

Supplemental Content for:

The presentation, pace, and profile of infection and sepsis patients hospitalized through the emergency department: an exploratory analysis

Vincent X Liu, MD MS; Meghana Bhimarao, MS; John D Greene, MA; Raj N Manickam, MS; Adriana Martinez; Alejandro Schuler, PhD MS; Fernando Barreda, MHA; Gabriel J Escobar, MD

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Supplemental Table 1. International Classification of Disease (ICD) diagnosis codes for hospitalizations for patients with heart failure and stroke without suspected infection.

Cohort	Version	ICD Diagnosis Codes
Heart failure	9	398.91, 402.01, 402.11, 402.91, 404.01, 404.03, 404.11, 404.13, 404.91, 404.93, 428, 428.1, 428.2, 428.21, 428.22, 428.23, 428.3, 428.31, 428.32, 428.33, 428.4, 428.41, 428.42, 428.43, 428.9
Heart failure	10	I09.81, I11.0, I13.0, I13.2, I50, I50.1, I50.2, I50.20, I50.21, I50.22, I50.23, I50.3, I50.30, I50.31, I50.32, I50.33, I50.4, I50.40, I50.41, I50.42, I50.43, I50.8, I50.81, I50.810, I50.811, I50.812, I50.813, I50.814, I50.82, I50.83, I50.84, I50.89, I50.9, I97.13
Stroke	9	433.01, 433.11, 433.21, 433.31, 433.81, 433.91, 434.01, 434.11, 434.91, 436
Stroke	10	G43.6, G43.601, G43.609, G43.611, G43.619, G46.3, G46.4, G95.11, I63, I63.0, I63.00, I63.01, I63.011, I63.012, I63.013, I63.019, I63.02, I63.03, I63.031, I63.032, I63.033, I63.039, I63.09, I63.1, I63.10, I63.11, I63.111, I63.112, I63.113, I63.119, I63.12, I63.13, I63.131, I63.132, I63.133, I63.139, I63.19, I63.2, I63.20, I63.21, I63.211, I63.212, I63.213, I63.219, I63.22, I63.23, I63.231, I63.232, I63.233, I63.239, I63.29, I63.3, I63.30, I63.31, I63.311, I63.312, I63.313, I63.319, I63.32, I63.321, I63.322, I63.323, I63.329, I63.33, I63.331, I63.332, I63.333, I63.339, I63.34, I63.341, I63.342, I63.343, I63.349, I63.39, I63.4, I63.40, I63.41, I63.411, I63.412, I63.413, I63.419, I63.42, I63.421, I63.422, I63.423, I63.429, I63.43, I63.431, I63.432, I63.433, I63.439, I63.44, I63.441, I63.442, I63.443, I63.449, I63.49, I63.5, I63.50, I63.51, I63.511, I63.512, I63.513, I63.519, I63.52, I63.521, I63.522, I63.523, I63.529, I63.53, I63.531, I63.532, I63.533, I63.539, I63.54, I63.541, I63.542, I63.543, I63.549, I63.59, I63.6, I63.8, I63.9, I97.810, I97.811, I97.82, I97.820, I97.821

Supplemental Table 2. Number of hospitalizations incorporated in study evaluation

Cohort groups	<i>Number</i>
Overall Sample of eligible hospitalizations	417,477
Hospitalizations with signs/symptoms identified through natural language processing of clinical documentation within the first 24 hours	408,367
Sepsis	198,016
Suspected infection	166,953
Heart failure, without suspected infection	24,318
Stroke, without suspected infection	19,080

Supplemental Table 3. Adjusted odds ratios for sepsis (versus suspected infection) diagnosis and hospital mortality among common signs and symptoms of sepsis. Common symptoms include those with $\geq 3\%$ prevalence among sepsis cohort. P-values ≤ 0.001 are considered significant. Models are adjusted for each of 239 signs and symptoms.

Signs and symptoms	Frequency	Adjusted odds ratio			
		Sepsis	p-value	Mortality	p-value
Pain	30.2%	0.73	<0.001	0.83	<0.001
Altered mental status	28.2%	1.52	<0.001	1.25	<0.001
Dyspnea	27.7%	1.10	<0.001	1.56	<0.001
Weakness	24.1%	1.29	<0.001	1.21	<0.001
Fever	23.9%	1.02	0.011	0.67	<0.001
Nausea	23.7%	0.96	<0.001	0.85	<0.001
Cough	23.4%	0.88	<0.001	0.89	<0.001
Abdominal pain	15.3%	0.92	<0.001	1.13	<0.001
Vomiting	15.2%	1.19	<0.001	1.11	0.002
Chills	13.9%	0.89	<0.001	0.63	<0.001
Hypertension	13.8%	1.19	<0.001	0.93	0.003
Diarrhea	12.8%	1.06	<0.001	1.03	0.343
Fatigue	10.7%	1.28	<0.001	1.05	0.054
Edema	10.6%	0.98	0.155	1.05	0.113
Chest pain	9.7%	0.95	<0.001	0.80	<0.001
Malaise	6.7%	0.96	0.002	0.86	<0.001
Anorexia	6.6%	1.15	<0.001	1.29	<0.001
Dizziness	6.4%	0.97	0.021	0.66	<0.001
Wound	6.3%	0.78	<0.001	0.94	0.174
Viral respiratory infection	5.5%	0.87	<0.001	0.85	<0.001
Cough with sputum	5.5%	0.85	<0.001	0.86	<0.001
Redness	5.4%	0.63	<0.001	0.65	<0.001
Pneumonia	5.3%	0.85	<0.001	1.21	<0.001
Respiratory failure	5.3%	1.44	<0.001	1.50	<0.001
Injury	5.1%	0.96	0.031	0.98	0.766
Sepsis	5.1%	1.36	<0.001	1.38	<0.001
Confusion	4.9%	1.13	<0.001	0.93	0.06
Sleepiness	4.9%	1.48	<0.001	0.85	<0.001
Back pain	4.8%	0.92	<0.001	1.07	0.085
Nausea and vomiting	4.5%	1.03	0.107	0.96	0.379
Hypoxia	4.1%	1.33	<0.001	1.66	<0.001
Dysuria	4.0%	0.89	<0.001	0.66	<0.001
Headache	3.9%	0.79	<0.001	1.00	0.983
Discomfort	3.8%	0.95	0.003	0.94	0.19
Wheezing	3.6%	0.68	<0.001	0.68	<0.001
Constipation	3.5%	0.93	<0.001	1.06	0.227
Dysphagia	3.4%	0.98	0.279	1.05	0.237
Unconsciousness	3.3%	2.23	<0.001	2.33	<0.001
Non-ambulation	3.1%	1.09	<0.001	1.02	0.677
Hypotension	3.0%	2.96	<0.001	1.80	<0.001
Tremors	3.0%	1.29	<0.001	0.73	<0.001

Supplemental Table 4. Adjusted odds ratios (95% confidence intervals) for mortality (left), intensive care unit (ICU) admission during hospitalization (middle), and administration of first antibiotic within 3 hours of emergency department presentation (right). Models are adjusted for each of 239 signs and symptoms. GI: gastrointestinal. URI: upper respiratory tract infection.

Signs and symptoms	Adjusted odds ratios		
	Mortality	ICU use	Antibiotic >3h
Abdominal pain	1.13 (1.07 - 1.19)	0.98 (0.95 - 1.01)	1.14 (1.11 - 1.18)
Abdominal swelling	1.38 (1.17 - 1.63)	1.00 (0.89 - 1.13)	1.07 (0.95 - 1.20)
Anemia	0.82 (0.59 - 1.16)	0.59 (0.46 - 0.75)	1.10 (0.90 - 1.35)
Agitation	1.04 (0.93 - 1.15)	1.13 (1.05 - 1.21)	1.17 (1.09 - 1.25)
Acute kidney injury	1.14 (1.04 - 1.26)	0.87 (0.81 - 0.93)	1.26 (1.18 - 1.35)
Alcohol use	0.91 (0.74 - 1.12)	1.62 (1.44 - 1.83)	1.40 (1.23 - 1.59)
Allergy	0.95 (0.68 - 1.32)	1.24 (1.03 - 1.50)	0.97 (0.81 - 1.17)
Altered mental status	1.25 (1.20 - 1.30)	1.16 (1.14 - 1.19)	0.85 (0.83 - 0.87)
Aneurysm	0.78 (0.53 - 1.16)	1.89 (1.53 - 2.33)	1.20 (0.96 - 1.49)
Anger	1.09 (0.67 - 1.79)	0.72 (0.51 - 1.01)	1.75 (1.28 - 2.40)
Ankle pain	0.64 (0.39 - 1.05)	0.80 (0.63 - 1.03)	1.27 (1.02 - 1.57)
Anorexia	1.29 (1.21 - 1.37)	0.87 (0.84 - 0.91)	1.02 (0.98 - 1.06)
Anxiety	0.92 (0.77 - 1.09)	1.04 (0.94 - 1.15)	1.23 (1.11 - 1.36)
Aphasia	1.09 (0.94 - 1.26)	1.25 (1.13 - 1.37)	1.08 (0.99 - 1.19)
Apnea	1.03 (0.88 - 1.21)	1.62 (1.43 - 1.82)	1.07 (0.95 - 1.20)
Appendicitis	0.22 (0.10 - 0.47)	0.72 (0.57 - 0.92)	0.84 (0.69 - 1.02)
Arm pain	1.01 (0.73 - 1.39)	1.12 (0.94 - 1.35)	1.07 (0.90 - 1.27)
Ascites	1.50 (1.31 - 1.72)	0.92 (0.83 - 1.03)	1.50 (1.34 - 1.67)
Aspiration	1.26 (1.12 - 1.41)	0.92 (0.84 - 1.01)	0.64 (0.59 - 0.70)
Ataxia	1.13 (0.63 - 2.03)	1.08 (0.74 - 1.56)	1.35 (0.93 - 1.96)
Back pain	1.07 (0.99 - 1.16)	1.08 (1.03 - 1.14)	1.06 (1.02 - 1.11)
Bipolar disorder	0.52 (0.34 - 0.78)	1.14 (0.93 - 1.39)	0.99 (0.81 - 1.20)
Bladder pain	0.85 (0.61 - 1.18)	0.81 (0.68 - 0.97)	0.85 (0.73 - 0.98)
Bleeding, vaginal	0.65 (0.41 - 1.05)	0.76 (0.60 - 0.98)	1.32 (1.05 - 1.66)
Bleeding	1.19 (1.08 - 1.32)	1.37 (1.29 - 1.46)	1.35 (1.27 - 1.44)
Blister	0.86 (0.66 - 1.11)	0.79 (0.68 - 0.92)	0.86 (0.76 - 0.98)
Bloating	0.70 (0.57 - 0.86)	0.96 (0.85 - 1.08)	1.33 (1.18 - 1.50)
Blood clot	1.11 (0.89 - 1.38)	1.27 (1.09 - 1.46)	1.31 (1.13 - 1.52)
Blood count	1.02 (0.92 - 1.13)	0.84 (0.78 - 0.90)	1.3 (1.22 - 1.39)
Blurred vision	0.58 (0.27 - 1.25)	1.03 (0.74 - 1.45)	2.20 (1.52 - 3.18)
Bone pain	1.72 (0.93 - 3.19)	0.82 (0.51 - 1.32)	1.68 (1.09 - 2.57)
Bowel obstruction	1.30 (1.06 - 1.61)	1.35 (1.17 - 1.56)	1.46 (1.25 - 1.70)
Bradycardia	0.98 (0.82 - 1.18)	1.59 (1.41 - 1.79)	1.68 (1.48 - 1.90)
Brain injury	0.44 (0.29 - 0.67)	0.68 (0.52 - 0.89)	0.70 (0.55 - 0.90)
Bronchitis	0.84 (0.69 - 1.02)	0.93 (0.82 - 1.04)	1.06 (0.95 - 1.18)
Burn	0.99 (0.62 - 1.58)	1.17 (0.90 - 1.52)	0.94 (0.73 - 1.21)
Buttock pain	0.9 (0.63 - 1.30)	0.82 (0.66 - 1.02)	0.85 (0.71 - 1.03)
Calf pain	0.88 (0.44 - 1.74)	1.58 (1.13 - 2.20)	0.89 (0.64 - 1.25)
Calor	1.17 (0.93 - 1.46)	0.85 (0.73 - 0.99)	0.67 (0.58 - 0.77)
Cardiac arrest	6.09 (5.39 - 6.88)	7.38 (6.33 - 8.60)	1.53 (1.35 - 1.72)
Cellulitis	0.74 (0.64 - 0.85)	0.62 (0.57 - 0.68)	0.64 (0.59 - 0.68)
Chest pain	0.80 (0.75 - 0.86)	1.10 (1.06 - 1.14)	1.32 (1.28 - 1.37)

	Adjusted odds ratios		
Signs and symptoms	Mortality	ICU use	Antibiotic >3h
Congestive heart failure	0.92 (0.81 - 1.04)	0.88 (0.81 - 0.96)	1.22 (1.12 - 1.32)
Chills and fever	0.72 (0.52 - 1.00)	1.08 (0.95 - 1.23)	1.18 (1.05 - 1.33)
Chills	0.63 (0.59 - 0.67)	0.87 (0.84 - 0.90)	0.69 (0.67 - 0.71)
Choking	1.55 (1.29 - 1.87)	0.88 (0.75 - 1.02)	0.89 (0.77 - 1.02)
Clumsiness	---	1.63 (0.86 - 3.08)	2.35 (1.1 - 5)
Coffee ground emesis	1.20 (0.96 - 1.51)	1.50 (1.29 - 1.74)	1.07 (0.92 - 1.25)
Colitis	0.86 (0.72 - 1.04)	0.89 (0.80 - 1.00)	1.15 (1.04 - 1.28)
Confusion	0.93 (0.86 - 1.00)	0.78 (0.74 - 0.82)	1.05 (1.00 - 1.10)
Congestion	0.89 (0.8 - 1.00)	0.85 (0.79 - 0.91)	0.99 (0.93 - 1.06)
Constipation	1.06 (0.97 - 1.16)	0.86 (0.81 - 0.91)	1.19 (1.13 - 1.25)
Cough	0.89 (0.85 - 0.94)	0.80 (0.78 - 0.82)	0.69 (0.68 - 0.71)
Cramping	0.69 (0.52 - 0.92)	0.87 (0.75 - 1.00)	1.33 (1.17 - 1.53)
Crying	0.85 (0.57 - 1.25)	0.66 (0.51 - 0.85)	1.50 (1.20 - 1.88)
Dark stool	0.98 (0.81 - 1.19)	1.54 (1.38 - 1.72)	1.63 (1.44 - 1.84)
Dehydration	1.12 (1.01 - 1.26)	0.83 (0.76 - 0.90)	1.25 (1.16 - 1.34)
Delirium	1.01 (0.89 - 1.15)	0.86 (0.79 - 0.94)	0.97 (0.89 - 1.04)
Dental issue	0.99 (0.75 - 1.30)	1.33 (1.12 - 1.57)	0.99 (0.84 - 1.16)
Depression	0.87 (0.75 - 1.01)	1.10 (1.01 - 1.21)	1.12 (1.03 - 1.23)
Diarrhea	1.03 (0.97 - 1.08)	0.93 (0.9 - 0.96)	1.15 (1.11 - 1.19)
Diplopia	0.97 (0.53 - 1.77)	1.39 (1.00 - 1.93)	1.81 (1.27 - 2.58)
Discharge, vaginal	0.57 (0.21 - 1.59)	0.91 (0.58 - 1.43)	1.15 (0.78 - 1.71)
Discomfort	0.94 (0.85 - 1.03)	0.97 (0.92 - 1.03)	1.08 (1.03 - 1.14)
Distention	1.39 (1.20 - 1.61)	1.24 (1.13 - 1.37)	1.28 (1.15 - 1.41)
Dizziness	0.66 (0.6 - 0.71)	1.17 (1.12 - 1.22)	1.36 (1.31 - 1.42)
Drooling	0.90 (0.64 - 1.27)	0.77 (0.61 - 0.96)	1.02 (0.82 - 1.26)
Dysarthria	1.22 (1.07 - 1.39)	1.21 (1.11 - 1.33)	1.39 (1.27 - 1.52)
Dysphagia	1.05 (0.97 - 1.15)	1.00 (0.95 - 1.06)	1.08 (1.02 - 1.13)
Dyspnea	1.56 (1.50 - 1.62)	1.49 (1.45 - 1.53)	0.87 (0.84 - 0.89)
Dysuria	0.66 (0.59 - 0.75)	0.69 (0.65 - 0.73)	0.66 (0.63 - 0.69)
Ear pain	1.49 (1.04 - 2.14)	0.91 (0.73 - 1.13)	0.90 (0.73 - 1.09)
Ecchymoses	0.57 (0.27 - 1.21)	1.43 (0.99 - 2.07)	1.53 (1.06 - 2.21)
Edema	1.05 (0.99 - 1.11)	0.85 (0.82 - 0.88)	1.14 (1.10 - 1.18)
Effusion	1.41 (1.26 - 1.58)	0.92 (0.84 - 1.01)	1.17 (1.08 - 1.28)
Elbow pain	0.7 (0.36 - 1.38)	0.82 (0.58 - 1.18)	0.90 (0.66 - 1.22)
Enteritis	1.12 (0.83 - 1.51)	0.92 (0.77 - 1.10)	0.99 (0.84 - 1.17)
Epigastric pain	0.70 (0.61 - 0.81)	0.80 (0.74 - 0.85)	1.32 (1.24 - 1.41)
Epistaxis	1.19 (0.91 - 1.56)	0.99 (0.83 - 1.19)	1.69 (1.40 - 2.03)
Exertional dyspnea	0.81 (0.70 - 0.94)	0.86 (0.78 - 0.94)	1.41 (1.29 - 1.53)
Eye pain	0.77 (0.44 - 1.33)	0.95 (0.75 - 1.22)	1.14 (0.91 - 1.42)
Facial edema	0.57 (0.31 - 1.05)	1.26 (0.93 - 1.69)	0.78 (0.59 - 1.03)
Facial pain	2.63 (1.65 - 4.20)	0.70 (0.49 - 0.99)	0.80 (0.58 - 1.10)
Facial droop	1.04 (0.86 - 1.27)	1.10 (0.96 - 1.25)	1.76 (1.54 - 2.02)
Fall	0.95 (0.83 - 1.09)	0.79 (0.72 - 0.87)	1.23 (1.14 - 1.34)
Fatigue	1.05 (1.00 - 1.11)	1.01 (0.97 - 1.04)	0.93 (0.90 - 0.96)
Fever	0.67 (0.64 - 0.70)	0.77 (0.75 - 0.79)	0.45 (0.44 - 0.46)
Flank pain	0.54 (0.45 - 0.66)	0.88 (0.80 - 0.95)	0.85 (0.79 - 0.92)
Flatus	0.87 (0.70 - 1.07)	1.16 (1.04 - 1.31)	1.75 (1.54 - 1.98)

	Adjusted odds ratios		
Signs and symptoms	Mortality	ICU use	Antibiotic >3h
Flushing	1.12 (0.79 - 1.58)	0.91 (0.73 - 1.13)	1.07 (0.88 - 1.30)
Foot edema	1.13 (0.63 - 2.00)	0.83 (0.58 - 1.20)	0.92 (0.68 - 1.23)
Foot pain	0.68 (0.50 - 0.93)	0.87 (0.75 - 1.02)	0.90 (0.79 - 1.03)
Foot wound	0.60 (0.38 - 0.94)	0.76 (0.59 - 0.97)	1.05 (0.86 - 1.3)
Fracture	1.14 (0.99 - 1.30)	0.85 (0.78 - 0.94)	1.22 (1.12 - 1.33)
Frequency, urinary	0.67 (0.55 - 0.81)	0.86 (0.78 - 0.94)	0.83 (0.77 - 0.90)
Failure to thrive	1.57 (1.42 - 1.73)	0.83 (0.77 - 0.90)	0.85 (0.79 - 0.91)
Gallbladder	0.54 (0.36 - 0.80)	0.68 (0.52 - 0.88)	0.79 (0.63 - 0.98)
GI bleeding	1.18 (1.00 - 1.38)	1.08 (0.97 - 1.20)	1.20 (1.08 - 1.35)
Green	0.96 (0.80 - 1.15)	0.92 (0.82 - 1.02)	0.91 (0.82 - 1.00)
Groin pain	0.90 (0.66 - 1.22)	1.10 (0.93 - 1.29)	0.87 (0.75 - 1.01)
Gurgling	1.79 (1.46 - 2.20)	1.11 (0.93 - 1.31)	0.57 (0.48 - 0.67)
Hallucination	0.95 (0.78 - 1.16)	0.80 (0.70 - 0.91)	1.19 (1.06 - 1.34)
Hand pain	0.95 (0.52 - 1.72)	0.81 (0.58 - 1.14)	0.79 (0.59 - 1.05)
Head injury	1.00 (0.67 - 1.47)	1.01 (0.80 - 1.28)	1.68 (1.31 - 2.15)
Headache	0.66 (0.59 - 0.74)	1.05 (0.99 - 1.11)	1.22 (1.16 - 1.29)
Hearing loss	0.94 (0.75 - 1.18)	0.63 (0.54 - 0.74)	0.88 (0.77 - 1.00)
Heartburn	0.87 (0.71 - 1.05)	1.08 (0.97 - 1.20)	1.19 (1.07 - 1.32)
Hematoma	0.78 (0.62 - 0.99)	1.12 (0.98 - 1.29)	1.50 (1.31 - 1.72)
Hematuria	0.83 (0.71 - 0.96)	0.72 (0.66 - 0.79)	1.08 (1.01 - 1.17)
Hemiplegia	0.87 (0.68 - 1.12)	1.05 (0.90 - 1.24)	0.75 (0.65 - 0.87)
Hemoptysis	1.72 (1.46 - 2.02)	1.32 (1.18 - 1.49)	0.84 (0.75 - 0.94)
Hemorrhoid	0.97 (0.71 - 1.33)	0.88 (0.73 - 1.07)	1.32 (1.09 - 1.59)
Hernia	1.28 (1.05 - 1.55)	1.47 (1.30 - 1.66)	1.26 (1.11 - 1.43)
Herpes	0.99 (0.70 - 1.42)	0.85 (0.68 - 1.07)	1.15 (0.94 - 1.40)
Hesitancy, urinary	0.47 (0.21 - 1.06)	0.68 (0.48 - 0.97)	1.10 (0.84 - 1.45)
Hip pain	0.73 (0.63 - 0.85)	0.62 (0.57 - 0.68)	2.59 (2.37 - 2.83)
Hip/pelvis fracture	1.09 (0.93 - 1.29)	0.64 (0.57 - 0.72)	1.78 (1.59 - 1.98)
Hoarseness	1.04 (0.71 - 1.52)	1.39 (1.11 - 1.75)	0.94 (0.75 - 1.18)
Hydronephrosis	0.70 (0.51 - 0.98)	1.02 (0.87 - 1.19)	0.99 (0.86 - 1.14)
Hypercalcemia	1.55 (1.07 - 2.27)	0.91 (0.66 - 1.24)	1.46 (1.09 - 1.95)
Hyperglycemia	0.67 (0.55 - 0.81)	3.68 (3.34 - 4.05)	1.09 (0.99 - 1.20)
Hyperkalemia	1.04 (0.88 - 1.24)	1.22 (1.09 - 1.37)	1.40 (1.25 - 1.58)
Hypernatremia	1.06 (0.79 - 1.41)	0.64 (0.50 - 0.82)	0.99 (0.80 - 1.21)
Hypertension	0.93 (0.89 - 0.98)	0.93 (0.90 - 0.96)	1.04 (1.01 - 1.07)
Hypoglycemia	0.87 (0.72 - 1.05)	0.95 (0.84 - 1.08)	1.25 (1.12 - 1.41)
Hypokalemia	1.20 (0.90 - 1.59)	0.97 (0.78 - 1.19)	1.78 (1.45 - 2.20)
Hyponatremia	1.25 (1.06 - 1.48)	0.95 (0.84 - 1.08)	1.37 (1.21 - 1.54)
Hypotension	1.80 (1.67 - 1.94)	2.18 (2.07 - 2.31)	0.70 (0.66 - 0.74)
Hypothermia	1.96 (1.61 - 2.38)	1.72 (1.43 - 2.08)	0.99 (0.83 - 1.17)
Hypoxia	1.66 (1.55 - 1.77)	1.41 (1.34 - 1.48)	0.69 (0.66 - 0.73)
Incontinence	0.86 (0.69 - 1.07)	0.89 (0.79 - 1.01)	0.97 (0.86 - 1.08)
Infection, wound	0.99 (0.82 - 1.21)	0.85 (0.75 - 0.97)	0.91 (0.82 - 1.02)
Injury	0.98 (0.89 - 1.09)	1.04 (0.97 - 1.11)	1.06 (1.00 - 1.13)
Insomnia	0.88 (0.71 - 1.10)	0.99 (0.87 - 1.12)	1.37 (1.21 - 1.54)
Itching	0.49 (0.35 - 0.68)	0.75 (0.64 - 0.87)	1.12 (0.98 - 1.27)
Jaundice	1.94 (1.66 - 2.26)	0.99 (0.88 - 1.12)	1.20 (1.07 - 1.35)

	Adjusted odds ratios		
Signs and symptoms	Mortality	ICU use	Antibiotic >3h
Jaw pain	1.17 (0.68 - 2.03)	1.49 (1.10 - 2.01)	1.32 (0.96 - 1.81)
Joint pain	0.79 (0.60 - 1.05)	0.85 (0.73 - 0.99)	0.97 (0.85 - 1.10)
Kidney stone	0.54 (0.39 - 0.76)	1.28 (1.13 - 1.46)	0.94 (0.83 - 1.06)
Knee pain	1.06 (0.86 - 1.30)	0.90 (0.79 - 1.02)	1.38 (1.23 - 1.55)
Lactic acidosis	1.78 (1.49 - 2.13)	1.59 (1.38 - 1.83)	0.46 (0.39 - 0.53)
Left-sided paresis	1.49 (1.19 - 1.87)	1.45 (1.22 - 1.71)	1.50 (1.26 - 1.78)
Leg pain	1.21 (1.05 - 1.39)	1.23 (1.13 - 1.34)	0.90 (0.83 - 0.98)
Limb pain	0.87 (0.5 - 1.52)	1.06 (0.74 - 1.51)	1.31 (0.93 - 1.84)
Liver failure	2.43 (1.75 - 3.39)	1.20 (0.89 - 1.61)	1.41 (1.04 - 1.91)
Lower GI bleeding	0.97 (0.87 - 1.09)	1.22 (1.14 - 1.31)	1.44 (1.34 - 1.54)
Lymphadenopathy	1.18 (0.85 - 1.65)	1.00 (0.79 - 1.27)	1.08 (0.86 - 1.34)
Lymphedema	1.44 (1.03 - 2.00)	1.13 (0.91 - 1.41)	0.78 (0.64 - 0.95)
Malaise	0.86 (0.80 - 0.93)	1.13 (1.09 - 1.18)	0.85 (0.82 - 0.88)
Mass	1.66 (1.47 - 1.88)	1.19 (1.09 - 1.31)	1.02 (0.94 - 1.12)
Memory issues	0.94 (0.81 - 1.09)	0.59 (0.53 - 0.66)	1.08 (0.99 - 1.18)
Meningitis	0.70 (0.39 - 1.24)	1.45 (1.09 - 1.93)	1.22 (0.92 - 1.62)
Myocardial infarction	1.48 (1.16 - 1.88)	2.51 (2.08 - 3.03)	1.35 (1.12 - 1.62)
Nausea	0.85 (0.8 - 0.91)	1.08 (1.04 - 1.12)	1.10 (1.06 - 1.13)
Neck edema	1.03 (0.51 - 2.06)	3.19 (2.19 - 4.64)	0.55 (0.37 - 0.8)
Neck pain	0.94 (0.78 - 1.15)	1.17 (1.05 - 1.30)	1.11 (1.01 - 1.23)
Neck stiffness	1.46 (0.95 - 2.24)	0.77 (0.59 - 0.99)	0.85 (0.68 - 1.07)
Neuropathy	0.75 (0.60 - 0.94)	0.82 (0.73 - 0.93)	0.91 (0.81 - 1.01)
Neutropenia	1.26 (0.96 - 1.66)	0.80 (0.66 - 0.97)	0.83 (0.7 - 0.99)
Non-ambulation	1.02 (0.93 - 1.12)	0.90 (0.85 - 0.96)	1.08 (1.02 - 1.14)
Numbness	1.16 (0.97 - 1.39)	1.91 (1.73 - 2.12)	1.53 (1.37 - 1.71)
Odynophagia	1.14 (0.69 - 1.88)	1.71 (1.28 - 2.30)	0.86 (0.64 - 1.15)
Oliguria	1.39 (1.09 - 1.77)	0.98 (0.82 - 1.17)	1.08 (0.92 - 1.27)
Orthopnea	0.71 (0.62 - 0.81)	0.81 (0.75 - 0.88)	1.38 (1.28 - 1.48)
Orthostatic hypotension	0.82 (0.70 - 0.96)	---	---
Overdose	0.75 (0.57 - 0.99)	2.34 (1.99 - 2.75)	1.61 (1.36 - 1.91)
Pain	0.83 (0.79 - 0.87)	0.90 (0.88 - 0.93)	1.23 (1.20 - 1.26)
Pallor	1.18 (1.00 - 1.38)	1.39 (1.25 - 1.55)	0.84 (0.76 - 0.94)
Palpitations	0.95 (0.79 - 1.14)	0.98 (0.88 - 1.09)	1.56 (1.41 - 1.73)
Pancreatitis	0.82 (0.66 - 1.03)	0.93 (0.82 - 1.05)	1.47 (1.3 - 1.66)
Pancytopenia	1.77 (1.42 - 2.20)	---	---
Paresis	1.23 (1.00 - 1.50)	0.84 (0.73 - 0.98)	0.84 (0.73 - 0.97)
Paresthesia	0.8 (0.59 - 1.09)	0.92 (0.78 - 1.08)	1.51 (1.27 - 1.79)
Pulmonary embolism	1.23 (0.85 - 1.78)	1.09 (0.84 - 1.40)	1.55 (1.20 - 1.99)
Pericardial effusion	1.06 (0.74 - 1.52)	1.82 (1.45 - 2.30)	1.74 (1.35 - 2.23)
Perinatal issue	0.59 (0.39 - 0.90)	0.82 (0.66 - 1.02)	1.23 (1.01 - 1.49)
Peripheral edema	1.09 (0.93 - 1.28)	0.94 (0.84 - 1.05)	1.11 (1.01 - 1.23)
Pleuritic pain	0.56 (0.28 - 1.1)	0.93 (0.68 - 1.27)	1.06 (0.79 - 1.43)
Pneumonia	1.21 (1.14 - 1.3)	0.82 (0.79 - 0.86)	0.66 (0.63 - 0.69)
Pneumothorax	2.27 (1.6 - 3.23)	1.83 (1.35 - 2.47)	1.22 (0.90 - 1.65)
Pressure wound	1.38 (1.14 - 1.66)	0.99 (0.86 - 1.14)	1.00 (0.88 - 1.14)
Pulmonary edema	0.99 (0.81 - 1.21)	1.46 (1.28 - 1.68)	1.44 (1.26 - 1.65)
Pyelonephritis	0.31 (0.15 - 0.63)	0.64 (0.51 - 0.81)	0.75 (0.62 - 0.91)

	Adjusted odds ratios		
Signs and symptoms	Mortality	ICU use	Antibiotic >3h
Quadriplegia	0.77 (0.45 - 1.34)	1.99 (1.45 - 2.74)	0.60 (0.43 - 0.83)
Rales	1.48 (1.20 - 1.83)	1.24 (1.05 - 1.46)	0.74 (0.62 - 0.87)
Rash	1.18 (0.93 - 1.51)	1.10 (0.95 - 1.27)	1.09 (0.95 - 1.24)
Redness	0.65 (0.59 - 0.71)	0.86 (0.82 - 0.91)	0.51 (0.49 - 0.53)
Respiratory failure	1.50 (1.41 - 1.59)	2.13 (2.04 - 2.23)	0.74 (0.71 - 0.78)
Rest with dyspnea	1.50 (0.83 - 2.70)	1.17 (0.77 - 1.78)	0.97 (0.65 - 1.45)
Retention, urinary	0.81 (0.69 - 0.96)	0.68 (0.61 - 0.76)	0.87 (0.79 - 0.95)
Rhinorrhea	0.67 (0.55 - 0.8)	0.80 (0.73 - 0.88)	0.95 (0.88 - 1.04)
Rhonchi/rales	1.63 (1.17 - 2.28)	0.90 (0.68 - 1.18)	0.53 (0.39 - 0.71)
Rib pain	1.18 (0.87 - 1.61)	0.95 (0.78 - 1.16)	1.01 (0.85 - 1.21)
Right-sided paresis	1.03 (0.78 - 1.37)	1.23 (1.02 - 1.49)	1.48 (1.22 - 1.80)
Rigor	0.91 (0.76 - 1.09)	1.16 (1.07 - 1.26)	0.78 (0.72 - 0.84)
Seizure	0.73 (0.65 - 0.82)	1.55 (1.45 - 1.65)	1.26 (1.18 - 1.34)
Sepsis	1.38 (1.29 - 1.48)	1.49 (1.43 - 1.56)	0.59 (0.57 - 0.62)
Shivering	0.68 (0.43 - 1.10)	1.05 (0.86 - 1.29)	0.68 (0.56 - 0.82)
Shock	1.84 (1.50 - 2.26)	3.77 (3.08 - 4.62)	0.99 (0.83 - 1.18)
Shoulder pain	1.08 (0.88 - 1.32)	1.23 (1.09 - 1.39)	1.38 (1.22 - 1.55)
Sinusitis	0.55 (0.30 - 1.02)	1.12 (0.85 - 1.48)	1.03 (0.80 - 1.33)
Sleepiness	0.85 (0.78 - 0.92)	1.00 (0.95 - 1.05)	1.11 (1.07 - 1.16)
Sneezing	0.59 (0.33 - 1.07)	0.92 (0.71 - 1.19)	1.03 (0.81 - 1.29)
Sore throat	0.74 (0.48 - 1.13)	0.76 (0.60 - 0.97)	0.90 (0.72 - 1.12)
Spasms	0.83 (0.54 - 1.27)	1.17 (0.92 - 1.50)	1.25 (0.98 - 1.59)
Sputum production	0.81 (0.71 - 0.92)	0.97 (0.90 - 1.05)	0.88 (0.82 - 0.95)
Sputum with cough	0.86 (0.79 - 0.93)	0.82 (0.78 - 0.86)	0.75 (0.72 - 0.78)
Stone, gallbladder	0.68 (0.49 - 0.96)	0.56 (0.46 - 0.68)	0.99 (0.85 - 1.16)
Stress	0.55 (0.43 - 0.72)	1.35 (1.20 - 1.52)	1.65 (1.45 - 1.86)
Subdural hematoma	1.58 (1.10 - 2.28)	1.58 (1.22 - 2.06)	1.28 (0.98 - 1.68)
Suicidality	0.53 (0.26 - 1.10)	1.30 (0.94 - 1.80)	1.59 (1.12 - 2.24)
Sweating	0.84 (0.74 - 0.95)	1.10 (1.03 - 1.17)	1.20 (1.12 - 1.28)
Syncope	0.79 (0.70 - 0.88)	0.89 (0.83 - 0.95)	1.25 (1.17 - 1.34)
Tachycardia	1.06 (0.95 - 1.18)	1.37 (1.28 - 1.47)	0.89 (0.83 - 0.95)
Tachypnea	1.45 (1.30 - 1.62)	1.51 (1.40 - 1.63)	0.72 (0.67 - 0.79)
Thigh pain	1.22 (0.81 - 1.84)	1.2 (0.93 - 1.53)	1.22 (0.96 - 1.55)
Throat pain	1.11 (0.73 - 1.68)	1.45 (1.15 - 1.84)	1.1 (0.88 - 1.37)
Thrombocytopenia	1.44 (1.21 - 1.71)	1.00 (0.88 - 1.14)	1.24 (1.10 - 1.40)
Transient ischemic attack	0.70 (0.49 - 0.98)	0.87 (0.72 - 1.05)	1.36 (1.13 - 1.64)
Traumatic injury	0.98 (0.86 - 1.13)	1.31 (1.21 - 1.43)	1.05 (0.97 - 1.14)
Tremors	0.73 (0.65 - 0.84)	0.92 (0.86 - 0.98)	0.81 (0.76 - 0.85)
Twitching	0.69 (0.39 - 1.25)	1.10 (0.80 - 1.51)	1.19 (0.87 - 1.64)
Ulcer	1.20 (1.07 - 1.36)	0.98 (0.91 - 1.06)	0.87 (0.81 - 0.94)
Unconsciousness	2.33 (2.18 - 2.50)	2.36 (2.23 - 2.49)	0.82 (0.77 - 0.86)
Upper GI bleeding	1.34 (1.13 - 1.60)	3.28 (2.94 - 3.67)	1.26 (1.12 - 1.41)
Upset	0.97 (0.71 - 1.32)	1.10 (0.91 - 1.33)	1.22 (1.01 - 1.47)
Urinary issues	0.45 (0.14 - 1.42)	0.78 (0.48 - 1.27)	0.96 (0.65 - 1.42)
Urinary tract infection	0.86 (0.73 - 1.02)	0.57 (0.51 - 0.64)	0.69 (0.63 - 0.75)
Viral respiratory infection	0.85 (0.78 - 0.93)	1.11 (1.06 - 1.16)	0.94 (0.90 - 0.98)
Visual symptoms	1.06 (0.78 - 1.45)	0.92 (0.76 - 1.13)	1.12 (0.93 - 1.34)

	Adjusted odds ratios		
Signs and symptoms	Mortality	ICU use	Antibiotic >3h
Vomiting	1.11 (1.04 - 1.19)	1.14 (1.09 - 1.18)	1.04 (1.01 - 1.08)
Vomiting with nausea	0.96 (0.87 - 1.05)	1.01 (0.96 - 1.07)	1.11 (1.06 - 1.17)
Weakness	1.21 (1.17 - 1.26)	0.88 (0.86 - 0.90)	0.93 (0.90 - 0.95)
Weight gain	0.90 (0.73 - 1.10)	0.84 (0.73 - 0.96)	1.69 (1.48 - 1.93)
Weight loss	1.17 (1.04 - 1.32)	0.97 (0.89 - 1.05)	1.31 (1.21 - 1.42)
Wheezing	0.68 (0.62 - 0.75)	0.86 (0.81 - 0.91)	1.04 (0.99 - 1.10)
Wound	0.94 (0.86 - 1.03)	0.90 (0.85 - 0.95)	0.89 (0.85 - 0.94)
Wrist pain	0.47 (0.22 - 1.00)	0.54 (0.37 - 0.79)	1.48 (1.11 - 1.99)
Xerostomia	1.44 (1.04 - 1.98)	1.05 (0.84 - 1.30)	0.98 (0.80 - 1.21)