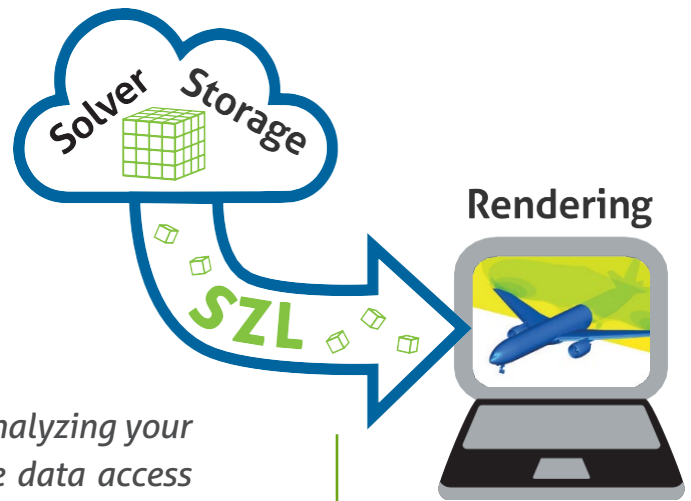


# tecplot 360 AND SZL server



Spend less time transferring data and more time analyzing your simulation results with Tecplot SZL Server remote data access module. SZL Server is included\* with Tecplot 360.

SZL Server is a lightweight application that is installed on your HPC, data server or remote file store (including cloud resources like Amazon's AWS). The server side leverages our SZL technology to transfer only the data required to generate a specific plot.

- **Lightweight data server** — requires no graphics capabilities on the server side and uses less CPU and RAM resources than would be required when the server is doing the rendering work.
- **Fast model manipulation** — The rendering is done locally which means zooming, translating, and rotating are just as fast if the data had been local!
- **Secure data transfer** — Encrypted data transfer via SSH is an option to keep your data secure.
- **Secure Access** — Server access can be secured using passwords, 2-factor authentication or SSH public/private key pairs.

SZL Server uses Tecplot proprietary SZL Technology and requires your data to be in SZL (.szplt) format.

## Converting your data to SZL format is easy! Use one of these methods:

1. **SZL convert tool.** This method converts your data to SZL format without consuming a Tecplot 360 license. Instructions are shown in the video tutorial at [www.tecplot.com/szlconvert](http://www.tecplot.com/szlconvert).
2. **Use TecIO.** Write SZL directly from your CFD code using TecIO. Learn more at [www.tecplot.com/tecio](http://www.tecplot.com/tecio).
3. **Interactive or batch mode.** Load your data into Tecplot 360 and write it out in SZL format, interactively or in batch mode. Learn more at [www.tecplot.com/szl](http://www.tecplot.com/szl).

Find out which CFD solver codes already output SZL file format at [www.tecplot.com/cfd-codes](http://www.tecplot.com/cfd-codes).

SZL Server Installation instructions are in your Tecplot 360 documentation or at [www.tecplot.com/documentation](http://www.tecplot.com/documentation).

Learn more about SZL Server at:  
[www.tecplot.com/szl-server](http://www.tecplot.com/szl-server)

\*SZL Server is available to customers on TecPLUS maintenance.



Try  
Tecplot 360:  
[tecplot.com/360](http://tecplot.com/360)



# SZL Server FAQs

## Where do I get the SZL Server?

SZL Server is included in the Tecplot 360 installation in the 'szlserver' folder. It is also available as a separate download at [www.tecplot.com/szl-server](http://www.tecplot.com/szl-server).

## How do I install and run it?

First install Tecplot 360 on the client machine and find the szlserver directory in the install directory. This folder contains an installation script to be run on Linux platforms. Watch the video at <http://bit.ly/szlserversetup>.

Once the server component is installed, run Tecplot 360 and choose the **File > Load Remote Data...** option. Fill in the required credentials and press Connect. This will start the server and make the connection. You can now load data from the remote machine.

## How does it work?

SZL Server uses our subzone load-on-demand technology to transfer surface data and small chunks of volume data (subzones) from the server to the client. Compared to architectures that load the full data and do extractions on the server side, SZL Server loads less data and does less work on the server side - meaning that it can be much faster to get to the first image.

This also makes SZL Server very lightweight on the server side - its primary responsibility is to load data, which requires no graphics resources and relatively little RAM and CPU resources. The client side is responsible for the rendering and data processing. This also means that there is no rendering latency which can be common with remote desktop solutions.

## Can I use SZL Server on a virtual machine?

Of course! Most of our testing was done on Linux VMs and we've done some testing using Amazon's EC2 as well. Tecplot 360 (the client side) runs best on real hardware with a modern graphics card.

## Can I open layout files and run macros on the remote machine?

Layouts and macros must reside on the client side and reference remote data. SZL Server is a server-side data provider that requires the data be in Tecplot SZL file format. SZL Server can only load Tecplot SZL data files.

## How do I convert my data to SZL format?

If you're using FUN3D, VULCAN-CFD, Tau (DLR) and a growing list of other codes ([www.tecplot.com/products/cfd-codes](http://www.tecplot.com/products/cfd-codes)), you can export SZL format directly. Any file format supported by Tecplot 360 can be converted to SZL. Find out how to convert your data to SZL file format at [www.tecplot.com/szlconvert](http://www.tecplot.com/szlconvert). Tecplot 360 includes the command line option (-convert), which allows you to convert your data without checking out a license.

## What if I perform an action that requires me to save my data when I save the layout?

Operations that manipulate or create new data like interpolation will require the data set to be saved to a new file. In this case the data must be saved locally which will cause the entire data set to be streamed across the SSH connection.

## Can I load both local and remote data in a single Tecplot 360 session?

Yes! You can load data via SZL Server in one frame in Tecplot 360 and load any other data into another frame. You can even load data from multiple servers into each frame. *Loading multiple data sets and appending them into a single frame is not yet supported.*

## Which platforms do you support?

The server side is supported on Linux only. The client side will work on any platform supported by Tecplot 360. See the Requirements tab at: [www.tecplot.com/360](http://www.tecplot.com/360).

## Do I need a separate license?

SZL Server itself does not require a license, however the client side requires Tecplot 360 with active TecPLUS maintenance. Learn more at [www.tecplot.com/tecplus](http://www.tecplot.com/tecplus).

Contact Technical Support. Email [support@tecplot.com](mailto:support@tecplot.com). Call 425-653-9393.