



InterQual®

Completing Automated Reviews

InterQual® AutoReview is a cloud-based Robotic Process Automation solution that automatically and accurately creates and populates an InterQual medical review for admission (Episode Day 1) using real-time data from the electronic health record (EHR). The current release supports subsets from Level of Care Acute Adult and Pediatric Criteria. Automated medical reviews, along with the associated clinical data, are delivered to the InterQual® Connect Medical Review Service where they can be accessed by a reviewer.

Automated reviews have one of the following criteria statuses:

- **Criteria Met** (for example, Acute Met) — indicates that the EHR data were sufficient to satisfy the criteria. You can review and then complete the review to save it to your organization's system.
- **Partial** — indicates that EHR data are available, but a reviewer must determine whether the data can be used to satisfy the criteria. You can edit and complete the review to finish the workflow.

You can perform the following tasks for automated reviews:

- [Complete an Automated Review that Met Criteria](#)
- [Complete an Automated Review that Partially Met Criteria](#)
 - [Open an automated review](#)
 - [Select criteria or clear selections](#)
 - [View the Review Summary](#)
 - [Complete or save a review](#)
- [Edit and Complete an Automated Review that Met Criteria](#)

Complete an Automated Review that Met Criteria

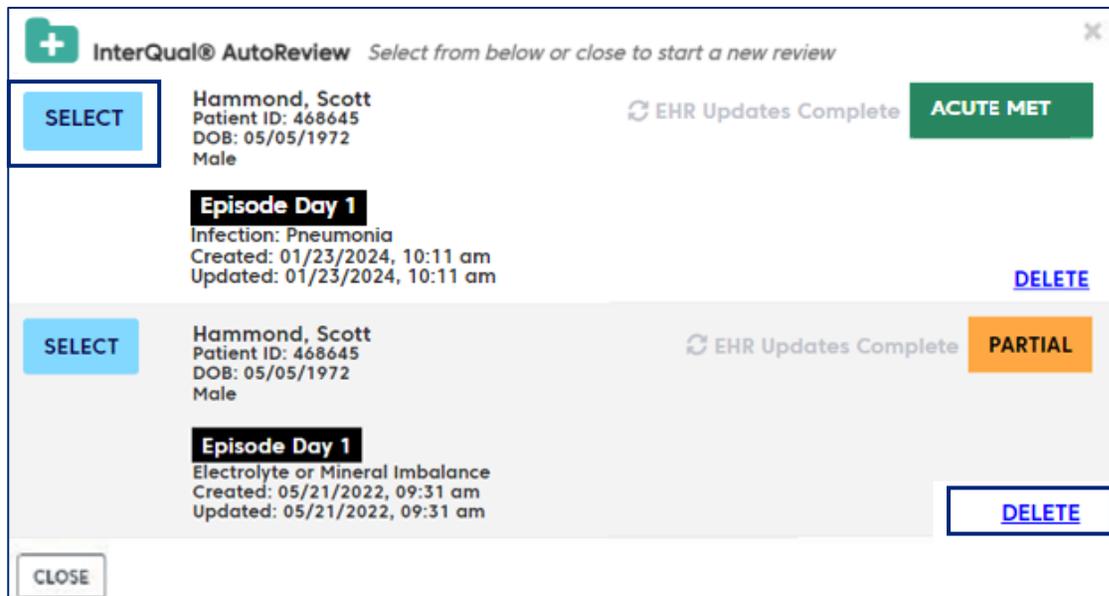
1. Find an automated review.

You find and select automated reviews either from your system's case worklist or from the InterQual® AutoReview dialog box that displays whenever you start a new review. If a patient is admitted with more than one diagnosis, multiple reviews might be created. If multiple reviews are found, you can identify the review that is most appropriate for your patient and then delete the others.

- a. Click DELETE for a review you want to remove.
- b. Click OK in the warning message to confirm you want to delete the review.

Note: If you close the InterQual® AutoReview dialog box or delete all the automated reviews, the Select Subset screen appears so you can begin a manual review.

2. Click **Select** to open a review.



The Medical Review screen appears.

3. If the levels of care appear collapsed, expand the level of care you want to focus on.

The criteria appear as follows:

- Criteria points with an EHR plus-sign icon  indicate that EHR data are available and are being evaluated to determine whether they satisfy the criteria.

- Criteria points with an EHR ellipsis icon  indicate that imaging narratives and other text based EHR data are available, and that Natural Language Processing (NLP) is used to determine whether they satisfy the criteria.
- Criteria points or rules in solid teal indicate that the EHR data satisfy the criteria.
- Criteria points or rules outlined in teal indicate that EHR data are available but require a reviewer to determine whether the data can be used to satisfy the criteria.

Medical Review *Infection: Pneumonia* **CHANGE SUBSET** **CLINICAL REFERENCE**

EPISODE DAY 1 **CLEAR** **EXPAND ALL** **COLLAPSE ALL** **COMMENTS** **BENCHMARKS**

OBSERVATION, One:

ACUTE, One:

Pneumonia confirmed by imaging and, Both:

Finding, ≥ One:

O₂ sat < 89%(0.89) and < baseline

Arterial Po₂ < 56 mmHg(7.4 kPa) and < baseline

Arterial or venous Pco₂ 45-54 mmHg(6.0-7.2 kPa) and pH 7.31-7.35

Empyema

≥ 2 lobes

High risk for adverse event, Both:

Pneumonia Severity Index (PSI) Risk Class IV or V (PSI score ≥91)

CURB-65 criteria, ≥ Three:

New onset confusion

Blood urea nitrogen (BUN) > 19.6 mg/dL(7 mmol/L)

Respiratory rate ≥ 30/min, sustained

Systolic blood pressure < 90 mmHg or diastolic blood pressure ≤ 60 mmHg

Age ≥ 65 years

Lung abscess

Necrotizing pneumonia

Comorbid pneumonia in a hospitalized patient confirmed by imaging

Intervention, ≥ One:

Anti-infective

PREVIOUS **SAVE REVIEW** **COMPLETE** **REVIEW SUMMARY**

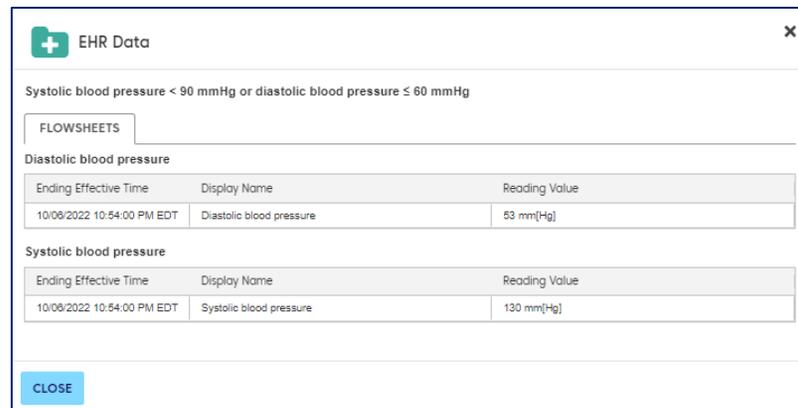
4. To view the EHR data:

- a. Click a plus-sign icon  or ellipsis icon .

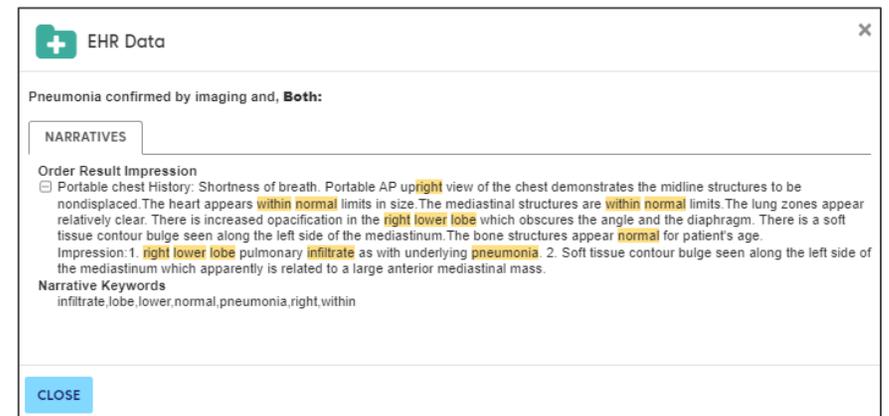
The EHR Data dialog box appears and shows the data extracted from the EHR. The data are presented as follows:

- Clinical data for labs, medications, flowsheets, diagnoses and problems, and patient demographics are displayed in tables
- Systolic and diastolic blood pressure measurements are combined in a single table
- Clinical data elements from separate sources are displayed on separate tabs

The image below shows sample EHR data that are displayed when you click the plus-sign icon .



The image below shows sample EHR data that are displayed when you click the ellipsis icon . Note that key terms identified by Natural Language Processing are highlighted in yellow.



- b. Click CLOSE when you finish viewing the EHR data.

5. Optionally, click **REVIEW SUMMARY**  so you can view and print the summary. The Review Summary includes the following information:
- Title *InterQual Review Summary – Generated by InterQual® AutoReview* indicates that the review was generated using data extracted from the EHR and no criteria were manually selected.
 - Check mark  and plus-sign icon  next to a criteria point indicates that the EHR data satisfied the criteria.

- Plus-sign icon  only next to a criteria point indicates that EHR data are available but require a reviewer to determine whether the data can be used to satisfy the criteria.
 - Letters (for example, (A), (B), (C) etc.) that appear next to the EHR icons indicate where to find the corresponding information in the EHR Data section of the Review Summary. You scroll to the EHR Data section to view the details.
6. Complete or save the review.
- **Complete review** — Clicking COMPLETE stops the update process, locks the review, and prevents future edits.
 - i. Click COMPLETE.

A message appears indicating that any data (criteria selections and EHR data) that did not contribute to satisfying the criteria will be removed from the review. This includes clearing irrelevant data from the level of care that was met and all other levels of care that have data.
 - ii. Click YES or NO as appropriate.

The review is locked and saved to your organization's system.
 - **Save review** — Clicking SAVE REVIEW stops the update process and saves the review so you can edit and complete it later. Note that saving does *not* clear irrelevant data from the review.
 - i. Click SAVE REVIEW. The review is saved to your organization's system.

+ InterQual® Review Summary - Generated by InterQual® AutoReview

This image shows a review before you click Complete.

- ✓ Episode Day 1, One:
 - OBSERVATION, One:
 - ✓ ACUTE, One:
 - ✓ Pneumonia confirmed by imaging and, Both: + (A)
 - ✓ Finding, ≥ One:
 - O₂ sat < 89%(0.89) and < baseline + (B)
 - Arterial Po₂ < 56 mmHg(7.4 kPa) and < baseline
 - Arterial or venous Pco₂ 45–54 mmHg(6.0–7.2 kPa) and pH 7.31–7.35
 - Empyema
 - ≥ 2 lobes + (C)
 - High risk for adverse event, Both:
 - Pneumonia Severity Index (PSI) Risk Class IV or V (PSI score ≥91)
 - ✓ CURB-65 criteria, ≥ Three:
 - New onset confusion
 - ✓ Blood urea nitrogen (BUN) > 19.6 mg/dL(7 mmol/L) + (D)
 - Respiratory rate ≥ 30/min, sustained + (E)
 - ✓ Systolic blood pressure < 90 mmHg or diastolic blood pressure ≤ 60 mmHg + (F)
 - ✓ Age ≥ 65 years + (G)
 - Lung abscess
 - Necrotizing pneumonia
 - Comorbid pneumonia in a hospitalized patient confirmed by imaging
 - ✓ Intervention, ≥ One:
 - ✓ Anti-infective + (H)

PREVIOUS SAVE REVIEW COMPLETE

This image shows a review after you click Complete.
Irrelevant data are removed.

- ✓ Episode Day 1, One:
 - ✓ ACUTE, One:
 - ✓ Pneumonia confirmed by imaging and, Both: + (B)
 - ✓ Finding, ≥ One:
 - ✓ CURB-65 criteria, ≥ Three:
 - ✓ Blood urea nitrogen (BUN) > 19.6 mg/dL(7 mmol/L) + (D)
 - ✓ Systolic blood pressure < 90 mmHg or diastolic blood pressure ≤ 60 mmHg + (C)
 - ✓ Age ≥ 65 years + (E)
 - ✓ Intervention, ≥ One:
 - ✓ Anti-infective + (A)

PREVIOUS

Note: The Review Summary presented in InterQual® Connect may differ from the Review Summary that is available in your integrated Case Management System.

Complete an Automated Review that Partially Met Criteria

As you work with automated reviews that partially met criteria, you can edit the criteria selections as you complete the workflow. Note that editing the criteria selections in an automated review converts it to a manual review.

Editing a review that partially meets criteria might involve:

- Selecting additional criteria that results in a review that meets criteria, or
- Clearing EHR data and criteria selections that do not align with the patient's level of care before completing the review to Criteria Not Met. Clearing this information ensures the review contains only relevant data before you share it internally or with a payer organization.

Open an automated review

1. Find an automated review.

You find and select automated reviews either from within your system's worklist or from the InterQual® AutoReview dialog box that displays whenever you start a new review. If multiple reviews are found, you can delete the ones you don't need from the InterQual AutoReview dialog box:

- a. Click DELETE for a review you want to remove.
- b. Click OK in the warning message to confirm you want to delete the review.

Note: If you click the (X) in the upper right corner or delete all the automated reviews, the Select Subset screen appears so you can begin a manual review.

2. Click **Select** to open a review.

The Medical Review screen appears.

3. If the levels of care appear collapsed, expand the level of care you want to focus on.

The criteria appear as follows:

- Criteria points or rules in solid teal indicate that the EHR data satisfy the criteria.
- Criteria points with a plus-sign icon  indicate that EHR data are available and are being evaluated to determine whether they satisfy the criteria.
- Criteria points with an ellipsis icon  indicate that imaging narratives and other text based EHR data are available, and that Natural Language Processing (NLP) is used to determine whether they satisfy the criteria.
- Criteria points or rules outlined in teal indicate that EHR data are available but require a reviewer to determine whether the data can be used to satisfy the criteria.

- To view EHR data, click a plus-sign icon  or ellipsis icon . The EHR Data dialog box appears and shows the specific data extracted from the EHR. Click Close when you are finished viewing the data.

Select criteria or clear selections

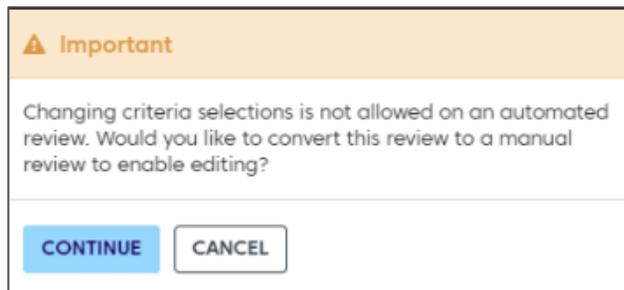
Either select additional criteria or clear selections in the review, as appropriate.

Select criteria

If there is additional information in the medical record or information that became available after the EHR updates were completed, you can record that information.

- Select a criteria point by clicking it.

A message alerts you that changing criteria selections converts the automated review to a manual review.



- Click CONTINUE in the message if you wish to continue selecting criteria. Otherwise, click CANCEL.

The review changes as follows and is no longer considered a fully automated review:

- Criteria points or rules in solid teal change to green.
- Criteria points with a plus-sign icon  or ellipsis icon  continue to display the icon, indicating that the EHR data are retained.
- Criteria points outlined in teal change as follows:
 - If you manually select a criteria point outlined in teal, it changes to green. The associated EHR data are retained and are indicated by a green folder icon . (See image 1b below.)
 - If you do *not* select a criteria point outlined in teal, it changes to white and appears as unselected criteria. The associated EHR data are retained and indicated by the plus-sign icon  or ellipsis icon . (See image 2b below.)
- The criteria status changes to CRITERIA NOT MET.

1a. Sample automated review before we manually selected criteria

Medical Review *Electrolyte or Mineral Imbalance* CHANGE SUBSET CLINICAL REFERENCE

EPISODE DAY 1 CLEAR EXPAND ALL COLLAPSE ALL COMMENTS BENCHMARKS

- Hypokalemia, All: Care
- Hypomagnesemia, Both:
- Hypernatremia, Both:
- Hyponatremia, Both:
- Sodium < 120 mEq/L(120 mmol/L) and symptomatic
- Intervention, ≥ One:
- Conivaptan or tolvaptan (includes PO)
- Diuretic ≥ 2x/24h
- Sodium chloride 3%(0.03)
- Hypophosphatemia, Both:

Criteria point with EHR data that needs review.

Criteria point was automatically selected because the EHR data satisfied criteria.

PREVIOUS SAVE REVIEW COMPLETE REVIEW SUMMARY

1b. Sample review where we manually selected criteria point Sodium < 120 mEq/L(120 mmol/L) and symptomatic

Medical Review *Electrolyte or Mineral Imbalance* CHANGE SUBSET CLINICAL REFERENCE **CRITERIA NOT MET**

EPISODE DAY 1 CLEAR EXPAND ALL COLLAPSE ALL COMMENTS BENCHMARKS

- Hypokalemia, All: Care
- Hypomagnesemia, Both:
- Hypernatremia, Both:
- Hyponatremia, Both:
- Sodium < 120 mEq/L(120 mmol/L) and symptomatic
- Intervention, ≥ One:
- Conivaptan or tolvaptan (includes PO)
- Diuretic ≥ 2x/24h
- Fluid restriction
- Sodium chloride 3%(0.03)
- Hypophosphatemia, Both:

Criteria point with EHR data that we manually selected after review.

Criteria point was automatically selected because the EHR data satisfied criteria.

PREVIOUS SAVE REVIEW COMPLETE REVIEW SUMMARY Privacy Notice

2a. Sample automated review before we manually selected criteria

Medical Review *Electrolyte or Mineral Imbalance* CHANGE SUBSET CLINICAL REFERENCE

EPISODE DAY 1 CLEAR EXPAND ALL COLLAPSE ALL COMMENTS BENCHMARKS

- Hypokalemia, All: Care
- Hypomagnesemia, Both:
- Hypernatremia, Both:
- Hyponatremia, Both:
- Sodium < 120 mEq/L(120 mmol/L) and symptomatic
- Intervention, ≥ One:
- Conivaptan or tolvaptan (includes PO)
- Diuretic ≥ 2x/24h
- Fluid restriction
- Sodium chloride 3%(0.03)
- Hypophosphatemia, Both:

Criteria point with EHR data that needs review.

Criteria point was automatically selected because the EHR data satisfied criteria.

PREVIOUS SAVE REVIEW COMPLETE REVIEW SUMMARY

2b. Sample review where we did not manually select criteria point Sodium < 120 mEq/L(120 mmol/L) and symptomatic

Medical Review *Electrolyte or Mineral Imbalance* CHANGE SUBSET CLINICAL REFERENCE

EPISODE DAY 1 CLEAR EXPAND ALL COLLAPSE ALL COMMENTS BENCHMARKS

- Hypokalemia, All: Care
- Hypomagnesemia, Both:
- Hypernatremia, Both:
- Hyponatremia, Both:
- Sodium 120-129 mEq/L(120-129 mmol/L) and symptomatic
- Intervention, ≥ One:
- Conivaptan or tolvaptan (includes PO)
- Diuretic ≥ 2x/24h
- Fluid restriction
- Sodium chloride 0.9%(0.009)
- Hypophosphatemia, Both:

Criteria point with EHR data that we did not manually select after review.

Criteria point was automatically selected because the EHR data satisfied criteria.

PREVIOUS SAVE REVIEW COMPLETE REVIEW SUMMARY

3. If appropriate, continue to select criteria. If you select enough criteria points to satisfy criteria, the criteria status changes to CRITERIA MET.
4. Continue with [Viewing the Review Summary](#).

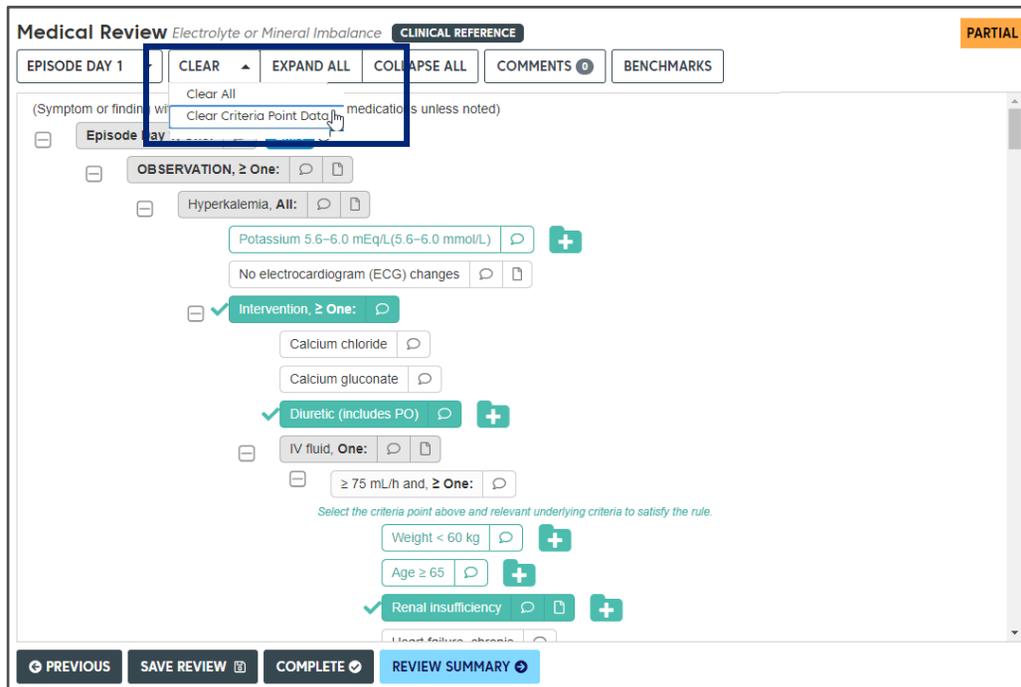
Clear selections

Clearing EHR data and criteria selections enables you to quickly remove data that do not align with the patient's level of care and ensures the review contains only relevant clinical data.

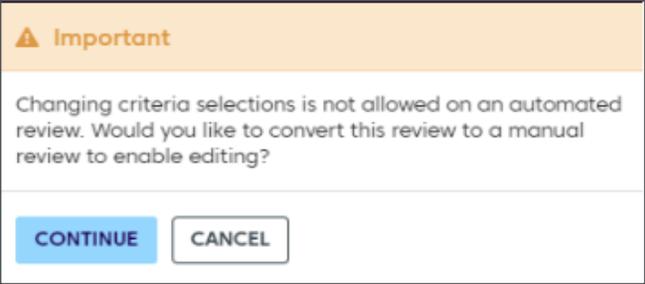
For example, in the image below, the automated review includes multiple conditions with some automatically selected criteria in each condition at the Observation, Acute, and Critical levels of care. Suppose we want to clear EHR data and criteria selections at all the levels of care and conditions, except Hypokalemia for the Acute level of care. We would do so as follows.

1. From the CLEAR menu, select Clear Criteria Point Data.

Note: We do *not* recommend using the Clear All option for automated reviews as it clears all criteria selections and EHR data from the review.

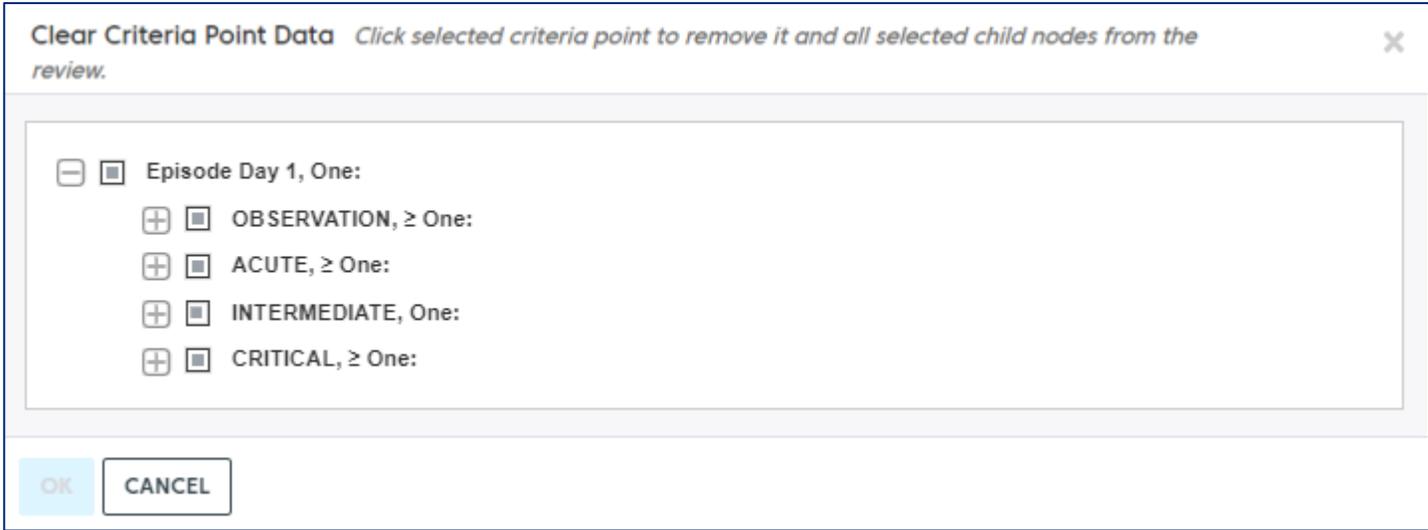


A message alerts you that changing criteria selections converts the review to a manual review.

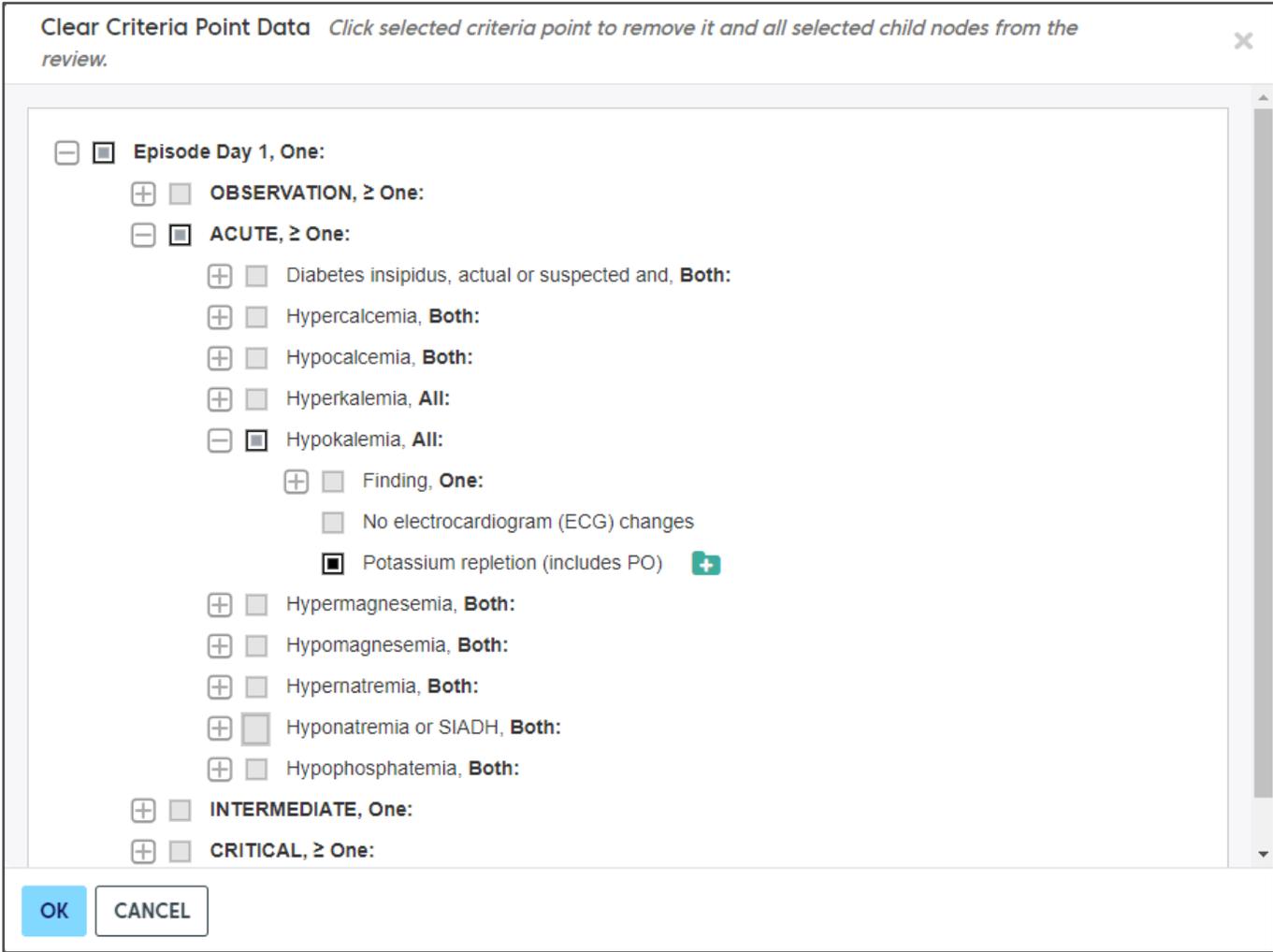


2. Click CONTINUE. The Clear Criteria Point Data dialog box appears.

Items with a selected box have underlying EHR data and criteria selections, while items with a clear box do not.



- 3. Clear criteria selections as follows:
 - a. Optionally, expand (+) or collapse (-) the criteria so you can see all the selected criteria.
 - b. Clear a box next to a selected item to remove all underlying EHR data and criteria selections from the review.
In the sample image below, we:
 - Cleared the EHR data and criteria selections from the Observation, Intermediate, and Critical levels of care
 - Expanded Acute and cleared the EHR data and criteria selections from all conditions, except Hypokalemia



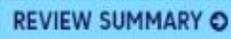
- c. If you clear any selections in error, before saving your changes, click CANCEL and repeat the steps from step 1 above.
- d. Click OK to save your changes.

The review changes as follows and is no longer considered an automated review:

- Criteria points you cleared (includes solid teal and outlined in teal) change to white and any associated EHR data are removed.
- Criteria points with a plus-sign icon  or ellipsis icon  continue to display the icon for any criteria you did not clear, indicating that the EHR data are retained.

- Selected criteria points or rules you did not clear, change from solid teal to green.
- Criteria points outlined in teal that you did not clear, change to white and appear as unselected criteria. The EHR data are retained. If you manually selected a criteria point outlined in teal, the EHR data are retained and the EHR icon changes to a green folder icon .
- Criteria status changes to CRITERIA NOT MET.

View the Review Summary

1. Optionally, click  to view and print the Review Summary.

The Review Summary includes the following information about the review and, for criteria points that have EHR data, displays the EHR details:

- Check mark  and plus-sign icon  next to a criteria point indicates that the EHR data satisfied the criteria.
- Plus-sign icon  only next to a criteria point indicates that EHR data are available but did not satisfy the criteria.
- Check mark  and green folder icon  next to a criteria point indicates that you manually selected a criteria point that was outlined in teal.
- Letters (for example, (A), (B), (C) etc..) that appear next to the EHR icons indicate where to find the corresponding information in the EHR Data section of the Review Summary. You scroll to the EHR Data section to view the details.

The image below shows the review after we used the Clear Criteria Point Data option to clear irrelevant EHR data and criteria selections.

Review Summary

SETTINGS PRINT

InterQual® Review Summary

Patient Name:	Criteria Status: Criteria Not Met
Date of Birth: 05/05/1972	
Created By: Auto Review User, InterQual	Criteria Product: LOC:Acute Adult
Created Date: 01/31/2022, 02:14 PM EST	Criteria Subset: Electrolyte or Mineral Imbalance
Review Status: In Primary	Criteria Version: InterQual® 2020, Apr. 2020 Release
Completed Date:	
Facility: InterQual Demo	

Select Day, One:
Episode Day 1, One:
ACUTE, ≥ One:
Hypokalemia, All:
 Potassium repletion (includes PO) (F)

EHR Data

F:

Code/Description
Med-File (Medi-Span):30113
Medi-Span Generic Product Identifier:79700030002050
Medispan Drug Descriptor ID:30113
NDC:00338-0709-48- Potassium Chloride 0.1mEq/mL, Injection, 100mL
RxNorm:312507- 100 ML potassium chloride 0.1 MEQ/ML Injection

PREVIOUS SAVE REVIEW COMPLETE

Note: The Review Summary presented in InterQual Connect may differ from the Review Summary that is available in your integrated Case Management System.

Complete or save the review

1. Finish the review workflow by completing or saving the review.
 - **Complete review** — Clicking COMPLETE stops the update process, locks the review, and prevents any future edits.
 - i. Click COMPLETE.
 - If the review resulted in a CRITERIA MET status, a message appears indicating that any data (EHR data and criteria selections) that did not contribute to satisfying criteria will be removed from the review. This includes clearing irrelevant data from the level of care that was met and all other levels of care that have data.

- If you made changes to the criteria but it did not satisfy the criteria, the status remains as CRITERIA NOT MET
- If you made no changes to the criteria, the status changes to CRITERIA NOT MET
 - ii. Click COMPLETE REVIEW or CANCEL as appropriate.
If you clicked COMPLETE REVIEW, the review is locked and saved to your organization's system.
- **Save review** — Clicking SAVE REVIEW stops the EHR update process and saves the review so you can edit and complete it later.
 - i. Click SAVE REVIEW.
The review is saved to your organization's system.

Edit and Complete an Automated Review that Met Criteria

If appropriate, you can edit the criteria selections in a Criteria Met automated review. You might do this in cases where the review automatically met at a lower level of care, but when additional clinical information is evaluated, you find that the patient is appropriate for a higher level of care.

Note: Editing a review converts it to a manual review and it is no longer considered a fully automated review.

1. Find an automated review.

You find and select automated reviews either from within your system's worklist, or from the InterQual® AutoReview dialog box that displays whenever you start a new review. If multiple reviews are found, you can delete the ones you don't need from the InterQual AutoReview dialog box.

- a. Click DELETE for a review you want to remove.
- b. Click OK in the warning message to confirm you want to delete the review.

Note: If you click the (X) in the upper right corner or delete all the automated reviews, the Select Subset screen displays so you can begin a manual review.

2. Click **Select** to open a review.

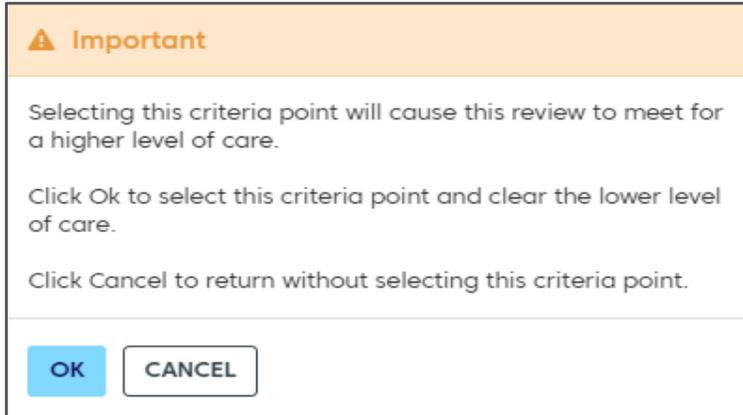
The Medical Review screen appears.

3. If the levels of care appear collapsed, expand the level of care you want to focus on.

The criteria appear as follows:

- Criteria points with a plus-sign icon  indicate that EHR data are available and are being evaluated to determine whether they satisfy the criteria.
- Criteria points with an ellipsis icon  indicate that imaging narratives and other text based EHR data are available, and that Natural Language Processing (NLP) is used to determine whether they satisfy the criteria.

- Criteria points or rules in solid teal indicate that EHR data satisfy the criteria.
 - Criteria points or rules only outlined in teal indicate that EHR data are available but require a reviewer to determine whether the data can be used to satisfy the criteria.
4. To view EHR data, click a plus-sign icon  or an ellipsis icon . The EHR Data dialog box appears and displays the specific data that were extracted from the EHR. Click Close when you are finished viewing the data.
- If there is additional information in the medical record or information that became available after the EHR updates were completed, you can record that information.
5. Select a criteria point by clicking it.
- A message alerts you that changing criteria selections converts the automated review to a manual review.
6. Click CONTINUE in the message if you wish to continue selecting criteria. Otherwise, click CANCEL.
- If you continue, the review changes as follows and is no longer considered a fully automated review:
- Criteria points or rules in solid teal change to green.
 - Criteria points with a plus-sign icon  or ellipsis icon  continue to display the icon, indicating that the EHR data are retained.
 - Criteria points outlined in teal change as follows:
 - If you select a criteria point outlined in teal, it changes to green. The associated EHR data are retained and indicated by a green folder icon .
 - If you do not select a criteria point outlined in teal, it changes to white and appears as unselected criteria. The associated EHR data are retained and indicated by the plus-sign icon  or ellipsis icon .
 - Criteria points you clear (includes solid teal and outlined in teal) change to white and the associated EHR data are removed.
 - If you select a criteria point that results in meeting a higher level of care, a message appears indicating that the criteria selections at the lower level of care will be removed.



7. If the level of care message displays, click OK to select the criteria point. Otherwise, click CANCEL. The criteria status changes to reflect the higher level of care.

8. Optionally, click **REVIEW SUMMARY** to view and print the Review Summary.

The Review Summary includes the following information about the review and, for criteria points that have EHR data, displays the EHR details:

- Check mark ✓ and plus-sign icon  next to a criteria point indicates that the EHR data satisfied the criteria.
- Plus-sign icon  only next to a criteria point indicates that EHR data are available but do not satisfy the criteria.
- Check mark ✓ and green folder icon  next to a criteria point indicates that you manually selected a criteria point that was outlined in teal.
- Letters (for example, (A), (B), (C) etc.,) that appear next to the EHR icons indicate where to find the corresponding information in the EHR Data section of the Review Summary. You can scroll to the EHR Data section to view the details.

Note: The Review Summary presented in InterQual Connect may differ from the Review Summary that is available in your integrated Case Management System.

9. Finish the review workflow by completing or saving the review.

- **Complete review** — Clicking COMPLETE stops the update process, locks the review, and prevents future edits.

i. Click COMPLETE.

If the review has a CRITERIA MET status, a message appears indicating that any data (EHR data and criteria selections) that did not contribute to meeting criteria will be removed from the review. This includes clearing irrelevant data from the level of care that was met and all other levels of care that have data.

- ii. Click COMPLETE REVIEW or CANCEL as appropriate. If you click COMPLETE REVIEW, the review is locked and saved to your organization's system.
- **Save review** — Clicking SAVE REVIEW stops the EHR update process and saves the review so you can edit and complete it later.
 - i. Click SAVE REVIEW.
The review is saved to your organization's system.