

# Cypress™

## Cypress Tech Talk

May 2, 2023



**MITRE**

The Office of the National Coordinator for  
Health Information Technology



# Agenda

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- Software Updates
  - Cypress 7.0.5
  - Cypress 7.1.0
- Recent Issue
  - Warnings for unknown intervals
  - Cypress Known Issues Dashboard
- Cypress Versions
- Open Discussion
- Contact Information

\*See the Glossary at the back for definitions of terms

# Software Updates

## Cypress 7 (2023 Annual Update)

- **Cypress 7.0.5**
  - Released on March 23<sup>rd</sup> 2023.
- **Include the following feature improvements:**
  - Supports the 3/23/23 update to the 2023 CMS QRDA I Implementation Guide (v1.2) for Hospital Quality Reporting.
    - Round trip validation of test patient phone number and email address.

```
<recordTarget>
  <patientRole>
    <!-- Patient Identifier Number. The root OID could be provider's
      organization OID or other value -->
    <id root="2.16.840.1.113883.123.123.1" extension="022354"/>
    <addr use="HP">
      <streetAddressLine>101 North Pole Lane</streetAddressLine>
      <city>Ames</city>
      <state>IA</state>
      <postalCode>50014</postalCode>
      <country>US</country>
    </addr>
    <telecom use="HP" value="tel:+1(781)271-3000"/>
    <telecom use="HP" value="mailto:me@email.com"/>
  </patient>
  <name>
    <given>Jane</given>
    <family>Doe</family>
  </name>
```

# Verifying Email and Phone Numbers

- In Cypress 7.0.5 all Cypress test patients will be updated to include an Email address and Phone number
- Missing Email addresses and Phone numbers will result in errors for “C1” tests

## Cypress Certification Patient Test Record: Jon Schultz

<b>Patient</b>	Jon Schultz	<b>Sex</b>	M - Male
<b>Date of birth</b>	1956-05-13T14:00:00+00:00	<b>Date of expiration</b>	None
<b>Race</b>	2054-5 - Black or African American	<b>Ethnicity</b>	2186-5 - Not Hispanic or Latino
<b>Insurance Providers</b>	2 - Medicaid	<b>Patient IDs</b>	64060814f9a01051b78f246b Cypress
<b>Address</b>	101 McClure Squares Junction Adamsstad, WA 99016 US	<b>Telecom</b>	(HP) (573)847-6763 (HP) jschultz5084@example.com

## Errors and Warnings

✖ 1\_Jon\_Schultz.xml

1

1\_Jon\_Schultz.xml - 1 errors and warnings

[View Uploaded XML with Errors](#)

Errors (1)

Warnings (0)

Error message

[Go To in XML](#)

Email jschultz5084@example.com could not be found in file.

# *Software Updates*

## **Cypress 7.1 (2024 Annual Update)**

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### ■ **Cypress 7.1.0**

- For the 2024 Reporting and Performance Period
- Release will be 2023, 2024 compatible
- 2023 bundle (for the 2024 reporting period) can be loaded alongside the the 2022 bundle (for the 2023 reporting period)

### ■ **Release Schedule**

- Release scheduled to be available in all release formats June 22, 2023
  - Note: Due significant upgrades to the underlying database and operating system (MongoDB 6 and Ubuntu-22) There will not be an upgrade path from Cypress v7 to Cypress v7.1

## Recent Issue

# Warnings for unknown intervals

- Cypress v6 introduced warnings to call attention to areas in QRDA files where the content is technically valid but may result in unexpected behavior when imported by another system.



- This scenario, can be problematic when comparing intervals

```

or exists ( ["Intervention, Performed": "Hospice Care Ambulatory"] HospicePerformed
  where Global."NormalizeInterval" ( HospicePerformed.relevantDatetime, HospicePerformed.relevantPeriod ) overlaps "Measurement Period"
)
  
```

- For closed interval boundaries, if the interval boundary is **null**, the result of the boundary comparison is considered **true**.

<https://cql.hl7.org/09-b-cqlreference.html#contains>

## Recent Issue

# Cypress Known Issues Dashboard

- <https://oncprojecttracking.healthit.gov/support/secure/Dashboard.jspa?selectPageId=18000>
- The dashboard collects all labeled known issues in one place, sorted by Cypress version
- Easily navigate to the dashboard from the Cypress summary page

Filter Results: Cypress Known Bugs 7.0.2			
Summary	2023 Performance Period EC eCQMs	2023 Reporting Period EH/CAH eCQMs	Solution
CQM129v11 - PSA score of 0 not qualifying for denominator			
"undefined method `collect' for nil:NilClass" Error when creating CVU+ product for CMS69v10	CMS69v11		see possible workaround below
Error of CMS_0084 encountered while testing Hybrid Measure	The error "CMS_0084 - QRDA files for hybrid measure/CCDE submissions must contain a HICN or MBI" should be treated as a Warning and not an Error.		
1-3 of 3			

# Cypress Versions

Version	Dates	Release Note
<b>V6.3.0</b>	<b>May 5, 2022</b>	Full support for the 2022 reporting/performance period
<b>V7.0.2</b>	<b>August 4, 2022</b>	Support for the 2023 CMS Implementation Guides for QRDA Category III
<b>V7.0.3</b>	<b>October 20, 2022</b>	Bug Fixes
<b>V7.0.4</b>	<b>January 19, 2023</b>	Updated 2023 CMS Implementation Guide for QRDA III and QRDA I R5.3 errata
<b>V7.0.5</b>	<b>March 23, 2023</b>	Updated 2023 CMS Implementation Guide for QRDA I

Bundle Version	Dates	Features
<b>2021.0.2</b>	<b>June 24, 2021</b>	Measures and patients released in 2021 for the 2022 reporting year.
<b>2022.1.0</b>	<b>July 11, 2022</b>	Measures and patients released in 2022 for the 2023 reporting year. Required bundle for import into v7.0.1 and later
<b>2022.1.1</b>	<b>October 20, 2022</b>	Removed cross-walking codes impacting CMS334



# OPEN DISCUSSION

# Next Cypress Tech Talk

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- Tuesday, May 30, 2023 at 1pm ET
- To join online, visit: <https://mitre.zoomgov.com/j/1605680758>
- To join via phone, dial: 1-551-285-1373
- Meeting Number: 160 568 0758
- Meeting link, as well as a calendar event file, available at:
  - <https://www.healthit.gov/cypress/techtalks.html>

# Notes

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- **Completed Webinars will be posted on the Cypress website on the Tech Talks tab**
  - <https://www.healthit.gov/cypress/techtalks.html>
- **Send questions and feedback to the Cypress Talk List at**
  - [project-cypress-talk@googlegroups.com](mailto:project-cypress-talk@googlegroups.com)
- **Report bugs and issues to the Cypress JIRA at**
  - <https://oncprojecttracking.healthit.gov/support/browse/CYPRESS>

# Glossary

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- **API – Application Programming Interface**
- **CCDE – Core Clinical Data Elements**
- **CQL – Clinical Quality Language**
- **CVU – Cypress Validation Utility**
- **CVU+ – Cypress Validation Utility Plus Calculation Check**
- **EC – Eligible Clinician**
- **eCQM – Electronic Clinical Quality Measure**
- **EH – Eligible Hospital**
- **EP – Eligible Professional**
- **HL7 – Health Level Seven International**
- **IG – Implementation Guide**
- **QPP – Quality Payment Program**
- **QRDA – Quality Reporting Document Architecture**
- **UMLS – Unified Medical Language System**