



**BSR/ASHRAE/IES Addendum i
to ANSI/ASHRAE/IES Standard 90.2-2018**

Public Review Draft

Proposed Addendum i to Standard 90.2-2018, High-Performance Energy Design of Residential Buildings

**Third Public Review (March 2024)
(Draft Shows Proposed Independent Substantive Changes
To Previous Public Review Draft)**

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FOREWORD

Common area provisions for HVAC and lighting systems have been in the standard since its publication in 2018 (sections 7.4.7 and 7.5.4, respectively). Addendum i adds common area provisions for building envelope systems.

This proposed revision changes the SHGC requirements for in climate zones 6 through 8. Specifically in zones 6 and 7 0.35 was replaced by 0.45 and in zone 8 0.35 was replaced with NR. This revision was based on public comments received and a continuation of discussions considering cooling loads and peak power considerations.

[Note to Reviewers: This addendum makes proposed changes to the current standard. These changes are indicated in the text by underlining (for additions) and ~~striketrough~~ (for deletions) except where the reviewer instructions specifically describe some other means of showing the changes. Only these changes to the current standard are open for review and comment at this time. Additional material is provided for context only and is not open for comment except as it relates to the proposed changes.]

Addendum i to 90.2-2018

Revise Table 7-3 (IP Units):

Table 7-3 Common Area Component Requirements

Climate Zone	Maximum SHGC		Maximum U-Factors								
	Glazed Fenestration	Skylights	Fenestration	Skylights	Interior Ceiling ^a	Exterior Ceiling ^b	Interior Framed Walls ^a	Exterior Framed Walls ^b	Exterior Mass Walls ^b	Interior Floor ^a	Exterior Floor ^b
0	0.23	0.23	0.32	0.50	0.080	0.032	0.080	0.076	0.177	0.080	0.058
1	0.23	0.23	0.32	0.50	0.080	0.032	0.080	0.076	0.177	0.080	0.058
2	0.23	0.23	0.32	0.50	0.080	0.027	0.080	0.076	0.149	0.080	0.058
3	0.23	0.23	0.28	0.40	0.080	0.027	0.080	0.054	0.088	0.080	0.042
4 except Marine	0.25	0.25	0.25	0.40	0.080	0.023	0.080	0.054	0.088	0.080	0.042
Marine 4 and 5	0.30	0.30	0.22	0.40	0.080	0.023	0.080	0.054	0.074	0.080	0.030
6	0.35 <u>0.45</u>	0.35 <u>0.45</u>	0.22	0.40	0.080	0.023	0.080	0.041	0.054	0.080	0.030
7	0.35 <u>0.45</u>	0.35 <u>0.45</u>	0.22	0.40	0.080	0.023	0.080	0.041	0.051	0.080	0.025
8	0.35 <u>NR</u>	0.35 <u>NR</u>	0.22	0.40	0.080	0.023	0.080	0.041	0.051	0.080	0.025

^a Interior components are those that separate a *common area* from a sleeping or *dwelling unit*.

^b Exterior components are those that are part of the *building thermal envelope*.

Revise Table 7-3 (SI Units)

Table 7-3 ~~Common Area Building Envelope~~ Common Area Component Requirements

Climate Zone	Maximum SHGC		Maximum U-Factors								
	Glazed Fenestration	Skylights	Fenestration	Skylights	Interior Ceiling ^a	Exterior Ceiling ^b	Interior Framed Walls ^a	Exterior Framed Walls ^b	Exterior Mass Walls ^b	Interior Floor ^a	Exterior Floor ^b
0	0.23	0.23	1.82	2.84	0.45	0.18	0.45	0.43	1.01	0.45	0.33
1	0.23	0.23	1.82	2.84	0.45	0.18	0.45	0.43	1.01	0.45	0.33
2	0.23	0.23	1.82	2.84	0.45	0.15	0.45	0.43	0.85	0.45	0.33
3	0.23	0.23	1.59	2.27	0.45	0.15	0.45	0.31	0.50	0.45	0.24
4 except Marine	0.25	0.25	1.42	2.27	0.45	0.13	0.45	0.31	0.50	0.45	0.24
Marine 4 and 5	0.30	0.30	1.25	2.27	0.45	0.13	0.45	0.31	0.42	0.45	0.17
6	0.35 0.45	0.35 0.45	1.25	2.27	0.45	0.13	0.45	0.23	0.31	0.45	0.17
7	0.35 0.45	0.35 0.45	1.25	2.27	0.45	0.13	0.45	0.23	0.29	0.45	0.14
8	0.35 NR	0.35 NR	1.25	2.27	0.45	0.13	0.45	0.23	0.29	0.45	0.14

^a Interior components are those that separate a *common area* from a sleeping or *dwelling unit*.

^b Exterior components are those that are part of the *building thermal envelope*.