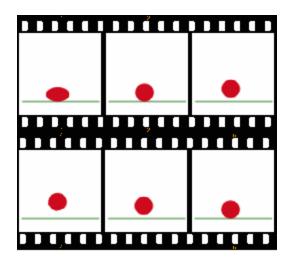
INTROTO COMPUTER GRAPHICS



Why IT's need such topic?

• The need of drawing 2D\3D animations, movies & video game.





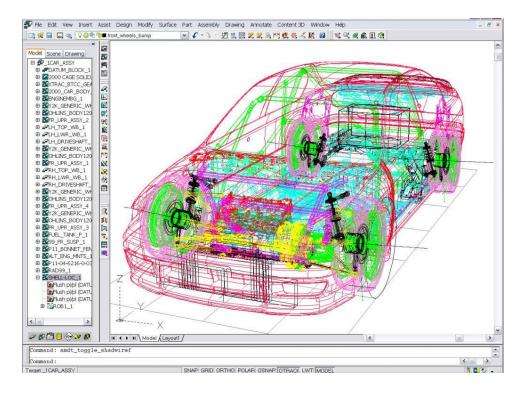
Animations Games



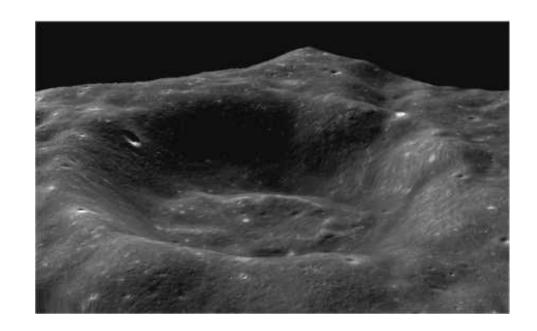


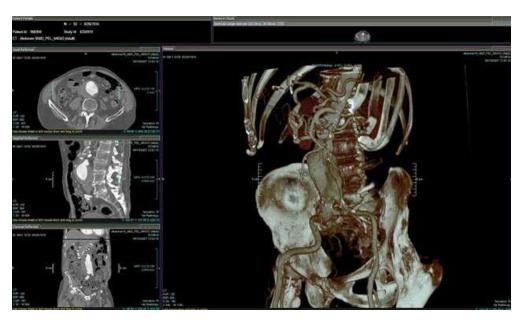
Design (CAD)





Scientific Visualization





Training

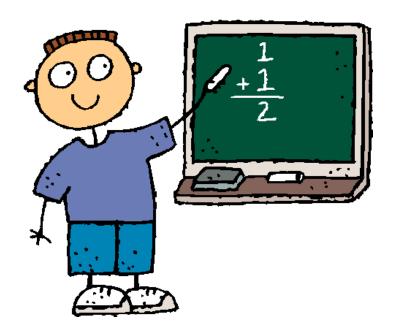


What are the main topics?

- Drawing in 2D and 3D
- Lines, Polygons
- Curves and Surfaces
- Transformations
- Projection
- Texturing
- Lighting and Materials
- Shading
- Animation

Who is behind the scenes?

• Always remember MATH is the science behind all these topics



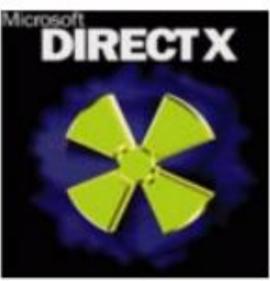


Are we going to program the mathematical equations behind the Light, Materials and Shading...?



Fortunately our IT grandfathers program it for us, and put it all in one library.





Actually there is more than one library...

OpenGL vs. DirectX

	OpenGL	DirectX
Platform	Cross-platform	Microsoft Windows
Performance	Nearly the same	Nearly the same
Handle audio & IO devices	Need extensions	Built in
Simplicity	Difficult	Simple
Games Field	+	+++