

# Server Update

For eRAD RIS  
Version 2.0  
Build 43  
Update 43.0.7

## **Table of Contents**

1. New Features .....	3
Zotec TOS Inegration .....	3
2. Changes to Configuration .....	5
3. Defects Resolved .....	6
4. Code Stream.....	7
5. Package Contents .....	8
6. Intended Audience .....	11
7. Who is affected .....	11
8. eRAD RIS Release Version Numbers .....	12
9. Installing .....	13

## 1. New Features

### Zotec TOS Inegration

For Zotec enabled sites, the “Add” button in the payments section will connect with the Zotec TOS portal, passing all relevant information, which includes: patient demographics, CPT codes, insurance and the amount to collect. Zotec will match the patient and display the Zotec TOS portal in a modal dialog as shown in the following:

The screenshot shows the 'Add Time of Service Payment' window. The left pane has a 'Payments' section with an 'Add' button highlighted by a red arrow. The right pane displays patient information for 'molyneaux, bevin' and payment details. The 'Total Payment Amount Information' section shows a prior balance of \$0.00 and a today's payment of \$300.00. The 'Today's Time of Service Payment' section includes a dropdown for 'Additional Payments for molyneaux, bevin (65611-BORG) (DOB: 10/29/1975)'.

Figure 1.1 – Adding payment via Zotec TOS payment window

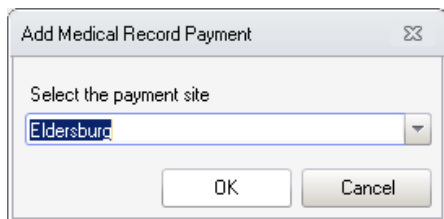
To record payments for Medical Records services, such as the cost of burning a CD, access the menu “Front Desk / Add Medical Record Payment” as shown in the following:

The screenshot shows the 'Front Desk' menu with three options: 'Walk-in', 'Reception WL', and 'Add Medical Record Payment'. The 'Add Medical Record Payment' option is highlighted with a blue border.

Figure 1.2 – Add Medical Record Payment access

When the user clicks on “Add Medical Record Payment”, a screen will display, asking the user for the site where the payment will be received. The user will have the option to select any Zotec enabled site for their practice but will default to their “Reception WL” preferred site.

## eRAD RIS Server Update



**Figure 1.3 – Selecting site to add medical record payment**

When these choose “OK” to the Add Medical Record Payment, the Zotec TOS web site will display with an extra message at the top of the screen, warning that they are processing a medical record payment. Medical record payments will be processed with following account:

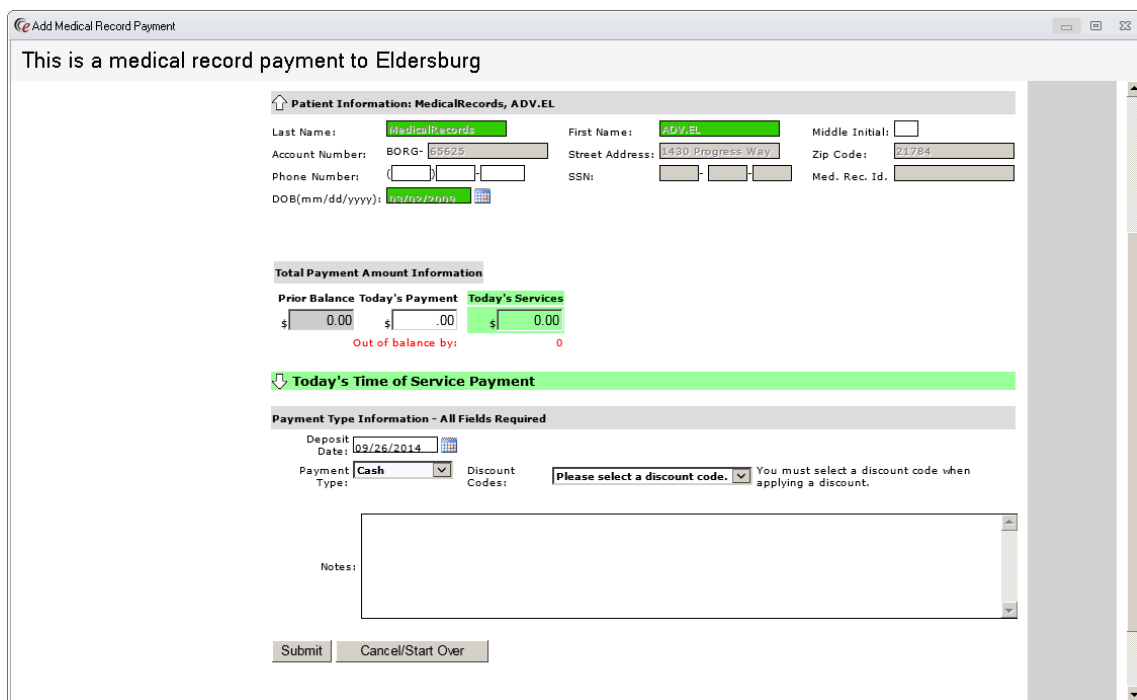
Last Name: MedicalRecords

First Name: <PracticeCode>\_<SiteCode>

Address: <site address information>

DOB: Site’s Zotec activation date

MRN (not seen on the TOS portal): z<space><PracticeCode>\_<SiteCode>



**Figure 1.4 - Zotec TOS payment window**

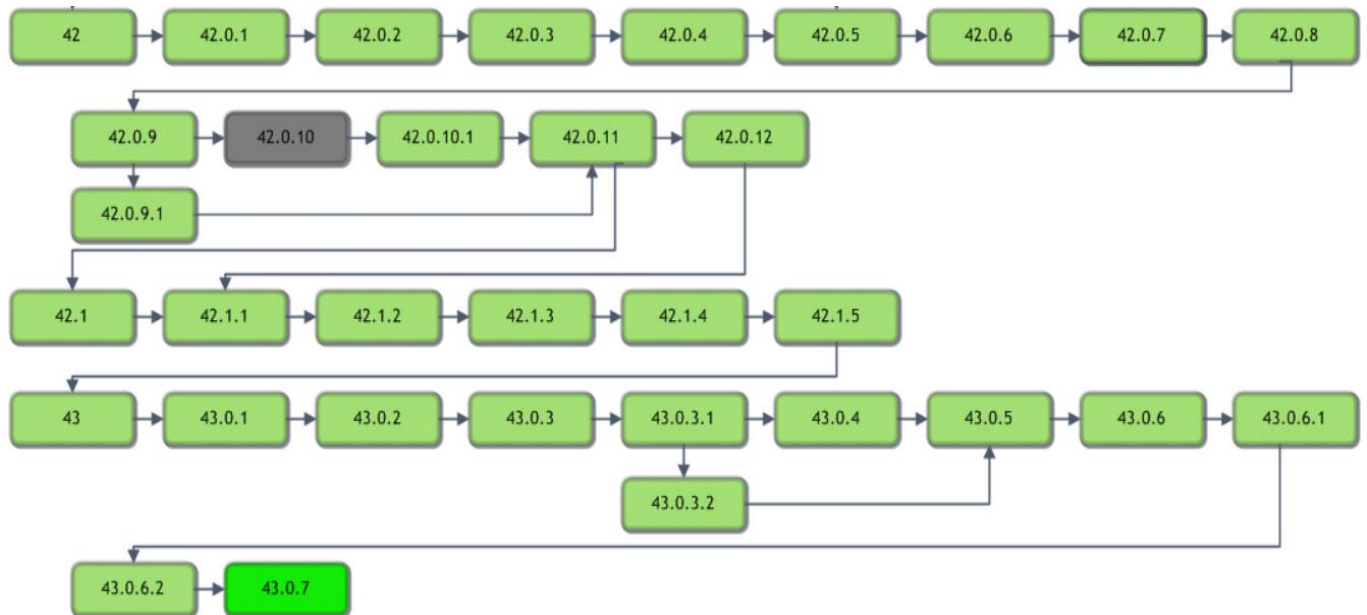
### 2. Changes to Configuration

Setting Placeholder	Setting	Default	Purpose / Controls Access to
Applicationsetting.config	"StartInsuranceEligibilityService"  Setting looks like this in the .config file  <setting name="StartInsuranceEligibilityService" serializeAs="String"> <value>False</value> </setting>	False	This setting originally had a default of True, Changed to false in this build. If the current value of this setting is True when you run the ServicesConfigWizard.exe it will keep the current setting.
AccessString and UserGroup Permissions	Zotec.AllowDiscount	None	Allows the user to add a medical record payment, via "Add Medial Record Payment" from the "Front Desk" main menu.
AccessString and UserGroup Permissions	Zotec.AllowRefund	None	Allows the user to give refunds in the Zotec time-of-service website
AccessString and UserGroup Permissions	Zotec.AddMedicalRecordPayment	Full	Allows the user to add a medical record payment, via "Add Medial Record Payment" from the "Front Desk" main menu.
SystemConfig settings	ZotecAmountPaidPrefixString	Amount Paid: </td> <td align='left'>	string in the Zotec receipt, just before the amount paid, which will be reported back to the RIS
SystemConfig settings	ZotecTOSPassword	None	Password for Zotec TOS (time of service) integration
SystemConfig settings	ZotecTOSUrl	None	URL to the Zotec TOS portal
SystemConfig settings	ZotecTOSUser	None	Username for Zotec TOS integration

**3. Defects Resolved**

Redmine #	Tracker	Subject	Priority
7671	Bug	internal dataset properties not correctly set	Immediate
7398	Feature	RIS Integration with Zotec payment portal (TOS)	Urgent
7604	Bug	Insurance Eligibility Pilot - Invoice Inconsistency	High
7584	Bug	IVT workflow can cause studies to be moved to Exam Done	High
7455	Bug	Patient Merge with 1 external MRN is being merged into itself	High
7721	Slush	Insurance Eligibility Pilot - Should not have pre transaction fee charged to eRAD_Demo payer id	Normal
7716	Slush	Null exception on login for zotec integration, preventing other code from running, no exception shown to user.	Normal
7715	Slush	Insurance Eligibility - Zotec integration	Normal
7713	Slush	Insurance Eligibility - subreport needed to identify patients on the Carriers Not Using Insurance Eligibility report	Normal
7709	Slush	Zotec integration - after submitting a payment in Zotec, the payment can be deleted in RIS	Normal
7691	Bug	Alternate MRN's don't display in patient search window	Normal
7680	Bug	Unable to cancel exam done studies for outside read sites	Normal
7669	Bug	Insurance Eligibility - IVT screen issue when no insurance is specified.	Normal
7666	Feature	Enhanced patient search in walk-in screen to include more than just internal persons	Normal
7645	Bug	StartInsuranceEligibilityService should be turned off by default	Normal
7636	Bug	Possible search returns as valid, when the start and end time straddle a closure start date.	Normal
7633	Bug	Problem List Error on Scheduling Outside Read	Normal
7514	Bug	Help -> Refresh Configuration required on new builds	Normal
7484	Bug	Document distribution - sites with no printer configured in RIS can still have jobs printed to other sites.	Normal
7435	Bug	IVT WL - Precert required and Insurance required - changing to an insurance that eligibility is checked, the required value is not removed from WL (timng issue)	Normal
7255	Bug	CD Burning - Improve PACS failed to export message	Normal
7166	Bug	Report deployment - MQSA folder really should be called Mammography	Normal
7015	Bug	MU - A requested lab order can be entered with a blank observation and return an error	Low

### 4. Code Stream



### Legend:

Light Green = Released software

Gray = Will not be released

Bright Green = Current Release

### **5. Package Contents**

Files included for this server update:

1) GUI ZIP Updates folder contains:

- rRIS\_1.3.43.0.7.25258.zip

2) RIS\_Service\_Updates contains:

ABCpdf.dll	Radar.DirectMessaging.Model.dll
ABCpdf9-32.dll	Radar.DirectMessaging.Model.pdb
ABCpdf9-64.dll	rRISServices.exe
Antlr3.Runtime.dll	rRISServices.pdb
CDSJobManager.dll	rRISServicesx64.exe
CDSJobManager.pdb	ScheduledTaskManager.dll
CdsLib.dll	ScheduledTaskManager.pdb
CdsLib.xml	ServicesConfigWizard.exe
CdsLib.XmlSerializers.dll	ServicesConfigWizard.pdb
CommonLib.dll	SignatureApprovalService.exe
CommonLib.pdb	SignatureApprovalService.pdb
contents.txt	System.Net.Http.dll
DDEngine.dll	System.Net.Http.Formatting.dll
DDEngine.pdb	System.Net.Http.xml
DiffPlex.dll	System.Web.Http.dll
Interop.ANYMODALCAPTURECTRLLib.dll	System.Web.Http.SelfHost.dll
Interop.FAXCOMEXLib.dll	System.Web.Http.SelfHost.xml
Microsoft.Practices.EnterpriseLibrary.Caching.dll	System.Web.Http.WebHost.dll
Microsoft.Practices.EnterpriseLibrary.Caching.pdb	System.Web.Http.WebHost.xml
Microsoft.Practices.EnterpriseLibrary.Common.dll	System.Web.Http.xml
Microsoft.Practices.EnterpriseLibrary.Common.pdb	System.Web.Mvc.dll
Microsoft.Practices.EnterpriseLibrary.Logging.dll	System.Web.Mvc.xml
Microsoft.Practices.EnterpriseLibrary.Logging.pdb	System.Web.Optimization.dll
Microsoft.Practices.ServiceLocation.dll	System.Web.Razor.dll
Microsoft.Practices.ServiceLocation.pdb	System.Web.Razor.xml
Microsoft.Practices.Unity.dll	System.Web.WebPages.Deployment.dll
Microsoft.Practices.Unity.Interception.dll	System.Web.WebPages.Deployment.xml
Microsoft.Practices.Unity.Interception.pdb	System.Web.WebPages.dll
Microsoft.Practices.Unity.pdb	System.Web.WebPages.Razor.dll
Microsoft.ReportViewer.Common.dll	System.Web.WebPages.Razor.xml
Microsoft.ReportViewer.WinForms.dll	System.Web.WebPages.xml
Microsoft.ReportViewer.WinForms.xml	Tourreau.Gilles.FaxDotNet.dll
Newtonsoft.Json.dll	Tourreau.Gilles.FaxDotNet.pdb
Newtonsoft.Json.xml	Tourreau.Gilles.FaxDotNet.xml
NLog.dll	WCFSservice.dll
O2S.Components.PDFRender4NET.dll	WCFSservice.pdb
PDFToImages.exe	WCFSserviceTests.dll
Radar.Common.dll	WCFSserviceTests.pdb
Radar.Common.pdb	WebApi.dll
Radar.Common.WebClient.dll	WebApi.pdb
Radar.Common.WebClient.pdb	WebGrease.dll
Radar.DirectMessaging.Client.dll	Wedge.exe
Radar.DirectMessaging.Client.pdb	Wedge.pdb



## **eRAD RIS Server Update**

The rRIS\_Service\_Updates also contains to subfolders:

- A. Deploy folder contains
  - a. Applicationsettings.config
  - b. ReleaseVersion-connectionstrings.config
  - c. rRISServices.exe.config
  - d. services.config
- B. XSL subfolder contains:
  - a. Subfolder titled “Stylesheets” which contains:
    - a. CDAToHTMLCompleteReport.xslt
    - b. CDAToHTMLCompleteReportDark.xslt
    - c. CDAToHTMLImpressionSection.xslt
    - d. CDAToRIS.xslt
    - e. CDAToTxt.xslt
    - f. DocumentModelReport.xslt
    - g. DocumentModelReportAsXml.xslt
  - b. CDA Subfolder contains

a. C-CDA.xsl	n. sectionInstructions.xsl
b. eRadStylesheet.xsl	o. sectionMedications.xsl
c. generalTemplates.xsl	p. sectionPlanOfCare.xsl
d. header.xsl	q. sectionProblemList.xsl
e. QRDA.xsl	r. sectionProcedures.xsl
f. QrdaLevel3_Cypress2.4.0.xsl	s. sectionQRDAMEasures.xsl
g. QrdaLevel3_ViewHtml.xsl	t. sectionQRDAPatientData.xsl
h. sectionAdministeredMedications.xsl	u. sectionQRDAREporting.xsl
i. sectionAllergies.xsl	v. sectionReasonForVisit.xsl
j. sectionEncounters.xsl	w. sectionResults.xsl
k. sectionFindings.xsl	x. sectionSocialHistory.xsl
l. sectionFuncCogStatus.xsl	y. sectionVitalSigns.xsl
m. sectionImmunizations.xsl	

3) SQL Folder contains:

- B43.0.7.sql

4) **SSRSDeployment** folder contains 7 subfolders, a batch file for deploying the reports and a help file for deploying the reports.

4.1. **Backups** folder is empty

4.2. **Fonts** folder contains 4 files:

4.1.1. FRE3OF9X

4.1.2FRE3OF9x\_0

4.1.3FREE3OF9

## **eRAD RIS Server Update**

### 4.1.4FREE3OF9\_0

- 4.3. **ParentFolder** folder contains 7 subfolders
  - 4.3.1. **Chair** folder contains 1 .rdl file
  - 4.3.2. **Dashboards** folder contains 9 .rdl files
  - 4.3.3. **Forms folder** contains sub folder and 2 .rdl files
    - 4.3.3.1. **SubReports** contains 10 .rdl files
  - 4.3.4. **Management Reports** folder contains 9 sub folders, these subfolders contain the core management report files (.rdl) to be deployed.
  - 4.3.5. **Marketing** folder contains 5 .rdl files
  - 4.3.6. **Order Templates** contains 1 file (Default.rdl)
  - 4.3.7. **SubReports** contains 13.rdl files
  - 4.3.8. **Verbal Order** contains 4 .rdl files
- 4.4. **Scripts** folder contains 9 .rss files. These files are used with the DeployReports.bat utility to deploy the reports.
- 4.5. **Upload Custom Mangement Reports** is empty
- 4.6. **Upload Diagnostic Templates** folder contains 1 subfolder
  - 4.6.1. **SubReports** folder is empty
- 4.7. **Upload Forms** folder contains 1 subfolder.
  - 4.7.1. **SubReports** folder is empty
- 4.8. **eRADDeployReports.bat** - batch file for deploying reports to report server for eRAD customers
- 4.9. **RadnetDeployReports.bat** - batch file for deploying reports to report sever for RadNet
- 4.10. **Adding reports for Deployment.docx** document to assist in added a report to the install process when deploying the reports.

### **6. Intended Audience**

This document is created by the RIS Development team for the RadNet/eRAD RIS Implementation teams.

### **7. Who is affected**

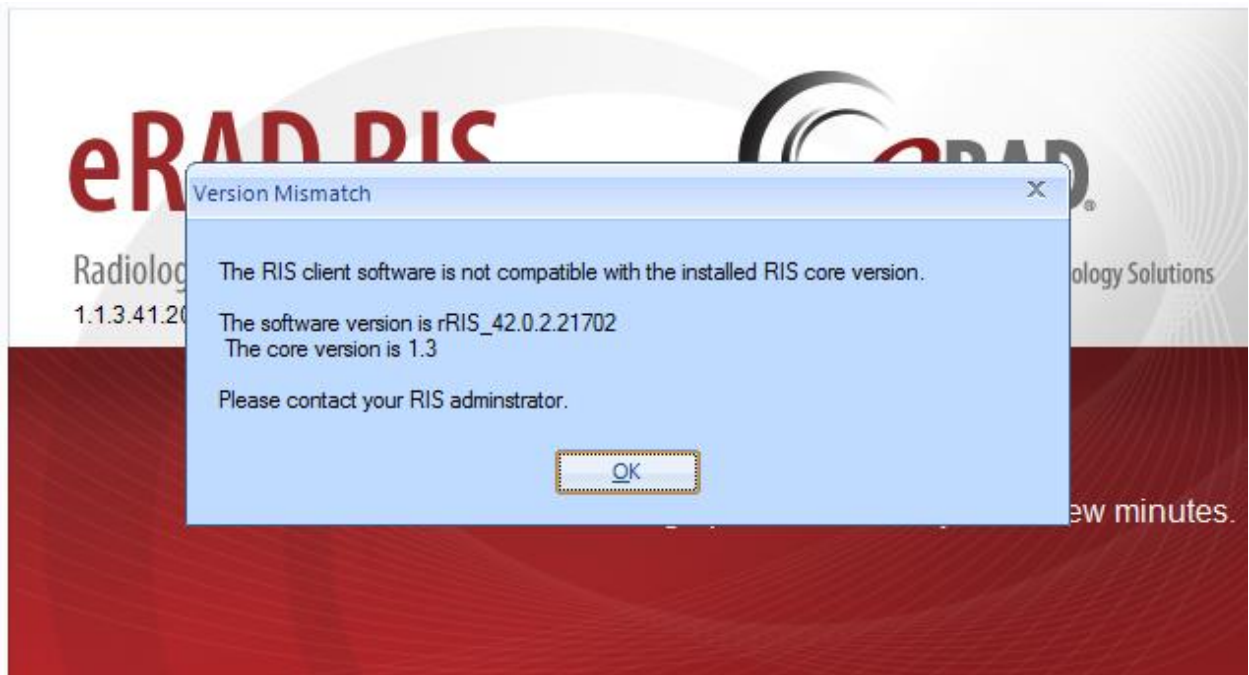
Build 43 installs. Server updates are not cumulative. This server update must be applied to 43.0.6

**8. eRAD RIS Release Version Numbers**

Build	Patch	UI Version	Core Version	WS Version	DB Version	Notes
42.1	-	2.42.1.0.22744(3GB)	2.42.0.0.21261	2.42.1.0.22744	2.42.1.0.22736	GUI.zip, Web Service, DB updates and Management Report Deployment
42.1	1	2.42.1.1.2296(3GB)	2.42.0.0.21261	2.42.1.1.22963	2.42.1.1.22864	GUI.zip, Web Service, DB updates
42.1	2	2.42.1.2.23007(3GB)	2.42.0.0.21261	2.42.1.2.23007	2.42.1.2.23007	GUI.zip, Web Service, DB updates
42.1	3	2.42.1.2.23237(3GB)	2.42.0.0.21261	2.42.1.2.23237	2.42.1.2.23007	GUI.zip, Web Services
42.1	4	2.42.1.4.23348(3GB)	2.42.0.0.21261	2.42.1.4.23348	2.42.1.2.23007	GUI.zip, Web Services
42.1	5	2.42.1.5.23406(3GB)	2.42.0.0.21261	2.42.1.5.23406	2.42.1.2.23007	GUI.zip, Web Services
43	-	2.43.0.0.23715(3GB)	2.43.0.0.23171	2.43.0.0.23715	2.43.0.0.23743	Full Version Release
43	1	2.43.0.1.23798(3GB)	2.43.0.0.23171	2.43.0.1.23798	2.43.0.1.23770	GUI.zip, Web Service, DB updates
43	2	2.43.0.2.24017(3GB)	2.43.0.0.23171	2.43.0.2.24017	2.43.0.2.24023	GUI.zip, Web Service, DB updates and Management Report Deployment
43	3	2.43.0.3.24298(3GB)	2.43.0.0.23171	2.43.0.3.24298	2.43.0.3.24283	GUI.zip, Web Service, DB updates and Management Report Deployment
43	3.1	2.43.0.3.24450(3GB)	2.43.0.0.23171	2.43.0.3.24298	2.43.0.3.24421	GUI.zip and DB updates
43	3.2	2.43.0.3.24450(3GB)	2.43.0.0.23171	2.43.0.3.24298	2.43.0.3.24421a	DB updates
43	4	2.43.0.4.24447(3GB)	2.43.0.0.23171	2.43.0.4.24447	2.43.0.4.24442	GUI.zip, Web Service, DB updates and Management Report Deployment
43	5	2.43.0.5.24632(3GB)	2.43.0.0.23171	2.43.0.5.24632	2.43.0.5.24560	GUI.zip, Web Service and DB updates
43	6	2.43.0.6.24914(3GB)	2.43.0.0.23171	2.43.0.6.24914	2.43.0.6.24914	GUI.zip, Web Service and DB updates
43	6.1	2.43.0.6.24937(3GB)	2.43.0.0.23171	2.43.0.6.24937	2.43.0.6.24914	GUI.zip, Web Service
43	6.2	2.43.0.6.24970(3GB)	2.43.0.0.23171	2.43.0.6.24970	2.43.0.6.24914	GUI.zip, Web Service
43	7	2.43.0.7.25258(3GB)	2.43.0.0.23171	2.43.0.7.25258	2.43.0.7.25226	GUI.zip, Web Service, DB updates and Management Report Deployment

### 9. Installing

- 1) Copy and replace the current rRIS...zip file with the rRIS\_1.3.43.0.7.25258.zip file provided with this release.  
Be sure to make a backup of the ris.exe.config file contained within the current .zip folder.



If you receive the Version Mismatch error above the GUI.zip will need to be renamed to add 1.3. to it. The GUI.zip file name change is from rRIS\_43.0.7.25258 → rRIS\_1.3.43.0.7.25258

NOTE: the GUI.zip included with this release has already been renamed to include 1.3.

This is required for installs that have not reached build 42. Because the software installed on your local workstation is a pre-42 build it detects a version mismatch in the software naming and won't allow the newest build to be launched (it is looking for 1.3. in the name). Once the workstation(s) have reached a build of 42 we will no longer need to add "1.3." to the GUI.zip name. Also note that a core install will not resolve this issue below.

**NOTE:** If your upgrade is coming from 40.016.1 or prior a core install will be required. Versions (builds) of 40.017 and greater do not require a core install as long as you are at least at 40.017 (Core Version 1.3.40.18756)

## eRAD RIS Server Update

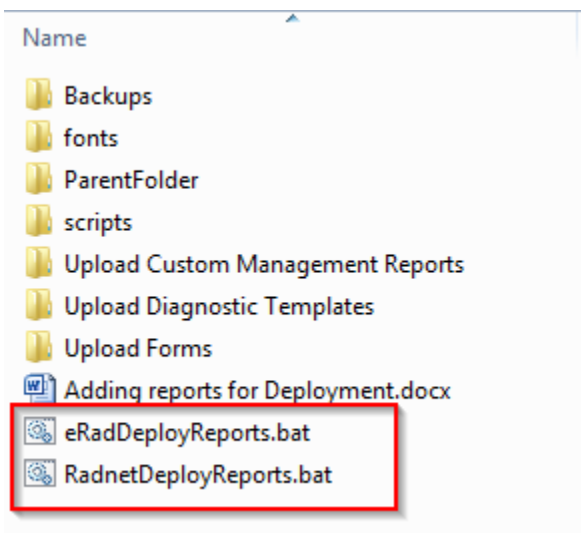
- 2) Stop each service listed below. Copy the files from the RIS Service Updates folder to the directory for each rRISService. Be sure to make backup of all files, but especially the rRISServices.exe.config and rRISServices.vshost.exe.config files.

*rRISService directories include:*

- a) *rRISService*
- b) *CDS rRISService*
- c) *Wedge rRISService*
- d) *DDE rRISService*

**Restart each service.**

- 3) Run the B43.0.7.sql file against the eRAD RIS database instance.
- 4) Management Reports Deployment / SSRSDeployment - There are 2 utilities called **RadnetDeployReports.bat** and **eRadDeployReports.bat** that will deploy the reports to a SQL Server Report Service. This utility is found in the **Build X\SSRSDeployment** folder. Below are the steps on how to use this utility. The purpose for the 2 .bat files are the RadNet one deploys a few extra reports specific to RadNet.



1. Launch the DeployReports.bat file.
2. **Enter report server name [default:<computer\_name>]:**
  - a. A script will run against the server and return a list of all the root folders on that report server  
\*\*By Default this will pull the computer\_name environmental variable from the machine running the script. I suggest running this from the report server for performance anyway.
3. **Enter root folder to deploy reports [default: production]:**

## **eRAD RIS Server Update**

- a. This will create a new root if the name you give doesn't exist, or it will simply publish below the root of the folder if it does already exist. We typically will use "production" for the installation folder. Note: The script forces the root name to be lowercase.  
\*\*Default is suggested to be production, but you may need to change it based on the environment you are deploying to. Ie: testserver might be called something else.
4. **Do you wish to create a backup of the existing reports?:**
  - a. This will create a file backup of the report directory specified in the same directory deploy.bat is being run from inside a folder called Backups where it will create a folder based on datetime of backup. Ie: 04172014\_110605 (MMDDYYYY\_HHMISS).
5. **Do you wish to deploy core management reports?**
  - a. If you enter "y", it will redeploy the core management reports
6. **Do you wish to upload Forms?**
  - a. If you enter "y", the script will deploy any .rdl files into the installations Forms folder that you have previously saved into the script folder called "Upload Forms" including the folder below it called SubReports.
7. **Do you wish to upload Diagnostic Templates?**
  - a. If you enter "y", the script will deploy any .rdl files into the installations Diagnostic Templates folder that you have previously saved into the script folder called "Upload Diagnostic Templates" including the folder below it called SubReports.
8. **Do you wish to upload Custom Management Reports?**
  - a. Entering "Y" will copy any .rdl files you've copied under the deployment folder called Upload Custom Management Reports onto the server under Management Reports\Custom\Uploads directory
9. **Do you wish to create a datasource?**
  - a. If you select "y" you will get prompted for more information about the datasource you wish to create. You only need to create a datasource, if this is a new installation. No need to do this if you are upgrading an existing installation. The datasource gets created in the root of the folder from step 3. The datasource will be called RISDataSource.

If you chose to create a datasource, the following steps will be requested to complete the connection string.

1. **Enter database server name:**
    - a. This is the name of the physical database server  
ex. MYSERVER-1
  2. **Enter database name:**
    - a. This is the name of the database on the database server  
ex. rRIS\_Site
-

## **eRAD RIS Server Update**

3. **Enter report schema user name:** ex. The account that the datasource will use to connect to the database ie: SA. (For security reasons “sa” is not recommended)
4. **Enter report schema password:**

The results of deployment will be written to log.txt in the same folder as the DeployReports.bat file.