



# Configuring databases

## SnapManager Oracle

NetApp  
April 15, 2021

# Table of Contents

- Configuring databases ..... 1
  - Configuring the target database ..... 1
  - Creating an Oracle database user for the target database ..... 1
  - Creating the repository database instance ..... 1
  - Creating an Oracle user for the repository database instance ..... 2
  - Verifying the Oracle listener configuration ..... 2

# Configuring databases

You must configure at least two Oracle databases: a target database that you want to back up using SnapManager; and a repository database to store the target database metadata. The target database and the SnapManager repository database must be configured and online before performing SnapManager operations.

## Configuring the target database

The target database is an Oracle database that can be configured either as standalone, Real Application Clusters (RAC), Automatic Storage Management (ASM), or any other supported combinations.

1. Configure the target database by referring *TR-3633*.

### Related information

[NetApp Technical Report 3633: Best Practices for Oracle Databases on NetApp Storage](#)

## Creating an Oracle database user for the target database

An Oracle database user is required to log in to the database and perform SnapManager operations. You must create this user with the *sysdba* privilege if a user with the *sysdba* privilege does not exist for the target database.

SnapManager can use any Oracle user with the *sysdba* privilege that exists for the target database. For example, SnapManager can use the default *sys* user. However, even if the user exists, you can create a new user for the target database and assign the *sysdba* privilege.

You can also use the OS authentication method wherein the operating system (OS) allows the Oracle database to use the credentials that are maintained by the OS to authenticate users to log in to the database and perform SnapManager operations. If you are authenticated by the OS, you can connect to the Oracle database without specifying a user name or password.

1. Log in to SQL \*Plus: 'sqlplus / as sysdba'
2. Create a new user with an administrator password: 'create user user\_name identified by admin\_password;'

user\_name is the name of the user you are creating and admin\_password is the password that you want to assign to the user.

3. Assign the sysdba privilege to the new Oracle user: 'grant sysdba to user\_name;'

## Creating the repository database instance

The repository database instance is an Oracle database in which you create the SnapManager repository. The repository database instance must be a stand-alone database and cannot be the target database.

You must have an Oracle database and a user account to access the database.

1. Log in to SQL \*Plus: 'sqlplus / as sysdba'
2. Create a new tablespace for the SnapManager repository: 'create tablespacetablespace\_name datafile '/u01/app/oracle/oradata/datafile/tablespace\_name.dbf' size 100M autoextend on;'

tablespace\_name is the name of the tablespace.

3. Verify the block size of the tablespace: 'select tablespace\_name, block\_size from dba\_tablespaces;'

SnapManager requires a minimum 4-K block size for the tablespace.

### Related information

[NetApp Technical Report 3761: 'SnapManager for Oracle: Best Practices'](#)

## Creating an Oracle user for the repository database instance

An Oracle user is required to log in to and access the repository database instance. You must create this user with *connect* and *resource* privileges.

1. Log in to SQL \*Plus: 'sqlplus / as sysdba'
2. Create a new user and assign an administrator password to that user: 'create useruser\_name identified by admin\_password default tablespace tablespace\_name quota unlimited on tablespace\_name;'
  - user\_name is the name of the user you are creating for the repository database.
  - admin\_password is the password you want to assign to the user.
  - tablespace\_name is the name of the tablespace created for the repository database.
3. Assign *connect* and *resource* privileges to the new Oracle user: 'grant connect, resource to user\_name;'

## Verifying the Oracle listener configuration

The listener is a process that listens for client connection requests. It receives incoming client connection requests and manages the traffic of these requests to the database. Before connecting to a target database or repository database instance, you can use the STATUS command to verify the listener configuration.

The STATUS command displays basic status information about a specific listener, including a summary of listener configuration settings, listening protocol addresses, and a summary of services registered with that listener.

1. Enter the following command at the command prompt: 'lsnrctl STATUS'

The default value assigned to the listener port is 1521.

## Copyright Information

Copyright © 2021 NetApp, Inc. All rights reserved. Printed in the U.S. No part of this document covered by copyright may be reproduced in any form or by any means-graphic, electronic, or mechanical, including photocopying, recording, taping, or storage in an electronic retrieval system- without prior written permission of the copyright owner.

Software derived from copyrighted NetApp material is subject to the following license and disclaimer:

THIS SOFTWARE IS PROVIDED BY NETAPP "AS IS" AND WITHOUT ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, WHICH ARE HEREBY DISCLAIMED. IN NO EVENT SHALL NETAPP BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

NetApp reserves the right to change any products described herein at any time, and without notice. NetApp assumes no responsibility or liability arising from the use of products described herein, except as expressly agreed to in writing by NetApp. The use or purchase of this product does not convey a license under any patent rights, trademark rights, or any other intellectual property rights of NetApp.

The product described in this manual may be protected by one or more U.S. patents, foreign patents, or pending applications.

RESTRICTED RIGHTS LEGEND: Use, duplication, or disclosure by the government is subject to restrictions as set forth in subparagraph (c)(1)(ii) of the Rights in Technical Data and Computer Software clause at DFARS 252.277-7103 (October 1988) and FAR 52-227-19 (June 1987).

## Trademark Information

NETAPP, the NETAPP logo, and the marks listed at <http://www.netapp.com/TM> are trademarks of NetApp, Inc. Other company and product names may be trademarks of their respective owners.