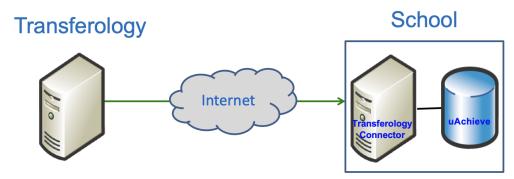
# **Transferology Connector**

The Transferology Connector provides degree audits and course equivalencies from uAchieve to Transferology. The Transferology Connector is a Java web application installed at your school.

The following diagram provides a high level view of the Transferology Connector and its relationship with Transferology.



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If you are unfamiliar with the Transferology Connector, please see Getting Started With the Transferology Connector.



### **Mandatory Requirements**

The following requirements are mandatory to successfully install, configure, and operate the Transferology Connector:

- Java SE 8 If your institution is unfamiliar with java, please see Free Java 8 Implementations.
- TLSv1.2 The Transferology web service which receives degree audits no longer supports TLSv1 or TLS v1.1. Java 8 and higher use TLSv1.2 by default.
- Java Application Server CollegeSource recommends Tomcat 8.5.x or 9.0.x, which can be obtained from the following page: http://t omcat.apache.org/index.html
- Firewalls
  - School's External firewall must allow traffic to:
    - Your production Transferology Connector from www.transfer.org (18.207.24.42).
    - Your test/development Transferology Connector from test.transfer.org (23.22.104.35).
    - CollegeSource recommends restricting access to the Transferology Connector only after it is correctly installed and configured. Restricting access prior to this makes troubleshooting difficult.
  - Internal TCP keepalive must be enabled between your Java Application Server and database when the JDBC connection traverses an internal firewall.
- OS access You need OS access to Java application server to perform functions such as copying and editing files
- uachieve database tables minimum table definition version 4.4.
- uachieve audit server When using degree audits, minimum version 4.2.2.
- Database user and password Necessary for the Connector to access uachieve tables
- JDBC Driver You need a JDBC Driver that is compatible with your specific database type. If you do not currently use a JDBC Driver, see one of the following pages:
  - Oracle http://www.oracle.com/technetwork/indexes/downloads/index.html
  - SqlServer http://sourceforge.net/project/showfiles.php?group\_id=33291
  - DB2 http://publib.boulder.ibm.com/infocenter/db2luw/v8/index.jsp
- Specify the correct daversion in the cas4.properties:
  - daversion=uachieve
- uAchieve Degree Audits When using the degree audit functionality, define RequestHandler in uAchieve's daemonContext.xml.

### 5.0 Features

- Compatible with uachieve API 4.4.0, including the Long data type for the job\_queue\_xxx int\_seq\_no columns.
- Provides native uAchieve degree audit report types to Transferology (TXT, HTM and PDF).
- Provides web services to facilitate the next day equivalency refresh into Transferology.
- · For uachieve degree audits, provides server name and directory location of the uachieve server which produced the degree audit.

For features provided in earlier versions, see Connector Milestones.

### **Additional Information**

- The Transferology Connector does NOT access a school's Student Information System
- Transferology makes HTTP (or HTTPS when defined) connections to the Transferology Connector
- Transferology sends/requests data via POST
- · Schools can use an SSL Certificate to secure the data exchange between Transferology and the Transferology Connector
- Schools can restrict access to Transferology Connector with their firewall by only allowing Transferology (18.207.24.42) traffic to reach the Transferology Connector

### Upgrade



Upgrading to the 5.0.x Transferology Connector?

The uachieve database must have JOB\_QUEUE tables upgraded to uAchieve 4.4.

When upgrading to the 5.0.x version of the Connector, follow these steps:

- 1. Execute the Connector 5.0 sql database script for your particular database. The script adds the <code>last\_mod\_descendant\_utc</code> column to the <code>tca\_master</code> and <code>tca\_rule</code> tables.
  - a. Oracle connector-oracle-5\_0.sql
  - b. SQL Server connector-mssql-5\_0.sql
  - c. DB2 connector-db2-5\_0.sql
- 2. Execute the Connector 5.0 sql database trigger script for your particular database. The triggers maintain the **last\_mod\_descendant\_utc** columns of the **tca\_master** and **tca\_rule** tables.
  - a. Oracle connector-oracle-triggers-5\_0.sql
  - b. SQL Server coming soon
  - c. DB2 coming soon
- 3. Install the 5.0.x Connector version.
- 4. The configuration instructions for the **RequestHandler** defined in the **uAchieve daemonContext.xml** were revised due to the additional uachieve report types HTM and PDF.
- 5. Use the Transferology Lab's Audit Setup page to:
  - a. Change the Audit request format to: Connector 5.x
  - b. Change the Audit Report type to: TXT, HTM or PDF



Transferology Connector 5.0.x, 4.4.x and 4.3.x Compatibility with uAchieve versions

 The above Mandatory Requirements section identifies the minimum uAchieve audit server and uAchieve tables which are compatible with the Transferology Connector versions 5.0.x, 4.4.x and 4.3.x.

## Install and Configure



### Install and Configure the Transferology Connector

When you are ready to install and configure the Transferology Connector, follow these steps:

- 1. Database Access by Transferology Connector into uachieve tables.
- 2. Install and Configure Transferology Connector
- 3. If your school's uAchieve encoding specifies **default or reference only** tables in your equivalencies, keep in mind, **Transferology does NOT recognize all types of default or reference tables.** The following types of default or reference tables are recognized by Transferology:
  - Defaulting MSTREF Data Reference Only
  - Defaulting TA Rules Reference Only
  - Defaulting TA Rules All Articulation Rules
  - Default TA Table With Additional Rules

Transferology doesn't recognize Defaulting Unknown Institutions and Courses aka Super Default.

Please review the following documentation for uAchieve default or reference tables encoding details: Setting Up Default Tables



### NOTE:

You must have a Support Center account to view this page; create one here.

### **Troubleshooting**

Several troubleshooting pages.