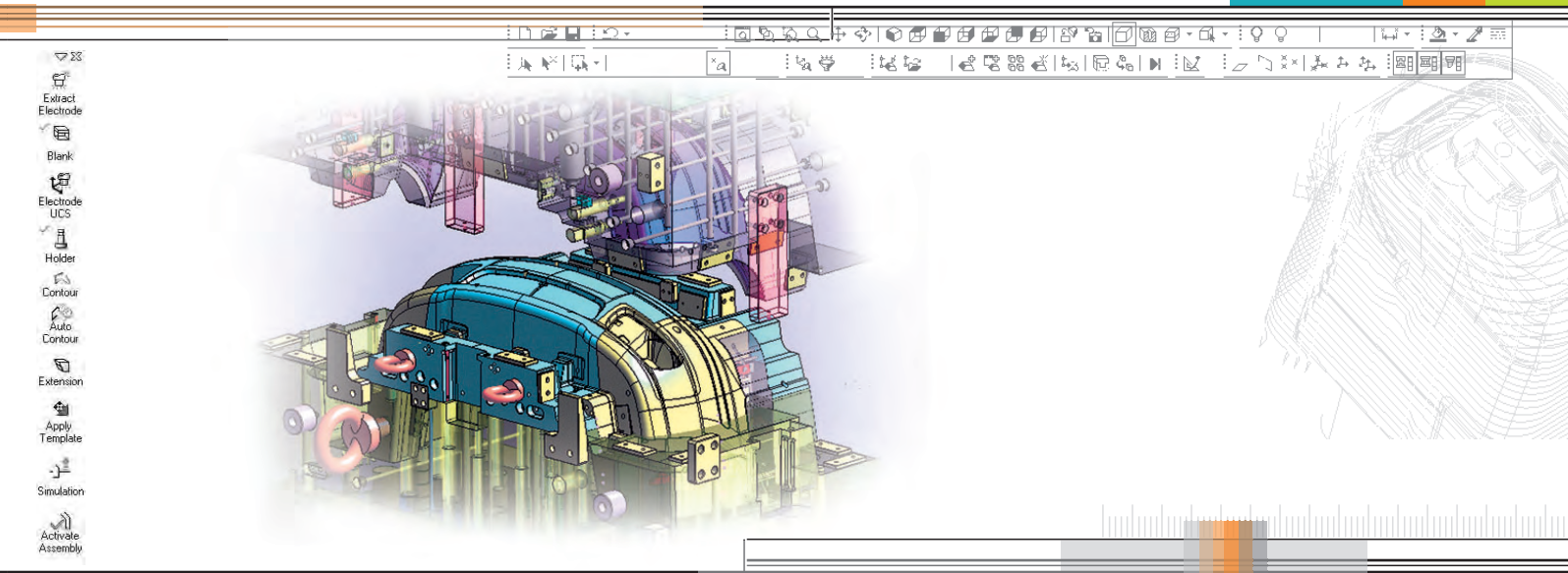


# CimatronE MoldDesign

Advanced mold design with the toolmaker in mind



Created by toolmakers for toolmakers

Maximum control and productivity with rich set of applicative tools

Built for speed – efficient wizard-based functions and ergonomic interface

Lowers time-to-market – raises quality and productivity



## **Why Cimatron**

In the highly-competitive toolmaking world, "time-to-market", "quality", and "flexibility" are not just buzzwords – they're your way of doing business, and a key to your success.

Your customers demand adaptability to a wide range of projects, faster delivery, and flexible on-the-fly response to design changes – with no compromise on quality. Prices are down, overhead up, and margins eroding. Rapid and

precise mold design can mean the difference between staying competitive and losing business.

Enter Cimatron. The world leader in toolmaking CAD/CAM solutions since 1982, Cimatron delivers the only mold design solution specifically designed to meet the unique needs of toolmakers.

### **Created by Toolmakers for Toolmakers**

For over 20 years, Cimatron has listened to toolmakers worldwide – working together closely to integrate excellent ideas from design professionals like you. The result – a field-proven mold design solution optimized to speed your design process, and experienced support engineers ready to assist you at the Cimatron customer support hotline.

### **Maximum Control**

CimatronE MoldDesign complements the knowledge and experience of mold makers. It offers the right combination of automation and hands-on decision-making power. While initial steps can be quickly accomplished with user-friendly guides, all functionality remains firmly in the experienced hands of the mold maker.

### **Rich Applicative Functionality**

CimatronE MoldDesign includes all the applicative tools that mold makers need to get the job done right the first time, including:

- Highly flexible mold base configuration
- Powerful tools for designing runners, ejectors, and cooling systems
- Automatic creation of pockets for inserts
- Smart component positioning and manipulation

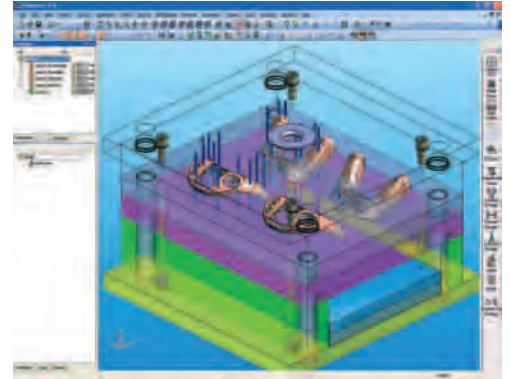
### **Built for Speed**

The Cimatron MoldDesign methodology delivers quality results with unprecedented speed. Unmatched 3D design speed and automatic BOM (Bill of Materials) creation speed time-to-market, and allow initial part ordering and manufacturing process preparation. The intuitive user interface makes the right tools available at the right time and in the right place on the screen. Uncluttered workspace with context-sensitive toolbars and menus increases productivity and shortens delivery time.

### Rapid Preliminary Design

The unique CimatronE design methodology allows unrivalled preliminary 3D design speed. The system allows rough design of cooling, ejection and runner systems. Preliminary designs are easily changed, and alternative solutions can be examined with no extra design overhead.

The result: a rapidly-produced 3D mold that can be used as a basis for final mold design after revisions and customer approval. CimatronE also automatically produces a preliminary BOM, allowing materials ordering and initial machining long before final design approval.

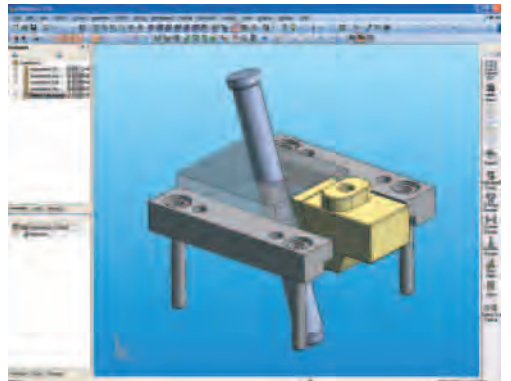


### Powerful and Time-Saving Catalog Tools

CimatronE includes highly functional catalog tools for easy access to parts from all common mold catalogs, such as Hasco, DME, Strack, Futaba, and Misumi. All catalog parts may be customized, and custom user catalog design is simple and quick. Integration of catalog parts into assemblies is simple with smart selection of sizes, easy positioning of items, and automatic pocketing for each item.

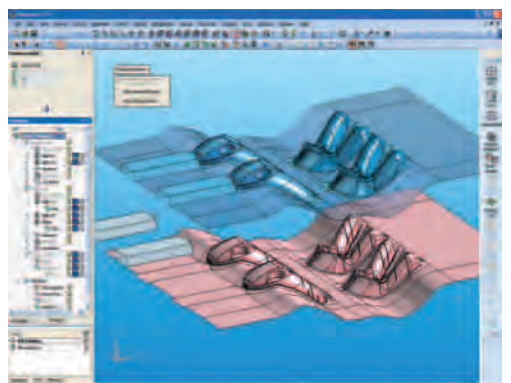
CimatronE's powerful and time-saving catalog tools allow entire sub-assemblies to be defined as one catalog item, and then re-used in other projects.

User-defined drawing libraries are also supported. These libraries allow any group of drawing features to be saved as a catalog item and retrieved for later use.



### Ready-to-Use Mechanisms

Based on the powerful CimatronE catalog tools, a rich set of mold mechanisms (sliders, lifters, etc.) is available and ready for use in assemblies. Custom catalog items may also be created for frequently-used mechanisms. This allows re-use of designs, and easy incorporation into mold assemblies.



### Optimizing Parting

CimatronE's parting application offers an advanced set of analysis and design tools, allowing smooth optimization of the cavity design process. Supporting all mold layouts – including multi-cavity and family molds – the CimatronE parting tool can handle complex parts with thousands of surfaces.

CimatronE parting tools easily analyze draft angles and undercuts, assign surfaces to different opening directions, and simulate parting motion for each given part. CimatronE parting tools deliver all the flexibility needed for active part design, including special surfacing tools for advanced parting surface design.

## Flexible Mold Base Manipulation

CimatronE's mold base tool enables mold makers to load an entire mold base plate set according to various catalog standards in just minutes. This allows fully-featured mold base editing at any point in the design process. Taking into consideration active parts size and different offsets in different directions, the tool facilitates plate size optimization. Further, the mold base tool allows the addition of various components such as leader pins and sprue bushing.

## Customized Ejection Systems

Ejection system design in CimatronE is done with a dedicated set of tools that offer:

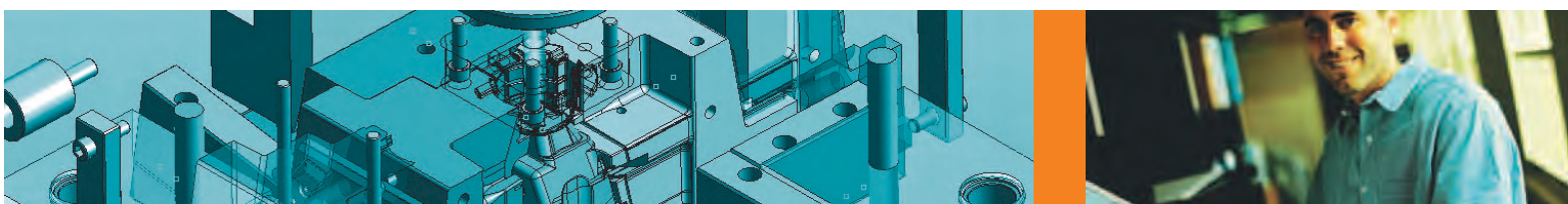
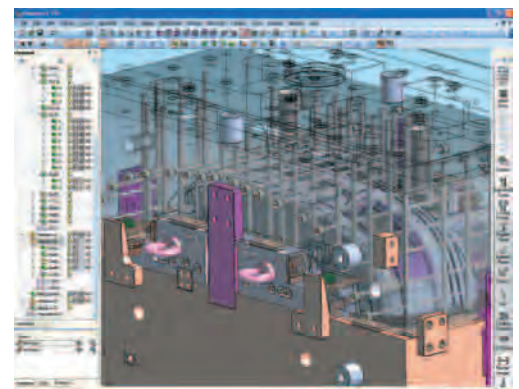
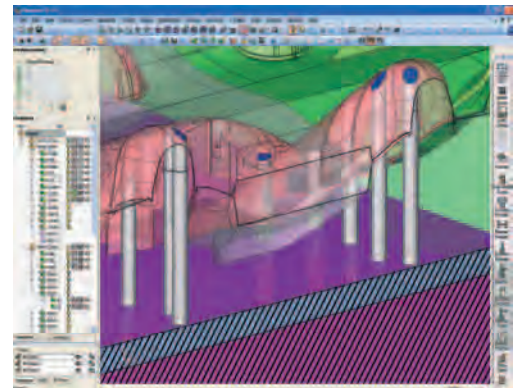
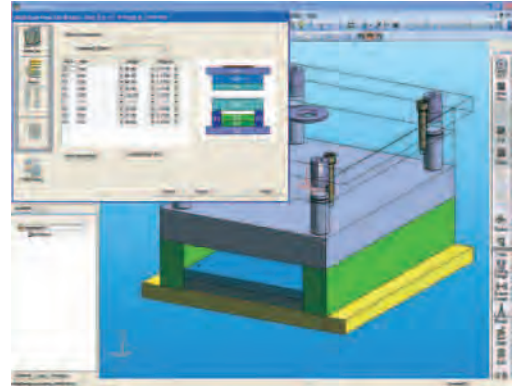
- Easy and fast positioning of ejectors, using hybrid 2D/3D techniques
- Smart trimming of ejectors, supporting all trimming methods
- Creation of a smart pocket – tight around the upper end of the ejector and loose along the body
- Linking of ejectors to CimatronE's drafting system, so they are automatically marked as ejectors in drawings

## Simplifying Complex Cooling System Design

CimatronE includes a set of tools that simplify design of complex cooling systems, including all cooling elements (channels, plugs, connectors, baffles, nipples, etc.). Leveraging the 3D environment, CimatronE design tools allow detection of interference. The system provides alerts if cooling channels are positioned too close to other key components. The highly accurate cooling channel design ensures that channel geometry takes into account the exact shape created by the drilling tools, including extensions and drill tips.

## Efficient Runner Design

CimatronE's runner design tool allows highly-efficient design of runners, including both standard and custom profiles. Automatically creating runner tips (cold slug well), these tools also separate the runner into groups of curves with similar profile dimensions. Cimatron's unique hybrid 2D/3D design automatically converts 2D sketches into 3D bodies. After the design process, runner path data can be easily exported to NC programming applications.



## Powerful CAD Tools

---

CimatronE MoldDesign is a powerful design package optimized to suit the needs of the mold designer:

- Includes all standard assembly, solid design and surfacing tools
- All design tools (including solid tools) are optimized for non-stitched models and poor quality data
- Special mold geometry tools include face and curve modification, 3D offset tools, and tools for the creation of shutoffs and runoffs

## Intuitive Working Environment

---

In the complex mold design environment, the user interface is crucial to productivity. Specially designed to meet the needs of mold designers, CimatronE enables more effective handling of large amounts of geometrical data needed for industrial-scale mold design.

The intuitive CimatronE MoldDesign user interface makes the right tools available at the right time and in the right place on the screen. The system uses wizards and guides for key processes, and smart trees, sets, modeling views, sections, context-sensitive menus and toolbars for ongoing work. CimatronE helps mold makers reach optimum efficiency with minimum distraction, and minimum training ramp-up.

## Automated Drawing

---

Generating accurate and detailed drafting and BOM is an integral part of a mold design job. CimatronE includes all the tools necessary to create any drawing from any type of modeling data. The system can handle non-stitched objects, and creation of sections on open objects. CimatronE automated drawing saves time and resources using smart templates, pre-defined preferences and data extracted from the 3D model.

## An Integrative Solution – From Quoting to Delivery

---

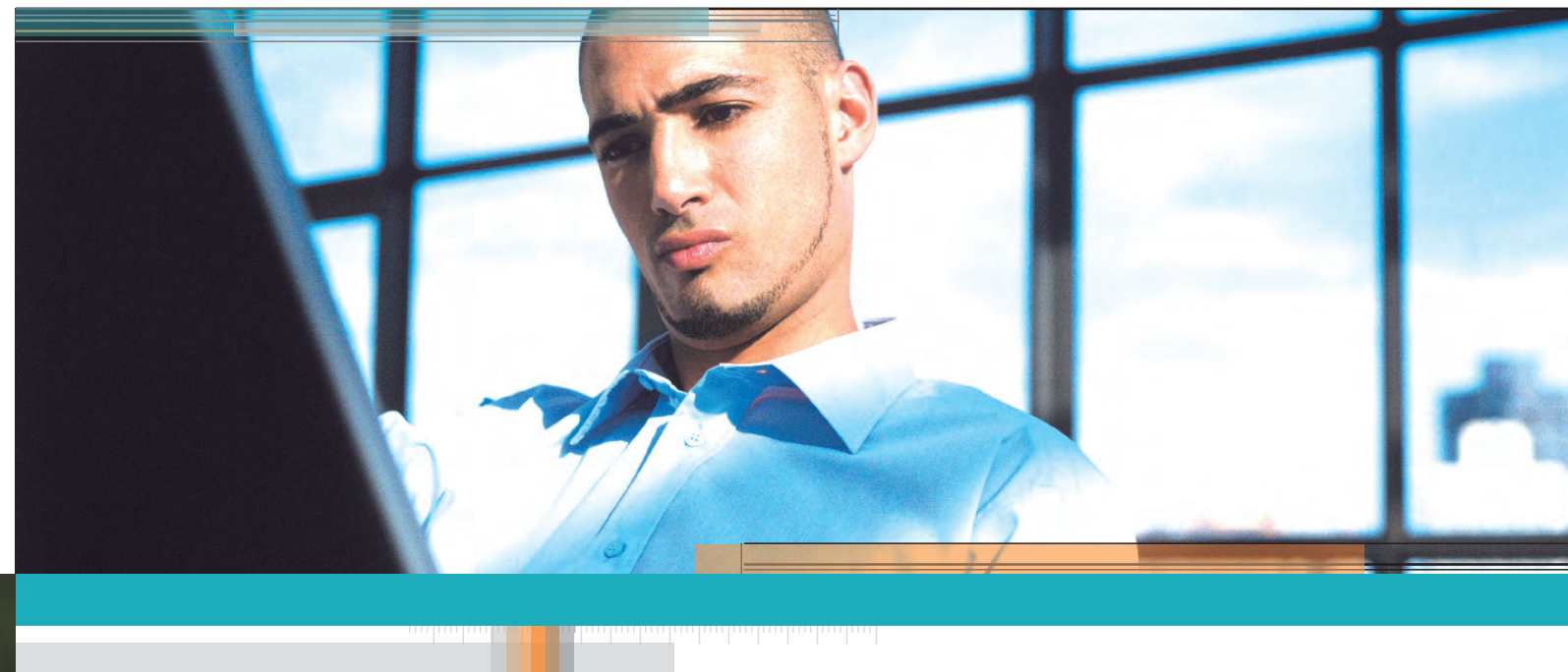
CimatronE is a best-in-class integrative solution, supporting each and every stage in the mold making process. The system covers everything from quoting to delivery – starting with receipt of data from the customer, up until parts are machined and assembled.

This broad scope of functionality allows toolmakers to go through the complete toolmaking process without any data conversion. Additionally, CimatronE offers complete associativity between different stages in the process. This means that a change done in the 3D model will be implemented in the drawings and NC documents automatically.

## World-Class Customer Support

---

Cimatron understands that in the complex mold design arena, a solution is measured by both functionality and the customer support quality. That's why all our dedicated support engineers worldwide are design professionals like you, with hands-on experience.



## What customers are saying...

"Using CimatronE, we are able to streamline our processes to meet customer demands for shorter delivery times. We can reduce our design cycle by as much as 40% and shorten surfacing and electrode extraction even further."

Jim Dent, LS Mold, USA

"Cimatron enables us to do our design work better and faster. It makes us more productive – we can do more business with the same resources."

Paul Cate, C&C Design, USA

"Since we switched over to CimatronE, we've shortened our turnaround times, improved product quality and met tight deadlines on even our toughest jobs."

Henry Frederiksen, Oticon, Denmark



## About Cimatron

Cimatron (NASDAQ: CIMT) enables mold, die and tool shops to optimize processes and shorten delivery times. From quoting to delivery, in the design room and on the production floor, Cimatron helps toolmakers stay competitive. More than 8,500 tools shops worldwide use Cimatron's

leading solutions to deliver quality products at lower costs and reduced cycle times. Cimatron's subsidiaries and extensive distributor network are located in over 35 countries to serve customers worldwide with complete pre- and post-sales support.

For more information, please visit our web site at:

[www.cimatron.com](http://www.cimatron.com)

