

## Case Study

# We Design the Way to Experience the Sky *Managing High Expectations*

We could regale you with stories of our amazingly tight acoustical design collaboration at One Vanderbilt. We could talk about the intricacies of measuring vibrations coming from the NYC Subway, even before the ground was broken. We could write 67 stories, one for each floor, each with its mechanical operation and therefore, acoustic plan. Instead, we're focusing on how we made sure nothing (like the noise from cooling fans) will get in the way of guests experiencing One Vanderbilt's Summit.

### Signature Acoustic Solution

With millions of people lining to go up in a fully glazed elevator aptly called Ascent, for the most spectacular sweeping views in NYC, we needed to create an acoustic experience in line with the total experience. The problem was adjacent cooling towers, all running at 100%.

Using Cerami's Acoustic Reality System™, we were able to test different cooling tower design options, virtually, so that JB&B, SL Green, and Tishman could hear how each option would impact the experience before making the final decision.

To create the premiere observation deck for optimal visitor experience, Trinity Cerami modeled several components of The Summit for the SL Green, Snøhetta, & Kenzo Digital design team.



### Challenge

Rising at 1,401-foot, this supertall structure posed many design and construction complexities. With such a massive structure and high-performance features, Cerami needed to ensure the acoustical performance of the building was optimized from the inside out.



### Solution

Cerami collaborated closely with the design team to ensure effective acoustic design was incorporated into the base building design. The team also established vibration and noise control requirements for all building service equipment, and sound barrier construction and performance requirements for acoustical separation.



### Result

Cerami's Acoustic Reality System™, takes the ambiguity out of acoustic design. This hands-on experience empowered the One Vanderbilt stakeholders to make sound and informed decisions.