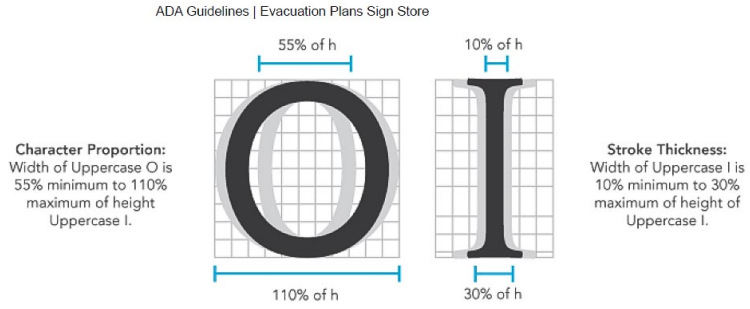
Tactile Map Making Quick Reference Guide

All dimensions provided include metric millimeters and inches.

Minimum Letter Dimensions for Raised Character Signs

(For tactile characters only; visual requirements separate have parameters)

Parameter	Dimensions	Source
Depth (letter height from background)	**≥ 0.8 mm** (1/32")	ADA Signage Guidelines (703.2.1)
Character height (uppercase "I")	**≥ 16 mm** (5/8") **≤ 51mm** (2")	ADA Signage Guidelines (703.2.5)
Stroke thickness (width of uppercase "I")	**≤ 15%** of character height	ADA Signage Guidelines (703.2.6)
Character width proportion (uppercase "O")	**≥ 55%** of uppercase "O" height to the uppercase letter "I" height.	ADA Signage Guidelines (703.2.4)

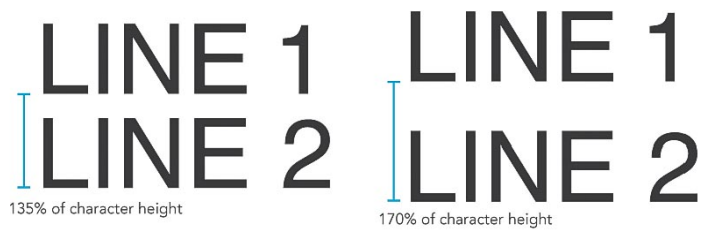




Font Style and Spacing

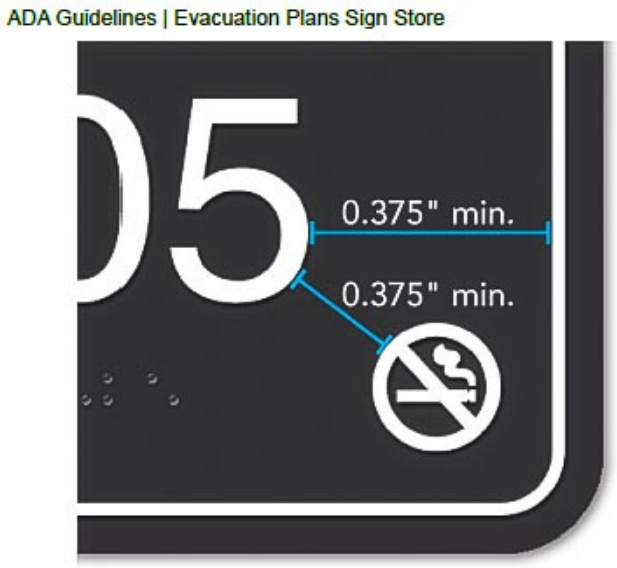
Parameter	Specification	Source
Typeface	Sans-serif, uppercase only, no italic/script	ADA Signage Guidelines (703.2.2)
Letter-to-letter spacing	Closest points between letters: **10%–35%** of character height **and ≥3.2 mm** (⅛")	ADA Signage Guidelines (703.2.7)
Line spacing (baseline-to-baseline)	**135%–170%** of character height	ADA/Braille Signage Guidelines (703.2.8)





Spacing Guidelines

Parameter	Specification	Source
Space around tactile letters and symbols (includes borders, braille, raised letters and symbols)	**≥9.5 mm** (⅜")	ADA/Braille Signage Guidelines (703.2.7)



Finish and Contrast Recommendations

Parameter	Specification	Source
Surface finish	Matte/non-glare	ADA Signage Guidelines
Color contrast	High-contrast (≥70% LRV difference), dark-on-light or light-on-dark	ADA Signage Guidelines

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Quick implementation tips

1. **Spacing Consistency**: Keep every doorway gap exactly the same width. Keep lettering and symbols on map and key the exact size.

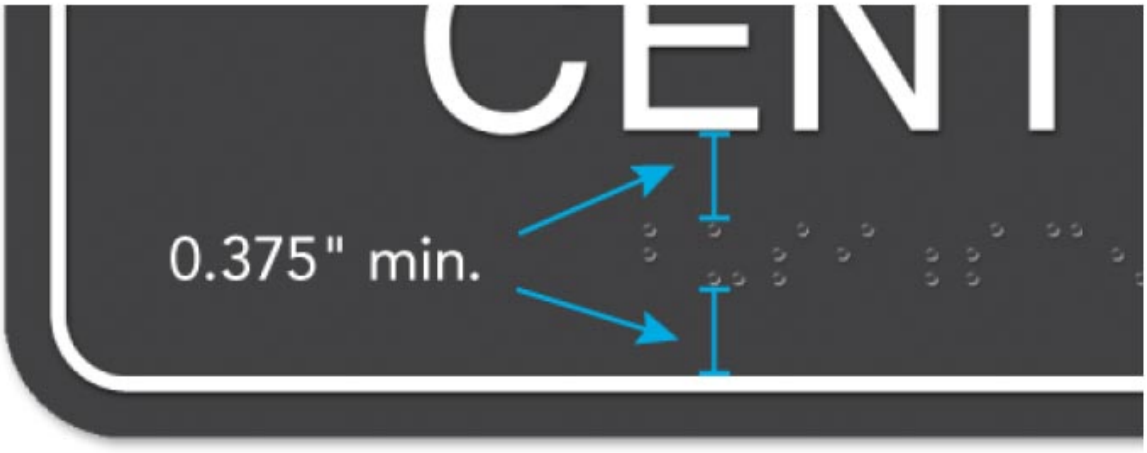
2. **Print preview check**: In your slicer’s layer view, check wall count matches intended sizing.

3. **User testing**: Before the final process is saved, get feedback from a tactile map user to be sure nothing was missed and all information can be easily understood.

Braille Reference Guide:

703.3.1 Dimensions and Capitalization. Braille dots shall have a domed or rounded shape and shall comply with Table 703.3.1. The indication of an uppercase letter or letters shall only be used before the first word of sentences, proper nouns and names, individual letters of the alphabet, initials, and acronyms.





Brennen's 3D Printed Map Quick Reference Guide: Depth

(General change use 0.6 mm difference and 0.8 mm difference for symbols)

Feature	Depth
Braille Base Layer	0.1 mm
General Base Layer	0.4 mm

Interior Floor Layer	1.0 mm
Symbols Layer	1.8 mm
Outer Walls Layer	2.4 mm

Test of alternate version on (6_24_2025):

- Braille Base 0.1 or 0.7 (0.3mm separation)
- Starting base plate street below 0.4
- Starting base plate garage floor 1.0 (0.6mm depth)
- Sidewalk 1.6 (0.6mm depth)
- Symbols layer 1.2 or 1.8 or 2.4 (0.8mm depth above base)
- Bollards height 3.0 (0.6mm depth)
- Wall Height 3.6 (0.6mm depth)

Brennen's 3D Printed Map Quick Reference Guide: Sound Transit Symbol Sizing

Feature	Width	Height
Wall	0.2 mm	N/A
Curb	0.1 mm	N/A
Shoreline Side	1.5 mm	N/A
Paid Fare Zone (Repeating Line Width)	0.8 mm	16 mm

Platform Edge	1.5 mm	N/A
Track (Reference to Curb)	2 x 1 mm (with 1.5 mm gap)	N/A
Turnstiles	6 mm	2 mm
Stairs	1.2 mm	16 mm
Escalator	1.2 mm	18 mm
Elevator Up / Down (Outer Line Width)	2.2 mm	16 mm
Ticket Fare Machine (Outer Line Width)	1.0 mm	16 mm
Directional Arrow (Line on arrow)	1.2 mm	16 mm
Skybridge Number	2.0 mm	16 mm