

What are "best practices" for converting CAD-data?

Conversion of CAD-data from one CAD-format to another is simple in some case but can also become a complex subject. There is no single path and method. Depending from the mission there are different tools which will become an option. As there is no single universal tool which can translate 2D-drawings, 3D CAD-models - can be NURBS, polygons, point-clouds, tessellated data -we have inserted different tools into our portfolio following the principle of "best practices". It is the customers decision which method and path is the most suitable and cost efficient. To structure the mission several questions should be answered:

- Is a format conversion sufficient ?
- Is a repair and healing of corrupt data needed as well ?
- What are strengths and limitations of exchange formats, e.g. IGES vs. STEP?
- What quality I expect from 2D-drawing conversion, e.g. should the drawing be editable or not ?
- Is a visual, interactive process required, e.g. for dropping unnecessary parts ?
- Is a universal solution needed with many CAD-formats ?
- Is a peer-to-peer conversion via a black-box sufficient ?
- Is an editing of the geometry required before sending it to the target format ?
- Is the CAD-data quality poor ?
- Can I influence the sender to select a special format ?
- Do I have point-clouds or STL-data which should be converted into CAD-data (reverse engineering) ?
- Is simplification or de-featuring required while translation ?
- Do I need all the parametric information after the translation ?

Depending from the answers to all these questions we can provide you following tools:

- **CrossCAD**-product family for peer-to-peer translations
- **CrossXpert**-universal system for multi-format, repair and simplification oriented translations
- **SpaceClaim 2012** for translations with the need to edit data while the translation process
- **DMU-Toolkit** for the translation of tessellated data in DMU-environments
- Diverse **reverse engineering solutions** depending from the task.

See more information in the product section of our web-site. It has to be noted that format translation tools are software products which require excellent expertise in the understanding of different CAD-formats and CAD-systems. This is not a freeware-business area. Good translators read CAD-files of any size with high reliability and produce quality output. The price of translators is an indicator of these efforts.