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NHSN
NATIONAL HEALTHCARE SAFETY NETWORK

CENTERS FOR DISEASE CONTROL AND PREVENTION

NHSN E-Newsletter

Inside this Issue:

New COVID-19 Vaccination Data Reporting Features

COVID-19 vaccine(s) are expected to be available sometime during fall 2020. In preparation for this, CDC/NHSN is currently developing two new reporting features for facilities to track COVID-19 vaccination data:

- Monitoring weekly COVID-19 vaccination data among healthcare personnel working in non-long-term care facilities
- Monitoring weekly COVID-19 vaccination data among healthcare personnel working in long-term care facilities

NHSN will notify facilities when these reporting features are ready for use. Although data submission is not currently required by the Centers for Medicare and Medicaid Services, CDC/NHSN encourages facilities to take advantage of these new data reporting features to help identify any gaps in COVID-19 vaccination and improve vaccination coverage. These efforts will help protect the health of individuals working in and residing at healthcare facilities.

Are you interested in beta testing for the NHSN 9.5 release?

We are currently seeking volunteers for the NHSN annual release of version 9.5. The Beta team is planning for a two-week beta testing period prior to the full production release scheduled for December 5, 2020. Beta testing will provide an opportunity for NHSN users to explore new NHSN features and potentially identify issues that can be resolved prior to the production release.

From October 19, 2020 through October 30, 2020, “dummy data” will be populated in the beta environment for testers to manipulate with the NHSN 9.5 application. During the testing period, all data submitted the previous day during testing will be purged, and new data will be available for testing each morning.

We need volunteers from all NHSN components to participate: Biovigilance, Dialysis, Patient Safety, and Long Term Care. If you are interested in volunteering, please contact us at NHSNBeta@cdc.gov to express your willingness to participate and specify the component for which you are volunteering. We can support a limited number of beta testers, so availability cannot be guaranteed to everyone. More details will be made available in direct communication with volunteers via email prior to the beta testing period.

PATIENT SAFETY COMPONENT

Important Reminder: *C. difficile* LabID SIR

The NHSN team would like to share an important reminder to those users analyzing the *C. difficile* (CDI) LabID Event SIR.

The CDI SIR is only available quarterly, after data for the entire quarter have been entered. There are two reasons for this:

1. CDI Test Type is required to calculate the SIR, and CDI Test Type is selected on the FACWIDEIN or Inpatient Rehabilitation (IRF) Unit denominator screen during the last month of a quarter. Until CDI Test Type is indicated in NHSN for that quarter, a CDI SIR for FACWIDEIN or an IRF Unit cannot be calculated.

2. Quarterly inpatient CDI community-onset data are used in the calculation of the CDI SIRs.

For example, CDI data for July 2020, August 2020, and September 2020 are available in the SIR report as a single SIR for 2020 Q3. The 2020 Q3 SIR will be calculated after your facility completes data entry for all months of the quarter, through September 2020.

- Note that July and August data will be considered "incomplete" until September data have been entered. July and August will appear in the Incomplete Months table of the CDI SIR report, as CDI Test Type has not yet been entered for the quarter.
- After data entry (numerator and denominator) is completed for all 3 months of the quarter, you will see July, August, and September data included in the CDI SIR report, assuming all other data entry requirements have been met.

Please refer to the LabID SIR Troubleshooting Guide for more information:

https://www.cdc.gov/nhsn/pdfs/ps-analysis-resources/mrsacdi_tips.pdf

NHSN Healthcare Associated Infection Checklist: Lightbulb Moment

Do you have the memory of an elephant? Elephants are known to have superb memories and an impressive power to recollect. Similar to the memory of elephants, some people are able to recall the most minute details. If you possess this amazing gift, then consider yourself a part of a special group. However, for the rest of us who are required to write everything down or make checklists, NHSN developed a great tool to help you conduct your healthcare associated infection (HAI) surveillance. The NHSN HAI checklist is a useful tool developed to augment Infection Preventionists HAI surveillance efforts. The checklists, in conjunction with the Patient Safety Manual, can help streamline HAI surveillance. NHSN hopes the HAI checklists will guide Infection Preventionists and other users toward a final determination when evaluating NHSN HAI criteria. NHSNs checklist are located here https://www.cdc.gov/nhsn/enrolled-facilities/index.html on the left sidebar of the Surveillance Reporting for Enrolled Facilities webpage. Please send any comments or concerns to related to the checklists to NHSN@cdc.gov.

Antimicrobial Use and Resistance Module Updates

AU Option Synthetic Data Set Initiative

As a reminder, we have a webpage for Antimicrobial Use Synthetic Data Set (AU SDS) Validation here: https://www.cdc.gov/nhsn/cdaportal/au-sds/index.html. It's important for AU reporting facilities to be aware of this new requirement and the validation status of their vendor.

Facilities using an AU CDA vendor for AU CDA file creation, do not need to take direct action. NHSN encourages facilities to ask their AU CDA vendor about their SDS Validation timeline to ensure it meets the **2021 requirement**.

Facilities creating their own AU CDA files in-house using their own "homegrown" IT or informatics resources must complete the AU SDS Validation process. Please refer to the CDA Corner section below for additional information related to AU SDS Validation.

AR Option Pathogen Roll-Up Workbook to be used for 2021 AR Option Reporting

Beginning in January 2021, facilities and vendors will be expected to use an expanded list of eligible pathogens in their AR Option reporting. Full details, as well as the link to the AR Option Pathogen Roll-Up Workbook and associated reference guide, can be found in the CDA Corner section below.

OUTPATIENT PROCEDURE COMPONENT

Outpatient Procedure Component Information Corner

As previously outlined, inactivation of the Patient Safety Component (PSC) to Ambulatory Surgery Centers (ASC) is tentatively set to occur in January 2021.

What does inactivation mean? This means that the facility will lose access and not be allowed to log into the PSC. Any PSC data that the facility has entered will no longer be accessible.

Which ASCs will be affected by the inactivation? All facilities enrolled in NHSN as an AMB-SURG facility and having a **CMS Certification Number (CCN) that includes a "C" as the 3rd digit** will be included in the inactivation.

What should these facilities do? Facilities meeting the above description should access the instructions here to copy their PSC data to a local computer or hard drive by December 31, 2020.

Will the PSC data be assessible through the OPC after inactivation? Yes. Although the PSC and OPC are different components with different variables, most of the PSC data can be **viewed** in OPC. Both PSC SSI event and denominator for procedure data *with a procedure date of* 01/01/2015 – 10/31/2018 can be viewed in OPC.

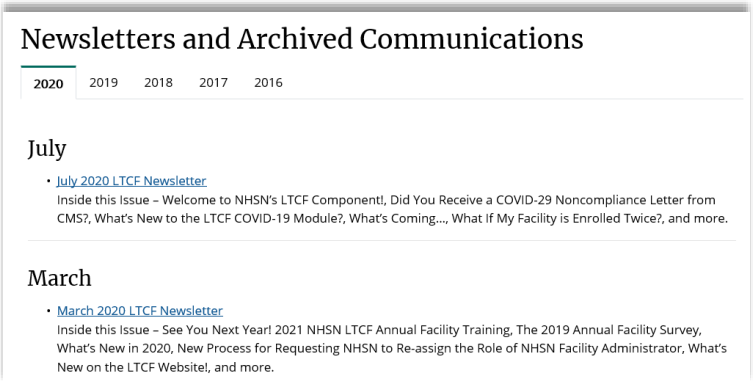
Can these facilities edit the PSC data in the OPC? The PSC data cannot be edited but can be analyzed using the variables available specific to OPC criteria.

For questions and request of additional guidance: contact NHSN@cdc.gov subject line: "Inactivation of PSC for ASCs).

LONG-TERM CARE FACILITY COMPONENT

LTCF Updates

Updates can be found in the LTCF newsletters, available here:
https://www.cdc.gov/nhsn/ltc/newsletters/index.html



HEALTHCARE PERSONNEL SAFETY COMPONENT

New Healthcare Personnel Influenza Vaccination Data Submission Requirement

There is a new CMS requirement for certain units located within some facilities to report healthcare personnel influenza vaccination data to NHSN beginning with the 2020-2021 influenza season. The newly reporting units are specified below:

- Inpatient psychiatric facility units and inpatient rehabilitation facility units located within long-term acute care facilities
- Inpatient psychiatric facility units located within inpatient rehabilitation facilities
- Inpatient rehabilitation facility units located within inpatient psychiatric facilities

The NHSN application does not currently support this reporting; however, the application is expected to be updated in December 2020 to allow facilities to enter data for these units. In the interim, facilities are encouraged to develop data collection systems for personnel working in these units, as facilities must report data for personnel working in these units at any time from October 1, 2020 through March 31, 2021.

NHSN will provide updated materials and training presentations that cover data reporting for this new requirement. More information will be sent to NHSN users in early 2021.

If you have any questions about this new requirement, please send an e-mail to: NHSN@cdc.gov with 'HPS Flu Summary' in the subject line.

New Reporting Feature for Weekly Influenza Vaccination Reporting of Healthcare Personnel

Beginning with the 2020-2021 influenza season, facilities will be able to track weekly healthcare personnel influenza vaccination data reporting through NHSN. This new feature will be available in the September 24 NHSN release. Weekly reporting is not currently required by the Centers for Medicare and Medicaid Services; however, this optional reporting can help facilities monitor influenza vaccination coverage during the influenza season.

If you have any questions about this, please send an e-mail to: nhsn@cdc.gov with 'HPS Flu Summary' in the subject line.

DIALYSIS COMPONENT

CMS ESRD QIP Reporting and Deadlines in Response to COVID-19

The Centers for Medicare and Medicaid Services (CMS) is granting an exception for the dialysis End Stage Renal Disease (ESRD) Quality Incentive Program (QIP) facilities for the following reporting requirements under ESRD QIP:

For the NHSN blood stream infection (BSI) measure and NHSN reporting measure

- The September 30, 2020 reporting deadline for encounters during the period of April 1, 2020 to June 30, 2020 (Q2 2020)

For questions, please contact the QIP helpdesk at ESRDQIP@cms.hhs.gov. Additional information can be found here: https://www.cms.gov/files/document/guidance-memo-exceptions-and-extensions-quality-reporting-and-value-based-purchasing-programs.pdf

BIOVIGILANCE COMPONENT

Hemovigilance Module Updates

The training resources available in the Hemovigilance Module are in the process of being updated. As of September 1, 2020, our *Introduction to Hemovigilance Module Reporting* training will no longer be eligible for Continuing Education Credits (CEUs). We are committed to meeting the continuing education needs of our users and access to the training will remain on the NHSN website. Continuing education credit for this training will available again in early 2020. Please look for updates in the future.

Questions Regarding Hemovigilance Module

For additional information please send all questions regarding the Hemovigilance Module (i.e., technical issues, support questions) to nhsn@cdc.gov and include 'Hemovigilance' in the subject line for a quicker response.

GENERAL NHSN INFORMATION

NHSN Data Quality Corner

1. **Beginning July 1, 2020, the Extraordinary Circumstance Exception (ECE)** that CMS announced on March 22, 2020 (in response to COVID-19 pandemic) has ended. Therefore, data reporting requirements will resume for the following Medicare fee-for-service (FFS) quality reporting and hospital value-based payment programs:

    a. Hospital Inpatient Quality Reporting
    b. Hospital Outpatient Quality Reporting
    c. PPS-Exempt Cancer Hospital Quality Reporting
    d. Hospital Value-Based Purchasing
    e. Hospital-Acquired Condition Reduction Program
    f. Hospital Readmissions Reduction Program

    Therefore, it is important that **NHSN facilities submit data into NHSN that has passed data quality requirements** for each of the required Healthcare-associated infection **(HAI)** modules. Details on reporting requirements through NHSN, by healthcare facility type, can be found here: https://www.cdc.gov/nhsn/cms/index.html

2. **Antimicrobial Use and Resistance (AUR) data quality outreach**:
    As part of ongoing data quality efforts, we are conducting outreach to facilities with substantially different admission counts across the Antimicrobial Use and Resistance (AUR) Module and the Multidrug-Resistant Organism & *Clostridioides difficile* Infection (MDRO/CDI) Module. Facilities contacted during this outreach are asked to validate the number of FACWIDEIN admissions reported for each module and either update data as needed or provide insight into these differences.

3. **AUR defects:** If your facility was potentially impacted, we will be reaching out to you and/or your vendor to have these data reviewed and updated.

    a. Antimicrobial Resistance (AR) Option events uploaded into the NHSN application using the ESBL *E. coli* SNOMED code 409800005 from **July 18, 2019 through December 8, 2019** incorrectly saved as *Klebsiella oxytoca*. NHSN has resolved this issue and events uploaded with this code as of December 9, 2019 correctly save as the pathogen *E. coli*.

    b. AR Option events uploaded into the NHSN application using the ESBL *Klebsiella oxytoca* SNOMED code 713928005 from **January 22, 2020 through March 19, 2020** incorrectly saved in the database as *E. coli*. NHSN has resolved this issue and events uploaded with this code as of March 20, 2020 correctly save as the pathogen *Klebsiella oxytoca*.

CDA Corner

Important Update to the NHSN Release Schedule

- Release 9.5 was previously scheduled for Summer 2020, with release 10.0 planned for Winter 2020. Release 9.5 will now be moved to the end of the year and combined with Release 10.0. The end of year release (now referred to as Release 9.5) will include CRs and defects previously scheduled for both summer and winter releases.
- The release of the Neonatal Component will be postponed until 2021.

COVID-19 Data Uploads

- Long Term Care Facilities can now submit CSV files with COVID data ONLY, via Direct Automation. Manual upload is also still available.
    - Please reach out to NHSNCDA@CDC.GOV or visit the webpage (https://www.cdc.gov/nhsn/covid19/index.html) for more information.

COVID-19 Addition to HAI CDAs:

- The following CDAs will have a new COVID-19 question added: BSI, SSI, VAE, and UTI.
    - The companion guide to start development of these new CDAs can be found in "CDA 9.5 Guides" zip file within the Release 9.5 toolkit: https://www.cdc.gov/nhsn/cdaportal/toolkits.html.
    - The R4-D1 IG containing the newly added COVID-19 question will be released in Summer 2021.
- The COVID-19 question is currently optionally available for manual entry within the NHSN User Interface.

CDAs moving to R3-D4 IG version for Release 9.5 (January 2021):

- Event: If event date >= 2021, MUST use the R3-D4 version of the IG.
    - Dialysis Events
- Late Onset Sepsis and Meningitis (NHSN release postponed)
    - Event and Summary will be based on R3-D4 IG

AR Option Pathogen Roll-Up Workbook to be used for 2021 AR Option Reporting

In order to maintain a consistent list of AR Option pathogens accepted into NHSN across all submitters, NHSN has relied on the "ARO Pathogens" column within the "Pathogens Codes" tab within the Information Data Model (IDM) spreadsheet to list the eligible pathogens for AR Option reporting. Advances in technology continue to allow labs to identify and classify pathogens at a more granular level and SNOMED continues to add new concepts. As a result, the NHSN AUR Module Team decided to expand the list of eligible AR Option pathogens to better capture the identification of specific pathogens. The AR Option Pathogen Roll-up Workbook must be used by all submitters to determine if a pathogen is eligible for submission into the AR Option and whether that pathogen needs to be rolled up to (or mapped-to) a higher-level concept to be accepted into NHSN. Facilities should work with their vendor to ensure all eligible pathogens are reported. **The AR Option Pathogen Roll-up Workbook lists all pathogens that are eligible for AR Option reporting as of January 1, 2021.**

The AR Option Pathogen Roll-up Workbook and associated reference guide are posted within the Antimicrobial Resistance Option CDA Toolkit on this webpage: https://www.cdc.gov/nhsn/cdaportal/toolkits.html.

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Two AR Option Summary Changes Delayed until Summer 2021

The NHSN AUR Module Team has moved two changes originally planned for the December 2020 NHSN 9.5 release to the Summer 2021 NHSN release.

- Change Request (CR) 2143 will add the ability to report no AR Events via CDA through the AU Option Summary CDA file. As a reminder facilities will maintain the ability to manually report No AR Events via the NHSN User Interface: https://www.cdc.gov/nhsn/pdfs/ps-analysis-resources/aur/AR-QRG-NoEvents-508.pdf.
- CR 2158 will add the ability to report AR Option Summary data for select outpatient locations.

Additionally, with the change in release date, the AR Option Summary CDA will be updated to use the **R4-D1 Implementation Guide (IG)** that will undergo balloting in the upcoming HL7 ballot cycle. We will **not** update the AR Option Summary CDA to use the R3-D4 IG as originally planned. The R1Norm IG should continue to be used until the above changes are implemented in NHSN in Summer 2021. At that time, we will update the AR Option Summary to use the new R4-D1 IG.

Antimicrobial Use Synthetic Data Set (AU SDS) version 4.3 posted!

A new version of the AU SDS posted in July. Please use release 4.3 as the version for AU SDS Validation if you have not already passed AU SDS Validation as documented on the Vendors that have Passed the AU SDS Validation website: https://www.cdc.gov/nhsn/cdaportal/au-sds/vendor-list.html.

We made the following minor changes to the data set:

- Operating room location types removed.
- Rehabilitation facility location type changed to rehabilitation ward (within acute care hospital) location type.
- Resolved issue caused by two consecutive patient movements with exact same timestamp.

The AU SDS release 4.3 can be downloaded from the main AU SDS Validation website: https://www.cdc.gov/nhsn/cdaportal/au-sds/index.html.

Antimicrobial Use Option Synthetic Data Set Initiative – 2021 Requirement

Antimicrobial Use Synthetic Data Set (AU SDS) Validation is required of all vendors prior to submission of January 2021 AU CDA files. This means that beginning in January 2021, all production AU Summary CDA files must contain the SDS Validation ID - provided by the NHSN Team after confirmation of successful validation - and must contain a Vendor (Application) OID. AU Summary CDA files that do not contain this information will be rejected.

It is the vendor's responsibility to obtain the Vendor (Application) OID. Please see the following website for instructions: https://www.cdc.gov/nhsn/cdaportal/au-sds/oid.html. Note that PHINTECH, the issuing authority of the Vendor OID, cannot answer questions about next steps about AU SDS Validation. If vendors still have questions after reviewing the AU SDS material including instructions and FAQs available on the CDA Submission Support Portal at the following link, https://www.cdc.gov/nhsn/cdaportal/au-sds/index.html, then please email nhsncda@cdc.gov.

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Varying Vendor Capabilities for Capturing All Drugs and All Routes

It has come to our attention that vendor systems have varying capabilities for capturing all drugs and all routes.

For AU Synthetic Data Set (AU SDS) Validation, if your system is not capable of reporting blank (or null) values for some of the routes of administration while reporting values for other routes (for example, reporting null for Penicillin V respiratory route while reporting numeric values for the remaining routes), please use this link to validate your AU SDS Summary Excel file: https://nhsnpilot.ng.philab.cdc.gov/AUValidation-Zero/home.html

If your system can report blank (or null) values for some of the routes while reporting numerical values for others, please use this link to validate your AU SDS Summary Excel file: https://nhsnpilot.ng.philab.cdc.gov/AUValidation-Production/home.html

Vendors only need to submit and test against one of these URLs, not both. It depends on your specific situation as described above.

AU SDS FAQ

We encourage vendors to review all the AU SDS FAQs prior to and throughout working through AU SDS Validation as many of the questions that we receive are already answered here. AU SDS FAQs are available at the following link: https://www.cdc.gov/nhsn/cdaportal/au-sds/sds-faq.html

Antimicrobial Resistance Synthetic Data Set

We are still working on creating an Antimicrobial Resistance Synthetic Data Set (AR SDS). We hope to have a beta release at the end of this year and plan to begin piloting in 2021. If you would like to be a pilot participant, please send an email to nhsncda@cdc.gov indicating your interest.

If you have any AU or AR SDS questions, please email nhsncda@cdc.gov.

CDA and CSV Import Metrics Update

Percentage of data per specific event or summary that is imported via CDA and CSV for the following date ranges:						
Query Date Range	Oct. 1, 2017 - Sept. 30, 2018	Jan. 1, 2018 - Dec. 31, 2019	April, 2018 - March, 2019	July, 2018 - June, 2019	October, 2018 - September, 2019	January, 2019 - December, 2019
Blood Stream Infection	46%	47%	44%	43%	43%	44%
Urinary Tract Infection	43%	44%	45%	45%	46%	46%
Surgical Site Infection	38%	40%	42%	43%	44%	45%
Laboratory Identified Event	61%	62%	64%	65%	66%	67%
Dialysis Event	73%	73%	74%	75%	75%	77%
Central Line Insertion Practices (CLIP)	21%	22%	23%	24%	25%	25%
Dialysis Central Line Insertion Practices (CLIP)	0%	0%	0%	0%	0%	0%
Ventilator-Associated Events (VAE)	-	-	0.3%	1.4%	4.0%	8%
Antimicrobial Resistance Event	100%	100%	100%	100%	100%	100%
Antimicrobial Use	100%	100%	100%	100%	100%	100%
Antimicrobial Resistance Summary	100%	100%	100%	100%	100%	100%
ICU /Other Summary	25%	25%	27%	28%	29%	30%
SCA/ONC Summary	29%	30%	33%	34%	36%	37%
NICU Summary	25%	26%	28%	29%	30%	32%
Surgical Procedure - via CDA	32%	33%	34%	36%	39%	42%
MDRO Summary	7%	7%	8%	8%	9%	9%
Dialysis Summary	54%	54%	57%	56%	59%	62%
Hemovigilance Summary	0%	0%	0%	0%	0%	0%
Surgical Procedure - via CSV	58%	57%	57%	55%	52%	50%

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Guide to CDA Versions

- The Guide to CDA versions on the NHSN CDA Submission Support Portal is always available to verify valid CDA imports based on the correct Implementation Guide:
- We've now included guidance for 2021: http://www.cdc.gov/nhsn/cdaportal/toolkits/guidetocdaversions.html

Guide to CDA Versions

For creating CDA files, please see the specific Implementation Guide (IG) and its associated reference materials.

The table below describes the specific Implementation Guide (IG) to be used for each component based on the event/insertion/procedure/specimen collection dates (as applicable) for each year.

Download the corresponding CDA Toolkits for the corresponding year.

Events or Denominators	2021	2020	2019	2018
CDA Toolkit Release	9.5	9.4	9.2 & 9.3	8.9 & 8.8
DIALYSIS				
Dialysis Event	R3-D4	R3-D1.1	R3-D1.1	R3-D1.1
Dialysis Denominator	R3-D3	R3-D3	R3-D1 or R3-D3	R3-D1
EVENTS				
Primary Bloodstream Infection (BSI)	R3-D3	R3-D3	R3-D2	R9
Central Line Insertion Practices Adherence (CLIP) Monitoring	R2-D2.1	R2-D2.1	R2-D2.1	R2-D2.1

As an Important Reminder…

Not all NHSN changes are documented in the IDM so be sure to reference the updated protocols. Other helpful links are the following:

- Archived Newsletters: https://www.cdc.gov/nhsn/newsletters/index.html
- Archived NHSN email communication: https://www.cdc.gov/nhsn/commup/index.html
- CDA vendor webinars & training videos: https://www.cdc.gov/nhsn/cdaportal/webinars.html

Update for CDA Direct Automation

At this time, 6,600 facilities from 17 separate vendors have signed up for DIRECT CDA Automation. If your facility is sending data via CDA and you are interested in learning more about DIRECT CDA Automation, ask your CDA vendor or check out the information on the CSSP site: http://www.cdc.gov/nhsn/cdaportal/importingdata.html#DIRECTProtocol.

NHSN Help Desk Activity Update

Quarter 3, 2020

(Averages)

1,162 Email Inquiries per Week

151 Facilities Enrolled

NHSN Enrollment Update

NHSN Enrollment Update (as of September 22, 2020):

6,892 Hospitals (this includes 456 Long-term Acute Care Hospitals and 383 Free-standing Inpatient Rehabilitation Facilities)

7,679 Outpatient Hemodialysis Facilities

4,670 Ambulatory Surgery Centers (ASCs)

17,640 Long-term Care Facilities

36,881 Total Healthcare Facilities Enrolled

The National Healthcare Safety Network (NHSN) is a voluntary, secure, Internet-based surveillance system that integrates patient and healthcare personnel safety surveillance systems managed by the Division of Healthcare Quality Promotion (DHQP) at CDC.

During 2008, enrollment in NHSN was opened to all types of healthcare facilities in the United States, including acute care hospitals, long-term acute care hospitals, psychiatric hospitals, rehabilitation hospitals, outpatient dialysis centers, ambulatory surgery centers, and long term care facilities.

NHSN
NATIONAL HEALTHCARE SAFETY NETWORK

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