



Advancing Health in America

2020 AHA Annual Survey Information Technology Supplement: Public health and COVID-19 Focus

Please return to:
AHA Annual Survey
Information Technology Supplement
155 N. Wacker Drive
Suite 400
Chicago, IL 60606

HOSPITAL NAME: _____

CITY & STATE: _____

Please Note: This year we have developed questions focused on the use of health IT to support the response to the COVID-19 pandemic. Topics include hospital capacity reporting, issues related to reporting to public health agencies, and experiences sharing COVID-19 data across organizations. This information will provide important data on the performance of health IT systems throughout the response to this public health crisis.

GENERAL INSTRUCTIONS: Please respond to each of the following questions as of the day the survey is completed.

Hospital Capacity Reporting

During the COVID-19 pandemic, U.S. hospitals are required to report data associated with hospital capacity and utilization of medical supplies to assist the government with allocating resources.

1. **To which government entities is your hospital responsible for reporting this data?** *Select all that apply.*
 Note: *This data could include availability and use of hospital beds, personal protective equipment (PPE), ventilators, staffing, and/or other medical supplies/resources.*
- a. City or local public health agencies
 - b. State public health agencies
 - c. Federal entities (such as, the CDC or HHS)
 - d. We were not responsible for reporting data associated with hospital capacity and utilization of resources to government entities
 - e. Do not know

2. **To what extent are hospital capacity and utilization of medical supplies data and reporting requirements similar across Federal, State, or Local agencies?**
- a. Completely Similar b. Somewhat Similar c. Not Very Similar d. Not at all Similar
 - e. Not applicable (We only report to one government entity) f. Don't know

3. **Please indicate whether your hospital experienced any of the issues below when collecting or reporting hospital capacity and utilization of medical supplies data to Federal, State, or Local public health agencies?**
Check all that apply across a row.

Issue	(1) Federal	(2) State	(3) Local/City	(4) None	(5) Do not know
a. Unclear instructions on how to complete and submit relevant data	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
b. Inconsistent or unclear definitions of reported data elements	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
c. Lack of standard submission templates or file formats	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
d. Many data points required for capacity and utilization reporting were not available in the EHR or other IT systems and required significant effort to document/report.	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
e. Required measures do not accurately reflect our hospital capacity and utilization of medical supplies	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Prescribing Controlled Substances

4. **Is your hospital enabled for electronic prescribing of controlled substances (EPCS)?**
- a. Yes b. No c. Don't know d. NA

Patient Engagement

- 5a. **Does your hospital provide outpatient care to patients?**
 Note: *Outpatient care refers to both hospital-based and satellite outpatient departments/sites.*
- 1. Yes (go to 5b) 2. No (skip to 6)

- 5b. **Is there more than one primary EMR/EHR system in use across your outpatient site(s)?**
- 1. Yes 2. No

6. Are patients who receive care provided by your hospital or outpatient sites able to do the following:

(Check "Yes" only if the functionality has been "turned on" and is fully implemented and available to patients. Check both (1) and (2) if the functionality is turned on in both inpatient and outpatient settings)

	(1) Yes, at <u>inpatient</u> sites	(2) Yes, at some or all <u>outpatient</u> sites	(3) No, across <u>no</u> outpatient or inpatient site(s)	(4) Do not know
a. View their health/medical information online in their portal	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
b. Download health/medical information from their medical record from your portal	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
c. Import their medical records from other organizations into your portal	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
d. Electronically transmit (send via email or secure message) health/medical information to a third party from your portal (in any format including scanned or structured documents)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
e. Electronically transmit (send via email or secure message) health/medical information to a third party from your portal (in a structured format such as CCDA)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
f. Request an amendment to change/update their medical record online	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
g. Designate family member or caregiver to access their health/medical information on behalf of the patient (e.g. proxy access)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
h. View their clinical notes (e.g., visit notes including consultation, progress, history and physical) in their portal	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
i. Access their health/medical information using applications (apps) configured to meet the application programming interfaces (API) specifications in your EHR	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
j. Access their health/medical information using applications (apps) configured to meet Fast Healthcare Interoperability Resource (FHIR) specifications	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
k. Submit patient-generated data (e.g., blood glucose, weight)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
l. Send/receive secure message with providers	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
m. Pay bills online	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
n. Request refills for prescriptions online	N/A	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
o. Schedule appointments online	N/A	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Provider Burden related to Reporting and Documentation

7a. Does your hospital receive or have access to measures from your EHR vendor that report the amount of time clinicians spend completing documentation? Such measures typically use EHR audit log data.

1. Yes (go to 7b) 2. No (go to 8) 3. Do not know (go to 8) 4. NA (go to 8)

 **7b. How are these data used?**

1. Vendor product improvement and troubleshooting
2. Identify providers in need of training and support
3. Provider burden reduction initiatives
4. Performance/efficiency monitoring of clinicians
5. Identify areas to improve clinical workflow
6. Other _____

Participation in health information exchange networks

8a. Please indicate your level of participation in a state, regional, and/or local health information exchange (HIE) or health information organization (HIO). Note: This does not refer to a private, enterprise network.

1. HIE/HIO is operational in my area and we are participating and actively exchanging data in at least one HIE/HIO
2. HIE/HIO is operational in my area, but we are not participating
3. HIE/HIO is not operational in my area
4. Do not know

8b. Please indicate which state, regional and/or location HIE/HIO(s) with whom your hospital participates and actively exchanges data as well as the first year that your hospitals actively participated in this HIE/HIO. Note: A list of known active HIEs are included in an attachment and numbered. Please either write the HIE name or its number on that list below.

8b1a. Name/reference number: _____

8b1b. First Year Your Hospital Participated: _____

8b2a. Name/reference number: _____

8b2b. First Year Your Hospital Participated: _____

8b3a. Name/reference number: _____

8b3b. First Year Your Hospital Participated: _____

9. Which of the following national health information exchange networks does your hospital currently actively participate in (i.e., operational exchange)? Check all that apply.

- a. CommonWell Health Alliance
- b. e-Health Exchange
- c. Strategic Health Information Exchange Collaborative (SHIEC)/Patient Centered Data Home (PCDH)
- d. Carequality (network-to-network trust/governance framework)
- e. EHR vendor-based network that enables record location and exchange within the EHR vendor's network of users (e.g., Epic's Care Everywhere)
- f. Other national health information exchange network _____
- g. Do not participate in any national health information exchange networks (either via vendor or directly)
- h. Do not know

10. Does your hospital currently use Direct messaging that is enabled through the DIRECT protocol and the DirectTrust? Note: Your EHR vendor may refer to Direct by a different name/brand as shown in this table below. Health Information Service Providers (HISPs) may enable your hospital to implement and use messaging via the DIRECT protocol.

a. Yes b. No c. Don't Know

EHR Vendor	EHR Branding/Naming for Direct
Allscripts	Direct
athenahealth	Direct, Direct Messaging, Secure Messaging, Direct Secure Messaging
Brightree	Direct Secure Messaging, eReferral
Cerner	Cerner Direct, Secure Messaging, Direct Referrals, Direct Email, Direct Secure Messaging, Direct
CPSI	Direct Message, Direct Messaging, Transition of Care, TOC
eClinicalWorks	eClinicalDirect, P2P, Provider to Provider, Direct, Direct Secure Messaging, Direct Plus
Epic	Direct Messaging, Direct Protocol
Evident (Centriq)	Secure Messaging
Glenwood Systems	Direct Messaging
Greenway	Direct messaging
MatrixCare	DIRECT
MEDITECH	Direct Messaging
NextGen	NextGen Share, Direct Messaging
PointClickCare	Integrated Direct Messaging
Wellsky	Wellsky IaaS, Wellsky IO, Wellsky Direct

Querying information from outside providers or sources

11a. Does your hospital query electronically for patients' health information (e.g. medications, outside encounters) from sources outside of your organization or hospital system? Note: Hospitals that auto-query should respond "Yes"

1. Yes (go to 11b) 2. No, but have the capability (go to 12) 3. No, do not have capability (go to 12) 4. Do not know (go to 12)

11b. How often are the following electronic methods used to search for (e.g., query or auto-query) and view patient health information from sources outside your organization or hospital system? Please indicate how often each method is used across each row below.

Electronic Methods	(1) Often	(2) Sometimes	(3) Rarely	(4) Never	(5) Do not know/NA
1. Provider portals that allow you to view records in another organizations' EHR system	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2. Interface connection between EHR systems (e.g. HL7 interface)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3. Access to other organizations' EHR system using login credentials	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4. Regional, state, or local health information exchange organization (HIE/HIO). NOT local proprietary, enterprise network	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5. EHR vendor-based network that enables record location within the network (e.g. Care Everywhere)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6. EHR connection to national networks that enable record location across EHRs in different networks (e.g. CommonWell, eHealth Exchange, Carequality).	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7. Other electronic _____	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Sending patient health information

12. When a patient transitions to another care setting outside of your organization or hospital system, how often does your hospital use the following methods to SEND a summary of care record? Please indicate how often each method is used across each row below.

Methods without intermediaries	(1) Often	(2) Sometimes	(3) Rarely	(4) Never	(5) Do not know/NA
a. Mail or fax	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
b. eFax using EHR	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
c. Provider portals that allow outside organization to view records in your EHR system	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
d. Interface connection between EHR systems (e.g. HL7 interface)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
e. Login credentials that allow access to your EHR	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
f. Other _____	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Methods with intermediaries	(1) Often	(2) Sometimes	(3) Rarely	(4) Never	(5) Do not know/NA
g. HISPs that enable messaging via DIRECT protocol	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
h. Regional, state, or local health information exchange organization (HIE/HIO). <i>NOT local proprietary, enterprise network</i>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
i. EHR vendor-based network that enables exchange with vendor's other users. (e.g. Epic's Care Everywhere)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
j. National networks that enable exchange across <u>different</u> EHR vendors (e.g. CommonWell, eHealth Exchange, Carequality)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
k. Other _____	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Electronic Notifications

13a. When a patient visits your Emergency Department (ED), do you provide electronic notification to the patient's primary care physician?

1. Yes, routinely 2. Yes, but not routinely (e.g. often missing information to route notification)
 3. No, but have the capability 4. No, don't have the capability 5. Don't know 6. Don't have ED

13b. If yes, are electronic notifications provided to primary care physicians below? Check all that apply

1. Inside the system 2. Outside the System 3. Do not know

17b. Please indicate which of the following barriers reduce usage. (Please check *all* that apply)

1. Information not always available when needed (e.g. not timely)
2. Information is not trusted
3. Information available but not within EHR
4. Information available within EHR but not part of clinicians' workflow
5. Information not presented in a useful format (e.g. too much information, redundant, or unnecessary information)
6. Information that is specific and relevant is hard to find
7. External data uses different standards (e.g., vocabulary and/or semantic representation differs) making it difficult to use
8. Other _____

Information Exchange Related to COVID-19

18. To what extent do you agree with this statement: my hospital electronically received information from outside providers needed to effectively treat COVID-19?

- a. Strongly Agree b. Agree c. Neither Agree nor disagree d. Disagree
 e. Strongly disagree f. Don't know

19. How frequently is each type of clinical information that is necessary for treating patients with COVID-19 electronically available (not e-Fax) from outside providers or other sources at the point of care?

Information Type	(1) Always	(2) Often	(3) Sometimes	(4) Rarely	(5) Never	(6) Don't Know
a. Diagnoses	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
b. Problem Lists	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
c. Lab results	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
d. Clinical Notes	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
e. Medications	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
f. Images	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
g. Immunization Details	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

20. When patients who were admitted to your hospital had been tested for COVID-19 outside of your health system, to what extent did you receive results in an electronic, structured format (e.g. HL7 containing LOINC and SNOMED codes) from each type of entity outside of your healthcare system?

Entity	(1) Always	(2) Often	(3) Sometimes	(4) Rarely	(5) Never	(6) Don't Know	(7) NA/Do Not Receive from this entity
a. Large Commercial Labs	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
b. Small/independent/regional Labs	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
c. Public Health Labs	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
d. Other Hospitals	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
e. Point of care testing by traditional ambulatory providers	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
f. Point of care testing by emerging providers (e.g. pharmacies performing testing, 'pop up' testing)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Public Health Reporting

21a. What is your hospital's current stage of active engagement towards electronically submitting data for public health reporting related to the activities listed below. For each row, please select the response that represents the most progress towards submission of production data.

	(1) Actively electronically submitting production data	(2) In the process of testing and validating electronic submission of data	(3) Completed registration to submit Data	(4) Have not completed registration	(5) Don't Know
1. Syndromic surveillance reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2. Immunization registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3. Electronic case reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4. Public health registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5. Clinical data registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6. Electronic reportable laboratory result reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

21b. How does your hospital electronically submit data for public health reporting related to the activities listed below. Note: this is referring to data generated through clinical processes involving patient care (production data NOT test data). Select one option most frequently used in each row.

	(1) Electronic health record	(2) Health information exchange	(3) Other electronic method (besides EHR and HIE)	(4) Not Electronically submitting data	(5) Don't Know
1. Syndromic surveillance reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2. Immunization registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3. Electronic case reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4. Public health registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5. Clinical data registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6. Electronic reportable laboratory result reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7. Hospital capacity and utilization of medical supplies	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

21c. For each activity, how often is the data successfully submitted/sent to the public health entity in timely manner and electronic, structured format? *Successfully implies sending messages with few-to no errors in a form the public health agency can use, and when errors do occur they are resolved in a timely manner, transmitted within required timeframe.*

	(1) Always	(2) Often	(3) Sometimes	(4) Rarely	(5) Never	(6) Not applicable (do not report)	(7) Don't Know
1. Syndromic surveillance reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2. Immunization registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3. Electronic case reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4. Public health registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5. Clinical data registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6. Electronic reportable laboratory result reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7. Hospital capacity and utilization of medical supplies	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

21d. For each type of public health reporting, please indicate whether your hospital uses automated (e.g. EHR generated data sent electronically/automatically to the public health agency), manual (e.g. chart abstraction with data faxed or re-input into a portal), or a mix of both types of processes (e.g. files electronically generated from the EHR but manual steps required to transmit to public health agency) to transmit the data.

	(1) Fully or primarily automated	(2) Mix of automated and manual process	(3) Fully or primarily manual	(4) Don't know/NA
1. Syndromic surveillance reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2. Immunization registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3. Electronic case reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4. Public health registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5. Clinical Data registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6. Electronic reportable laboratory result reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7. Hospital capacity and utilization of medical supplies	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Skip question 21e if your hospital does not submit data via a health information exchange.

21e. If you use an HIE to submit data for public health reporting activities, does the HIE perform value added services during submission (e.g. reformat message, add additional data to message, etc.)?

	(1) Value Added Services (e.g. adding information from another source)	(2) Simple Modifications (e.g. code translation)	(3) Pass Through/transmit only	(4) Don't Know	(5) Not applicable (do not report)
1. Syndromic surveillance reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2. Immunization registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3. Electronic case reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4. Public health registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5. Clinical Data registry reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6. Electronic reportable laboratory result reporting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7. Hospital capacity and utilization of medical supplies	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

22. To what extent do you agree with this statement: We have been successfully submitting vaccine related adverse events to relevant State and Federal agencies (e.g. CDC Vaccine Adverse Event Reporting System)?
- a. Strongly Agree b. Agree c. Neither Agree nor disagree d. Disagree
e. Strongly disagree f. Don't know

23. Does your HIE charge your hospital additionally to submit data for public health reporting activities?
- a. Yes b. No c. Don't know

24. Does your EHR developer charge your hospital additionally to submit data for public health reporting activities?
- a. Yes b. No c. Don't know

Barriers to exchange and interoperability

Which of the following issues has your hospital experienced when trying to **electronically** (not eFax) send, receive or find (query) patient health information to/from other organizations or hospital systems? (Please check **all** that apply)

25a. Barriers related to electronically sending patient health information

1. Providers we would like to electronically send patient health information to do not have an EHR or other electronic system with capability to receive the information
2. Providers we would like to electronically send patient health information to have an EHR; however, it lacks the technical capability to receive the information
3. Difficult to locate the address of the provider to send the information (e.g. lack of provider directory)
4. Many recipients of our electronic care summaries (e.g. CCDA) report that the information is not useful
5. Cumbersome workflow to send (not eFax) the information from our EHR system
6. It is difficult to locate the Direct address of the provider to send the information
7. We frequently receive error messages when attempting to send Direct messages to recipients.

25b. Barriers related to electronically receiving patient health information

1. Difficult to match or identify the correct patient between systems
2. There are providers whom we share patients with that don't typically exchange patient data with us
3. There are providers whom we electronically share patient information with that don't typically share patient information with us
4. There are providers who share data with us but do not provide that data in the format that we request
5. There are providers who state that they cannot exchange information with us due to privacy laws (e.g. HIPAA) in situations where that does not seem appropriate

25c. Other barriers related to exchanging patient health information

1. Experience greater challenges exchanging (e.g. sending/receiving) data across different vendor platforms
2. We have to pay additional costs to send/receive data with outside organizations/hospital systems
3. We had to develop customized interfaces in order to exchange (e.g. send/receive) data with outside organizations/hospital systems
4. Contractual constraints between healthcare providers and health vendors limit our ability to exchange data with providers using certain systems.

25d. In what form(s) have you observed or experienced information blocking by Enterprise EHR vendor(s)?

	(1) Often/ Routinely	(2) Sometimes	(3) Never/ Rarely	(4) Don't Know
1.Price Examples: <ul style="list-style-type: none"> Using high fees to avoid granting third-parties access to data stored in the vendor's EHR system Charging unreasonable fees to export data at a provider's request (such as when switching vendors) 	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2.Contract language Examples: <ul style="list-style-type: none"> Using contract terms, warranty terms, or intellectual property rights to discourage exchange or connectivity with third-party Changing material contract terms related to health information exchange after customer has licensed and installed the vendor's technology 	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3.Artificial technical, process, or resource barriers Example: <ul style="list-style-type: none"> Using artificial technical barriers to avoid granting third-parties access to data stored in the vendor's EHR system 	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4.Refusal Examples: <ul style="list-style-type: none"> Refusing to exchange information or establish connectivity with certain vendors or HIOs Refusing to export data at a provider's request (such as when switching vendors) 	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5.Other (please list):	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

25e. In what form(s) have you observed or experienced information blocking by healthcare providers?

	(1) Often/ Routinely	(2) Sometimes	(3) Never/ Rarely	(4) Don't Know
1.Artificial technical, process, or resource barriers Examples: <ul style="list-style-type: none"> Requiring a written authorization when neither state nor federal law requires it Requiring a patient to repeatedly opt in to exchange for treatment payment and operations (TPO) 	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2.Refusal Examples: <ul style="list-style-type: none"> Refusing to exchange information with competing providers, hospitals, or health systems 	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3.Strategic affiliations Examples: <ul style="list-style-type: none"> Promoting alternative, proprietary approaches to information exchange Exchanging only within referral network or with preferred referral partners 	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4.Other (please list):	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

25f. To what extent have you observed the following stakeholders engaging in information blocking behaviors?

	(1) Often/ Routinely	(2) Sometimes	(3) Never/ Rarely	(4) Don't Know
1.Certified Health IT Developers (e.g. Enterprise EHR vendors)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2.Healthcare Providers	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3.National Networks (e.g. CommonWell, eHealth Exchange)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4.State, regional, and/or local health information exchange	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5.Other (please list):	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

EHR System and IT Vendors

26a. Does your hospital use an EHR system that has been certified? *Certified refers to meeting federal requirements per the Office of the National Coordinator for Health Information Technology (ONC). Certified EHRs are necessary to meet the objectives of Meaningful Use; however, certified EHRs can be used by all hospitals regardless of whether they participate in that program. If unsure, see if your system meets the requirements here: <https://chpl.healthit.gov/#/search>*

1. Yes 2. No 3. Don't know

26b. If yes, has your hospital switched to a 2015 certified EHR system? *This refers to fully implementing the 2015 certified EHR system.*

1. Yes 2. No 3. Don't know

27. Which vendor below provides your primary inpatient EMR/EHR system? (Please check only one) *“Primary” is defined as the system that is used for the largest number of patients or the system in which you have made the single largest investment. Please answer based on vendor name rather than product.*

- a. Allscripts g. Harris Healthcare/QuadraMed l. Other (please specify):

- b. Athenahealth h. McKesson m. Would prefer not to disclose EHR vendor
- c. Azalea Health/ Prognosis i. MEDHOST
- d. Cerner j. Meditech
- e. CPSI/Evident k. Self-developed
- f. Epic

28. Overall, how satisfied or dissatisfied are you with your primary inpatient EMR/EHR system?

- a. Very satisfied d. Very dissatisfied
- b. Somewhat satisfied e. Neither satisfied nor dissatisfied
- c. Somewhat dissatisfied

29. What changes, if any, are you planning for your primary inpatient EMR/EHR system within the next 18 months? *(Please check all that apply)*

- a. Initial deployment
- b. Vendor switch
- c. Change from enterprise architecture to best-of-breed
- d. Change from best-of-breed to enterprise architecture
- e. Optimizing functionality of new releases
- f. Significant additional functionalities
- g. Do not know
- h. No major changes planned

30a. Does your primary inpatient EHR system have the capability to export multiple records from its system? *Sometimes referred to as “bulk” export, this functionality enables analytics and reporting, population management, or switching EHR systems.*

1. Yes 2. No (skip to 31a) 3. Don't know (skip to 31a)

30b. If you answered YES to 30a: Have you used this capability to support any of the following uses?

- 1. Analytics and reporting
- 2. Population health management
- 3. Switching EHR systems.
- 4. Have not used the capability yet

31a. Do you use the same primary inpatient EMR/EHR system vendor (noted above) for your primary outpatient EMR/EHR system? "Primary" is defined as the system that is used for the largest number of patients or the system in which you have made the single largest investment. Please answer based on vendor name rather than product.

- 1. Yes, share single instance (skip to 32)
- 2. Yes, but do not share the single instance/version (proceed to 31b)
- 3. No (proceed to 31b)
- 4. Do not know (skip to 32)
- 5. NA (skip to 32)

31b. Is information needed to inform treatment of patients with COVID-19 electronically exchanged or made electronically available between your primary inpatient and outpatient EHR systems so that data is easily available to clinicians across care settings?

- 1. Yes
- 2. No
- 3. Don't know

32. Thank you for your cooperation in completing this survey. If you are not the CIO, or person responsible for information technology, has he or she reviewed your answers to this survey?

- 1. Yes
- 2. No

Respondent Name (please print) Circle CIO or Print Title if other (Area Code) Telephone #

_____/_____/_____
Date of Completion Name of CIO (if other than respondent) Email Address

**NOTE: PLEASE PHOTOCOPY THIS INFORMATION FOR YOUR HOSPITAL FILE BEFORE RETURNING THE ORIGINAL FORM TO THE AMERICAN HOSPITAL ASSOCIATION.
THANK YOU.**