

Stage 2 Meaningful Use Objectives Which Include Laboratory Data

Table excerpted from “2014 Edition EHR Certification Criteria and Meaningful Use Objectives” document on the Office of the National Coordinator’s website, retrieved 8-19-13: http://www.healthit.gov/sites/default/files/meaningfulusetablesseries2_110112.pdf

Core Objective	MEANINGFUL USE Stage 2 Objective 42 CFR 495.6(j)-(m)	MEANINGFUL USE Stage 2 Measure 42 CFR 495.6(j)-(m)	EHR CERTIFICATION CRITERIA 2014 Edition 45 CFR 170.314	Standards
Eligible Providers Eligible Hospitals	Use CPOE for medication, laboratory and radiology orders directly entered by any licensed healthcare professional who can enter orders into the medical record per State, local and professional guidelines.	More than 60% of medication, 30% of laboratory, and 30% of radiology orders created by the EP or authorized providers of the EH’s or CAH’s inpatient or emergency department (POS 21 or 23) during the EHR reporting period are recorded using CPOE. *Exclusions apply: see CMS rule for details.	§170.314(a)(1) Computerized provider order entry. Enable a user to electronically record, change, and access the following order types, at a minimum: (i) Medications; (ii) Laboratory; and (iii) Radiology/imaging.	
Eligible Providers Eligible Hospitals	Incorporate clinical lab-test results into CEHRT as structured data.	More than 55% of all clinical lab tests results ordered by the EP or by authorized providers of the EH or CAH for patients admitted to its inpatient or emergency department (POS 21 or 23) during the EHR reporting period whose results are either in a positive/negative affirmation or numerical format are incorporated in CEHRT as structured data. *Exclusions apply: see CMS rule for details	§170.314(b)(5) Incorporate laboratory tests and values/results. (i) Receive results. (A) Ambulatory setting only. (1) Electronically receive and incorporate clinical laboratory tests and values/results in accordance with the standard specified in § 170.205(j) and, at a minimum, the version of the standard specified in § 170.207(c)(2). (2) Electronically display the tests and values/results received in human readable format. (B) Inpatient setting only. (i) Electronically receive clinical laboratory tests and values/results in a structured format and electronically display such tests and values/results in human readable format. (ii) Electronically display all the information for a test report specified at 42 CFR 493.1291(c)(1) through (7). (iii) Electronically attribute, associate, or link a laboratory test and value/result with a laboratory order or patient record.	§ 170.205(j) – HL7 Version 2.5.1. Implementation Guide: S&I Framework Lab Results Interface. § § 170.207(c)(2) – LOINC® version 2.40, June 2012, a universal code system for identifying laboratory and clinical observations produced by the Regenstrief Institute, Inc.

Eligible Hospitals	Capability to submit electronic reportable laboratory results to public health agencies, except where prohibited, and in accordance with applicable law and practice.	Successful ongoing submission of electronic reportable laboratory results from CEHRT to a public health agency for the entire EHR reporting period. *Exclusions apply: see CMS rule for details	§170.314(f)(4) Inpatient setting only—transmission of reportable laboratory tests and values/results. EHR technology must be able to electronically create reportable laboratory tests and values/results for electronic transmission in accordance with: (i) The standard (and applicable implementation specifications) specified in § 170.205(g); and (ii) At a minimum, the versions of the standards specified in § 170.207(a)(3) and (c)(2).	§ 170.205(g) – HL7 2.5.1. <i>Implementation specifications:</i> HL7 Version 2.5.1 Implementation Guide: Electronic Laboratory Reporting to Public Health, Release 1 (US Realm) with Errata and Clarifications, and ELR 2.5.1 Clarification Document for EHR Technology Certification. § § 170.207(a)(3) – IHTSDO SNOMED CT® International Release, July 2012 and US Extension to SNOMED CT,® March 2012 Release. § § 170.207(c)(2) – LOINC® version 2.40, June 2012, a universal code system for identifying laboratory and clinical observations produced by the Regenstrief Institute, Inc.
Eligible Hospitals (Menu)	Provide structured electronic lab results to ambulatory providers.	Hospital labs send structured electronic clinical lab results to the ordering provider for more than 20% of electronic lab orders received.	§170.314(b)(6) Inpatient setting only – transmission of electronic laboratory tests and values/results to ambulatory providers. EHR technology must be able to electronically create laboratory test reports for electronic transmission in accordance with the standard specified in § 170.205(j) and with laboratory tests expressed in accordance with, at a minimum, the version of the standard specified in § 170.207(c)(2)	§ 170.205(j) – HL7 Version 2.5.1. Implementation Guide: S&I Framework Lab Results Interface. § § 170.207(c)(2) – LOINC® version 2.40, June 2012, a universal code system for identifying laboratory and clinical observations produced by the Regenstrief Institute, Inc.

Stage 2 EHR Certification Criteria Which Include Laboratory Data

Table excerpted from “2014 Edition EHR Certification Criteria and Meaningful Use Objectives” document on the Office of the National Coordinator’s website, retrieved 8-19-13: http://www.healthit.gov/sites/default/files/meaningfulusetablesseries2_110112.pdf

Core Objective	MEANINGFUL USE Stage 2 Objective 42 CFR 495.6(j)-(m)	MEANINGFUL USE Stage 2 Measure 42 CFR 495.6(j)-(m)	EHR CERTIFICATION CRITERIA 2014 Edition 45 CFR 170.314	Standards
Eligible Providers Eligible Hospitals	Use clinical decision support to improve performance on high-priority health conditions.	<p>1. Implement five clinical decision support interventions related to four or more clinical quality measures at a relevant point in patient care for the entire EHR reporting period. Absent four clinical quality measures related to an EP’s, EH’s, or CAH’s scope of practice or patient population, the clinical decision support interventions must be related to high-priority health conditions. Absent four clinical quality measures related to [an EP’s scope of practice or patient population/an eligible hospital or CAH’s patient population], the clinical decision support interventions must be related to high-priority health conditions.</p> <p>2. The EP, EH, or CAH has enabled and implemented the functionality for drug-drug and drug-allergy interaction checks for the entire EHR reporting period.</p> <p>*Exclusions apply: see CMS rule for details</p>	<p>§170.314(a)(8) / §170.314(a)(2) Clinical decision support.</p> <p>(i) Evidence-based decision support interventions. Enable a limited set of identified users to select (i.e., activate) one or more electronic clinical decision support interventions (in addition to drug-drug and drug-allergy contraindication checking) based on each one and at least one combination of the following data: (A) Problem list; (B) Medication list; (C) Medication allergy list; (D) Demographics; (E) Laboratory tests and values/results; and (F) Vital signs.</p> <p>(ii) Linked referential clinical decision support. (A) EHR technology must be able to: (1) Electronically identify for a user diagnostic and therapeutic reference information; or (2) Electronically identify for a user diagnostic and therapeutic reference information in accordance with the standard specified at § 170.204(b) and the implementation specifications at § 170.204(b)(1) or (2).</p> <p>(B) For paragraph (a)(8)(ii)(A) of this section, EHR technology must be able to electronically identify for a user diagnostic or therapeutic reference information based on each one and at least one combination of the data referenced in paragraphs (a)(8)(i)(A) through (F) of this section.</p> <p>(iii) Clinical decision support configuration. (A) Enable interventions and reference resources specified in paragraphs (a)(8)(i) and (ii) of this section to be configured by a limited set of identified users (e.g., system administrator) based on a user’s role. (B) EHR technology must enable interventions to be electronically triggered: (1) Based on the data referenced in paragraphs (a)(8)(i)(A) through (F) of this section. (2) When a patient’s medications, medication allergies, and problems are incorporated from a transition of care/referral summary received pursuant to paragraph (b)(1)(iii) of this section. (3) Ambulatory setting only. When a patient’s laboratory tests and values/results are incorporated pursuant to paragraph</p>	<p>§ 170.204(b) – HL7 V3 Standard: Context-Aware Retrieval Application (Infobutton). <i>Implementation specifications:</i> § 170.204(b)(1) – HL7 V3 IG: URL-Based Implementations of Context-Aware Information Retrieval (Infobutton) Domain; or § 170.204(b)(2) – HL7 V3 IG: Context-Aware Knowledge Retrieval (Infobutton) Service-Oriented Architecture Implementation Guide.</p>

			<p>(b)(5)(i)(A)(1) of this section.</p> <p>(v) Source attributes. Enable a user to review the attributes as indicated for all clinical decision support resources: (A) For evidence-based decision support interventions under paragraph (a)(8)(i) of this section: (1) Bibliographic citation of the intervention (clinical research/guideline); (2) Developer of the intervention (translation from clinical research/guideline); (3) Funding source of the intervention development technical implementation; and (4) Release and, if applicable, revision date(s) of the intervention or reference source. (B) For linked referential clinical decision support in paragraph (a)(8)(ii) of this section and drug-drug, drug-allergy interaction checks in paragraph(a)(2) of this section, the developer of the intervention, and where clinically indicated, the bibliographic citation of the intervention (clinical research/guideline).</p> <p>(iv) Automatically and electronically interact. Interventions triggered in accordance with paragraphs (a)(8)(i)-(iii) of this section must automatically and electronically occur when a user is interacting with EHR technology.</p> <p>Drug-drug, drug-allergy interaction checks.</p> <p>1. Interventions. Before a medication order is completed and acted upon during computerized provider order entry (CPOE), interventions must automatically and electronically indicate to a user drug-drug and drug-allergy contraindications based on a patient's medication list and medication allergy list.</p> <p>2. Adjustments.</p> <p>(A) Enable the severity level of interventions provided for drug-drug interaction checks to be adjusted.</p> <p>(B) Limit the ability to adjust severity levels to an identified set of users or available as a system administrative function.</p>	
Eligible Providers Eligible Hospitals	Generate lists of patients by specific conditions to use for quality improvement, reduction of disparities, research, or outreach.	Generate at least one report listing patients of the EP, EH, or CAH with a specific condition.	<p>Patient list creation. Enable a user to electronically and dynamically select, sort, access, and create patient lists by: date and time; and based on each one and at least one combination of the following data:</p> <p>(i) Problems;</p> <p>(ii) Medications;</p> <p>(iii) Medication allergies;</p> <p>(iv) Demographics;</p> <p>(v) Laboratory tests and values/results; and</p> <p>(vi) Ambulatory setting only. Patient communication preferences.</p>	§ 170.205(j) – HL7 Version 2.5.1. Implementation Guide: S&I Framework Lab Results Interface. § § 170.207(c)(2) – LOINC® version 2.40, June 2012, a universal code system for identifying laboratory and clinical observations produced by the Regenstrief Institute, Inc.

Eligible Providers	Use clinically relevant information to identify patients who should receive reminders for preventive/follow-up care and send these patients the reminder, per patient preference.	More than 10% of all unique patients who have had two or more office visits with the EP within the 24 months before the beginning of the EHR reporting period were sent a reminder, per patient preference when available. *Exclusions apply: see CMS rule for details	Patient list creation. Enable a user to electronically and dynamically select, sort, access, and create patient lists by: date and time; and based on each one and at least one combination of the following data: (i) Problems; (ii) Medications; (iii) Medication allergies; (iv) Demographics; (v) Laboratory tests and values/results; and (vi) Ambulatory setting only. Patient communication preferences.	§ 170.205(g) – HL7 2.5.1. <i>Implementation specifications:</i> HL7 Version 2.5.1 Implementation Guide: Electronic Laboratory Reporting to Public Health, Release 1 (US Realm) with Errata and Clarifications, and ELR 2.5.1 Clarification Document for EHR Technology Certification. § § 170.207(a)(3) – IHTSDO SNOMED CT® International Release, July 2012 and US Extension to SNOMED CT,® March 2012 Release. § § 170.207(c)(2) – LOINC® version 2.40, June 2012, a universal code system for identifying laboratory and clinical observations produced by the Regenstrief Institute, Inc.
Eligible Providers Eligible Hospitals	Use clinically relevant information from CEHRT to identify patient-specific education resources and provide those resources to the patient.	EP: Patient-specific education resources identified by CEHRT are provided to patients for more than 10% of all unique patients with office visits seen by the EP during the EHR reporting period. *Exclusions apply: see CMS rule for details EHs/CAHs: More than 10% of all unique patients admitted to the EH's or CAH's inpatient or emergency departments (POS 21 or 23) are provided patient-specific education resources identified by CEHRT.	§170.314(a)(15) Patient-specific education resources. EHR technology must be able to electronically identify for a user patient-specific education resources based on data included in the patient's problem list, medication list, and laboratory tests and values/results: (i) In accordance with the standard specified at § 170.204(b) and the implementation specifications at § 170.204(b)(1) or (2); and (ii) By any means other than the method specified in paragraph (a)(15)(i).	§ § 170.204(b) – HL7 V3 Standard: Context-Aware Retrieval Application (Infobutton). <i>Implementation specifications:</i> § 170.204(b)(1) – HL7 V3 <i>Implementation Guide: URL-Based Implementations of Context-Aware Information Retrieval (Infobutton) Domain</i> ; or § 170.204(b)(2) – HL7 V3 <i>Implementation Guide: Context-Aware Knowledge Retrieval (Infobutton) Service-Oriented Architecture Implementation Guide.</i>