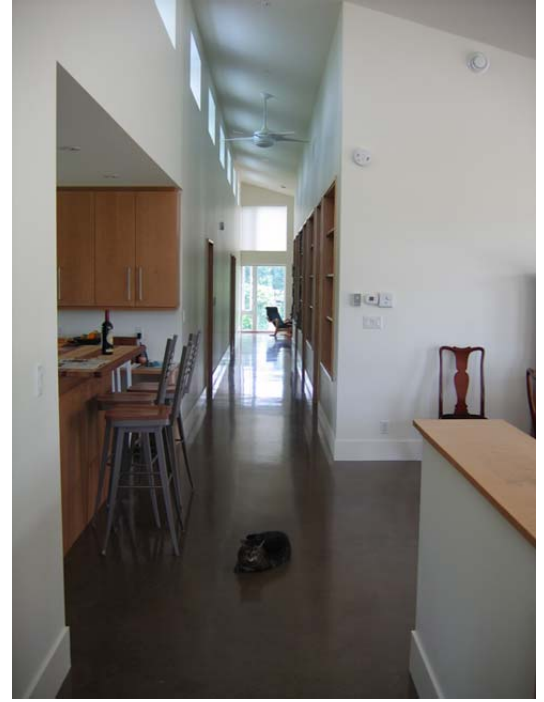




Country Trail House Interior - Revit Architecture Rendering



Country Trail House Interior - Actual Photo



The Firm's Background:

Solares Design Build has been an Environmentally Integrated Home designer since 2005. For the past four years, this Toronto-based firm has distinguished itself with unique and eco-friendly custom homes. They have also been using Revit Architecture since the company started, with great success.

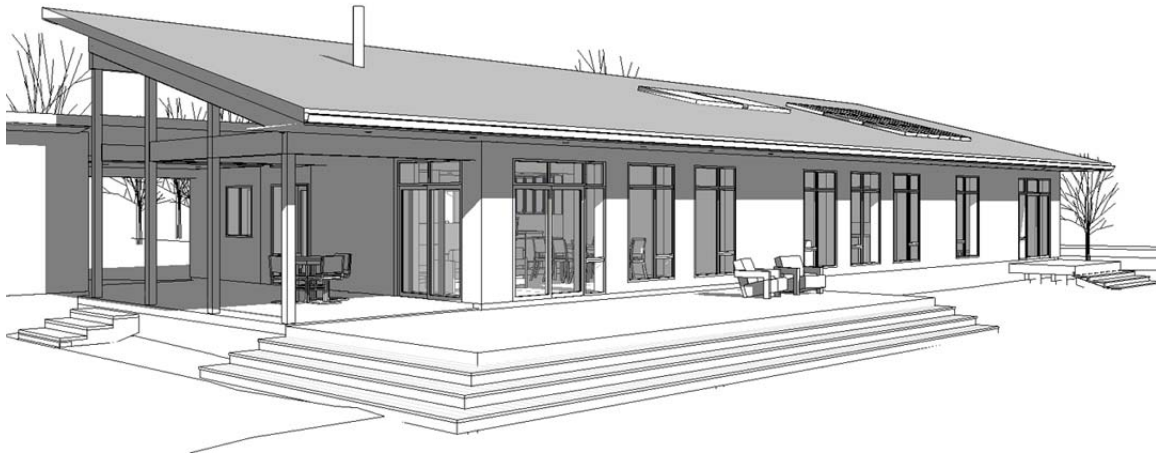
Experiences with Revit:

Revit's 3D visualization capabilities have given Solares the power to show their clients realistic images of what their homes will look like throughout the entire design process. Seeing as most of their clients have never built a custom home before or worked with a designer, they are unfamiliar with typical architectural drawings such as elevations and building sections.

Revit Architecture allows Solares to create vignettes of the proposed house from different angles, enabling clients to get a strong overall sense of the design. Being able to see this kind of realistic visualization during the design process empowers their clients to provide valuable feedback, something that is extremely important to this firm. Because Solares believes that designing a custom home needs to be a collaborative process between client and designer, Revit's ability to produce realistic renderings has been an invaluable design communication tool.

Solares uses passive solar design, so Revit's shadow study feature is especially important for their projects. Passive solar design involves placing main rooms and spaces on the south axis of the house, allowing low-angle winter sun to enter large windows thereby heating the rooms for free. Shading devices placed over these south-facing windows must be provided to block the high-angle summer sun thereby keeping the house cool in the summer months.

The firm performs precise shadow studies on their proposed designs so that they can size roof overhangs and shading devices accurately. While the science of passive solar design is not particularly complex, accuracy is important, otherwise the energy performance of the house may suffer. With Revit they can be confident that the passive solar design strategies work **prior** to construction.



Country Trail House Exterior - Revit Architecture Rendering



Country Trail House Exterior - Actual Photo

The Project: The Country Trail House

Solares Design Build's Co-owner Christine Lolley provides some insight into The Country Trail House, designed using Revit:

"We wanted the design of the County Trail House to be very modern and minimal. The house has a very unique section: the main roof slopes up from the south façade to create a 15' ceiling along the main corridor of the house. The north roof is offset from this roof, creating a line of high-level clearstory windows on the north face of the building. These windows light the main corridor as well as providing passive ventilation. Because the house doesn't have a mechanical air-conditioning system, these high-level windows play an important role in keeping the house cool in the summer. We wanted this high ceiling to be impressive without being over-bearing. Using Revit we were able to model the main corridor, roof line and high-level windows so that we could evaluate the effectiveness and proportion of the space.

It's amazing to stand at the front door of the finished house and compare it to the image of the model we built. We aren't the best renderers out there, but the 3D visualization of the space is very accurate!"