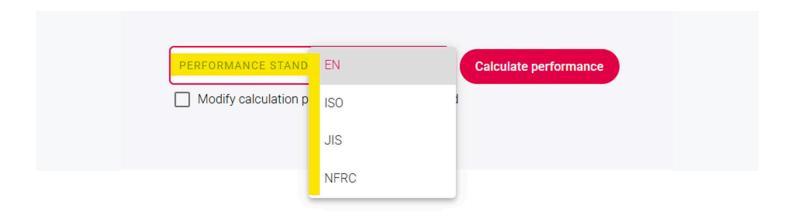


How to use different standards when calculating performance

When calculating performance in the Glass Configurator, you may have noticed that several different standards are available in the dropdown menu. Each of these standards follows a different methodology, often reflecting regional requirements or industry-specific practices. Selecting the right standard ensures that your results are compatible with your project's location and/or certification requirements.

In other words, you should always select the standard that best matches the region and requirements of your project. This will ensure that the results of your performance calculation are not only accurate, but also comply with the expectations of your market.



The available options are described below:

EN (European Standards)

- Optical and thermal performance is calculated according to **EN 410** (light and solar properties) and **EN 673** (thermal transmittance).
- Acoustic performance is calculated according to EN 12758, while safety and resistance are based on EN 13501-1 and -2 (fire), EN 1063 (bullet resistance), EN 356 (break-in resistance), EN 12600 (impact) and EN 13541 (explosion).

EN standards are widely recognised across Europe, providing comprehensive results that cover the optical, thermal, acoustic and safety aspects of glazing.

ISO (International Organization for Standardization)

- Light transmittance and solar transmittance are calculated according to **ISO 9050**, while U-value is calculated according to **ISO 10292**.
- This option does not include acoustic or safety performance.
 ISO standards are internationally accepted, offering a neutral reference for projects that require globally comparable data.

JIS (Japanese Industrial Standards)

- These calculations are based on **JIS R 3106** (light and solar properties) and **JIS R 3107** (thermal insulation).
- This option does not provide acoustic or safety data.

 JIS standards are tailored to the Japanese market, ensuring compliance with local methodologies and climatic conditions.

NFRC (National Fenestration Rating Council – United States)

- Results are calculated according to NFRC 200 (solar heat gain), NFRC 300 (visible transmittance) and NFRC 100-2010 (U-factor).
- Acoustic performance is calculated according to ASTM E413 and ASTM E1332.
 NFRC standards are mandatory in North America for energy labelling, focusing strongly on building code compliance and energy efficiency ratings.