Advanced Design Support from Prototype to Production

Hudson Valley Plastics is a leading injection molding facility located in the heart of the Tri-State NY-NJ-CT region. For more than 30 years we have been delivering a wide range of design/engineering, custom molding, manufacturing and secondary services to the Cosmetic, Pharmaceutical, Industrial, Electrical, Automotive and CPG industries both here in the Hudson Valley and throughout the globe. We take pride in providing a very personalized approach to manufacturing while maximizing productivity and efficiency.

END-TO-END PRODUCT DEVELOPMENT

From extrusion to assembly, we understand the complex requirements of the manufacturing process. That’s why we take the time to understand the unique needs of the markets we service and are committed to providing a full range of manufacturing support from Prototype to Production.

LOW VOLUME PRODUCTION

As a full-service plastics manufacturer, Hudson Valley Plastics is uniquely qualified to support the need for lower volume production (10,000 pieces to 1M+) that other facilities are unable to accommodate. Our rapid prototyping and 3D printing services are ideal for low volume mold development.
Our integrated team of designers, engineers and quality assurance specialists work together to develop targeted solutions to meet your exact needs.

LOCAL TALENT. GLOBAL REACH.

The team at Hudson Valley Plastics has been a staple of the New York-Tri-State region for more than 30 years. We proudly service our local community by leveraging the valuable talent pool from our surrounding area.

LEARN MORE AT HUDSONVALLEYPLASTICS.COM
Design/Engineering

The decisions made during the design and engineering phase of a production program can profoundly impact the success and value of the end product. That’s why we work closely with our customers from part inception to understand the unique needs of the end product, the application, the price points and the overall supply chain to ensure all the requirements are met before moving into production.

DESIGN/ENGINEERING CAPABILITIES

• Value/Cost Analysis
• Product Design
• Tool Design
• CAD Design
• Tool Construction Sourcing & Mgmt
• Process Optimization
• 3D Prototyping
• Industrial Design
• Reverse Engineering
• Material Selection
• Product Testing & Sampling

Do you have a production problem with an existing part? Do you need to replicate a part or are you starting from scratch on a brand new idea? Hudson Valley Plastics will guide you through the process seamlessly from sampling to production.
KEY COMPONENTS OF SUCCESSFUL DESIGN PLANNING

- How will the part be used?
- Is it a standalone part or part of a larger unit?
- What conditions will the part be used in? Pressure? Chemicals?
- What are requirements for volume, size, dimensions?
- What will the manufacturing volumes be?
- How often are the specs likely to change over time?
- What decoration will be required post-production?
- What are the shipping requirements/conditions?
Quality tool design and construction are the critical foundations upon which successful injection molding programs are built. Our team offers a wealth of experience and is constantly learning and expanding both the technologies we leverage and the skills needed to effectively build and maintain your assets.

Like each product and customer, every tool is unique, with specific requirements, material needs, tolerances and allowances. Whether we are building a mold or transferring an existing one, our team will become intimately familiar with every aspect of your tools so that we can maintain the highest quality parts production.
To ensure a seamless transition from the design/engineering process through tool development, our Engineering Director is fully engaged in every detail of mold building, from construction to final tool qualification. For the life of the program, we facilitate engineering changes and ongoing, predictive maintenance with the same commitment to excellence.

Because we produce a variety of diverse products with unique tooling needs, we have developed a robust global network of best-in-class tooling partners to help our clients build tools that meet each program’s unique specifications, budget and lead times.

“Our Engineering team is intimately involved in every detail of mold building, from construction to final tool qualification.”
Precision Manufacturing

After more than 30 years supplying injection molding solutions, Hudson Valley Plastics has earned a reputation for being one of the best in the industry, offering high-quality, low-cost production for a variety of products. With our globally competitive pricing, we offer you the opportunity for leveraging the benefits associated with using a domestic manufacturer while avoiding the risks of offshore sourcing.

Specializing in close-tolerance injection molding of small plastic parts, we provide a total concept solution from design and tooling to production, fulfillment, and packaging. The combined effort of our designers and toolmakers results in molds that ensure quality, precision tolerances, and optimized cycle times.

• LEARN MORE ABOUT US AT HUDSONVALLEYPLASTICS.COM •
Because each product requires unique assembly, we design, engineer and build custom assembly solutions as required. We utilize both partial and fully automated processes including:

- Ultrasonic Welding
- High speed automation
- Vision inspection systems
- Hot Plate/Adhesive Welding
- Mechanical Fastening
- Lining
- Gluing

Decoration is critical to an end-to-end manufacturing process. We offer a wide array of decoration technologies applied accurately, consistently and cost effectively, even on round, curved or complex surfaces including:

- Metalizing
- Frosting
- Silkscreen Printing
- Hot Stamping/Heat Transfer
- Pad Printing
- Drilling/Milling
- Die Cutting
- Tapping

With our ISO-certified clean room environments, GMP Healthcare compliance, comprehensive IQ/OQ/PQ validation protocols and experienced, multidisciplinary team of healthcare product manufacturing experts, we have you covered. Hudson Valley Plastics is positioned to assist our clients to apply advanced technology-based solutions — high-cavitation, multi-shot and post process automated assembly and decoration — that meet the stringent demands and regulations of the healthcare market.
Quality Assurance

The objective with any quality program is to leverage technical excellence, planning and communication to address issues with quality before they impact delivery schedules or finished shipments. We are proud to boast that surveys show we continually exceed our customers expectations and provide superior customer service through our quality programs.

All quality programs are unique depending on the needs and objectives of the client. From melt flow analysis to pre-production approval and use of our sophisticated inspection equipment, our quality lab offers a comprehensive array of services so that we can customize a quality protocol that fits your unique specifications.
QA CAPABILITIES

- ISO9001 certified
- Pre-production samples and reports
- Melt flow analysis
- GMP, operational guidelines with full traceability
- Medical Device Registration
- UL listed
- Micro VU System, for dimensional analysis, microscopic photo capability
- FDA, Drug Master File recorded
- Color spectrum analysis
- Light transmission testing
- Pressure testing
- Torque and pull testing
- Flow testing
- Custom Gages

QA EQUIPMENT LIST

Keyence:
Model # IM7030

Melt Flow Index:
Tests the melt + density specifications of raw materials + ensures consistent molding behavior

Color Delta Checker:
Measures changes in color to ensure that production runs meet color specifications

MicroVU:
Provides precise digital multi-dimensional measurements of sampled parts

Optical Comparator:
Uses precise analog shadow projections to measure sampled parts against prototype

LEARN MORE ABOUT US AT HUDSONVALLEYPLASTICS.COM
WHY HUDSON VALLEY PLASTICS

Manufacturing is a high-touch process. It’s about planning, detail and precision. But most of all - it’s about people. That’s why we think of ourselves as a people-company that solves manufacturing challenges. Our mission is to develop long-term partnerships with customers to deliver products on-time with zero defects. Our unique combination of organization, innovation and people make the difference.

Learn More, Schedule a Tour or Request a Catalog at WWW.HUDSONVALLEYPLASTICS.COM.