



Use Case: Safety Training

In their day-to-day, Hydro-Quebec workers face dangers on the job; whether it's the unpredictable nature of our climate, or the risks involved in manipulating high-voltage equipment. In collaboration with our partners at ellicom, we worked with Hydro-Quebec to develop an immersive simulation Space that reproduces the extreme dangers faced by workers in high-voltage environments.

Using StellarX, we combined Virtual Reality technologies and instructional design expertise to improve the learning process as a whole, and make hands-on training at Hydro-Quebec more accessible and safe.



Client

Hydro-Quebec

Industry

Power and Utilities

Technologies

Virtual Reality

Challenge

Adaptability

Solution

Real-time intervention

Benefits

- More prepared
- More informed
- More engaged

To help Hydro-Quebec with their training, we used StellarX to create various life-like Virtual Reality Spaces that replicate environments in which their professionals work every day.

A future that's bright

We also designed immersive training scenarios for each of the Spaces, which allow trainees to hone their skills in a safe and forgiving manner. For example, one of the Spaces requires that trainees measure the voltage of wires using the correct tools and safety equipment to prevent potentially fatal shocks. In short, if the trainee doesn't follow the correct steps for the virtual induction, a visual cue in the form of sparks, and haptic feedback in the controller, indicate that they have been virtually shocked. This form of hands-on training is far more effective than theory learned in a classroom setting.



Adaptive & Reactive

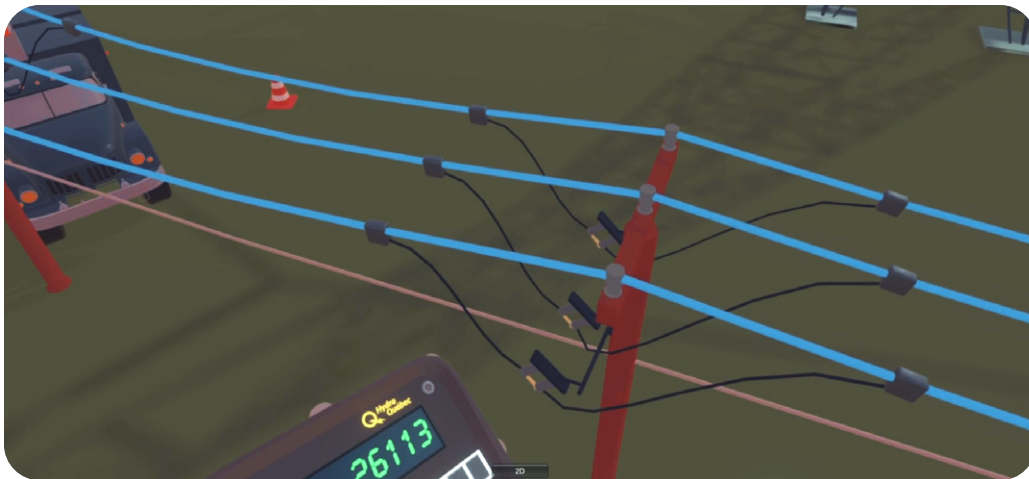
To expose workers to the unpredictable climatic phenomena, we developed a solution that allowed the instructor to intervene in the Space, in real-time. In other words, instructors can affect the trainees in context and analyze their performance under pressure, as well as their ability to adapt to the changing situation. For example, an instructor may change the wind direction or activate rain to see how the trainee reacts in action.

Results

After 6 months of training, the energy giant witnessed first-hand just how engaging and transformative immersive learning experiences can be. In fact, Hydro-Quebec has noted a significant increase with regard to information retention levels given the hands-on context offered by our solution.

Furthermore, given the scalability and accessibility of the immersive training experience, Hydro-Quebec trainees have access to more hands-on training hours and are more prepared to face the real-world dangers in the field.

In fact, as a result of the immersive skill-building offered in Virtual Reality, Hydro-Quebec has noted a significant decrease in injuries as employees since they were better prepared.



Related links

