Specimen Requirements for *Escherichia coli* O157:H7, *Escherichia* non-O157 (STEC), *Salmonella* serotypes, *Shigella sonnei* and *Shigella flexneri*: Strain Characterization by Pulse-Field Gel Electrophoresis

**Methodology:** Pulse-Field Gel Electrophoresis (PFGE)

**Performed:**

PFGE is not offered for individual diagnostic purposes. Only specimens received from Medical Microbiology Branch (MMB) and approved by the Disease Investigation Branch (DIB) of the Disease Outbreak and Control Division of the Department of Health will be tested.

**Turn-Around-Time:**

4 days (*E.coli*)
7 days (*Salmonella* and *Shigella*)

**Specimen required:**
Collect isolated colonies from a pure culture inoculated on agar slants. Specimens should be epidemiologically related (i.e., part of suspected outbreak) or should be collected from recurrent isolates from the same patient. In the latter case, requests for PFGE addressing individual patient treatment will be refused and the submitter will be advised to send isolates to a private laboratory (e.g., cases of persistent infection(s) were antibiotic treatment is suspected to be ineffective).

**Specimen transport:**
For MMB, isolates will be inoculated on TSA slants and placed in PFGE box with accompanying line list for PFGE analyst to pick up.

**Specimen submission:**
Isolates will be picked up by PFGE analyst no later than 3:30pm for processing, except on Wednesdays as this does not allow analyst enough time to meet turn-around-time.

**Unacceptable conditions:**
Nonviable organisms, organisms inoculated on broth or plate media, mixed cultures, unlabeled specimens, and leaking containers.

**Stability:**
Ambient-7days

**Requisition:**
Form 81.3 or line list from MMB. Each specimen submitted must have a unique identifier for each specimen and other pertinent information.
Test performed at: Biological Response Laboratory (BRL)
State Laboratories Division, Hawaii Department of Health
2725 Waimano Home Road
Pearl City, Hawaii 96782

Contact: Pamela O’Brien (808) 453-5984
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10/24/11
Date

10/28/2011
Date