**Supplemental Table 1:** Results of Environmental Samples

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **Sample Number** | **Sample Type** | **Inpatient vs. Outpatient** | **Room** | **Sample Description** | **Microbial Growth** |
| 1 | **L** | **O** | **Exam A** | **Exam table** | ***C. difficile* confirmed, NAP4 PFGE type** |
| 2 | S | O | Exam A | Door handle | NSC |
| 3 | S | O | Exam A | Keyboard | NSC |
| 4 | L | O | Exam B | Multiple surfaces | NSC |
| 5 | L | O | Exam B | Multiple surfaces | NSC |
| 6 | L | O | Exam C | Stethoscope, exam table, chair, computer mouse, faucet handles | NSC |
| 7 | L | O | Infusion A | Door handle | NSC |
| 8 | L | O | Infusion A | Faucet handle and countertop | NSC |
| 9 | L | O | Infusion A | Stethoscope | NSC |
| 10 | L | O | Infusion A | Bedrails | NSC |
| 11 | L | O | Infusion A | Television Remote Control | NSC |
| 12 | L | O | Infusion A | Medication scanner | NSC |
| 13 | L | O | Infusion A | Keyboard | NSC |
| 14 | L | O | Infusion A | Board game cover and game pieces | NSC |
| 15 | L | O | Infusion B | Stethoscope | NSC |
| 16 | L | O | Infusion B | Faucet handle and countertop | NSC |
| 17 | L | O | Infusion B | Medication scanner | NSC |
| 18 | L | O | Infusion B | Television Remote Control | NSC |
| 19 | L | O | Infusion B | Bedrails | NSC |
| 20 | D | O | Infusion B | Blood pressure cuff | NSC |
| 21 | D | O | Infusion B | Curtain | NSC |
| 22 | S | O | Infusion B | Door handle | NSC |
| 23 | L | O | Infusion C | Multiple surfaces | NSC |
| 24 | L | O | Infusion C | Multiple surfaces | NSC |
| 25 | S | O | Infusion D | Keyboard | NSC |
| 26 | D | O | Infusion E | Curtain | NSC |
| 27 | D | O | Infusion F | Blood pressure cuff | NSC |
| 28 | L | O | Medication supply | Medication dispenser keyboards and handles | NSC |
| 29 | L | O | Hallway restroom | Door handle, faucet handles | NSC |
| 30 | L | O | Hallway restroom | Toilet railings and flusher | NSC |
| 31 | L | O | Family lounge | Refrigerator door handles | NSC |
| 32 | L | O | Soiled Utility | Countertop scale, urinalysis machine power button | NSC |
| 33 | L | O | Common area | Refrigerator door handles | NSC |
| 34 | L | I | 2 | Bathroom\* | NSC |
| 35 | L | I | 2 | Room\*\* | NSC |
| 36 | L | I | 3 | Bathroom\* | NSC |
| 37 | L | I | 3 | Room\*\* | NSC |
| 38 | L | I | 6 | Bathroom\* | NSC |
| 39 | L | I | 6 | Room\*\* | NSC |
| 40 | L | I | 8 | Bathroom\* | NSC |
| 41 | L | I | 8 | Room\*\* | NSC |
| 42 | L | I | 9 | Bathroom\* | NSC |
| 43 | L | I | 9 | Room\*\* | NSC |
| 44 | L | I | 15 | Bathroom\* | NSC |
| 45 | L | I | 15 | Room\*\* | NSC |
| 46 | L | I | 18 | Bathroom\* | NSC |
| 47 | L | I | 18 | Room\*\* | NSC |
| 48 | L | I | 18 | Bathroom\* | NSC |
| 49 | L | I | 18 | Room\*\* | NSC |
| 50 | L | I | 23 | Bathroom\* | NSC |
| 51 | L | I | 23 | Room\*\* | NSC |
| 52 | L | I | 24 | Bedrails | Presumptive *Bacillus cereus;* NSC |
| 53 | L | I | 24 | Bedside tray table drawer, chair armrest | NSC |
| 54 | L | I | 24 | Remote control, telephone | NSC |
| 55 | L | I | 24 | Faucet handle and countertop | NSC |
| 56 | L | I | 24 | Toilet rail, flusher, bedpan rinser | NSC |
| 57 | L | I | 24 | Bathroom diaper scale | NSC |
| 58 | S | I | 24 | Patient hands, abdomen, groin | NSC |
| 59 | L | I | 24 | Bedrails | NSC |
| 60 | L | I | 24 | Bedside tray table drawer, chair armrest | NSC |
| 61 | L | I | 24 | Remote control, telephone | NSC |
| 62 | L | I | 24 | Faucet handle and countertop | NSC |
| 63 | L | I | 24 | Toilet rail, flusher, bedpan rinser | NSC |
| 64 | L | I | 24 | Bathroom diaper scale | NSC |
| 65 | L | I | Nursing Station | 2 Laptop keyboards and 2 video game controllers | NSC |
| 66 | L | I | Hallway | Chair handles | NSC |
| 67 | L | I | Common areas | Refrigerator door handles, refreshment room, family room | NSC |
| 68 | D | I | not specified | Case patient blanket | NSC |
| 69 | D | I | not specified | Case patient stuffed animal | NSC |
| 70 | L | I | not specified | Wagon used for child transportation | NSC |
| 71 | L | I | not specified | Staff badge | NSC |
| **Abbreviations:** D-Dust sample, I-Inpatient area, L-Large surface, NAP- North American pulsed-field gel electrophoresis type, O-Outpatient area, S-Small surface, \*Includes faucet handles, railing, toilet flush handle, bedpan rinser, \*\*Includes bedrails and buttons, television remote control, tray table edge, NSC-No suspect colonies | | | | | |

**Supplemental Table 2:** Summary of laboratory characterization of *Clostridium difficile* isolates collected August 15-September 27, 2012

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **PFGE Type** | **tcdA/tcdB** | **cdtA/cdtB** | **tcdC deletion** | **Number of Isolates** | **Number of Patients** | **Case-Patient/Source** |
| NAP4 | **+/+** | **-/-** | 0 bp | 4 | 4 | CP21  (93 days after initial diagnosis) |
| CP12 (65 days after initial diagnosis) |
| Exam table used by CP12 (asymptomatic, 51 days after diagnosis) |
| \* |
| Unnamed | **+/+** | **-/-** | 0 bp | 4 | 3 | CP1 (initial diagnosis) |
| CP8 (49 days after initial diagnosis) |
| \*\* (31 days after initial diagnosis) |
| \*\*\* |
| NAP6 | **+/+** | **-/-** | 0 bp | 3 | 3 | CP2 (initial diagnosis) |
| \* |
| \* |
| NAP11 | **+/+** | **-/-** | 0 bp | 2 | 2 | \*\* (initial diagnosis) |
| \* |
| NAP10† | **-/-** | **-/-** | NP | 2 | 1 | CP4 (initial diagnosis and 28 days after diagnosis) |
| Unnamed† | **-/-** | **-/-** | NP | 2 | 1 | CP3 (initial diagnosis and 27 days after diagnosis) |
| NAP1 | **+/+** | **+/+** | 18 bp | 1 | 1 | \* |
| NAP1-related | **+/+** | **+/+** | 18 bp | 1 | 1 | \* |
| NAP12 | **+/+** | **-/-** | 0 bp | 1 | 1 | \* |
| Unnamed | **+/+** | **+/+** | 0 bp | 1 | 1 | \* |
| Unnamed | **+/+** | **-/-** | 0 bp | 1 | 1 | \* |
| Unnamed | **+/+** | **-/-** | 0 bp | 1 | 1 | \* |
| \*isolate from a unique patient not part of June-August 2012 cluster of infections | | | | | | |
| \*\*single case patient with a remote history of CDI prior to CCBD care (not included in case description or case-control study), who was again diagnosed with CDI, classified as a subsequent incident case | | | | | | | |
| \*\*\*hospital reference strain | | | | | | |  |
| † Isolates tested negative for toxins A/B and binary toxin at CDC despite patients testing positive by PCR in the hospital | | | | | | |  |
| Abbreviations: bp- base pairs, CP-case-patient, NAP- North American pulsed-field gel electrophoresis type, NP- no tcdC peak seen on capillary electrophoresis | | | | | | |  |