

# CHICKENPOX OUTBREAK CONTROL

## Purpose

Contra Costa Health Services in conjunction with the State Dept. of Health Services and the Centers for Disease control and Prevention (CDC), actively participates in the national plan to reduce the occurrence of cases of chickenpox disease.

## History

Although chickenpox is a mild childhood disease, it can cause pneumonia or encephalitis and other complications. Newborns who develop chickenpox between ages 5 and 10 days and mothers who have chickenpox 5 days before or 2 days after delivery can have severe generalized chickenpox.

Before there was chickenpox vaccine, 85% of chickenpox disease occurred among children under 15 years old. Of this number, 39% occurred in children between age 1 and 4 years, probably due to chickenpox exposure in preschool and childcare settings and 38% occurred in children between age 5 and 9 years.

Since chickenpox vaccination was introduced in 1995, chickenpox disease occurrence was reduced by 76% -86% in 2001. The local Department of Health Services, the State Department of Health Services and the CDC has a national plan to increase chickenpox vaccination among children to 90%.

## Control Measures

Outbreaks of chickenpox in schools and day care centers are reportable to the local Health Department by calling the Communicable Disease Section at (925) 313-6740. Upon receiving an outbreak report, a Public Health Nurse will request immunization history information and chickenpox disease history about the children attending the preschool or day care center and will ask if any pregnant female staff member or pregnant parent volunteer was exposed to the chickenpox case. Pregnant women exposed to the chickenpox case need to be informed that they need to inform their healthcare provider about the exposure.

Persons with chickenpox should be excluded from school, work or daycare until lesions have crusted (usually about 5 days). For immune-compromised persons and children who have waived chickenpox immunization, call the Communicable Disease Section for recommendations.

In order to control or prevent further outbreak children and staff members who are susceptible to chickenpox disease should receive the chickenpox vaccine if they are eligible for it. Chickenpox vaccine is effective in preventing illness or lessening the severity of disease if given within 3 days of exposure. Susceptible persons are those who have not had chickenpox vaccine or have not had the disease. Notification letter should be sent to parents recommending vaccination of susceptible children.

## MEASLES OUTBREAK CONTROL

### Purpose

Contra Costa Health Services, in conjunction with the California Department of Health Services and the Centers for Disease Control (CDC) in Atlanta, actively participates in the national plan to eradicate measles (Rubeola).

### History

Although many consider measles to be "just another childhood disease", measles can be severe, especially in young children and adults. Complications from measles may result in blindness, otitis media (middle ear infection), pneumonia, encephalitis, or death.

Worldwide measles continues to be the leading vaccine-preventable killer of children, according to the World Health Organization (WHO). In the United States, before measles vaccine became readily available, 500,000 cases and 500 deaths were reported annually. Currently, with our high level of immunization and strict measures, the number of measles cases has dropped 99% and measles in the United States is now a fairly rare disease.

### Control Measures

The Contra Costa Health Services requires phone reports of rash/fever illness to our Communicable Disease section (925) 313-6740 by schools and day care providers. Upon receiving a report of measles, Public Health will gather information from the child's parents/guardian and /or the child's health care provider. If the findings of Public Health meet the State-mandated criteria, Public Health will report the case as measles.

Because measles is one of the most readily transmitted of all communicable diseases, one case of measles is defined as an outbreak. In an outbreak situation, an investigation is undertaken to find the source of the disease, and to find contacts to the case that might have been exposed while the patient was infectious.

Additionally, if an outbreak occurs in a school or day care center, children who are susceptible (not vaccinated against measles (are excluded from school the length of the incubation period (a minimum of 14 days—longer if further cases are identified). If a child receives a vaccine he may return to school immediately.