



Send or Fax to:  
 ADHS Infectious Disease Epidemiology  
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 Phoenix, Arizona 85007-3237  
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**Outbreak Name:** \_\_\_\_\_  
**Part of National Outbreak?**  Yes  
**Epi-linked to confirmed case?**  Yes MEDSISID \_\_\_\_\_

# INFANT BOTULISM

## (THIS IS AN IMMEDIATELY NOTIFIABLE DISEASE)

### PATIENT INFORMATION

MEDSIS Case No: \_\_\_\_\_  
 County: \_\_\_\_\_  
 Confirmed       Probable  
 Ruled Out       Lost to follow up

Name (last, first) \_\_\_\_\_  
 Street address \_\_\_\_\_  
 City \_\_\_\_\_ State \_\_\_\_\_ Zip \_\_\_\_\_  
 Mailing address \_\_\_\_\_

#### REPORT SOURCE

Initial report date: \_\_\_\_\_  
 Reporter: \_\_\_\_\_  
 Reporter org.: \_\_\_\_\_  
 Reporter phone: \_\_\_\_\_  
 Provider name \_\_\_\_\_  
 Provider org.: \_\_\_\_\_  
 Provider phone: \_\_\_\_\_

Phone \_\_\_\_\_ Alt. Phone \_\_\_\_\_  
 Hospital Name: \_\_\_\_\_ Hosp Phone: \_\_\_\_\_  
 Physician Name: \_\_\_\_\_ Physician Phone: \_\_\_\_\_  
 Birthdate \_\_\_\_ / \_\_\_\_ / \_\_\_\_ or age \_\_\_\_ Sex:  Male  Female  Unknown/Other  
 Ethnicity:  Hispanic       Non-Hispanic       Unknown  
 Race:  White       African American       Native Hawaiian/Pac Islander  
 Asian       Amer Indian / AK Native  Other \_\_\_\_\_

Interviewee:  Mother (Name: \_\_\_\_\_)  Father (Name: \_\_\_\_\_)  Both  Other \_\_\_\_\_  
 Mother's Occupation: \_\_\_\_\_ Father's Occupation: \_\_\_\_\_  
 What was infant's birth weight? \_\_\_\_ (lbs) \_\_\_\_ (oz) \_\_\_\_ (gm)  
 Was infant premature?  Yes  No  Unknown  
 If yes, gestational age: \_\_\_\_\_ weeks      Type of delivery:  Vaginal  C-Section

## CLINICAL INFORMATION

### SYMPTOM HISTORY

Mother first noted infant was ill on \_\_\_\_ / \_\_\_\_ / \_\_\_\_ at \_\_\_\_\_ weeks of age.  
 First symptom: \_\_\_\_\_  
 Second symptom: \_\_\_\_\_  
 The initial visit to a physician was on: \_\_\_\_ / \_\_\_\_ / \_\_\_\_ at \_\_\_\_\_ weeks of age  
 The infant was hospitalized on: \_\_\_\_ / \_\_\_\_ / \_\_\_\_ at \_\_\_\_\_ weeks of age  
 Did infant have constipation?  Yes  No  Unknown  
 If yes, how many bowel movements were occurring?  
 Two or more per day     One per day     One every other day     Two to three per week  
 One per week     Less than one per week     Other

**Infant Botulism**

Name (Last, First): \_\_\_\_\_

**CLINICAL INFORMATION CONTINUED****SYMPTOM HISTORY**

	YES	NO	UNKNOWN				
Altered Cry **?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Irritable?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
General muscle weakness*? "Floppy"?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Poor head control?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Upper extremities?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Lower extremities?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Weak suckling*?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Loss of facial expression*?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Difficulty breathing?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Trouble swallowing?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Ptosis**? (droopy eyes)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Extraocular palsy?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Pupils:				Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Dilated*	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Constricted	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Sluggish reactivity*	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Fever?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Constipation*?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Diarrhea?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Somnolent*?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Dehydration?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Respiratory difficulty*?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Respiratory arrest?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Pneumonia?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>
Other _____	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	Onset Date: ___/___/___	Onset time: _____	<input type="checkbox"/>	AM <input type="checkbox"/>

**PHYSICAL EXAM FINDINGS**Abnormal deep tendon reflexes?  Yes  No  UnknownIf Yes, then which?  Absent  DepressedWeakness or paralysis?  Yes  No  Unknown

Onset Date: \_\_\_/\_\_\_/\_\_\_; Time \_\_\_:\_\_\_

If Yes, then:

Upper extremities?  Yes  No  Unknown      Bilateral?  Yes  No  UnknownIs weakness or paralysis:  Upper distal  Upper proximalLower extremities?  Yes  No  Unknown      Bilateral?  Yes  No  UnknownIs weakness or paralysis:  Lower distal  Lower proximalDescribe progression of the weakness:  Ascending  Descending  Unknown

\* are typical signs of infant botulism

**Infant Botulism**

Name (Last, First): \_\_\_\_\_

**DIAGNOSTIC TESTS**

A) Was a lumbar puncture (spinal tap) done? (*Should be normal in botulism, myasthenia gravis; protein may be elevated in Guillain-Barre*)  Yes  No  Unknown

Date performed: \_\_\_\_/\_\_\_\_/\_\_\_\_

WBC ( $\mu$ l): \_\_\_\_\_ RBC( $\mu$ l): \_\_\_\_\_ Protein (mg/dl): \_\_\_\_\_ Glucose (mg/dl): \_\_\_\_\_

B) Was a tensilon test (edrophonium chloride) done? (*Negative in botulism and Guillain-Barre, positive in myasthenia gravis. After administration of Tensilon the patient's eye signs (ptosis & extraocular abnormalities) markedly decrease*)  Yes  No  Unknown

Date performed: \_\_\_\_/\_\_\_\_/\_\_\_\_

Result:  Positive  Negative  Equivocal

C) Was electromyography (EMG) done? (*Botulism: action potential diminished after a single supramaximal stimulus, facilitation with repetitive stimuli at 20-50/sec; Myasthenia Gravis: similar to botulism. In Guillain-Barre: slowed nerve conduction, whereas there is normal conduction in botulism*)  Yes  No  Unknown

Date performed: \_\_\_\_/\_\_\_\_/\_\_\_\_ Nerve stimulated: \_\_\_\_\_ Stimulated frequency: \_\_\_\_\_

Amplitude:  Increase  Decrease Facilitation:  Yes  No

D) Was rapid repetitive stimulation conducted?  Yes  No  Unknown

Hertz: \_\_\_\_\_ Results: \_\_\_\_\_

E) Was computed tomography (CT) done?  Yes  No  Unknown

Date Performed: \_\_\_\_/\_\_\_\_/\_\_\_\_ Findings: \_\_\_\_\_

F) Was magnetic resonance imaging (MRI) done?  Yes  No  Unknown

Date performed: \_\_\_\_/\_\_\_\_/\_\_\_\_ Findings: \_\_\_\_\_

**TREATMENT**

A) Respiratory assistance needed?  Yes  No  Unknown If yes, number of days: \_\_\_\_\_

Oxygen only?  Yes  NoTracheostomy?  Yes  NoIntubation?  Yes  NoVentilator?  Yes  No

B) Infant feeding tube?  Yes  No  Unknown If yes, number of days: \_\_\_\_\_

C) <u>Antibiotics given</u>	<u>Route (circle one)</u>	<u>Dose (gms/day)</u>	<u>Duration (days)</u>	<u>Date started</u>
_____	Oral / Parenteral	_____	_____	____/____/____
_____	Oral / Parenteral	_____	_____	____/____/____

D) **Physician's differential diagnosis:**

1)

2)

3)

4)

E) Is physician requesting botulism immune globulin?  Yes  No  Unknown If yes,

Has CA Infant Botulism Program been contacted?  Yes  No  Unknown

Contact Name: \_\_\_\_\_ Phone: \_\_\_\_\_

F) Was botulism immune globulin (Baby BIG) given:  Yes  No  Unknown Date: \_\_\_\_/\_\_\_\_/\_\_\_\_ Time: \_\_\_\_\_

If yes, route?  I.V.  I.M.  Both  Unknown Amount: \_\_\_\_\_

G) Other specific therapeutic medication given: \_\_\_\_\_

H) Patient outcome:  Improving  Recovered  Died If patient died: \_\_\_\_/\_\_\_\_/\_\_\_\_ (date of death)

**LABORATORY INFORMATION**

Was a toxin assay done?  Yes  No  Unknown      If yes, date collected: \_\_\_\_/\_\_\_\_/\_\_\_\_  
 Type of sample(s):  Stool  Serum  Gastric aspirate  Sputum  Food  Other  
 Test results:  Positive  Negative  Inconclusive      Type:  A  B  E  F  Other: \_\_\_\_\_

Was a culture done?  Yes  No  Unknown      If yes, date collected: \_\_\_\_/\_\_\_\_/\_\_\_\_  
 Type of sample(s):  Stool  Serum  Gastric aspirate  Sputum  Food  Other  
 Test results:  Positive  Negative  Inconclusive      Type:  A  B  E  F  Other: \_\_\_\_\_

**DIETARY HISTORY (BEFORE ONSET OF PRESENT ILLNESS)**

Before onset of present illness:

Was infant ever breast fed?  Yes  No      If yes, for how many weeks? \_\_\_\_\_

Was infant ever formula fed?  Yes  No      If yes, formula with iron?  Yes  No

Was infant primarily (more than 50%): Breast fed:  Yes  No      Formula fed:  Yes  No  
    Fed both approximately equally?  Yes  No

Did infant use a pacifier?  Often  Sometimes  Rarely  No  
    If yes, was it ever dipped in:  Syrup  Honey  Other \_\_\_\_\_  Nothing

Did infant ever eat or taste (before onset of illness):

Food/Liquid	Never	Once or a few times	Many Times	Daily or most days	Principle type/brand
Formula?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Pasteurized Milk?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Unpasteurized Milk?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Fruit Juices?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Cereal?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Bread?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Syrup/Water?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Honey/Water?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Sugar/Water?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Tea/Water?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Cooked Fruits?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Raw Fruits?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Cooked Vegetables?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Raw Vegetables?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Home-canned Foods?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Baby Food (Jars)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	

Were any food, medications or environmental samples tested at CDC?  Yes  No  Unknown

If yes, list: \_\_\_\_\_

Results:  Preformed toxin  *C. botulinum*  Both  Neither

**ENVIRONMENTAL HISTORY**

**(Have the interviewee answer the following questions from the birth of the infant to the present illness)**

Was there any construction near the home?  Yes  No  Unknown

Approximate dates: \_\_\_/\_\_\_/\_\_\_ to \_\_\_/\_\_\_/\_\_\_

Describe: \_\_\_\_\_

Was there any excessive dust or environmental change near the home?  Yes  No  Unknown

Approximate dates: \_\_\_/\_\_\_/\_\_\_ to \_\_\_/\_\_\_/\_\_\_

Describe: \_\_\_\_\_

Were the parents involved in gardening work?  Yes  No  Unknown

Approximate dates: \_\_\_/\_\_\_/\_\_\_ to \_\_\_/\_\_\_/\_\_\_

Describe: \_\_\_\_\_

Did the infant remain away from home for >1 week?  Yes  No  Unknown

Approximate dates: \_\_\_/\_\_\_/\_\_\_ to \_\_\_/\_\_\_/\_\_\_

Describe: \_\_\_\_\_

**FOR PUBLIC HEALTH DEPARTMENT USE ONLY**

Reported by: *(Check all that apply)*

Hospital Physician/ICP  Clinic/Doctor's Office  Hospital Lab  State Lab  General Public  Other \_\_\_\_\_

What is the date they reported to public health? \_\_\_/\_\_\_/\_\_\_

Case investigated by: \_\_\_\_\_ Investigation start date: \_\_\_/\_\_\_/\_\_\_

Agency: \_\_\_\_\_ Phone: \_\_\_\_\_

How was person likely exposed?

Food  Environmental  Unknown

Where did the exposure likely occur? \_\_\_\_\_

No risk factors/exposures could be identified

Patient could not be interviewed/LTF

Case is part of known outbreak

Outbreak Name: \_\_\_\_\_

NORS ID: \_\_\_\_\_

Epi-linked to confirmed case?

MEDISIS ID of confirmed case: \_\_\_\_\_

**ACTIONS TAKEN (IF APPLICABLE):**

ADHS Foodborne Disease Epidemiologist notified

Environmental health notified

Initiate trace-back investigation

Referral of suspect food to regulatory agency

Education provided to case/contacts/facilities

Follow-up on contacts who may have been exposed

Other: \_\_\_\_\_

**NOTES**

INVESTIGATOR(S): \_\_\_\_\_ DATE: \_\_\_/\_\_\_/\_\_\_ DATE CLOSED: \_\_\_/\_\_\_/\_\_\_