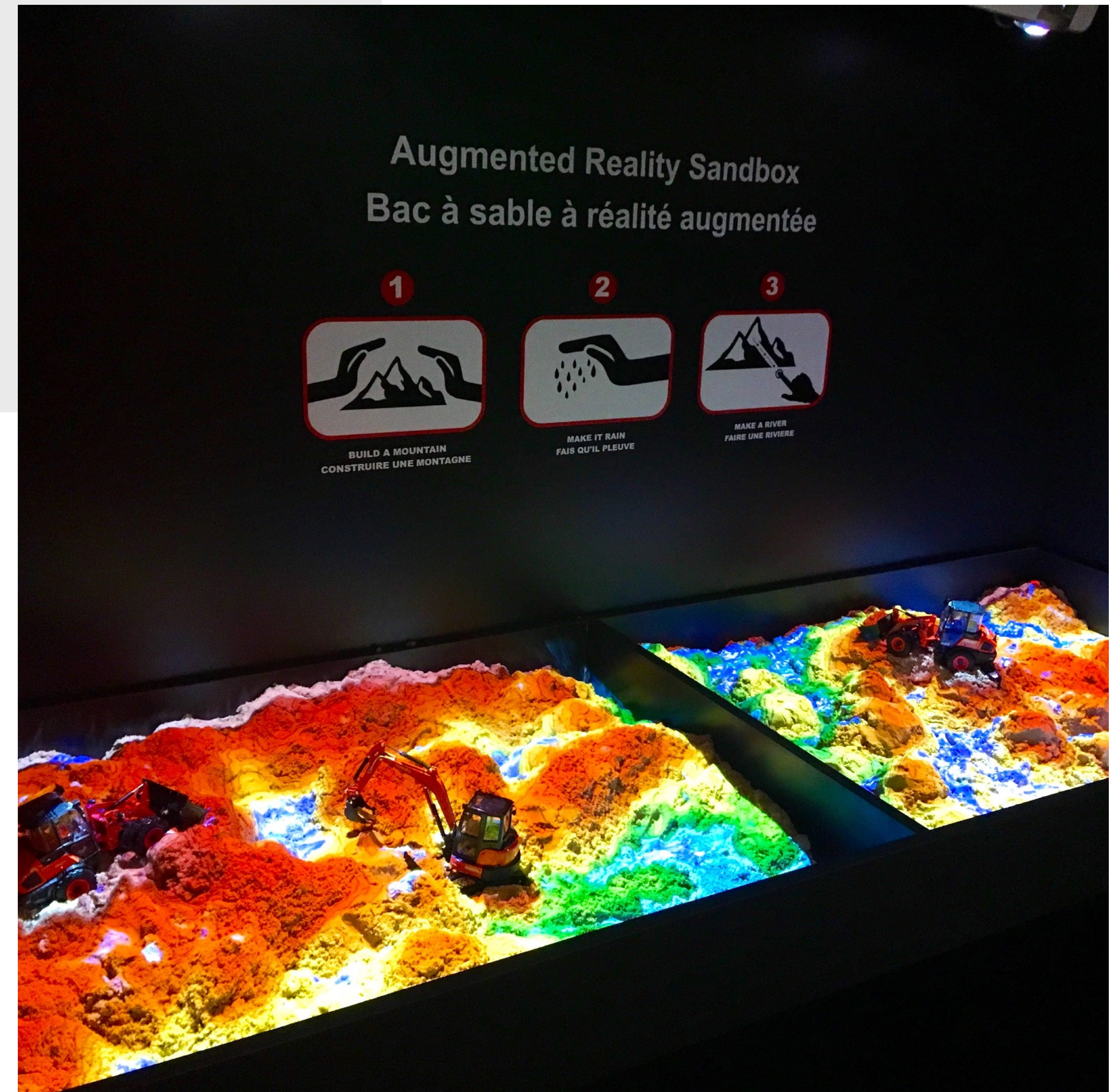


AUGMENTED REALITY SANDBOX

Kubota Canada is one of the industry leaders in agricultural & construction heavy machinery. Every year, they continue their support of the Canadian Football League as a sponsor and does a tour across North America with their signature "Kubota Truck" to showcase their new activations and product line.

This year, they went a step further and explored using emerging technology exclusively in this year's installation setup.



OBJECTIVE

As a key sponsor of the Canadian Football League, Kubota Canada wanted to promote their brand to game attendees while offering a **fun and interactive activation**. We wanted to help them go beyond the standard suite and explore opportunities with emerging & immersive technology.



Process - Overview

This project had numerous challenges and with three main constraints:

- Create a completely bespoke and never before seen experience
- It had to be constructed to survive travel across North America
- The installation had to be easy to assemble and disassemble by a non-technical administrator (the truck driver)

These constraints created a working process that was not very typical given that our work is using digital, online or stationary and the physical assembly & construction are not using real factors in designing a solution.

That being said, as design leads our role was less concentrated in interaction design elements and establishing visual direction, more so focused on usability, functionality and robustness.

Process - Discovery

Based on the original premise of promoting Kubota's machinery through an interactive experience, we conducted a Landscape Review and understood the kind of experiences that have been done before, what they were lacking and how disruptive technology can really play a key role.

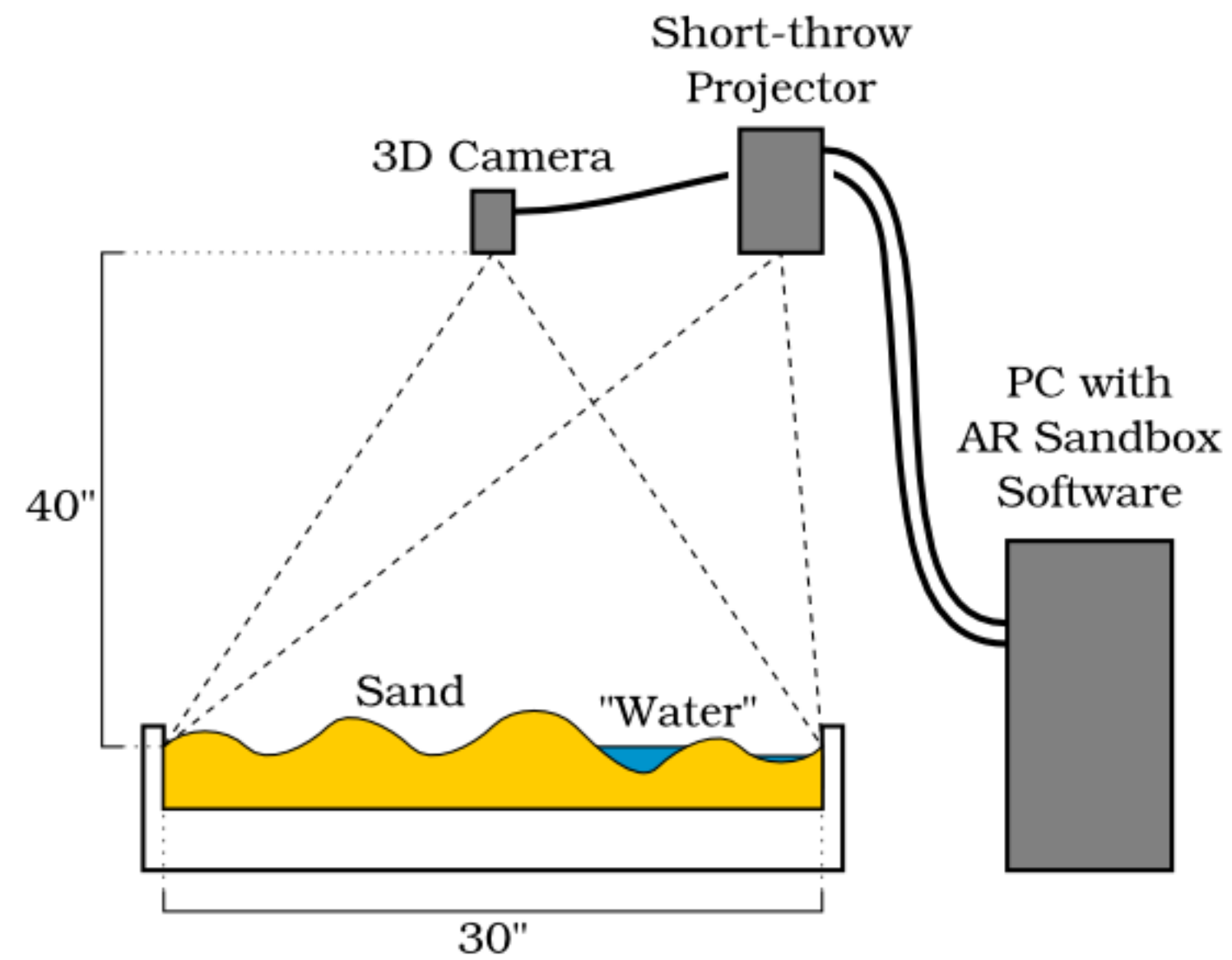
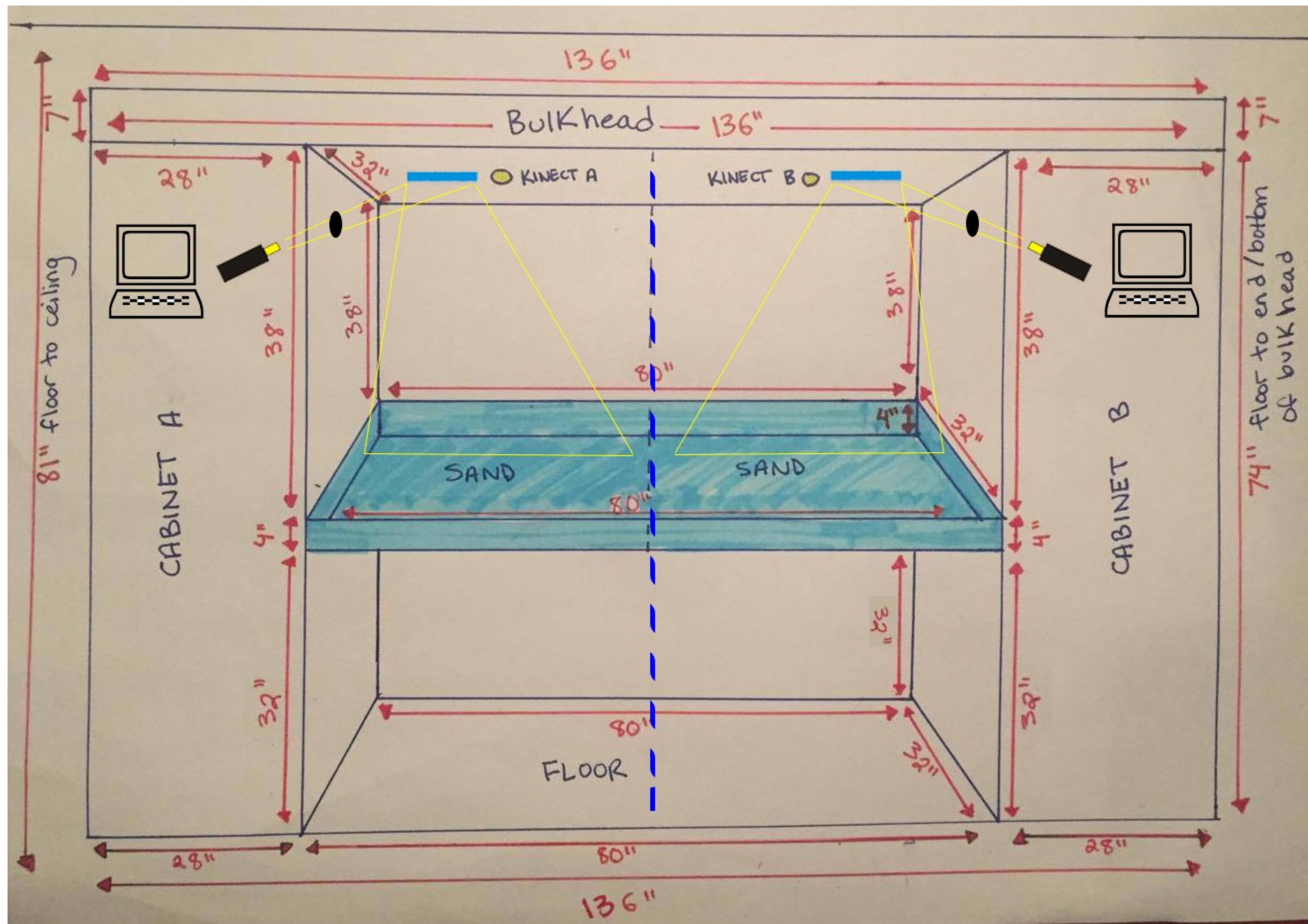
Our main takeaway was despite how well designed most installations and activations were, they still rarely pushed any boundaries and explored new opportunities, like [Audi's Virtual Reality Sandbox](#). We wanted to ensure that Kubota's brand exuded innovation and a forward-thinking mindset.

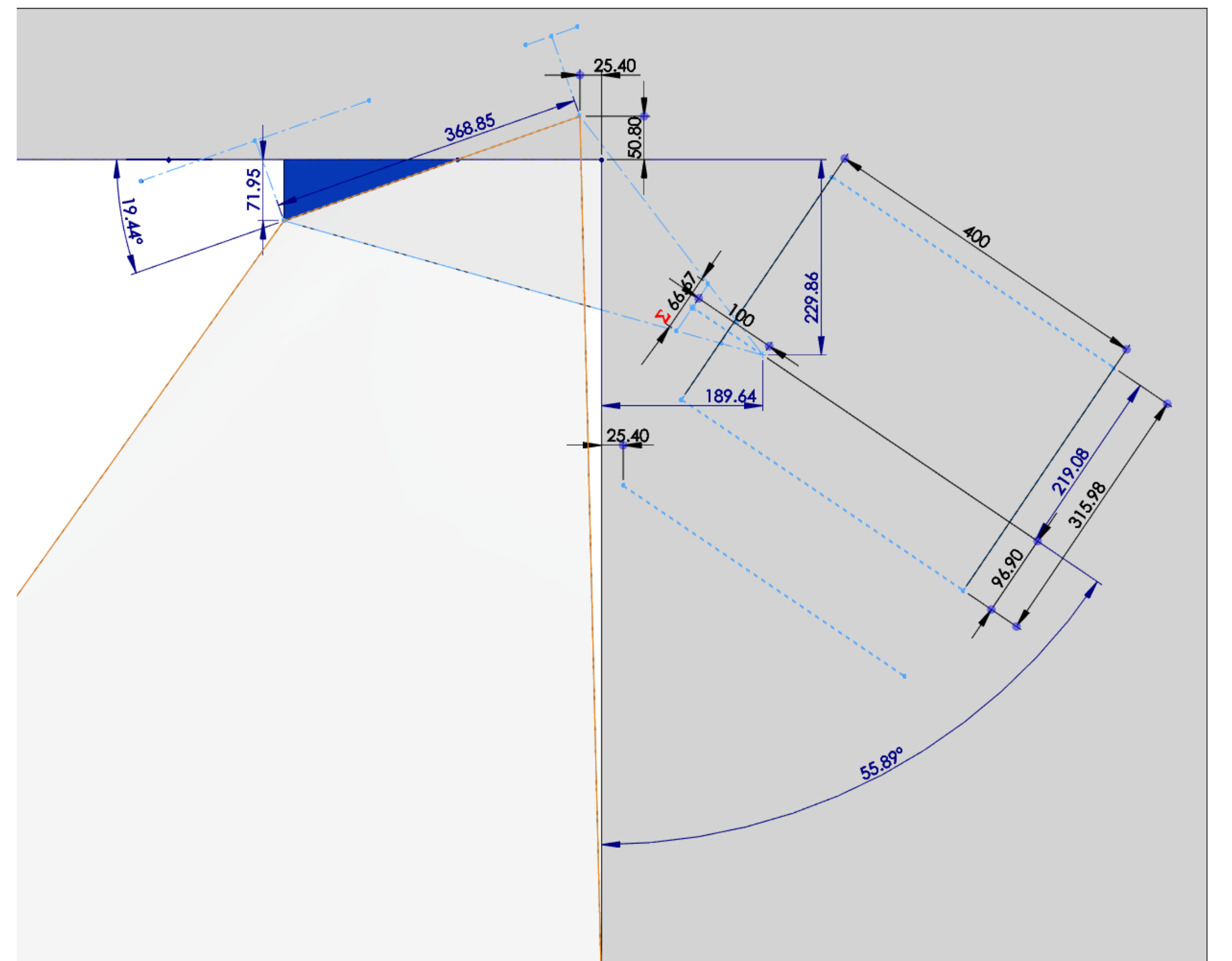
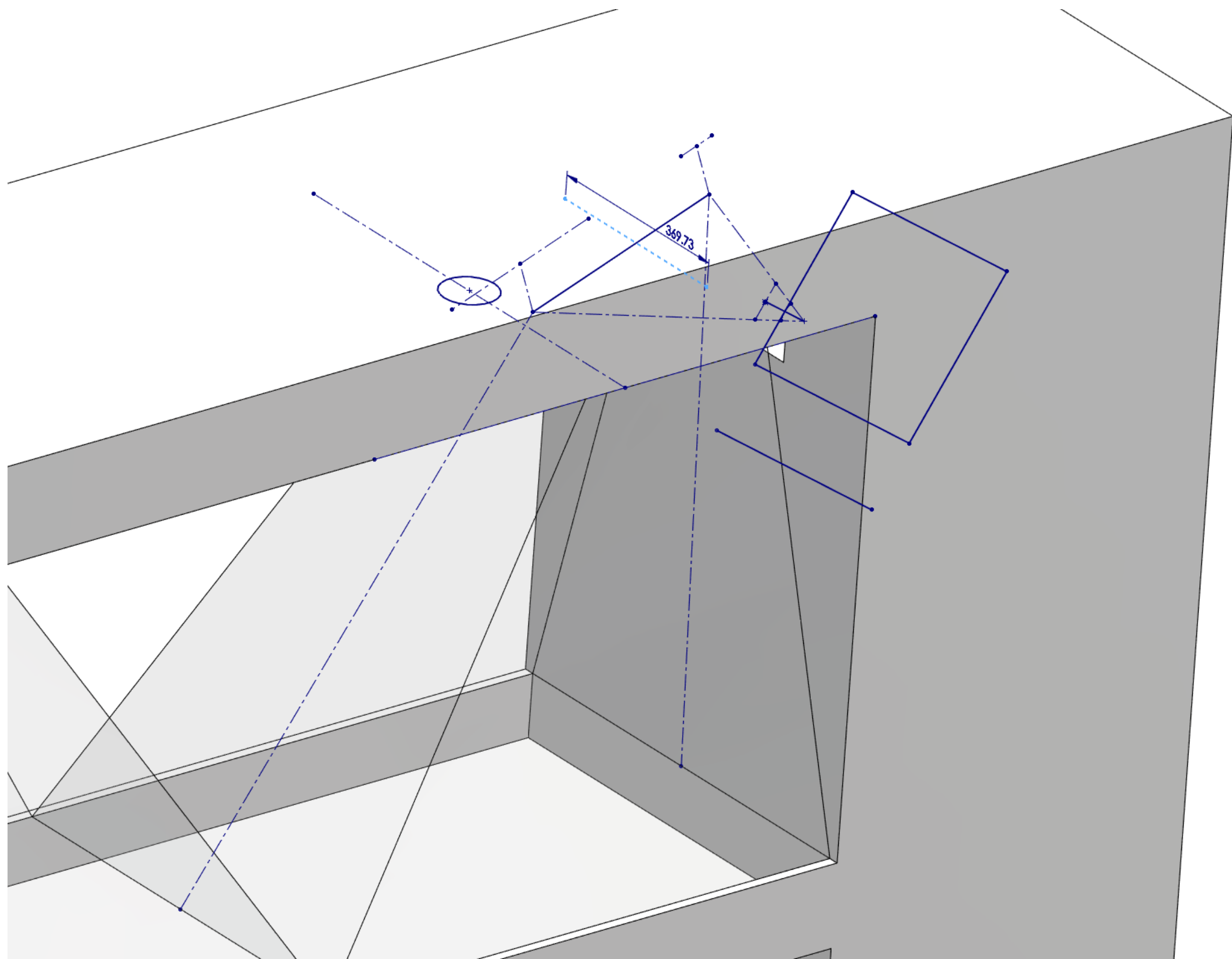
Process - Design

Throughout the design and engineering process, new challenges appeared prompting equally responsive action to address them. New elements were constantly being added and removed in order to accommodate the aforementioned and new constraints (limited physical area of operation). Each revision in the engineering and operation were made after communication with the client to ensure the intended and expected vision was still being met.

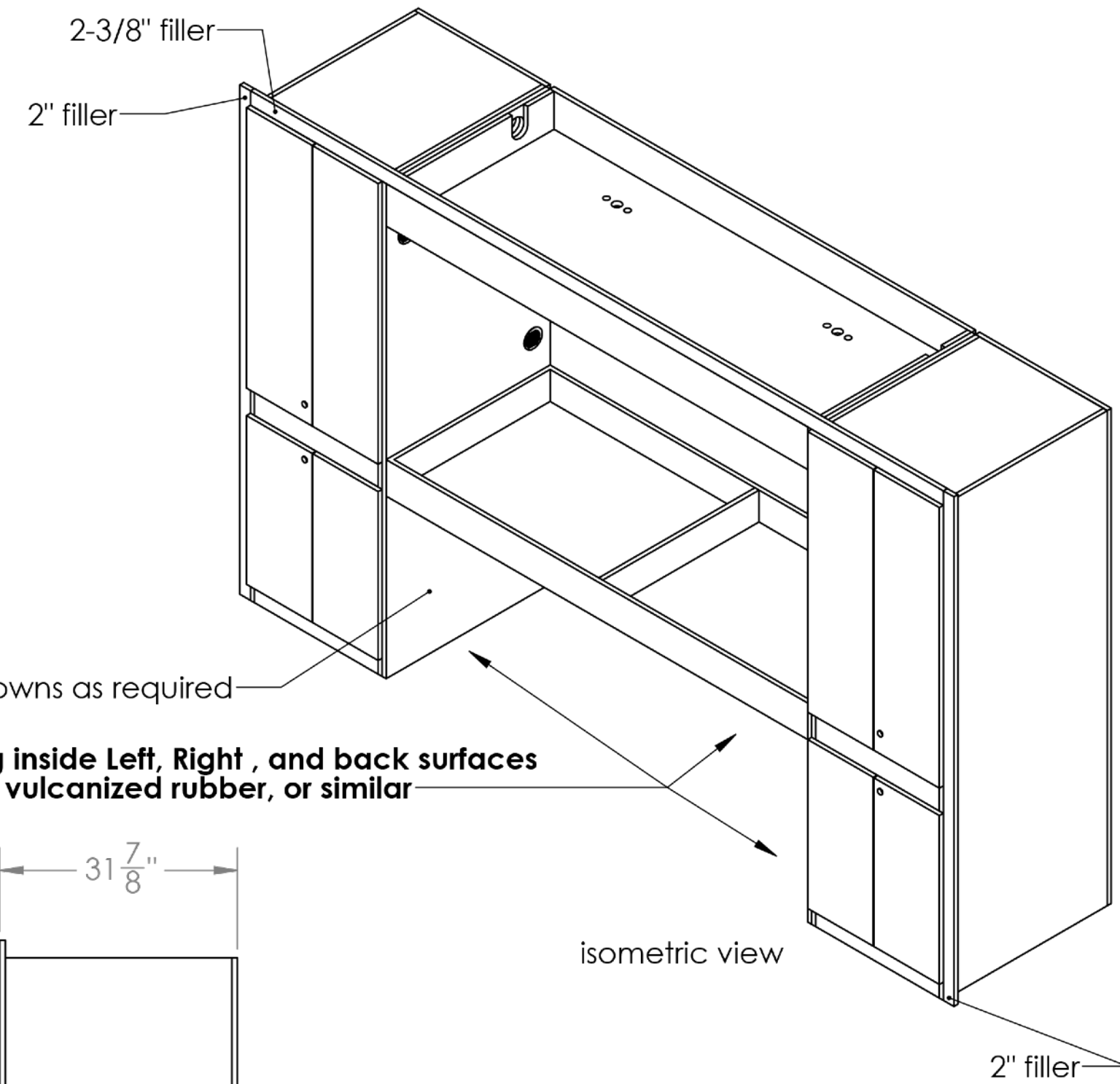
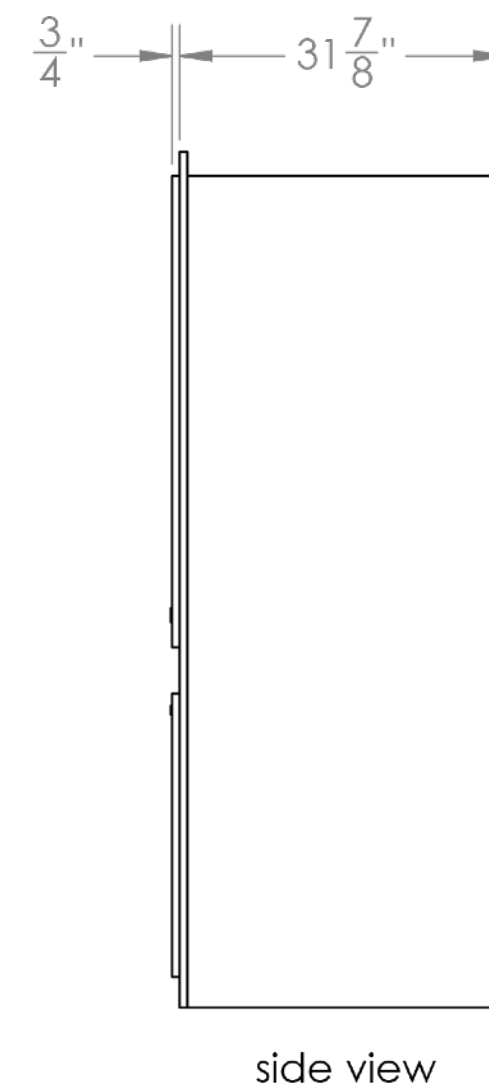
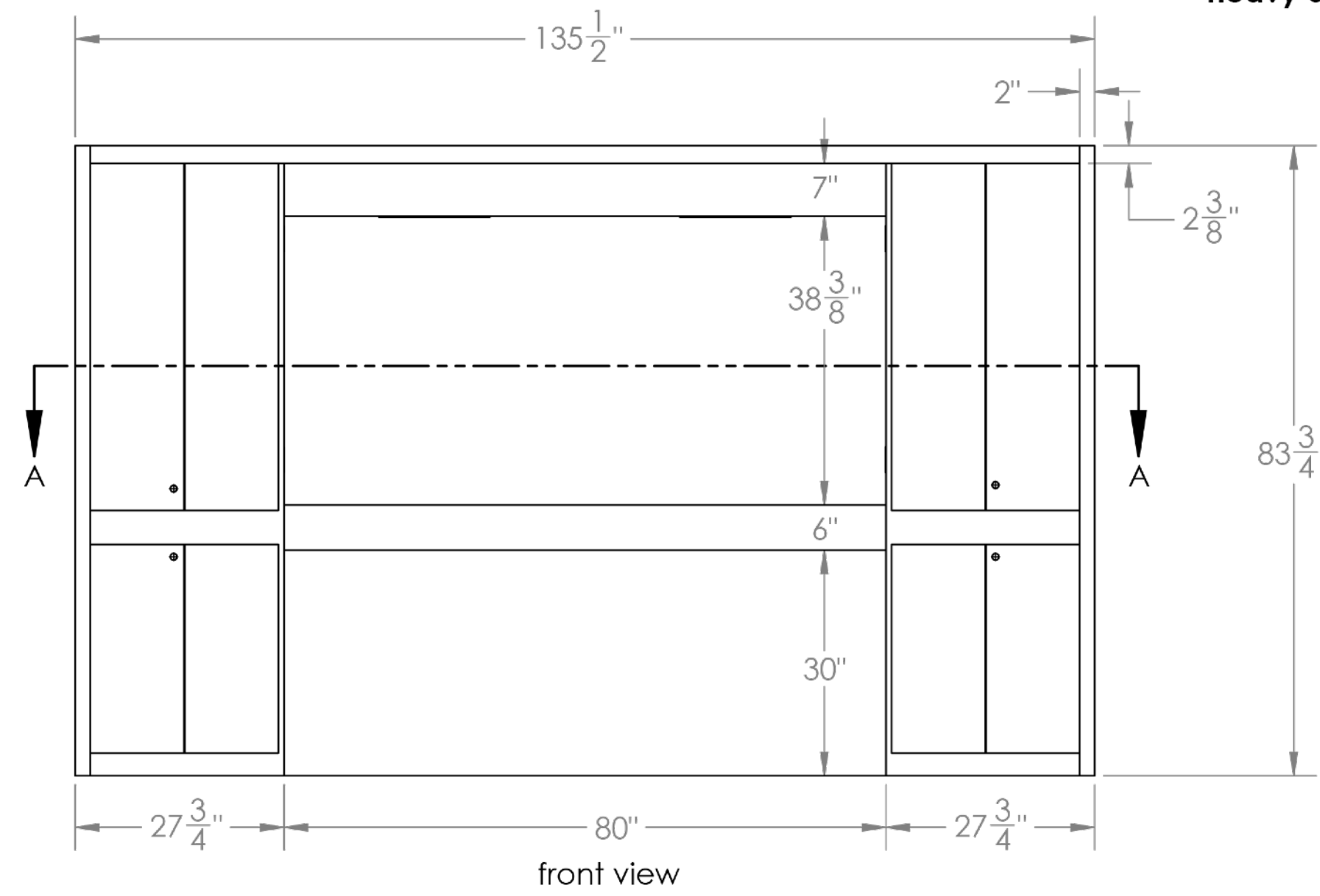
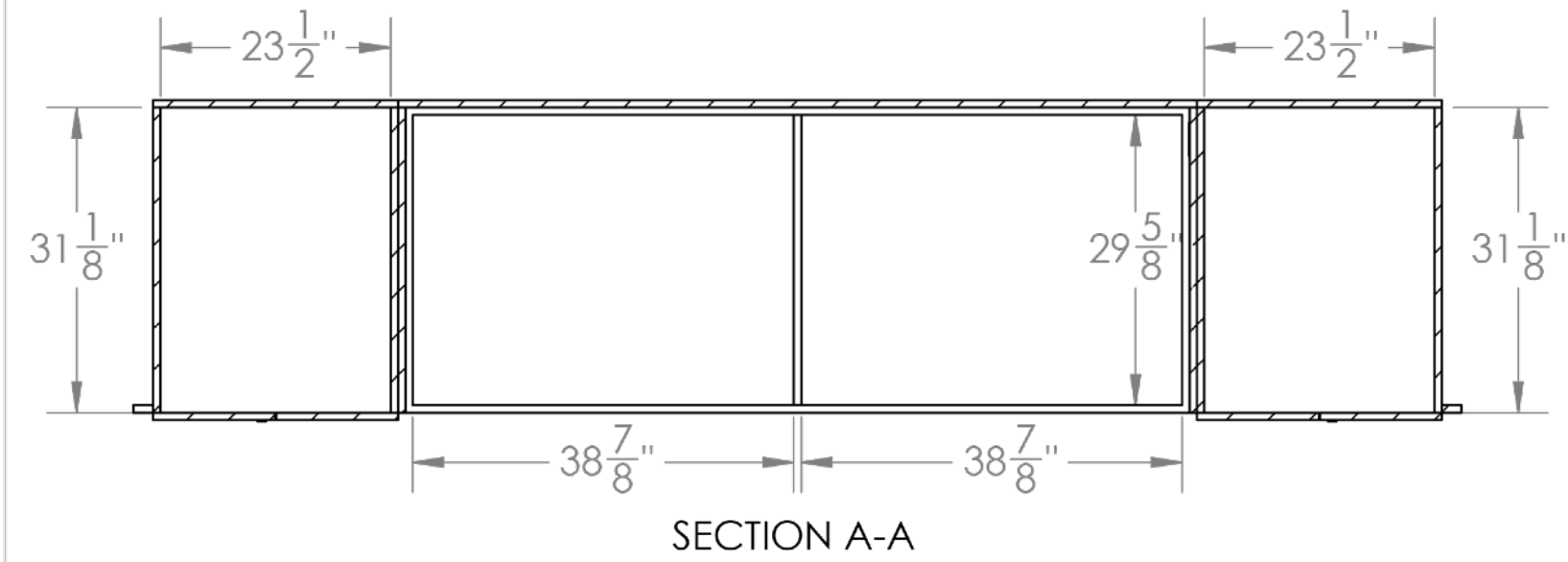
The interactions used are all analogue and easy for anyone to do as well which was a crucial design decision despite creating a sophisticated engineering solution. Users need only to move the silicone sand in order to change the topographic projections and hold their hand over the sand in order to “make it rain”.

In the end, a working design was achieved that met all of the constraints imposed by client and the nature of the Kubota Truck.





Sand box assembly
 Overall sizes
 All visible surfaces grey laminate (terril formica 2297 - 58 matte)
 1 pieces required



CLIENT:

SHOW INFORMATION:

SHOW DATES:

BOOTH NO:

DOCUMENT TITLE:
 Sandbox 2 station V1 draw
 Sandbox

Drawn by:

JOB NO:

Drawing date:
 3/2/2017

Revision date:

Issued for:

Scale:
 1:24

Quantity:

Drawing I.D. #
 16-Sandbox 2 station V1 draw-
 Sandbox 01

Client Approval

Name: _____ Signature: _____ Date: _____

Key Takeaways

Use research to guide concept decisions

Because we wanted to use disruptive technology as a pivotal working standard for this project, our research was really key in terms of understanding what's possible and what audiences are more likely to engage with. This was a major investment for the client so cutting corners on creativity in a meaningful solution was not an option, and was arguably the factor that led to its overall success.

Set expectations early on and communicate regularly with client and collaborators

With the constraints and goals in mind, it was important to be clear and upfront with how we were going to approach the development, what compromises had to be made and what kind of touch-points the client can expect. The project involved several heavy changes to the overall design of the project which affected engineering in other parts of the truck from electrical to architectural planning that needed to be conveyed immediately and clearly to ensure minimal recourse would be needed each time.

Less is more with disruptive technology

Augmented reality is ultimately a new medium for the average person and so creating a user interface that anyone can pick up within ten seconds was absolutely crucial. It's a lot to ask of your customer to learn how to use a new technology and spend their time not knowing what they'll get out of it. Simplifying interactions was a key goal and it paid off, becoming accessible for a wide range of users.

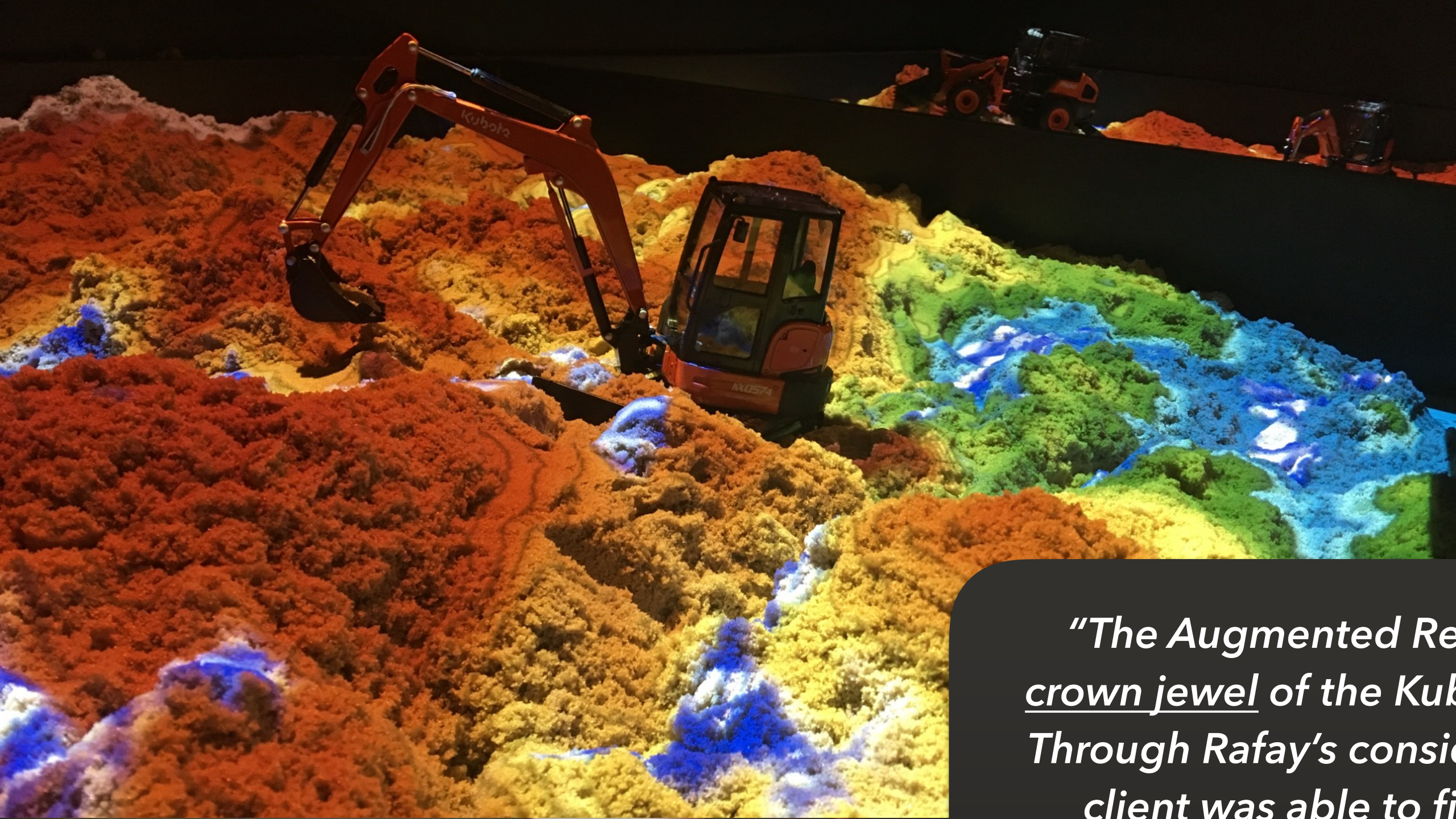


Results

After two months of designing and engineering the setup, the Kubota Truck finally made its debut in late April 2017 at Kubota's new headquarters where the CEO and entire executive team made an appearance to give it their own round of approval.

Today, the Kubota Truck is making its successful tour around North America to football and public events with few maintenance stops. The Sandbox experience is attracting users from all age groups and is garnering true interest, delight and positive engagement with the Kubota brand.





"The Augmented Reality Sandbox is the crown jewel of the Kubota Experience Truck. Through Rafay's considerate dedication, our client was able to find satisfaction and comfort in our promises to them."

Kathleen Coulter

Executive Director @ Red Umbrella XM

