



# CBMR For Linux

# Cristie Bare Machine Recovery

## Installation And Licensing Guide

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# 1 Introduction

This document describes the Installation and Licensing of the Cristie Bare Machine Recovery (CBMR) product.

CBMR for Linux can only be installed on a x86\_64 Linux (i.e. 64-bit) machine.

*If using IBM Spectrum Protect, the system should have IBM Spectrum Protect API client version 7.1 or later already installed.*

A minimum memory of **5GB RAM** is required for booting the recovery environment and running a recovery.

CBMR Version 9.3.2 supports the following Linux platforms:

- RHEL 6.x to 8.4; Centos 6.x to 8.4
- Oracle Enterprise Linux 6.x to 8.0
- SUSE/SLES 11 to 15
- Ubuntu 18.04.1 LTS
- Ubuntu 20.04.1 LTS

The Disaster Recovery Environment comes built with the following recovery client version:

- IBM Spectrum Protect client 8.1.13

At the time of release the IBM Spectrum Protect client versions supported are 7.1 to 8.1.13 inclusive.

At the time of release the IBM Spectrum Protect server versions supported are 7.1 to 8.1.13 inclusive.

Before CBMR can be used it must also be correctly licensed. Cristie provides a 30 day trial license with the product.

## 1.1 Document conventions

The following typographical conventions are used throughout this guide:

<code>/etc/passwd</code>	represents command-line commands, options, parameters, directory names and filenames
<a href="#">Next &gt;</a>	used to signify clickable buttons on a GUI dialogue
<b>Note:</b>	describes something of importance related to the current topic



## 2 CBMR Installation and Removal

The CBMR distribution media is provided for x86\_64 Linux (i.e. 64-bit) machine only.

*Note: CBMR should be installed and run by a user that has **root** access privileges.*

### 2.1 Install CBMR

The required installation files can be downloaded as follows:

#### Trial Version:

A Trial Version of the software can be obtained by completing a form on the Cristie website.

<http://www.cristie.com/request-a-trial/>

#### Existing Customers:

The software can be downloaded after logging into the Cristie licensing portal

<https://portal.cristie.com/login/>

The installation files can be found in the download package in the path `linux/install/` on the CBMR installation CD, DVD or ISO.

#### Prerequisite for CBMR gubax GUI support:

To use the `gubax` user-interface on SUSE/SLES 15, an additional package called **libncurses5** must be installed. Similarly to use `gubax` on certain Linux 8 distros such as RHEL8, Centos8 and Oracle8 require the **ncurses 6.1** compatibility library to be installed. For x86\_64 support this can be downloaded from: [http://mirror.centos.org/centos/8/BaseOS/x86\\_64/os/Packages/ncurses-compat-libs-6.1-7.20180224.el8.x86\\_64.rpm](http://mirror.centos.org/centos/8/BaseOS/x86_64/os/Packages/ncurses-compat-libs-6.1-7.20180224.el8.x86_64.rpm). This seems to work on Oracle 8 even though it is sourced from Centos.

#### Installation Process RPM:

Log in as: `root`

Open a terminal and copy the installation file to say `'/tmp'`. Then to install from an RPM package **with** IBM Spectrum Protect support (the default) enter:

```
[root@CBMR]# rpm -ivh cbmr-9.3.2.2154-1.x86_64.rpm
```

*Note: If you use this command and the IBM Spectrum Protect Client has NOT been previously installed, an error message will be displayed informing of a failed dependency and that TIVsm-API is required to install CBMR with IBM Spectrum Protect support.*

To install **without** IBM Spectrum Protect support enter:

```
[root@CBMR]# rpm -ivh --nodeps cbmr-9.3.2.2154-1.x86_64.rpm
```



### Installation Process DEB:

Log in as: root

Copy the installation file to say '/tmp'. Then to install from a DEB package enter:

```
[root@CBMR]# dpkg -i cbmr_9.3.2.2154-1_amd64.deb
```

### Installation Process Tar File:

Copy the installation files from the installation CD to the temporary directory:

```
[root@CBMR install]# cp cbmr-9.3.2.2154-1.linux.x86_64.tar.gz /tmp
```

Navigate to the temporary directory:

```
[root@CBMR install]# cd /tmp
```

Extract the tar file with the following command:

```
[root@CBMR tmp]# tar xvzf cbmr-9.3.2.linux.x86_64.tar.gz
```

To install CBMR enter:

```
[root@CBMR cbmr]# ./install
```

This will install all the relevant files and licenses.

CBMR is installed with a 30 day trial license. To extend this license, contact Cristie at [support@cristie.com](mailto:support@cristie.com).

## 2.1.1 Upgrade Install

It is possible to upgrade an existing version of CBMR (6.x.x) to Version 9.3.2

### Upgrading RPM installations

To upgrade install using an RPM package **with** IBM Spectrum Protect support (the default) enter:

```
[root@CBMR]# rpm -U cbmr-9.3.2.2154-1.x86_64.rpm
```

*Note: If you use this command and the IBM Spectrum Protect Client has NOT been previously installed, an error message will be displayed informing of a failed dependency and that TIVsm-API is required to install CBMR with IBM Spectrum Protect support.*

To install without IBM Spectrum Protect support enter:

```
[root@CBMR main]# rpm -U --nodeps cbmr-9.3.2.2154-1.x86_64.rpm
```



## Upgrading DEB installations

This uses the same syntax as running a clean install, i.e.:

```
[root@CBMR install]# dpkg -i cbmr_9.3.2.2154-1_amd64.deb
```

## Upgrading tar file installations

To upgrade previous CBMR tar based installations, copy the installation files from the installation CD to the temporary directory:

```
[root@CBMR /]# cp cbmr-9.3.2.2154-1.x86_64.tar.gz /tmp
```

Navigate to the temporary directory:

```
[root@CBMR /]# cd /tmp
```

Extract the tar file with the following command:

```
[root@CBMR tmp]# cd /cbmr
```

To install CBMR enter:

```
[root@CBMR cbmr]# ./install
```

When prompted, confirm that is is OK to overwrite files.

### 2.1.2 Existing Installations of other Cristie BMR products

CBMR cannot be installed alongside any other Cristie BMR product.

## 2.2 Remove CBMR

### Uninstall RPM installations

To uninstall the RPM package, use:

```
[root@CBMR /]#  
[root@CBMR /]# rpm -e cbmr
```

### Uninstall DEB installations

To uninstall the RPM package, use:

```
[root@CBMR /]#  
[root@CBMR /]# dpkg -P cbmr
```

### Uninstall tar file installations

To uninstall the package, navigate to the directory where CBMR was installed and run the install script with the *-u* option.

```
[root@CBMR /]# cd /tmp/cbmr
```



```
[root@CBMR /]# ./install -u
```





## 3 Product Licensing

When first installed, CBMR may be used for a trial period of 30 days. During that period CBMR is fully functional. If the software is subsequently un-installed and later re-installed on the same system, the 30 day period continues from the date of the first installation.

If you wish to use the software beyond the trial period, you must register and purchase a license from Cristie Software Ltd.. Alternatively, and in special circumstances, Cristie Software Ltd. may extend the license period if you wish to trial the software beyond that period.

If you purchase the product, then contract and license activation codes will be available on the Cristie Licensing Portal. Together these codes will enable you to fully activate the product.

The following sections discuss this in more detail.

### 3.1 Trial License

A 30-day trial license commences from the date of installation. The CBMR configuration file generator `cbmrcfg` will not run after this period expires.

You may use the Cristie License Manager to add or inspect license details at any time. This is achieved by opening a terminal and entering:

```
#  
# licmgr -p cbmr
```

Entering this command, will display the Cristie License Manager. This shows Machine attributes, Contract ID, the installed host System signature, the current product (CBMR in this case), the product version, the trial end date and the current license Status.

```
=====
Cristie License Manager Version
9.2
Copyright (C) 2012-2021 Cristie Software Limited
=====
Machine attributes : {virtual, server}
Contract ID : 0
Signature : LNE9YL22-B6QZVVGW-ENMKT8V-7TGNYGHW
Product : Cristie Bare Machine Recovery (CBMR)
Version : 9.2
Trial ends on : 2021-06-24

Status : Trial licence
```

The CBMR configuration file generator will become active again when a full license has been purchased from Cristie Software Ltd. and the new contract and activation code entered via the Cristie License Manager.

### 3.2 Full License

A Full license entitles the Customer to product support and upgrades for the duration of the license period.

To upgrade from the trial license to a full license, you need to apply for a full license



activation code either via the Cristie Licensing Portal website or via the product Cristie License Manager. In either case you will need to first register an account on the Cristie Licensing Portal (located at <https://portal.cristie.com/login>). A Contract ID will be created and provided to you when you purchase a license.

These are the various codes used in the Cristie licensing process:

**Contract ID:** A 4-digit number supplied by Cristie Software Ltd. Sales during the license purchase process.

**Agreement Number:** Same as *Contract ID* at the moment.

**Contract Code:** 35-character contract code obtained from the Cristie Licensing Portal

**Activation Code:** 35-character support activation code obtained from the Cristie Licensing Portal

In special circumstances a 'bulk license' may be issued by Cristie Software Ltd. for customers that order a significant number of product licenses. Please contact your Cristie sales representative if you wish to discuss this service.

*Note this discussion assumes that CBMR is already installed on a Customer production machine.*

### 3.2.1 Setting up a Cristie Licensing Portal account

To setup a new account on the Cristie Licensing Portal follow the following steps. To do this you will need your 4-digit Contract ID and contract setup password. These will be provided by email from Cristie Software Ltd. when you purchase a product license.


*Note: Your Contract ID may have been supplied to you as your contract Agreement Number. In that case please use your Agreement number in place of the Contract ID throughout.*

1. On a suitable machine that has Internet access run a browser (such as Microsoft Internet Explorer on Windows) and navigate to the Cristie Licensing Portal web page at <https://portal.cristie.com/login>.

The image shows a screenshot of the Cristie Licensing Portal login/register form. It features a light gray background with two input fields: "User email" and "Password". To the right of the "Password" field is a blue "Sign In" button. Below the "User email" field are two blue buttons: "Register" and "Reset Password".

Select [Register](#) to create a new account. Enter your new account details (note this is an example):






### Register

Username	<input type="text" value="Cristie User"/>
Email	<input type="text" value="test@cristie.com"/>
New Password	<input type="password" value="*****"/>
Confirm New Password	<input type="password" value="*****"/>
Password Reset Question	<input type="text" value="Mother's maiden name"/>
Password Reset Answer	<input type="password" value="*****"/>
Contract/Agreement No	<input type="text" value="4"/>
Contract Password	<input type="password" value="*****"/>

Then click **Create**. If successful the following is shown.



### Register

✔ Registration successful

At this point you may now log in to the Cristie Licensing Portal using the E-mail ID and password setup in the previous steps.

### 3.2.2 Online activation

The steps involved in activating the product automatically using the Cristie License Manager are summarised below. This discussion assumes your contract is already setup on the Cristie Licensing Portal and you have access to both Contract and Activation codes.

1. Assign your Contract code on the CBMR host machine by opening up a terminal and entering:

```
#  
# licmgr -p cbmr --cid xxxxxxxx-xxxxxxx-xxxxxxx-xxxxxxx
```

(where xxxxxxxx-xxxxxxx-xxxxxxx-xxxxxxx is your Contract code)



```
=====
Cristie License Manager Version
          9.2
Copyright (C) 2012-2021 Cristie Software Limited
=====
Successfully set the contract ID.
Machine attributes : {virtual, server}
Contract ID : 1
Signature : LNE9YL22-B6QZVVGW-ENMKTB8V-7TGNYGHW
Product : Cristie Bare Machine Recovery (CBMR)
Version : 9.2
Trial ends on : 2021-06-24

Status : Trial licence
```

2. Then license CBMR by entering the command:

```
#
# licmgr -p cbmr --cred user@example.com,password
```

```
=====
Cristie License Manager Version
          9.2
Copyright (C) 2012-2021 Cristie Software Limited
=====
Connecting with: 'nigelp@cristie.com' and '*****'
Licensing machine: 'LNE9YL22-B6QZVVGW-ENMKTB8V-7TGNYGHW'
Details: 'np-rhel83' on '10.10.11.186' (Virtual)

Activating using code: MFMTDLUH-F78Z5PK2-9HHYJQJC-PABDYQLT
Success

Machine attributes : {virtual, server}
Contract ID : 1
Signature : LNE9YL22-B6QZVVGW-ENMKTB8V-7TGNYGHW
Product : Cristie Bare Machine Recovery (CBMR)
Version : 9.2
Maintenance ends on : 2022-12-31

Activation code : MFMTDLUH-F78Z5PK2-9HHYJQJC-PABDYQLT
Activation type : Product activation
Maintenance ends on : 2022-12-31
Attributes : {virtual, server}

Status : Full licence
```

*Note: the required email and password are the values you use to sign into the Cristie Licensing Portal*

The Cristie License Manager will be refreshed showing your Contract ID, the new activation code and your contract support end date.

*Note: Internet access on the host machine is required to run the online activation process from Cristie License Manager directly.*



### 3.2.3 Manual activation

This involves activating using the Cristie Licensing Portal as follows. This discussion assumes your contract is already setup on the Cristie Licensing Portal.

Assign your Activation code on the CBMR host machine by opening up a terminal and entering:

```
#  
# licmgr -p cbmr --act xxxxxxxx-xxxxxxx-xxxxxxx-xxxxxxx
```

(where xxxxxxxx-xxxxxxx-xxxxxxx-xxxxxxx is your Activation code, which can be obtained by signing into the Cristie Licensing Portal) and use the **Activate Licenses** option. You will need your host's IP address, hostname and license signature. The latter can be obtained from the `licmgr -p cbmr` output.

```
=====
Cristie License Manager Version
          9.2
Copyright (C) 2012-2021 Cristie Software Limited
=====
Machine attributes : {virtual, server}
Contract ID : 0
Signature : LNE9YL22-B6QZVVGW-ENMKT88V-7TGNYGHW
Product : Cristie Bare Machine Recovery (CBMR)
Version : 9.2
Trial ends on : 2021-06-24

Status : Trial licence
```

The Cristie License Manager will be refreshed showing your Contract ID, the new Activation code and your contract support end date.

```
=====
Cristie License Manager Version
          9.2
Copyright (C) 2012-2021 Cristie Software Limited
=====
Successfully applied the activation code.
Machine attributes : {virtual, server}
Contract ID : 1
Signature : LNE9YL22-B6QZVVGW-ENMKT88V-7TGNYGHW
Product : Cristie Bare Machine Recovery (CBMR)
Version : 9.2
Maintenance ends on : 2022-12-31

Activation code : MFMTDLUH-F78Z5PK2-9HHYJQJC-PABDYQLT
Activation type : Product activation
Maintenance ends on : 2022-12-31
Attributes : {virtual, server}

Status : Full licence
```



## 4 Cristie Technical Support

If you have any queries or problems concerning your Cristie Bare Machine Recovery product, please contact Cristie Technical Support. To assist us in helping with your enquiry, make sure you have the following information available for the person dealing with your call:

- CBMR Version Number
- Installed OS type and version
- Any error message information (if appropriate)
- Description of when the error occurs
- All Cristie log files relating to the source or recovery machine. This is very important to help us provide a quick diagnosis of your problem

### **Contact Numbers - Cristie Software (UK) Limited**

<b>Technical Support</b>	+44 (0) 1453 847 009
<b>Toll-Free US Number</b>	1-866-TEC-CBMR (1-866-832-2267)
<b>Knowledgebase</b>	<a href="http://kb.cristie.com">kb.cristie.com</a>
<b>Forum</b>	<a href="http://forum.cristie.com">forum.cristie.com</a>
<b>Sales Enquiries</b>	<a href="mailto:sales@cristie.com">sales@cristie.com</a>
<b>Email</b>	<a href="mailto:support@cristie.com">support@cristie.com</a>
<b>Web</b>	<a href="http://www.cristie.com">www.cristie.com</a>

### **Support Hours**

05:00 to 17:00 Eastern Standard Time (EST) Monday to Friday

Out-of-Hours support available to customers with a valid Support Agreement - Severity 1 issues\* only

UK Bank Holidays\*\* classed as Out-of-Hours - Severity 1 issues only.

\*Severity 1 issues are defined as: a production server failure, cannot perform recovery or actual loss of data occurring.

\*\*For details on dates of UK Bank Holidays, please see [www.cristie.com/support/](http://www.cristie.com/support/)

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