

LARS Bridge CONNECT Edition Release 10.00.00.01

Release Notes



LARS Bridge CONNECT Edition v10.00.00.01 is the initial version of this product with CONNECT integration, and all LARS tools (LARS Connector, LARS Manager, LARS Complex Truss) are now launched from a single application.

This is also a maintenance release that incorporates several improvements to the graphical user interface, improved floorbeam analysis, LARS Connector compatibility with AASHTOWare BrR 6.7, and miscellaneous maintenance fixes.

The following items are included in this release:

[CONNECT Integration](#)


Bentley CONNECT is used to connect the people, information, systems and resources for the projects in your organization. LARS Bridge CONNECT Edition allows you to associate your file with a CONNECTED project for tracking application usage to that project.

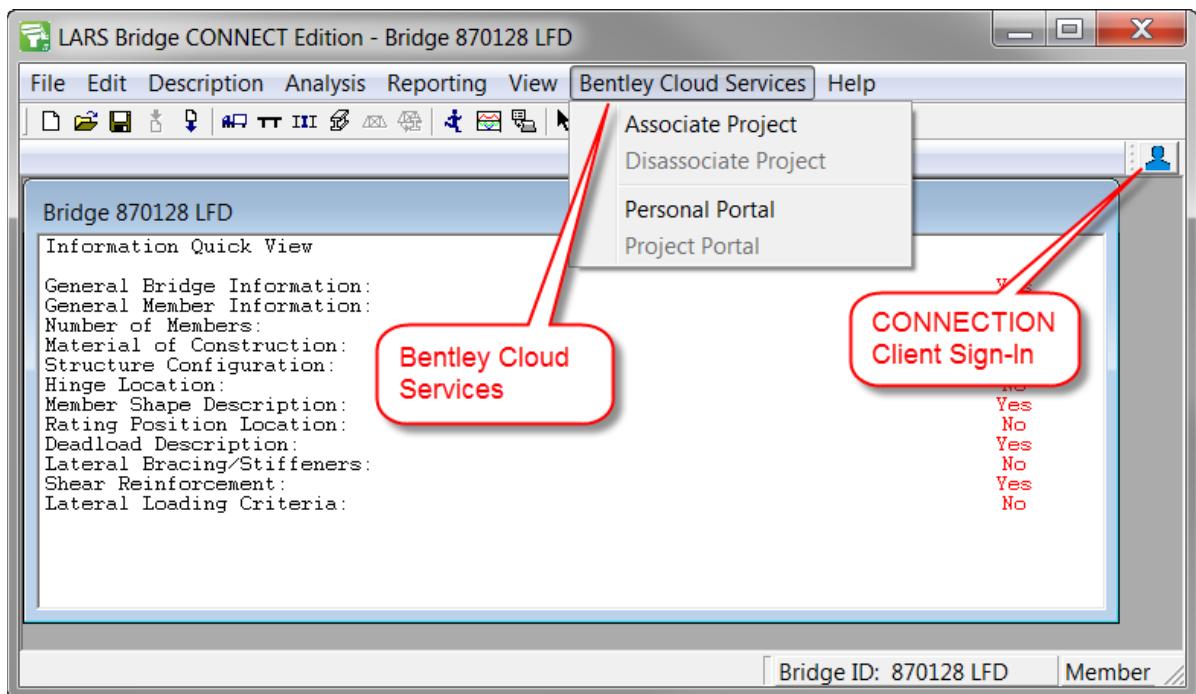
Get CONNECTED

If you do not already have a CONNECT account, it is fast and free to register. Your Bentley CONNECT account provides access to:

- LEARN Content and personal LEARN Path Management
- Application usage tracking across your organization's CONNECTED Projects
- Share documents with others across your projects
- Access shared documents directly from Bentley's Mobile Apps

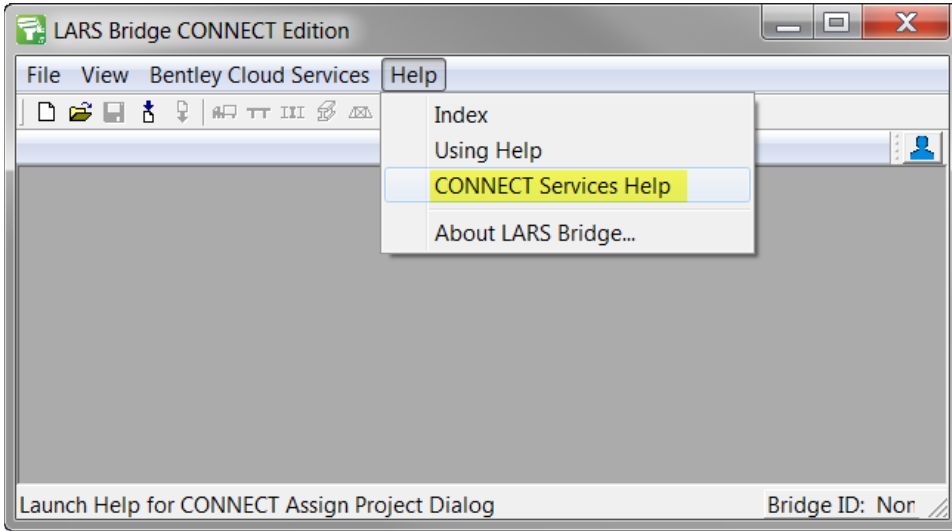
Visit www.bentley.com/connect to learn more and register. Continue to check our website and your Personal Portal as Bentley continues to add new functionality.

You can access your Personal Portal and Project Portal through the **Bentley Cloud Services** menu in LARS Bridge CONNECT Edition or by visiting <https://connect.bentley.com>. Use Bentley's **CONNECTION Client** on your desktop to sign in. It is installed with LARS Bridge CONNECT Edition and can be found in the Windows notification area (system tray). Click the **CONNECTION Client** icon , type your Email and Password, and click Sign In.



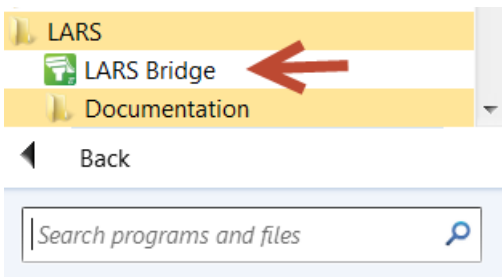
[Online Help](#)

Help on CONNECT Services is also available under “Help ...” | “CONNECT Services Help”

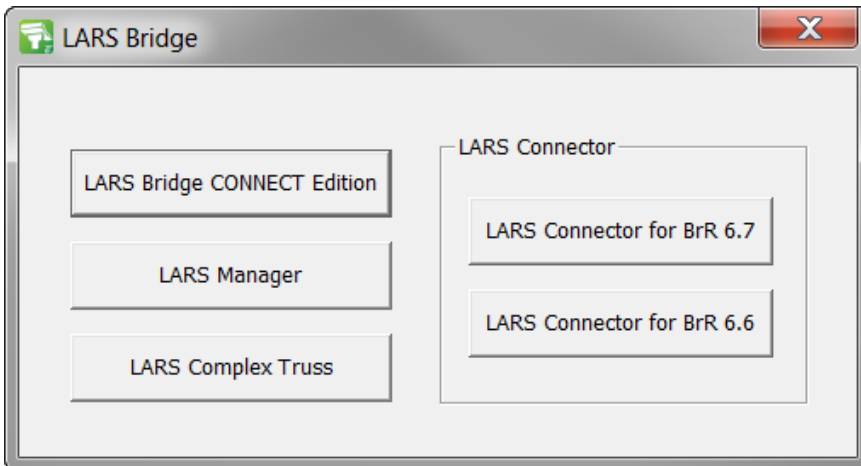


[Single LARS Application Launch Point](#)

All LARS tools are now launched from a single application **LARS Bridge** on the Start Menu.



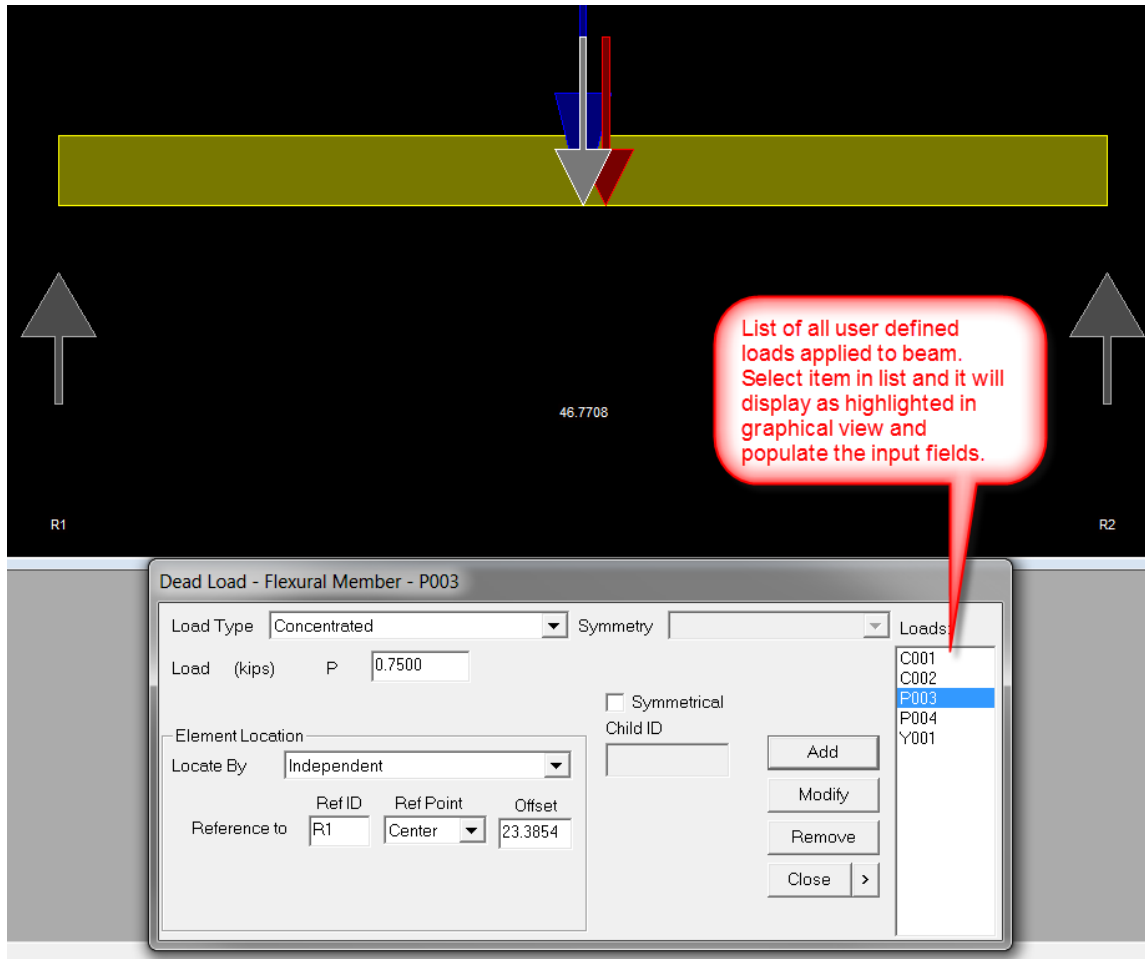
Press the button on this application corresponding to the desired tool and the tool will launch the same as previously.



Maintenance Items and Improvements

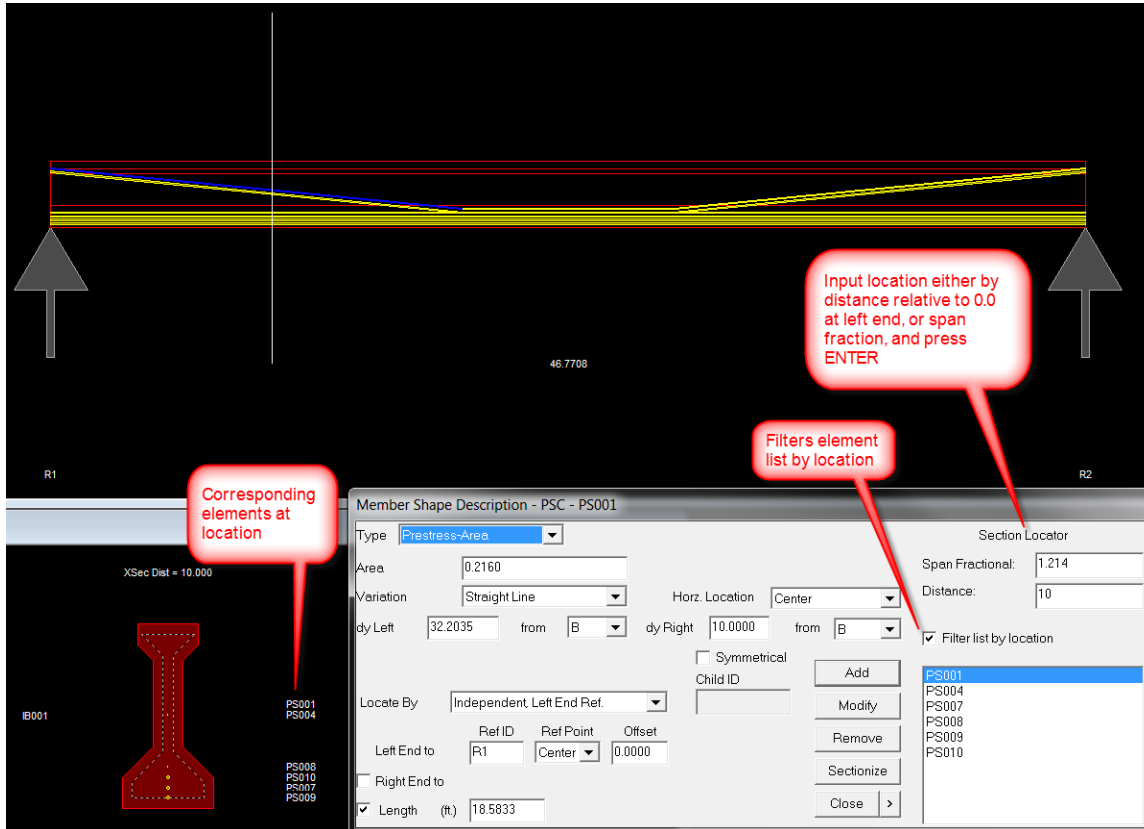
1. Graphical user interface – list windows

Several input screens, such as dead loads, now have an element list incorporated into the screen. This feature assists in determining at quick glance how many elements are associated with the member and where they are located. It also facilitates finding elements hidden behind other elements. As an example for the dead load screen:



2. Graphical user interface – section locator

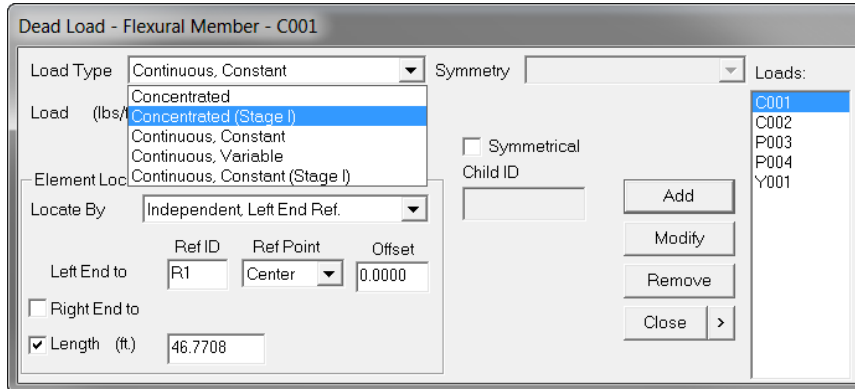
Several input screens containing the element lists also have a section locator feature incorporated into them, and the ability to filter elements by location. A section may be located by specifying either the distance along the beam relative to 0.0 at left end, or the span fraction. As an example for locating all of the prestressing tendons at a given location:



3. Improved floorbeam analysis

Floorbeams are now analyzed based on consideration of maximum effect from multiple live load cases, beginning with one lane and ending with the maximum number of lanes that will fit within the roadway. Multiple presence factor is considered based on the number of lanes being applied. The roadway is currently assumed centered on the main floorbeam span between supports, however, it may extend onto cantilevers when present.

4. Added Concentrated Stage 1 dead load input:



5. Miscellaneous maintenance fixes:

- 2015 AASHTO interim revisions
- LRFD Condition factor ϕ_c is now available for trusses
- LRFD System factor ϕ_s and condition factor ϕ_c are no longer applied to service limit state
- Revised PSC Service III to use F_{py} instead of F_{pu} , where $F_{py} = 0.9 F_{pu}$
- Checkpoints within the minimum stiffener spacing of any support will now use the minimum stiffener spacing for the shear capacity calculation.
- Removed stiffener spacing requirement check for handling: ASR 10.34.4.2 and LFR 10.48.8.3
- Stiffened steel girders will now consistently be treated as unstiffened if the input stiffener spacing exceeds the maximum spacing limits specified by AASHTO. In the case of longitudinally stiffened girders, if the stiffener spacing exceeds 1.5D but meets requirements of 10.34.3.1.1 for ASR or equations 10-104 and 10-120 (as applicable) for LFR, the maximum spacing will be 3D.
- Enabled impact override for LRFR.
- Revised RC material reinforcement Yield (F_y) input to interpret 40000, 50000, and 60000 as grades 40, 50, and 60 respectively. Former method of using 99040, 99050, and 99060 will still work.
- Fixed "Never Compact" switch.