APPENDIX A. Major Diagnostic Categories, Clinical Coding, and Outcomes for Healthcare-Associated Infections

HEALTHCARE COST AND UTILIZATION PROJECT

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Prevalence and Burden of Healthcare-Associated Infections (HAIs), 2016–2021

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Research and Quality

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Table A.1. Most frequent major diagnostic categories (MDC) among adult inpatient stays with any of the five examined healthcare-associated infections (HAIs) (N=82,096), 2019

Rank	Major Diagnostic Category (MDC)	Number of stays	Percent of stays
1	Infectious & Parasitic Diseases, Systemic or Unspecified Sites (MDC 18)	13,876	16.9%
2	Diseases & Disorders of the Circulatory System (MDC 5)	12,677	15.4%
3	Diseases & Disorders of the Nervous System (MDC 1)	10,529	12.8%
4	Diseases & Disorders of the Respiratory System (MDC 4)	8,016	9.8%
5	Diseases & Disorders of the Digestive System (MDC 6)	7,744	9.4%
	Diseases & Disorders of the Musculoskeletal System & Connective Tissue (MDC 8)	5,446	6.6%
All other	Diseases & Disorders of the Kidney & Urinary Tract (MDC 11)	5,007	6.1%
MDC (not used for	Myeloproliferative Diseases & Disorders, Poorly Differentiated Neoplasms (MDC 17)	3,475	4.2%
figures 2	Diseases & Disorders of the Hepatobiliary System & Pancreas (MDC 7)	2,955	3.6%
through 7)	Endocrine, Nutritional & Metabolic Diseases & Disorders (MDC 10)	2,414	2.9%
	Injuries, Poisonings & Toxic Effects of Drugs (MDC 21)	2,013	2.5%
	Diseases & Disorders of the Skin, Subcutaneous Tissue & Breast (MDC 9)	1,435	1.7%
	Multiple Significant Trauma (MDC 24)	1,295	1.6%
	Diseases & Disorders of Blood, Blood Forming Organs, Immunologic Disorders (MDC 16)	1,115	1.4%
	Alcohol/Drug Use & Alcohol/Drug Induced Organic Mental Disorders (MDC 20)	761	0.9%
	Factors Influencing Health Status & Other Contacts with Health Services (MDC 23)	729	0.9%
	Diseases & Disorders of the Ear, Nose, Mouth & Throat (MDC 3)	588	0.7%
	Burns (MDC 22)	379	0.5%
	Mental Diseases & Disorders (MDC 19)	355	0.4%
	Diseases & Disorders of the Female Reproductive System (MDC 13)	308	0.4%
	Pregnancy, Childbirth & the Puerperium (MDC 14)	290	0.4%
	Pre-MDC	245	0.3%
	Diseases & Disorders of the Male Reproductive System (MDC 12)	208	0.3%
	Human Immunodeficiency Virus Infections (MDC 25)	200	0.2%
	Diseases & Disorders of the Eye (MDC 2)	36	0.0%
	Newborns & Other Neonates with Conditions Originating in Perinatal Period (MDC 15)	0	0.0%

Source: Agency for Healthcare Research and Quality (AHRQ), Healthcare Cost and Utilization Project (HCUP), 2016-2021, State Inpatient Databases, 2019, 38 States

Table A.2. Clinical coding of HAIs with valid ICD-10-CM codes through FY 2024

Diagnosis or procedure	ICD-10- CM/PCS code	ICD-10-CM/PCS code description						
Central line-asso	Central line-associated bloodstream infection (CLABSI)							
Diagnosis	T80211A	Bloodstream infection due to central venous catheter, initial encounter						
Catheter-associat	Catheter-associated urinary tract infection (CAUTI)							
Any of the follow	Any of the following diagnosis codes (secondary diagnoses, not present on admission)							
Diagnosis	T83511A	Infection and inflammatory reaction due to indwelling urethral catheter, initial encounter						
Diagnosis	T8351XA	Infection and inflammatory reaction due to indwelling urinary catheter, initial encounter (pre-existing code before 10/1/2016)						
OR, the following	procedure code	+ any of the following diagnosis codes (secondary diagnoses, not present on admission)						
Procedure	0T9B70Z	Drainage of Bladder with Drainage Device, Via Natural or Artificial Opening						
Diagnosis	N10	Acute pyelonephritis						
Diagnosis	N151	Renal and perinephric abscess						
Diagnosis	N12	Tubulo-interstitial nephritis, not specified as acute or chronic (pyelonephritis NOS)						
Diagnosis	N159	Renal tubulo-interstitial disease, unspecified (pyelonephritis)						
Diagnosis	N3000	Acute cystitis without hematuria						
Diagnosis	N3001	Acute cystitis with hematuria						
Diagnosis	N3080	Other cystitis without hematuria						
Diagnosis	N3081	Other cystitis with hematuria						
Diagnosis	N3090	Cystitis, unspecified without hematuria						
Diagnosis	N3091	Cystitis, unspecified with hematuria						
Diagnosis	N390	Urinary tract infection, site not specified						
Ventilator-associa	ated pneumonia	(VAP)						
Diagnosis	J95851	Ventilator-associated pneumonia						
Methicillin-resista	ant Staphylococc	us aureus (MRSA)						
Diagnosis	A4102	Sepsis due to Methicillin resistant Staphylococcus aureus						
Diagnosis	A4902	Methicillin resistant Staphylococcus aureus infection, unspecified site						
Diagnosis	B9562	Methicillin resistant Staphylococcus aureus infection as the cause of diseases classified elsewhere						
Diagnosis	J15212	Pneumonia due to Methicillin resistant Staphylococcus aureus						
Clostridioides dif	ficile (C. difficile)							
Diagnosis	A047	Enterocolitis due to Clostridium difficile						
Diagnosis	A0471	Enterocolitis due to Clostridium difficile, recurrent						
Diagnosis	A0472	Enterocolitis due to Clostridium difficile, not specified as recurrent						

Table A.3. Details to support Figure 1. Trends in the rate of healthcare-associated infections (hais) per 100,000 adult inpatient stays, by infection type, 2016–2021

HAI	Group	2016	2017	2018	2019	2020	2021
CLABSI	Rate among all inpatient stays	21.4	18.8	17.9	18.3	24.1	25.1
	Rate among non-COVID-19 inpatient stays				19.0		19.8
CAUTI	Rate among all inpatient stays	40.9	35.9	35.3	33.1	33.8	35.7
	Rate among non-COVID-19 inpatient stays				31.2		30.7
VAP	Rate among all inpatient stays	40.2	44.6	47.0	48.3	95.9	125.4
	Rate among non-COVID-19 inpatient stays				62.7		73.5
MRSA infection	Rate among all inpatient stays	64.2	60.8	59.4	57.4	73.2	84.4
	Rate among non-COVID-19 inpatient stays				60.9		62.6
C. difficile infection	Rate among all inpatient stays	226.2	201.6	177.6	151.9	143.4	144.2
	Rate among non-COVID-19 inpatient stays				140.8		140.6

Abbreviations: CLABSI, central line-associated bloodstream infection; CAUTI, catheter-associated urinary tract infection; VAP, ventilator-associated pneumonia; MRSA, methicillin-resistant Staphylococcus aureus; C. difficile, Clostridioides difficile; COVID-19, coronavirus disease 2019.

Source: Agency for Healthcare Research and Quality (AHRQ), Healthcare Cost and Utilization Project (HCUP), 2016-2021, State Inpatient Databases, 2019, 38 States

Table A.4. Details to Support Figure 2. Median length of stay, in-hospital mortality rate, and median total hospital cost for adult inpatient stays with any examined healthcare-associated infection (HAI) among top diagnostic categories, 2019 and 2021

Year, COVID-19 status	Major Diagnostic Category	Presence of any examined HAI	Median inpatient length of stay (days)	In-hospital mortality (%)	Median total hospital cost (\$)
2019	Infectious & Parasitic Diseases, Systemic or Unspecified Sites (MDC 18)	With any examined HAI	17.0	15.5	\$47,056
		Without any examined HAI	5.0	7.7	\$11,116
	Diseases & Disorders of the Circulatory System	With any examined HAI	17.0	15.0	\$56,752
	(MDC 5)	Without any examined HAI	3.0	2.5	\$10,849
	Diseases & Disorders of the Nervous System	With any examined HAI	21.0	11.9	\$73,289
	(MDC 1)	Without any examined HAI	3.0	3.3	\$10,256
	Diseases & Disorders of the Respiratory System	With any examined HAI	17.0	16.3	\$49,709
	(MDC 4)	Without any examined HAI	4.0	3.5	\$8,411
	Diseases & Disorders of the Digestive System (MDC 6)	With any examined HAI	15.0	8.0	\$37,889
		Without any examined HAI	3.0	1.4	\$8,839
2021, With	Infectious & Parasitic Diseases, Systemic or Unspecified Sites (MDC 18)	With any examined HAI	29.0	50.4	\$109,134
COVID-19		Without any examined HAI	7.0	23.9	\$16,895
	Diseases & Disorders of the Circulatory System (MDC 5)	With any examined HAI	27.0	32.4	\$88,148
		Without any examined HAI	4.0	7.7	\$12,098
	Diseases & Disorders of the Nervous System (MDC 1)	With any examined HAI	30.5	22.1	\$100,767
		Without any examined HAI	6.0	8.1	\$14,040
	Diseases & Disorders of the Respiratory System (MDC 4) Diseases & Disorders of the Digestive System	With any examined HAI	28.0	49.9	\$101,629
		Without any examined HAI	5.0	10.8	\$11,667
		With any examined HAI	24.0	22.2	\$63,855
	(MDC 6)	Without any examined HAI	4.0	4.5	\$10,407
2021,	Infectious & Parasitic Diseases, Systemic or	With any examined HAI	20.0	19.3	\$59,506
Without	Unspecified Sites (MDC 18)	Without any examined HAI	5.0	9.1	\$12,181
COVID-19	Diseases & Disorders of the Circulatory System	With any examined HAI	19.0	18.5	\$68,883
	(MDC 5)	Without any examined HAI	3.0	2.8	\$12,001
	Diseases & Disorders of the Nervous System	With any examined HAI	24.0	14.7	\$86,907
	(MDC 1)	Without any examined HAI	4.0	3.6	\$11,265
	Diseases & Disorders of the Respiratory System	With any examined HAI	20.0	20.9	\$64,712
	(MDC 4)	Without any examined HAI	4.0	4.5	\$9,314
	Diseases & Disorders of the Digestive System	With any examined HAI	17.0	10.7	\$44,232
	(MDC 6)	Without any examined HAI	3.0	1.5	\$9,710

Abbreviations: MDC, Major Diagnostic Category; HAI, healthcare-associated infection; COVID-19, coronavirus disease 2019. Source: Agency for Healthcare Research and Quality (AHRQ), Healthcare Cost and Utilization Project (HCUP), 2016-2021, State Inpatient Databases, 2019, 38 States

Table A.5. Details to support Figure 3. Median length of stay, in-hospital mortality rate, and median total hospital cost for adult inpatient stays with central line-associated bloodstream infection (CLABSI) among top diagnostic categories, 2019 and 2021

Year, COVID-19	Maian Dianna stia Ostanama	Presence of	Median inpatient length of stay	In-hospital mortality	Median total
Status	Major Diagnostic Category		(days)	(%)	hospital cost (\$)
2019	Infectious & Parasitic Diseases, Systemic or Unspecified	With CLABSI	31.0	19.5	\$88,685
	Sites (MDC 18)	Without CLABSI	5.0	7.8	\$11,489
	Diseases & Disorders of the Circulatory System (MDC 5)	With CLABSI	25.0	15.9	\$82,697
		Without CLABSI	3.0	2.5	\$10,907
	Diseases & Disorders of the Nervous System (MDC 1)	With CLABSI	29.0	8.6	\$87,086
		Without CLABSI	3.0	3.4	\$10,319
	Diseases & Disorders of the Respiratory System (MDC	With CLABSI	29.0	25.2	\$99,896
	4)	Without CLABSI	4.0	3.6	\$8,491
	Diseases & Disorders of the Digestive System (MDC 6)	With CLABSI	25.0	8.1	\$62,272
		Without CLABSI	3.0	1.4	\$8,820
2021, With	Infectious & Parasitic Diseases, Systemic or Unspecified	With CLABSI	34.0	45.4	\$131,394
COVID-19	Sites (MDC 18)	Without CLABSI	8.0	24.5	\$17,635
	Diseases & Disorders of the Circulatory System (MDC 5)	With CLABSI	42.5	*	\$110,286
		Without CLABSI	4.0	7.9	\$12,318
	Diseases & Disorders of the Nervous System (MDC 1)	With CLABSI	41.0	*	\$146,884
		Without CLABSI	6.0	8.3	\$14,350
	Diseases & Disorders of the Respiratory System (MDC	With CLABSI	34.5	50.9	\$125,528
	4)	Without CLABSI	5.0	11.3	\$11,802
	Diseases & Disorders of the Digestive System (MDC 6)	With CLABSI	25.0	*	\$73,431
		Without CLABSI	4.0	4.7	\$10,529
2021,	Infectious & Parasitic Diseases, Systemic or Unspecified	With CLABSI	36.0	22.3	\$104,849
Without	Sites (MDC 18)	Without CLABSI	5.0	9.2	\$12,586
COVID-19	Diseases & Disorders of the Circulatory System (MDC 5)	With CLABSI	26.0	21.0	\$89,178
		Without CLABSI	3.0	2.8	\$12,054
	Diseases & Disorders of the Nervous System (MDC 1)	With CLABSI	30.0	11.2	\$98,696
		Without CLABSI	4.0	3.6	\$11,342
	Diseases & Disorders of the Respiratory System (MDC	With CLABSI	28.0	29.2	\$100,803
	4)	Without CLABSI	4.0	4.5	\$9,397
	Diseases & Disorders of the Digestive System (MDC 6)	With CLABSI	27.0	8.9	\$67,094
		Without CLABSI	3.0	1.6	\$9,706

Abbreviations: MDC, Major Diagnostic Category; CLABSI, central line-associated bloodstream infection; COVID-19, coronavirus disease 2019. Note: Statistics based on a sample size less than or equal to 10 are suppressed (denoted with an "*"). Source: Agency for Healthcare Research and Quality (AHRQ), Healthcare Cost and Utilization Project (HCUP), 2016-2021, State Inpatient Databases, 2019, 38 States

Table A.6. Details to support Figure 4. Median length of stay, in-hospital mortality rate, and median total hospital cost for adult inpatient stays with catheter-associated urinary tract infection (CAUTI) among top diagnostic categories, 2019 and 2021

Year, COVID-19	Major Diagnostia Catagony	Presence of CAUTI	Median inpatient length of stay	In-hospital mortality	Median total
Status	Major Diagnostic Category		(days)	(%)	hospital cost (\$)
2019	Infectious & Parasitic Diseases, Systemic or Unspecified	With CAUTI	24.0	11.8	\$61,831
	Sites (MDC 18)		5.0	7.8	\$11,974
	Diseases & Disorders of the Circulatory System (MDC 5)	With CAUTI	14.0	7.8	\$43,717
	Diseases & Diseasedance of the New York Custom (MDC 4)		3.0	2.5	\$10,957
	Diseases & Disorders of the Nervous System (MDC 1)	With CAUTI	18.0	5.5	\$49,888
		Without CAUTI	3.0	3.4	\$10,269
	Diseases & Disorders of the Respiratory System (MDC 4)	With CAUTI	17.0	10.7	\$44,977
		Without CAUTI	4.0	3.6	\$8,403
	Diseases & Disorders of the Digestive System (MDC 6)	With CAUTI	14.0	5.6	\$35,620
		Without CAUTI	3.0	1.4	\$8,810
2021, With	Infectious & Parasitic Diseases, Systemic or Unspecified	With CAUTI	33.0	40.8	\$106,264
COVID-19	Sites (MDC 18)	Without CAUTI	8.0	24.5	\$17,714
	Diseases & Disorders of the Circulatory System (MDC 5)	With CAUTI	25.0	*	\$71,706
		Without CAUTI	4.0	7.9	\$12,342
	Diseases & Disorders of the Nervous System (MDC 1)	With CAUTI	25.0	*	\$61,797
		Without CAUTI	6.0	8.3	\$14,216
	Diseases & Disorders of the Respiratory System (MDC 4)	With CAUTI	27.0	37.6	\$84,370
		Without CAUTI	5.0	11.3	\$11,725
	Diseases & Disorders of the Digestive System (MDC 6)	With CAUTI	17.0	*	\$32,878
		Without CAUTI	4.0	4.7	\$10,376
2021,	Infectious & Parasitic Diseases, Systemic or Unspecified	With CAUTI	25.0	16.9	\$71,037
Without	Sites (MDC 18)	Without CAUTI	5.0	9.2	\$13,216
COVID-19	Diseases & Disorders of the Circulatory System (MDC 5)	With CAUTI	16.0	8.3	\$44,307
		Without CAUTI	3.0	2.8	\$12,138
	Diseases & Disorders of the Nervous System (MDC 1)	With CAUTI	20.0	5.3	\$54,127
		Without CAUTI	4.0	3.6	\$11,286
	Diseases & Disorders of the Respiratory System (MDC 4)	With CAUTI	21.0	13.6	\$56,893
		Without CAUTI	4.0	4.5	\$9,301
	Diseases & Disorders of the Digestive System (MDC 6)	With CAUTI	15.0	6.2	\$38,580
		Without CAUTI	3.0	1.6	\$9,691

Abbreviation: MDC, Major Diagnostic Category; CAUTI, catheter-associated urinary tract infection; COVID-19, coronavirus disease 2019.

*Statistics based on a sample size less than or equal to 10 are suppressed.

Source: Agency for Healthcare Research and Quality (AHRQ), Healthcare Cost and Utilization Project (HCUP), 2016-2021, State Inpatient Databases, 2019, 38 States

Table A.7. Details to support Figure 5. Median length of stay, in-hospital mortality rate, and median total hospital cost for adult inpatient stays with ventilator-associated pneumonia (VAP) among top diagnostic categories, 2019 and 2021

Year, COVID- 19 Status	Major Diagnostic Category	Presence of VAP	Median inpatient length of stay (days)	In-hospital mortality (%)	Median total hospital cost (\$)
2019	Infectious & Parasitic Diseases, Systemic or Unspecified	With VAP	27.0	31.4	\$113,015
2010	Sites (MDC 18)	Without VAP	5.0	7.8	\$11,474
	Diseases & Disorders of the Circulatory System (MDC 5)	With VAP	25.0	28.8	\$137,440
	Diseases & Disorders of the Circulatory System (MDC 3)	Without VAP	3.0	2.5	\$10,948
	Diseases & Disorders of the Nervous System (MDC 1)	With VAP	25.0	18.3	\$112,793
	у (-),	Without VAP	3.0	3.4	\$10,305
	Diseases & Disorders of the Respiratory System (MDC 4)	With VAP	24.0	27.1	\$98,894
		Without VAP	4.0	3.6	\$8,482
	Diseases & Disorders of the Digestive System (MDC 6)	With VAP	26.0	24.0	\$109,220
	ö	Without VAP	3.0	1.4	\$8,822
2021, With	Infectious & Parasitic Diseases, Systemic or Unspecified	With VAP	30.0	56.2	\$130,156
COVID-19	Sites (MDC 18)	Without VAP	7.0	24.1	\$17,354
	Diseases & Disorders of the Circulatory System (MDC 5)	With VAP	31.5	48.1	\$171,407
		Without VAP	4.0	7.8	\$12,455
	Diseases & Disorders of the Nervous System (MDC 1)	With VAP	32.0	27.5	\$131,883
		Without VAP	6.0	8.2	\$14,247
	Diseases & Disorders of the Respiratory System (MDC 4)	With VAP	31.0	55.6	\$127,452
		Without VAP	5.0	11.0	\$11,745
	Diseases & Disorders of the Digestive System (MDC 6)	With VAP	37.0	50.0	\$154,890
		Without VAP	4.0	4.6	\$10,525
2021, Without	Infectious & Parasitic Diseases, Systemic or Unspecified	With VAP	28.0	34.3	\$117,682
COVID-19	Sites (MDC 18)	Without VAP	5.0	9.2	\$12,554
	Diseases & Disorders of the Circulatory System (MDC 5)	With VAP	27.0	30.6	\$151,163
		Without VAP	3.0	2.8	\$12,108
	Diseases & Disorders of the Nervous System (MDC 1)	With VAP	28.0	20.0	\$122,492
		Without VAP	4.0	3.6	\$11,320
	Diseases & Disorders of the Respiratory System (MDC 4)	With VAP	27.0	29.8	\$112,510
		Without VAP	4.0	4.5	\$9,382
	Diseases & Disorders of the Digestive System (MDC 6)	With VAP	29.0	31.3	\$129,732
	· · · ·	Without VAP	3.0	1.5	\$9,707

Abbreviations: MDC, Major Diagnostic Category; COVID-19, coronavirus disease 2019; VAP, ventilator-associated pneumonia. Source: Agency for Healthcare Research and Quality (AHRQ), Healthcare Cost and Utilization Project (HCUP), 2016-2021, State Inpatient Databases, 2019, 38 States

Table A.8. Details to support Figure 6. Median length of stay, in-hospital mortality rate, and median total hospital cost for adult inpatient stays with methicillin-resistant *Staphylococcus aureus* (MRSA) infection in top diagnostic categories, 2019 and 2021

Year, COVID- 19 Status	Major Diagnostic Category	Presence of MRSA infection	Median inpatient length of stay (days)	In-hospital mortality (%)	Median total hospital cost (\$)
2019	Infectious & Parasitic Diseases, Systemic or	With MRSA infection	20.0	19.7	\$58,987
	Unspecified Sites (MDC 18)	Without MRSA infection	5.0	7.8	\$11,278
	Diseases & Disorders of the Circulatory	With MRSA infection	18.0	20.7	\$56,093
	System (MDC 5)	Without MRSA infection	3.0	2.5	\$10,904
	Diseases & Disorders of the Nervous System	With MRSA infection	23.0	15.1	\$77,947
	(MDC 1)	Without MRSA infection	3.0	3.4	\$10,294
	Diseases & Disorders of the Respiratory	With MRSA infection	19.0	19.1	\$55,608
	System (MDC 4)	Without MRSA infection	4.0	3.6	\$8,446
	Diseases & Disorders of the Digestive System	With MRSA infection	20.0	15.7	\$54,214
	(MDC 6)	Without MRSA infection	3.0	1.4	\$8,812
2021, With	Infectious & Parasitic Diseases, Systemic or Unspecified Sites (MDC 18)	With MRSA infection	27.0	56.4	\$97,880
COVID-19		Without MRSA infection	8.0	24.4	\$17,361
	Diseases & Disorders of the Circulatory System (MDC 5)	With MRSA infection	29.5	40.8	\$89,826
		Without MRSA infection	4.0	7.8	\$12,364
	Diseases & Disorders of the Nervous System (MDC 1)	With MRSA infection	32.0	23.8	\$98,088
		Without MRSA infection	6.0	8.3	\$14,251
	Diseases & Disorders of the Respiratory System (MDC 4) Diseases & Disorders of the Digestive System (MDC 6)	With MRSA infection	26.0	58.6	\$87,027
		Without MRSA infection	5.0	11.1	\$11,750
		With MRSA infection	24.0	31.3	\$64,522
		Without MRSA infection	4.0	4.6	\$10,489
2021, Without	Infectious & Parasitic Diseases, Systemic or	With MRSA infection	22.0	22.3	\$70,118
COVID-19	Unspecified Sites (MDC 18)	Without MRSA infection	5.0	9.2	\$12,370
	Diseases & Disorders of the Circulatory	With MRSA infection	19.0	24.7	\$63,849
	System (MDC 5)	Without MRSA infection	3.0	2.8	\$12,065
	Diseases & Disorders of the Nervous System	With MRSA infection	25.0	19.2	\$86,052
	(MDC 1)	Without MRSA infection	4.0	3.6	\$11,312
	Diseases & Disorders of the Respiratory	With MRSA infection	20.0	21.1	\$65,630
	System (MDC 4)	Without MRSA infection	4.0	4.5	\$9,355
	Diseases & Disorders of the Digestive System	With MRSA infection	21.0	16.2	\$58,677
	(MDC 6)	Without MRSA infection	3.0	1.5	\$9,698

Abbreviations: MDC, Major Diagnostic Category; COVID-19, coronavirus disease 2019; MRSA, methicillin-resistant *Staphylococcus aureus*. Source: Agency for Healthcare Research and Quality (AHRQ), Healthcare Cost and Utilization Project (HCUP), 2016-2021, State Inpatient Databases, 2019, 38 States

Table A.9. Details to support Figure 7. Median length of stay, in-hospital mortality rate, and median total hospital cost for adult inpatient stays with *Clostridioides difficile (C. difficile)* infection among top diagnostic categories, 2019 and 2021

Year, COVID-19 Status	Major Diagnostic Category	Presence of <i>C. difficile</i> infection	Median inpatient length of stay (days)	In-hospital mortality (%)	Median total hospital cost (\$)
2019	Infectious & Parasitic Diseases, Systemic	With C. difficile infection	14.0	12.6	\$36,220
	or Unspecified Sites (MDC 18)	Without C. difficile infection	5.0	7.8	\$11,396
	Diseases & Disorders of the Circulatory	With C. difficile infection	15.0	10.9	\$43,034
	System (MDC 5)	Without C. difficile infection	3.0	2.5	\$10,932
	Diseases & Disorders of the Nervous	With C. difficile infection	19.0	9.1	\$47,916
	System (MDC 1)	Without C. difficile infection	3.0	3.4	\$10,297
	Diseases & Disorders of the Respiratory	With C. difficile infection	13.0	11.9	\$31,471
	System (MDC 4)	Without C. difficile infection	4.0	3.6	\$8,473
	Diseases & Disorders of the Digestive	With C. difficile infection	13.0	5.3	\$29,667
	System (MDC 6)	Without C. difficile infection	3.0	1.4	\$8,853
2021, With	Infectious & Parasitic Diseases, Systemic or Unspecified Sites (MDC 18)	With C. difficile infection	23.0	36.8	\$67,059
COVID-19		Without C. difficile infection	8.0	24.5	\$17,582
	Diseases & Disorders of the Circulatory System (MDC 5)	With C. difficile infection	24.0	20.6	\$58,028
		Without C. difficile infection	4.0	7.9	\$12,419
	Diseases & Disorders of the Nervous System (MDC 1)	With C. difficile infection	29.0	14.2	\$76,057
		Without C. difficile infection	6.0	8.3	\$14,287
	Diseases & Disorders of the Respiratory System (MDC 4) Diseases & Disorders of the Digestive	With C. difficile infection	23.0	33.7	\$60,874
		Without C. difficile infection	5.0	11.3	\$11,790
		With C. difficile infection	22.0	10.3	\$43,917
	System (MDC 6)	Without C. difficile infection	4.0	4.6	\$10,480
2021, Without	Infectious & Parasitic Diseases, Systemic	With C. difficile infection	15.0	13.6	\$39,046
COVID-19	or Unspecified Sites (MDC 18)	Without C. difficile infection	5.0	9.2	\$12,504
	Diseases & Disorders of the Circulatory	With C. difficile infection	16.0	12.9	\$48,183
	System (MDC 5)	Without C. difficile infection	3.0	2.8	\$12,097
	Diseases & Disorders of the Nervous	With C. difficile infection	20.0	10.4	\$60,035
	System (MDC 1)	Without C. difficile infection	4.0	3.6	\$11,319
	Diseases & Disorders of the Respiratory	With C. difficile infection	15.0	15.1	\$37,141
	System (MDC 4)	Without C. difficile infection	4.0	4.5	\$9,379
	Diseases & Disorders of the Digestive	With C. difficile infection	14.0	7.1	\$33,763
	System (MDC 6)	Without C. difficile infection	3.0	1.5	\$9,726

Abbreviations: MDC, Major Diagnostic Category; C. difficile, Clostridioides difficile; COVID-19, coronavirus disease 2019. Source: Agency for Healthcare Research and Quality (AHRQ), Healthcare Cost and Utilization Project (HCUP), 2016-2021, State Inpatient Databases, 2019, 38 States