

California Department Health Services
Viral and Rickettsial Disease Laboratory

April 21, 2010

Mumps Virus Specimen Collection Form

Last Name: _____ First Name: _____ DOB: ____/____/____ Medical Rec #: _____

Address: _____ City: _____ Zip Code: _____

Phone: Home (____) _____ Work (____) _____

Sex: ☐ Male ☐ Female **Ethnicity:** ☐ Hispanic ☐ Non-Hispanic ☐ Unknown

Race: ☐ White ☐ Black ☐ Asian/ Pacific Islander ☐ American Indian/Alaskan Native ☐ Unknown ☐ Other: _____

Physician Information:

Name: _____ Facility: _____ Pager/Phone: (____) _____

Date of first symptom(s): ____/____/____ ☐ Hospitalized or ☐ ER / Outpatient

If hospitalized, admit date: ____/____/____ Discharge date: ____/____/____ If patient died, date of death: ____/____/____

Clinical syndrome:

Swelling of parotid gland ☐ Yes ☐ No ☐ Unk

If yes, give date of onset of parotid swelling: ____/____/____

Swelling of sublingual or submaxillary glands ☐ Yes ☐ No ☐ Unk

Fever ☐ Yes ☐ No ☐ Unk

URI symptoms (e.g. cough, sore throat) ☐ Yes ☐ No ☐ Unk

Asymptomatic ☐ Yes ☐ No ☐ Unk

Other, please describe _____

Complications (e.g, orchitis, meningitis/encephalitis):

History of clinical mumps

(prior to current illness): ☐ Yes ☐ No ☐ Unk

Vaccination History:

of doses (lifetime) of mumps containing vaccine received: _____

Vaccination Dates (if known):

____/____/____ ____/____/____ ____/____/____

Reason if not vaccinated:

Exposures/Travel within 4 wks of onset (specify details):

Traveled outside of California: ☐ Yes ☐ No ☐ Unk

If yes, where: _____

Contacts/exposures: _____

Disease suspected or test requested:

1 st	Specimen type and/or specimen source	Date Collected
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2 nd	Specimen type and/or specimen source	Date Collected
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3 rd	Specimen type and/or specimen source	Date Collected
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Submitter's Complete Mailing Address

This section for Virus Laboratory use only.
Date received by VRDL and State Accession Number

1st

2nd

3rd

David Schnurr, Ph.D., Acting Chief
Viral and Rickettsial Disease Laboratory
Division of Communicable Diseases
California Department of Health Services
850 Marina Bay Parkway
Richmond, CA 94804
phone (510) 307-8585 fax (510) 307-8599

Route to:

[] SERO
[] ISOL
[] FA
[] RAB
[] EM

[] BE
[] LC
[] _____

[] _____
[] _____
[] _____

[] E IgM
[] E PCR
[] H PCR
[] C PCR
[] _____
code:

FAX this form: (510) 307-8599 or MAIL to: CDHS VRDL, 850 Marina Bay Parkway, Richmond CA 94804

For questions regarding testing or specimens, call VRDL at 510.307.8585



CDHS Viral and Rickettsial Disease Laboratory (VRDL) Specimen Collection Guidelines for Mumps Virus Testing

The CDHS Viral and Rickettsial Disease Laboratory (VRDL) encourages submission of specimens from suspected cases of mumps in California. Laboratory diagnosis can be made either by isolation of mumps from urine and/or respiratory specimens or serologic testing.

Appropriate specimens for testing include:

Mumps Serology - VRDL currently performs an IFA assay to measure mumps IgM and IgG antibodies but results must be interpreted with caution since false positive or non-specific reactions are known to occur.

The gold standard remains the demonstration of a significant change (4 fold rise) in titer between the acute and convalescent samples.

Mumps Isolation can be attempted from throat swabs or buccal collected within 9 days of onset of parotitis.

Urine samples are not routinely recommended – Call VRDL for a consultation before collecting or submitting a urine sample.

Mumps Direct Detection by PCR – The VRDL is currently investigating the role of PCR as a tool for evaluation of cases of suspect mumps. *PCR will only be performed if it is accompanied by a blood sample for serological testing.*

At a minimum, both urine and respiratory specimens should be collected. Collection of serum samples in pediatric patients is **optional**.

Specimens should be stored at 4°C and shipped on wet ice or cold pack as soon as possible.

- Respiratory specimens can be held at 4°C for 48 hours before shipping. Otherwise, the specimens should be frozen at -70°C and shipped on dry ice.
- Ideally, urine specimens should be sent within 24 hours of collection. Otherwise, urine should be centrifuged at 2,500 times g for 15 minutes at 4°C to pellet the sediment. The sediment should then be resuspended in 2-3 ml of VTM or any cell culture medium and shipped at 4°C. If the pelleted specimens cannot be shipped within 48 hours, the pellet should be frozen at -70°C and shipped on dry ice, if necessary.

¹ False-positive IgM results by commercial immunofluorescent antibody assays have been reported. If the suspected case has received one or more doses of MMR, missing, delayed or transient IgM responses may also be seen. VRDL utilizes an in-house developed enzyme immunoassay (EIA) for serologic testing for mumps; there are currently no FDA-approved EIAs for detection of mumps IgM antibody.

**Please contact VRDL: 510.307.8585
for further instructions.**