

RTI Limited Bandwidth Plugins

Installation Guide

Version 7.3.0



Trademarks

RTI, Real-Time Innovations, Connex, Connex Drive, NDDS, the RTI logo, 1RTI and the phrase, “Your Systems. Working as one.” are registered trademarks, trademarks or service marks of Real-Time Innovations, Inc. All other trademarks belong to their respective owners.

Copy and Use Restrictions

No part of this publication may be reproduced, stored in a retrieval system, or transmitted in any form (including electronic, mechanical, photocopy, and facsimile) without the prior written permission of Real-Time Innovations, Inc. The software described in this document is furnished solely under and subject to RTI's standard terms and conditions available at <https://www.rti.com/terms> and in accordance with your License Acknowledgement Certificate (LAC) and Maintenance and Support Certificate (MSC), except to the extent otherwise accepted in writing by a corporate officer of RTI.

Third-Party Software

RTI software may contain independent, third-party software or code that are subject to third-party license terms and conditions, including open source license terms and conditions. Copies of applicable third-party licenses and notices are located at community.rti.com/documentation. IT IS YOUR RESPONSIBILITY TO ENSURE THAT YOUR USE OF THIRD-PARTY SOFTWARE COMPLIES WITH THE CORRESPONDING THIRD-PARTY LICENSE TERMS AND CONDITIONS.

Notices

Deprecations and Removals

Any deprecations or removals noted in this document serve as notice under the Real-Time Innovations, Inc. Maintenance Policy #4220 and/or any other agreements by and between RTI and customer regarding maintenance and support of RTI's software.

Deprecated means that the item is still supported in the release, but will be removed in a future release. *Removed* means that the item is discontinued or no longer supported. By specifying that an item is deprecated in a release, RTI hereby provides customer notice that RTI reserves the right after one year from the date of such release and, with or without further notice, to immediately terminate maintenance (including without limitation, providing updates and upgrades) for the item, and no longer support the item, in a future release.

Technical Support

Real-Time Innovations, Inc.

232 E. Java Drive

Sunnyvale, CA 94089

Phone: (408) 990-7444

Email: support@rti.com

Website: <https://support.rti.com/>

Contents

Chapter 1 Download Instructions	1
Chapter 2 Paths Mentioned in Documentation	2
Chapter 3 Installation Instructions	4

Chapter 1 Download Instructions

This document provides instructions on how to download and install the *RTI® Limited Bandwidth Plugins*.

Log into the RTI Customer Portal, <https://support.rti.com/>. You will need your username and password, which are included in the letter confirming your purchase. If you do not have this letter, please contact license@rti.com. If you need help with the download process, contact support@rti.com.

Once you have logged into the portal, select the Downloads tab. Choose the appropriate version of *RTI Connex*t and look for the *RTI Limited Bandwidth Plugins* packages. Download a host and a target bundle:

- **rti_limited_bandwidth_plugins-7.3.0-host-<host platform>.rtipkg**

This includes the compiler-independent *Limited Bandwidth Plugins* dependencies (documentation and the libraries used by RTI tools and services) for the host platform.

- **rti_limited_bandwidth_plugins-7.3.0-target-<target architecture>.rtipkg**

This contains the *Limited Bandwidth Plugins* libraries you will link against for your target architecture.

<host platform> names depend on your host (**x64Linux** for Linux® systems and **x64Win64** for Windows® systems).

<target architecture> names are described in the [RTI Connex](#)t Core Libraries Platform Notes.

Chapter 2 Paths Mentioned in Documentation

The documentation refers to:

- **<NDDSHOME>**

This refers to the installation directory for *RTI® Connex®*. The default installation paths are:

- macOS® systems:
/Applications/rti_connex_dds-7.3.0
- Linux systems, *non-root* user:
/home/<your user name>/rti_connex_dds-7.3.0
- Linux systems, *root* user:
/opt/rti_connex_dds-7.3.0
- Windows® systems, user without Administrator privileges:
<your home directory>\rti_connex_dds-7.3.0
- Windows systems, user with Administrator privileges:
C:\Program Files\rti_connex_dds-7.3.0

You may also see **\$NDDSHOME** or **%NDDSHOME%**, which refers to an environment variable set to the installation path.

Wherever you see **<NDDSHOME>** used in a path, replace it with your installation path.

Note for Windows Users: When using a command prompt to enter a command that includes the path **C:\Program Files** (or any directory name that has a space), enclose the path in quotation marks. For example:

```
"C:\Program Files\rtdi_connext_dds-7.3.0\bin\rtiddsgen"
```

Or if you have defined the **NDDSHOME** environment variable:

```
"%NDDSHOME%\bin\rtiddsgen"
```

- *<path to examples>*

By default, examples are copied into your home directory the first time you run *RTI Launcher* or any script in **<NDDSHOME>/bin**. This document refers to the location of the copied examples as *<path to examples>*.

Wherever you see *<path to examples>*, replace it with the appropriate path.

Default path to the examples:

- macOS systems: **/Users/<your user name>/rtdi_workspace/7.3.0/examples**
- Linux systems: **/home/<your user name>/rtdi_workspace/7.3.0/examples**
- Windows systems: **<your Windows documents folder>\rtdi_workspace\7.3.0\examples**

Where 'your Windows documents folder' depends on your version of Windows. For example, on Windows 10, the folder is **C:\Users\<your user name>\Documents**.

Note: You can specify a different location for **rtdi_workspace**. You can also specify that you do not want the examples copied to the workspace. For details, see *Controlling Location for RTI Workspace and Copying of Examples* in the *RTI Connex Installation Guide*.

Chapter 3 Installation Instructions

You do not need root/administrator privileges:

1. Install the *Connex* host and target bundles as described in the [RTI Connex Installation Guide](#).
2. Make sure you have a compatible version of *Connex*, as described in the [RTI Limited Bandwidth Plugins Release Notes](#).
3. Install *the Limited Bandwidth Plugin* host and target packages on top of *Connex*:
 - **rti_limited_bandwidth_plugins-7.3.0-host-<host platform>.rtipkg**
 - **rti_limited_bandwidth_plugins-7.3.0-target-<target architecture>.rtipkg**

<host platform> depends on your host (such as **x64Linux** on Linux® systems and **x64Win64** on Windows® systems).

<target architecture> is one of the supported platforms, see the [RTI Limited Bandwidth Plugins Release Notes](#).

After installation, the Limited Bandwidth Plugins libraries will be in **<NDDSHOME>/lib/<target architecture>**. Please see the [RTI Limited Bandwidth Plugins User's Manual](#) for an overview of each plugin's capabilities and configuration instructions. Examples are provided in these directories:

- **<path to examples>/connex_dds/c/limited_bandwidth_plugins:**
 - lbpdiscovery
 - lbtrtps
 - zrtps

- **<path to examples>/connext_dds/c++11/limited_bandwidth_plugins:**
 - dil-stacking