

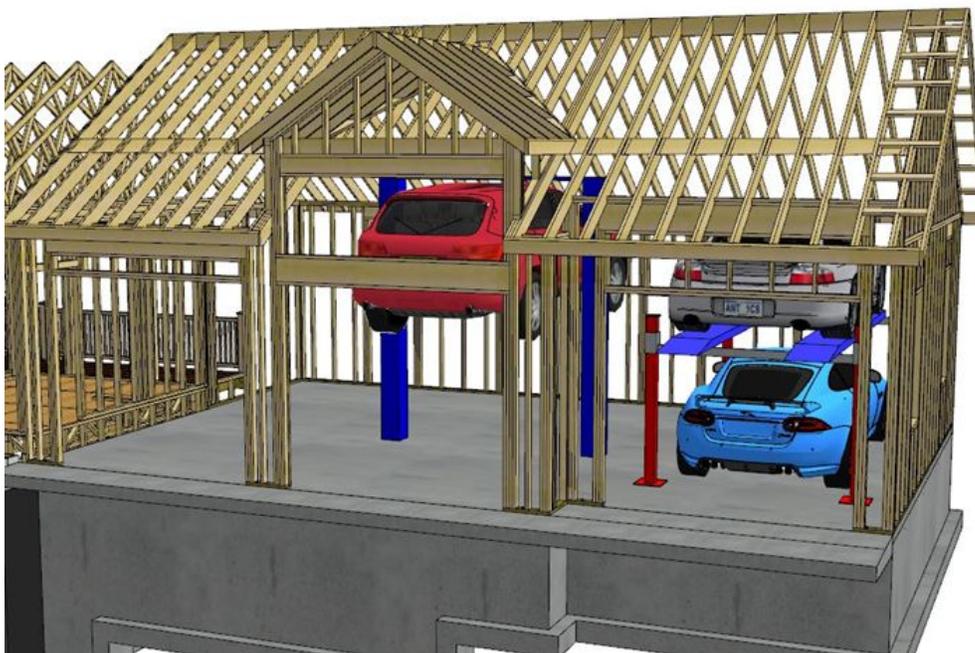
Common Issues #4: Things that don't work!

Example: Car lifts in garage for car buff client

Issue: This is example is a house that I built several years ago. The client, a car buff with several prized sports cars, had his plans already and was getting ready to sign a contract with a builder but decided to interview me to discuss his build job. He had heard about my use of 3D modeling with my clients. The client wanted two of his three bays in his garage to have car lifts. One for storage (one stores on rails above other) and one for raising cars to work on. In reviewing the plans, I noticed that the designer specified using scissors trusses in the garage to get the headroom for the lifts. I knew right away it would not be adequate headroom, so I modeled the garage ahead of our meeting. I modeled the car lifts and then modeled scissors trusses as planned. It clearly showed that he could not raise the cars high enough before hitting the ceiling.



I took it a step further, though, so as to not just point out an issue, but more importantly how to solve the issue! I modeled the garage roof using conventional stick framing and elevated the ceiling joists/collar ties to give him the necessary headroom. I modified the elevation shown, using a dormer over the double bay section, by making the dormer wider and centered over center bay, which is where he wanted to work on the vehicles/have taller lift.



This ceiling was same height front to back, where other ceilings had slopes on front and back.

When I showed him this issue/fix (and a cool 3D model), I got the job!