Course : AutoCAD 3D, advanced

version 2017/2016/2015 - Optional remote TOSA® certification

Practical course - 2d - 14h00 - Ref. ATE
Price : 1380 CHF E.T.

★★★★★ **5 / 5**

You'll master complex 3D plans and the advanced functions of 3D modeling and visualization with AutoCAD. You'll manipulate meshes, visuals, lighting and camera movements.

Teaching objectives

At the end of the training, the participant will be able to:

- Understanding advanced AutoCAD 3D functions
- Model and visualize complex plans in 3D
- Advanced solid modeling
- Apply advanced surface modeling
- Manage advanced mesh modeling

Intended audience

Managers, architects, engineers, technicians, draughtsmen and designers in design offices involved in producing and modifying 3D drawings.

Prerequisites

Good knowledge of AutoCAD 3D version 2010-2016, experience required. Or knowledge equivalent to that provided by the course "AutoCAD 2016/2015 3D, getting started" ref. UTP.

Practical details

Hands-on work
Discussions, experience sharing, demonstrations, tutorials and case studies.

Teaching methods
Active pedagogy based on examples, demonstrations, experience sharing, case studies and assessment of learning throughout the course.

Course schedule

PARTICIPANTS
Managers, architects, engineers, technicians, draughtsmen and designers in design offices involved in producing and modifying 3D drawings.

PREREQUISITES
Good knowledge of AutoCAD 3D version 2010-2016, experience required. Or knowledge equivalent to that provided by the course "AutoCAD 2016/2015 3D, getting started" ref. UTP.

TRAINER QUALIFICATIONS
The experts leading the training are specialists in the covered subjects. They have been approved by our instructional teams for both their professional knowledge and their teaching ability, for each course they teach. They have at least five to ten years of experience in their field and hold (or have held) decision-making positions in companies.

ASSESSMENT TERMS
The trainer evaluates each participant's academic progress throughout the training using multiple choice, scenarios, hands-on work and more.
Participants also complete a placement test before and after the course to measure the skills they've developed.

1 Reminders

- Locating systems. Object display and visualization.
- Use of the main elements.
- Handling surfaces, solids and polysolids.
- The different primitives. Working with views, sections and orbits.
- Use of panoramic lenses.

Hands-on work
Creation of a 3D meeting room.

2 Advanced solids modeling

- Primitive objects. Union, subtraction and intersection.
- Revolution and smoothing.
- Creating solids through complex operations: scanning.
- Introducing the online Design Center for 3D content in professional catalogs.
- Create orthogonal views and automatic presentation windows for 3D solids "SOLVIEW".

Hands-on work
Designing a spiral staircase.

3 Advanced surface modeling

- Procedural, flat and non-planar surfaces...
- Surface merging and correction.
- Surface offset, connection, adjustment, extension.
- Using shading options in wireframe mode.
- NURBS surfaces. Associativity of surfaces.

Hands-on work
Seat design.

4 Advanced mesh modeling

- Mesh primitive options.
- Surface: set, extruded, left, revolution.
- Mesh. Smooth the object. Smooth more, smooth less.
- Refine mesh. Add and remove folds.
- Approximation mesh options. Mesh editing.
- Convert mesh. Convert to solid, surface.
- Smooth optimized. Non-optimized smooth. Optimized facet. Non-optimized facet.

Hands-on work
Réalisation d'un kiosque à la mer.

5 Renderings, materials, lighting, cameras

- Use of different visual styles.
- Use of different styles of materials.
- Texture and material management.
- Create your own materials.
- Play with lighting.
- Analysis of structures and lighting.
- Camera positioning and movement.
- Work on realistic rendering.

Hands-on work
Create an interior decor, apply textures and highlight it.

Options

Certification : 80 € HT

La certification TOSA® atteste pour une durée de 3 ans des compétences de l'apprenant sur une échelle de 1 000 points. Le diplôme TOSA® est envoyé si le score de l'apprenant est supérieur à 551 points. Une fois l'examen réalisé, l'apprenant peut consulter en direct ses résultats et reçoit par e-mail une attestation, une restitution détaillée de ses compétences ainsi que son diplôme sous 5 jours. L'examen dure 1 H 00 et se présente sous la forme de 35 exercices alternant entre des manipulations sur le logiciel et des QCM, dont la difficulté s'adapte selon les réponses de l'apprenant. Sans demande spécifique, il est dispensé par défaut en français et sur la version logicielle la plus récente. La surveillance est faite par un logiciel et est enregistrée à des fins de contrôle de conformité.

The certification option comes in the form of a voucher or invitation that will allow you to take the exam at the end of the training course.