Hospital Compare Quality Measure Results for New York CAHs: 2017

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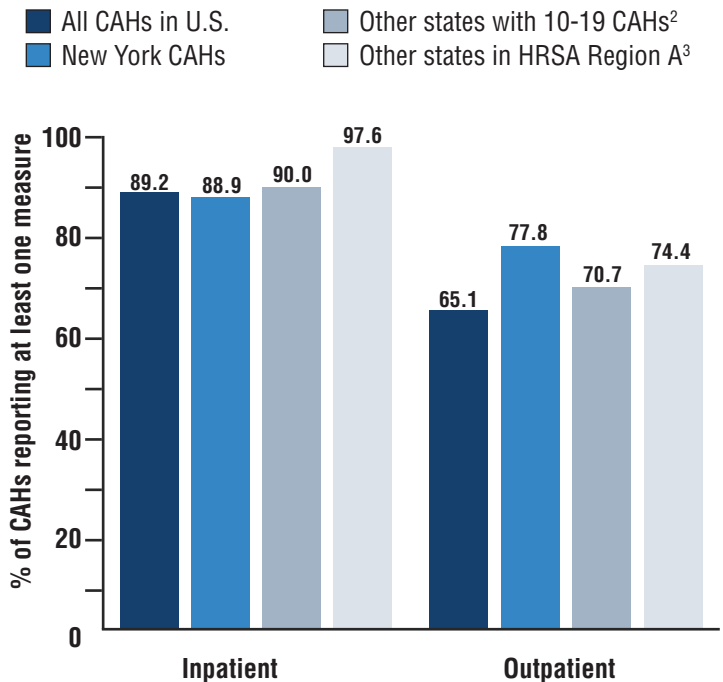
KEY FINDINGS:

- Compared to all other CAHs nationally, New York's CAHs reported at a rate that was lower for inpatient measures (88.9% of CAHs vs. 89.2% nationally) and higher for outpatient measures (77.8% of CAHs vs. 65.1% nationally).

- New York's CAHs rank #27 for inpatient measure reporting and #14 for outpatient measure reporting among the 45 states participating in the Flex Program.

- Compared to scores on process of care measures for all other CAHs nationally in 2017, New York's CAHs scored significantly higher on 4 measures, significantly lower on 3 measures, did not have significantly different performance on 7 measures, and had insufficient data to compare 4 measures.

INTRODUCTION

Since 2004, acute care hospitals paid under the Medicare Prospective Payment System (PPS) have had a financial incentive to publicly report quality measure data on the Centers for Medicare & Medicaid Services' (CMS) Hospital Compare website. Although Critical Access Hospitals (CAHs) do not face the same financial incentives as PPS hospitals to participate, the Hospital Compare initiative provides an important opportunity for CAHs to publicly report, assess and improve their performance on national standards of care.

This report is part of a series of 45 annual state-level reports that examine CAH participation in Hospital Compare, quality measure results, and trends.[1] This set of state reports focus on data for inpatient and outpatient process of care and structural measures for 2017. State reports on Hospital Consumer Assessment of Healthcare Providers and Systems (HCAHPS) data for the same time period were previously released.[2]

Figure 1. CAH Participation in Hospital Compare[1], 2017

Legend:
- All CAHs in U.S.
- New York CAHs
- Other states with 10-19 CAHs[2]
- Other states in HRSA Region A[3]

1. Percentage of CAHs in each state or group of states reporting data to Hospital Compare on at least one measure.
2. Group includes states with 10-19 CAHs: AK(14), AZ(14), FL(12), ME(16), NH(13), NM(10), NV(13), PA(15), TN(14), UT(13), WY(16)
3. HRSA Region A includes MA(3), ME(16), NH(13), PA(15), VA(7), VT(8), WV(20)

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The report used the following data sources:

- Publicly-available Hospital Compare data down loaded from the CMS Hospital Compare website on inpatient and outpatient process measures for 2017.
- Data for 2017 on process measures for which CAHs reported ten or fewer cases, which CMS suppresses from the Hospital Compare website, but makes available to the Federal Office of Rural Health Policy for aggregate CAH analyses.

Since the last set of CAH state reports, 1 structural measure was added, and 2 inpatient measures and 2 structural measures were removed from Hospital Compare. This report includes 18 process of care measures and 5 structural measures that are potentially relevant to CAHs and for which some CAHs nationally have reported data; some states do not have any CAHs reporting some of these measures. Reporting is defined as reporting data with a denominator of 1 or more for inpatient and outpatient measures. Definitions of the measures used in the report are provided on pages 8-9.

The Hospital Compare data in this report include several measures that are also measures for the Medicare Beneficiary Quality Improvement Project (MBQIP). Although the majority of CAHs report data on these measures to both Hospital Compare and MBQIP, the data in this report may differ from MBQIP reports because some CAHs only report data to one of these programs.

For FY 2015-18, State Flex Grantees are required to work with all CAHs on all MBQIP core improvement activities in each of four quality domains: patient safety, patient engagement, care transitions, and outpatient care. States may also choose to work on additional improvement activities with CAHs based on need and relevance. The tables in the report indicate if a measure is an MBQIP core or additional improvement measure in addition to being a Hospital Compare measure.

APPROACH

For this report, summary measures were calculated to compare performance on the inpatient and outpatient process of care measures for all CAHs within New York to the performance of CAHs in all other states. The inpatient and outpatient measure scores were classified as: 1) insufficient data (less than 25 patients total); 2) not significantly different than CAHs in all other states; 3) significantly better than all other CAHs; or 4) significantly worse than all other CAHs. The percent of CAH patients receiving recommended care was not reported when the total number of CAH patients in a state (or nationally) with data on a measure was less than 25.

The percentages of patients that received recommended care for the inpatient and outpatient process of care quality measures were calculated by dividing the total number of patients in all CAHs in the state and all other CAHs nationally who received the recommended care by the total number of eligible patients in all CAHs in the state and all other CAHs nationally for each measure. For each inpatient and outpatient rate measure, the percent of CAH patients receiving recommended care in each state was then compared to the percent of CAH patients that received recommended care in all other states combined. Chi-square tests were used to calculate whether these differences were statistically significant at $p < .05$ level.

Median scores were calculated for median time process measures by first arranging the median time from all available quarterly data together from all CAHs nationally. Then, the median value of these times was selected. Wilcoxon-Mann-Whitney tests were used to compare the median times for CAHs in each state and all other CAHs.

For each structural measure, the percentages of CAHs in New York and all other states that reported no data, and those that reported yes or no on each measure, were calculated.

REPORTING FOR PROCESS OF CARE MEASURES IN NEW YORK AND ALL OTHER STATES

As in previous years, the percent of CAHs reporting inpatient and outpatient process of care data to Hospital Compare varied considerably across states. In New York, 88.9% of the 18 CAHs reported data to Hospital Compare on at least one inpatient process of care measure for discharges in 2017. 77.8% of the 18 CAHs in New York reported data to Hospital Compare on at least one outpatient process of care measure for discharges in 2017.

Figure 2 compares the respective inpatient and outpatient reporting rates over time (2014 through 2017) among CAHs in four groups: those in New York, all CAHs nationally, other states with a similar number of CAHs as New York, and other states located in the same HRSA geographic region as New York.

Tables 1 and 2 compare the respective inpatient and outpatient reporting rates of CAHs in New York to those located in the other 44 states participating in the Flex Program as well as the rate for all CAHs nationally. The New York CAH inpatient reporting rate of 88.9% ranks #27 nationally; the New York CAH outpatient reporting rate of 77.8% ranks #14 nationally.

The number of CAHs reporting individual inpatient and outpatient process of care measures may differ by measure for several reasons. Some measures only apply to a portion of patients; others exclude patients with contraindications, or only apply to conditions not treated or procedures not performed in some CAHs.

RESULTS

Process of Care Measures

Table 3 displays inpatient and outpatient process of care results for 2017 discharges for CAHs in New York and all other CAHs. Table 4 displays results for median time measures (lower scores, indicating shorter median times, are better).

Structural Measures

Nationally, at least 70% of CAHs did not report structural quality measure data. Table 5 provides results for CAHs in New York and all other CAHs nationally that reported data for 2017.

TOOLS AND RESOURCES

The Flex Monitoring Team (FMT) provides free access to all publications and presentations on our website, www.flexmonitoring.org, including a series of policy briefs on evidence-based QI programs and strategies that could be implemented by CAHs.

The Technical Assistance and Services Center (TASC) provides resources for State Flex Programs and CAHs on their website.

For profiles of State Flex Programs, State Contacts, and examples of Flex activities to support quality improvement, visit https://www.ruralcenter.org/tasc/flex-profile.

For resources focused on the Medicare Beneficiary Quality Improvement Program (MBQIP), visit https://www.ruralcenter.org/tasc/mbqip.

REFERENCES

1. The Flex Monitoring Team has published national Hospital Compare reports since 2006. All are available for download at http://www.flexmonitoring.org/publications/annual-hospital-compare-results/.

2. Previous state-level reports are available on the Flex Monitoring Team website at http://www.flexmonitoring.org/data/state-level-data.

(Figure 2, Tables 1–5, and measure definitions begin on next page)
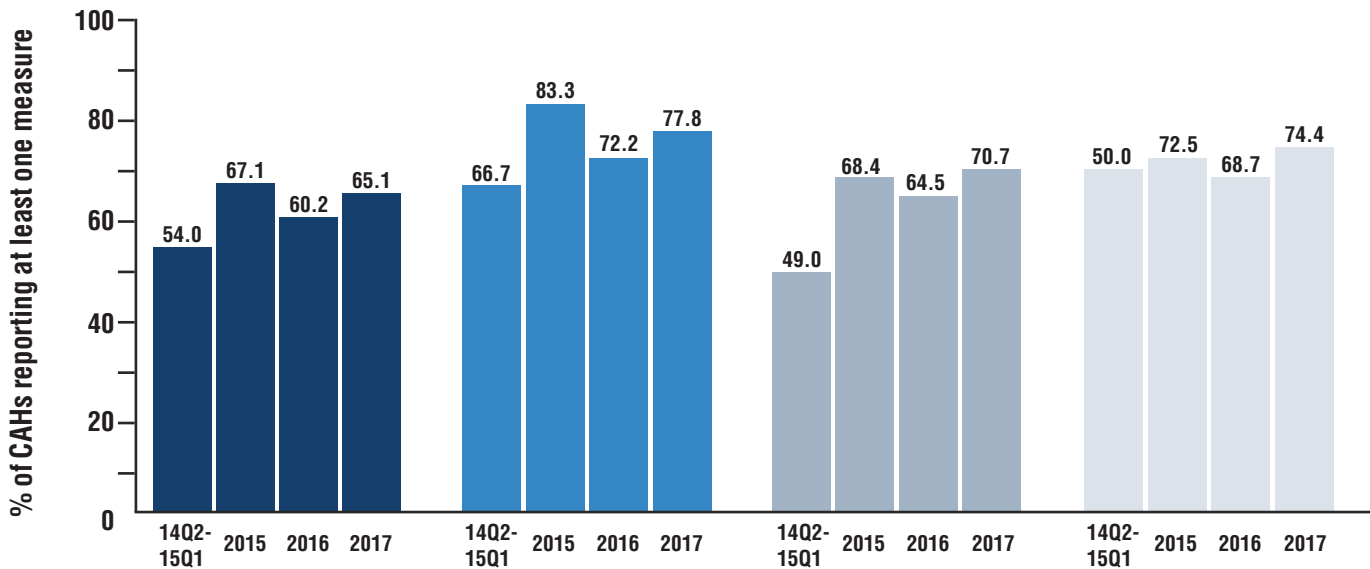
Figure 2. CAH Participation in Hospital Compare for Inpatient and Outpatient Discharges, 2017

- All CAHs in U.S. (N=1348)[1]
- New York CAHs (N=18)
- Other states with 10-19 CAHs[2] (N=150)
- Other states in HRSA Region A[3] (N=82)

Inpatient Discharges

	14Q2-15Q1	2015	2016	2017
All CAHs in U.S.	84.8	84.2	85.6	89.2
New York CAHs	83.3	88.9	77.8	88.9
Other states with 10-19 CAHs	86.0	83.8	86.5	90.0
Other states in HRSA Region A	97.5	95.0	96.4	97.6

Outpatient Discharges

	14Q2-15Q1	2015	2016	2017
All CAHs in U.S.	54.0	67.1	60.2	65.1
New York CAHs	66.7	83.3	72.2	77.8
Other states with 10-19 CAHs	49.0	68.4	64.5	70.7
Other states in HRSA Region A	50.0	72.5	68.7	74.4
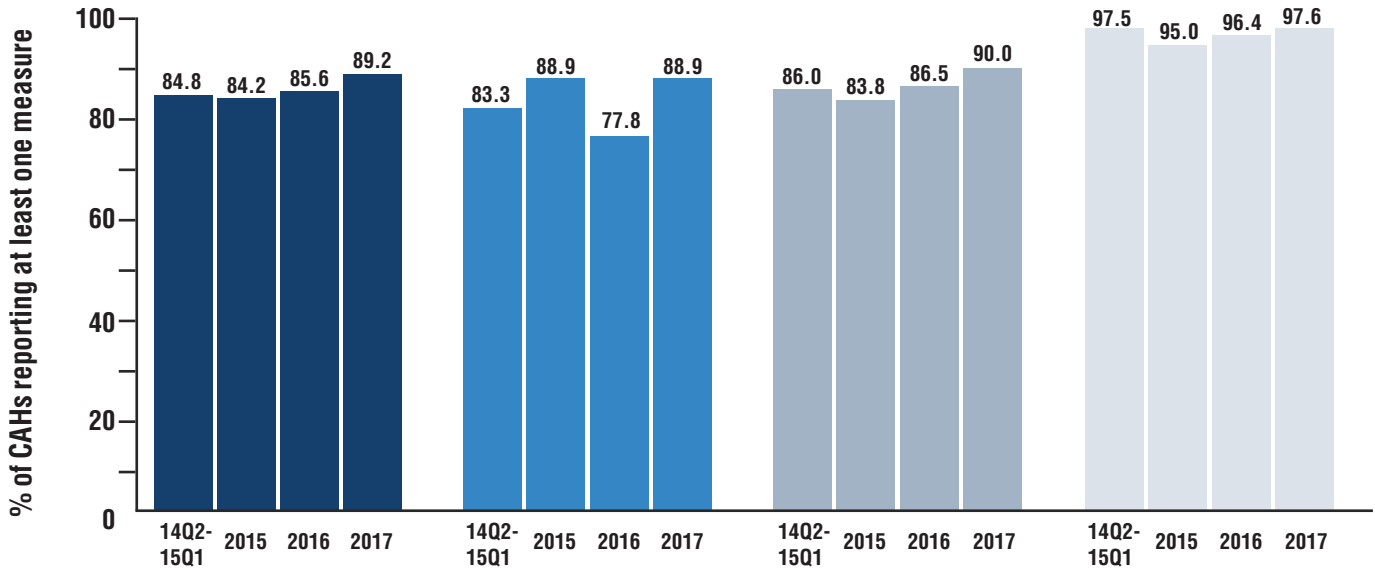
1. Listed N values refer to most recent data (2017) only.
2. Group includes AK(14), AZ(14), FL(12), ME(16), NH(13), NM(10), NV(13), PA(15), TN(14), UT(13), WY(16)
3. HRSA Region A includes MA(3), ME(16), NH(13), PA(15), VA(7), VT(8), WV(20)

Table 1. State Rankings of CAH Reporting Rates for Inpatient Quality Measures, 2017

Rank	State	CAHs reporting	% of CAHs
1	Michigan	36	100.0
	Georgia	30	
	Arkansas	29	
	Oregon	25	
	Maine	16	
	Pennsylvania	15	
	New Hampshire	13	
	Utah	13	
	Virginia	7	
	South Carolina	5	
	Alabama	4	
	Massachusetts	3	
13	Minnesota	77	98.7
14	Wisconsin	57	98.3
15	Illinois	50	98.0
16	Indiana	34	97.1
17	Nebraska	62	96.9
18	West Virginia	19	95.0
19	Washington	37	94.9
20	North Dakota	34	94.4
21	Wyoming	15	93.8
22	Kansas	78	92.9
	Alaska	13	
24	California	31	91.2
25	Ohio	30	90.9
	All CAHs	1,203	89.2
26	Iowa	73	89.0
27	Idaho	24	88.9
	Kentucky	24	
	New York	16	
30	Montana	42	87.5
	Vermont	7	
32	North Carolina	18	85.7
	Tennessee	12	
34	Nevada	11	84.6
35	Mississippi	26	83.9
36	Oklahoma	31	81.6
37	New Mexico	8	80.0
38	South Dakota	30	78.9
39	Arizona	11	78.6
40	Colorado	25	78.1
41	Missouri	28	77.8
42	Florida	8	66.7
	Hawaii	6	
44	Texas	54	63.5
45	Louisiana	16	59.3

Table 2. State Rankings of CAH Reporting Rates for Outpatient Quality Measures, 2017

Rank	State	CAHs reporting	% of CAHs
1	Nebraska	64	100.0
	Pennsylvania	15	
	Alabama	4	
4	Georgia	28	93.3
5	New Hampshire	12	92.3
6	Michigan	33	91.7
7	Indiana	32	91.4
8	Minnesota	70	89.7
9	Maine	14	87.5
10	Nevada	11	84.6
11	Wisconsin	48	82.8
	Arkansas	24	
13	Wyoming	13	81.3
14	New York	14	77.8
15	Washington	30	76.9
	Utah	10	
17	Oregon	19	76.0
18	Oklahoma	28	73.7
19	Ohio	24	72.7
20	Tennessee	10	71.4
	Virginia	5	
22	North Dakota	25	69.4
23	Iowa	55	67.1
24	Massachusetts	2	66.7
	All CAHs	878	65.1
25	Illinois	33	64.7
26	Kentucky	17	63.0
27	North Carolina	13	61.9
28	West Virginia	12	60.0
	South Carolina	3	
30	Mississippi	18	58.1
31	Hawaii	5	55.6
32	Missouri	18	50.0
	Arizona	7	
	Florida	6	
	New Mexico	5	
36	Idaho	13	48.1
37	Kansas	38	45.2
38	Colorado	13	40.6
39	Montana	19	39.6
40	Texas	32	37.6
41	Louisiana	10	37.0
42	California	12	35.3
43	South Dakota	10	26.3
44	Alaska	3	21.4
45	Vermont	1	12.5

Table 3. Inpatient and Outpatient Process of Care Results for Patients Discharged from CAHs in New York and All Other States, 2017

🟩 Significantly better than rate for all other CAHs nationally (p<.05)   🟨 Significantly worse than rate for all other CAHs nationally (p<.05)

	Code	Description	NY (n=18) CAHs reporting	NY (n=18) % of patients[1]	All other CAHs (n=1330) CAHs reporting	All other CAHs (n=1330) % of patients[1]
Inpatient	IMM-2†	Immunization for influenza	14	79.3	997	88.6
	OP-27/IMM-3†	Healthcare workers given influenza vaccination	9	87.9	1019	88.3
	PC-01‡	Early elective delivery (lower is better)	2	2.0	189	2.9
	VTE-6	Incidence of potentially-preventable VTE (lower is better)	0	*	122	*
	Code	Description	CAHs reporting	% of patients[1]	CAHs reporting	% of patients[1]
Outpatient	OP-2†	Fibrinolytic therapy received within 30 minutes	5	*	356	*
	OP-4‡	Aspirin at arrival	12	97.3	806	95.2
	OP-22†	Patient left without being seen (lower is better)	10	0.7	617	1.0
	OP-23	Received head CT scan interpretation within 45 minutes	7	59.5	519	63.0
	OP-29	Appropriate follow-up interval, colonoscopy, average-risk patients	3	82.6	174	84.2
	OP-30	Appropriate follow-up interval, colonoscopy, patients with polyps	3	96.9	173	91.2

1. Rates without highlights were not significantly different from comparable rates in all CAHs nationally.

*   Insufficient data to calculate rate (<25 patients).

†   MBQIP core measure FY 2018-21 (this table shows Hospital Compare data)

‡   MBQIP additional improvement measure FY 2018-21 (this table shows Hospital Compare data)

Table 4. Median Time to Patients Receiving Recommended Care at CAHs in New York and All Other States, 2017

■ Significantly better than rate for all other CAHs nationally (p<.05)   ■ Significantly worse than rate for all other CAHs nationally (p<.05)

	Note: lower is better for all measures in this table.	NY (n=18)		All other CAHs (n=1330)	
Code	Description	CAHs reporting	Minutes[1]	CAHs reporting	Minutes[1]
ED-1b[†]	Median time from ED admission to ED departure for admitted patients	11	245.8	872	196.5
ED-2b[†]	Admit decision time to ED departure time for admitted patients	11	78.0	864	46.0
OP-1	Median time to fibrinolysis	5	*	355	*
OP-3b[†]	Median time to transfer to another facility - acute coronary intervention	7	*	463	*
OP-5[†]	Median time to ECG	12	6.5	807	7.5
OP-18b[†]	Median time from ED arrival to ED departure for discharged patients	12	86.0	788	105.3
OP-20[‡]	Median time from door to diagnostic evaluation	12	14.0	788	16.0
OP-21	Median time to pain management for long bone fracture	14	37.3	751	44.0

1. Median minutes to receiving care. Lower is better for all measures. Rates without highlights were not significantly different from comparable rates in all CAHs nationally.
* Insufficient data to calculate rate (<25 patients).
† MBQIP core measure FY 2018-21 (this table shows Hospital Compare data)
‡ MBQIP additional improvement measure FY 2018-21 (this table shows Hospital Compare data)

Table 5. Structural Quality Measures Reported by CAHs in New York and All Other States, 2017

		NY CAHs (n=18)			All other CAHs (n=1330)		
Code	Description	No data	No	Yes	No data	No	Yes
OP-12	Ability to receive lab data directly to certified EHR	72.2	0.0	27.8	71.9	2.3	25.8
OP-17	Ability to track clinical results between visits	72.2	0.0	27.8	72.2	2.1	25.7
OP-25	Use of safe surgery checklist: outpatient	72.2	0.0	27.8	69.9	1.4	28.6
SM-HS-PATIENT-SAF[‡]	Use of hospital survey on patient safety culture	77.8	5.6	16.7	73.8	7.5	18.7
SM-SS-CHECK	Use of safe surgery checklist: inpatient	77.8	0.0	22.2	71.1	1.6	27.4

‡ MBQIP additional improvement measure, FY 2018-21 (this table shows Hospital Compare data)

DEFINITIONS OF MEASURES

Note: higher numbers reflect better performance, except where indicated below.

- **ED-1b**: Admit Decision Time to Emergency Department (ED) Departure Time for Admitted Patients - median time from admit decision time to time of departure from the ED for patients admitted to inpatient status. (A lower number is better.)

- **ED-2b**: Median Time from Emergency Department (ED) Arrival to ED Departure for Admitted Patients - median time from ED arrival to time of departure from the ED for patients admitted to the facility from the ED (A lower number is better.)

- **IMM-2**: Influenza Vaccination – This prevention measure addresses acute care hospitalized inpatients age 6 months and older who were screened for seasonal influenza immunization status and were vaccinated prior to discharge if indicated. The numerator captures two activities: screening and the intervention of vaccine administration when indicated. As a result, patients who had documented contraindications to the vaccine, patients who were offered and declined the vaccine, and patients who received the vaccine during the current year's influenza season but prior to the current hospitalization are captured as numerator events.

- **OP-1**: Median Time to Fibrinolysis - median time from arrival to fibrinolysis for patients that received fibrinolysis. (A lower number is better.)

- **OP-2:** Fibrinolytic therapy received within 30 minutes of arrival – Acute Myocardial Infarction (AMI) patients receiving fibrinolytic therapy during the hospital stay and having a time from hospital arrival to fibrinolysis of 30 minutes or less.

- **OP-3b**: Median Time to Transfer to Another Facility for Acute Coronary Intervention – Median number of minutes before outpatients with heart attack who needed specialized care were transferred to another hospital. (A lower number is better.)

- **OP-4:** Aspirin at arrival – Acute Myocardial Infarction (AMI) patients without aspirin contraindications who received aspirin within 24 hours before or after hospital arrival.

- **OP-5**: Median Time to echocardiogram (ECG) – median number of minutes before outpatients with heart attack (or with chest pain that suggests a possible heart attack) got an ECG. (A lower number is better).

- **OP-12**: Ability to Receive Lab Data Directly to Electronic Health Record (EHR) – the ability for providers with Health Information Technology (HIT) to receive laboratory data directly into their ONC-certified EHR system as discrete searchable data.

- **OP-17**: Ability to Track Clinical Results between Visits – the ability for a facility to track pending laboratory tests, diagnostic studies, or patient referrals through the ONC-certified Electronic Health Record (EHR) system.

- **OP-18b**: Median Time from Emergency Department (ED) Arrival to ED Departure for Discharged Patients - median time from ED arrival to time of departure from the ED for patients discharged from the ED (a lower number is better).

- **OP-20**: Door to Diagnostic Evaluation by Qualified Medical Personnel - median time from Emergency Department (ED) arrival to provider contact for ED patients (a lower number is better).

- **OP-21**: Median Time to Pain Management for Long Bone Fracture - median time from Emergency Department (ED) arrival to time of initial oral or parenteral pain medication administration for ED patients with a principal diagnosis of long bone fracture (a lower number is better).

- **OP-22**: Left Without Being Seen - percent of patients who leave the Emergency Department (ED) without being evaluated by a physician, advanced practice nurse (APN), or physician's assistant (PA). (A lower number is better.)

- **OP-23**: Head CT or MRI Scan Results for Acute Ischemic Stroke or Hemorrhagic Stroke Patients who Received Head CT or MRI Scan Interpretation Within 45 Minutes of Emergency Department (ED) Arrival - percentage of acute ischemic stroke or hemorrhagic

stroke patients who arrive at the ED within 2 hours of the onset of symptoms who have a head CT or MRI scan performed during the stay and have interpretation of the CT or MRI scan within 45 minutes of arrival.

- **OP-25**: Use of Safe Surgery Checklist (Outpatient) – whether or not a facility used a checklist for outpatient surgical procedures during each of the three critical perioperative periods (prior to administration of anesthesia, prior to skin incision,and closure of incision / prior to patient leaving the operating room).

- **OP-27 / IMM-3**: Health Care Workers Given Influenza Vaccination – Facilities must report vaccination data for three categories of Healthcare Personnel (HCP): employees on payroll; licensed independent practitioners (who are physicians, advanced practice nurses, and physician assistants affiliated with the hospital and not on payroll); and students, trainees, and volunteers aged 18 or older. Only HCP physically working in the facility for at least one day or more between October 1 and March 31 should be counted. Data on vaccinations received at the facility, vaccinations received outside of the facility, medical contraindications, and declinations are reported for the three categories of HCP.

- **OP-29**: Appropriate Follow-up Interval for Normal Colonoscopy in Average Risk Patients - Percentage of patients aged 50 to 75 years of age receiving a screening colonoscopy without biopsy or polypectomy who had a recommended follow-up interval of at least 10 years for repeat colonoscopy documented in their colonoscopy report.

- **OP-30:** Colonoscopy Interval for Patients with a History of Adenomatous Polyps - Percentage of patients aged 18 years and older receiving a surveillance colonoscopy, with a history of a prior colonic polyp(s) in previous colonoscopy findings, who had a follow-up interval of 3 or more years since their last colonoscopy.

- **PC-01**: Elective Delivery - patients with elective vaginal deliveries or elective cesarean sections at greater than or equal to 37 and less than 39 weeks of gestation completed (a lower number is better).

- **SM-HS-PATIENT-SAF**: Use of hospital survey on patient safety culture.

- **SM-SS-CHECK (SM-5)**: Use of Safe Surgery Checklist (inpatient) – whether or not a facility used a checklist for inpatient surgical procedures during each of the three critical perioperative periods (prior to administration of anesthesia, prior to skin incision, and closure of incision / prior to patient leaving the operating room).

- **VTE-6**: Hospital Acquired Potentially-Preventable Venous Thromboembolism (VTE) - the number of patients diagnosed with confirmed VTE during hospitalization (not present at admission) who did not receive VTE prophylaxis between hospital admission and the day before the VTE diagnostic testing order date (a lower number is better).

For detailed measure specifications:
- Specifications Manual for National Hospital Inpatient Quality Measures www.qualitynet.org/dcs/ContentServer?c=Page&pagename=QnetPublic/Page/QnetTier4&cid=1228772433589, accessed February 2019
- Specifications Manual for National Hospital Outpatient Quality Measures http://www.qualitynet.org/dcs/ContentServer?pagename=QnetPublic/Page/SpecsManualLicense, accessed February 2019
- Prenatal measure specifications https://manual.jointcommission.org/releases/archive/TJC2012A/rsrc/Manual/TableOfContentsTJC/PC_v2012A.pdf, accessed February 2019

Links to All State-Specific Reports:

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