



STC Ratings Chart

A common acoustic issue in virtually any space is sound transmission. Sound transmission can be both airborne and/or structure borne vibration. Airborne sound travels through the air and can transmit through a material, assembly or partition. Sound can also pass under doorways, through ventilation, over, under, around, and through obstructions. When sound reaches a room where it is unwanted, it becomes noise. Noise such as that from automobiles, trains and airplanes can transmit through the exterior structure of a building.

Sound transmission can cause noise control, confidentiality, and privacy issues. Sound from a noisy environment such as a mechanical equipment room or an area with loud activities or music can transmit through a partition into a quieter space. This will cause unwanted noise within the quieter space. This is not only an annoyance; in several cases it can cause the quieter space to become unusable for its intended purpose. Several spaces require confidentiality. Offices of counselors, lawyers, or human resource departments cannot function in a space where sound will transmit through the surrounding walls and into an adjacent space. In most other office situations if confidentiality is not an issue, privacy is. If sound transmission is not properly controlled, the space or environment will not provide privacy for its users.

STC Ratings Comparisons

Magnetite offers superior soundproofing over the added cost of specialized soundproofing window replacements. Note: In the list below, the higher the number, the better sound control you will have in your home or business.



- Uninsulated Wall = 33-35
- Insulated Wall = 34-39
- Brick Wall = 47
- Block Wall = 48
- Single-Pane Window = 26-28
- Dual-Pane Window = 26-33
- Soundproofing window + Single-Pane Window = 43-49
- Soundproofing window + Dual-Pane Window = 45-54
- Magnetite Acoustic + Single-Pane Window = 41-47
- Magnetite Acoustic + Dual-Pane Window = 48-54