

Ridvan Polat wants to share his love of CAD with the world. As a child, Ridvan was fascinated with the inner workings of cars and would draw various mechanisms with paper and pencil. He was first exposed to SOLIDWORKS as a high schooler, and discovered a new way to manifest the objects that would form in his mind, or as he so eloquently puts it: "SOLIDWORKS is a reflection of my imagination!"

While at University, Ridvan had an idea to help solve the lubrication challenges associated with Wankel rotary engines. This led him to prototyping using 3D printers, and he ended up winning a 3D printer for his idea that allowed him to first realize his ideas in **3D**EXPERIENCE SOLIDWORKS for Makers and make them tangible.

Ridvan soon got to know the **3D**EXPERIENCE toolbox from Dassault Systemes SOLIDWORKS, including xDesign, which empowers him to create any time inspiration strikes using browser-based tools. A growing interest in education, coupled with his engineering background, pushed Ridvan to share his projects and techniques on his YouTube channel, allowing his fascination with **3D**EXPERIENCE SOLIDWORKS for Makers to reach a wider audience.

A great example of Ridvan's desire to educate can be seen in the form of his R/C car project. Besides gears made with the **3D**EXPERIENCE toolbox, ready-made wheels and DC motors, and electronics from a childhood toy, the entire design was from scratch. Ridvan opted for a DC motor rather than an R/C servo for his rack-and-pinion steering to maximize realism, and developed a print-in-place fisheye tie-rod system to allow the

steering to function correctly during suspension compression.

Ridvan's plans include a new go kart/buggy hybrid, and step-by-step tutorials for the current R/C car. And when those tutorials are ready, you will find them on his YouTube channel,

youtube.com/user/automotive58 — where you can also find all of Ridvan's SOLIDWORKS projects and tutorials! You can also check out Ridvan's R/C car in 3D/AR at rpolat58.github.io/RC_Car.





3DEXPERIENCE SOLIDWORKS for Makers is available for your hobbies and personal projects. For just US \$99/year or US \$9.99/month you'll get the same intuitive cloud-connected CAD modeling tools that the professionals use, along with:

- Fully online design solutions you can access from any web browser.
- An online community that lets you connect with worldwide makers from fab labs, makerspaces, and influencers, all ready to share their designs, ideas, and expertise.
- Access to an expanded professional ecosystem to rapid prototype your parts, or receive engineering services via the 3DEXPERIENCE Marketplace.
- Support to help you get the most out of 3DEXPERIENCE SOLIDWORKS for Makers.



