



# **CODONICS**



***Integrity® Reference Guide***



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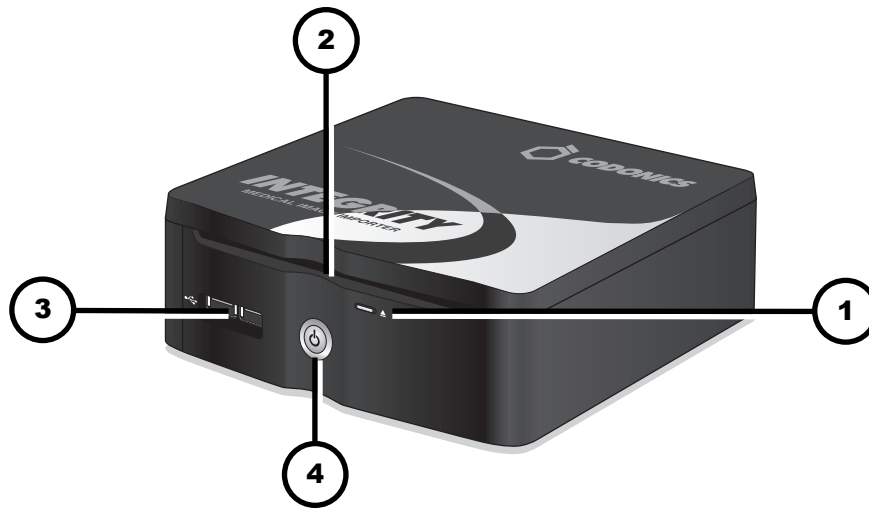
# Components

## Unpacked Components



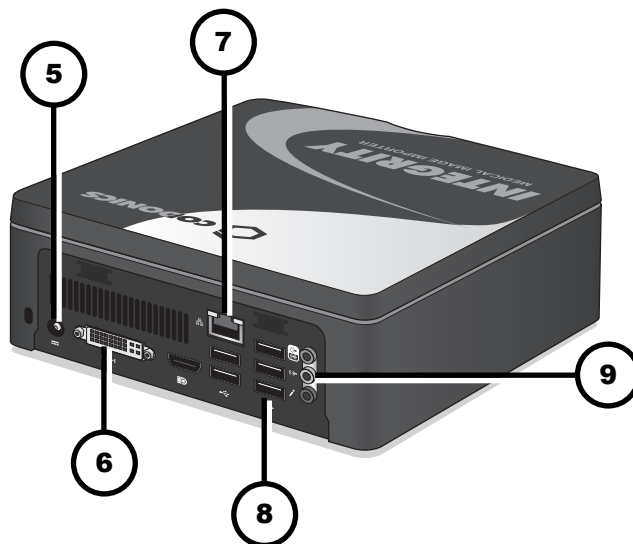
1. Integrity
2. Speaker and speaker-USB cable
3. DVI-to-VGA monitor adapter
4. Power supply
5. Power cord
6. Ethernet cable
7. SmartDrive
8. Installation disc/Operating Software
9. User's Manual disc

## **Integrity Front**



- 1. CD/DVD Eject button
- 2. CD/DVD slot
- 3. USB Connectors
- 4. Power button

## **Integrity Back**



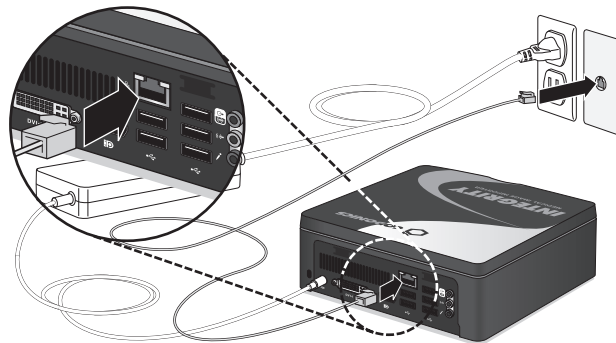
- 5. Power connector
- 6. Monitor connector  
(monitor is optional)
- 7. Ethernet connector
- 8. USB connectors
- 9. Audio Out connector

# Hardware Setup

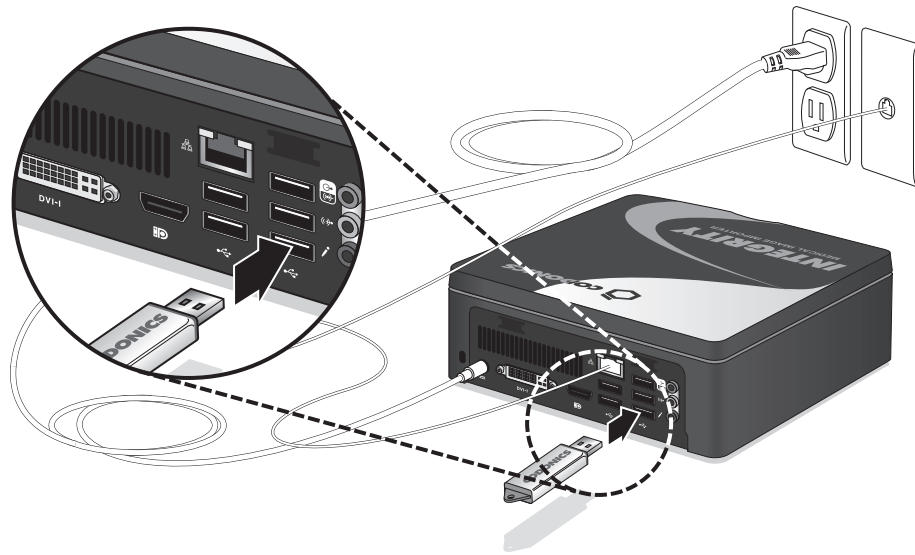
1. Unpack hardware and remove any packing material.
2. Place Integrity on a solid level surface.



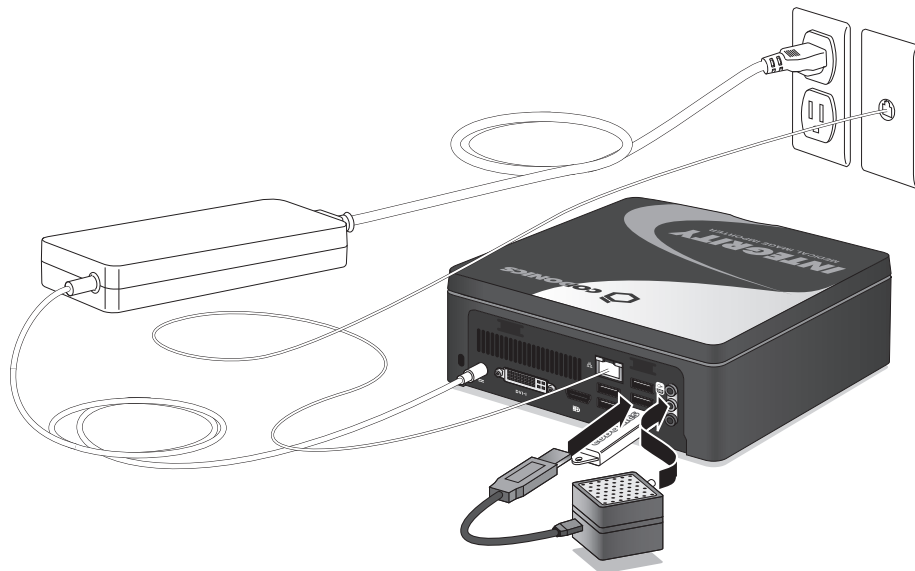
3. Connect the power supply.



4. Connect the Ethernet cable.



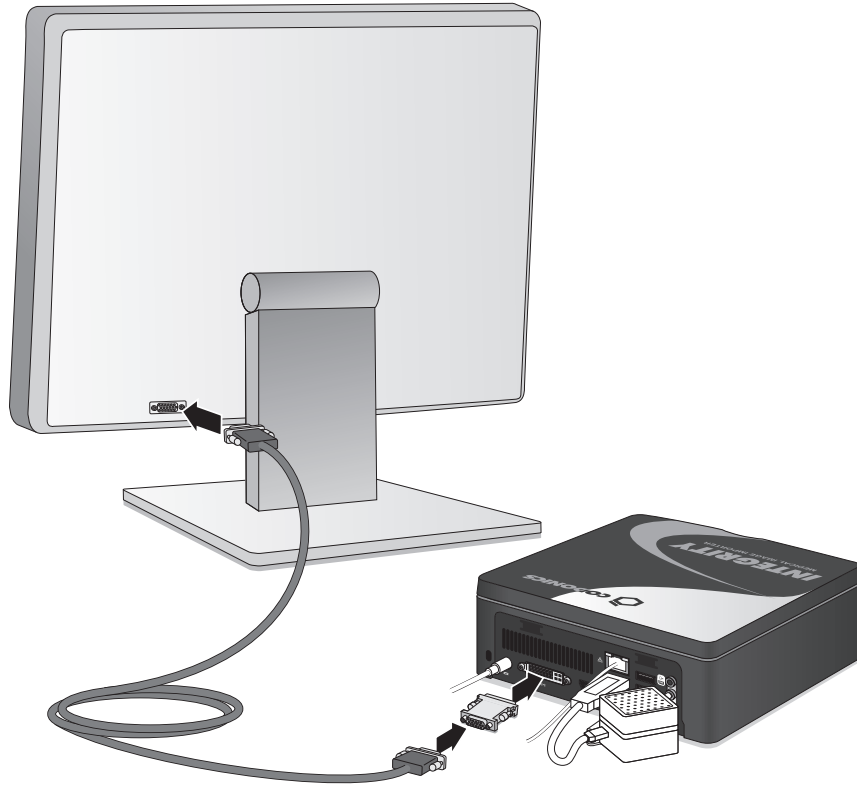
**5. Insert the SmartDrive.**



**6. Connect the speaker using the speaker-USB cable. Turn on the speaker.**



## **Monitor, Keyboard, and Mouse (Optional)**



1. Connect the monitor.

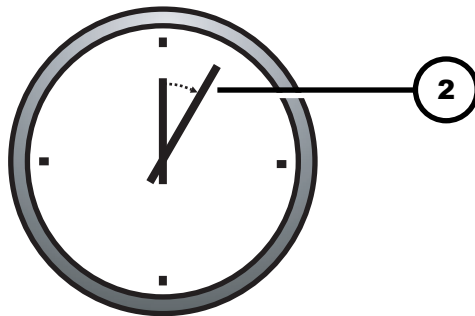


2. Connect the keyboard and mouse.

# Startup



1. Press the Integrity Power button.



2. Wait 3 to 5 minutes for startup to complete.

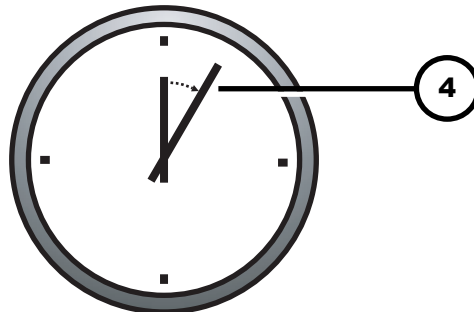
An audible tone indicates when the Integrity application is running, users can log in, and discs can be imported.

# Shutdown

1. Wait for all Integrity activity to complete.
2. Log out of all user sessions.



3. Press the Integrity Power button.



4. Wait 1 minute for shutdown to complete.

# Configuration

## ***Move the SmartDrive to a PC***

1. Shut down Integrity.
2. Remove the SmartDrive.
3. Insert the SmartDrive in a Windows PC.

## ***Set Up the Network Profile***

1. On the SmartDrive, open the file:  
    \network\network.default.txt
2. Enter the IP addresses for: ipAddress, gateway, and netmask.

### ***Sample for Network Profile***

```
[ NetworkProfile]
networkProfileName_ = default
ipAcquisitionType_ = dynamic
ipAddress_ = 192.168.1.201
gateway_ = 192.168.1.1
netmask_ = 255.255.255.0
networkName_ = CODONICS_INTEGRITY
port_ = 104
isBehindFirewall_ = false
doUseDefaultNetworkName_ = true
speedDuplex_ = 0
firewallEnabled_ = false
httpFirewallPortOpen_ = true
telnetFirewallPortOpen_ = false
smbFileShareFirewallPortOpen_ = true
ipAliasingEnabled_ = false
```

## Set Up a Query Server Profile

1. If using a Modality Worklist, open and edit the SmartDrive file:

`\profiles\reconciler\queryserver.mwlwithsps.txt`

### Sample for Modality Worklist (MWL) Server

```
[ QueryServerProfile ]
host = IP Address
port = 104
queryType = MWL
calledAeTitle = MWL_SCP_AE
callingAeTitle = MWL_SCU_AE
useMatchRule = ExactNameDobSex
useMatchRule = LastNameDobSex
useMatchRule = DobSex
maxNumberOfMatches = 100
```

2. If using a PACS style Query, open and edit the SmartDrive file:

`\profiles\reconciler\queryserver.qr.txt`

### Sample for Query/Retrieve (Q/R) Server

```
[ QueryServerProfile ]
host = IP Address
port = 104
queryType = QR_STUDY_ROOT
calledAeTitle = QR_SCP_AE
callingAeTitle = QR_SCU_AE
useMatchRule = ExactNameDobSex
useMatchRule = LastNameDobSex
useMatchRule = DobSex
maxNumberOfMatches = 100
```

## Set Up the Reconciler Profile

On the SmartDrive, edit the file:

`\profiles\reconciler\reconciler.default.txt`

### Sample for Reconciler Profile

```
[ ReconcilerProfile ]
queryServer = NameOfServer
fieldToCopyFromServer = Specific Character Set
fieldToCopyFromServer = Patient Name
fieldToCopyFromServer = Patient ID
fieldToCopyFromServer = Patient DOB
fieldToCopyFromServer = Patient Sex
fieldToCopyFromServer = Accession #
stopAfterMatch = false
```

where *NameOfServer* is either *mwlwithsps*, *qr*, or the name included in the filename of *queryserver.NameOfServer.txt*.

## **Create a Destination Profile**

1. On the SmartDrive, edit existing profiles or copy the file:  
    \profiles\storeclient\destination.default.txt
2. Name the file destination.*DestName*.txt.
3. Edit the new Destination profile file.
4. Repeat for each destination.

### **Sample for Destination Profile**

```
[ DestinationProfile ]
host = IP Address
port = 104
calledAeTitle = PACS_Archive_AE
callingAeTitle = Integrity
doStoreCommit = FALSE
includeContributingEquipmentSequence = TRUE
```

## **Create a Destination Group Profile**

NOTE: A destination group profile is required for one or more destinations.

1. On the SmartDrive, edit existing profiles or copy the file:  
    \profiles\storeclient\destinationgroup.default.txt
2. Name the file destination.*DestGroupName*.txt.
3. Edit the new Destination Group profile file to include each destination in this group.
4. Repeat for each group of destinations.

### **Sample for Destination Group Profile**

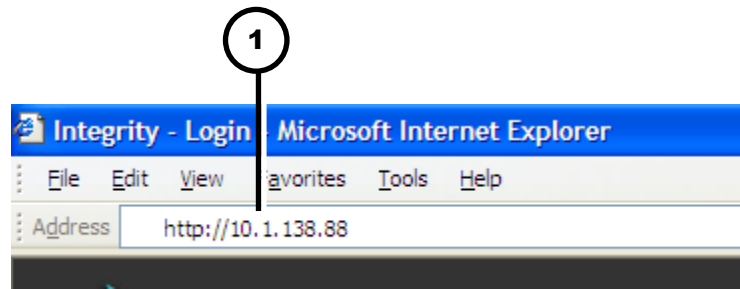
```
[ DestinationGroupProfile ]
destinationProfile = DestName
destinationProfile = DestName
```

where *DestName* is the name included in the filename destination.*DestName*.txt file.

## **Move the SmartDrive Back to Integrity**

1. Remove the SmartDrive from the PC.
2. Insert the SmartDrive in Integrity.
3. Power on Integrity.

## Log in as Administrator



1. Enter the Integrity IP address in a customer-supplied PC web browser.  
The Integrity Login screen displays.



2. Type admin.
3. Type codonics.
4. Click the Log In button.

## Set Default User Passwords



1. Click the Setup button.
2. Click the Users tab.
3. Scroll to the desired user.
4. Enter the new password.
5. Enter the new password again.
6. Click the Save button.



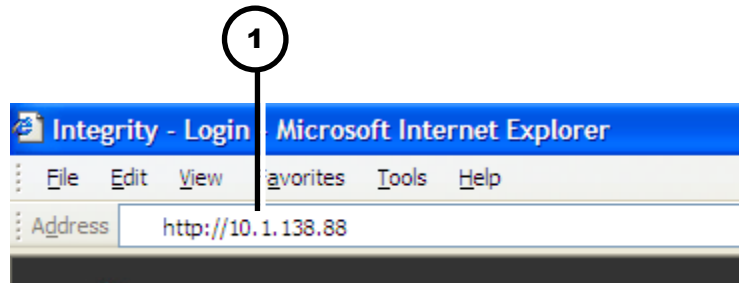
## Set Up the Date and Time



1. Click the Date & Time tab.
2. Enter the Date.
3. Enter the Time.
4. Click the Save button.

# Operation

## Opening a User Session



1. Enter the Integrity IP address in a customer-supplied PC (i.e., a computer on the network) web browser.

The Integrity Login screen displays.



2. Type a login name.
3. Type the password.
4. Click the Log In button.

The Studies screen displays (refer to the Studies screen on page 16).

## Importing a CD/DVD



1. Insert the CD/DVD.



2. The Studies screen displays the CD/DVD read status.
3. Integrity will automatically eject the CD/DVD if successful.  
Integrity will beep and will not eject the CD/DVD if an error occurs.

## Reconciling and Storing a Study

The screenshot shows the CODONICS interface. At the top left is the CODONICS logo. To the right, there is a user status bar showing 'a\_smith', 'Ready', '3/14/08', and '2:23 PM', along with a 'Log Out' button. Below this is a navigation bar with 'Studies', 'Setup', 'Utilities', and 'Help'. The 'Studies' section is active, showing a filter bar with 'New', 'Reconciled', 'Stored', and 'All'. A table lists studies with columns for Patient, Study Description, Modality, Study Date, DOB (Sex), Status, and Actions. The study for 'TARBET, MARY' is selected. At the bottom, there are buttons for 'Delete...', 'Store', and 'Reconcile'.

Patient	Study Description	Modality	Study Date	DOB (Sex)	Status	Actions
RHOAN, JAMES	BRAIN	IO (2)	3/14/08	9/15/64 (M)	Ready	
<input checked="" type="checkbox"/> TARBET, MARY	HEART	XC (2)	3/13/08	9/11/54 (F)	Ready	

1 of 2 selected Page 1 of 1

Delete... Store Reconcile

1. Click the Studies button.
2. Click the New filter button.
3. Select a study with Ready status.
4. Click the Reconcile button.

**Reconcile**

Search Results: 1 of 5

Original Data	Search Result Data	Updated Data
TARBET^MARY	TARBET^MARY	Patient Name: TARBET^MARY
000000 03132008143812	12345-67890	Patient ID: 12345-67890
19540911	19540911	Patient DOB: 19540911
F	F	Patient Sex: F
000000 03132008143812		Study ID: 000000 03132008143812
20080313		Study Date: 20080313
000000 03132008143812		Accession Number: 000000 03132008143812
LUNG		Study Description: LUNG
BELLARD		Referring Physician: BELLARD

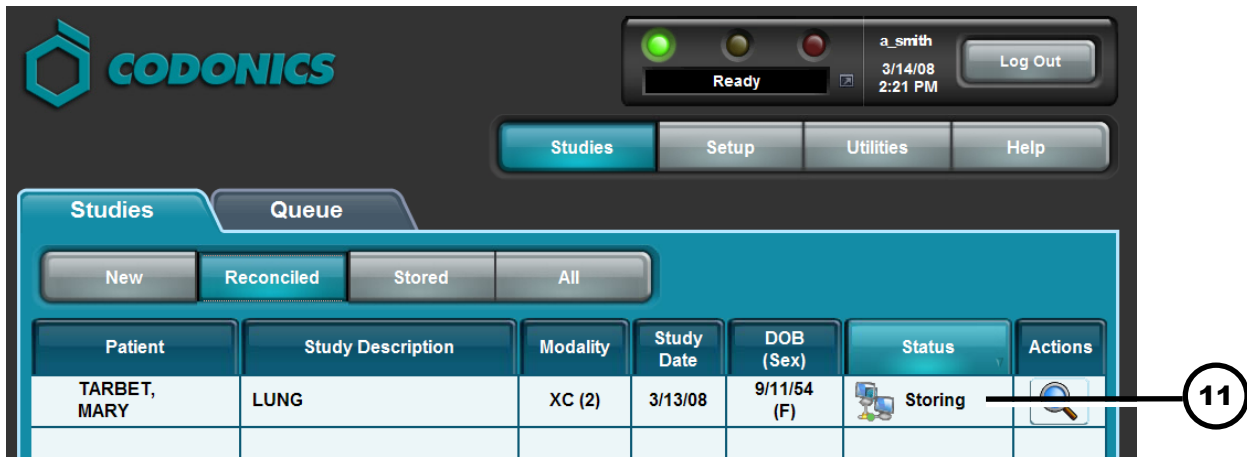
Store to: default

Buttons: Store, Save, Cancel

5. Review the study information from the CD/DVD in the Original Data column.
6. Review the study information from the modality worklist server in the Search Result Data column.
7. If required, select a different match using the Search Results arrows.
8. If required, edit the Updated Data column fields:
  - Click the Imported Data or Search Results Data field to copy that information to the Updated Data field.

OR

  - Manually type in the Updated Data field.
9. Select the DICOM Store destination using the arrows.
10. Click the Store button to store the study.

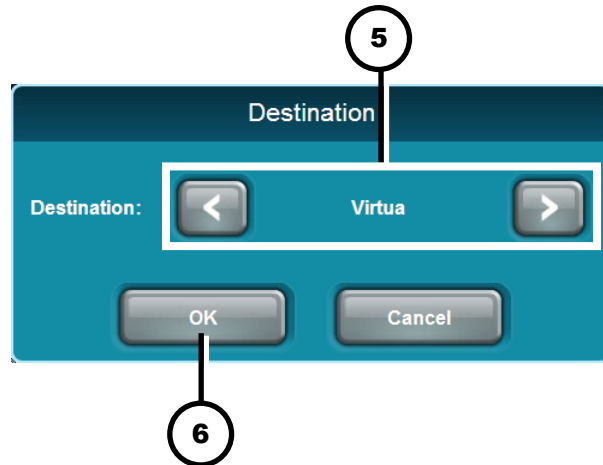


11. The study status changes to Storing.

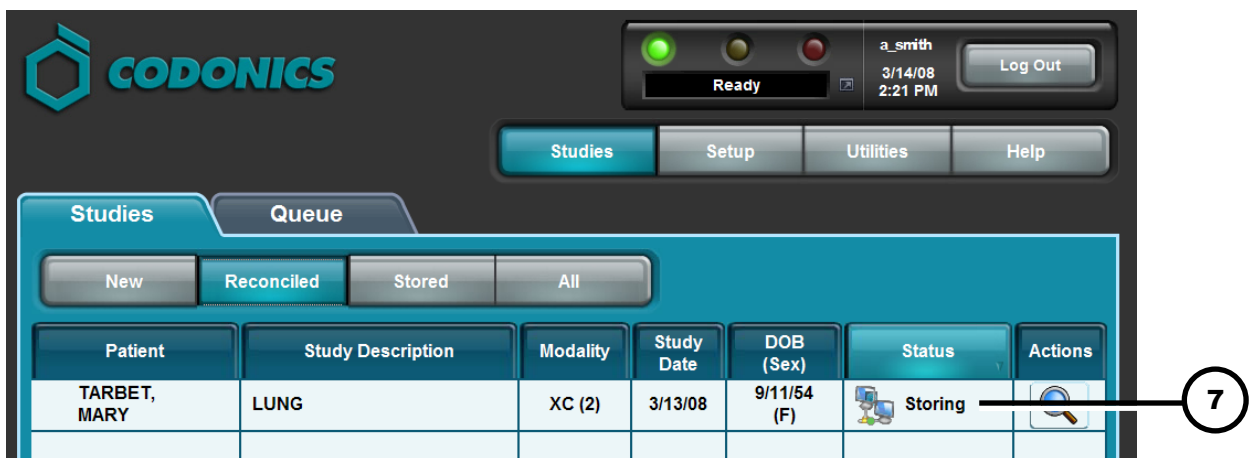
### **Storing a Study Directly from the Studies Screen**



1. Click the Studies button.
2. Select a filter.
3. Select the studies to be stored.
4. Click the Store button.



5. Select the DICOM Store destination using the arrows.
6. Click the OK button to store the studies.



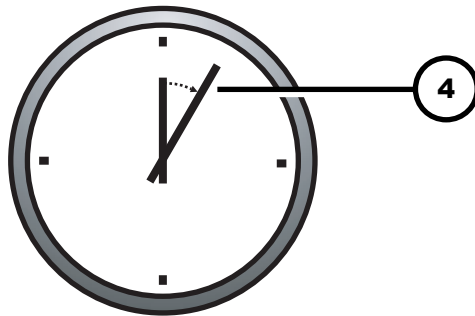
7. The study status changes to Storing.

## **Software Installation**

1. Wait for all Integrity activity to complete.
2. Log out of all user sessions.



3. Press the Integrity Power button.

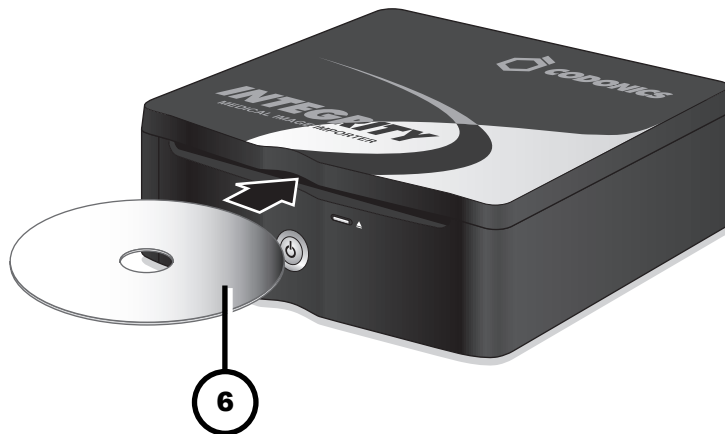


4. Wait 1 minute for shutdown to complete.

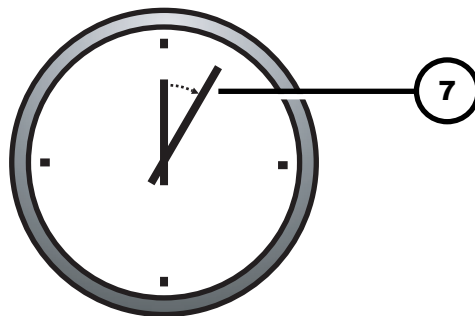




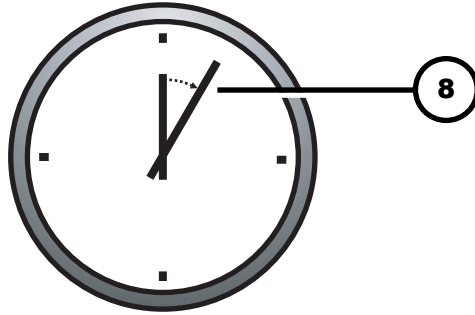
5. Press the Integrity Power button.



6. Immediately insert the Operating Software disc.



7. The Operating System disc will eject after 20 minutes.

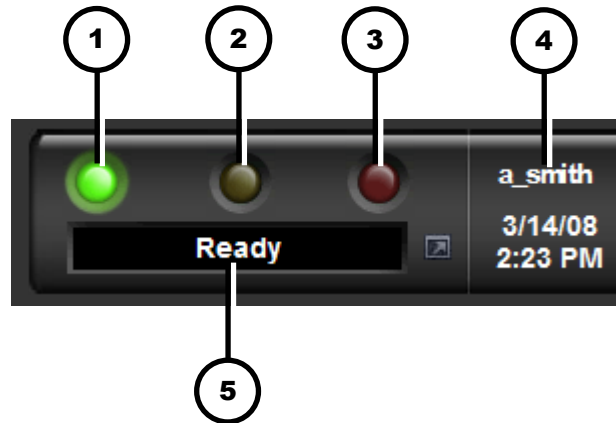


8. Wait 30 to 60 minutes for installation to complete.

An audible tone indicates when the Integrity application is running, users can log in, and discs can be imported.

## Dashboard Indicators

NOTE: Dashboard indicators are displayed from a web browser in a customer-supplied PC.



1. On: Ready.  
Flashing: Processing.
2. Alert condition: Device can still process jobs but requires user attention.
3. Fault condition: Device cannot process jobs and requires user attention.
4. Logged in user.
5. Processing status, alert, or fault description.

# Troubleshooting

<b>Problem</b>	<b>Solutions</b>
Integrity startup fails.	Check the power cable. Verify SmartDrive is connected.
Login fails.	Verify username and password. Verify password case (upper-case and lower-case).
Network not responding.	Check network settings. Verify network cable is connected. Verify SmartDrive is connected.
Integrity is not responding.	Verify that Integrity is powered on. Cycle power to Integrity.
Display shows read error. CD/DVD does not eject after read; Integrity continuously beeps.	Verify CD/DVD is IHE-PDI compliant. Verify CD/DVD contains DICOM data. Verify CD/DVD is not scratched or damaged. Click anywhere in the Dashboard to display the status details and see if a virus has been detected.
Audible tone is not being sounded when errors occur or Integrity successfully starts up.	Make sure that the speaker is connected to Integrity and turned on.
Reconciling studies have unexpected results.	Make sure you are logged in using one of the standard user names.
System responses are slow.	Wait for jobs to complete. Reduce the number of web connections being utilized by Integrity users. Delete unnecessary studies. Perform a fresh Integrity software installation.

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