**Supplemental Table 1.** Summary of CRE Case Definitions from October 2012 – December 2017

|  |  |
| --- | --- |
|  | CRE Case Definition |
| Oct 2012 – Dec 2013  | Any Enterobacteriaceae resistant to all 3rd generation cephalosporins tested and non-susceptible to 1+ carbapenems  |
| Jan 2014 – April 2015 | *E. coli* and *Klebsiella* spp. resistant to all 3rd generation cephalosporins tested and non-susceptible to 1+ carbapenems.  |
| May 2015 – Dec 2017  | *E. coli, Klebsiella* spp., and *Enterobacter* spp. resistant to any carbapenem  |

All breakpoints were determined using the Clinical Laboratory Standards Institute (CLSI) guide-

lines current at time of surveillance.

**Supplemental Table 2.** Amplification oligonucleotide primer sequences used to detect carbapenemase genes.

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Target | Primer Designation | Primer Sequence (5’ 🡪 3’) | Annealing Temp | Reference | PMID No. for Reference |
| KPC | KPC-Fm | CGTCTAGTTCTGCTGTCTTG | 57°C | [Nordmann EID 2011;17:1791-98](http://www.ncbi.nlm.nih.gov/pmc/articles/PMC3310682/?tool=pubmed) | [PMID: 22000347](http://www.ncbi.nlm.nih.gov/pmc/articles/PMC3310682/?tool=pubmed) |
| KPC2-Rv | AATCCCTCGAGCGCGAGT | Mataseje JAC 2011 Jun;66(6):1273-7 | [PMID: 21406433](http://www.ncbi.nlm.nih.gov/pubmed/?term=plasmid+comparison+and+molecular+analysis+mataseje) |
| NDM | NDM-F | GGTTTGGCGATCTGGTTTTC | [Nordmann EID 2011;17:1791-98](http://www.ncbi.nlm.nih.gov/pmc/articles/PMC3310682/?tool=pubmed) | [PMID: 22000347](http://www.ncbi.nlm.nih.gov/pmc/articles/PMC3310682/?tool=pubmed) |
| NDM-R | CGGAATGGCTCATCACGATC |
| OXA-48 | OXA-48-F | GCGTGGTTAAGGATGAACAC | [Nordmann EID 2011;17:1791-98](http://www.ncbi.nlm.nih.gov/pmc/articles/PMC3310682/?tool=pubmed) | [PMID: 22000347](http://www.ncbi.nlm.nih.gov/pmc/articles/PMC3310682/?tool=pubmed) |
| OXA-48-R | CATCAAGTTCAACCCAACCG |
| VIM | VIM-F2 | GTTTGGTCGCATATCGCAAC | [Pitout et.al JCM 2012 VIM 3877](http://www.ncbi.nlm.nih.gov/pubmed/?term=PMID%3A+22993175) | PMID: 22993175 |
| VIM-R2 | AATGCGCAGCACCAGGATAG |
| IMP | IMP-F | GGAATAGAGTGGCTTAAYTC | [Nordmann EID 2011;17:1791-98](http://www.ncbi.nlm.nih.gov/pmc/articles/PMC3310682/?tool=pubmed) | [PMID: 22000347](http://www.ncbi.nlm.nih.gov/pmc/articles/PMC3310682/?tool=pubmed) |
| IMP-R | TCGGTTTAAYAAAACAACCACC |

**Supplemental Table 3.** Patients positive for multiple organism-carbapenemase combinations.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Patient No. | Organism | Carbapenemase gene detected | Recovered together (Y/N) | Specimen Type |
| 1 | *Klebsiella pneumoniae* | NDM | Y | Urine |
| *Klebsiella pneumoniae* | OXA-48 |
|  |  |  |  |  |
| 2 | *E. coli* | NDM | N | Blood |
| *Klebsiella pneumoniae* | OXA-48 | Blood  |
|  |  |  |  |  |
| 3 | *E. coli* | OXA-48 | N | Urine |
| *Klebsiella pneumoniae* | OXA-48 | Urine |
|  |  |  |  |  |
| 4 | *Klebsiella pneumoniae* | NDM | Y | Urine |
| *Klebsiella pneumoniae* | OXA-48 |