
ZENworks® Reporting 5.6.1

ZENworks Reporting Appliance

Deployment and Administration Reference

December 2015

Legal Notices

Novell, Inc. makes no representations or warranties with respect to the contents or use of this documentation, and specifically disclaims any express or implied warranties of merchantability or fitness for any particular purpose. Further, Novell, Inc. reserves the right to revise this publication and to make changes to its content, at any time, without obligation to notify any person or entity of such revisions or changes.

Further, Novell, Inc. makes no representations or warranties with respect to any software, and specifically disclaims any express or implied warranties of merchantability or fitness for any particular purpose. Further, Novell, Inc. reserves the right to make changes to any and all parts of Novell software, at any time, without any obligation to notify any person or entity of such changes.

Any products or technical information provided under this Agreement may be subject to U.S. export controls and the trade laws of other countries. You agree to comply with all export control regulations and to obtain any required licenses or classification to export, re-export or import deliverables. You agree not to export or re-export to entities on the current U.S. export exclusion lists or to any embargoed or terrorist countries as specified in the U.S. export laws. You agree to not use deliverables for prohibited nuclear, missile, or chemical biological weaponry end uses. See the [Novell International Trade Services Web page \(http://www.novell.com/info/exports/\)](http://www.novell.com/info/exports/) for more information on exporting Novell software. Novell assumes no responsibility for your failure to obtain any necessary export approvals.

Copyright © 2015 Novell, Inc. All rights reserved. No part of this publication may be reproduced, photocopied, stored on a retrieval system, or transmitted without the express written consent of the publisher.

Novell, Inc.
1800 South Novell Place
Provo, UT 84696
U.S.A
www.novell.com

Online Documentation: To access the latest online documentation for this and other Novell products, see [the Novell Documentation Web page \(http://www.novell.com/documentation/\)](http://www.novell.com/documentation/).

Novell Trademarks

For Novell trademarks, see [the Novell Trademark and Service Mark list \(http://www.novell.com/company/legal/trademarks/tmlist.html\)](http://www.novell.com/company/legal/trademarks/tmlist.html).

Third-Party Materials

All third-party trademarks are the property of their respective owners.

Contents

About This Guide	5
1 Overview	7
2 System Requirements	9
3 Appliance Deployment	11
3.1 Deploying the Appliance	11
3.2 Configuring the Appliance Settings	12
4 ZENworks Reporting Configuration	13
4.1 Configuring ZENworks Reporting	13
4.2 Reconfiguring ZENworks Reporting	19
5 Appliance Management	27
5.1 Ganglia Configuration	28
5.2 Ganglia Monitoring	28
5.3 Network	28
5.4 Time	29
5.5 Storage	29
5.6 System Services	29
5.6.1 Starting, Stopping, or Restarting System Services	30
5.6.2 Setting System Services to Automatic or Manual	30
5.7 Firewall	30
5.8 Administrative Passwords	30
5.9 Field Patch	31
5.10 Online Update	31
5.11 Shutting Down and Restarting ZENworks Reporting Appliance	32
6 ZENworks Reporting System Management	33
6.1 ZENworks Reporting Configuration	34
6.2 Terminal and File Explorer	36
6.2.1 Terminal	36
6.2.2 File Explorer	37
6.3 Logs	38
6.4 ZENworks Reporting Backup	40
7 ZENworks Reporting Migration	41
7.1 Creating the ZENworks Reporting data file	41
7.2 Deploying and Configuring the ZENworks Reporting 5.6.1 Appliance	42
7.3 Migrating the ZENworks Reporting 5 data to the ZENworks Reporting 5.6.1 Appliance	42

8 Jaspersoft Studio	45
8.1 Installing Jaspersoft Studio 5.6.	45
8.2 Connecting Jaspersoft Studio 5.6 to ZENworks Reporting	46
8.2.1 Copying the ZENworks Reporting Certificate	47
A Troubleshooting	49

About This Guide

This *Novell ZENworks Reporting Virtual Appliance Deployment and Administration Reference* helps you to deploy and configure ZENworks Reporting Appliance to the ZENworks Reporting supported virtual infrastructure.

The information in this guide is organized as follows:

- ♦ Chapter 1, “Overview,” on page 7
- ♦ Chapter 2, “System Requirements,” on page 9
- ♦ Chapter 3, “Appliance Deployment,” on page 11
- ♦ Chapter 4, “ZENworks Reporting Configuration,” on page 13
- ♦ Chapter 5, “Appliance Management,” on page 27
- ♦ Chapter 6, “ZENworks Reporting System Management,” on page 33
- ♦ Chapter 7, “ZENworks Reporting Migration,” on page 41
- ♦ Chapter 8, “Jaspersoft Studio,” on page 45
- ♦ Appendix A, “Troubleshooting,” on page 49

Audience

This guide is intended for ZENworks Reporting administrators.

Feedback

We want to hear your comments and suggestions about this manual and the other documentation included with this product. Please use the User Comments feature at the bottom of each page of the online documentation.

Additional Documentation

ZENworks Reporting is supported by other documentation (in both PDF and HTML formats) that you can use to learn about and implement the product. For additional documentation, see the [ZENworks 11 SP4 documentation Web site \(http://www.novell.com/documentation/zenworks114\)](http://www.novell.com/documentation/zenworks114).

1 Overview

ZENworks Reporting 5.6.1 is available as a virtual appliance that can be deployed to a supported virtual infrastructure. ZENworks Reporting Appliance is built on a customized SUSE Linux Enterprise Server (SLES), and comes pre-installed with ZENworks Reporting 5.6.1 and thus helps save on operating system license costs.

After deployment, ZENworks Reporting can be re-configured by using an easy to use web based console. Also, the same console can be used to maintain ZENworks Reporting Appliance and perform basic tasks such as executing commands, starting and stopping services, viewing logs, uploading, and downloading files. You can also tweak basic server settings and monitor the server performance.

Appliance supports `root` and `zenadmin` users. The `root` user has all privileges on the Appliance and ZENworks Reporting. The `zenadmin` user has privileges only on ZENworks Reporting.

The `root` user has the following privileges:

- ♦ **On Appliance**
 - ♦ Ganglia Configuration
 - ♦ Ganglia Monitoring
 - ♦ Network
 - ♦ Time
 - ♦ Storage
 - ♦ System Services
 - ♦ Firewall
 - ♦ Administrative Passwords
 - ♦ Field Patch
 - ♦ Online Update
 - ♦ Shutting Down and Restarting ZENworks Reporting Appliance
- ♦ **On ZENworks Reporting**
 - ♦ ZENworks Reporting Configuration
 - ♦ Terminal and File Explorer
 - ♦ Logs
 - ♦ ZENworks Reporting Backup

The `zenadmin` user has the following privileges:

- ♦ **On Appliance**
 - ♦ Ganglia Configuration
 - ♦ Ganglia Monitoring
 - ♦ System Services
 - ♦ Administrative Passwords
 - ♦ Field Patch

- ♦ Online Update
- ♦ Shutting Down and Restarting ZENworks Reporting Appliance
- ♦ **On ZENworks Reporting**
 - ♦ ZENworks Reporting Configuration
 - ♦ Terminal and File Explorer
 - ♦ Logs
 - ♦ ZENworks Reporting Backup

2 System Requirements

ZENworks Reporting Appliance is a 64-bit (x86_64) virtual machine. The following sections provide the requirements for deploying ZENworks Reporting Appliance onto a virtual infrastructure:

Table 2-1 ZENworks Reporting Appliance Requirements

Item	Requirements
Hypervisor	<ul style="list-style-type: none">◆ Citrix XenServer 5.x, 6.2, and 6.5◆ XenServer on SLES 11 SP3 and SLES 12◆ VMware ESXi 5.x and 6.x◆ Microsoft Hyper-V 2008 R2, 2012 R2
Virtual Machine Configuration	<p>Appliance requires the following minimum configuration that have been preconfigured by default:</p> <ul style="list-style-type: none">◆ RAM: 8 GB minimum◆ Disk Space: 60 GB minimum◆ CPU Cores: 2 <p>ZENworks Reporting require two hard disks. One hard disk of size 60 GB is pre-configured with the Appliance that contains the operating system and the other hard disk of size minimum 15 GB should be added for the ZENworks data.</p> <p>Depending on your requirement, you can increase the pre-configured disk space after deploying ZENworks Reporting Appliance.</p>
User Source	<p>ZENworks Reporting can be configured to use Microsoft Active Directory or Novell e-Directory user source.</p> <p>User with LDAP credentials can log in to ZENworks Reporting. User management is not possible through the ZENworks Reporting server.</p> <ul style="list-style-type: none">◆ Supported Authoritative User Sources<ul style="list-style-type: none">◆ Novell eDirectory 8.7.3 or 8.8◆ Microsoft Active Directory (as shipped with Windows 2000 SP4 or later)◆ LDAP user access: ZENworks Reporting requires user with minimum Read-only access to the LDAP directory◆ LDAP Authentication: Simple bind authenticates the user, and allows user to access the application. <p>Simple bind is where an application provides a Distinguished Name (DN) and password for that DN. To use a simple bind, the client must supply the DN of an existing LDAP entry and a password that matches the user password attribute for that entry.</p>

Item	Requirements
IP Address	The server must have a static IP address or a permanently leased DHCP address.
Database	<p>The following are the supported databases:</p> <ul style="list-style-type: none"> ♦ Microsoft SQL Server 2008 R2, 2008 SP2, 2012, and 2014 ♦ Oracle 11.2.0.4 Standard and Enterprise Edition, 11.2.0.4 RAC, 12c (12.1.0.1 and 12.1.0.2) ♦ Sybase SQL Anywhere 12 <p>For more information, see Database Requirements in the System Requirements.</p>
Web Browser	<p>The following are supported web browsers for the Appliance console:</p> <ul style="list-style-type: none"> ♦ Internet Explorer version 10 and 11 ♦ Firefox ESR version 31.4 and 31.5 ♦ Firefox version 30 onwards (including any patches)
Supported Languages	<p>These are the supported languages for the Appliance console:</p> <ul style="list-style-type: none"> ♦ English - en ♦ French - fr ♦ German - de ♦ Italian - it ♦ Japanese - ja ♦ Portuguese (Brazilian) ♦ Simplified Chinese - zh_CN ♦ Traditional Chinese - zh_TW ♦ Spanish - es

3 Appliance Deployment

To deploy ZENworks Reporting Appliance, perform the tasks in the following sections:

- ♦ [Section 3.1, “Deploying the Appliance,” on page 11](#)
- ♦ [Section 3.2, “Configuring the Appliance Settings,” on page 12](#)

3.1 Deploying the Appliance

To deploy ZENworks Reporting Appliance, perform the following:

- 1 Ensure that the hypervisor to which you want to deploy ZENworks Reporting Appliance meet the requirements listed in [Chapter 2, “System Requirements,” on page 9](#).
- 2 Download the ZENworks Reporting Appliance file from the [Novell Download](#) website.

Based on your hypervisor, download any of the following files:

- ♦ **VMware ESXi:** Download the .ova file.
- ♦ **Microsoft Hyper-V:** Download the .vhd file.
- ♦ **Citrix XenServer:** Download the .ova file.
- ♦ **XenServer on SLES:** Download the .tar.gz file.

- 3 Deploy the ZENworks Reporting Appliance to a hypervisor by using the downloaded (.ova, .vhd, or .tar.gz) file.

By default, the VMware tools are installed at the first boot of ZENworks Reporting Virtual Appliance. If the internet connection is not available during the first boot, then whenever the internet connection is available execute the `install_vmware_tools` script located at `/opt/novell/va_install`.

- 4 (Optional) Take a snapshot of the virtual machine that you created.

To save the state and data of a virtual machine at a specific point in time.

- 5 After deploying ZENworks Reporting Appliance, you must add a hard disk before you power on the Virtual Machine.

IMPORTANT: To migrate from ZENworks Reporting 5 to ZENworks Reporting 5.6.1 do not configure the appliance, continue with [Chapter 7, “ZENworks Reporting Migration,” on page 41](#).

- 6 To configure the appliance, continue with the [Section 3.2, “Configuring the Appliance Settings,” on page 12](#).

3.2 Configuring the Appliance Settings

To configure the appliance settings, perform the following:

- 1 On the License Agreement page, select the required **License Language** and **Keyboard Language**, then click **Accept**.
- 2 On the Passwords and Time Zone page, specify the following information:
 - ♦ **Root Password and Confirmation:** The root password for ZENworks Reporting Appliance.
 - ♦ **zenadmin Password and Confirmation:** The zenadmin password for ZENworks Reporting Appliance.
 - ♦ **NTP Server:** The IP address or DNS name of the external Network Time Protocol (NTP) server.
 - ♦ **Optional NTP Server:** The IP address or DNS name of the external Network Time Protocol (NTP) server.
 - ♦ **Region:** The local region.
 - ♦ **Time Zone:** The local time zone.
- 3 Click **Next**.
- 4 On the Network Settings page, specify the following information:
 - ♦ **Hostname:** The Fully Qualified Domain Name (FQDN) associated with the appliance IP address. For example, `server.domain.com`.
The hostname must be resolveable, or some features in ZENworks Reporting do not work properly. Server names must support the DNS requirements, or the ZENworks Reporting login fails. Acceptable characters are the letters a-z (uppercase and lowercase), numbers, and the hyphen (-).
 - ♦ **Obtain IP Address using DHCP:** Select this option to get the IP Address using DHCP address. If you select this option **IP Address** and **Networks Mask** will be disabled.
 - ♦ **IP Address:** The server must have a static IP address or a permanently leased DHCP address.
 - ♦ **Network Mask:** The network mask associated with the appliance IP address.
 - ♦ **Gateway:** The IP address of the gateway on the subnet where ZENworks Reporting Appliance is located.
 - ♦ **DNS Server:** The IP address of a primary DNS server for your network.
 - ♦ **Optional DNS Server:** The IP address of a primary DNS server for your network.
 - ♦ **Domain Search:** By default, domain that you specified in the **Hostname** field is displayed.
 - ♦ **Optional Domain Search:** The alternate domain.
- 5 Click **Next**.
If you have not added a hard disk after deployment, then a warning message is displayed. In this scenario, you need to power off the virtual machine, add a hard disk, power on, and then continue with [Step 2](#).
- 6 On the Data Store Location page, verify the new hard disk that you added.
- 7 Click **Configure**.
After configuration, URL is displayed in the console. Use the URL (`https://<FQDN>:9443`) for administering the appliance and configuring ZENworks Reporting.
- 8 Continue with the next task, [Chapter 4, "ZENworks Reporting Configuration," on page 13](#).

4 ZENworks Reporting Configuration

The following sections provide the configuration and reconfiguration flow:

- ♦ [Section 4.1, “Configuring ZENworks Reporting,” on page 13](#)
- ♦ [Section 4.2, “Reconfiguring ZENworks Reporting,” on page 19](#)

4.1 Configuring ZENworks Reporting

After deploying the ZENworks Reporting Appliance to a hypervisor, perform the following steps to configure ZENworks Reporting:

- 1 Launch the URL on a supported web browser.

The URL (<https://<FQDN>:9443> or <https://<ipaddress>:9443>) is displayed on the Appliance console.

- 2 Choose the required language. If the web browser supports the selected language, then it displays in that language, else it displays in English.

For information, see [Supported Languages](#) in the [Chapter 2, “System Requirements,” on page 9](#).

- 3 Log in to ZENworks Reporting with the `root` or `zenadmin` credentials that were specified in [Step 2](#), under [Section 3.2, “Configuring the Appliance Settings,” on page 12](#).

When you log in for the first time, you are prompted to configure ZENworks Reporting.

- 4 Verify the prerequisites on the Configure ZENworks Reporting page. You should be prepared with the required information to complete the configuration.

- ♦ Domain specific to your reporting needs
- ♦ Certificate Authority configuration

The ZENworks Reporting server requires a certificate to communicate securely. ZENworks Reporting supports internal and external certificates. If you want to use an internal certificate, it will be automatically generated by ZENworks Reporting. If you want to use an external certificate, you can generate a Certificate Signed Request (CSR) using ZENworks Reporting or by using your organization-specific methods, and then get the signed certificates.

A CSR is encrypted text, provided by a user to the Certificate Authority (CA), through a Secure Sockets Layer (SSL) digital certificate application. The CSR is validated by the CA and a signed certificate is issued.

- 5 Choose **If this is a new ZENworks Reporting server**.
- 6 If you want ZENworks Reporting to generate a CSR, click **Generate CSR**.

If you generate the CSR from this page, the Private Key will be stored on the server.

While configuring ZENworks Reporting, you need to have a signed server certificate, private key, and a CA certificate. To get the signed server certificate, you need to generate a CSR and validate by the CA.

6a Specify the following information.

- ♦ **Common Name (CN):** The Fully Qualified Domain Name of the ZENworks Reporting server. This name should match the server name in the URL, in order for browsers to accept the certificate for SSL communication. For example, `mail.novell.com`.
- ♦ **Organization (O):** Organization name.
- ♦ **Organizational Unit (OU):** Organizational unit name, such as a department or division.
- ♦ **City or Locality (L)**
- ♦ **State or Province (ST)**
- ♦ **Country or Region:** Two-letter country code or region. For example, US.
- ♦ **Key length:** The required key length can be 1024 or 2048.

6b Click **Generate** and download the CSR.

7 Click **Configure new ZENworks Reporting server**.

8 Specify the following to create an administrator account:

- ♦ **Username:** The user name can have a maximum length of 50 characters. It can contain alphanumeric characters and special characters (underscore _ and hyphen -).
- ♦ **Password:** The administrator password is used for logging in to ZENworks Reporting. The password must contain a minimum of six characters.
- ♦ **Confirm Password:** Use this field to confirm a correct password. If there is a mismatch, an error message is displayed after you click **Next**. You must re-enter the correct passwords.

This user will have administrator rights. This administrator account can be used to log into ZENworks Reporting independent of user sources and is given higher priority over any similar user existing in configured user sources.

9 Click **Next**.

Configure Domains

?

Specify one or more domains that you want to use for ZENworks Reporting. You can add domains from ZENworks Management Zone or import domain resource files.

Add

Delete

<input type="checkbox"/>	Domain	Version	Database	Datasource
<input type="checkbox"/>	ZENworks Domain	11.4.0		Oracle
<input type="checkbox"/>	ZENworks Audit Domain	11.4.0		Oracle

Previous

Next

Cancel

- 10** Specify one or more domains that you want to use for ZENworks Reporting. You can add domains from ZENworks Management Zone or import domain resource files.

10a Click **Add**.

10b On the Add Domain page, select how you want to add the domain and configure a datasource.

Add Domain ?

Select how you want to add the domain and configure a datasource.

Add domains from ZENworks Management Zone ▼

Specify the following for a Primary Server in the Management Zone:

Server address:

Port:

Username:

Password:

Domain to add: ☒ ZENworks
☒ Audit (ZENworks 11 SP3 or later)

- ♦ Choose **Add domains from ZENworks Management Zone**, then specify the following:
 - ♦ **Server address:** A valid IP address or a Fully Qualified Domain Name (FQDN) of the ZENworks Primary Server in the Management Zone. This Primary Server will be referenced to download the domain resource file and the required database information to configure the datasource for that domain.
 - ♦ **Port:** The port used by the Primary Server in the Management Zone. The default port is 443.
 - ♦ **Username:** The Management Zone's administrator username for logging in to ZENworks Control Center.
 - ♦ **Password:** The password for the Management Zone's administrator user specified in the Username field.
 - ♦ **Domains to add:** Select the domains that you want to add.

or

You can add domains from the ZENworks Management Zone or upload domain resource files for other Novell products.

Add Domain

Select how you want to add the domain and configure a datasource.

Add domain using resource file

Upload the domain resource file and select the datasource type:

Resource File: **Browse**

Datasource: Sybase

Specify the following for the selected datasource:

Server address:

Port:

Database name:

Username:

Password:

Test

Add **Cancel**

- ♦ Choose **Add domain using resource file**.
 - ♦ **Resource file (*.zip)**: Drag and drop the domain resource file that had been downloaded and is locally available.
 - ♦ **Datasource**: Select the datasource for the uploaded domain.
- If the datasource is a database server, specify the following:
- ♦ **Server Address**: A valid IP address or a Fully Qualified Domain Name (FQDN) of the database server.
 - ♦ **Port**: The port used by the database server.
 - ♦ **Database Name**: The name of the database.
 - ♦ **Username**: The username that has read and write permissions to access the database.
 - ♦ **Password**: A valid password to access the database.
- If your database server is Microsoft SQL Server, then specify the following:
- ♦ **Instance name**: Specify the name of the Microsoft SQL server instance that is hosting the database.

- ♦ **Authentication type:** Select the authentication type.
- ♦ **Domain:** This field is enabled if you select Windows Authentication. Specify the Fully Qualified Domain Name (FQDN) or hostname.

If the datasource is a ZENworks Management Zone, specify the following:

- ♦ **Server address:** A valid IP address or a Fully Qualified Domain Name (FQDN) of the ZENworks Primary Server in the Management Zone. This Primary Server will be referenced to download the domain resource file and the required database information to configure the datasource for that domain.
- ♦ **Port:** The port used by the Primary Server in the Management Zone. The default port is 443.
- ♦ **Username:** The Management Zone's administrator username for logging in to ZENworks Control Center.
- ♦ **Password:** The password for the Management Zone's administrator user specified in the Username field.

10c Click **Test** to check whether the connection to the ZENworks Primary Server is established, then click **Add**.

11 (Optional) Click **Domain** hyperlink to edit a configured domain.

12 Choose the type of Certificate Authority (CA) for the Management Zone.

- ♦ **Internal CA:** The certificate is automatically generated.
- ♦ **External CA:** Choose **Secure certificate (.p12, or .pfx)**, **Root certificate and Server certificate with Private key**, or **Root certificate and Server certificate**.

12a Based on the required certificate, specify the details:

- ♦ **Secure certificate (.p12 or .pfx)**
 - ♦ **Secure certificate:** This certificate stores the server certificate, any intermediate certificate chains, and the private key in a encrypted file, which is password-protected. It supports the .p12 or .pfx file format.
 - ♦ **Password:** Password for the secured certificate file.
- ♦ **Root certificate and Server certificate with Private Key**
 - ♦ **Root certificate:** The top-level certificate in the certificate tree issued by the CA that signed the Server certificate and any intermediate certificate chains. It supports the .pem, .crt, .cer, .der, .p7b, or .p7c file format.
 - ♦ **Server certificate:** It is a signed certificate that is used for the ZENworks server. It supports the .pem, .crt, .cer, .der, .p7b, or .p7c file format.
 - ♦ **Private key:** The private key file that is associated with the signed server certificate. It supports the .der file format.

- ♦ **Root certificate and Server certificate**

To use **Root certificate and Server certificate**, you must have generated a CSR by using the **Generate CSR** link.

- ♦ **Root certificate:** The top-level certificate in the certificate tree issued by the CA that signed the Server certificate and any intermediate certificate chains. It supports the .pem, .crt, .cer, .der, .p7b, or .p7c file format.
- ♦ **Server certificate:** It is a signed certificate that is used for the ZENworks server. It supports the .pem, .crt, .cer, .der, .p7b, or .p7c file format.

12b Click **Finish**.

ZENworks Reporting configuration starts and it might take several minutes. The configuration process will continue in the background even if you close the browser or the browser times out.

After ZENworks Reporting is configured, from the Summary page you can use the **ZENworks Reporting Console** to access the ZENworks Reporting capabilities.

4.2 Reconfiguring ZENworks Reporting

After configuring ZENworks Reporting, you can reconfigure the settings.

To reconfigure the ZENworks Reporting settings:

- 1 On the ZENworks Reporting Appliance home page, click **ZENworks Reporting Configuration**.

ZENworks® Reporting Appliance root | Home | Logout

ZENworks Reporting Configuration ?

Summary Basic Advanced Restart Services

Certificate configuration
Domain configuration
User Source configuration
User Groups configuration
Email Server configuration
Administrator

Configuration Summary Apply Changes

ZENworks Reporting is running. [Open ZENworks Reporting Console](#)

Domains

Domain	Version	Datasource	Database Type
ZENworks Audit Domain	11.4.0		Sybase
ZENworks Domain	11.4.0		Sybase

Outbound Email Server

Server: mail.novell.com
Port: 25
Sender email address:
Use SSL/TLS:

Appliance

Operating system: SUSE Linux Enterprise Server 11 SP3
Processor: Intel(R) Xeon(R) CPU X5675 @ 3.07GHz
Hypervisor: VMware ESXi
RAM: 4 GB

File system

File system	Size	Used	Avail	Use%	Mounted on
rootfs	43 GB	7.5 GB	34 GB	19%	/
devtmpfs	2.0 GB	152 KB	2.0 GB	1%	/dev
tmpfs	2.0 GB	12 KB	2.0 GB	1%	/dev/shm
tmpfs	2.0 GB	0	2.0 GB	0%	/run
Hard disk information:					
/dev/mapper/systemVG-LVRoot	43 GB	7.5 GB	34 GB	19%	/
/dev/mapper/systemVG-LVLM1	7.8 GB	147 MB	7.3 GB	2%	/LVM1
/dev/mapper/systemVG-LVLM2	7.8 GB	147 MB	7.3 GB	2%	/LVM2
/dev/sda1	199 MB	23 MB	166 MB	13%	/boot
/dev/sdb1	16 GB	1.1 GB	14 GB	8%	/vstorage

* indicates configuration modified. Click Apply Changes.

- 2 Click the **Summary** tab and reconfigure the required settings.

- ◆ Click **Configure Certificate Authority**.
 - ◆ Click **Remint** to remint the Internal certificate, if the configured Certificate Authority (CA) is Internal.
 - ◆ Click **Change CA** to change the configured CA. Based on the External CA type, specify the details.
For information, see [Section 4.1, "Configuring ZENworks Reporting," on page 13](#), on [Step 12](#).
 - ◆ Click **View Certificate** to see the certificate details.
- ◆ Click **Configure Domains**.

This page enables you to add or edit domains. To edit configured domain, click on the name. You can choose the latest version or the earlier version of the domain or change the datasource details for that domain.

For information, see [Section 4.1, “Configuring ZENworks Reporting,” on page 13](#), on [Step 10](#).

- ◆ Click **User Source Configuration**.
To add or edit multiple user sources.

Configure User Sources

Add user sources to access ZENworks Reporting. Use Move up (↑) or Move down (↓) to order them. Ordering is required to resolve user conflict if a user is existing across multiple user sources attempts to log into ZENworks Reporting.

Add

Delete

Test

↑

↓

Server	Port	User
<input checked="" type="checkbox"/>	636	cn=admin,o=novell

OK

Cancel

- ◆ Click **Add** to add a user source, specify the following details:

Add User Source ?

Specify the user source details used to log in to ZENworks Reporting.

Server address:

Port: ☐ Use SSL

Username:
cn=ReadOnlyUser,o=mycompany(eDir)
 cn=ReadOnlyUser,dc=organization,dc=com (Active Directory)

Password:

- ♦ **Server Address:** Specify the Fully Qualified Domain Name (FQDN) or IP address of the User Source, which is used for user authentication.
- ♦ **Port:** The default port value is displayed based on the selected SSL. The default SSL port is 636 and the default non-SSL port is 389. If the user source is configured with a different port, other than the above mentioned default ports, then the port must be updated accordingly.
- ♦ **Username:** ZENworks Reporting server needs read-only access to the LDAP directory to authenticate every login attempt. The credentials of this user is used to get read-only access.

Specify the username in distinguished name (DN) format. For example:

- ♦ **Novell eDirectory:** `cn=ReadOnlyUser,o=mycompany`
- ♦ **Microsoft Active Directory:**
`cn=ReadOnlyUser,cn=users,dc=organization,dc=com`

After configuration, if the credentials of this user is modified, ZENworks Reporting server will not be able to access the LDAP directory to authenticate login attempts. You must reconfigure ZENworks Reporting with the new credentials.

Active Directory allows you to create an organization unit (OU) and username with some special characters that are not accepted by the ZENworks Reporting Appliance (the appliance does not proceed further with the unsupported special characters). In this scenario, each of these special characters ; = , + < > " must be appended with a backslash "\". For example, specify `ReadOnly\User` as `ReadOnly\,User`

- ♦ **Password:** Specify the password of the first authentication user.
- ♦ Click **Test** to check whether the connection to the user source is established, then click **Add**.
- ♦ **Delete:** Select the user source that you want to remove and click **Delete**. If a user source is deleted, the users from that user sources cannot have access to ZENworks Reporting.
- ♦ **Test:** Select the user source and click **Test** to check whether the user source is accessible by ZENworks Reporting.
- ♦ **Move up:** Select the user source that you want to step up in the list. This ensures that the user authentication for this user source is attempted with higher priority than those listed below.
- ♦ **Move down:** Select the user source that you want to step down in the list. This ensures that the user authentication for this user source is attempted with lower priority than those listed above.
- ♦ Click **User Groups Configuration**.

To add user groups from the configured user sources so as to get ZENworks Reporting administrator rights for the members of the those groups.

Configure User Groups for Administrator Role?

Specify one or more groups from user sources that you want to assign the administrator role. Users in these groups will have administrator privileges.

Add

Delete

<input type="checkbox"/> Group	User Source
<input type="checkbox"/> cn=adminingroup,o=novell	. . .

OK

Cancel

- ◆ Click **Add** and specify the following to add a LDAP group:

Add Administrator Groups ?

Source

Look in **Browse**

☒ Search sub-folders

Search for

Name	Location
------	----------

OK **Add** **Cancel**

- ♦ **Source:** Select a configured user source.
- ♦ **Look in:** You can search the entire user source or click **Browse** to select a specific search container from the user source. Select the **Search sub-folders** check box to search the container recursively.
- ♦ **Search for:** Specify the name or a few characters that contain the name of the group you want to search and click the search icon. The names of the groups in the search container that contain the search text is displayed. You can select one or more groups from the search results, then click **Ok** to add user groups. Else, click **Add** if you want to configure them and continue.
- ♦ Select one or more groups from the list and click **Delete** to revoke administrator privileges from the users belonging to these administrator groups.
- ♦ Select the **Group** check box to select all the groups from the list and delete.

IMPORTANT

- ♦ Only administrators have access permissions to ZENworks Reporting. The administrator privileges are:
 - ♦ View, run, schedule, create, save, and delete various ZENworks Reporting resources (For example: reports, views, domain, and data sources)
 - ♦ Assign access permissions (read, write, delete, execute, and administer) for various ZENworks Reporting resources to other users either at a role level or at a user level.

- ♦ Manage ZENworks Reporting server settings
 - ♦ Delete users or roles
 - ♦ If you have selected a parent group (a group containing other sub-groups), note the following:
 - ♦ **For Active Directory:** Users in those sub-groups will not have administrator privileges. To assign these users administrator privileges, configure them individually.
 - ♦ **For eDirectory:** All the sub-groups will also have administrator privileges.
-

- ♦ Click **Email Server Configuration**.

Configure the outbound email server settings to send email notifications and reports.

To configure the outbound email server, specify the following:

- ♦ **Outbound email server:** Specify the FQDN or IP address of the SMTP server. The SMTP server is used for mailing scheduled reports.
- ♦ **Port:** Specify the port number on which the SMTP server is listening. The default port number is 25.
- ♦ **Use SSL/TLS:** Select this option if the SMTP server is running on SSL or TLS.
- ♦ **Sender email address:** Specify the sender email address from which all scheduled reports will be sent.
- ♦ **Requires Password:** Clear the check box to configure the Outbound email server without authentication. Select the check box if you want the sender to use a password for authentication.
- ♦ **Password:** Specify the sender's password.
- ♦ Click **Ok**.

- ♦ Click **Administrator**.

To change password for ZENworks Reporting administrator.

The asterisk (*) indicates configuration modified.

3 Click **Apply Changes**.

For more information about the ZENworks Reporting Configuration page, see [Section 6.1, "ZENworks Reporting Configuration," on page 34](#).

5 Appliance Management

In ZENworks Reporting Appliance, a web based interface is provided to manage the appliance. The user interface helps you to configure and perform operations on a ZENworks Reporting server. Based on the login user the tiles are displayed.

To manage ZENworks Reporting, see [Chapter 5, “Appliance Management,” on page 27](#).

ZENworks Reporting Appliance enables you to reconfigure settings of the appliance, such as administrative passwords, network settings, and certificate settings.

ZENworks Reporting Appliance supports `root` and `zenadmin` users. You must use the `root` user if you want to perform any operations on ZENworks Reporting Appliance. Since, `root` user has all privileges on the ZENworks Reporting Appliance and ZENworks Reporting.

To manage ZENworks Reporting Appliance:

- 1 On a supported web browser, launch the URL to access the Management Console.
The URL (`https://<FQDN>:9443` or `https://<ipaddress>:9443`) that is displayed on the Appliance console.
- 2 Specify the login credentials, then click **Log in**.
The following options are displayed under Appliance Configuration:
 - ♦ [Section 5.1, “Ganglia Configuration,” on page 28](#)
 - ♦ [Section 5.2, “Ganglia Monitoring,” on page 28](#)
 - ♦ [Section 5.3, “Network,” on page 28](#)
 - ♦ [Section 5.4, “Time,” on page 29](#)
 - ♦ [Section 5.5, “Storage,” on page 29](#)
 - ♦ [Section 5.6, “System Services,” on page 29](#)
 - ♦ [Section 5.7, “Firewall,” on page 30](#)
 - ♦ [Section 5.8, “Administrative Passwords,” on page 30](#)
 - ♦ [Section 5.9, “Field Patch,” on page 31](#)
 - ♦ [Section 5.10, “Online Update,” on page 31](#)
 - ♦ [Section 5.11, “Shutting Down and Restarting ZENworks Reporting Appliance,” on page 32](#)

5.1 Ganglia Configuration

Ganglia is a scalable, distributed monitoring system that allows you to gather information about the ZENworks Reporting Appliance system. The default metrics that you can monitor are CPU, disk, load, memory, network, and process.

- 1 On the ZENworks Reporting Appliance home page, under Appliance Configuration, click **Ganglia Configuration**.
- 2 You can change the following configuration options:
 - ♦ **Enable Full Monitoring Services:** Select this option to receive and store metrics from other appliances, and to allow the Ganglia Web Interface to run on the same device as the ZENworks Reporting Appliance.

You can disable Ganglia monitoring by clearing this option. You can perform this only if you have a monitoring system that you want to use for ZENworks Reporting Appliance, or if you want to configure a dedicated appliance for viewing monitoring information. (You can do this by selecting **Unicast** below; then specify the FQDN or IP address of the appliance where monitoring information is stored.)
 - ♦ **Enable monitoring on this appliance:** Select this option to enable Ganglia monitoring on this appliance.
 - ♦ **Multicast:** Select this option to send monitoring information to other appliances on the network.
 - ♦ **Unicast:** Select this option to send monitoring information to a single destination.
 - ♦ **Publish to:** Specify the URL where Ganglia sends monitoring information while it is running in Unicast mode.
 - ♦ **Monitoring Tool Options:** Select this option to enable the monitoring tool to access this server through http port 9080 using a URL similar to `http://:9080/gweb/`.
- 3 (Optional) Click **Reset Database** to remove all existing Ganglia metrics from this appliance.

This option is not applicable to the ZENworks Reporting database.
- 4 Click **OK**.

For more information about how to use Ganglia monitoring with ZENworks Reporting Appliance, see [Section 5.2, “Ganglia Monitoring,” on page 28](#).

5.2 Ganglia Monitoring

Ganglia is a scalable, distributed monitoring system that allows you to gather information about the ZENworks Reporting Appliance system. The default metrics that you can monitor are CPU, disk, load, memory, network, and process. For more information, see [Ganglia](#).

5.3 Network

- 1 On the ZENworks Reporting Appliance home page, under Appliance Configuration, click **Network**.
- 2 Below **DNS Configuration**, you can modify the name servers, search domains, and gateway settings for the ZENworks Reporting Appliance network.
- 3 Below **NIC Configuration**, click the **ID** to modify the IP address, hostname, and network mask of any Network Interface Controller (NIC) associated with the appliance. (If multiple NICs are configured for ZENworks Reporting Appliance, you can configure the additional NICs.)

- 4 Click **OK**, then restart the appliance to reflect the changes.
- 5 (Optional) In the **Appliance Administration UI (port 9443) Access Restrictions**, specify the IP address of any networks for which you want to allow access to the ZENworks Reporting Appliance. Leave this blank to allow any network to access the ZENworks Reporting.
- 6 Click **OK**.

5.4 Time

- 1 On the ZENworks Reporting Appliance home page, under Appliance Configuration, click **Time**.
- 2 Change the required time configuration options:
 - ♦ **NTP Server:** Specify the NTP server that you want to use for time synchronization. Multiple servers can be specified by providing spaces.
 - ♦ **Region:** Select the region where ZENworks Reporting Appliance is located.
 - ♦ **Time Zone:** Select the time zone on which ZENworks Reporting Appliance is located.
 - ♦ **Hardware Clock Set to UTC**
- 3 Click **OK**.

5.5 Storage

If you have created hard disk partitions (`/vastorage` and `/var`), ZENworks Reporting Appliance provides tools that allow you to expand the storage space for the `/vastorage` and `/var` partitions.

- 1 On the ZENworks Reporting Appliance home page, under Appliance Configuration, click **Storage**.
- 2 Use the tools provided by your virtualization platform vendor to expand the virtual disks that contain the partitions your are expanding.
- 3 In the **Appliance Disks Containing Unallocated Free Space**, select the partitions to be expanded.
- 4 Click **Expand partitions**.

Appliance services are stopped, the selected partitions are expanded to the size of their respective disks, and appliance services are restarted.
- 5 Restart the appliance so that the operating system detect the disks that are expanded.

5.6 System Services

This is the SSH service that is running on the ZENworks Reporting Appliance. The following system services are available:

- ♦ SSH
- ♦ Proxy DHCP

In the System Services page, you can perform the following actions:

- ♦ [Section 5.6.1, “Starting, Stopping, or Restarting System Services,” on page 30](#)
- ♦ [Section 5.6.2, “Setting System Services to Automatic or Manual,” on page 30](#)

5.6.1 Starting, Stopping, or Restarting System Services

- 1 In the System Services page, select the service that you want to start, stop, or restart.
- 2 Click **Action**, then click **Start**, **Stop**, or **Restart**.

5.6.2 Setting System Services to Automatic or Manual

- 1 On the System Services page, select the service that you want to make automatic or manual.
- 2 Click **Options**, then click **Set as Automatic**, or **Set as Manual**.

If you choose **Set as Automatic**, the SSH services will start automatically when you run the appliance.

If you choose **Set as Manual**, you need to start or stop the SSH services manually after you run the appliance.

5.7 Firewall

During the configuration a few ports on appliance are open. You can view the current firewall configuration from the ZENworks Reporting Appliance.

- 1 On the ZENworks Reporting Appliance home page, under Appliance Configuration, click **Firewall**.

Port numbers are displayed with the current status.

If you have a firewall, you must allow the listed port numbers to ensure that you have a seamless experience with ZENworks Reporting Appliance. As a best practice, do not change any port numbers from the default ports.

5.8 Administrative Passwords

- 1 On the ZENworks Reporting Appliance home page, under Appliance Configuration, click **Administrative Passwords**.
- 2 Specify the new passwords for the `root` and `zenadmin` administrators.
If you are changing the root password, you must first specify the current root password.
- 3 (Optional) Select or clear **Allow root access to SSH**. When this option is selected, the root user is able to SSH to the appliance. If this option is not selected, only the zenadmin user can SSH to the appliance.
- 4 Click **OK**.

5.9 Field Patch

The Field Patch page, enables you to manage field test patches for the ZENworks Reporting Appliance. You can install new patches that has fix for issues, view currently installed patches, and uninstalled patches.

- 1 On the ZENworks Reporting Appliance home page, under Appliance Configuration, click **Field Patch**.
- 2 (Optional) Install a Downloaded Patch:
 - 2a Download the patch from the [Novell Download](#) site on to your device.
 - 2b On the Field Test Patch page, click **Browse** to select the downloaded patch.
 - 2c Click **Install**.
- 3 (Optional) Manage Installed Patches:
 - 3a Below the **Manage Installed Patches**, on the **Patch Name** column, select the patch that you want to uninstall.
 - 3b Click **Uninstall Latest Patch**.

5.10 Online Update

Online Update enables you to update the Appliance.

- 1 On the ZENworks Reporting Appliance home page, under Appliance Configuration, click **Online Update**.

You can perform the following actions:

- ♦ **Register:** Enables you to register with Novell Customer Center (NCC) server or a Local Subscription Management Tool (SMT) server from where you can download software updates and install automatically to update the product.

To register online update service:

1. Click the Register tab.
2. Choose the type of service **Local SMT** (Subscription Management Tool) or **Novell Customer Center** (NCC).

Based on the service type, specify the following:

Local SMT

- ♦ **Hostname:** The hostname of the server from where you want to download.
- ♦ **SSL Cert URL (optional):** The SSL certificate to communicate with the server.
- ♦ **Namespace path (optional):** The name space of the file or directory.

Novell Customer

- ♦ **Email:** The email address to receive the updates on the appliance.
- ♦ **Activation key:** The activation key for the server base license.
- ♦ **Allow data send:** choose how you want to receive the data **Hardware Profile** or **Optional information**.

3. Click **Register**.
- ♦ **Update Now:** After registration, click **Update Now** to trigger downloaded updates.

- ♦ **Schedule:** After registration, you can configure type of updates to download and whether to automatically agree with the licenses.

To schedule online update:

1. Click the **Schedule** tab.
 2. Select a schedule for download updates (Manual, Daily, Weekly, Monthly).
- ♦ **View Info:** Displays the list of installed and downloaded software updates.
 - ♦ **Refresh:** Refreshes the status of updates on the Appliance.

5.11 Shutting Down and Restarting ZENworks Reporting Appliance

- 1 On the ZENworks Reporting Appliance home page, under Appliance Configuration, click **Reboot** or **Shutdown**.

This restarts or shuts down ZENworks Reporting Appliance.

6 ZENworks Reporting System Management

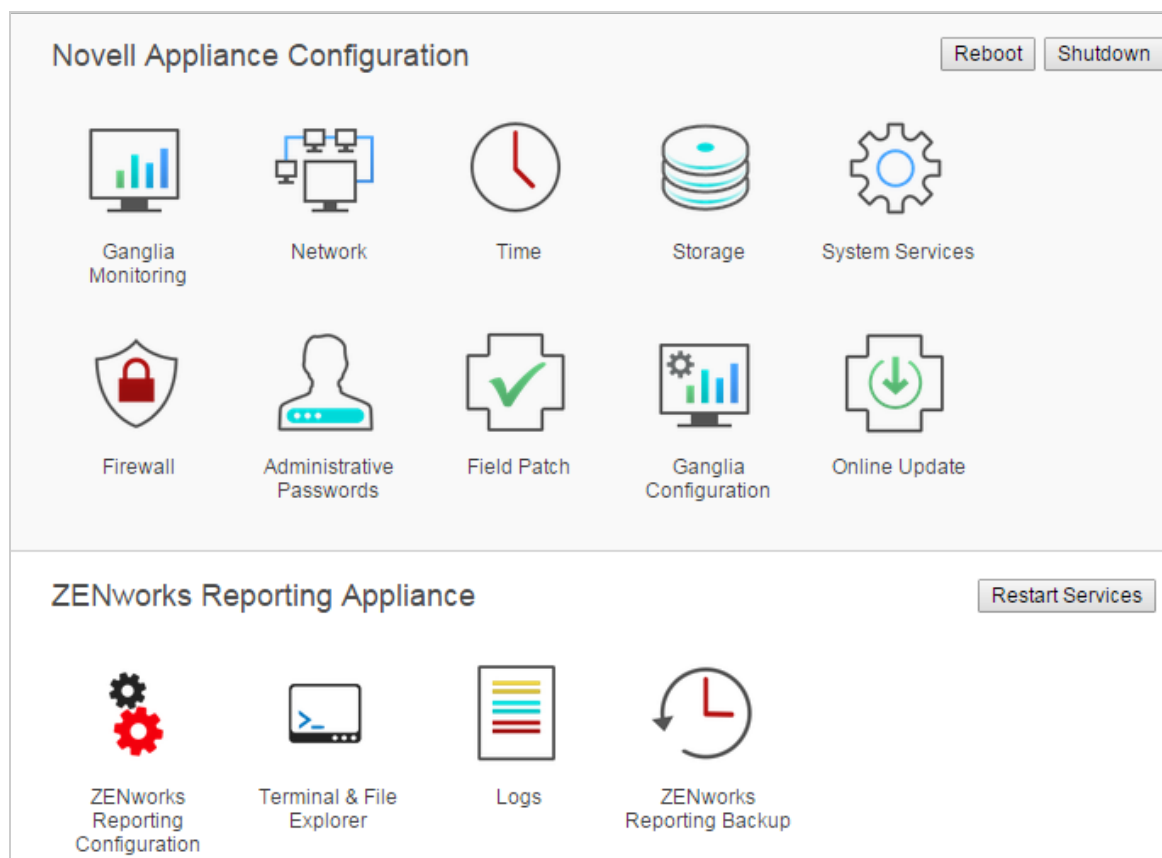
The user interface helps you to configure and perform operations on ZENworks Reporting. Based on the login user the tiles are displayed.

On ZENworks Reporting Appliance, the `root` or `zenadmin` user has all privileges. The `zenadmin` user is used as a ZENworks Reporting administrator to perform day-to-day activities in ZENworks Reporting.

The following operations can be performed by `root` and `zenadmin`:

- Explore all files and folders of appliance system
- View and edit logs
- View and edit ZENworks Reporting configuration
- Restart both appliance and ZENworks Reporting
- Launch a terminal and execute ZENworks Reporting commands

Figure 6-1 Appliance Home page (after configuring ZENworks Reporting)



To manage ZENworks Reporting:

- 1 Launch the URL on a supported web browser.

For example: <https://<FQDN>:9443> or <https://<ipaddress>:9443>

- 2 Specify the login credentials, then click **Log in**.

The following options are displayed under ZENworks Reporting Appliance:

- ♦ [Section 6.1, “ZENworks Reporting Configuration,” on page 34](#)
- ♦ [Section 6.2, “Terminal and File Explorer,” on page 36](#)
- ♦ [Section 6.3, “Logs,” on page 38](#)
- ♦ [Section 6.4, “ZENworks Reporting Backup,” on page 40](#)

6.1 ZENworks Reporting Configuration

The ZENworks Reporting Configuration page is enabled only after ZENworks Reporting is successfully configured.

- 1 On the ZENworks Reporting Appliance home page, under **ZENworks Reporting Appliance**, click **ZENworks Reporting Configuration**.

The ZENworks Reporting Configuration page has the Summary, Basic, and Advanced views. The Basic view displays frequently used server configuration settings. In the Advanced view, you can edit any relevant server configuration file online. To reflect modified changes, some services might need to restart.

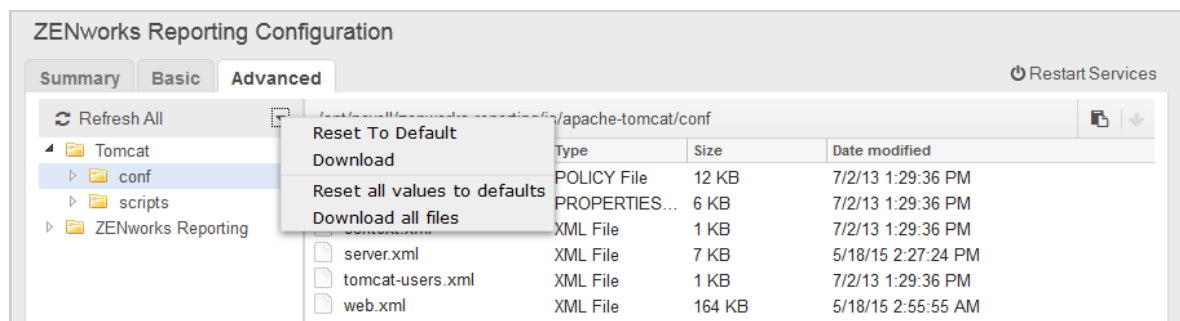
The Summary view enables you to view and reconfigure the ZENworks Reporting settings, such as Certificate, Domain, User Source, User Group, Email Server configuration, change Administrator password, and Appliance details, such as type of hypervisor used, operating system, RAM and file system and HDD details.

Click **Open ZENworks Reporting Console** to use ZENworks Reporting.

To reconfigure ZENworks Reporting settings, see [Section 4.2, “Reconfiguring ZENworks Reporting,” on page 19](#).

The Appliance comes with the built-in 43 GB of `rootfs` file system that is mounted on root directory. Additional hard disk that is added will be attached to the `/dev/sdb1` and mounted on `/vastorage`. All ZENworks Reporting related configurations, log files, backup files, certificates, and binaries are stored in additional hard disk.

Figure 6-2 ZENworks Configuration Views



The Basic view displays frequently used server configuration settings as an individual configuration value. You can edit frequently used ZENworks Reporting related settings such as Min Heap Size, Max Heap Size, Min Permanent Generation size, Max Permanent Generation size, and Thread Stack size.

For example, you can configure **Thread Stack size (in MB)** by changing the default value, save, and then restart the pending service that is available in Restart Service page.

Basic view has the following options:

- ♦ **Save:** Saves the modified settings.
- ♦ **Refresh:** Refreshes all the ZENworks Reporting configurations.
- ♦ **Reset all values to default:** Reverts the settings to its original state after configuration. This is the last applied or migrated ZENworks Reporting.
- ♦ **Restart Services:** Enables you to select the services that need to be restarted for configuration changes and to reflect the changes.

When there is any changes in the configuration file that is associated with the ZENworks Reporting process, then the system determines automatically and process get listed in the Restart Services page.

The Advanced view enables you to view, configure, or edit any server configuration file that is related to ZENworks Reporting, such as Tomcat and ZENworks Reporting.

Figure 6-3 Tool Bar




By default the file will be in Read-Only mode. To edit a file, toggle the **Edit Mode**, change the required content of the file, and then **Save**. Whenever there is any changes to the file, then corresponding process has to be restarted by clicking **Restart Services**.

The Advanced view has the following options:

- ♦ **Download:** Downloads the server configuration files.
- ♦ **Edit Mode:** Enables you to toggle or edit a server configuration file in an editor.
- ♦ **Reload:** Loads the server configuration file from the file system. Any unsaved changes made in the browser editor will be lost.
- ♦ **Reset all values to default:** Reverts the file to its original state after configuration. This is the last applied ZENworks Reporting System update.
- ♦ **Download all Files:** Downloads all the server configuration folders that are displayed in the left pane. The appliance creates a compressed archive of the files to be downloaded.
- ♦ **Save:** Saves a server configuration file to file system.
- ♦ **Restart Services:** Enables you to select the services that need to be restarted for configuration changes (in Basic or Advanced view) and to reflect the changes.

When there is any change in the configuration file that is associated with the ZENworks Reporting process, then the system determines automatically and process the list of changes in the Restart Services page.

- ♦ **Select Path:** Click the select path  icon to copy the physical path of the configuration file.
- ♦ **Refresh:** Refreshes all the ZENworks Reporting configurations.

6.2 Terminal and File Explorer

This tile launches an integrated view for File System Explorer and Terminal.

- ♦ [Section 6.2.1, “Terminal,” on page 36](#)
- ♦ [Section 6.2.2, “File Explorer,” on page 37](#)

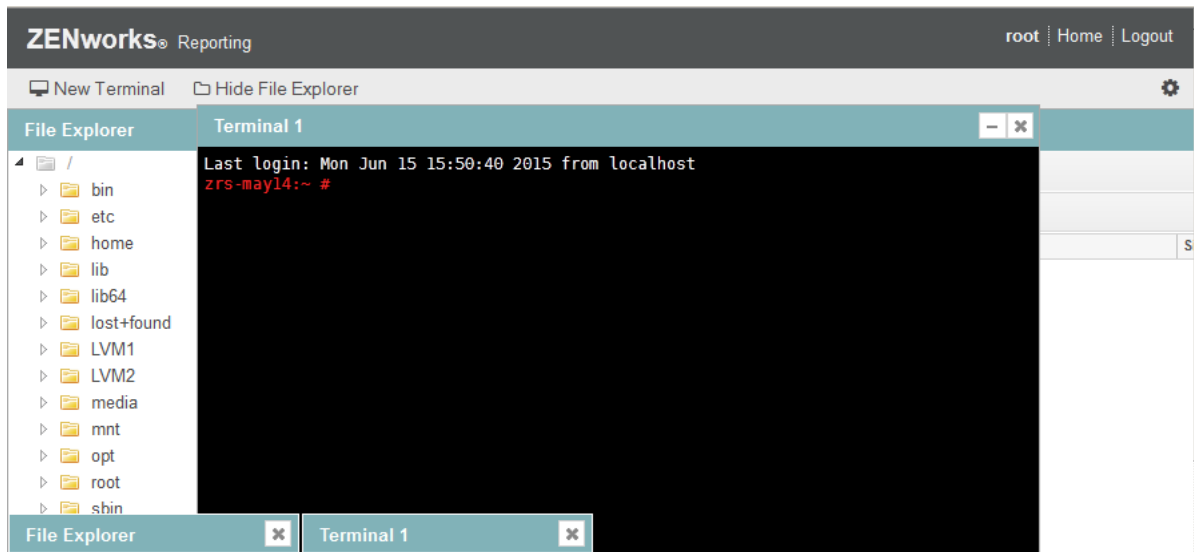
6.2.1 Terminal

SSH service needs to be running for the terminal to work. SSH service is not started by default for security reasons.

- 1 On the ZENworks Reporting Appliance home page, under **Appliance Configuration**, click the **System Services** icon.
- 2 Select the **SSH service** on the System Services page.
- 3 Click **Action**, then click **Start**.
Set the SSH service to **Automatic**, if you want to restart the SSH service automatically after you reboot the device.
- 4 On the ZENworks Reporting Appliance home page, under **ZENworks Reporting Appliance**, click **Terminal & File Explorer**

A new browser window launches two frames that display a **File Explorer** (for performing file operations) and a **Terminal**. Whenever you close the Terminal browser or tab, then a confirmation message is displayed.

Figure 6-4 Terminal




You can perform file operations by using an embedded File Explorer that enables you to transfer content between the local and the remote file systems. You can also open new terminals rooted at any folder in the remote file system.

You can launch more than one terminal by clicking **New Terminal**. By default, a maximum of five terminals can be launched.

To configure with any other value than the default value of the terminal:

- 1 Go to `/etc/opt/novell/base`
- 2 Open the `terminal_config.properties` file.
- 3 Change the `maxTerminalsPerBrowser` value with the required value, then save the file.

To select a theme (foreground and background color) for the terminals:

- 1 Click the **Settings**  icon, then select the required terminal theme.

To create a theme:

- 1 Go to `/etc/opt/novell/base`
- 2 Open the `terminal-themes.xml` file.
- 3 Add your own theme, then save the file. For example:

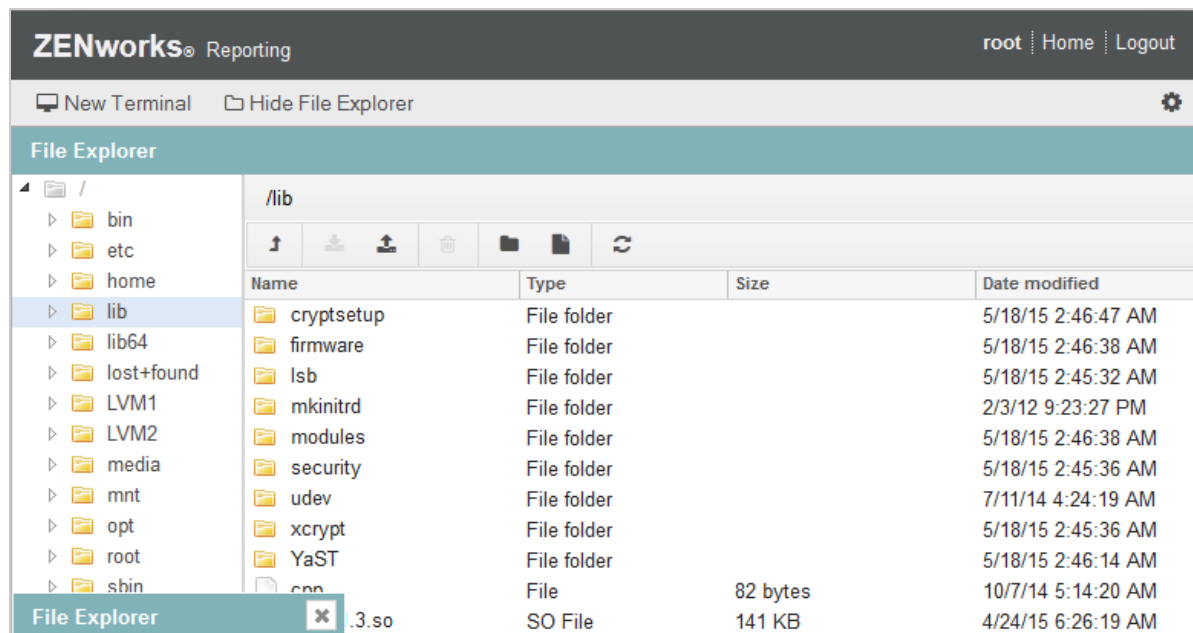
```
<theme>
  <name>example</name>
  <background-color>#000000</background-color>
  <foreground-color>yellow</foreground-color>
</theme>
```

6.2.2 File Explorer

- 1 On the ZENworks Reporting Appliance home page, under **ZENworks Reporting**, click **Terminal & File Explorer**.

A new browser window launches two frames that display a **File Explorer** (for performing file operations) and a **Terminal** (SSH).

Figure 6-5 File Explorer














This enables you to perform operations on files and folders.

- ♦ The file operations are based on user privileges (POSIX file permissions).

- If you log in as `zenadmin`, all file operations are executed as `zenworks` user.
- If you log in as `root`, all file operations are executed as `root` user.
- In the tabular view, a context menu is available with these options: **Open Terminal**, **Refresh**, **Upload**, **New Folder**, and **New File**.
- The Tree View for appliance file system displays the Appliance file system as a tree. Only folders are displayed in the tree view. The following options are available **New folder**, **Delete**, **Rename**, **Open Terminal**, **Refresh**, **Cut**, **Copy**, **Paste**, **Upload**, and **Download**.
- File explorer enables you to explore the Appliance's (SLES -Unix) file system, breadcrumb navigation, upload, download, refresh, rename, create, delete, or, CCP operations (cut, copy, and paste).

Below the file path, a toolbar is displayed and you can perform the following:

Icon	Name	Description
	Terminal Settings	To change the terminal theme display settings.
	Select Path	To select file path that is displayed on the breadcrumb.
	Settings	To configure which file settings to show or hide.
	Breadcrumb	Displays the path for selected file or folder.
	Parent Directory	Display the contents of the parent folder in the tabular view.
	Download	To download files and folders under a specified folder.
	Upload	Supports multiple file upload; folder upload is not supported.
	New folder	Creates a folder in the current folder.
	New file	Creates a new file in the current folder.
	Refresh	Updates the tabular view with the latest contents from the appliance.
	Delete	Enables you to delete multiple files and folders under a specified folder.

6.3 Logs

All log files that are monitored on ZENworks Reporting Appliance are organized in a virtual tree structure and path of the particular file or folder is displayed. Log files can be viewed in the Tail mode or View From Start mode.

In the Tail mode, a log file is displayed from the end of log file.

In the View From Start mode, a log file is displayed from the start of the log file. Whenever log files span across multiple version of files, then starting from the first version of that file the content is displayed.

- 1 On the ZENworks Reporting Appliance home page, under **ZENworks Reporting Appliance**, click **Logs**.

Figure 6-6 Logs

ZENworks® Reporting

root | Home | Logout

Refresh All

appliance

OS

ZENworks Reporting

backup

js

postgresql

tomcat

web

ZENworks-Reporting-Install_05_Jul_2015_11.48.21.log.xml

ZENworks-Reporting-Install_06_Jul_2015_11.15.16.log.xml

ZENworks-Reporting-Install_06_Jul_2015_11.46.32.log.xml

ZENworks-Reporting-Install_06_Jul_2015_12.07.27.log.xml

ZENworks-Reporting-Install_06_Jul_2015_15.29.08.log.xml

ZENworks-Reporting-Install_07_Jul_2015_11.59.55.log.xml

ZENworks-Reporting-Install_07_Jul_2015_12.26.09.log.xml

ZENworks_Reporting_InstallLog.log

/var/opt/novell/log/ZENworks Reporting

Name	Type	Size	Date Modified
backup	File folder		7/6/15 12:30:42 PM
js	File folder		7/6/15 11:06:58 AM
postgresql	File folder		7/6/15 11:06:58 AM
tomcat	File folder		7/7/15 12:37:29 PM
web	File folder		7/6/15 12:30:42 PM
ZENworks-Reporting-Install_05_Jul_2015_11.48.21.log.xml	XML File	20 KB	7/5/15 9:21:52 PM
ZENworks-Reporting-Install_06_Jul_2015_11.15.16.log.xml	XML File	190 KB	7/6/15 11:24:46 AM
ZENworks-Reporting-Install_06_Jul_2015_11.46.32.log.xml	XML File	34 KB	7/6/15 11:51:50 AM
ZENworks-Reporting-Install_06_Jul_2015_12.07.27.log.xml	XML File	32 KB	7/6/15 12:12:31 PM
ZENworks-Reporting-Install_06_Jul_2015_15.29.08.log.xml	XML File	32 KB	7/6/15 3:34:06 PM
ZENworks-Reporting-Install_07_Jul_2015_11.59.55.log.xml	XML File	101 KB	7/7/15 12:08:26 PM
ZENworks-Reporting-Install_07_Jul_2015_12.26.09.log.xml	XML File	31 KB	7/7/15 12:30:54 PM
ZENworks_Reporting_InstallLog.log	LOG File	19 KB	7/7/15 12:30:54 PM

This enables you to view logs of the ZENworks Reporting server. Logs are categorized based on Appliance logs, operating system logs, and ZENworks Reporting logs.

Logs has the following options:

- ♦ **View**, **View From Start**, and **Refresh**
- ♦ **Download** enables you to download a log file or a folder.
- ♦ **Resume** and **Pause** enable you to tail log files to see the latest information. You can configure the refresh interval of a tail by specifying the **Refresh** time in **Seconds**. Refresh specifies the interval of time between two requests.

Specify **Lines to load** to control the number of lines to be retrieved for the tail interval. By default **Lines to load** is set to 100.

Control the speed in which log file is displayed. Log files are loaded by making multiple HTTP requests in periodic intervals of time. Each request loads a configurable number of lines.

- ♦ **Clear** enables you to clear the current displayed logs. However, logs will not be cleared in ZENworks Reporting Appliance. To see the cleared logs, start the log file.
- ♦ **Search** enables you to filter logs based on the search criteria. You can use tail and grep to monitor log files from the terminal. The log viewer provides a GUI for tailing and filtering the content in log files. You can search based on log level such as INFO, ERROR, and DEBUG and also with regular expressions (AND and OR).

6.4 ZENworks Reporting Backup

ZENworks Reporting Backup enables you to back up the ZENworks Reporting related files such as ZENworks Reporting server configuration, properties, domains, certificates, customized reports, and schedules.

To back up the ZENworks Reporting files:

- 1 On the ZENworks Reporting Appliance home page, under **ZENworks Reporting Appliance**, click **ZENworks Reporting Backup**.
- 2 Click **Start Backup**.

The backed up files will be stored at `/vastorage/backup` location.

7 ZENworks Reporting Migration

This chapter includes information to help you migrate from ZENworks Reporting 5 to ZENworks Reporting 5.6.1.

The following sections provide instructions for migration:

- ♦ [Section 7.1, “Creating the ZENworks Reporting data file,” on page 41](#)
- ♦ [Section 7.2, “Deploying and Configuring the ZENworks Reporting 5.6.1 Appliance,” on page 42](#)
- ♦ [Section 7.3, “Migrating the ZENworks Reporting 5 data to the ZENworks Reporting 5.6.1 Appliance,” on page 42](#)

7.1 Creating the ZENworks Reporting data file

Create the `ZR5-export-<TIME_STAMP>.dat` file for migration. The data file consists of ZENworks Reporting server resources, settings, and server certificates.

To create the `ZR5-export-<TIME_STAMP>.dat` file:

- 1 Log in to the machine where ZENworks Reporting 5 is installed.
The login user must have an administrator privileges.
- 2 Download the `ZENworks_Reporting56_Migration_Utility.zip` file, from the [Novell Download](#) website.
- 3 Extract the `ZENworks_Reporting56_Migration_Utility.zip` file.
 - ♦ On Windows server, execute the `ZR5-export.bat` file.
 - ♦ On Linux server, execute the `ZR5-export.sh` file.
- 4 Specify the password to encrypt the content.
The `ZR5-export-<TIME_STAMP>.dat` file is created in the extracted folder.
- 5 Copy the `ZR5-export-<TIME_STAMP>.dat` file to your local machine.
- 6 Continue with the next task, see [Deploying and Configuring the ZENworks Reporting 5.6.1 Appliance](#).

IMPORTANT: After creating the `ZR5-export-<TIME_STAMP>.dat` file, if you make any changes in the ZENworks Reporting server they might not be available post migration.

7.2 Deploying and Configuring the ZENworks Reporting 5.6.1 Appliance

You need to deploy the ZENworks Reporting 5.6.1 Appliance to migrate the existing ZENworks Reporting 5, and then configure the appliance with the network settings.

- 1 Deploy the appliance as instructed in [Section 3.1, “Deploying the Appliance,” on page 11](#).
- 2 Before you shut down ZENworks Reporting 5, back up the ZENworks Reporting resources (reports, views and so on) as follows:
 - 2a Log in to the ZENworks Reporting 5 server console (<https://<ip>:8443>) as an administrator.
 - 2b Go to **Manage > Server Settings > Export**.
 - 2c Save the `export.zip` file to your local machine.
- 3 (Conditional) In order to use the existing server's certificate authority (CA) configuration on the appliance shutdown the ZENworks Reporting 5 server and then configure the ZENworks Reporting 5.6.1 Appliance with the same FQDN as in the ZENworks Reporting 5 server.
Configure the Appliance settings as instructed in [Section 3.2, “Configuring the Appliance Settings,” on page 12](#).
- 4 Take note of the URLs displayed in the console, then continue with the next task, [Migrating the ZENworks Reporting 5 data to the ZENworks Reporting 5.6.1 Appliance](#).

7.3 Migrating the ZENworks Reporting 5 data to the ZENworks Reporting 5.6.1 Appliance

After you have deployed the ZENworks Reporting 5.6.1 Appliance, you are ready to migrate the ZENworks Reporting 5 data to the appliance.

- 1 Copy the `ZR5-export-<TIME_STAMP>.dat` file from ZENworks Reporting 5 server to the machine from where you want to configure the ZENworks Reporting Appliance.
- 2 In a browser, launch the URL (<https://<FQDN>:9443> or <https://<ipaddress>:9443>) that is displayed in the Appliance console.
- 3 Log in to ZENworks Reporting Appliance with the `root` or `zenadmin` credentials.

Configure ZENworks Reporting

ZENworks Reporting is ready to be configured for use.

You should be prepared with the required information to complete the configuration.

- If this is a new ZENworks Reporting server
- ▾ If you are migrating an existing ZENworks Reporting server
 - ZENworks Reporting appliance prepared for migration.
 - Data file ready for upload.

If you have chosen not to reuse the ZENworks Reporting 5 server certificates in the appliance, you will be required to configure the new Certificate Authority later in this migration.

[Generate CSR](#)

Migrate existing ZENworks Reporting server

Cancel

- Expand the **If you are migrating an existing ZENworks Reporting server to an appliance** section and then click **Migrate existing ZENworks Reporting server**.
- Browse to the `ZR5-export-<TIME_STAMP>.dat` file and specify the password (see [Step 4 on page 41](#)).
- Click **Next** to upload the file and proceed.
- Specify the following to create a ZENworks Reporting Administrator:
 - ♦ **Username:** The user name can have a maximum length of 50 characters. It can contain alphanumeric characters and special characters (underscore `_` and hyphen `-`).
 - ♦ **Password:** The administrator password is used for logging in to ZENworks Reporting. The password must contain a minimum of six characters.
 - ♦ **Confirm Password:** Use this field to confirm a correct password. If there is a mismatch, an error message is displayed after you click **Next**. You must re-enter the correct passwords.
- Click **Finish** to complete the migration process.

IMPORTANT: The migration completes only if the certificates are valid that is when the hostname of the appliance is the same as the certificate hostname.

If the hostname of the appliance is not the same as the certificate hostname, then click **Next** and continue with configure Certificate Authority, see [Step 12](#) in the [Section 4.1, “Configuring ZENworks Reporting,” on page 13](#).

8 Jaspersoft Studio

Jaspersoft Studio 5.6 is an Eclipse-based report designer for ZENworks Reporting. It is a full rewrite of iReport. Jaspersoft Studio allows you to create sophisticated layouts containing charts, images, sub-reports, crosstabs, and more. You can access your data through various sources including JDBC, TableModels, JavaBeans, XML, Hibernate, Big Data (such as Hive), CSV, XML, as well as custom sources. Then you can publish reports as PDF, RTF, XML, XLS, CSV, HTML, XHTML, text, DOCX, or Open Office.

IMPORTANT: Jaspersoft Studio 5.6 supports only Windows.

To install Jaspersoft Studio 5.6 and connect to ZENworks Reporting, perform the following tasks:

- ♦ [Section 8.1, “Installing Jaspersoft Studio 5.6,” on page 45](#)
- ♦ [Section 8.2, “Connecting Jaspersoft Studio 5.6 to ZENworks Reporting,” on page 46](#)

8.1 Installing Jaspersoft Studio 5.6

To install Jaspersoft Studio 5.6:

- 1 Download the `Jaspersoft_Studio_5.6.iso` file from the [Novell Download](#) site.
- 2 Mount the `Jaspersoft_Studio_5.6.iso` file.
- 3 Browse to the `Jaspersoft_Studio_5.6.iso` directory.
- 4 Double-click the `setup.exe` file.
- 5 Select the required language, then click **Continue**.
- 6 Accept the agreement in the License Agreement page, then click **Next**.
- 7 Choose the installation directory, then click **Next**.
- 8 Review the Summary page. To change previous settings, click **Previous**; otherwise, click **Install**, then click **Done**.
- 9 Go to **Start > Jaspersoft > Jaspersoft Studio Professional-5.6.0 final**, then click **Jaspersoft Studio Professional-5.6.0 final**.
- 10 If the Workspace Selection page appears, specify the **Workspace Root Path**, then click **OK**.
- 11 If you want to create the workspace directory, click **OK**.
- 12 In Jaspersoft Studio, choose **Help**, then click **License Manager**.
- 13 In the License Manager page, click **Install new license**.
- 14 Browse to the `jasperserver.license` file location. For example, `C:\jsstudio\js-studio-pro-5.6.0`
- 15 Click **Open** to install the new license for Jaspersoft Studio.
In the License Manager page, the **License Type** will be changed from **Evaluation** to **Commercial**.
- 16 Click **Close** to close the License Manager page.

8.2 Connecting Jaspersoft Studio 5.6 to ZENworks Reporting

To connect Jaspersoft Studio 5.6 to ZENworks Reporting:

1 Install the ZENworks Reporting certificate:

1a Administrators provide the ZENworks Reporting certificate. To get the ZENworks Reporting certificate, see [Section 8.2.1, “Copying the ZENworks Reporting Certificate,” on page 47](#).

1b Copy the ZENworks Reporting certificate (`server.cert`) on the device on which Jaspersoft Studio 5.6 is installed.

1c Open the command prompt, then execute the following command:

```
cd <studio install path>\js-studio-pro-5.6.0\features\jre.win32.win32.x86_64.feature_1.7.0.u25\jre\bin
```

`<studio install path>` is the location where Jaspersoft Studio 5.6 is installed. For example, `C:\Program Files\Jaspersoft`

1d Execute the following command:

```
keytool -import -keystore <studio install path>\js-studio-pro-5.6.0\features\jre.win32.win32.x86_64.feature_1.7.0.u25\jre\lib\security\cacerts -file <certificate path>\<certificate name> -storepass changeit
```

`<studio install path>` is the location where Jaspersoft Studio 5.6 is installed. For example, `C:\Program Files\Jaspersoft`

`<certificate path>` is the location where the ZENworks Reporting certificate that is copied onto the device where Jaspersoft Studio 5.6 is installed. For example `C:\Program Files\Certificate`

`<certificate name>` is the name of the ZENworks Reporting certificate. For example, `zrs-appl.labs.blr.novell.com`

2 Start Jaspersoft Studio 5.6.

3 In Jaspersoft Studio 5.6, choose **Window > Show View**, then click **Other**.

4 In the Show View page, below the **Jaspersoft Studio** view, select **Repository Explorer**, then click **OK**.

5 In the Repository view, right-click **Servers**, then click **Create JasperReports Server Connection**.

6 In the Server profile wizard, specify the following:

- ◆ **Name:** Name of the connection.
- ◆ **URL:** The ZENworks Reporting URL (`https://<hostname>:<port number>/jasperserver-pro/`).
- ◆ **Organization:** Name of the organization.
- ◆ **User:** A valid ZENworks Reporting user name.
- ◆ **Password:** The relevant password for the user name specified in the previous field.

7 Click **Test Connection**. After a successful connection is established, the ZENworks Reporting content appears.

8 Click **Finish** to save the connection.

For more information about how to use Jaspersoft Studio 5.6, see [Jaspersoft Studio 5.6](#).

8.2.1 Copying the ZENworks Reporting Certificate

To copy the ZENworks Reporting Certificate:

- ♦ **Windows:**

- 1 Log into ZENworks Reporting as an administrator.
- 2 Go to %ZRS_HOME%\conf\security.
- 3 Copy the `server.cert` file.

- ♦ **Linux:**

- 1 Log into ZENworks Reporting as a root user.
- 2 Go to `/opt/novell/zenworks-reporting/conf/security`.
- 3 Copy the `server.cert` file.

A Troubleshooting

The following sections provides solutions to the problems you might encounter while deploying and Configuring ZENworks Reporting Appliance:

java.lang.IllegalStateException: Form too large error message is displayed

Source: ZENworks Reporting.

Explanation: If the size of a file that is displayed in the **Advanced Configuration** tab exceeds the default value of 400000 Bytes (~ 400KB), the following error message is displayed:

```
java.lang.IllegalStateException:Form too large
```

Action: Increase the form content size parameter in the `start.ini` file:

- 1 Go to `/opt/novell/jetty8`
- 2 Open the `start.ini` file.
- 3 Search for the `Dorg.eclipse.jetty.server.Request.maxFormContentSize` parameter and increase the value.
- 4 Stop the jetty server using the `rcnovell-jetty stop` command.
- 5 Start the jetty server using the `rcnovell-jetty start` command.

