U.S. Patent Pending

ADA SOLUTIONS, INC.

FOR PEDESTRIAN CROSSINGS

Service, Delivery and Price

Make ADA Solutions, Inc. the Obvious Choice

AVAILABLE SIZES & COLORS

		CAS	T-IN	N-PI	L A (CE				SURFA	ACE	M	οι	JNI	Г			REPI	LACEA	BLE		ADA :
	3' x 5'	3' x 4'	>) ソ , v , <u>u</u>		7' ∨ 4'	>	טי ע זי	3' x 5' ₍₂₄₎	3' x 4' (20)	>)' < 건	2 ^ T (15))' v 4'	Fasteners/tile> (12)	2' x 3'	3' x 5'	3' x 4'	2' x 5'	2' x 4'	2' x 3'	ADA SOLUTIONS, INC.
	1.67"	1.67"	2.35"	1.67"	2.35"	1.67"	2.35"	1.67"	1.67"	1.67"	2.35"	1.67"	2.35"	1.67"	2.35"	1.67"	2.35"	2.35"	2.35"	2.35"	2.35"	Dome Spacing
•	47	37.5	30		23.2	23	17.5		32	26.5	20.5		16.75		13.5		52.5	42.0	35.0	28.5	22.0	Part Weights
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•	~	<	<	<	<	<	<	~	<	<	<	<	~	<	<	~	~	~	~	<	<	Brick Red
	√	V	<	<	<	<	<	<u> </u>	V	<	<	<	~	<	<	~	~	V	~	V	√	Dark Gray
	~	V	<	<	<	<u> </u>	<	~	V	<	<	<	√	~	<	~	~	V	~	V	√	Black
	<	<	<	<	<	<	<	<	<	<	<	<	<	<	<	<	<	<	<	<	<	Clay Red

		Adhesive Information	
	Part #	Description	Coverage/Yield
	DUR10OZ	Durabond - 10oz Caulking Tube	Up to 10 sq ft
	DUR30OZ	Durabond - 30oz Caulking Tube	Up to 18 sq ft
	BOS5GAL	Bostik - 5 Gallon Pail	Approx. 250 sq ft
		Light Reflectance Values	
	ADA'	ADA's Composite TWS Product Line Federal Color Standards (595B)	(595B)
	Color	Description	LRV
1.	Federal Yellow	#33538 (lusterless)	44.7
2.	Brick Red	#30109 (lusterless)	10.1
<u>.</u>	Black	#37038 (lusterless)	3.4
4.	Dark Gray	#36118 (lusterless)	11.2
5.	Clay Red	#22144 (lusterless)	10.6



DETECTABLE WARNING SURFACES FOR PEDESTRIAN CROSSINGS

Replaceable Composite (Wet-Set) Tactile Surface Mount Composite Tactile Cast-In-Place Composite Tactile Cost Effective, Readily Available, and Easy to Install

ADA Products Feature:

ADAAG/PROW/CA Title 24 Compliant

- Pleasing architectural quality appearance and high performance product with geometry strictly compliant with all applicable codes.
- Approved for use by all major municipalities, DPW's and state DOT's.

Superior Wear Resistance

- Wear resistance properties far superior to that achieved with concrete based materials of any type.
- ADA's Product will conform to irregular underlying substrates.
- Eliminates hairline cracking observed in epoxy based and VPC (Vitrified Polymer Composite) based materials.

Maintenance

- Virtually impervious to absorption (key indicator of durability) when compared to concrete, epoxy, or VPC materials. Not affected by chemical exposure.
- Performs well when subjected to snow removal operations.
- Easy to clean and replace when necessary.

Homogenous Materials allow for Superior Color Stability

- Pigment is uniformly distributed throughout the thickness of our products.
- Long term color stability without the need for secondary coatings.

Product Availability

- Immediate delivery
- National distribution

Proudly Made in the U.S.A.

We offer unmatched selection, service, delivery and price, with a strong focus on customer satisfaction. ADA Solutions, Inc. is leading the way in the detectable warning marketplace. Use us once and you'll see why so many companies across the country choose ADA Solutions, Inc.

ADA Solutions Recommends the Use of Bostik's Hydroment® Ultra-Set Advanced™ & D-818™ Adhesives.

- ADA exclusively uses and recommends the use of Bostik's Hydroment Ultra Set
 Advanced and Durabond® D-818™ Multi-Use Adhesives for all pedestrian crossing/curb
 ramp and transit facility platform edge structures throughout ADA's North American Market.
- · High performance adhesive with tenacious bonding characteristics suitable for interior and exterior applications.
- High strength adhesive suitable for use over concrete, ceramic, or stone substrates.
- May also be used as a crack isolation/waterproofing membrane and to bridge cracks up to 1/8"

In stock colors

Yellow

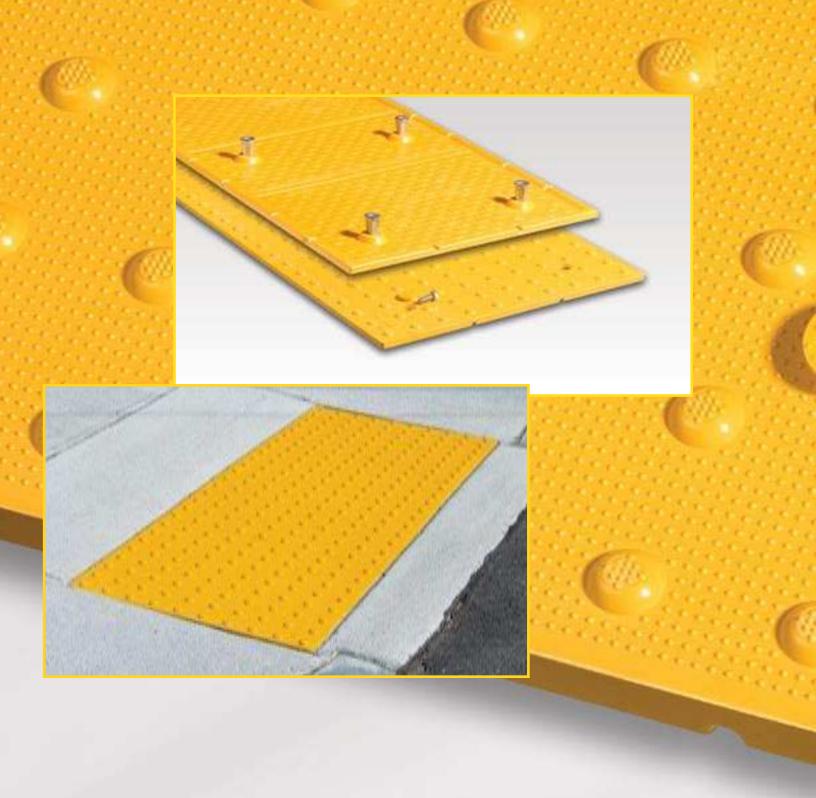
Brick Red

Black

Dark Gray

> Clay Red

WWW.ADATILE.COM • 800-372-0519





Installation Procedure

Be sure to read and understand <u>all</u> of these instructions <u>before</u> you begin.

- A. The physical characteristics of the concrete shall be as specified in the contract documents while maintaining a slump range of 4-7 inches to permit the solid placement of the ADA Replaceable Composite (Wet Set) Tactile Unit (ADAREP) in the wet cement.
- **B** The concrete shall be poured and finished level, true and smooth to the required dimensions prior to the placement of the ADAREP unit.
- C. Place the ADAREP unit 6-8 inches from the curb line. Working in a grid pattern, tamp the ADAREP unit into the wet concrete using a rubber mallet and a piece of wood. Continue this process until all of the air has been released, and the ADAREP unit surface is flush with the surrounding area. IMPORTANT: Avoid striking the surface of the ADAREP unit directly.
- Following the placement, the ADAREP unit elevation should be checked to the adjacent surface with a straight edge. The ADAREP unit elevation should be consistent with the Contract Drawings and Specifications. Any required adjustments must be made prior to the time when the concrete begins to set.
- When you are confident that the ADAREP unit is in place and no further adjustments are needed, place a cinder block on both ends to hold the ADAREP unit in place while the concrete sets.
- During and after the ADAREP unit installation, as well as the concrete curing stage, no walking or external forces can be placed on the ADAREP unit. The area must be protected from pedestrian traffic until concrete is cured. The ADAREP Warning Surface will be ready for pedestrian traffic within 1-2 hours.
- **G** Be sure to remove plastic protective covering from the face of the ADAREP Unit once the concrete is cured.

*Not recommended or warrantied for asphalt installation.



View additional photos, drawings and specifications on our website: www.adatile.com.

Call (800) 372-0519 with any questions.







PRODUCT SIZES 2'x3' 2'x4' 2'x5' 3'x4' 3'x5'

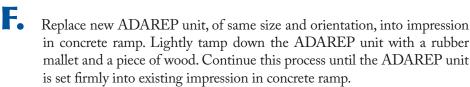
APPLICATION
Fresh Pour
Concrete Ramps
& Replacement

Replacement Procedure

Be sure to read and understand <u>all</u> of these instructions <u>before</u> you begin.

- A. Lift the existing composite bolt cap from each anchor location on the ADA Replaceable Composite (Wet Set) Tactile unit (ADAREP) with a flat head screw driver.
- Remove the existing 1/2" x 1½" stainless steel bolts from each anchor location on the ADAREP unit with a ratchet. Save & reuse.
- C. Tap around all sides of the ADAREP unit and across the middle with a rubber mallet, working in a grid pattern.
- Pry the existing ADAREP unit from the concrete ramp with a small prybar, working around the edges until it can be lifted cleanly away.
- Be sure to remove all small debris and dust from the existing impression in the concrete ramp.

IMPORTANT: Be careful not to get debris into anchor locations.



IMPORTANT: Avoid striking the ADAREP unit directly.

- G Bolt existing 1/2"x 1½" stainless steel bolts back into each anchor location on new ADAREP unit.
- Snap a new composite bolt cap provided, into each anchor location on the ADAREP unit. The ADAREP unit is ready for pedestrian traffic immediately after installation is complete.









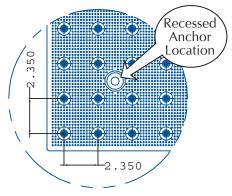
Inline Dome Pattern

DOME GEOMETRY

In accordance with ADA Regulations for Detectable Warning on Curb Ramps: Raised truncated domes with a diameter of nominal 0.9", a height of nominal 0.2" and a center-to-center spacing of 2.35".

PANEL DIMENSIONS

ADA Replaceable Composite (Wet Set) Tactile units (ADAREP) are available in 24" x 36", 24" x 48", 24" x 60", 36" x 48" and 36" x 60" sizes. ADAREP units may also be custom configured to accommodate specific project requirements. ADAREP units measure 3/8" nominal thickness and feature a 5/8" thick x 1" wide perimeter "flange."



MATERIAL

A homogenous glass and carbon composite which is colorfast and UV stable. Truncated domes are fiberglass reinforced for enhanced durability. The color of the ADAREP unit is uniform throughout and does not rely on any type of paint coating to achieve color stability. Standard colors include: Federal Yellow, Brick Red, Clay Red, Dark Gray and Black. For superior wheelchair, walker and shopping cart mobility, truncated domes have a center-to-center (horizontally and vertically) spacing of 2.35 inches.

PHYSICAL CHARACTERISTICS

Compressive Strength	28,900 psi	ASTM D 695
Flexural Strength	29,300 psi	ASTM D 790
Water Absorption	.07%	ASTM D 570
Slip Resistance	1.18 Dry, 1.05 Wet	ASTM C 1028
Flame Spread Index	20	ASTM E 84
Salt Spray	No Change (200 hours)	ASTM B 117
Chemical Stain Testing	No Deterioration	ASTM 1308
Abrasion Resistance	549	ASTM C 501
Accelerated Weathering	Delta E<5.0 (2,000 hours)	ASTM G 155
Tensile Strength	11,600 psi	ASTM D 638
Load Bearing at 16,000 lbs.	No Damage	AASHTO-H20
Freeze/Thaw/Heat	No Disintegration	ASTM C 1026

INCIDENTALS

Fasteners: ½" x 1½" stainless steel bolts. Anchors: 1½" corrosion resistant concrete inserts.

WARRANTY

ADAREP units shall be guaranteed in writing for a period of five (5) years from date of contract's final completion. The guarantee includes defective work, breakage, deformation and loosening of the tactile warning surface material.



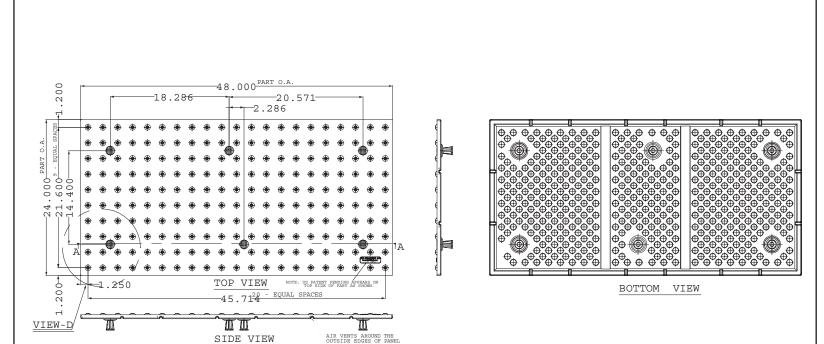
-36.000 PART O.A. 200 -27.429 000 PART 600 9 - EQUAL 400 4 4 SOIT 200-TOP VIEW BOTTOM VIEW 1.250 34.286 — NOTE: US PATENT PENDING APPEARS ON TOP SIDE OF PART AS SHOWN. VIEW-D/ SIDE VIEW AIR VENTS AROUND THE OUTSIDE EDGES OF PANEL US PATENT PENDING THE EXILERITATION OF STREET MATERIAL LIST SECTION B-B .350 VIEW -B .090 DEG. POINT CAP COVER Ç .045 HIGH TYP -.900 DIA. TYP. -60.000° DIA. TOP OF DOME -1.375-DIA(4) 1.125 DIA(4) PROJECT WET SET ADA REPLACEABLE TACTILE WEI SEI AUM REPEMCEMBEE INCITED WARNING SURFADE UNIT 2.375" IN LINE TRUNCATED DOME PATTERN PART SIZE 24" x 36" PLANS AND DETAILS .245 2.350 VIEW - " D" 2 x SIZE ~R0.250 FIELD DOT 7 DOME LAYOUT HEX HEAD BOLTS & WASHER 4-PL. ADA SOLUTIONS, INC. P.O. Box 3 N.Billerica, Ma. 01862 VIEW -B 3 x SIZE

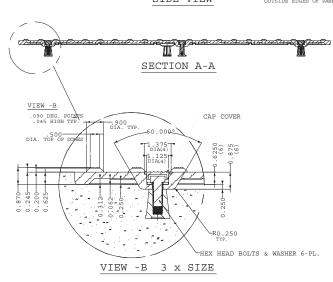
24"x36" Tile 2.35" Dome Spacing

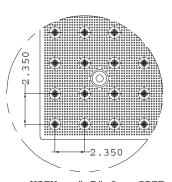
/ET-SET) TACT

4"x48"

Dome Spacing .35"







VIEW - " D" 2 x SIZE FIELD DOT 7 DOME LAYOUT

US	5 P.	ATEN	$_{ m IT}$	PEND]	ING
		MATE	RIAL	LIST	
ITEM	DESCRI	PTION		PART NO.	QT
1					
2					
3					
4					
SCALE	AS NOT				
TRAD		ING SURFACE	PART	NO. SEE MATERIA	L LIST

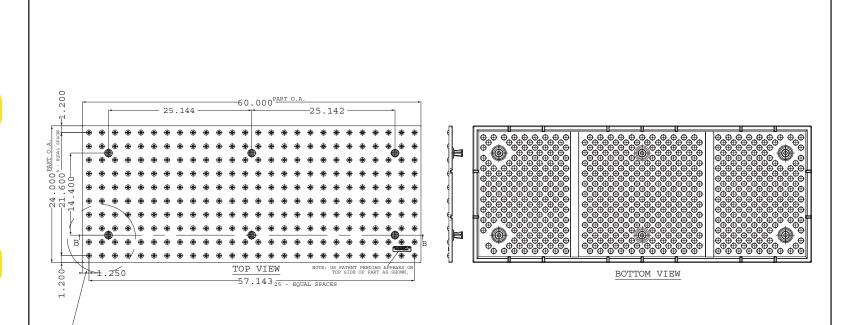
PROJECT

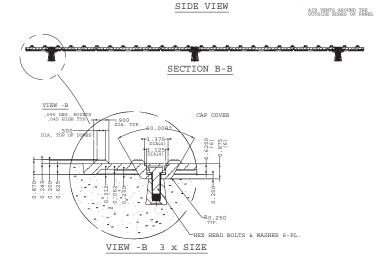
WET SET ADA REPLACEABLE TACTILE WARNING SURFADE UNIT 2.375" IN LINE TRUNCATED DOME PATTERN PART SIZE 24" x 48" PLANS AND DETAILS

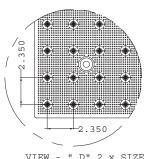
ADA SOLUTIONS, INC. P.O. Box 3 N.Billerica, Ma. 01862

VIEW-D









VIEW	- "	D"	2	x	SIZE
FIELD	DOT	7	DO	OME	LAYOUT

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MATERIAL LIST							
ITEM	DES	CRIPTION		PART NO.	QT'		
1							
2							
3	3						
4	4						
SCALE AS NOTED FULL SIZE							
TRAD		MADNING SUPPACE	PART NO.				

NO.		
SEE	MATERIAL	LIST
	SEE	SEE MATERIAL

PROJECT

WET SET ADA REPLACEABLE TACTILE WARNING SURFADE UNIT 2.375" IN LINE TRUNCATED DOME PATTERN PART SIZE 24" x 60" PLANS AND DETAILS

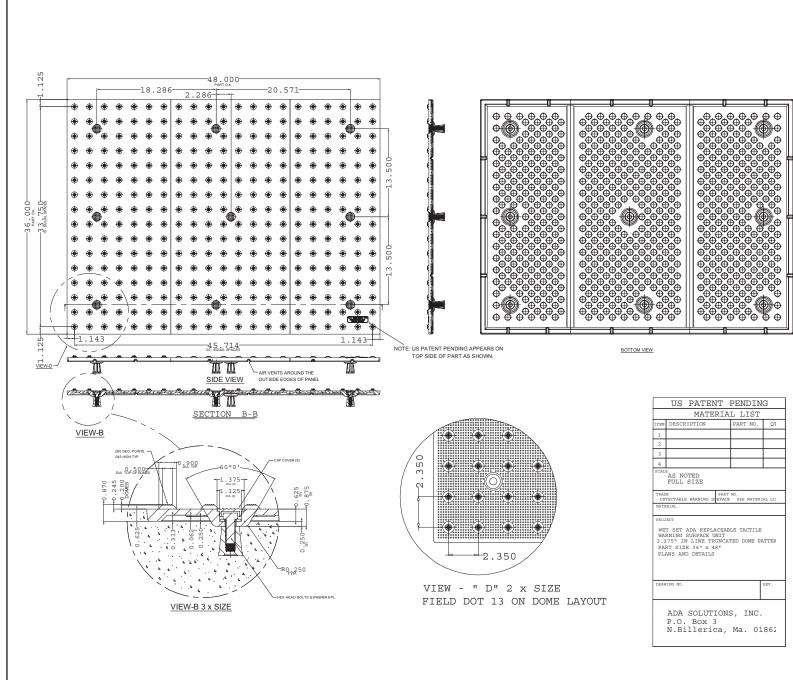
DRAWING NO. RE	EV.

ADA SOLUTIONS, INC. P.O. Box 3 N.Billerica, Ma. 01862

ET-SET) TACT

6"x48"

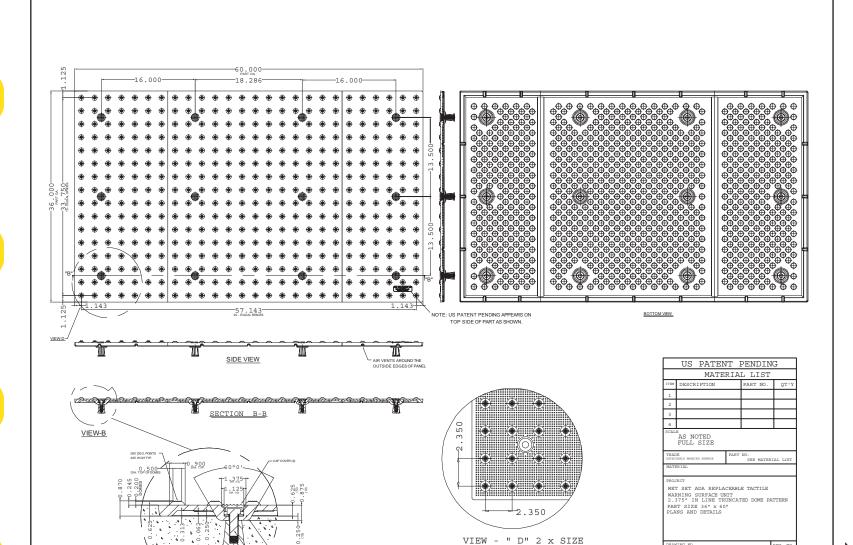
Dome Spacing .35"





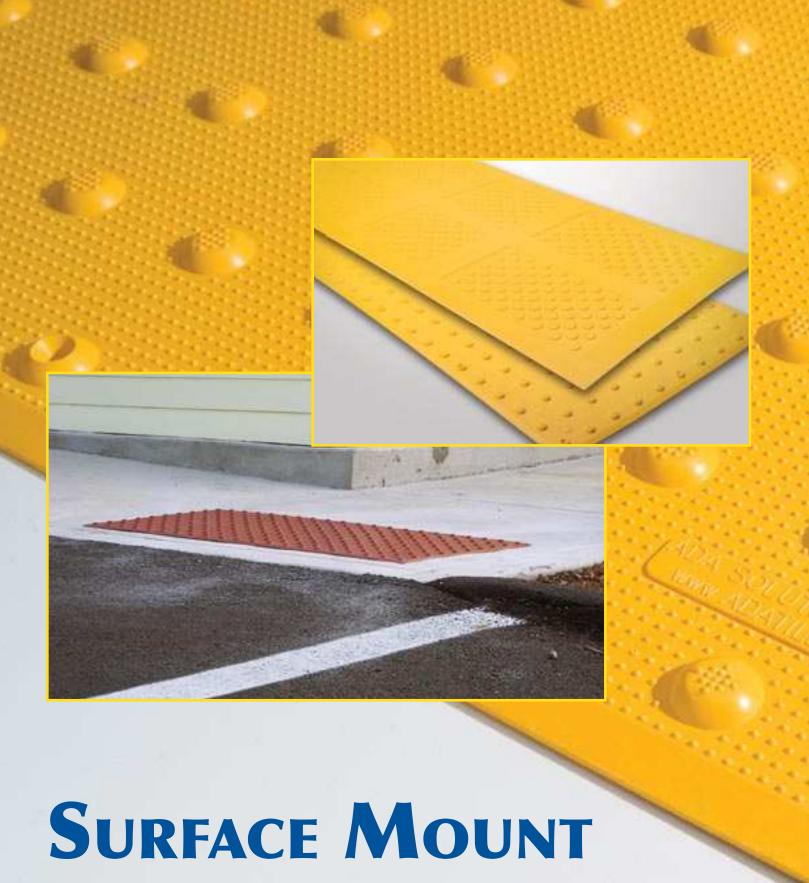
ADA SOLUTIONS, INC. P.O. Box 3

N.Billerica, Ma. 01862



FIELD DOT 13 ON DOME LAYOUT

VIEW-B 3 x SIZE



COMPOSITE TACTILE



Installation Procedure

Be sure to read and understand <u>all</u> of these instructions <u>before</u> you begin.

- A. The installation area should be cleaned of all debris, oil and grease, making sure the area is completely free of moisture. Tactile Panel may be surface mounted on existing pre-cleaned substrate.
- **B** Lay out the Tactile Panel on the substrate as it will appear when installed.
 - If required, the Tactile Panel may be cut using a table saw and marble tipped blade. See web site for more details.
- C. Place a 3/8" bead of adhesive on the frame of the bottom of each Tactile Panel. Adhesive yield: 10SF per 10 ounce cartridge. 18-24SF per 30 ounce cartridge.
- Set the Tactile Panel in the installation area. Make all necessary adjustments prior to fastening.
- Fasteners shall be installed in pre-formed fastener locations. Holes shall be drilled using a hammer drill with 1/4" x 2" min SDS bits. The drilled holes must be a minimum of 2" deep. Place fasteners in hole and hammer into place.
 - If additional fasteners are required, use a 1/2", six point, 82 degree countersink to add a new fastener location. Follow the same drilling method for installing the fastener.
- Caulk around perimeter of entire installation using Sonneborn NP1 or equivalent.
 - All concrete dust present on the Tactile Panel resulting from the drilling process must be cleaned off of the Tactile Panel prior to using any caulking materials.
- **G** Be sure to remove plastic protective covering from the face of the Tactile Panel once the concrete is cured.

*Not recommended or warrantied for asphalt installation.

View additional photos, drawings and specifications on our website: www.adatile.com. Call (800) 372-0519 with any questions.







PRODUCT SIZES 2'x3' 2'x4' 2'x5' 3'x4' 3'x5'

APPLICATION Fresh Pour Concrete Ramps

Inline Dome Pattern

DOME GEOMETRY

In accordance with ADA Regulations for Detectable Warning on Curb Ramps: Raised truncated domes with a diameter of nominal 0.9", a height of nominal 0.2", and a center-to-center spacing of nominal 1.67" minimum and 2.35" maximum.

PANEL DIMENSIONS

Tactile Panels are available in 24"x36", 24"x48", 24"x60", 36"x48" and 36"x60" sizes and measure 3/16" thick. Panels can be custom cut to fit field conditions. All four edges of each panel have a ½" beveled edge. Each panel has 12 to 24 pre-formed fastener locations based upon panel size.



MATERIAL

A homogenous glass and carbon reinforced composite which is colorfast and UV stable. Truncated domes are fiberglass reinforced for enhanced durability. The Tactile panel color is uniform throughout and does not rely on any type of paint coating to achieve color stability. Standard colors include: Federal Yellow, Brick Red, Clay Red, Dark Gray and Black.

PHYSICAL CHARACTERISTICS

Compressive Strength	28,900 psi	ASTM D 695
Flexural Strength	29,300 psi	ASTM D 790
Water Absorption	.07%	ASTM D 570
Slip Resistance	1.18 Dry/1.05 Wet	ASTM C 1028
Flame Spread Index	20	ASTM E 84
Salt Spray	No Change (200 hours)	ASTM B 117
Chemical Stain Testing	No Deterioration	ASTM 1308
Abrasion Resistance	549	ASTM C 501
Accelerated Weathering	Delta E<5.0 (2,000 hours)	ASTM G 155
Tensile Strength	11,600 psi	ASTM D 638
Adhesion to Conc. (20-180 degrees)	No Delamination or Degradation	ASTM C 903
Freeze/Thaw/Heat	No Disintegration	ASTM C 1026

5-Year <u>Wa</u>rranty

INSTALLATION

Surface Applied Tactile Panels shall be mechanically fastened and adhered to the underlying substrate.

INCIDENTALS

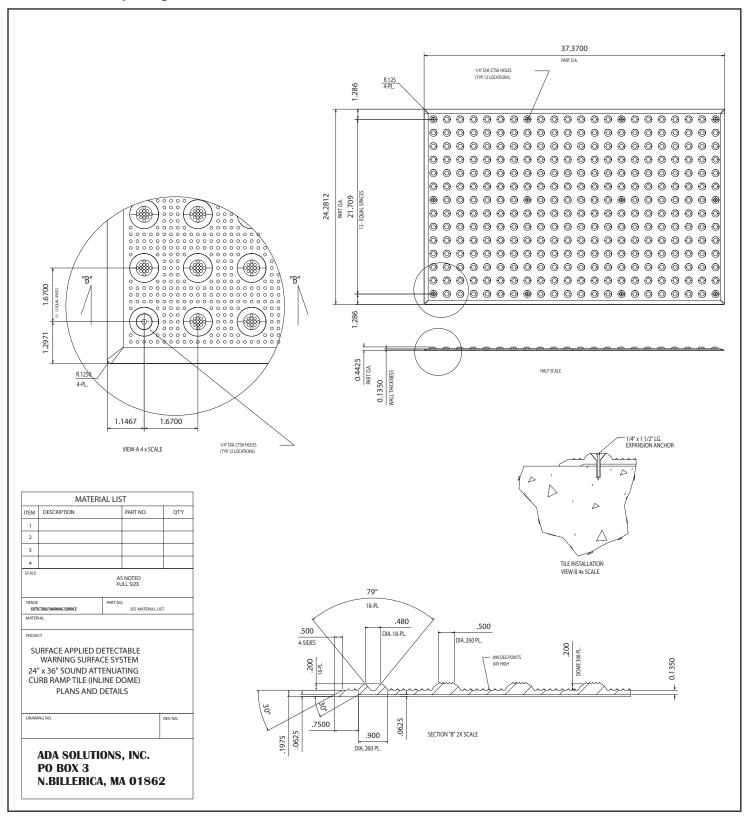
Fasteners: ¼" x 1%", composite sleeve anchor with stainless steel pins. Adhesive: One component structural

urethane adhesive.

Sealant: Sonneborn NP1, Sikaflex 1A, or equivalent.

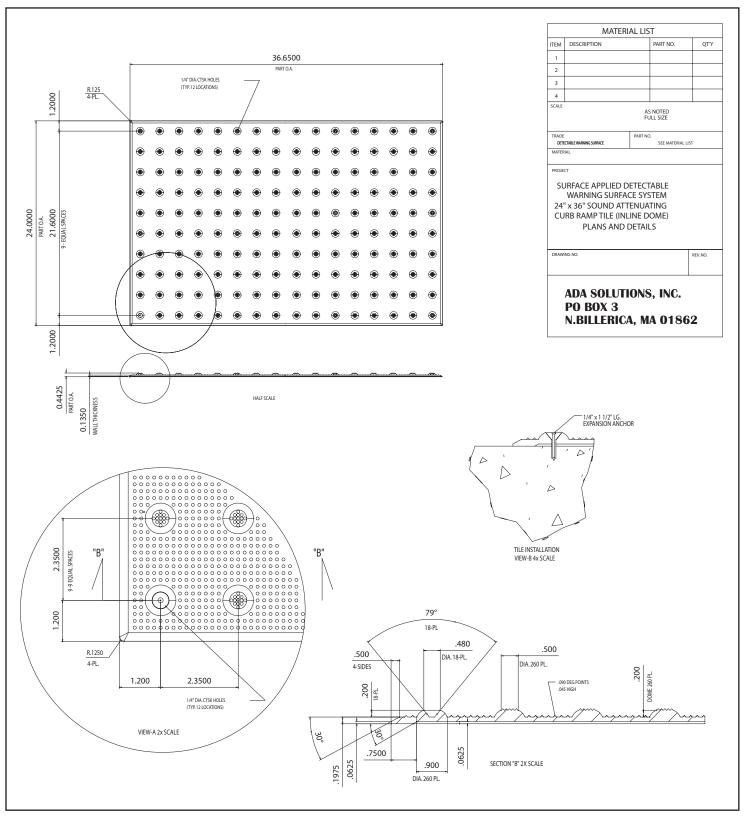


24"x36" Tile

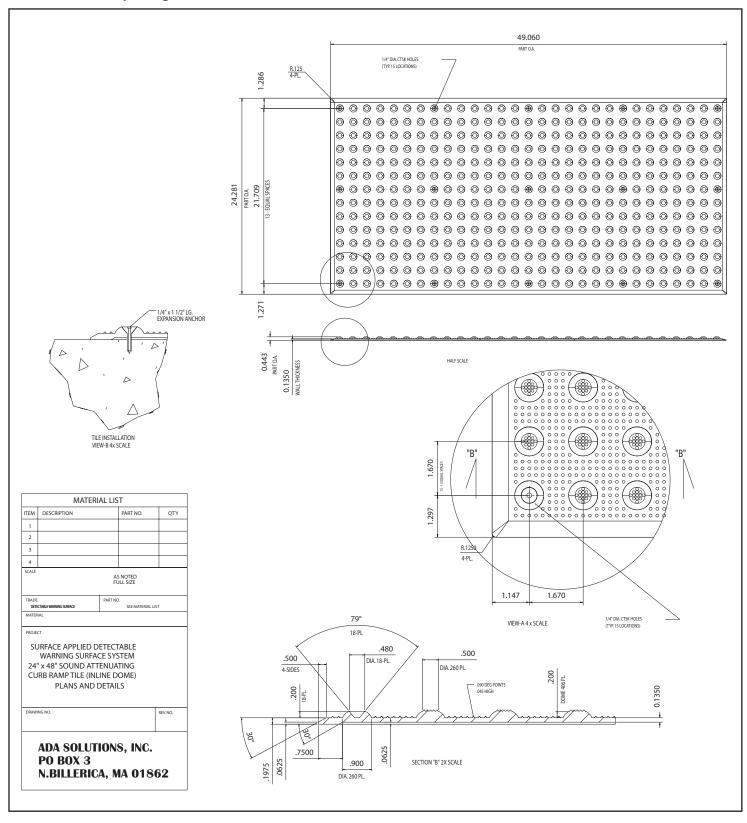


24"x36" Tile

2.35" Dome Spacing

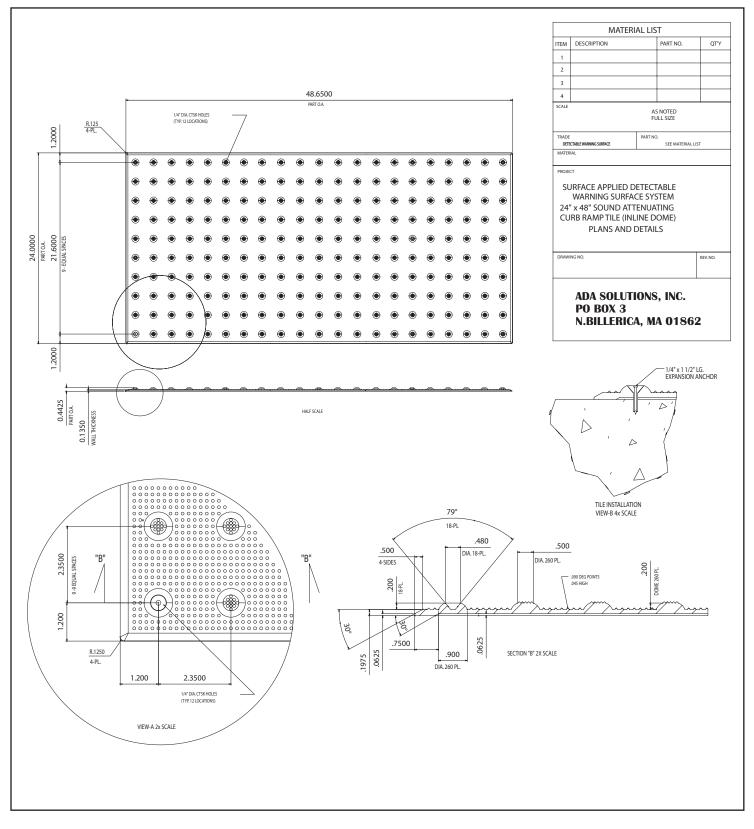


24"x48" Tile

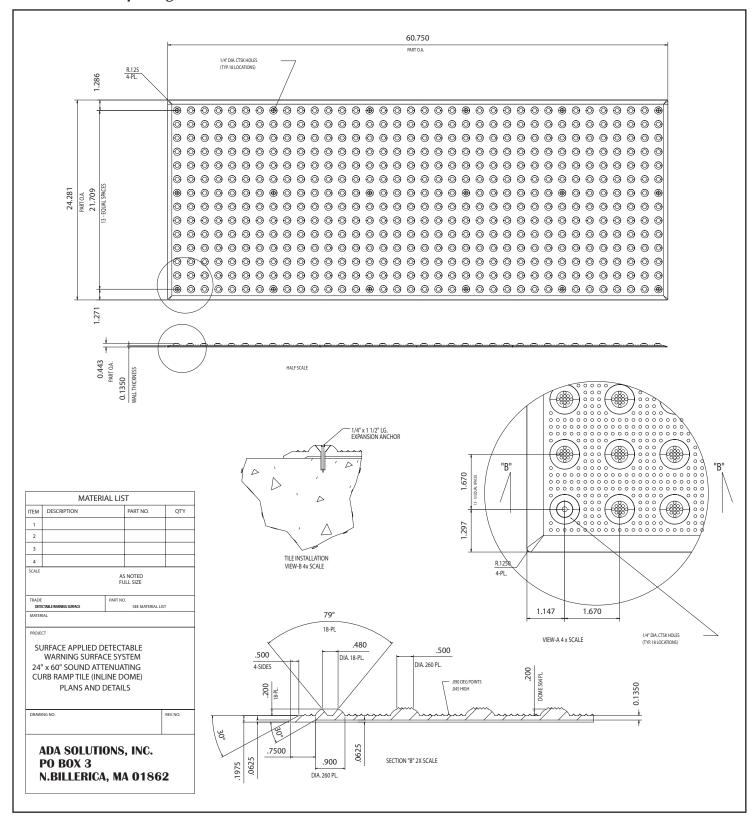


24"x48" Tile

2.35" Dome Spacing

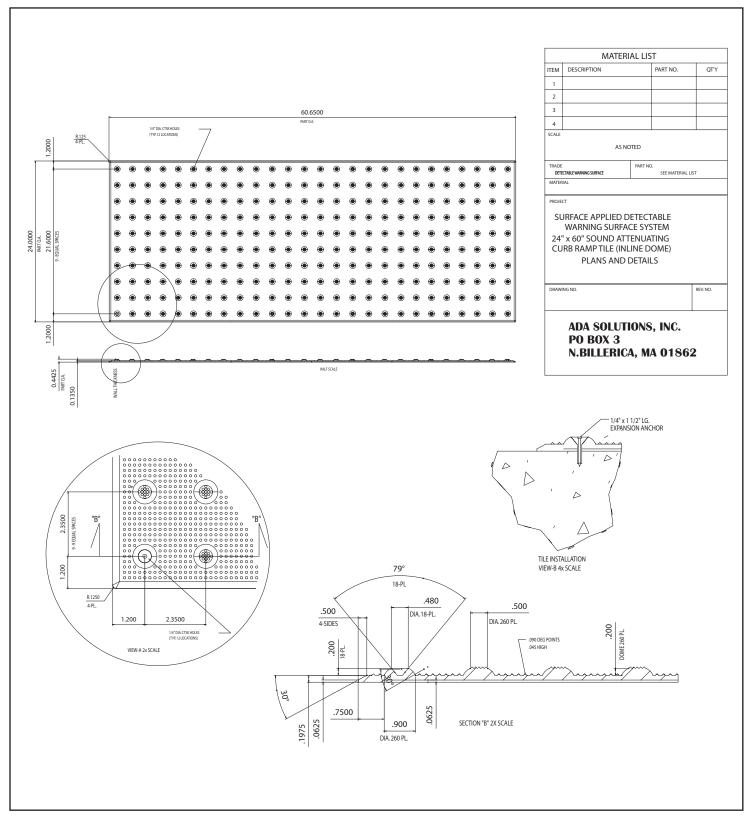


24"x60" Tile

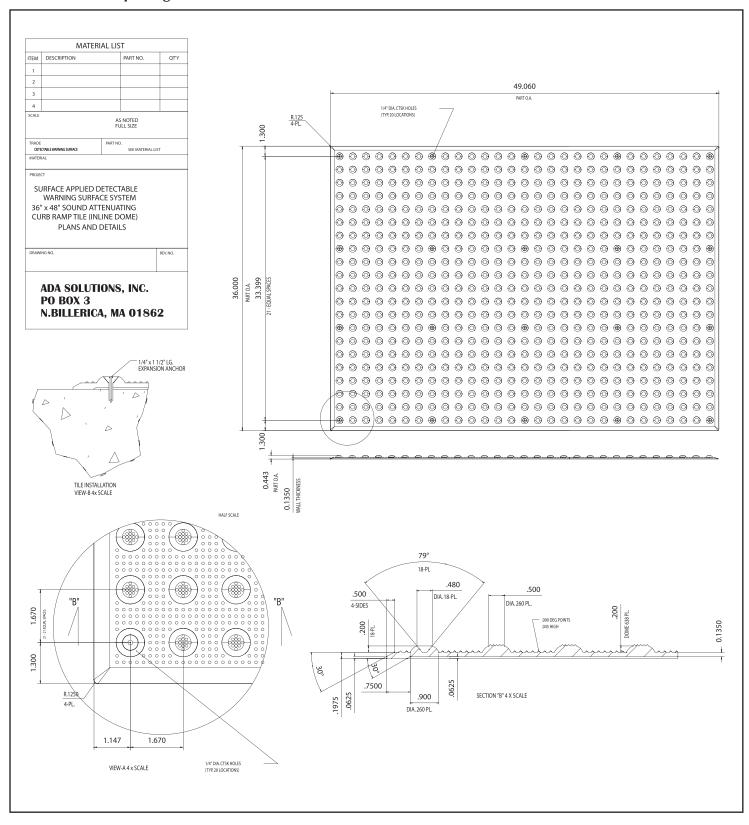


24"x60" Tile

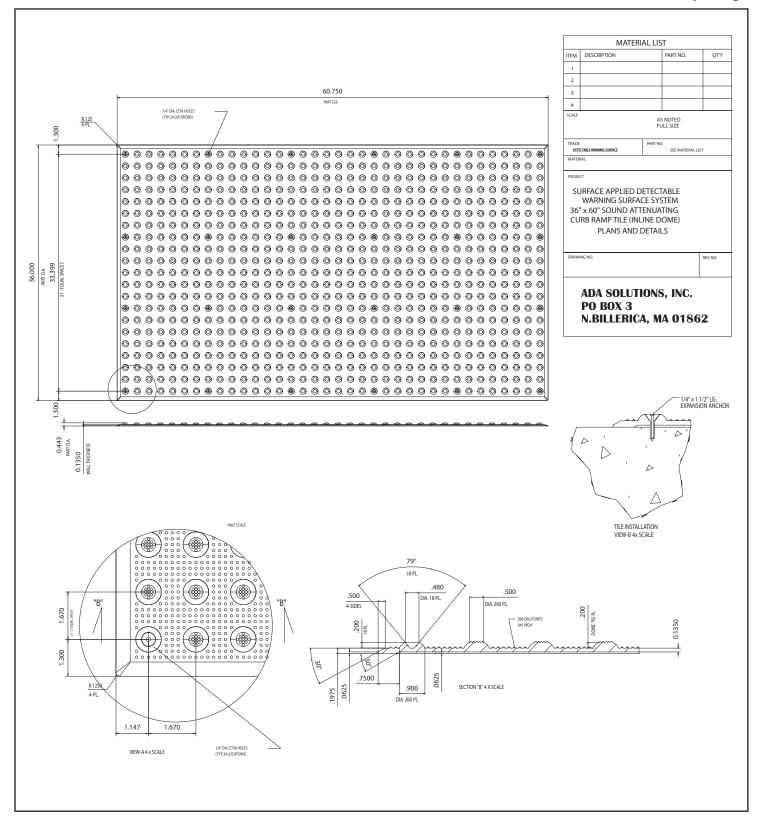
2.35" Dome Spacing

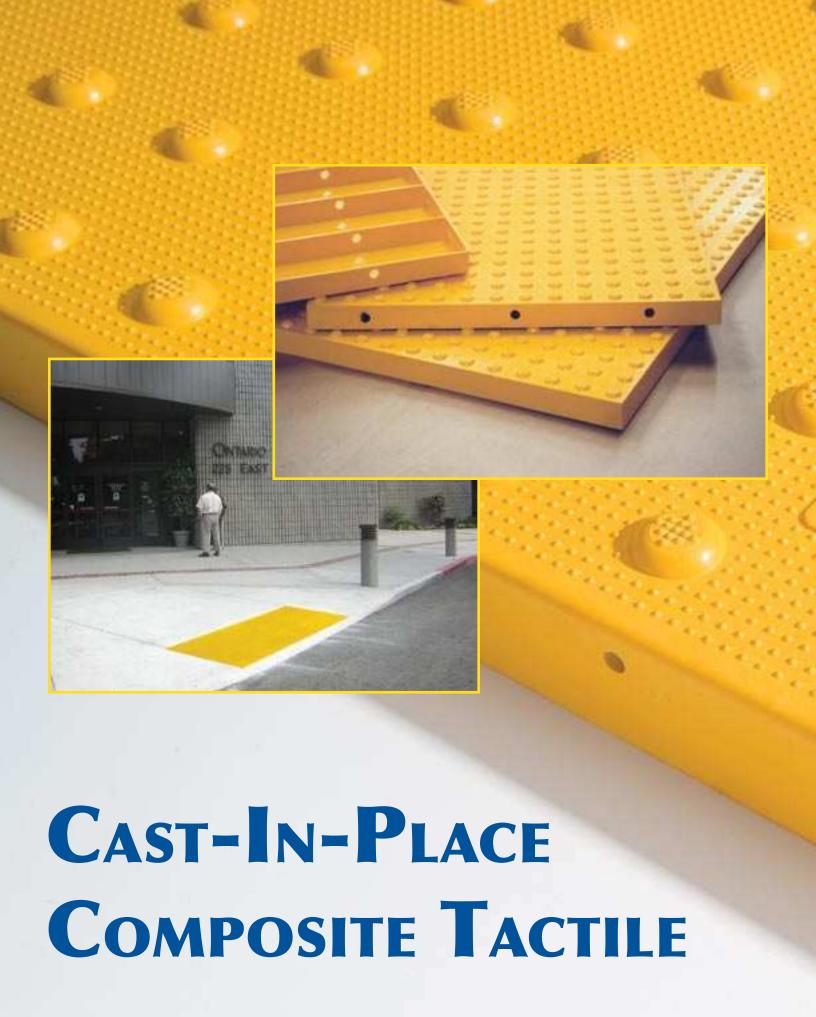


36"x48" Tile



36"x60" Tile







Installation Procedure

Be sure to read and understand <u>all</u> of these instructions <u>before</u> you begin.

- A. The physical characteristics of the concrete shall be as specified in the contract documents while maintaining a slump range of 4-7 to permit the solid placement of the Tactile Unit in the wet cement.
- **B** The concrete shall be poured and finished level, true and smooth to the required dimensions prior to the placement of the Tactile Unit.
- C. Place the Tactile Unit 6-8 inches from the curb line. Working in a grid pattern, tamp the Tactile Unit into the wet concrete using a rubber mallet and a piece of wood. Continue this process until all of the air has been released, and the Tactile Unit surface is flush with the surrounding area. IMPORTANT: Avoid striking the surface of the Tactile Unit directly.
- D• Following the placement, the Tactile Unit elevation should be checked to the adjacent surface with a straight edge. The Tactile Unit elevation should be consistent with the contract drawings and specifications. Any required adjustments must be made prior to the time when the concrete begins to set.
- When you are confident that the Tactile Unit is in place, and no further adjustments are needed, place a cinder block on both ends to hold the Tactile Unit in place while the concrete sets.
- During and after the Tactile Unit installation, as well as the concrete curing stage, no walking or external forces can be placed on the Tactile Unit. The area must be protected from pedestrian traffic until concrete is cured. The Tactile Warning Surface will be ready for pedestrian traffic within 1 2 hours.
- **G** Be sure to remove plastic protective covering from the face of the Tactile Unit once the concrete is cured.

*Not recommended or warrantied for asphalt installation.

View additional photos, drawings and specifications on our website: www.adatile.com. Call (800) 372-0519 with any questions.







APPLICATION Fresh Pour Concrete Ramps

Inline Dome Pattern

DOME GEOMETRY

In accordance with ADA Regulations for Detectable Warning on Curb Ramps: Raised truncated domes with a diameter of nominal 0.9", a height of nominal 0.2", and a center-to-center spacing of 1.67" minimum, and 2.35" maximum.

PANEL DIMENSIONS

Tactile Units are available in 2'x3', 2'x4', 2'x5', 3'x4' and 3'x5' sizes. Tactile Units may also be custom configured to accommodate specific project requirements. Tactile Units measure 0.25" nominal thickness and feature embedment ribs at 3" on center.

MATERIAL

A homogenous glass and carbon reinforced composite which is colorfast and UV stable. Truncated domes are fiberglass reinforced for enhanced durability. The color of the Tactile Unit is uniform throughout and does not rely on any type of paint coating

to achieve color stability. Standard colors include: Federal Yellow, Brick Red, Clay Red, Dark Gray and Black.

INSTALLATION

Tactile Units are to be used on new curb ramp locations. The Tactile Units can be pre-filled with concrete and set in place or pressed into place in the freshly poured concrete.



PHYSICAL CHARACTERISTICS

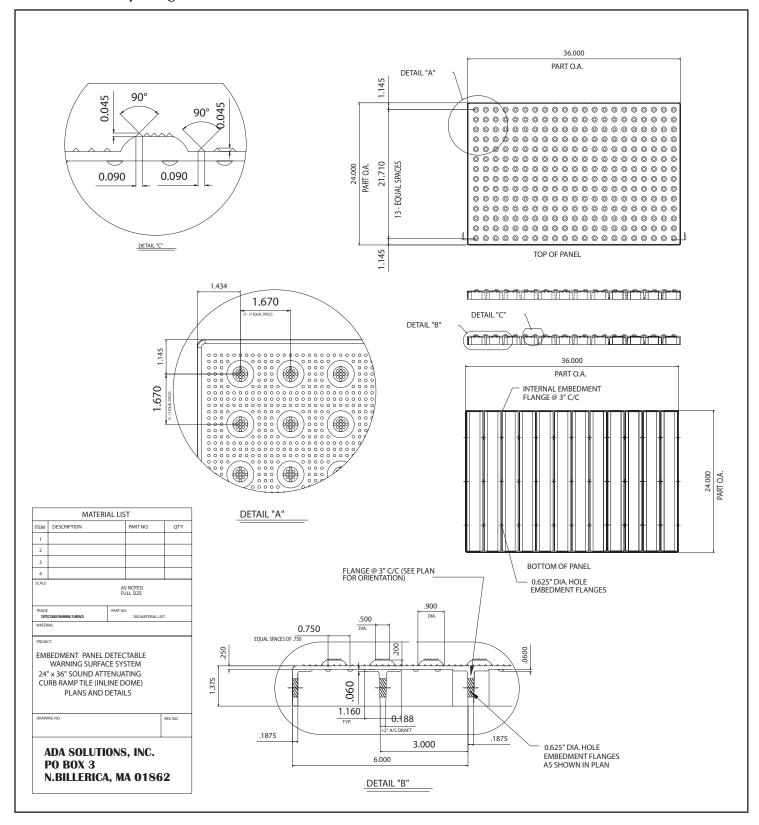
Compressive Strength	28,900 psi	ASTM D 695
Flexural Strength	29,300 psi	ASTM D 790
Water Absorption	.07%	ASTM D 570
Slip Resistance	1.18 Dry, 1.05 Wet	ASTM C 1028
Flame Spread Index	20	ASTM E 84
Salt Spray	No Change (200 hours)	ASTM B 117
Chemical Stain Testing	No Deterioration	ASTM 1308
Abrasion Resistance	549	ASTM C 501
Accelerated Weathering	Delta E<5.0 (2,000 hours)	ASTM G 155
Tensile Strength	11,600 psi	ASTM D 638
Load Bearing at 16,000 lbs.	No Damage	AASHTO-H20
Freeze/Thaw/Heat	No Disintegration	ASTM C 1026



5-Year Warranty

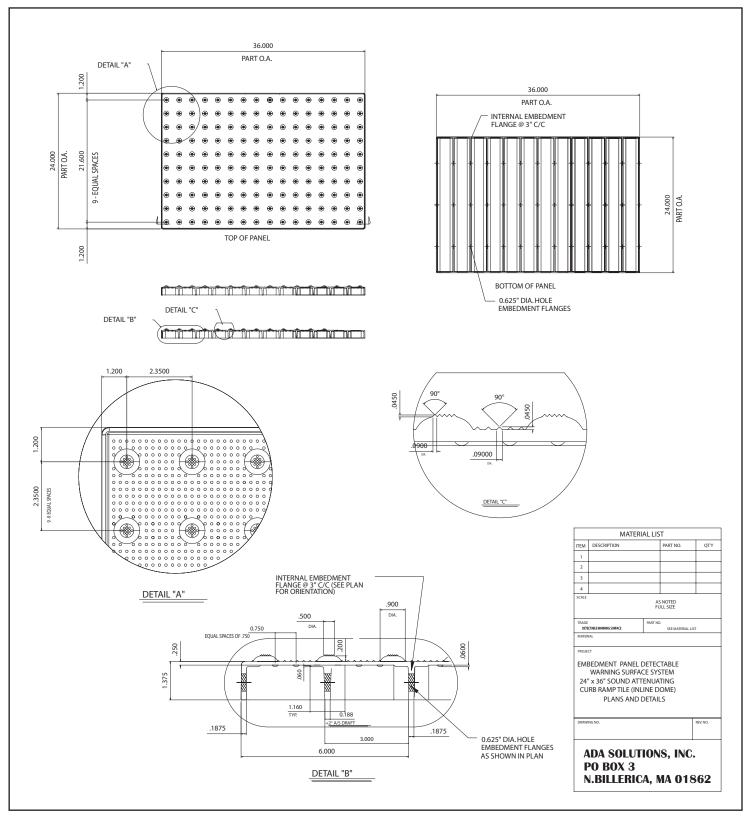


24"x36" Tile

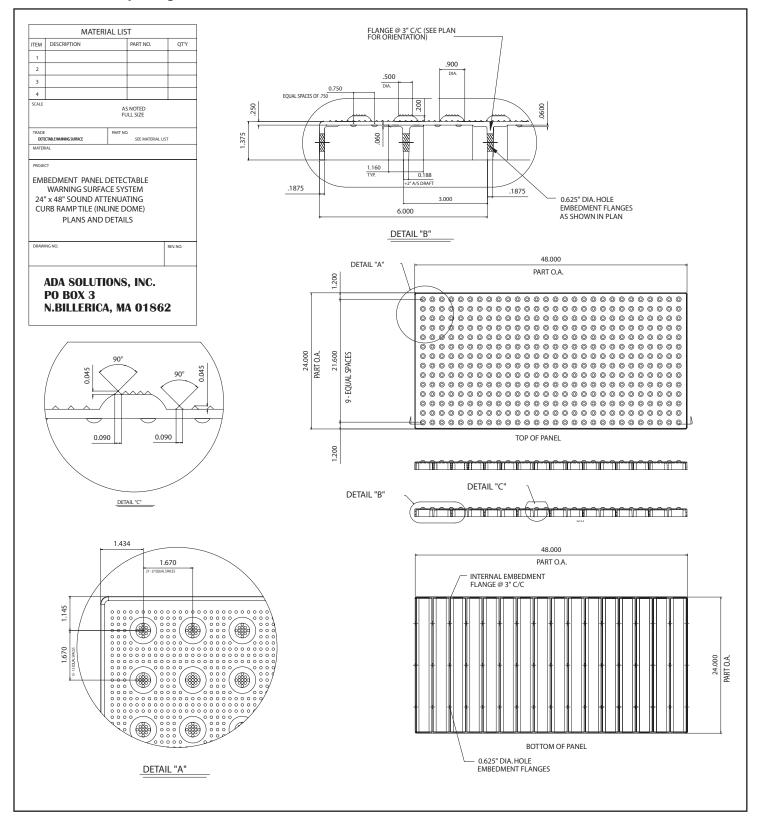


24"x36" Tile

2.35" Dome Spacing

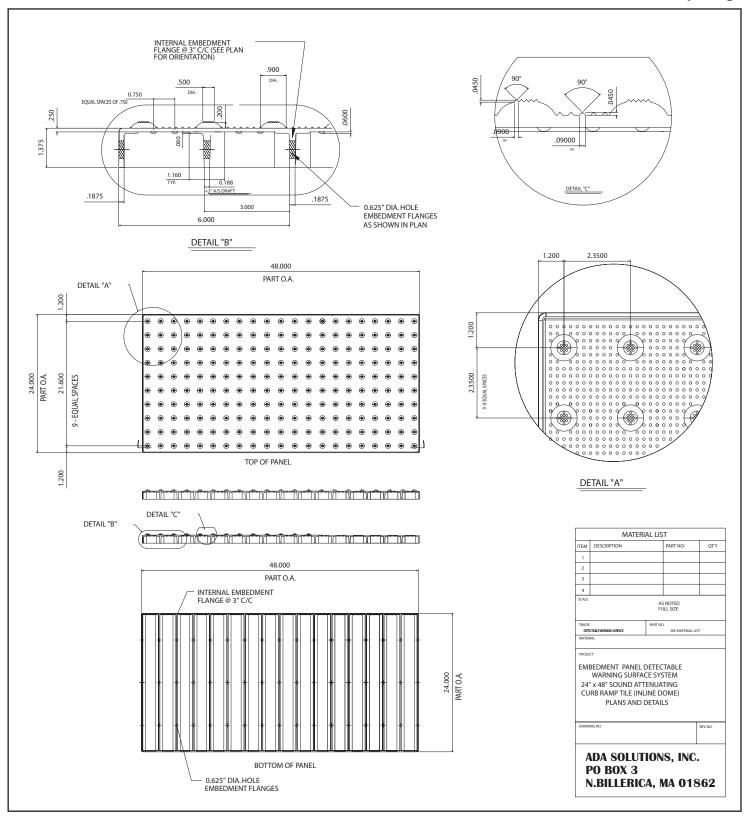


24"x48"

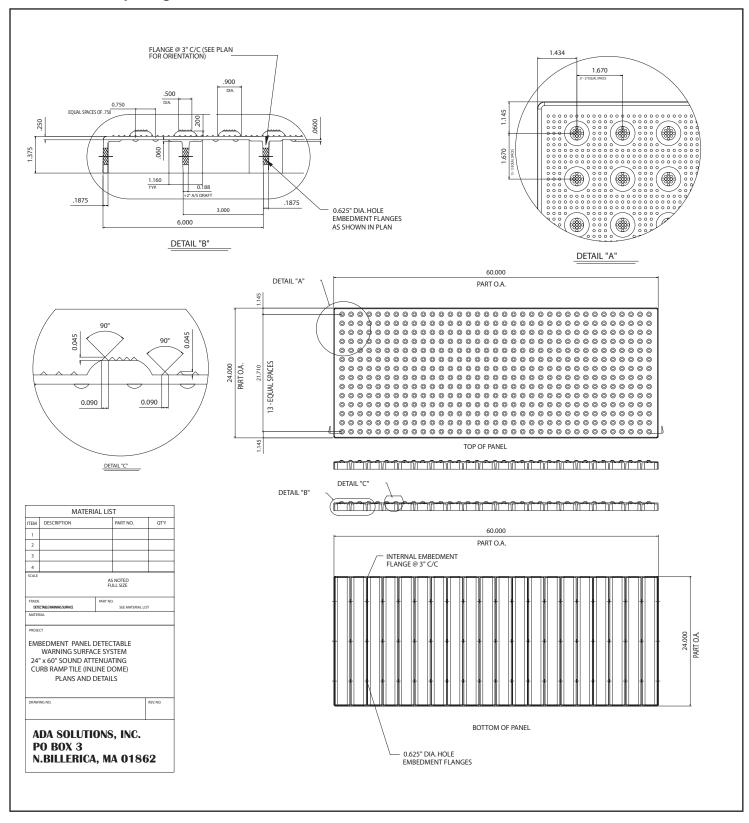


24"x48" Tile

2.35" Dome Spacing



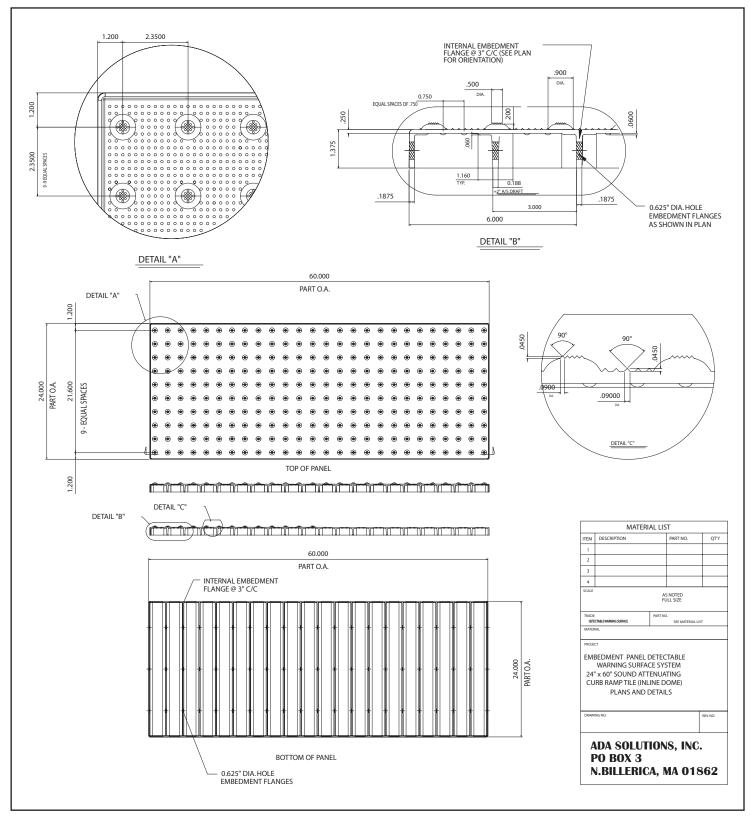
24"x60" Tile



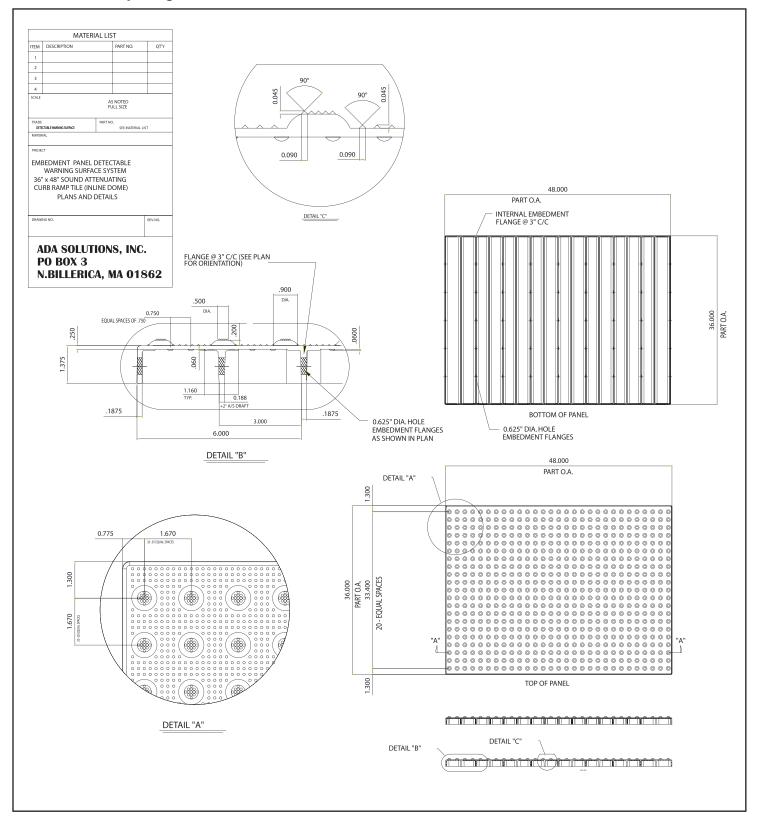
Cast-In-Place Composite Tactile

24"x60" Tile

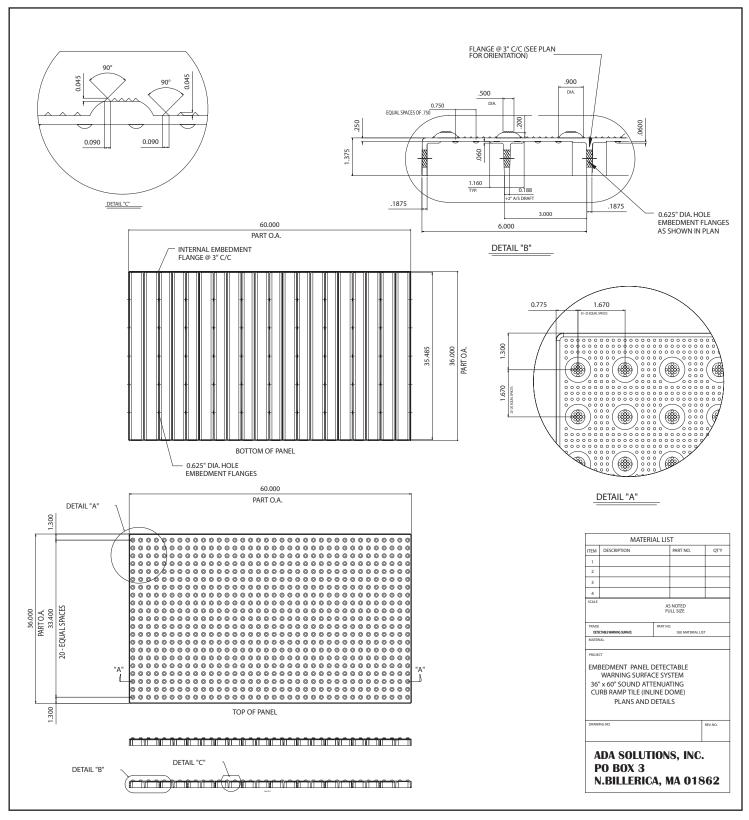
2.35" Dome Spacing



36"x48" Tile



36"x60" Tile



ABOUT THE LAW O O O O O

Summary

To view the entire report published by the Access Board go to http://www.access-board.gov/rowdraft.htm

REVISED DRAFT GUIDELINES:

Accessible Public Rights-Of-Way (11/23/05)

R304 Detectable Warning Surfaces

R304.1 General. Detectable warnings shall consist of a surface of truncated domes aligned in a square or radial grid pattern and shall comply with R304.

R304.1.1 Dome Size. Truncated domes in a detectable warning surface shall have a base diameter of 23 mm (0.9 in) minimum to 36 mm (1.4 in) maximum, a top diameter of 50 percent of the base diameter minimum to 65 precent of the base diameter maximum, and a height of 5 mm (0.2 in).

R304.1.2 Dome Spacing. Truncated domes in a detectable warning surface shall have a center-to-center spacing of 41 mm (1.6 in) minimum and 61 mm (2.4 in) maximum, and a base-to-base spacing of 17 mm (.65 in) minimum, measured between the most adjacent domes.

R304.1.3 Contrast. Detectable warning surfaces shall contrast visually with adjacent gutter, street or highway, or walkway surface, either light-on-dark, or dark-on-light.

R304.1.4 Size. Detectable warning surfaces shall extend 610 mm (24 in) minimum in the direction of travel and the full width of the curb ramp (exclusive of flares), the landing, or the blended transition.

R304.2 Location and Alignment

R304.2.1 Perpendicular Curb Ramps. Where both ends of the bottom grade break complying with R303.3.4 are 1.5 m (5.0 ft) or less from the back of the curb, the detectable warning shall be located on the ramp surface at the bottom grade break. Where either end of the bottom grade break is more than 1.5 m (5.0 ft) from the back of the curb, the detectable warning shall be located on the lower landing.

R304.2.2 Landings and Blended Transitions. The detectable warning shall be located on the landing or blended transition at the back of the curb.

R304.2.3 Alignment. The rows of truncated domes in a detectable warning surface shall be aligned to be perpendicular or radial to the grade break between the ramp, landing, or blended transition and the street.



THE ONLY COMPLETE DETECTABLE WARNING AND WAYFINDING SOLUTION FOR THE VISUALLY IMPAIRED





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- SURFACE MOUNT (RETROFIT)
- CAST IN PLACE (WET-SET)
- ADAAG COMPLIANT
- AVAILABLE STANDARD SIZES
 2'x3' 2'x4' 2'x5' 3'x4' 3'x5'
- UNIFORM COLOR THROUGHOUT