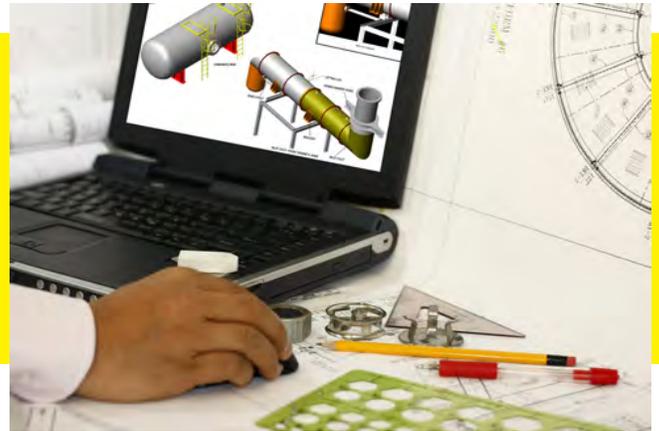


CAD Drafter

They say a picture is worth a thousand words. This adage is certainly true when it comes to manufacturing products and constructing buildings. An engineer or architect's ideas must be drawn in great detail before others can implement the plans. These drawings are created by drafters or designers using computer-aided design (CAD) software.

(Feel free to use the back of this sheet for longer answers)



© Adobe Stock Photos/Marcky Ragsac, Jr.

What Do CAD Drafters Do?

Once upon a time drafters drew complicated technical drawings by hand. Now computer-aided design (CAD) technology is used to provide extremely complex 3-dimensional images. Technology makes the process more efficient, effective, and accurate. Drafters work closely with engineers and architects to translate ideas into blueprints that guide every phase of the manufacturing and building processes. Drafters need a blend of artistic creativity and technical skill. Future drafters need strong math and science backgrounds (think geometry and physics!). Many jobs require an associate degree and some also require professional credentials. If your high school offers computer-aided design or drafting classes, be sure to sign up and experience what this type of work involves for yourself.

CHALLENGE #1: *If you had this career...*

What kind of training would you need?

Where could you find a job?

How much money could you earn?

Who would you help and how would you make a difference?

Why would (or wouldn't) you like doing a job like this?

CHALLENGE #2: *Think Tank*

Hang on to your hats! A new amusement park is coming to town and they intend to build the world's greatest roller coaster. They have announced a city-wide competition to see who can come up with the most thrilling idea.

If you have access to design software, feel free to use it. Otherwise, use the backside of this page to sketch out your ideas. Be as specific as you can about things like proposed height and width and angles. Get creative, using different types of geometric shapes to indicate different types of twists and turns.

Since this is a brainstorming activity don't worry too much about if your ideas will really work. Just imagine a fun (and wild!) ride and add as much detail as you can.

