



HALIO®

Smart-Tinting Glass

The World's Most Advanced Smart Glass for Windows, Walls, and Skylights.

Halio has no equal. It combines the most advanced electrochromic technologies with a powerful, secure, easy-to-integrate cloud-based system to deliver a technologically advanced building that responds to the needs of the people inside, ensuring their thermal and visual comfort while reducing energy consumption by as much as 20%. A modern daylighting solution, Halio contributes to LEED, BREEAM, and WELL certifications.

Looks just like natural glass and then the magic happens. The first and only smart glass that's responsive and looks natural at the same time, Halio smart-tinting glass automatically tints to the perfect shade of neutral cool gray to block solar heat and glare.

Say goodbye to the blues. Halio is the first electrochromic product to tint to neutral colors. Halio features a Color Rendering Index (CRI) of 97.5% in the clear state and stays above 90% until the Tvis drops to 20%, allowing your interior colors to stay true.

Fastest-tinting electrochromic glass, bar none. Halio's tinting speeds are unrivaled—10 times faster than other electrochromic technology options. Halio begins responding within 15 seconds to provide immediate relief from glare and solar heat—achieving the darkest tint level within 3 minutes, no matter the size of your window. Fast tinting, combined with fast clearing, means windows are clear for longer periods of time.

Windows in sync with technology. Halio windows automatically tint and clear depending on the sun's brightness, cloud cover, and obstructions that affect sunlight coming into a room. Mobile apps and wall-mounted Tint Selectors enable manual control.

Designed to co-exist with best-in-class technologies, Halio can be integrated with popular building automation systems, as well as technologies that the future might bring.

Design without restraint. Halio is the first electrochromic product that can be paired with just about any type of glass and coating to meet your performance goals, e.g., bird-friendly, hurricane glass, and more. Best of all, your vision will be free of blinds and shades. No more checkerboard facades.

Happy clients. Your clients will like the energy savings on OpEx, the increased capitalized value, and the health and wellness benefits that daylight and views deliver—all the while knowing they're also doing the planet good.

	Halio ¹		Halio Black ²		High Performance Glazing ³
	Clear	Tinted	Clear	Tinted	
Visible Light Transmission (VLT)	65%	2%	52%	0.01%	62%
Solar Heat Gain Coefficient (SHGC)	0.51	0.09	0.40	0.096	0.28
U-Factor	0.26		0.28		0.24
UV Transmission	<1%		<1%		15%
Reflectance Outside	17%	6%	17%	5%	14%
Reflectance Inside	16%	12%	19%	11%	13%
Sound Transmission Class (STC)	42		42		35
Response Time	≤ 15 seconds		≤ 15 seconds		—
Switching Time	≤ 3 minutes		≤ 3 minutes		—
Tint Color(s)	Cool Gray		Cool Gray		—
Number of Tint Levels	Unlimited		Unlimited		—
Privacy	No		Yes		No
Blackout	No		No		—
ASTM E2141 Durability & Reliability Tested	Yes		Yes		N/A

1. Halio data based on a 1-inch thick IGU with 11.1mm 90% Argon filled gap and SunGuard Neutral 78/65 low-E coating on Surface #3
 2. Halio Black data based on a 1-inch thick IGU with 8.7mm 90% Argon filled gap and SunGuard Neutral 78/65 low-E coating on Surface #3
 3. High performance glazing data based on a 1-inch thick IGU with 12.7mm 90% Argon filled gap and Energy Select 28 low-E coating on Surface #2

SEE FOR YOURSELF. REQUEST A DEMO.

Contact your local Vitrum representative for a demo and to discuss how Halio smart-tinting glass can help meet your project's performance goals. We'll happily discuss:

- How Halio differs from other electrochromic products
- IGU options
- Project pro forma