

User Release Notes

for eRAD RIS
Version 1.0
Build 29

Table of Contents

1. Purpose..... 3

2. Intended Audience 3

3. Installing/Accessing the Application 3

4. New Features and Enhancements 4

 MT Polling Permission 4

 Ability for Medical Transcription to Change Polling Queues 5

 Reset Skipped Rows for Transcription 6

 Suspended Workflow Added for Transcription 8

 Change Dictating Radiologist from Work List 10

 Preview Report Enhancements 12

 Billing Exception 13

 User Preferences for Inbound Reporting (File Listener and TCP Listener) 13

 Modality Scheduling Interval 14

 Automated Measure Calculation – MU Requirement 170.302.n 15

 Generate Patient Lists – MU Requirement 170.302.i 17

 Session Individual Production Counters 18

 Failed PACS Correction Work List 19

 Interactive Dictation..... 22

 View / Edit Data Window 22

5. Resolved Defects 25

6. Known Limitations 27

1. Purpose

This document describes some of the new features and changes implemented in eRAD RIS as of the end of Sprint 29. This version of eRAD RIS is referred to as Build 1.29.

Only features which can be visually demonstrated to the user will be outlined in this document.

2. Intended Audience

This document is created by the RIS Development team for the RadNet RIS management team.

3. Installing/Accessing the Application

The installation guide for the eRAD RIS client have been posted to the RadNet Wiki page at <http://mdbal01rdtweb/Wiki/>

Under the RIS menu, click on the rRIS page. The credentials to access the page are:

Username: rRIS

Password: Summerside

Please note that Build 1.29 is considered a new core release of the application and will require a reinstallation of eRAD RIS. This is accomplished by navigating to the eRAD RIS shared installation drive and running the CoreInstall.bat file (ex: I:\RISDeployment\CoreInstall.bat)

If you experience difficulties accessing the application, please do not hesitate to contact Darcy Noye with the PEI RIS Development Team.

4. New Features and Enhancements

MT Polling Permission

MTPolling will now be disabled in the User Preference screen if the permission “Clinical.UserPreferences.TranscriptionPolling” is not granted to the user. It is suggested that the base permission be set to “None”.



Figure 4.1 – User who has permission to change preference



Figure 4.2 – User who does not have permission to change preference

Ability for Medical Transcription to Change Polling Queues

In previous builds, transcription had the ability to assign / un-assign to the Problem and QA work lists. The user would have access to the work list to view the contents and select which record they would like to open from the work list. With the introduction of work list polling, and the possibility of transcription not having access to these work lists, we needed to provide access to these queues.

Four new access strings have been added to control the access to the menu items.

Access String	Description
WL.GetJob	Access to MT polling workflow for general queue/all queues
WL.GeneralQueue	Access to MT polling workflow for general queue
WL.ProblemQueue	Access to MT polling workflow for problem queue
WL.QaQueue	WL access to MT polling workflow for qa queue

The transcription menu will display the Get Job menu item with a submenu listing the individual queues.

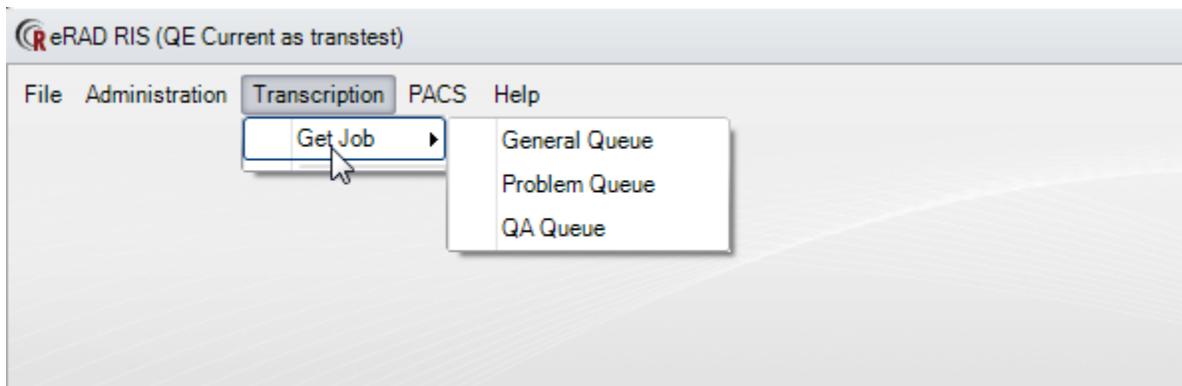


Figure 4.3 – Transcription role with only access to polling queue's

Selecting one of these menu items will start polling the respective queue and get a job as soon as one is available. If an Edit report screen is already open on, it will tell them to close it before they can start polling a new queue.

Reset Skipped Rows for Transcription

This feature was introduced for Radiologists in Build 23 and is now included in work flow for Transcription.

Figure 4.4 below shows the options available to be assigned the far right button on the Transcription Editing tab. The default button action can be changed. To change the default action of the button, hold down the CTRL key on the keyboard and select the action from the drop down list. The option selected from the list will be performed as well as change the default setting for the button. When the default action is changed for a button, the text on the button will also change.

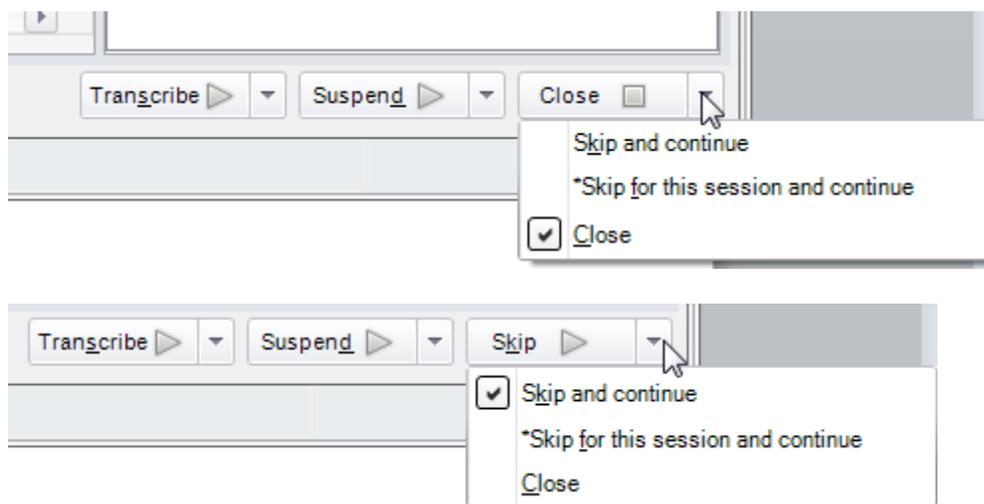


Figure 4.4 – Displaying the ability to Skip work list rows and changing the default action of the “Close” Button

Actions are defined as “button action” and continue or “button action” and close. Referring to Figure 4.4, you will notice ICONS on the buttons as play  or stop . Assigning actions that are to continue to the next record on the work list display the play ICON, and actions that are to complete action and close data window to return to the work list will have the stop ICON.

Also in figure 4.4 the menu options are to skip the current exam and a specified following action. In the first example, Close is defaulted with the action being to simply close the Transcription Editing window.

Skip and continue will skip the item for the current workflow instance. To access this exam in the Editing window again, it can be opened directly from the work list as normal, or if the user completes the entire work list, then the skipped rows are accessed next.

The final menu option of “*Skip for this session and continue” will mark this exam as such. Unlike “Skip and Continue” once the user completes the work list, exams flagged “*Skip for this session and continue” will not be accessed during the normal “next available exam” work flow.

If the user has access to the work list they can access the exam via the work list, or if the exam(s) are to be added back into the “next exam” work flow, the user does have the ability to manually add these skipped exams back into the workflow by resetting skipped rows via the Transcription menu option displayed in Figure 4.5. Figure 4.6 is the window that opens. The user can reset individual rows or all of the skipped rows in this list.

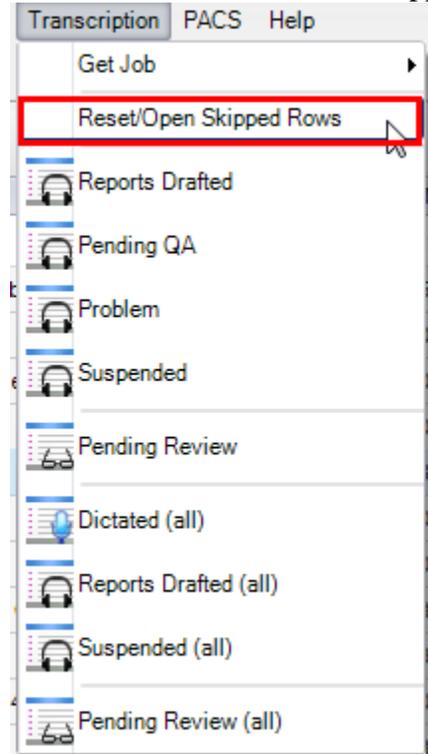


Figure 4.5 – Reset/Open Skipped Rows menu option

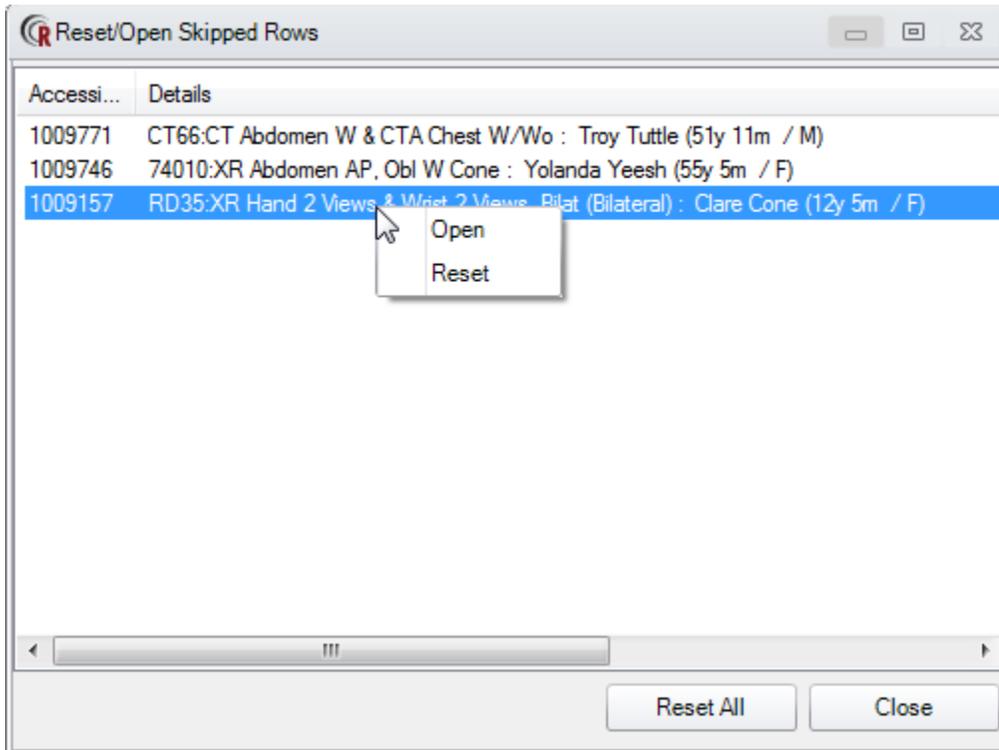


Figure 4.6 – Reset/Open Skipped Rows window

Suspended Workflow Added for Transcription

The ability to suspend a job has been available to the Radiologists for some time now. In build 29 this work flow has been introduced to the Transcription work flow as well. In the Report Editing window a new drop list button has been added with the options to Suspend and continue or to Suspend and close.

Suspend and continue will suspend the current exam open in report editor window. Suspend and close will suspend the current exam and return the user to the work list they accessed the record from. If the user is configured polling work flow only (does not have access to work list views) they are returned to the main screen.

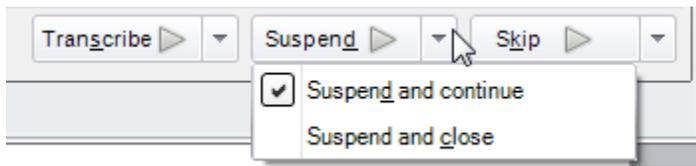


Figure 4.7 – Suspended Button with drop list options

For those that do have access to work lists, under the Transcription menu you will find two new menu options. Suspended and Suspend (all) have been added. The Suspended work list will have all suspended records belonging to the current logged in user. The Suspend (all) work list will display records from all users suspended from transcription. This menu option will most likely only be available to an admin.

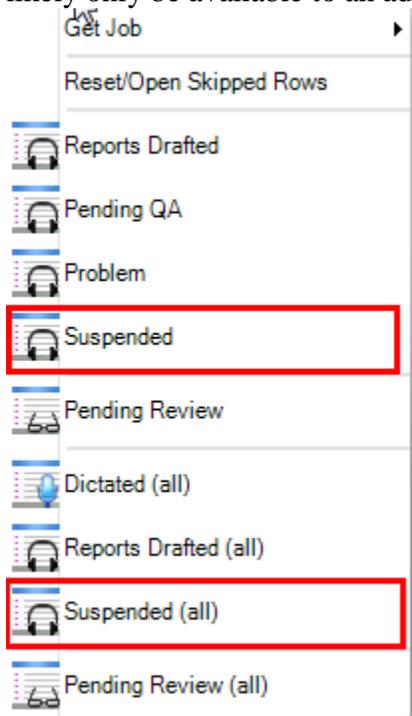


Figure 4.8 – Suspended menu options to access work list

Change Dictating Radiologist from Work List

In build 29, exams that are in a status of Dictated, Report Drafted, Transcribed, and Signed can have the dictating radiologist changed. From the Patient folder, Dictated by Date, and Pending Signature work lists select the row to be changed and from the context menu (right click) select the menu option Change Dictated by Radiologist.

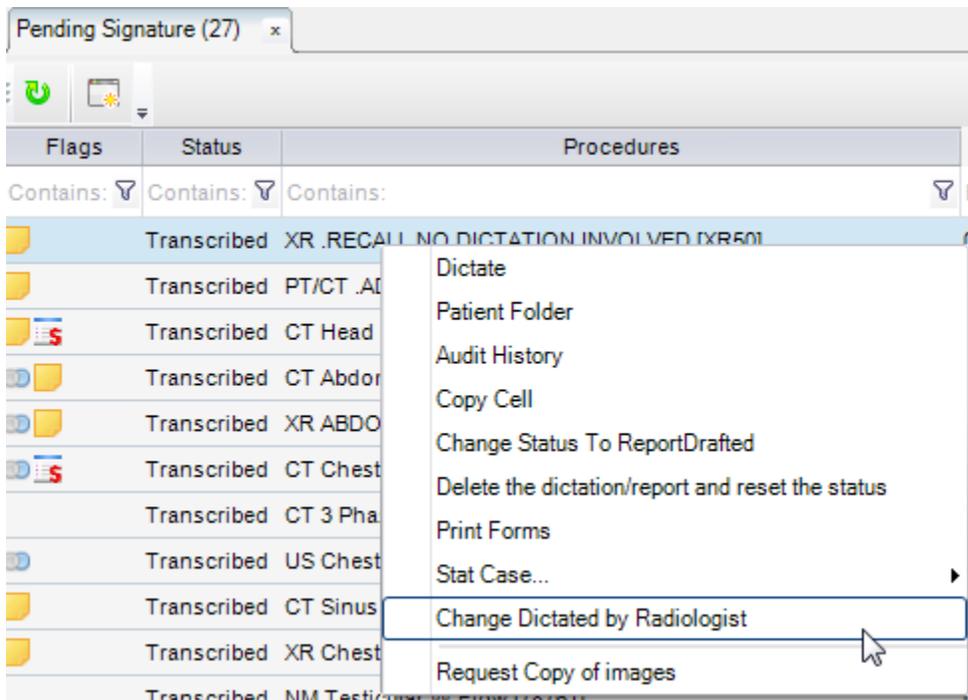


Figure 4.9 – Change Dictated by Radiologist on context menu

This will open a new window with the Radiologists that can be assigned to the study(s) selected based on what practice they are assigned to and where the modality resides for the studies affected. Only the latest interpretation will be affected.

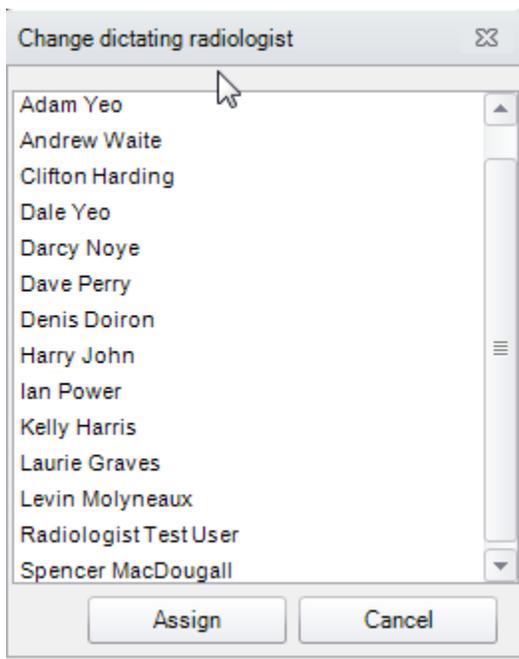


Figure 4.10 – Change dictating Radiologist window

Preview Report Enhancements

If the record selected has an interpretation row, Preview Report will show on the context menu. Before build 29, if the report was not ready, it would throw an error stating that it was not ready. Now the report will be prepared for display without saving the interpretation body.

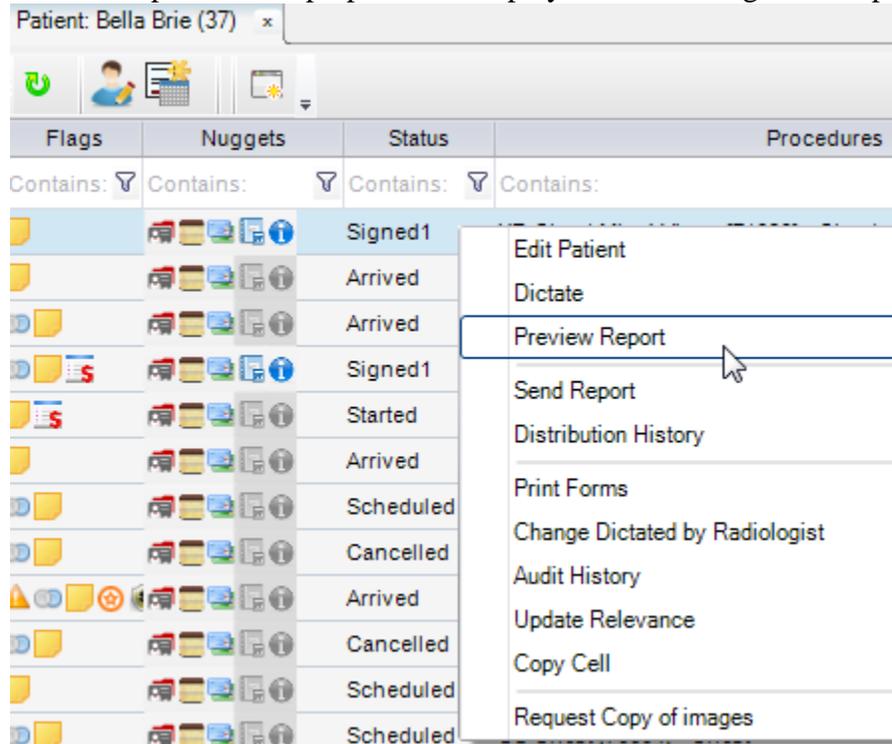


Figure 4.11 – Preview Report from context menu

Billing Exception

We created a method that will run when a study is being signed off.

The new functionality was designed to ensure that the following segments of data were populated;

- Referring Physician was selected, and was not still flagged as an unknown referring Physician
- Insurance was specified
 - o Insurance Policy number was specified
 - o Checks to see if the policy number doesn't override the policy mask
 - o Insurance is active
- There was a responsible party selected.
- Pre Certification number is defined.

All these cases apply to outside read studies excluding responsible party, when the outside site required Insurance.

We also created a WL called "Billing Exception WL", under the administration menu, studies will appear on this worklist when the study is either on hold for billing, or when the study failed a billing exception on signing.

User Preferences for Inbound Reporting (File Listener and TCP Listener)

Two new user preferences have been added in this build. Start TCP Listener and Start File Listener each are checkboxes. When logging in we determine if we should start the listeners based on the system setting first and the user preference second. If both are true then we turn the corresponding listener on.

The default setting is checked or true. This was determined to be the norm if the system setting is on.

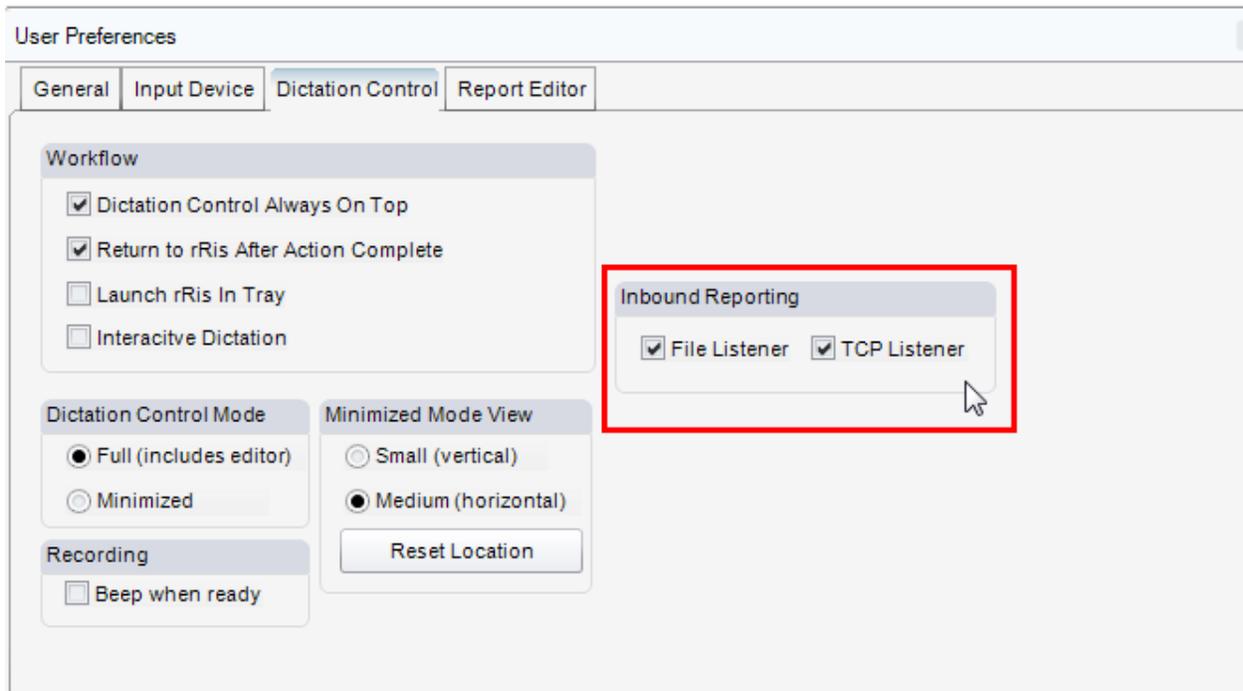


Figure 4.11 – Inbound Reporting User Preferences

Modality Scheduling Interval

To allow for time blocks to be more configurable for each modality a new column called “Scheduling Interval” has been added to the Modality Lookup table. The time interval is defaulted to 5, but will allow each modality to have individual time blocks.

Lookup Tables - Modality

Modality Code	Description	AE title	Digital	Site Code	Modality Type Code	Weight	Confined Space Flag	Scheduling Interval	Pacs
CT1EL	CT1EL	CT1EL	N	EL (Eldersburg)	CT	300		20	N
CT1FH	CT1FH	CT1FH	N	FH (Fisher)	CT			5	N
CT1LU	CT1LU	CT1LU	N	LU (Lutherville)	CT			5	N
CTGL	CT1GL	CT1GL	N	GLA (Glasgow)	CT		N	5	N
DE1EL	DE1EL	DE1EL	N	EL (Eldersburg)	RD (Bone Density)			5	N
DE1FH	DE1FH	DE1FH	N	FH (Fisher)	RD (Bone Density)			5	N
DX1LU	DX1LU	DX1LU	N	LU (Lutherville)	XR (Plain Film/Xra...			5	N

Figure 4.12 – Modality lookup displaying new column Scheduling Interval

If the procedure selected has a default time that is less than the Scheduling Interval for the modality, the time blocks will reflect the modality scheduling interval.

Automated Measure Calculation – MU Requirement 170.302.n

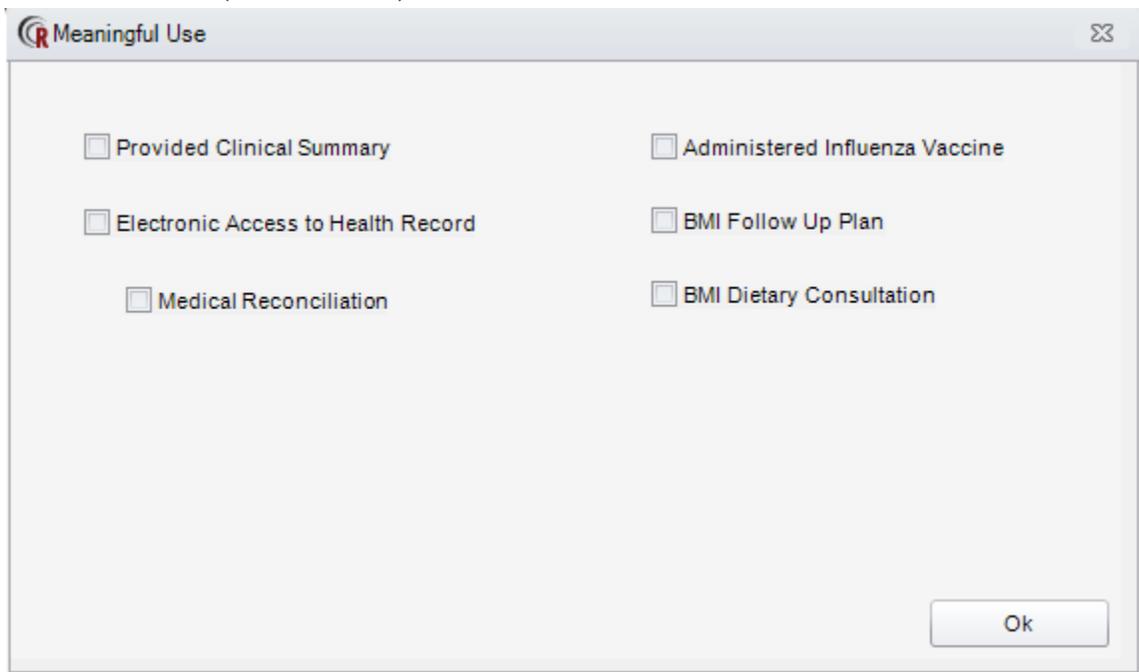
Meaningful User requirement # 170.302 n_AutomatedMeasure_Gen_PS_RevE.doc

“170.302 n Automate measure calculation. For each meaningful use objective with a percentage-based measure, electronically record the numerator and denominator and generate a report including the numerator, denominator, and resulting percentage associated with each applicable meaningful use measure.

Created a management to call stored procedure to display automated measures.(report is called MU Scorecard added it to the report server([Home](#) > [Dev](#) > [Meaningful Use](#)).

Added a number of new fields to our hidden MU tab used to capture measures

1) **Hidden MU tab(ctrl + M + U)**



The screenshot shows a window titled "Meaningful Use" with a close button in the top right corner. Inside the window, there are six checkboxes arranged in two columns. The first column contains: "Provided Clinical Summary", "Electronic Access to Health Record", and "Medical Reconciliation". The second column contains: "Administered Influenza Vaccine", "BMI Follow Up Plan", and "BMI Dietary Consultation". All checkboxes are currently unchecked. An "Ok" button is located in the bottom right corner of the dialog box.

Figure 4.13 – Meaning Use (hidden tab)

- a) **Provided Clinical Summary** – captures if a clinical summary was provided to the patient at any during the visit. Behind the scene the date is stamped when this checkbox was checked.
- b) **Electronic Access to Health Record** – is used to capture timely access. Behind the scene the date is stamped when this checkbox was checked.
- c) **Medical Reconciliation** – is used to capture if the Rad did any medical reconciliation on the patient during the visit.

- d) **Administered influenza vaccine** – Is used by CMQ to capture if influenza vaccine was administered during the visit.
 - e) **BMI Follow Up plan** – Is used by CMQ to capture if a follow up plan was suggested to the patient. Should never be used other than certification day.
 - f) **BMI Dietary Consultation** - Is used by CMQ to capture if a follow up plan was suggested to the patient. Should never be used other than certification day.
- 2) **Other Automated Measures** –
- a) **Transition of care** - must be checked if the patient is referred to the rad by a referring physician. In our case all exams should have this checked. Talking to Susan only mammo screening should not check this off.
 - b) **Provided Educational Resources** – if the patient was provided educational resources during visit this should be checked.

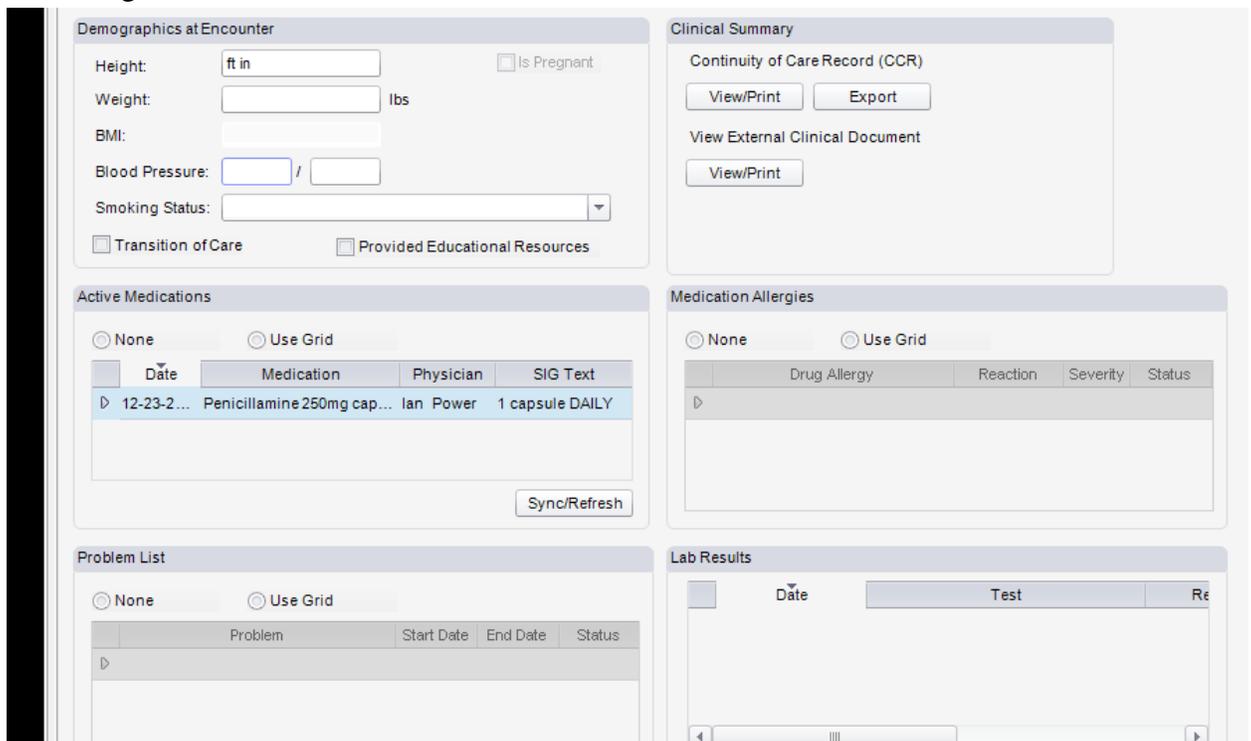


Figure 4.14 – Meaning Use “Hidden Tab” is accessed from Visit History

Generate Patient Lists – MU Requirement 170.302.i

Requirement

“Generate lists of patients by specific conditions to use for quality improvement, reduction of disparities, research, or outreach.”

The Test Procedure requires the following...

Enable a user to electronically select, sort, retrieve, and generate lists of patients according to, at a minimum, the data elements included in:

- (1) Problem list;*
- (2) Medication list;*
- (3) Demographics; and*
- (4) Laboratory test results.*

Following this we created a management report named “Patient Lists” which provides the user with parameters to filter a list based on patient age (range), ICD9 (Problem), Medication (string search) as well as 4 sets of labs and lab value. The age parameters include the values selected. So in the screen shot I’ve selected ages 25-65 this would include ages of 25, 65 and everything in between.

Home > Dev > Meaningful Use > Patient Lists

From Age To Age

ICD9 Medication

Lab Test 1 Lab Value 1 (ie: >100):

Lab Test 2 Lab Value 2 (ie: >100):

Lab Test 3 Lab Value 3 (ie: >100):

Lab Test 4 Lab Value 4 (ie: >100):

1 of 1 100% Find | Next

Patient Lists

Age: 25 through 65

Lab 1: HDL cholesterol with lab value: >30

MRN	First Name	Last Name	Age	Gender
405979410	Frank	Lewis	61	M
	Lab Results	2010-09-20 Test:Total cholesterol Result:162mg/dl 2010-09-20 Test:HDL cholesterol Result:43mg/dl 2010-09-20 Test:LDL cholesterol Result:84mg/dl 2010-09-20 Test:Triglycerides Result:127mg/dl		
				Count: 1

Report Description: Designed for Meaningful Use requirement 170.302(i) this returns list of patients based on the conditions(conditions) specified.

Patient Lists

RadNet - Confidential and Proprietary

Date Run: 12/22/2011 3:22 PM

<http://peidev1/ReportServer/Dev/Meaningful Use>

Page 1 of 1

RMIS\dale

Figure 4.15 – Patient List report

Session Individual Production Counters

Introduced in build 29 are status counters for Radiologists and Transcription work flows. Located at the bottom of the application, they are visible from all windows. The stats displayed are based the users production for that day. We are capturing the data based on a 24 hour calendar day (midnight to midnight). For example if a dictation was completed yesterday and signed today, the Signed count at the bottom would increase by one, but the dictation count would remain the same because it was captured the day before.

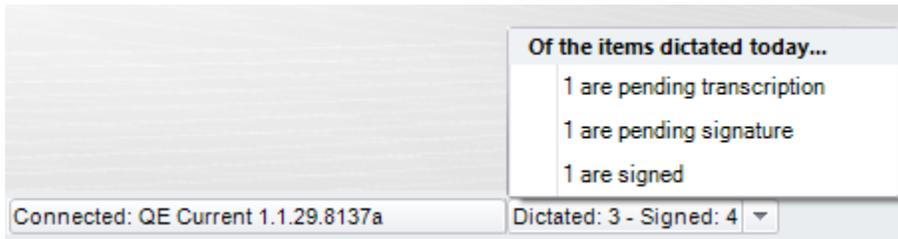


Figure 4.16 – Production Counters for Radiologists

The expanded menu shows the status of exams that were dictated today. In the example above the Radiologist dictated on 3 exams and has signed 4. Of the 3 that were dictated today, 1 is pending transcription 1 is pending signature and 1 has been signed.

Transcription will see a similar counter tracking their individual progress for that day.

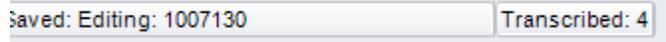


Figure 4.17 – Production counter for transcription

Failed PACS Correction Work List

The modality lookup table contains a new column “Pacs Correction Required Flag”.

Modalities:										
Modality Code	Description	AE title	Digital	Site Code	Modality Type Code	Weight	Confined Space Flag	Scheduling Interval	Pacs Correction Required Flag	
CT1EL	CT1EL	CT1EL	N	EL (Eldersburg)	CT	300		20	Y	C
DE1EL	DE1EL	DE1EL	N	EL (Eldersburg)	BD (Bone Density)			5	N	
INTERNALEL	Used for cr...		Y	EL (Eldersburg)	(na) ?? (Unknown)		N	5	N	
MA1EL	MA1EL	MA1EL	N	EL (Eldersburg)	MA (Mammography)			5	N	

Figure 4.18 – Modality lookup table displaying new column Pacs Correction Required Flag

If the value is Y or on for a modality the exam will be sent to the Failed PACS Correction work list when the technologist completes the exam. If the value on the modality is N or off, when the technologist completes the exam it will go to the Pending Dictation work list.

A new work list has been added under the Administration menu titled “Failed PACS Correction” has been added. As mentioned previously the modalities marked for PACS correction will have the completed exams populate this work list.

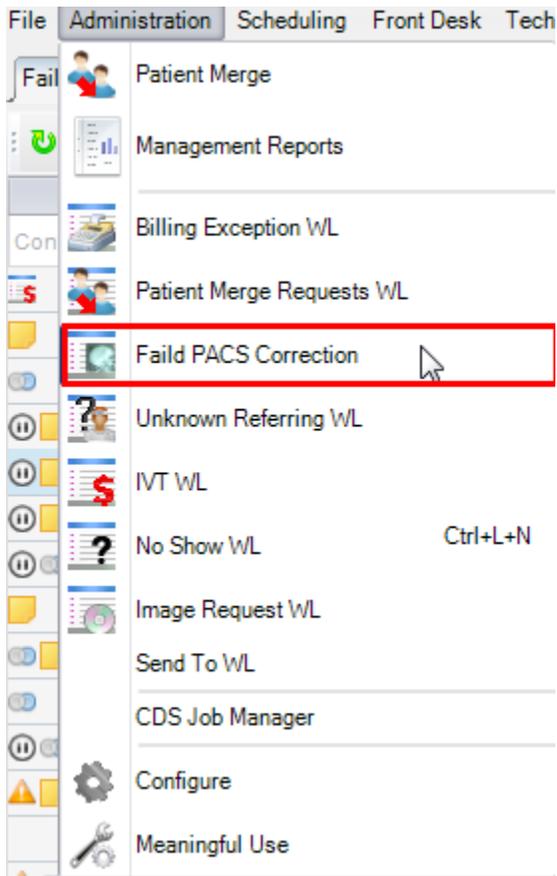


Figure 4.19 – Administration menu showing Failed PACS Correction menu option

RADNET, Inc. – eRAD RIS Pre-Release Notes

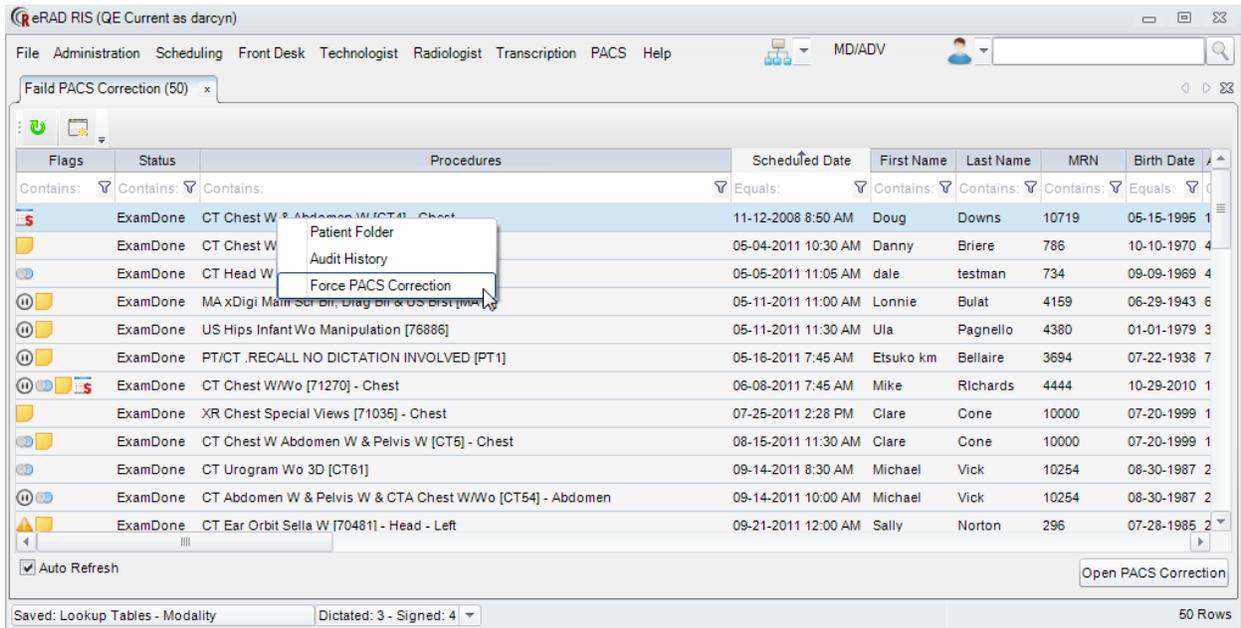


Figure 4.20 – Failed PACS Correction Work List

Selecting the Open PACS Correction button will open the corresponding PACS viewer window designed for this function. If a user so chooses, they can select Force PACS Correction from the context menu the exam(s) will be moved to the Pending Dictation work list.

The patient folder also has a new column PACS Corrected Flag.

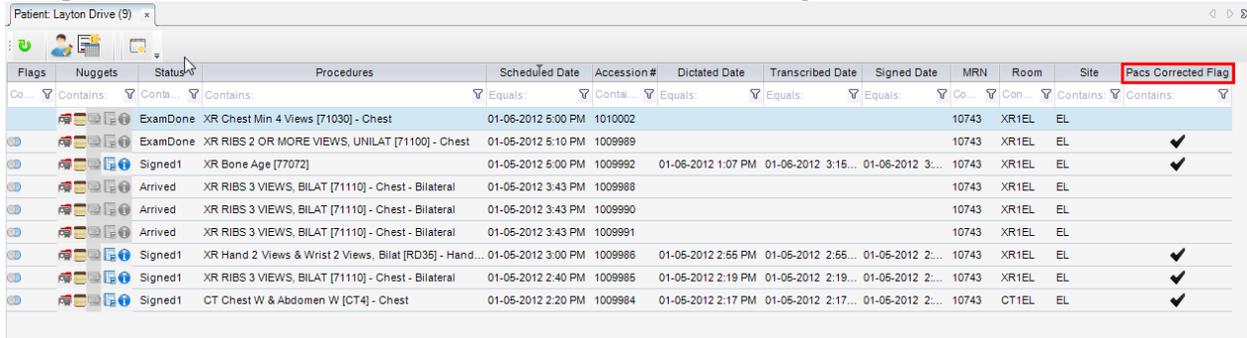


Figure 4.20 – Patient folder displaying column for PACS Corrected Flag

Interactive Dictation

Build 29 introduces Interactive Dictation. This is enabled by a user preference flag under the Dictation Control tab.

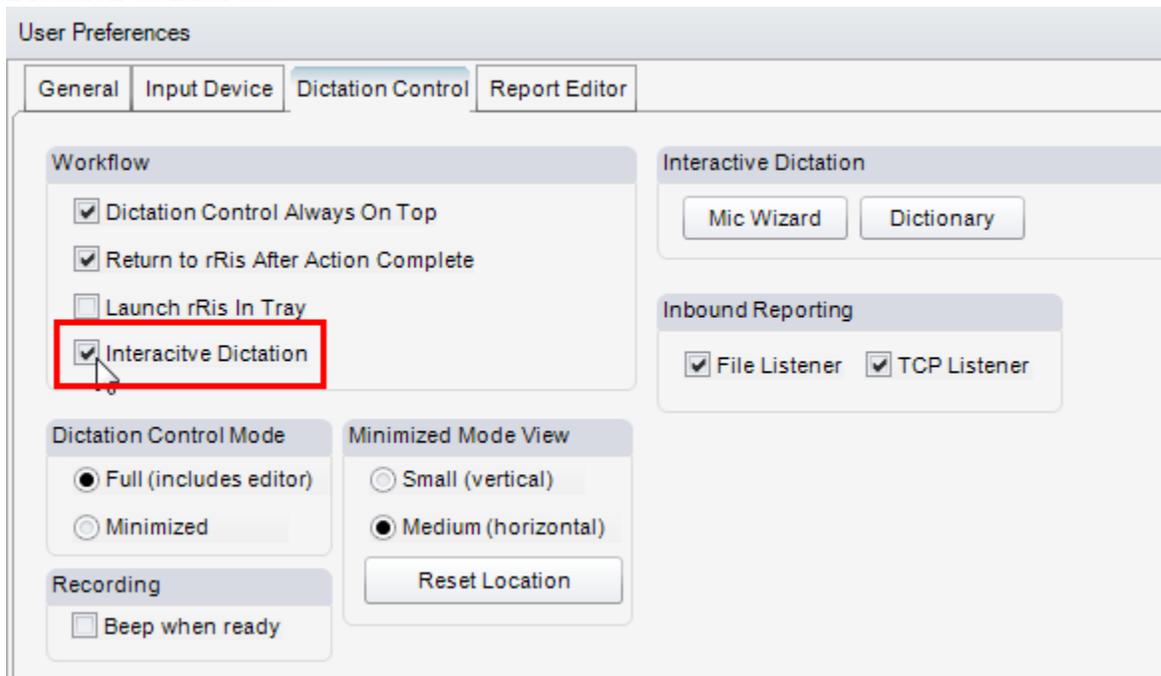


Figure 4.21 – Interactive Dictation user preference flag

The dictation window opens as it normally would without Interactive Dictation. As the Radiologist records the dictation, the text is captured real time. The user can release the dictation button control and start / stop as required.

More documentation will be available in Build 30 regarding Interactive Dictation.

View / Edit Data Window

A new data window has been added in Build 29. This window is accessed from the patient folder and is enabled for all active statuses except for status of Cancelled.

Selecting a row from the patient folder and select the View / Edit button will open the View/Edit (patient name) data window. In this release the data tabs are the same for all statuses. This will be enhanced in the next build. Also OrderSigned will return error.

RADNET, Inc. – eRAD RIS Pre-Release Notes

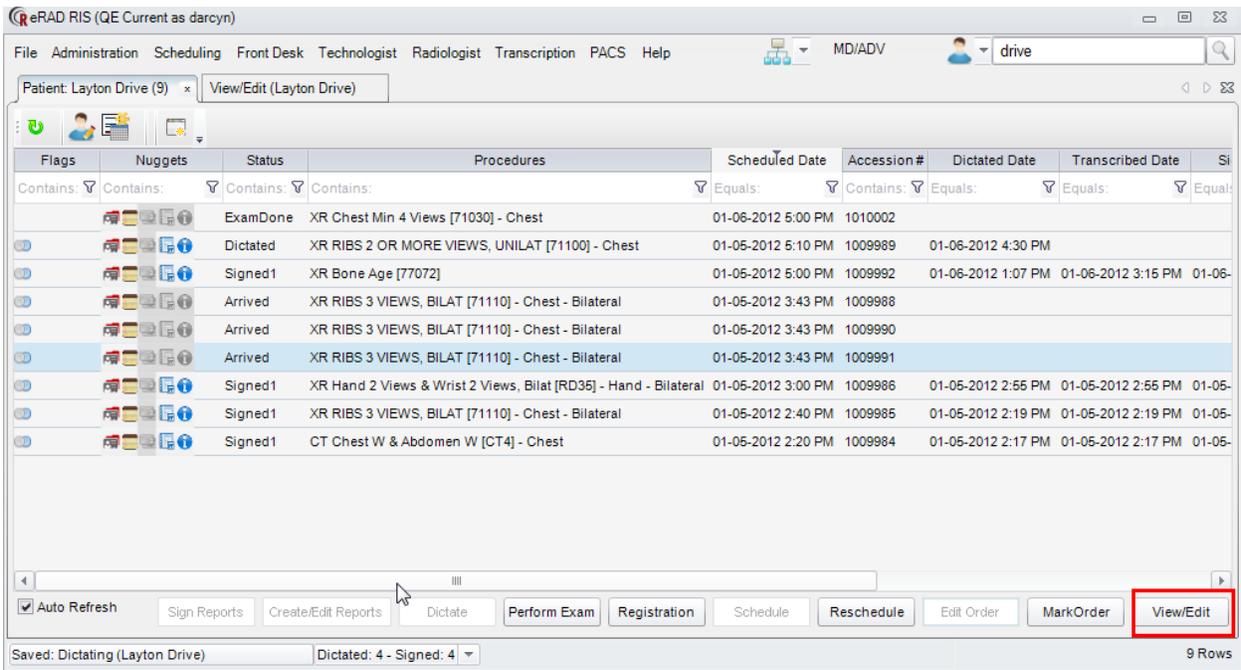


Figure 4.22 – View / Edit button to access View/Edit data window

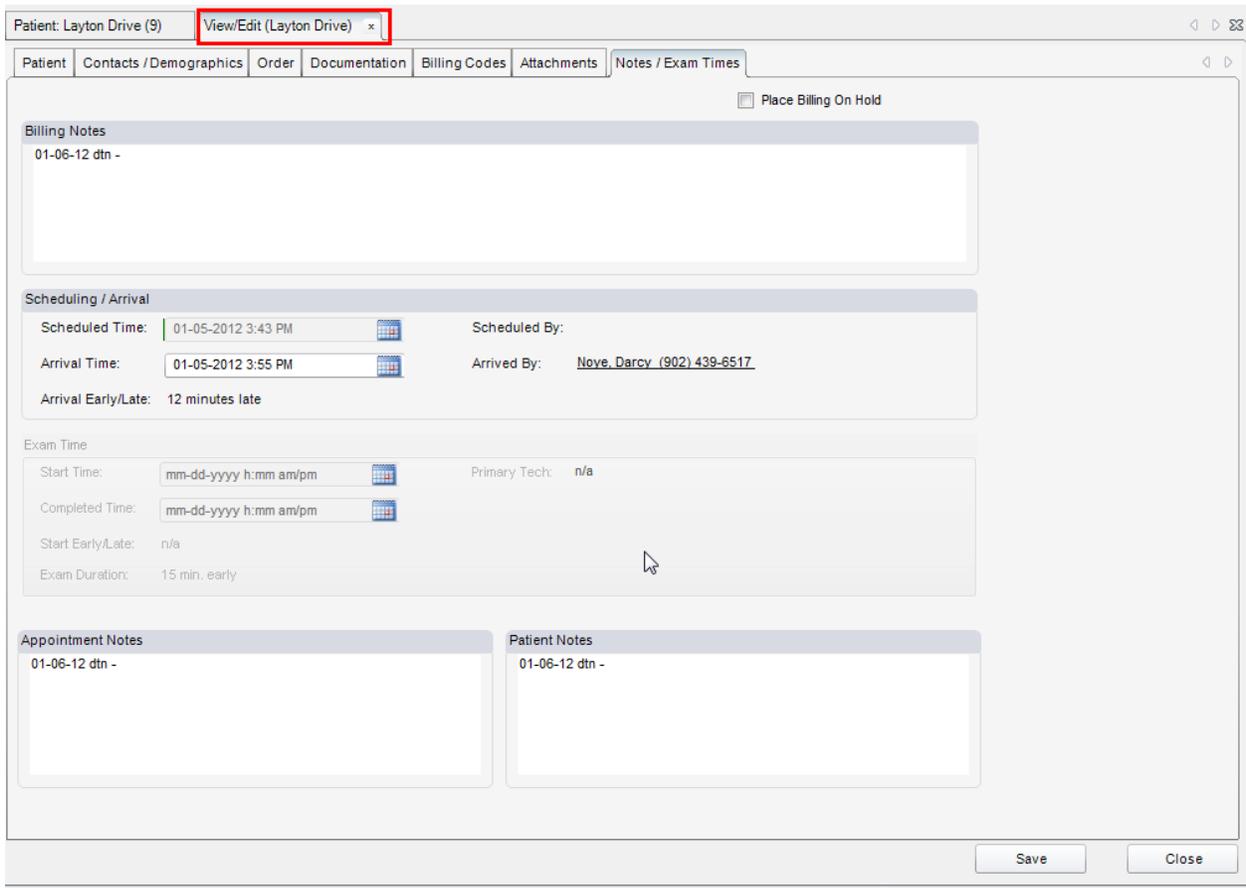


Figure 4.23 – View/Edit data window.

5. Resolved Defects

Bugs, Suggested Features and Support Issues resolved in build 1.29. The extract is taken from Redmine bug tracking system and only displays defects resolved in 1.29.

#	Status	Tracker	Priority	Subject	Category	Target version	Resolved Version
785	Closed	Bug	High	Add patient. Cannot create new order	Thick Client GUI	1.28	1.29
782	Closed	Bug	Normal	Unselecting Referring resource type, the NPI is still required to save.	Admin Tools	1.28	1.29
780	Closed	Bug	Normal	Schedule study for past date and select Room can throw error	Thick Client GUI	1.28	1.29
773	Closed	Bug	Normal	Clinical Summary > Continuity of Care Record Throws error if patient folder is missing procedures	Thick Client GUI	1.28	1.29
772	Closed	Bug	Normal	Clinical Summary > Continuity of Care Record needs "Scheduled Study Date"	Thick Client GUI	1.28	1.29
765	Closed	Bug	Normal	Cannot open 2 instances of Edit Patient	Thick Client GUI	1.28	1.29
763	Closed	Bug	Normal	Report History data nugget throws error on Send To button	Thick Client GUI	1.28	1.29
754	Closed	Bug	Normal	Labels and Forms - Issue with Action Picker	Admin Tools	1.25	1.29
743	Closed	Bug	Normal	Date selected from Date / Time Picker not accepted after removing composite code.	Thick Client GUI	1.27	1.29

RADNET, Inc. – eRAD RIS Pre-Release Notes

741	Closed	Bug	High	Add Outside Read - can save outside read without visit selected.	Thick Client GUI	1.27	1.29
740	Closed	Bug	Normal	Outside Read - Edit billing does not show all the billing exceptions	Thick Client GUI	1.27	1.29
739	Closed	Bug	Normal	Outside Read - Edit Billing from Billing Exception and Responsible Party is required	Thick Client GUI	1.27	1.29
733	Closed	Bug	High	Cannot Scan documents	Thick Client GUI	1.26	1.29
709	Resolved	Bug	Low	Dictation / Create Edit reports - Patient Alert pop up not centered	Thick Client GUI	1.26	1.29
675	Closed	Bug	Normal	Edit Order > Verbal Order returns error	Thick Client GUI	1.25	1.29

6. Known Limitations

The following are Bugs, Suggested Features, and Support Issues found in build 1.29. This build is the current QE build and testing is ongoing. The list may increase in size. This document will not be updated or re-released.

#	Status	Subject	Category	Target version
807	New	Timezone issue - Cannot update personnel	Admin Tools	1.29
806	Resolved	Walk-In error when checking in	Thick Client GUI	1.29
805	Resolved	Failed PACS Correction > Flag on modality does not work	Thick Client GUI	1.29
804	New	Perform Exam > Labels don't activate after changing Performed Procedure.	Thick Client GUI	1.29
803	New	User Preferences options access	Thick Client GUI	1.29
802	New	Column Age At Study not calculating age correctly.	Thick Client GUI	1.29
801	New	Possible issue with date / time formats and Perform Exam data window	Thick Client GUI	1.29
800	New	Forms and labels action on <-- arrow continues when filtered list is done	Admin Tools	1.29
799	Resolved	Configurable Modality Scheduling	Thick Client GUI	1.29
797	Resolved	Failed PACS Correction work list only moves one exam at time when forcing PACS Correction	Thick Client GUI	1.29
796	Resolved	Creating duplicate user throws error	Admin Tools	1.29
795	Resolved	MT polling work flow. Once list is complete cannot close the editor window	Thick Client GUI	1.29
794	Resolved	Patient Search window > Search by Phone number will throw error	Thick Client GUI	1.29
791	New	View / Edit data window error on View OrderSigned	Thick Client GUI	1.29

RADNET, Inc. – eRAD RIS Pre-Release Notes

790	Resolved	View / Edit data window prompts for required fields	Thick Client GUI	1.29
783	New	the gui has hard coded values for Patient relation	Thick Client GUI	1.29
777	New	missing a billing message when tech only workflow	Web Services/DB	1.29