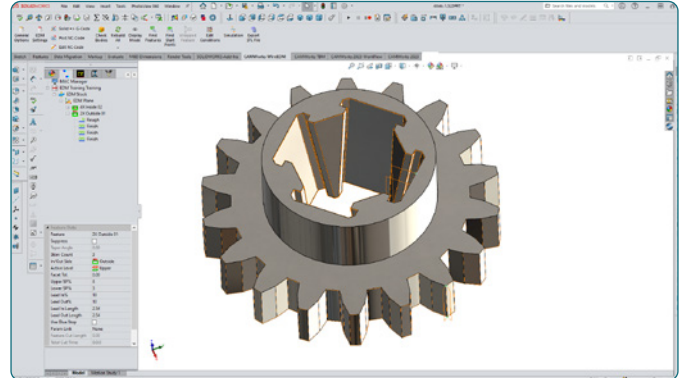# HCLSoftware
goengineer

What's New in CAMWorks 2023

HCL CAMWorks gives you the power to program smarter and machine faster – with fully integrated CAD/CAM, feature-based programming, automatic feature recognition, knowledge-based machining, and the TechDB to save and reuse your best practices. HCL CAMWorks 2023 adds functionality in direct response to customer requests, making the software even more powerful and easier to use. Below are some of the many improvements in CAMWorks 2023.
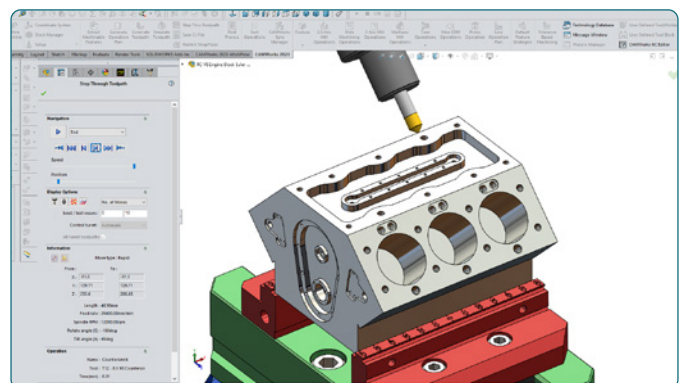
Wire EDM Premium

- Color-Coded feature recognition with cutting condition support
- Automatic open contour recognition with color coding
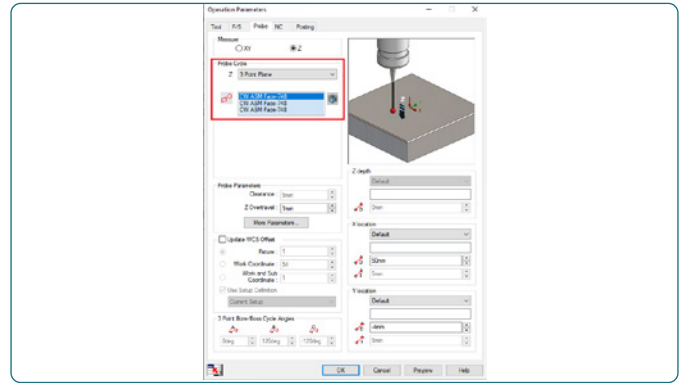- Use decals for entry points, glue stops and machine stops

Euler Angles Method for 5 Axis Rotary (3+2) Milling

- Allows the angular position of the milling part setup to be calculated using Euler angles
- Achieves desired orientation by rotating and aligning the two rotary axes of the milling machine
- Includes ZXZ and ZYZ rotation sequences
- Option to override the system-computed Euler Angles with user-assigned angles
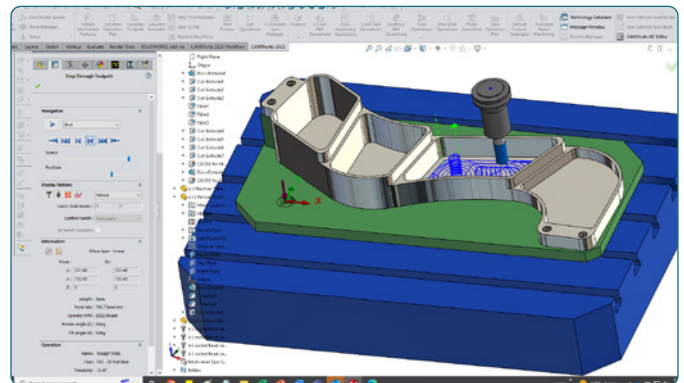
Additional Probing Cycles and Output Options for Probe Tool

- Additional probing cycles available, including:
  - 3 Point Plane
  - Angle measurements in X and Y axis
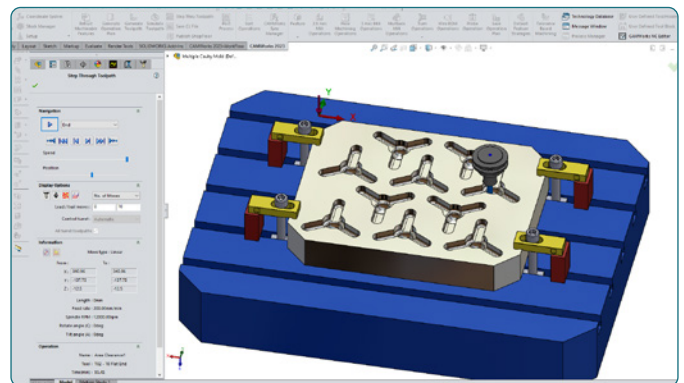 - 4th Axis Measurement in X and Y Axis

Tool Selection Logic Based on Flute Length and Feature Depth

- Improved tool selection logic that includes consideration of the tool flute length

- If the tool crib has two or more tools with identical diameter values matching the expression criteria, then the Flute Length will be taken into consideration to determine the tool to be assigned
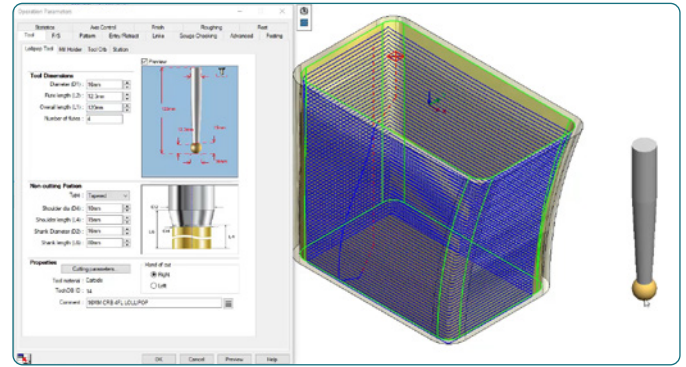

Machine Cavities with VoluMill

- High-performance toolpath for advanced material removal in 3 axis milling

- Machine Cavities-VoluMill parameter is available for area clearance operations when the pattern is set to VoluMill

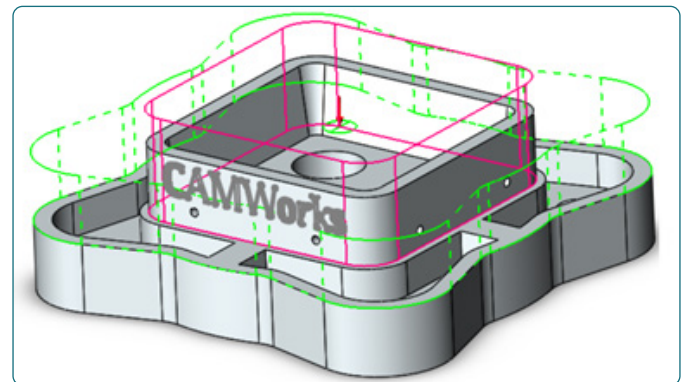- Machines only areas which are water-tight cavities

Support for Tapered and Neck Shank Type Tools

- Ability to define the shank type (straight, neck or tapered) for non-cutting portion of a tool

- Available for all milling tools listed in CAMWorks including flat end mill, ball nose mill, hog nose mill, barrel tool, face mill, drill tool, ream tool, tapered tool, thread mill tool and probe tool

- The option to define the shank type has been extended to include bore tool, corner round, countersink, dovetail, keyway and lollipop tools

Option to Define Height of 2.5 Axis Milling Islands

- Depth/Height for Island features can be defined in both Z+ and Z- directions

- Eliminate potential gouging

- Height can be extended beyond the stock height

About HCLSoftware

HCLSoftware, a division of HCLTech, develops, markets, sells, and supports software for digital transformation, data, analytics and insights, AI and automation, and enterprise security. HCLSoftware is the cloud-native solution factory for enterprise software and powers millions of apps at more than 20,000 organizations, including more than half of the Fortune 1000 and Global 2000 companies. HCLSoftware's mission is to drive ultimate customer success through relentless product innovation. https://www.hcltechsw.com