**Supplementary Table 1: Characteristics of patients with ICU-acquired CRKP pneumonia.**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Variables** | **Total**  **(*n*=76)** | **With BSI**  **(*n*=18)** | | **Without BSI**  **(*n*=58)** | **Statistics** | | ***P* values** |
| Demographics  Age (years)  Male  Severity at infection onset  APACHE II score  SOFA score  Septic shock  Fever  Urinary tract infection  Laboratory tests  Leukocyte (×109/L)  Neutrophil (×109/L)  Lymphocyte (×109/L)  Platelet (×109/L)  PCT (ng/ml)  CRP (mg/L)  Outcome  28-day mortality | 70.50 (62.25, 80.00)  66 (86.8)  15.00 (11.25, 21.00)  5.00 (3.00, 9.75)  42 (55.3)  63 (82.9)  12 (15.8)  12.79 (10.48, 19.19)  11.05 (8.25, 17.82)  0.63 (0.33, 0.99)  142.00 (70.00, 198.75)  0.86 (0.25, 3.62)  110.00 (35.48, 171.00)  27 (35.5) | 67.00 (63.75, 74.75)  17 (94.4)  25.50 (17.75, 31.00)  9.50 (6.75, 12.00)  15 (83.3)  18 (100.0)  8 (44.4)  18.69 (10.90, 28.07)  16.56 (8.54, 25.86)  0.37 (0.16, 0.77)  57.50 (21.50, 93.50)  2.72 (0.84, 10.56)  131.50 (86.23, 231.00)  14 (77.8) | 73.00 (61.50, 81.00)  49 (84.5)  13.00 (10.00, 18.00)  4.00 (3.00, 7.00)  27 (46.6)  45 (77.6)  4 (6.9)  12.40 (10.30, 18.43)  10.59 (8.01, 16.87)  0.71 (0.35, 1.04)  159.00 (96.25, 209.75)  0.39 (0.25, 2.93)  94.15 (26.43, 160.25)  13 (22.4) | | 445.50∗  0.480†  136.00∗  219.00∗  7.517†  4.867†  11.878†  381.00∗  364.00∗  340.50∗  178.00∗  288.50∗  326.00∗  18.383† | 0.350  0.488  <0.001  <0.001  0.006  0.031  0.001  0.085  0.054  0.027  <0.001  0.011  0.025  <0.001 | |

Data are presented as *n* (%) or median (Q1, Q3). ∗*U* values; †*χ*2 values. ICU: Intensive care unit; CRKP: Carbapenem-resistant *Klebsiella* pneumoniae; BSI: Bloodstream infection; APACHE II: Acute physiology and chronic health evaluation II; SOFA: Sequential organ failure assessment; PCT: Procalcitonin; CRP: C-reactive protein.

**Supplementary Table 2: Univariate and multivariate analysis of risk factor associated with 28-day mortality among patients with ICU-acquired CRKP pneumonia.**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Variables** | **Univariate analysis**  **OR 95% CI** | | ***P*** | **Multivariate analysis**  **OR 95% CI** | | ***P*** |
| Age (years)  Fever  Septic shock  Urinary tract infection  ICU within 1 month  Leukocyte (×109/L)  Neutrophil (×109/L)  Lymphocyte (×109/L)  Platelet (×109/L)  PCT (ng/ml)  APACHE II score  SOFA score  Secondary CRKP-BSI | 1.019  3.618  13.778  3.080  0.868  1.032  1.045  0.064  0.989  1.027  1.143  1.276  12.115 | 0.988-1.050  0.739-17.725  3.632-52.270  0.871-10.896  0.313-2.406  0.984-1.081  0.991-1.103  0.013-0.303  0.982-0.996  0.989-1.066  1.059-1.234  1.108-1.470  3.399-43.187 | 0.233  0.113  <0.001  0.081  0.786  0.192  0.103  0.001  0.002  0.166  0.001  0.001  <0.001 | 7.955  0.071  1.004  0.997  1.121  10.308 | 1.406-45.000  0.008-0.625  0.995-1.014  0.876-1.134  0.907-1.385  1.339-79.381 | 0.019  0.017  0.386  0.962  0.291  0.025 |

APACHE II: Acute physiology and chronic health evaluation II; BSI: Bloodstream infection; CI: Confidence interval; CRKP: carbapenem resistant *Klebsiella pneumoniae*; ICU: Intensive care unit; OR: Odds ratio; PCT: Procalcitonin; SOFA: Sequential organ failure assessment.



**Supplementary Figure 1:** Kaplan-Meier survival was used to estimate the 28-day survival rate. (A) Cumulative survival rate of patients with or without secondary CRKP-BSI. (B) Cumulative survival rate of patients with or without septic shock. (C) Cumulative survival rate of patients who received colistin-included therapy and those who received colistin-excluded therapy in NBSI group. (D) Cumulative survival rate of patients who received colistin-included therapy and those who received colistin-excluded therapy in BSI group. BSI: Bloodstream infection; CRKP: Carbapenem resistant *Klebsiella pneumoniae*; NBSI: Non-bloodstream infection.