

 RELEASE NOTES

Altair Inspire Extrude 2021 and 2021.0.1

New Features and Enhancements 2021

Altair Inspire Extrude 2021 includes the following new features and enhancements.

Inspire Resin Transfer Molding

Resin Transfer Molding Application

In this release, we are introducing a resin transfer molding simulation to Inspire Extrude. This is a separate application that is packaged with the Inspire Extrude installer.

The model setup for resin transfer molding can be achieved with a few mouse clicks, and the simulation can be run with or without drape analysis. The user interface supports all basic boundary conditions, and you can identify the cavity parts and submit a run by providing a few process parameters. Users can also start with the existing mesh by selecting the mesh file in the export dialog. Batch processes is also available to create the data deck for the solver.

Inspire Extrude Metal and Inspire Extrude Polymer

Import Material (.mtl) Files

Inspire Extrude Metal and Inspire Extrude Polymer now support importing of .mtl files into the Extrude material database. This will allow users to add new materials to the simulation.

Inspire Friction Stir Welding

Tilt Angle

In Inspire Friction Stir Welding version 2021, you can now create a pin with a tilt angle. The model setup will automatically adjust the geometry as per the pin tilt.

New Features and Enhancements 2021.0.1

Altair Inspire Extrude 2021.0.1 includes the following new features, enhancements, or resolved issues.

Resolved Issues

Inspire Extrude General

- Improvement in Delete Run menu option. On selecting Delete Run, IEXT now pops-up a user message asking for confirmation to delete the ongoing run. [IEXT-2315]

Inspire Extrude Metal

- Resolved critical issues in post-processing two load-step analysis. In these types of analyses, the first load step is the heat transfer analysis, and the second step is the stress analysis. They now give more accurate tool deformation results. [IEXT-2347]
- Resolved critical batch mode issues in exporting the model deck for elastoplastic analysis in both tool deflection and coupled extrusion-tool deflection analysis. [IEXT-2346]
- Resolved a critical issue in circular spray quench BC data export. [IEXT-2356]