Communicable Diseases (CD) Quarterly Report
2019 2nd Quarter
CD Control Program, San Mateo County Health

Provider Reporting: 650.573.2346 (phone) 650.573.2919 (fax) · Issue No. 48 · Data to June 30, 2019
Catherine Sallenave, MD, CD Controller · Scott Morrow, MD, Health Officer

Selected Communicable Disease Cases Reported in San Mateo County

Disease	2019		2018	
	2nd Qtr	YTD	2nd Qtr	YTD
Chikungunya	0	0	0	0
Coccidioidomycosis*	4	12	1	10
Dengue	0	0	1	2
Leptospirosis	0	0	0	1
Listeriosis	0	0	0	0
Malaria*	0	0	1	1
Meningitis/Encephalitis$	6	8	3	7
Bacterial†	4	4	0	2
Fungal§	0	2	0	0
Viral	2	2	3	5
Meningococcal Disease	0	0	0	0
Typhus‡	0	0	0	1
Zika	0	0	2	3

*Includes confirmed cases only $Includes confirmed, probable, and suspect cases
†Excluding meningococcal meningitis §Excluding coccidioidomycosis ‡Typhus and other Non-Spotted Fever Rickettsioses

Selected Gastrointestinal Illnesses Reported in San Mateo County

Disease	2019		2018	
	2nd Qtr	YTD	2nd Qtr	YTD
Amebiasis*	2	4	4	5
Campylobacteriosis	76	154	60	133
Cryptosporidiosis	7	12	2	10
Cyclosporiasis	0	0	13	13
Giardiasis	14	27	26	48
Paratyphoid Fever	1	1	0	0
Salmonellosis (non-typhoid)	13	39	24	51
Shigellosis	13	31	24	44
STEC$ with HUS	0	0	1	1
STEC without HUS	17	25	10	19
Typhoid Fever	2	4	1	1
Vibriosis (non-cholera)	0	0	3	3

*Includes confirmed cases only $Shiga toxin-producing *Escherichia coli*

Selected Vaccine Preventable Diseases Reported in San Mateo County

Disease	2019		2018	
	2nd Qtr	YTD	2nd Qtr	YTD
Hepatitis A*	0	0	1	3
Measles*	2	4	0	0
Mumps	0	1	0	0
Pertussis^	24	57	45	73

*Includes confirmed cases only ^Includes confirmed, probable and suspect cases

About the Communicable Disease Control Program

The Communicable Disease Control Program is available to help meet the reporting needs and answer the questions of San Mateo County providers. To report a disease or outbreak, please call 650-573-2346 Monday through Friday, 8:00 am to 5:00 pm, or fax a Confidential Morbidity Report (CMR) to 650-573-2919. You may download an electronic copy of the CMR at smchealth.org/communicablediseasereporting. Web-based reporting via CalREDIE is also available. Please contact us if you would like to know more about, and sign up for, web-based reporting. Non-urgent questions and/or general inquiries may be directed to SMCCDControl@smcgov.org.

Data: California Reportable Disease Information Exchange (CalREDIE); data pulled 9/6/19. **Notes:** For individual diseases, morbidity is based on the date the case was received by the CD Control Program. Past totals may change due to delays in reporting from laboratories and providers, the use of different reporting systems, and changes to the resolution statuses of cases based on subsequent information received. All totals are for confirmed and probable cases, unless noted otherwise.
Authors: Carly Bock, Catherine Sallenave, and San Mateo County Health Office of Epidemiology

Focus on Baylisascariasis, Part 1

Raccoons are abundant in urban environments and carry a variety of diseases. A ubiquitous parasite of raccoons, ***Baylisascaris procyonis*** causes a widely recognized emerging zoonosis, baylisascariasis. Although few cases of *B. procyonis* encephalitis have been reported, prevention is critical because of the seriousness of the resulting **neurologic disease**.

The prevalence of *B. procyonis* in raccoon populations is generally quite high, especially in the northeastern, Midwestern and West Coast regions of the United States. Keeping raccoons as pets further increases the risk for human infection and has led to the introduction of the pathogen in new areas, such as Europe, Japan and China. Raccoons defecate in communal sites called **latrines**. Raccoon feces are usually dark and tubular, with a pungent odor. Latrines can be found at or on trees (around the base and at forks), raised horizontal surfaces such as fallen logs, tree stumps, woodpiles and large rocks, decks or patios, attics and garages.

B. procyonis is a **roundworm parasite**. Roundworm eggs are passed in the feces of infected raccoons, and **people become infected by accidentally swallowing eggs** from contaminated hands, soil or objects contaminated with raccoon feces. **Young children or developmentally disabled persons are at highest risk for infection** as they are more likely to put contaminated fingers, soil, or objects into their mouths. Baylisascariasis has been found to affect mostly young, male children, with 75% being less than 2 and 25% being less than 1, with an average age of 13 months.

There are **3 main clinical syndromes** associated with human infection by *B. procyonis*: **neural larva migrans (NLM), visceral larva migrans (VLM) and ocular larva migrans (OLM)**. Similarly to toxocariasis, **VLM** is typically related to heavy or repeated infection, with larval migration into and through the viscera. When larvae extend their migration into the CNS, **NLM** follows. When the burden of larvae is low, clinical NLM does not manifest. In contrast, clinical **OLM** can occur when only a single larva migrates into the eye. The majority of *B. procyonis* infections only involve a few larvae and remain asymptomatic.

More severe neurological lesions are associated with the ingestion of large numbers of eggs, usually as a result of pica. Most patients present with sudden lethargy or irritability, weakness, nuchal rigidity, ataxia, decreased head control, loss of fine motor skills and the inability to sit, stand or walk without assistance. Patients often become stuporous, fall into a coma and die. Those who survive are usually profoundly impaired and suffer from incontinence, seizures, blindness and partial paralysis.

Highlight – Animal Rabies Testing

Species # positive / # tested	2019		2018	
	2nd Qtr	YTD	2nd Qtr	YTD
Bat	**2** / 23	**3** / 27	**3** / 10	**4** / 15
Cat	0 / 6	0 / 11	0 / 10	0 / 16
Dog	0 / 13	0 / 22	0 / 12	0 / 20
Other†	0 / 4	0 / 9	0 / 18	0 / 21

Rabies testing was completed at the San Mateo County Public Health Laboratory. † 2019 2nd Qtr: 1 opossum, 2 raccoons, 1 rat; 2018 2nd Qtr: 6 opossums, 6 raccoons, 1 rat, 2 skunks, 3 squirrels