






# Advanced Geometric Dimensioning & Tolerancing

## Mar. 14, 2024

This Advanced Geometric Dimensioning & Tolerancing (GD&T) workshop is for those with some previous exposure to geometric dimensioning and tolerancing. In this two-part workshop, Part 1 will be a review of the GD&T symbols and rules. In Part 2 more advanced topics are covered, including an update about the revised Y14.5-2018 standard. We'll also discuss the proper application of tolerances for designers, including a short module using a tolerance stack spreadsheet.

-  **Mar. 14, 2024**
-  **8:30 AM – 4:00 PM**
-  **\$475/person. \$425 before 2/15**  
Meals and materials included
-  **MRC – 7200A Windsor Drive**  
Allentown, PA 18106
-  **Register: [mrcpa.org/events](http://mrcpa.org/events)**

\*Fees and times subject to change. Visit [mrcpa.org/events](http://mrcpa.org/events) for current details.

## Course Highlights



- Learn the less-common GD&T tools: translation, datum shift, resultant condition, all over boundary
- Determine which datum features to choose based on function
- Select proper GD&T symbols for a mock design
- Perform tolerance stack calculations for both plus/minus and geometric tolerances
- Review of GD&T standard (2018 vs. 2009 versions)
- Datums at virtual condition (the MMB modifier)
- How to choose MMC, RFS, or LMC
- Tolerance stack analysis using the “loop” method

Visit [mrcpa.org/events](http://mrcpa.org/events) for full course details.

## Prerequisite

Geometric Dimensioning & Tolerance Fundamentals or basic knowledge of GD&T.

## Who Should Attend

Process Engineers, Product Engineers, Quality Engineers, Quality Technicians and Quality Managers.

### Instructor | John-Paul Belanger | Certified Sr. GD&T Professional | Geometric Learning Systems

John-Paul Belanger is certified by the American Society of Mechanical Engineers as a Senior GD&T Professional. He has conducted numerous GD&T and Tolerance Stacks classes for a variety of manufacturing clients throughout North America and Europe. For four years Mr. Belanger was the primary GD&T instructor for a major automotive OEM. He has also done extensive consulting with clients in the proper application of geometric tolerancing. He holds a degree in aerospace engineering from the University of Michigan specializing in aircraft design and safety.

More information available at [mrcpa.org/events](http://mrcpa.org/events) or contact Nicole Pierce at (484) 655-4873 or [nicole.pierce@mrcpa.org](mailto:nicole.pierce@mrcpa.org).