coli*) O157:H7, the most common Shiga toxin-producing *E. coli* (STEC) strain, was first recognized as a pathogen in 1982 when 47 persons became ill in two outbreaks associated with ground beef consumption at the same fast-food restaurant chain.<sup>1</sup> Since then, this bacterium has become an increasingly recognized cause of bloody diarrhea. It is estimated that 70,000 STEC infections occur in the U.S. each year.<sup>2</sup> Approximately 20 percent of STEC infections in the U.S. are linked to known outbreaks.<sup>2</sup>

In Ohio, the incidence of STEC significantly decreased from 2008 to 2009 by 39 percent ( $p < 0.001$ ). Table 1 shows that more cases were linked to known outbreaks in 2008 (12 percent) than in 2009 (9 percent), although this was not statistically significant ( $p = 0.39$ ). Outbreak-associated cases occurred in all age groups during 2008, especially in persons aged 10-19 years, while the majority of outbreak-associated cases occurred in children less than 10 years of age in 2009.

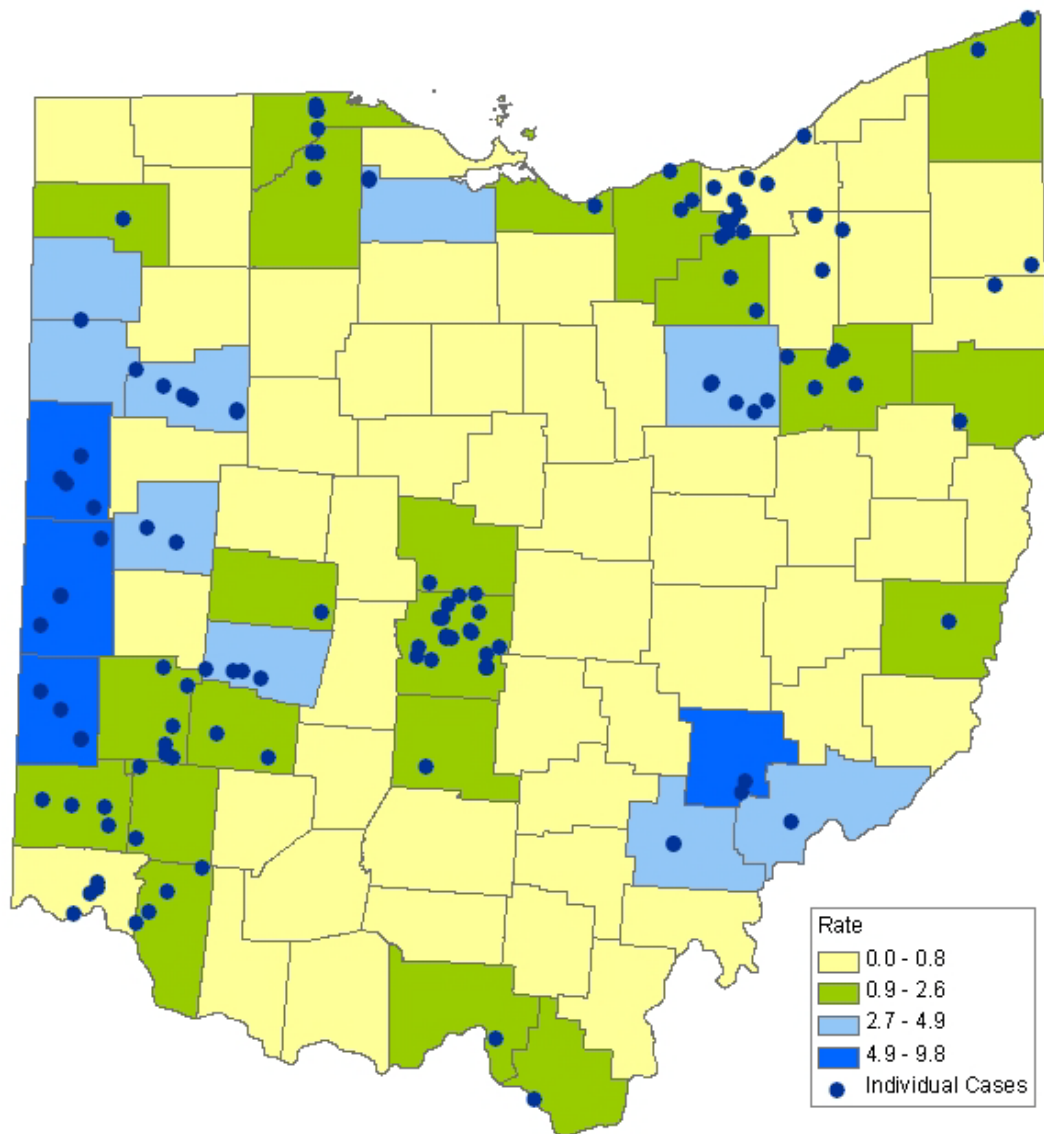
**Table 1: Shiga Toxin-Producing *E. coli* by Age and Outbreak Status, Ohio, 2009**

Age (Years)	2008				2009			
	Outbreak-associated		Sporadic		Outbreak-associated		Sporadic	
0-9	5	8%	58	92%	9	21%	33	79%
10-19	7	20%	28	80%	0	0%	31	100%
20-29	6	16%	32	84%	1	6%	16	94%
30-59	4	9%	39	91%	0	0%	21	100%
60 +	4	14%	25	86%	1	6%	15	94%
Unknown	0	0%	1	100%	1	100%	0	0%
<b>Total</b>	<b>26</b>	<b>12%</b>	<b>183</b>	<b>88%</b>	<b>12</b>	<b>9%</b>	<b>116</b>	<b>91%</b>

Source of disease data: Ohio Disease Reporting System.

In 2009, STEC incidence mostly occurred in the western, central and northeastern parts of Ohio (Figure 1). Most of the counties experiencing the highest rates of disease were situated in the western-most part of Ohio, but a few counties in southeastern Ohio and one in northeastern Ohio also had higher rates of disease in 2009.

Figure 1: Shiga Toxin-Producing *E. coli* Incidence, Ohio, 2009



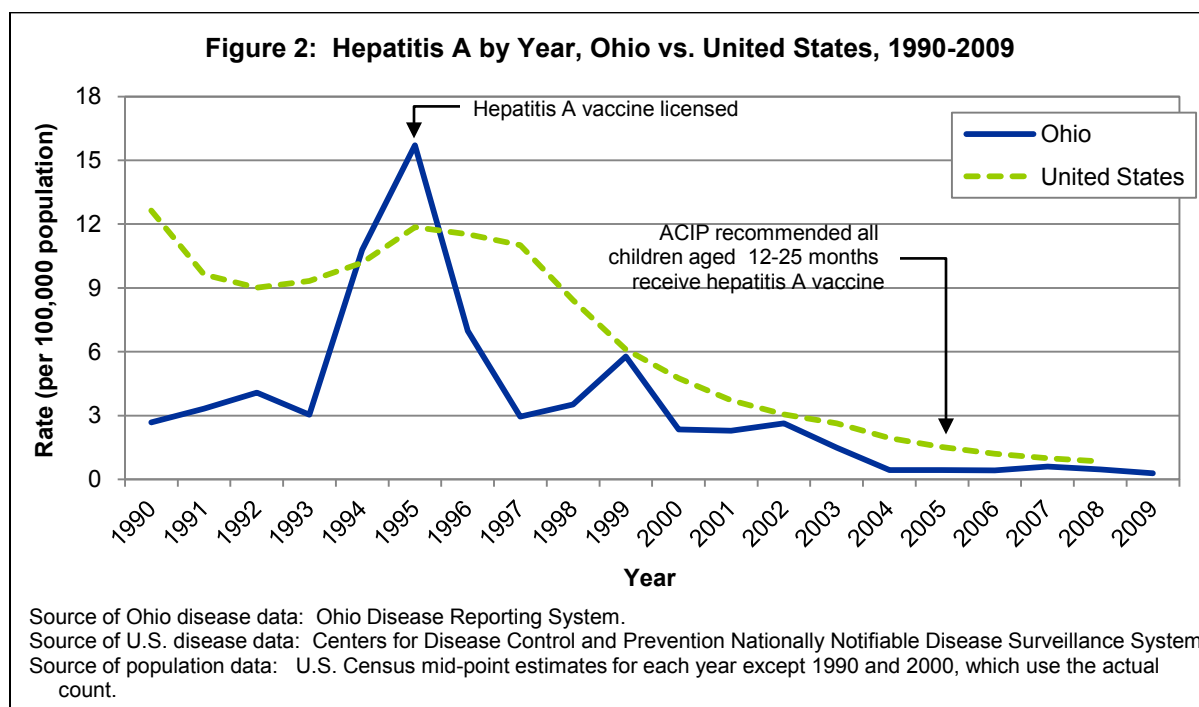
Source of disease data: Ohio Disease Reporting System.  
Source of population data: 2000 U.S. Census.  
Rates are per 100,000 population.

## HEPATITIS A

<i>Number of cases in 2009:</i>	<i>34</i>	<i>Rate in 2009:</i>	<i>0.3</i>
<i>Number of cases in 2008:</i>	<i>54</i>	<i>Rate in 2008:</i>	<i>0.5</i>

\* Rates are based on U.S. Census midpoint estimates for each year and are per 100,000 population.

The incidence rate of hepatitis A has substantially decreased over the past 20 years in Ohio and in the U.S. (Figure 2). In 1995, two vaccines to prevent hepatitis A infection were licensed in the U.S.<sup>3</sup> Following this, rates of hepatitis A in Ohio and the U.S. began dramatically decreasing. To further reduce hepatitis A infection, the CDC's Advisory Committee on Immunization Practices (ACIP) recommended in 2005 that all children 12-25 months of age be routinely vaccinated for hepatitis A,<sup>3</sup> Ohio adopted this recommendation in 2007. Except in 1995, Ohio's hepatitis A rate was at or below the national rate. In 2009, Ohio's hepatitis A incidence rate was the lowest in two decades (0.3 cases per 100,000 population). Both the U.S. and Ohio are well within the Healthy People 2010 goal to reduce the incidence of hepatitis A to 4.5 cases per 100,000.<sup>4</sup>



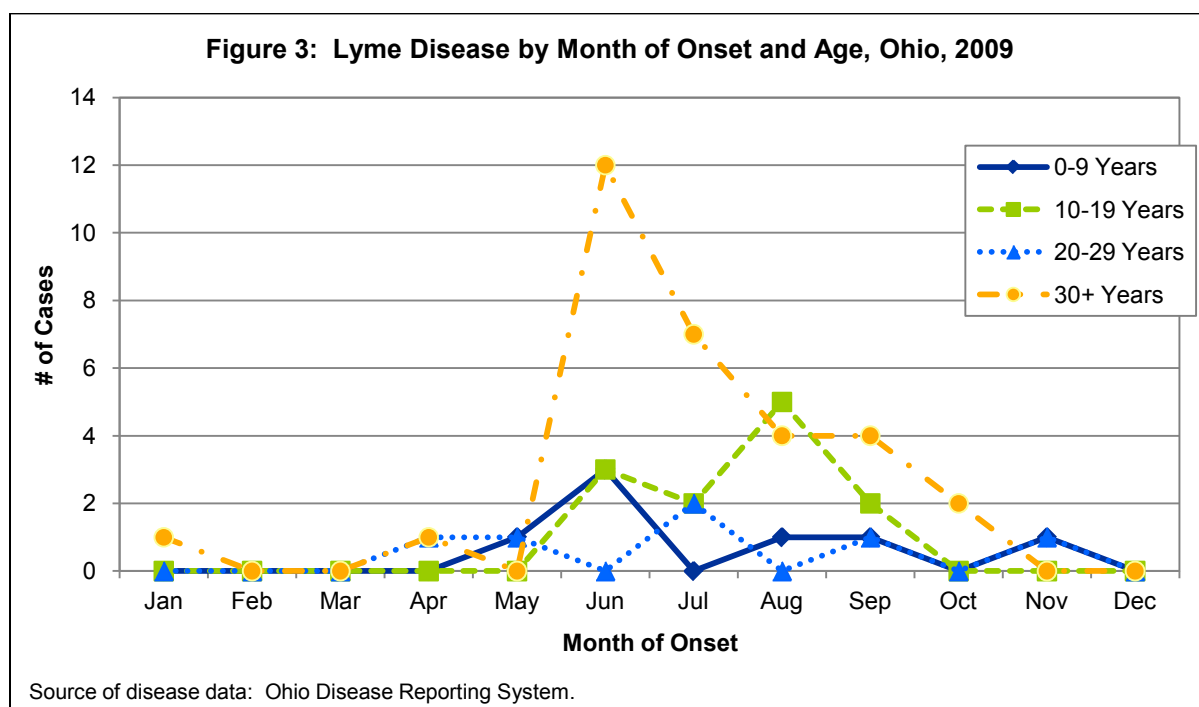
## LYME DISEASE

<i>Number of cases in 2009:</i>	56	<i>Rate in 2009:</i>	0.5
<i>Number of cases in 2008:</i>	45	<i>Rate in 2008:</i>	0.4

\* Rates are based on U.S. Census midpoint estimates for each year and are per 100,000 population.

Lyme disease is transmitted through the bite of a tick, *Ixodes scapularis*, in the eastern and midwestern U.S. and *I. pacificus* in the western U.S.. It is transmitted by a tick called the blacklegged tick (formerly known as the deer tick). Blacklegged tickets are rare in Ohio. The bacteria are normally found in mice, squirrels and other small mammals without causing illness. Lyme disease affects both humans and dogs. Most cases occur in the upper Midwest and North Atlantic states. Each year, approximately 40 cases are reported in Ohio, but many of Ohio's reported cases are actually acquired out of state.

Cases of Lyme disease followed a seasonal pattern in Ohio during 2009 (Figure 3). Cases began to increase in April and peaked in June. Adults 30 years and over demonstrated a higher burden of disease throughout the year except in May, August and November.





## MALARIA

<i>Number of cases in 2009:</i>	36	<i>Rate in 2009:</i>	0.3
<i>Number of cases in 2008:</i>	31	<i>Rate in 2008:</i>	0.3

\* Rates are based on U.S. Census midpoint estimates for each year and are per 100,000 population.

Malaria is a substantial public health problem worldwide and caused an estimated 190-311 million infections in 2008.<sup>5</sup> In 1955, malaria was considered eradicated from the U.S. following extensive prevention and control strategies in the southeastern states.<sup>6</sup> Despite being eradicated, approximately 1,500 cases continue to be reported each year in the U.S., the majority of which are acquired internationally; in addition, the *Anopheles* mosquito that transmits malaria is still present in the U.S., posing a threat for the reestablishment of domestic transmission.<sup>5</sup>

There are four organisms that cause nearly all malaria in humans: *Plasmodium falciparum*, *P. malariae*, *P. ovale* and *P. vivax*. In Ohio, the majority of malaria cases in 2009 were caused by *P. falciparum* (56 percent) followed by unknown *Plasmodium* species (22 percent), *P. vivax* (17 percent) and *P. malariae* (6 percent); no *P. ovale* infections were reported in Ohio during 2009 (Table 2). In addition, 78 percent of cases reported acquiring malaria in Africa during 2009, most notably in Nigeria and Ghana. The remainder of cases reported traveling to countries in Asia, Oceania and South America prior to becoming ill. All but one case of *P. falciparum* malaria occurred in persons who traveled to African countries, while all but one case of *P. vivax* malaria occurred in persons who traveled to countries in Asia, Oceania and South America.

**Table 2: Malaria by Country of Infection and Organism, Ohio, 2009**

Country of Infection	<i>P. falciparum</i>	<i>P. malariae</i>	<i>P. vivax</i>	Unknown species	Total
<b>Africa</b>	<b>19</b>	<b>2</b>	<b>1</b>	<b>6</b>	<b>28</b>
Cameroon	0	1	0	0	1
Cote d'Ivoire	1	0	0	0	1
Ethiopia	1	0	0	1	2
Ghana	6	0	0	1	7
Liberia	1	0	0	0	1
Nigeria	5	1	1	2	9
Senegal	1	0	0	0	1
Sierra Leone	3	0	0	1	4
Zambia	1	0	0	0	1
Unknown	0	0	0	1	1
<b>Asia</b>	<b>1</b>	<b>0</b>	<b>3</b>	<b>2</b>	<b>6</b>
India	1	0	2	2	5
Pakistan	0	0	1	0	1
<b>Oceania</b>	<b>0</b>	<b>0</b>	<b>1</b>	<b>0</b>	<b>1</b>
Solomon Islands	0	0	1	0	1
<b>South America</b>	<b>0</b>	<b>0</b>	<b>1</b>	<b>0</b>	<b>1</b>
Brazil	0	0	1	0	1
<b>Total</b>	<b>20</b>	<b>2</b>	<b>6</b>	<b>8</b>	<b>36</b>

Source of disease data: Ohio Disease Reporting System.  
No cases caused by *P. ovale* were reported in 2009.

## PERTUSSIS

<i>Number of cases in 2009:</i>	<i>1,100</i>	<i>Rate in 2009:</i>	<i>9.5</i>
<i>Number of cases in 2008:</i>	<i>628</i>	<i>Rate in 2008:</i>	<i>5.5</i>

\* Rates are based on U.S. Census midpoint estimates for each year and are per 100,000 population.

As seen in Figure 4, the number of cases of pertussis reported in Ohio has fluctuated over the last five years. 2009 had the highest number of reported cases (1,100 cases), and 2006 had the lowest number of reported cases (594 cases). The most significant decrease in incidence was seen in 2005-2006 (2005: 1,094 cases reported, 2006: 594 cases reported), and the most significant increase in incidence was seen in 2008-2009 (2008: 628 cases reported, 2009: 1,100 cases reported). The reason for the large increase in incidence is not known. It may be because epidemics of pertussis occur throughout the U.S. every three to five years.<sup>7</sup> The most recent epidemic of pertussis that occurred in the U.S. was in 2005 (25,616 reported cases).<sup>7</sup>

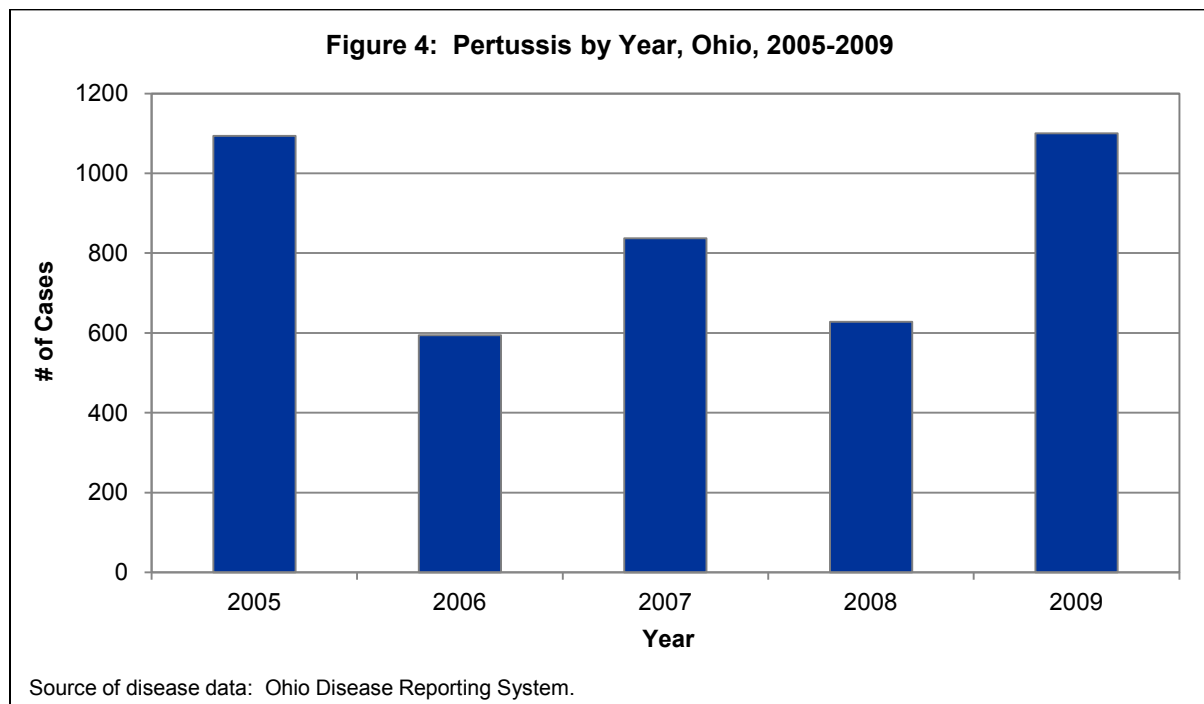
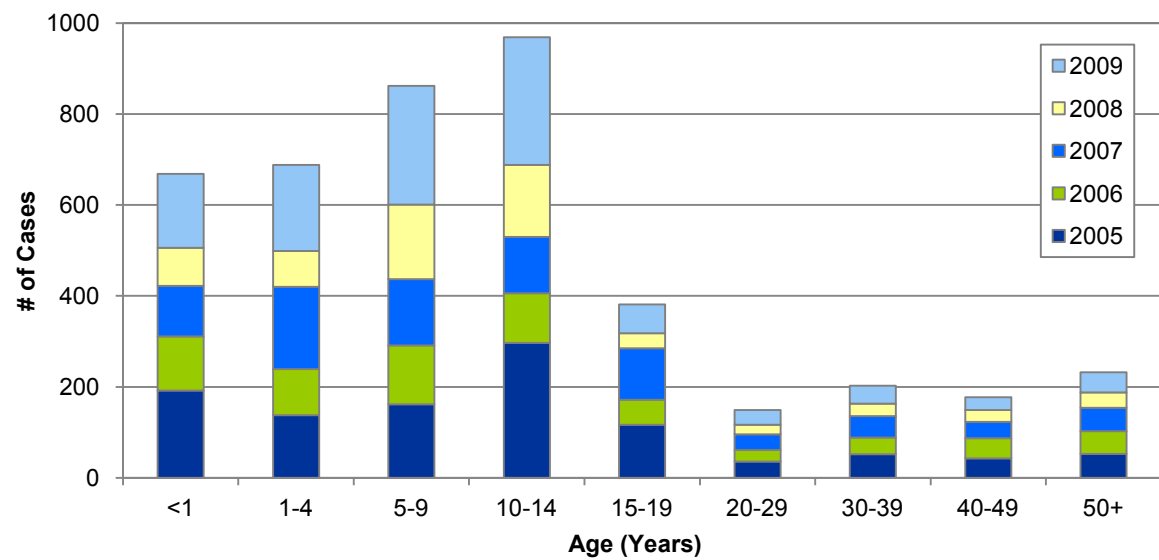


Figure 5 describes the age distribution of pertussis over the last five years. The majority of cases occurred in individuals less than 5 years of age (1,356 cases, 31 percent). There continues to be an increase in the incidence of pertussis cases in adolescents and adults. This could possibly be due to waning of vaccine immunity. A single dose of Tdap (tetanus, diphtheria and pertussis) is recommended as a booster for adolescents and adults.<sup>8</sup>

**Figure 5: Pertussis by Age, Ohio, 2005-2009**



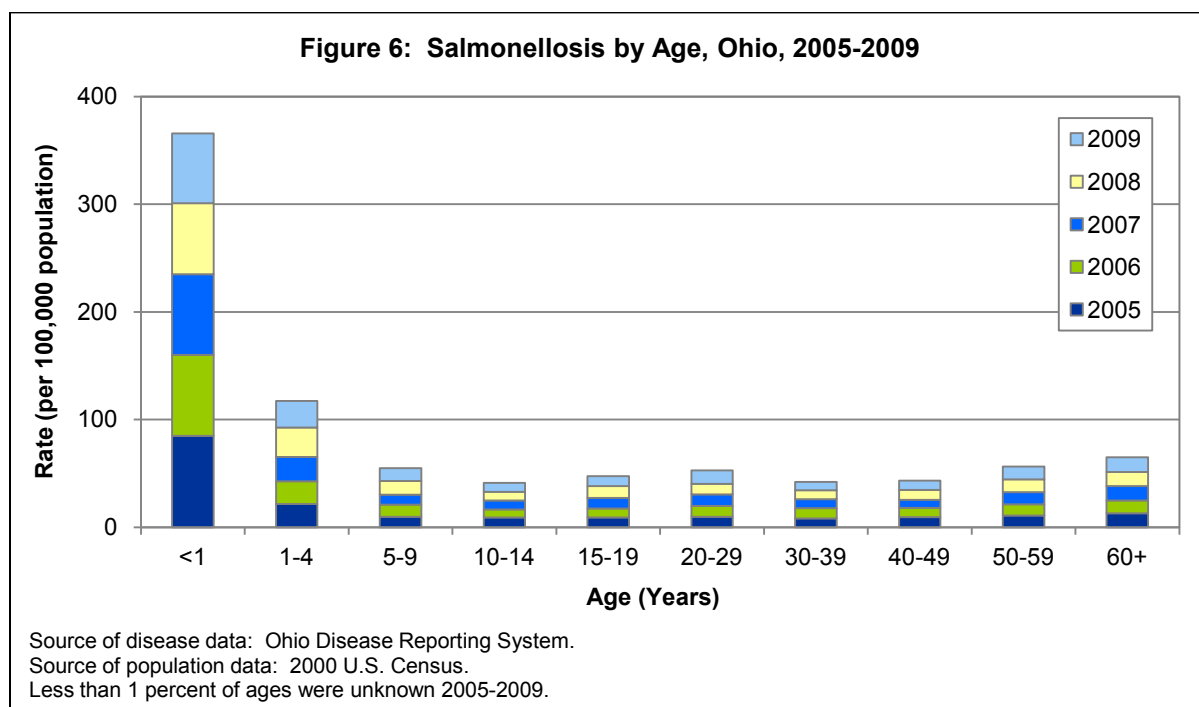
Source of disease data: Ohio Disease Reporting System.  
Less than 1 percent of ages were unknown 2005-2009.

## SALMONELLOSIS

<i>Number of cases in 2009:</i>	<i>1,377</i>	<i>Rate in 2009:</i>	<i>11.9</i>
<i>Number of cases in 2008:</i>	<i>1,378</i>	<i>Rate in 2008:</i>	<i>12.0</i>

\* Rates are based on U.S. Census midpoint estimates for each year and are per 100,000 population.

Figure 6 demonstrates the burden of salmonellosis in Ohio over the past five years by age group. Although a higher incidence of *Salmonella* infection was observed among individuals less than 5 years of age (1,255 cases), for each of the five reporting years analyzed, all persons were at risk.



Ohio's salmonellosis trends followed a seasonal pattern throughout 2005-2009 (Figure 7). An increase in cases generally began in April, peaked in July and gradually declined thereafter.

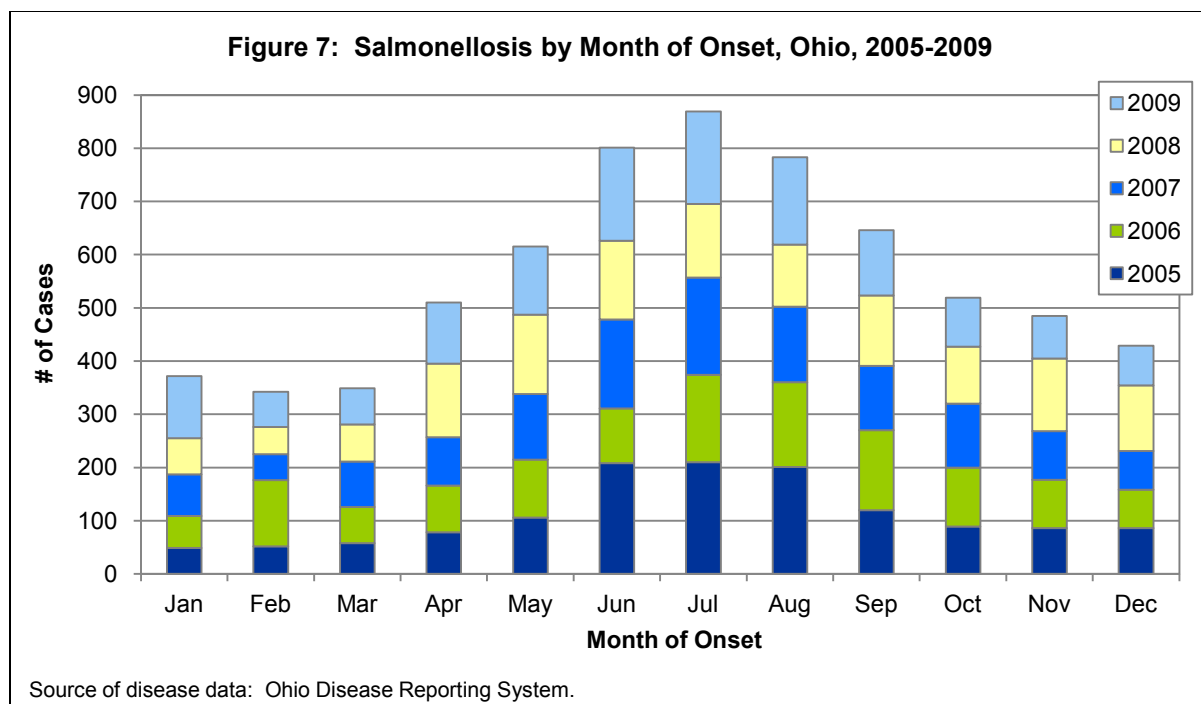
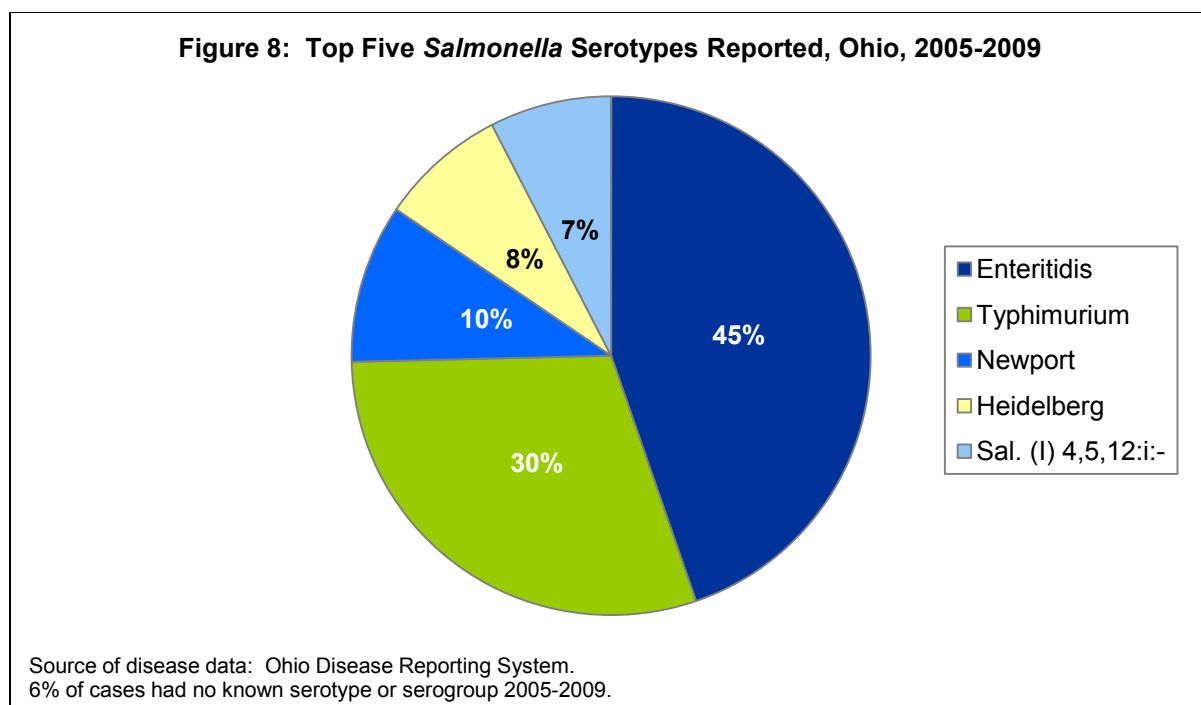


Figure 8 displays the incidence of the most common *Salmonella* serotypes reported in Ohio 2005-2009. *Salmonella* Enteritidis and Typhimurium were the most commonly isolated serotypes among Ohio's salmonellosis cases. Please see the *Salmonella* serotype table in this annual summary on pages 45-48 for data on all *Salmonella* serotypes identified 2005-2009.



## TETANUS

<i>Number of cases in 2009:</i>	<i>2</i>	<i>Rate in 2009:</i>	<i>0.0</i>
<i>Number of cases in 2008:</i>	<i>0</i>	<i>Rate in 2008:</i>	<i>0.0</i>

\* Rates are based on U.S. Census midpoint estimates for each year and are per 100,000 population.

Tetanus, otherwise known as lockjaw, is an acute disease that can often be fatal. This disease is caused by a toxin produced by *Clostridium tetani*, a slender, anaerobic, Gram-positive, spore-forming bacterium. Tetanus spores are found in soil and the intestines and feces of horses, sheep, cattle, dogs, cats, rats, guinea pigs and chickens.<sup>9</sup> A person becomes infected after a wound becomes contaminated with tetanus spores, usually after an injury from a puncture wound or laceration. Tetanus is not transmitted person-to-person. Symptoms of tetanus include muscular stiffness in the jaw, stiffness in the neck, difficulty swallowing, rigidity of abdominal muscles, spasms, sweating and fever. The clinical symptoms do not result from the infection, but rather from the production of a neurotoxin called tetanospasmin.<sup>10</sup>

The DTaP vaccine (diphtheria, tetanus toxoid and acellular pertussis) is administered at 2, 4, 6 and 12 to 15 months of age, and between 4 and 6 years of age. A Td (tetanus and diphtheria toxoid) booster shot is recommended every 10 years.<sup>10</sup>

Tetanus occurs most often in the older population, although recent years have shown an increase in the number of younger individuals. This may be due to an increased number of cases among young injection drug users. Most reported cases of tetanus have never been vaccinated or have received their childhood vaccinations but never had a booster shot.<sup>10</sup> In the state of Ohio, 0-2 cases are reported each year.

# PROFILES OF SELECTED OUTBREAKS

Starting in 2009, the categories for outbreak reporting changed (see Ohio Administrative Code [Chapter 3701-03](#)). These are referred to as “[Class C](#): Report an outbreak, unusual incidence or epidemic by the end of the next business day.” The new categories for outbreak reporting are: community outbreak, foodborne outbreak, healthcare-associated outbreak, institutional outbreak, waterborne outbreak and zoonotic outbreak.

In 2009, the Outbreak Response and Bioterrorism Investigation Program (ORBIT) assisted local health jurisdictions in Ohio in the investigation of 212 outbreaks. These outbreaks were detected in 53 of 88 counties throughout the state. The number of Ohioans known to be ill from these outbreaks was 3,120. The outbreaks were classified as: institutional (64), foodborne (56), healthcare-associated (55), community (26), zoonotic (9) and waterborne (2). Causative agents identified during the outbreak investigations included: *Acinetobacter baumannii*, *Bordetella pertussis*, *Campylobacter* spp., *Clostridium botulinum*, *Clostridium perfringens*, *Cryptosporidium* spp., *Enterococcus faecium* (vancomycin-resistant), *Escherichia coli* O157:H7, Hepatitis A virus, *Histoplasma capsulatum*, *Legionella pneumophila*, Norovirus genotypes GI and GII, *Pseudomonas aeruginosa*, *Salmonella* spp., *Sarcoptes scabiei* (scabies mite), *Shigella sonnei*, *Staphylococcus aureus* (including methicillin-resistant), *Staphylococcus epidermidis* (methicillin-resistant), group B *Streptococcus*, *Streptococcus pyogenes*, *Streptococcus salivarius* and Varicella Zoster virus.

Details on selected types of 2009 outbreaks are discussed below.

## COMMUNITY OUTBREAKS

In 2009, 26 community outbreaks were reported from a variety of settings. Twenty of these outbreaks were confirmed, with the causative agent as follows: Norovirus (7), methicillin-resistant *S. aureus* (9), *S. sonnei* (3) and *B. pertussis* (1).

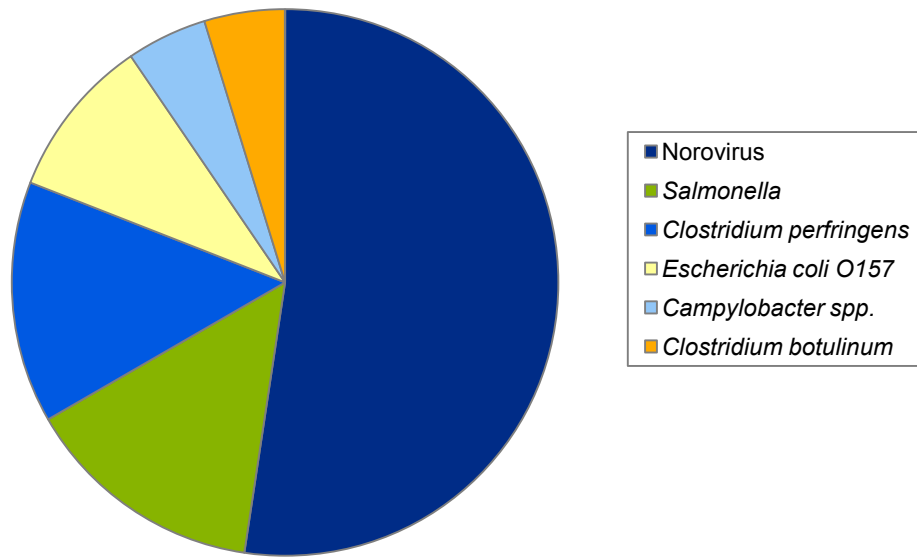
An unusual outbreak occurred in late February 2009. It affected about 70 out of 700 children at an event during which face paint was used. Some who used the face paint developed a red, itchy rash. The Food and Drug Administration (FDA) subsequently [recalled](#) this imported product, which was in nationwide distribution. An FDA Lab reported finding significant microbial contamination in most of the products tested.

The largest outbreak of pertussis in 2009 was a community outbreak occurring in Muskingum and Guernsey counties. A total of 86 persons became ill.

## FOODBORNE OUTBREAKS

In 2009, 21 of the 56 foodborne outbreaks reported in Ohio were confirmed foodborne disease outbreaks. These 56 outbreaks met the general [definition of a foodborne outbreak](#): “An incident in which two or more persons experience a similar illness after ingestion of a common food, and epidemiologic analysis implicates the food as the source of the illness.” The 21 confirmed outbreaks also met the agent-specific [criteria for confirmation](#) of outbreaks. For these 21 foodborne outbreaks, the causative agent was distributed as follows: Norovirus (11), *Salmonella* spp. (3), *C. perfringens* (3), *E. coli* O157 (2), *Campylobacter* spp. (1) and *C. botulinum* (1) (see Figure 1).

**Figure 1: Confirmed Foodborne Outbreaks by Etiologic Agent, Ohio, 2009**



Source of outbreak data: Ohio Disease Reporting System.

Brief summaries of these confirmed foodborne outbreaks follow:

***Campylobacter* spp.:** There was a foodborne outbreak of *Campylobacter* in Clark County in June in which two people were ill; the food vehicle could not be identified.

***Clostridium botulinum*:** There was a single case of type B foodborne botulism in Cuyahoga County in January 2009. Home-canned mustard greens were implicated.

***Clostridium perfringens*:** There were three confirmed outbreaks of *C. perfringens* in 2009 as shown in Table 1 below.

**Table 1: Foodborne *Clostridium perfringens* Outbreaks, Ohio, 2009**

Month of Onset	County	# Ill	Implicated Food Vehicle
January 2009	Butler	8	Ground beef taco meat
May 2009	Medina	23	Chicken
December 2009	Cuyahoga	17	Roast beef

Source of outbreak data: Ohio Disease Reporting System.



***Escherichia coli* O157:H7:** There were two confirmed foodborne outbreaks of *E. coli* O157:H7 in Ohio in 2009.

In April 2009, four cases of *E. coli* O157 occurred in Cuyahoga and Lake Counties. Pulsed field gel electrophoresis (PFGE) comparison of isolates revealed they were the same strain. Epidemiologic investigation found that three cases ate the same brand of ground beef as a hamburger at two different restaurants; the fourth case was acquired through secondary transmission. One patient developed hemolytic uremic syndrome (HUS) and died. This investigation resulted in a nationwide [recall of ground beef from Valley Meats](#) (USDA FSIS recall number 022-2009). Approximately 95,898 pounds of ground beef were recalled from nationwide distribution.

In August 2009, four PFGE-matching isolates from cases of *E. coli* O157 were identified in participants of a birthday party in Darke County. Two patients developed HUS, and a total of 11 people were ill. The epidemiologic investigation found that illness was associated with consumption of homemade ice cream. The source of contamination for the ice cream could not be determined.

**Norovirus:** There were 11 confirmed foodborne outbreaks attributed to norovirus in 2009. Ten were due to norovirus genotype GII, and one was due to norovirus genotype GI. They occurred throughout the year. A suspected food vehicle was identified in five outbreaks: salad (1), various sandwiches (3) and pizza (1). The median number of people affected was 15 (range 3-70). Norovirus reverse transcriptase polymerase chain reaction (RT-PCR) was utilized by ODH Laboratory to confirm these outbreaks.

***Salmonella*:** There were three confirmed foodborne outbreaks of salmonellosis in 2009, as shown in Table 2 below.

**Table 2: Foodborne *Salmonella* Outbreaks, Ohio, 2009**

Month of Onset	County	# Ill	Serotype	Implicated Food Vehicle
July 2009	Mahoning	7	<i>Salmonella</i> serotype Typhimurium	Chicken
September 2009	Lake	22	<i>Salmonella</i> serotype Enteritidis	Baked ziti
November 2009	Franklin	4	<i>Salmonella</i> serotype Enteritidis	Not identified

Source of outbreak data: Ohio Disease Reporting System.

## HEALTHCARE-ASSOCIATED OUTBREAKS

There were 55 healthcare-associated outbreaks reported in 2009, 32 of which were confirmed as shown in Table 3 below.

**Table 3: Healthcare-Associated Outbreaks, Ohio, 2009**

Month of Onset	Setting	Causative Agent	# Ill
August 2008	Hospital	<i>Pseudomonas aeruginosa</i>	8
November 2008	Dialysis center	Methicillin-resistant <i>Staphylococcus epidermidis</i>	9
November 2008	Long term care facility	Hepatitis A virus	4
November 2008	Long term care facility	<i>Sarcoptes scabiei</i>	23
December 2008	Long term care facility	Norovirus GII	19
January 2009	Long term care facility	Norovirus	103
January 2009	Long term care facility	Norovirus GII	34
January 2009	Hospital	Norovirus	18
January 2009	Assisted living facility	Norovirus GII	11
February 2009	Hospital	Coagulase-negative <i>Staphylococcus</i>	13
February 2009	Long term care facility	<i>Sarcoptes scabiei</i>	2
February 2009	Long term care facility	<i>Sarcoptes scabiei</i>	2
February 2009	Assisted living facility	Norovirus GII	25
February 2009	Assisted living facility	Norovirus GII	51
March 2009	Long term care facility	Norovirus GII	18
March 2009	Hospital	Norovirus GII	15
March 2009	Assisted living facility	Norovirus GII	36
March 2009	Rehabilitation facility	<i>Sarcoptes scabiei</i>	23
March 2009	Long term care facility	<i>Sarcoptes scabiei</i>	5
March 2009	Hospital	Vancomycin-resistant <i>Enterococcus faecium</i>	3
April 2009	Hospital	Norovirus	26
April 2009	Long term care facility	<i>Sarcoptes scabiei</i>	3
April 2009	Long term care facility	<i>Sarcoptes scabiei</i>	25
May 2009	Long term care facility	<i>Sarcoptes scabiei</i>	6
May 2009	Hospital	<i>Streptococcus salivarius</i>	2
June 2009	Hospital	<i>Pseudomonas aeruginosa</i>	11
June 2009	Hospital	<i>Acinetobacter baumannii</i>	4
July 2009	Hospital	<i>Sarcoptes scabiei</i>	5
July 2009	Hospital	Group B <i>Streptococcus</i> in newborns	3
October 2009	Rehabilitation facility	<i>Sarcoptes scabiei</i>	5
October 2009	Long term care facility	<i>Sarcoptes scabiei</i>	14
December 2009	Hospital	Methicillin-resistant <i>Staphylococcus aureus</i>	6

Source of outbreak data: Ohio Disease Reporting System.

## INSTITUTIONAL OUTBREAKS

In 2009, 64 institutional outbreaks were reported. Of these, 44 were confirmed. See table 4 below for the distribution of outbreaks by agent, setting, number ill and number of outbreaks.

**Table 4: Institutional Outbreaks, Ohio, 2009**

Causative Agent	Setting	# Ill Individuals (# Outbreaks)	
<i>Bordetella pertussis</i>	School	16	(2)
<i>Histoplasma capsulatum</i>	College/university	3	(1)
Methicillin-resistant <i>Staphylococcus aureus</i>	Correctional facility	25	(4)
Norovirus	Day care center	128	(3)
Norovirus	Hotel/motel	19	(1)
Norovirus	MRDD facility	17	(1)
Norovirus	School	70	(1)
<i>Shigella sonnei</i>	Day care center	195	(23)
<i>Shigella sonnei</i>	School	11	(1)
<i>Streptococcus pyogenes</i>	MRDD facility	19	(1)
Varicella Zoster virus	School	55	(6)

Source of outbreak data: Ohio Disease Reporting System.

## WATERBORNE OUTBREAKS

In 2009, two waterborne outbreaks were reported. One was an outbreak of *Pseudomonas* dermatitis in 23 people using a hotel pool and hot tub. The other consisted of two cases of legionellosis associated with a long term care facility. The exact source of their exposure could not be identified.

## ZOONOTIC OUTBREAKS

In 2009, nine confirmed zoonotic outbreaks were reported. Six were due to *Salmonella* and three were due to *Cryptosporidium* as summarized in Table 5 below. The multistate outbreaks were recognized by PFGE.

**Table 5: Zoonotic Outbreaks, Ohio, 2009**

<b>Causative Agent</b>	<b>Month of Onset</b>	<b># Ill</b>	<b>Setting</b>	<b>Source</b>
<i>Salmonella</i> serotype Montevideo*	October 2008	1	Farm	Mail-order chicks
<i>Cryptosporidium</i>	January 2009	4	Farm	Calves
<i>Salmonella</i> serotype Typhimurium, var Copenhagen*	February 2009	1	Pet store	Mice
<i>Salmonella</i> serotype (I) 4,[5],12:i- *	March 2009	2	Private home	Snake
<i>Salmonella</i> serotype Paratyphi B	April 2009	2	Private home	Fish tank
<i>Cryptosporidium</i>	May 2009	3	Farm	Calves
<i>Cryptosporidium</i>	May 2009	3	Farm	Goat
<i>Salmonella</i> serotype Typhimurium, var Copenhagen*	August 2009	2	Private home	Aquatic frogs
<i>Salmonella</i> serotype Typhimurium*	September 2009	4	Private home	Baby poultry

\* Multistate outbreak.

Source of outbreak data: Ohio Disease Reporting System.

# PROFILES OF SELECTED HEALTH EVENTS DETECTED IN EPICENTER

The Situational Monitoring and Event Detection (SMED) Unit at ODH manages the EpiCenter system, Ohio's statewide syndromic surveillance system. Ohio began using EpiCenter in March 2008, and it fully replaced Ohio's Real-Time Outbreak and Disease Surveillance (RODS) system in March 2009. EpiCenter collects, classifies and monitors emergency department and urgent care center chief complaint data and displays poison control center call volume data from all three of Ohio's poison control centers. It provides local public health and hospital users with the analytical and spatial tools needed for the early detection and tracking of important health events (e.g., outbreaks, seasonal illness, bioterrorism, environmental, etc.) and real-time monitoring for situational awareness or "health intelligence." In recent years, syndromic surveillance at a national level has shifted primary objectives from health event detection to situation awareness and monitoring for health preparedness purposes.

Local health department epidemiologists and nurses conduct investigations of the anomalies detected by the EpiCenter system when visit levels within a given jurisdiction are statistically, significantly higher than normal for a 24-hour period. Approximately 70 percent (5,219) of all EpiCenter anomalies detected during 2009 were resolved as health events related to seasonal illness, naturally occurring diseases, unknown causes or due to other environmental exposures after an initial assessment by local public health. The percentage of total anomalies resolved as health events for 2009 (70 percent) greatly exceeded that from 2008 (10 percent) almost entirely due to the Pandemic Influenza H1N1 outbreak observed initially at the end of April 2009 and reaching its peak in mid-October 2009. In fact, seasonal illness health events attributed for 77 percent of all anomalies resolved as health events in 2009. Anomalies characterized as seasonal illness health events typically follow a seasonal trend that can generally be predicted with each new season, such as the tracking of seasonal influenza (October-May). An example of this classification is when an increase in emergency department visits for fever and/or flu-like symptoms is observed during increased influenza activity, in a given jurisdiction. Anomalies characterized as naturally occurring disease outbreaks relate to an increase in emergency department visits that can be directly or indirectly attributed to an existing or ongoing disease outbreak in the community that may have no assumption of seasonality. An example of this classification is when a county has reported a norovirus outbreak in a local jurisdiction and the data supports the activity with an increase in vomiting and diarrhea symptoms in or around that same jurisdiction. Anomalies characterized as environmental health events relate to an increase in emergency department visits involving an exposure to chemicals or substances causing an adverse health reaction, normally presenting as a cluster of cases. An example of this classification is when a cluster of visits presenting with "carbon monoxide exposure" or "poisoning after house fire" or "cough and rash reaction after exposure to over-chlorinated pool" is observed at a local hospital facility.

A breakdown of these events by type of health event and by jurisdiction is displayed in Table 1 and Table 2, respectively.

**Table 1: Distribution of EpiCenter Health Events by Type, Ohio, 2009**

Disposition	# of Health Events	% of Health Events
Environmental health event	9	< 1%
Naturally occurring disease outbreak	855	16%
Seasonal illness health event	4,042	77%
Unknown health event	313	6%
<b>Total</b>	<b>5,219</b>	<b>100%</b>

Source of health event data: Ohio Department of Health Situational Monitoring and Event Detection Unit.

**Table 2: Distribution of EpiCenter Health Events by Jurisdiction, Ohio, 2009**

County	Environmental Health Event		Naturally Occurring Disease Outbreak		Seasonal Illness Health Event		Unknown Health Event		Total	
	N	%	N	%	N	%	N	%	N	%
Adams	0	0%	1	2%	63	98%	0	0%	64	1%
Allen	0	0%	70	90%	6	8%	2	3%	78	2%
Ashland	0	0%	0	0%	40	95%	2	5%	42	1%
Ashtabula	0	0%	0	0%	73	100%	0	0%	73	1%
Athens	0	0%	97	81%	15	13%	8	7%	120	2%
Belmont	0	0%	0	0%	11	100%	0	0%	11	0%
Brown	0	0%	0	0%	25	100%	0	0%	25	1%
Butler	0	0%	0	0%	135	100%	0	0%	135	3%
Carroll	0	0%	0	0%	3	100%	0	0%	3	0%
Champaign	0	0%	8	28%	20	69%	1	3%	29	1%
Clark	0	0%	31	41%	40	53%	5	7%	76	2%
Clermont	0	0%	0	0%	106	100%	0	0%	106	2%
Clinton	0	0%	0	0%	66	100%	0	0%	66	1%
Columbiana	0	0%	0	0%	88	67%	44	33%	132	3%
Crawford	0	0%	0	0%	33	94%	2	6%	35	1%
Cuyahoga	0	0%	0	0%	168	96%	7	4%	175	3%
Defiance	0	0%	0	0%	44	100%	0	0%	44	1%
Delaware	0	0%	13	26%	37	74%	0	0%	50	1%
Erie	0	0%	2	1%	130	79%	32	20%	164	3%
Fairfield	0	0%	0	0%	20	83%	4	17%	24	1%
Fayette	0	0%	0	0%	7	100%	0	0%	7	0%
Franklin	0	0%	15	13%	97	87%	0	0%	112	2%
Fulton	0	0%	0	0%	26	100%	0	0%	26	1%
Gallia	0	0%	31	57%	12	22%	11	20%	54	1%
Geauga	0	0%	0	0%	54	100%	0	0%	54	1%
Greene	0	0%	1	4%	22	96%	0	0%	23	0%
Guernsey	0	0%	0	0%	58	97%	2	3%	60	1%
Hamilton	0	0%	34	35%	63	65%	0	0%	97	2%

County	Environmental Health Event		Naturally Occurring Disease Outbreak		Seasonal Illness Health Event		Unknown Health Event		Total	
	N	%	N	%	N	%	N	%	N	%
Hancock	4	4%	0	0%	70	70%	26	26%	100	2%
Hardin	0	0%	0	0%	2	100%	0	0%	2	0%
Harrison	0	0%	0	0%	1	100%	0	0%	1	0%
Henry	0	0%	0	0%	28	100%	0	0%	28	1%
Highland	0	0%	0	0%	35	100%	0	0%	35	1%
Hocking	0	0%	116	86%	12	9%	7	5%	135	3%
Holmes	0	0%	0	0%	16	100%	0	0%	16	0%
Huron	0	0%	0	0%	65	99%	1	2%	66	1%
Jefferson	0	0%	5	3%	145	94%	5	3%	155	3%
Knox	0	0%	0	0%	4	100%	0	0%	4	0%
Lake	0	0%	0	0%	61	100%	0	0%	61	1%
Licking	0	0%	49	68%	22	31%	1	1%	72	1%
Logan	0	0%	26	59%	17	39%	1	2%	44	1%
Lorain	0	0%	0	0%	135	90%	15	10%	150	3%
Lucas	0	0%	55	36%	93	60%	7	5%	155	3%
Madison	0	0%	1	3%	33	97%	0	0%	34	1%
Mahoning	0	0%	0	0%	101	100%	0	0%	101	2%
Marion	0	0%	0	0%	72	100%	0	0%	72	1%
Medina	0	0%	48	33%	96	65%	3	2%	147	3%
Meigs	0	0%	4	100%	0	0%	0	0%	4	0%
Miami	0	0%	0	0%	90	100%	0	0%	90	2%
Montgomery	0	0%	0	0%	92	100%	0	0%	92	2%
Morgan	0	0%	0	0%	20	100%	0	0%	20	0%
Morrow	0	0%	0	0%	2	100%	0	0%	2	0%
Muskingum	0	0%	6	6%	93	94%	0	0%	99	2%
Noble	0	0%	0	0%	7	100%	0	0%	7	0%
Ottawa	0	0%	0	0%	24	96%	1	4%	25	1%
Perry	0	0%	0	0%	24	100%	0	0%	24	1%
Pickaway	0	0%	0	0%	56	100%	0	0%	56	1%
Pike	0	0%	0	0%	8	100%	0	0%	8	0%
Portage	0	0%	19	24%	62	77%	0	0%	81	2%
Preble	0	0%	0	0%	26	100%	0	0%	26	1%
Putnam	0	0%	0	0%	14	88%	2	13%	16	0%
Richland	0	0%	0	0%	14	93%	1	7%	15	0%
Ross	0	0%	0	0%	62	98%	1	2%	63	1%
Sandusky	0	0%	0	0%	35	80%	9	21%	44	1%
Scioto	0	0%	0	0%	56	88%	8	13%	64	1%
Seneca	5	6%	0	0%	79	88%	6	7%	90	2%
Shelby	0	0%	0	0%	41	100%	0	0%	41	1%
Stark	0	0%	0	0%	137	100%	0	0%	137	3%
Summit	0	0%	0	0%	109	83%	23	17%	132	3%
Trumbull	0	0%	162	61%	46	17%	59	22%	267	5%

County	Environmental Health Event		Naturally Occurring Disease Outbreak		Seasonal Illness Health Event		Unknown Health Event		Total	
	N	%	N	%	N	%	N	%	N	%
Tuscarawas	0	0%	0	0%	78	95%	4	5%	82	2%
Union	0	0%	0	0%	51	93%	4	7%	55	1%
Van Wert	0	0%	28	80%	6	17%	1	3%	35	1%
Vinton	0	0%	2	100%	0	0%	0	0%	2	0%
Warren	0	0%	5	9%	48	91%	0	0%	53	1%
Washington	0	0%	0	0%	56	89%	7	11%	63	1%
Wayne	0	0%	0	0%	25	100%	0	0%	25	1%
Wood	0	0%	17	71%	6	25%	1	4%	24	1%
State of Ohio	0	0%	9	4%	205	96%	0	0%	214	4%
<b>Total</b>	<b>9</b>	<b>0%</b>	<b>855</b>	<b>16%</b>	<b>4,042</b>	<b>77%</b>	<b>313</b>	<b>6%</b>	<b>5,219</b>	<b>100%</b>

Data based on anomalies generated in the EpiCenter system 01/01/09 to 12/31/09.

Source of health event data: Ohio Department of Health Situational Monitoring and Event Detection Unit.

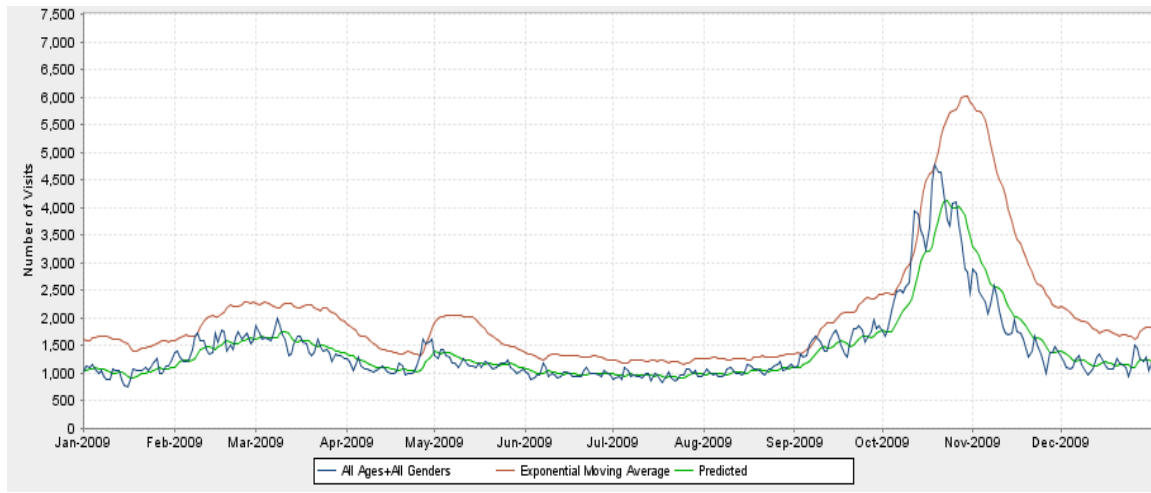
## TRACKING OF SEASONAL TRENDS

While EpiCenter provides the analytic platform and functional capabilities to detect large-scale health events (e.g., bioterrorism and large-scale outbreaks), its utility on a daily basis is to provide leadership and key public health partners with real-time situational monitoring of trends and patterns observed in the data. Some common examples of seasonal trends that are observed annually include the following: seasonal influenza (typically from October to April), seasonal respiratory illness at the commencement of the school year (late August/early September) and seasonal rash illness over Memorial Day weekend. In each of the three charts below (Figures 1-3), the exponential moving average algorithm was used for threshold calculations, which includes a 17-day historical window for predictions as well as a 17-day historical window for thresholds for a total of 34 days of historical data.

As illustrated in Figure 1, constitutional symptoms observed its typical peak in mid- to late February through mid-March and returned to baseline levels in late April/early May. This influenza season, however, was marked by the Pandemic Influenza H1N1 outbreak, which initially peaked in April. This was followed by a second wave in the fall at the start of the school season in early September, reached its ultimate peak in mid-October and finally returned to baseline levels in late November. This led to an uncharacteristic influenza season for 2009-2010.



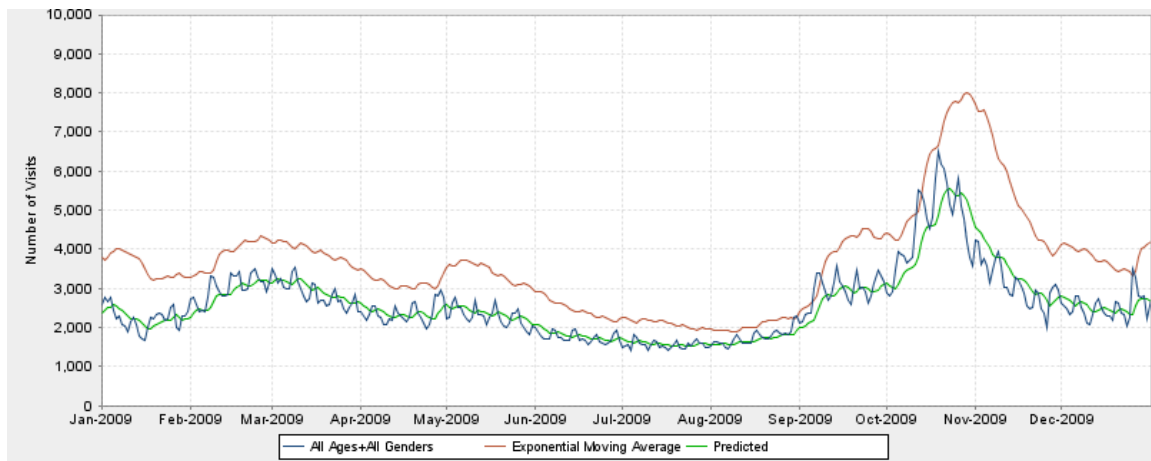
**Figure 1: Seasonal Influenza Illness (Constitutional Syndrome) Trends in EpiCenter, Ohio, January 2009 – December 2009**



Source of data: Ohio Department of Health Situational Monitoring and Event Detection Unit.

As shown in Figure 2, respiratory illness generally remained elevated throughout the entire cough/cold/flu season, afterward returning to normal baseline levels during the summer months. Then it began to increase at the commencement of the school year (late August into early September) and continued to elevate with the incidence of influenza season. As observed with constitutional illness, however, the Pandemic Influenza H1N1 outbreak attributed to a spike in visits in late April and exacerbated those visits observed when schools returned to session in late summer to early fall.

**Figure 2: Seasonal Respiratory Illness Trends in EpiCenter, Ohio, January 2009 – December 2009**

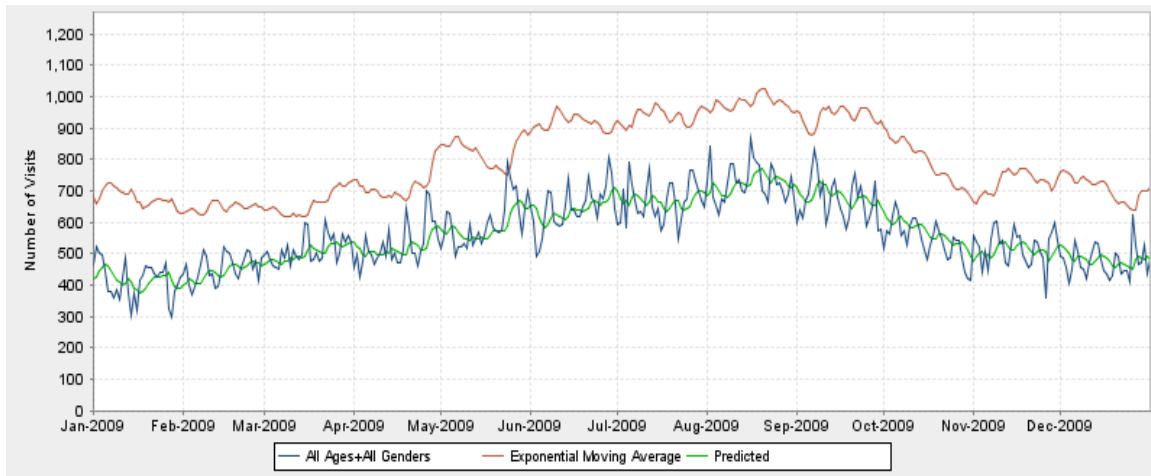


Source of data: Ohio Department of Health Situational Monitoring and Event Detection Unit.

As illustrated in Figure 3, rash illness spiked over the threshold on Memorial Day weekend (it typically reaches its highest peak on Memorial Day Monday) and remained elevated throughout the summer months. The general trends showed a slight increase early on in the week (Sunday-Tuesday)

followed by a decline through the end of the week and into the weekend. The Memorial Day holiday is significant as this tends to mark the start of outdoor activities (hiking, camping, boating, fishing, etc.), which increases environmental exposures and contact with poison ivy and biting insects.

**Figure 3: Seasonal Rash Illness Trends over Memorial Day Weekend, Ohio  
January 2009 – December 2009**



Source of data: Ohio Department of Health Situational Monitoring and Event Detection Unit.

# TECHNICAL NOTES

## NOTES ON SPECIFIC DISEASES:

***Anaplasma phagocytophilum***: formerly known as human granulocytic ehrlichiosis (HGE).

**Coccidioidomycosis**: became a reportable disease in Ohio Jan. 1, 2006.

***Ehrlichia chaffeensis***: formerly known as human monocytic ehrlichiosis (HME).

***Ehrlichia ewingii***: formerly known as other human ehrlichiosis.

**Encephalitis, Post Other Infection**: includes encephalitis following a non-central nervous system viral illness or after vaccine was administered.

**Hepatitis B and C**: due to the chronic nature of hepatitis B and C, all conditions associated with hepatitis B and C are shown by date of report to better capture and describe disease incidence. Data in the "Month of Onset" table are by the month the case was reported to the Centers for Disease Control and Prevention (CDC).

**Herpes, Congenital**: reporting moved to the Sexually Transmitted Disease (STD) Surveillance Program in 2006. Please contact the ODH STD Surveillance Program at (614) 466-1388 for congenital herpes surveillance data for 2006 and beyond.

**Influenza-Associated Hospitalization**: became a reportable condition in Ohio Jan. 1, 2009.

**Influenza-Associated Pediatric Mortality**: became a reportable condition in Ohio Jan. 1, 2005, for children less than 18 years of age. Data in the "Month of Onset" table are by the month of death.

**Influenza A Virus, Novel Human Infection**: became a reportable condition in Ohio Jan. 1, 2009.

**LaCrosse Virus Disease**: also known as California serogroup virus disease. Case reporting to the CDC is through ArboNet. ArboNet is an electronic-based surveillance system created by the CDC to streamline arboviral disease reporting from state public health departments. Please refer to the ODH Web for further information on vectorborne diseases at <http://www.odh.ohio.gov/odhPrograms/dis/zoonoses/vbdp/vbdp1.aspx>.

**Meningitis, Other Bacterial**: includes cases of bacterial meningitis for which the agent was specified, excluding Group A *Streptococcus*, Group B *Streptococcus* (in newborns less than 3 months of age), *Haemophilus influenzae*, *Listeria monocytogenes*, *Mycobacterium tuberculosis*, *Neisseria meningitidis* and *Streptococcus pneumoniae*. Cases of meningitis due to these agents are reported as those specific conditions.

**Rabies, Animal**: refers only to cases among animal species. The last reported case of human rabies in Ohio occurred in 1971.

**St. Louis Encephalitis Virus Disease**: case reporting to the CDC is through ArboNet. ArboNet is an electronic-based surveillance system created by the CDC to streamline arboviral disease reporting from state public health departments. Please refer to the ODH Web for further information on vectorborne diseases at <http://www.odh.ohio.gov/odhPrograms/dis/zoonoses/vbdp/vbdp1.aspx>.

***Streptococcus pneumoniae*, Invasive Disease, Ages <5 Years:** numbers include cases for all children less than 5 years of age, regardless of drug-resistance pattern.

***Streptococcus pneumoniae*, Invasive Disease, Drug Resistant, Ages 5+ Years:** numbers include cases 5 years of age and older with intermediate resistance or resistance to one or more antimicrobial agents.

***Streptococcus pneumoniae*, Invasive Disease, Drug Susceptible, Ages 5+ Years:** numbers include cases 5 years of age and older with invasive *Streptococcus pneumoniae* that are susceptible or of unknown susceptibility to all antimicrobial agents tested.

**Varicella:** became an individually reportable disease Jan. 1, 2006. Prior to 2006, varicella was a Class B reportable disease and was reported in aggregate form on a weekly basis. Date of onset was not reported; therefore, all previous data were compiled by date of report.

**West Nile Virus Infection:** case reporting to the CDC is through ArboNet. ArboNet is an electronic-based surveillance system created by the CDC to streamline arboviral disease reporting from state public health departments. Please refer to the ODH Web for further information on vectorborne diseases at <http://www.odh.ohio.gov/odhPrograms/dis/zoonoses/vbdp/vbdp1.aspx>.

## NOTES ON OUTBREAKS:

Numbers indicate the number of outbreaks reported and do not reflect the number of cases involved in the outbreak. Therefore, outbreak data are not included in the “Age in Years” and “Sex” tables, and rates were not calculated in any table. Outbreak data are by year of report, so “Month” refers to the month of report. ***Six multi-county outbreaks are not included in the “County” table; thus, county totals do not match totals.*** A multi-county outbreak is an outbreak where the exposure occurred in more than one county.

Definitions for the following categories of outbreaks are from the ODH [Infectious Disease Control Manual](#):

**Community:** became a Class C reportable outbreak Jan. 1, 2009. A community outbreak is defined as two or more cases of similar illness with a common exposure in the community and not considered a foodborne or waterborne disease outbreak.

**Conjunctivitis:** outbreaks were no longer reportable as this entity beginning Jan. 1, 2009. Data prior to 2009 included conjunctivitis outbreaks of bacterial, viral or unknown etiology.

**Foodborne:** the occurrence of two or more cases of a similar illness resulting in the ingestion of a food in common. This is the definition of a foodborne outbreak, as found in “Surveillance for Foodborne Disease Outbreaks – United States, 2007” in: MMWR Weekly, Aug. 13, 2010. MMWR 2010; 59 (31); 937-979. Available at: [http://www.cdc.gov/mmwr/preview/mmwrhtml/mm5931a1.htm?s\\_cid=mm5931a1\\_w](http://www.cdc.gov/mmwr/preview/mmwrhtml/mm5931a1.htm?s_cid=mm5931a1_w).

**Healthcare-associated:** became a Class C reportable outbreak Jan. 1, 2009. The definition of a healthcare-associated outbreak is the occurrence of cases of a disease (illness) above the expected or baseline level, usually over a given period of time, as a result of being in a healthcare facility. The number of cases indicating the presence of an outbreak will vary according to the disease agent, size and type of population exposed, previous exposure to the agent and the time and place of occurrence.

**Institutional:** became a Class C reportable outbreak Jan. 1, 2009. An institutional outbreak is defined as two or more cases of similar illness with a common exposure at an institution (e.g., correctional facility, day care center, group home, school) and not considered a foodborne or waterborne disease outbreak.

**Nosocomial:** outbreaks were no longer reportable as this entity beginning Jan. 1, 2009. Data prior to 2009 included hospital-acquired outbreaks of all etiologies.

**Pediculosis:** outbreaks were no longer reportable as this entity beginning Jan. 1, 2009. Data prior to 2009 included louse-associated outbreaks of all origins (head, body and pubic or crab lice).

**Scabies:** outbreaks were no longer reportable as this entity beginning Jan. 1, 2009. Data prior to 2009 included scabies outbreaks, both confirmed and suspected.

**Staphylococcal Skin Infections:** outbreaks were no longer reportable as this entity beginning Jan. 1, 2009. Data prior to 2009 included staphylococcal outbreaks in which isolates were antibiotic-susceptible as well as outbreaks in which isolates were methicillin-resistant *Staphylococcus aureus* (MRSA).

**Waterborne:** the definition of a waterborne disease outbreak from drinking water is two or more persons that are epidemiologically linked by location of exposure to water, time and illness (including drinking water and water not intended for drinking, excluding recreational water) and epidemiologic evidence implicating water as the probable source of illness (e.g., beverages contaminated by plumbing failures in drink mix/soda machines). The definition of a waterborne disease outbreak from recreational water is two or more persons that are epidemiologically linked by location of exposure to recreational water (e.g. swimming pools, wading pools, spas, water slides, interactive fountains, wet decks, fresh and marine bodies of water), time and illness and epidemiologic evidence that implicates water or volatilization of water-associated compounds into the air surrounding an aquatic facility as the probable source of the illness. Note that single cases of laboratory-confirmed primary amebic meningoencephalitis (PAM) due to *Naegleria fowleri*, single cases of wound or other *Vibrio* infections and single cases of chemical or toxin poisoning associated with water may in some circumstances be considered waterborne disease outbreaks. This is the definition of a waterborne outbreak, as found in "Surveillance for Waterborne Disease and Outbreaks Associated with Recreational Water Use and Other Aquatic Facility-Associated Health Events – United States, 2005-2006" and "Surveillance for Waterborne Disease and Outbreaks Associated with Drinking Water and Water Not Intended for Drinking – United States, 2005-2006" in: CDC Surveillance Summaries, Sep. 12, 2008. MMWR 2008; 57 (No. SS-9). Available at <http://www.cdc.gov/mmwr/PDF/ss/ss5709.pdf>.

**Unspecified:** outbreaks were no longer reportable as this entity beginning Jan. 1, 2009. Data prior to 2009 included outbreaks of reportable disease agents that were neither foodborne, waterborne nor nosocomial.

**Unusual Incidence of Non-Class A, Class B or Class C Disease:** outbreaks were no longer reportable as this entity beginning Jan. 1, 2009. Data prior to 2009 included outbreaks in which the causative agent was not a Class A, B or C disease. Most of these were outbreaks of norovirus that were point-source or person-to-person spread.

**Zoonotic:** became a Class C reportable outbreak Jan. 1, 2009. The definition of a zoonotic outbreak is the occurrence of two or more cases of a similar illness with a common exposure to an animal source and not considered a foodborne or waterborne disease outbreak.

## NOTES ON RATE CALCULATIONS:

Population estimates for rates in the “Age in Years”, “Sex” and “County of Residence” tables come from the 2000 U.S. Census. Population estimates for rates in the “Year of Onset” table come from the U.S. Census midpoint estimates for each year. Rates were only calculated in the “Age in Years” table for the following conditions because they pertain to selected age populations and not the entire population (please refer to the “Age in Years” table for rates by age group, when available):

- Botulism, infant
- Cytomegalovirus (CMV), congenital
- Hepatitis B, perinatal infection
- Herpes, congenital
- Influenza-associated pediatric mortality
- Streptococcal disease, group B, in newborn
- *Streptococcus pneumoniae*, invasive disease, ages < 5 years
- *Streptococcus pneumoniae*, invasive disease, drug resistant, ages 5+ years
- *Streptococcus pneumoniae*, invasive disease, drug susceptible, ages 5+ years
- Toxoplasmosis, congenital

## DISEASES NOT INCLUDED IN TABLES:

There were no known cases in Ohio of the following reportable diseases during at least the past five years; thus, they are not included in the 2005-2009 disease tables (pp. 6-8):

- |   |  |
|---|--|
| • Anthrax                                   | • Psittacosis  |
| • Botulism, wound                           | • Rabies, human  |
| • Diphtheria                                | • Reye syndrome  |
| • Eastern equine encephalitis virus disease | • Rubella, congenital and not congenital                 |
| • Ehrlichiosis/anaplasmosis undetermined    | • Severe acute respiratory syndrome                      |
| • Encephalitis, post mumps                  | • Smallpox   |
| • Encephalitis, post chickenpox             | • <i>Staphylococcus aureus</i> , resistant to vancomycin |
| • Hantavirus                                | • Viral hemorrhagic fever                                |
| • Plague                                    | • Western equine encephalitis virus disease              |
| • Poliomyelitis                             | • Yellow fever   |
| • Powassan virus disease                    |  |

There were no outbreaks of the following reported 2005-2008:

- |                  |                  |
|------------------|------------------|
| • Blastomycosis  | • Sporotrichosis |
| • Histoplasmosis | • Toxoplasmosis  |

Reportable diseases not included in the “Age in Years,” “Sex,” “Month of Onset” and “County of Residence” tables (pp. 9-44) had no known cases reported in 2009.

## NOTE ON SALMONELLA SEROTYPES AND MENINGOCOCCAL DISEASE SEROGROUPS:

The bacteriology laboratory at ODH performs serotyping of *Salmonella* isolates and serogrouping of *Neisseria meningitidis* isolates. Hospital and other clinical laboratories are encouraged to send *Salmonella* and *Neisseria meningitidis* isolates to the ODH Laboratory for serotyping and serogrouping. The ODH Laboratory also requests *Escherichia coli*, *Listeria*, *Vibrio*, *Haemophilus influenzae* (in children under 5 years of age) and vancomycin resistant *Staphylococcus aureus*

isolates with a minimum inhibitory concentration (MIC) of 8 or greater. For further information on the submission of isolates, please contact the bacteriology laboratory at (614) 644-4656.

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