

FUSION BOARD DIVING STAND & JUMP PLATFORM

68-210-1302 (White)

68-210-13023 (Sandstone)

68-210-13024 (Gray Granite)



ALL MINIMUM WATER ENVELOPE DIMENSIONS FOR RESIDENTIAL INGROUND SWIMMING POOLS MUST MEET THE ANSI/NSPI-5 2003 AMERICAN NATIONAL STANDARD FOR RESIDENTIAL INGROUND SWIMMING POOLS (REFERENCED THROUGHOUT THESE ASSEMBLY AND INSTALLATION INSTRUCTIONS AS "ANSI/NSPI-5 2003"). COMPLY WITH LOCAL GOVERNMENT REGULATIONS IF THEY EXCEED ANSI/NSPI STANDARDS.

All diving boards and related equipment are manufactured for inground swimming pools ONLY. The S.R. Smith Fusion Stands are designed to be easily transported and installed. Follow all instructions carefully and inspect closely to assure proper and safe installation.

PROPER INSTALLATION CANNOT BE OVERSTATED. IMPROPER INSTALLATION VOIDS S.R. SMITH'S WARRANTY AND MAY AFFECT THE SAFETY OF THE USER.

ASSEMBLY AND INSTALLATION INSTRUCTIONS – PLEASE READ CAREFULLY –



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EASTERN MANUFACTURING PLANT

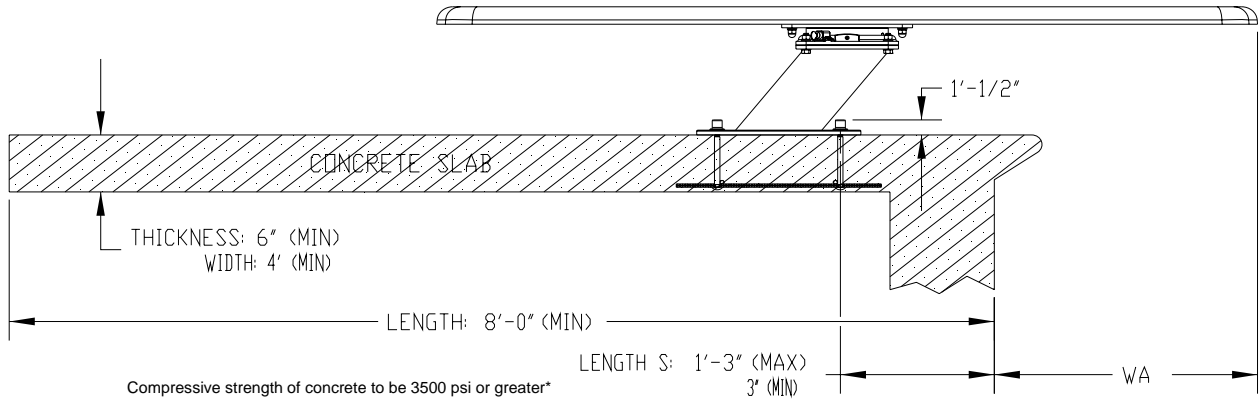
105 Challenger Drive
Portland, Tennessee 37148
Phone (615) 325-0770 • Fax (615) 325-0775



www.srsmith.com

ATTENTION!
THESE INSTRUCTIONS MUST REMAIN WITH STAND OWNER

FUSION BOARD DIVING STAND Complete For 6' Fusion Diving Boards



Compressive strength of concrete to be 3500 psi or greater*

FIG. 1

* S.R. SMITH CANNOT GUARANTEE CUSTOMER'S CONCRETE STRENGTH OR THICKNESS

ITEM NO.	PART NUMBER	DESCRIPTION	Diving stand/QT.Y.
1	60601F	FINISHED SWIVEL BRONZE CAST BASE	1
2	60602F	FINISHD SWIVEL BRZE CAST INSIDE CYL	1
3	60559	FUSION MNTING PLTE(12.75X12.75X.375)	1
4	60605	SWIVEL LCK MECNISM (BRASS LCK)	1
5	2308100	1/2" S.A.E. FLATWASHER S/S	16
6	60603	DELIRIN 1/16" X 10" X 10" SWIVEL	1
8	5-169	1/2" X 1 3/4" HH BOLT S/S	4
9	60604	DELIRIN 1/16" X 8" DIA CIRCLE SWIVEL	1
10	5-139-2	1/2 -13 X 1-3/4" FLAT SDC S/S	4
11	05-14-116	1/2" HEX NUT S/S	12
12	05-14-115	1/2" LOCK WASHER S/S	16
15	66-209-622	FUSION BOARD WHITE	1
16	5-139-3	1/2-13 X 3" FLAT SDC S/S	4
17	5-139-4	3/8-16 x 3/4" BRASS_CUP_PT_ SET SCRW	1
18	5-139-6	ACORN NUT 1/2"-13 S/S	4
19	5-139-5	#8/32 1/2" BRASS FILSTR SLOT M/C SCRW	2
20	69-209-006	606/608 JIG (ONLY) 12" X 12"	1
21	05-616	1/2" X 1-1/2" RD NYLON WASHER	4
22	05-14-132	1/2" X 1-3/8 FLT WSH S/S	4
23	05-618	1/2" NUT CAP WHT PLASTIC	4

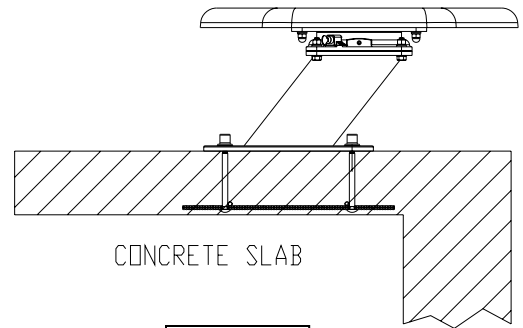


FIG. 3

TIGHTENING SCHEDULE

1. SECURE STAND TO JIG WITH:
ANCHOR HEX NUTS AT
40-50 FT-LBS.
2. SECURE SWIVEL TO STAND WITH:
MOUNTING HEX NUTS AT
40-50 FT-LBS
3. SECURE BOARD TO SWIVEL WITH:
MOUNTING HEX NUTS AT 20-25 FT-LBS.

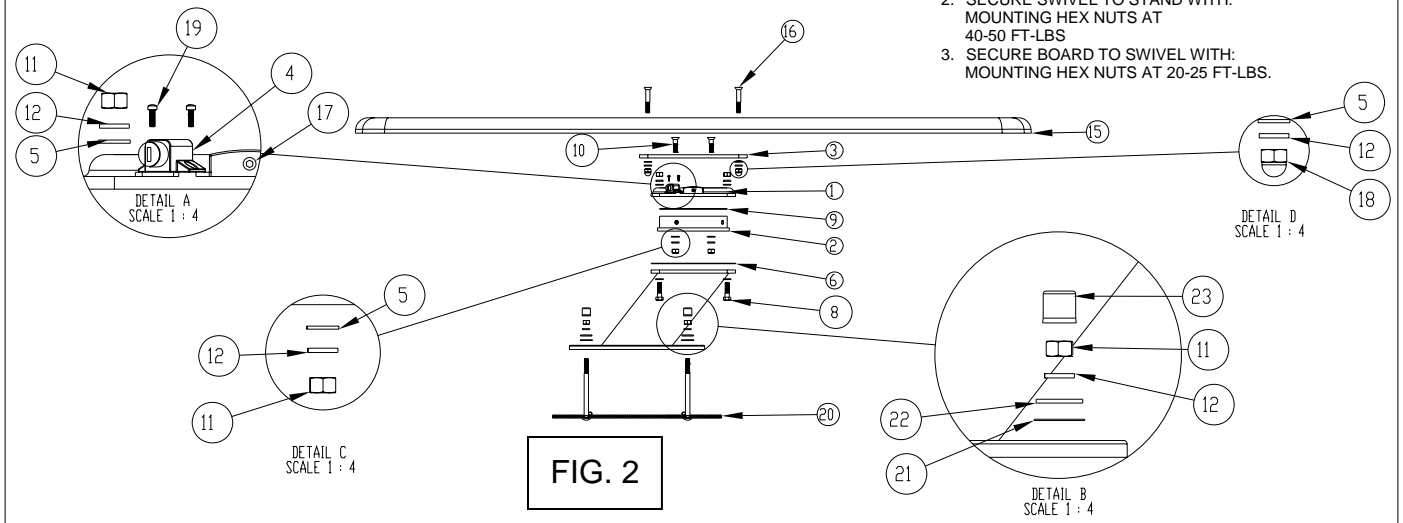


FIG. 2

FUSION DIVING STAND INSTALLATION CHART

Refer to Fig. 1

Model	Diving Board Length	ANSI/NSPI-5 2003 Pool Type	Distance For Setting Front Bolt of Jig From Water's Edge "S"	Min. Overhang $\pm 1/2$ " "WA*"	Max. Height of Board Above Water "HOW"
Hip Hop Board	6'	I	15"	18"	20"
	6'	II	15"	18"	20"

INSTALLATION INSTRUCTIONS

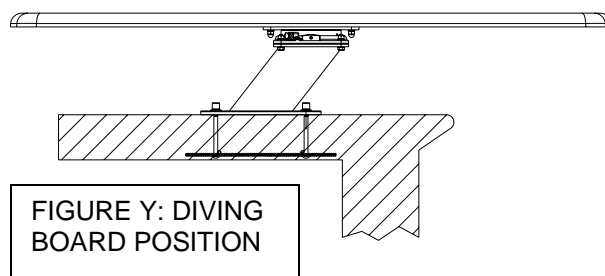
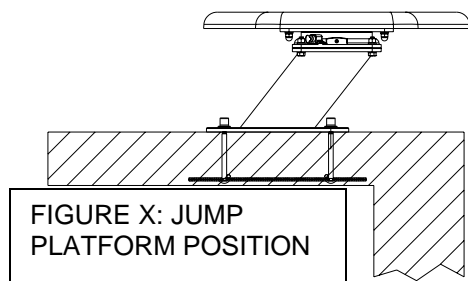
BE SURE CONCRETE DECK SURROUNDING ANCHOR JIG COMPLIES WITH MINIMUM DIMENSIONS IN FIGURE 1.

1. READ CAREFULLY the following, and pages A through E, which have been extracted from ANSI/NSPI-5 2003, and pay particular attention to Figure 3 and Table 1 set forth therein.
2. The 606/608 four-bolt jig should be set in accordance with the INSTALLATION CHART above and Figure 1, with the two "RED" capped bolts closest to the pool. This will give the desired minimum overhang. Board must be placed at deep end of pool on centerline. Figure 3 shows the board in jump platform position, with the long side of the board parallel to the pool wall. When the board is in jump platform position, the edge of the board should line up with the edge of the pool or overhang slightly.

CAUTION: Before pouring concrete around Jig, check the bolt pattern of Jig to Fig. 2. It is possible that they have become misaligned through shipping and handling.

3. Make sure bolts project out of concrete 1-1/2" with ample concrete depth below Jig. Refer to Fig. 1 for minimum deck thickness, width and length.
4. When finishing deck surface, maintain level deck where jig bolts project out so that the stand makes uniform contact with deck surface.
5. Before mounting stand, chisel away any excess concrete that may have built up around jig bolts and remove the red and yellow bolt caps
6. Place stand over jig bolts and secure according to Fig. 2. Tighten ANCHOR hex nuts. Use TIGHTENING SCHEDULE in Fig. 2 when tightening all MOUNTING and ANCHOR hex nuts.
7. Bolt the swivel to the stand base according to Fig. 2.
8. Place top plate on swivel and secure according to Fig. 2. Tighten MOUNTING hex nuts.
9. With FUSION SWIVEL STAND properly secured, install diving board to top plate according to Figure 2 and tighten MOUNTING hex nuts.

WARNING: The Fusion Board is to be used for feet first entry only when in jump platform position (FIGURE X). Figure X shows the board in jump platform position with the long side of the board parallel to the pool wall. Head first diving is only allowed when the board is in the diving board position (Figure Y).



CAUTION: Swivel should only be operated by a responsible adult; the locking key should be kept away from children.

ONLY ONE PERSON ON A DIVING BOARD AT A TIME. MAXIMUM WEIGHT 250 LBS.

10. **IMPORTANT:** Refer to Table 2. Maximum diving board length, maximum height over water at point A and minimum cross section dimensions at point A and B shall be in accordance with Table 2 and Fig 4.

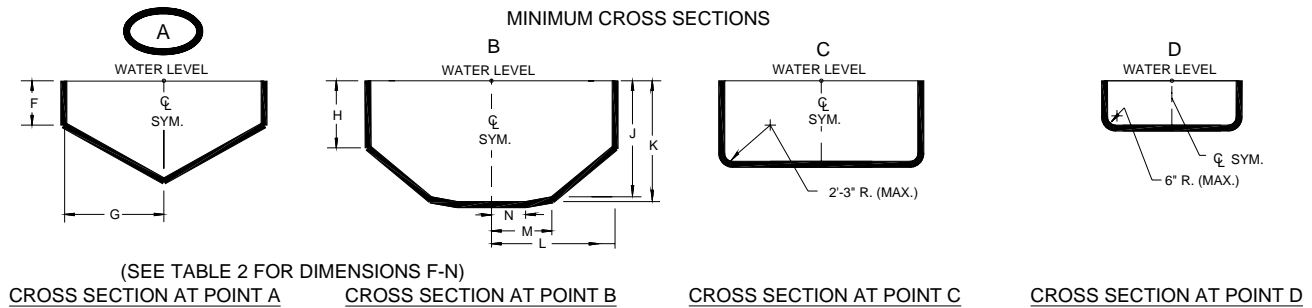
Table 2- S.R. Smith Residential Pool Specifications

Pool type	MAX. DIVING BOARD LENGTH	MAX. HEIGHT OVER WATER AT POINT A	CROSS SECTIONAL DIMENSIONS AT POINT A		CROSS SECTIONAL DIMENSIONS AT POINT B					
	DBL**	HOW**	F	G	H	J	K	L	M	N
0	DIVING EQUIPMENT IS PROHIBITED									
I	6' DB/6' JB	20"	2'-9"	5'-0"	4'-0"	7'-2 1/2"	7'-6"	6'-0"	3'-9"	2'-1 1/2"
II	8' DB/8' JB	20"	2'-9"	3'-10"	4'-2"	7'-2 1/2"	7'-6"	6'-8"	3'-9"	2'-1 1/2"
III	10' DB/8' JB	26"	2'-9"	4'-4 3/4"	4'-4 1/2"	7'-5 1/2"	8'-0"	6'-7"	3'-11 1/2"	1'-7 1/2"
IV	10' DB/8' JB	30"	2'-9"	5'-10 1/2"	3'-10"	7'-8"	8'-6"	8'-3"	5'-7"	2'-7"
V	12' DB/8' JB	40"	2'-9"	6'-2"	3'-11 1/2"	7'-9 1/2"	9'-0"	8'-2 1/2"	5'-9"	2'-1"

NOTES:

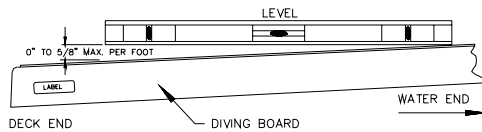
- **1. ABBREVIATIONS: DBL=Diving Board Length, DB=Diving Board, JB=Jump Board, HOW=Height Over Water.
- 2. **IMPORTANT:** The walls of a Type I Pool, when defining the Maximum Diving Water Envelope shall be plumb.
- 3. All dimensions are minimum, except where noted as maximum.
- 4. One half (1/2) the width shown at each point shall be available on each side of the diving equipment centerline.
- 5. Minimum water depth under tip of diving board (Point A) is important to maintain.

FIG.4



11. The top surface of the diving board from the deck end to the tip end shall be level or have an upward slope of 5/8" per foot (16 mm : 305mm) maximum. Elevation difference shall not exceed 6 inches (152mm) from the deck end to the tip of the board. There shall be no downward slope towards the water. The slope shall be measured using a level as shown in Fig. 5.

FIG.5



12. Minimum unobstructed headroom from the top of the manufactured diving equipment shall be provided for diving in accordance with Table 1.

TABLE 1 MINIMUM HEADROOM ABOVE DIVING AREA	
Pool Type	Minimum Headroom Above Diving Surface
I	12 feet (3.7 m)
II	12 feet (3.7 m)
III	13 feet (4 m)
IV	13 feet (4 m)
V	14 feet (4.3 m)

INTENDED USE INSTRUCTIONS

*** * IMPORTANT * ***

READ AND FOLLOW THE SIMPLE SAFETY RULES BELOW.

**MAKE SURE THAT EVERYONE WHO USES THE FUSION
KNOWS AND FOLLOWS THESE RULES.**

ENFORCE THESE RULES WITH ADULT SUPERVISION

Installed and used properly, the Fusion will give your family and guests many hours of enjoyment. Like any other piece of equipment however, the Fusion can be misused in such a way as to cause the user injury, up to and including crippling injury. As the owner of a Fusion it is your responsibility to do the following:

1. Ensure that only one person is allowed on the Fusion at any given time.
2. Roughhousing or horseplay on the Fusion is strictly forbidden.
3. Familiarize yourself with the shape of the pool bottom and the water depth before you dive.
4. Use the correct configuration for Diving
5. When the Fusion is parallel to the pool (figure X), it is a feet first, jump platform only.
6. Avoid diving until all submerged obstacles, surface objects or other swimmers are clear of the diver's pathway.
7. Don't dive unless the board is in the diving position (Figure Y).
8. Don't drink alcoholic beverages and dive.
9. Don't dive alone; use the buddy system.
10. Take your time in preparing to dive. Move forward slowly and get yourself positioned properly before starting the jump/dive.
11. Do not use the Fusion if any part of it becomes damaged, weakened, or broken. Don't take chances. Have the Fusion inspected and, if necessary, repaired by a competent professional, who is familiar with diving products before using the Fusion again.
12. Individuals who exhibit frailty due to age should not use the Fusion.
13. People who weigh over 250 pounds should not use the Fusion.
14. Women who are pregnant should not use the Fusion.

DAILY/WEEKLY MAINTENANCE OF THE FUSION

1. Be sure that all connections are secure. Tighten hardware if necessary.
2. Check and see that all nuts and bolts are tight and secure.
3. Inspect the Fusion lock; ensure it is still properly functioning. It should prevent the board from completely rotating, but not eliminate all movement.
4. Ensure the set screw is still tight to the Fusion.

CLEANING INSTRUCTIONS

1. **Hosing down the Fusion for cleaning is a good way to clear it of dust and debris. It will also remove harsh chemical deposits from lingering on the surface.**
2. **Light oil, such as WD40 will be good to spray at the interface, between the moving parts of the Fusion. This will help protect them as well as improve function.**
3. **A drying wipe down, after cleaning and general use, is always good to remove corrosive chemicals off the surface of the Fusion.**

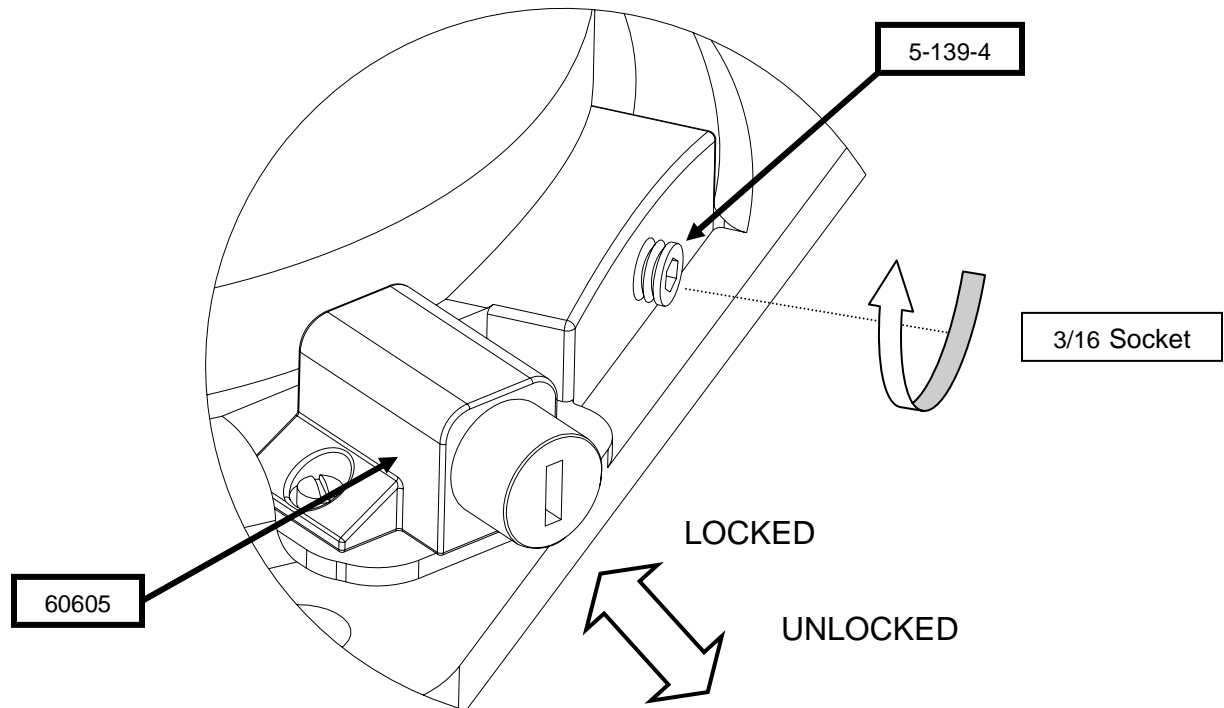
AVOID HARSH CHEMICALS AND DISINFECTANTS. DO NOT USE:

Dow with Scrubbing Bubbles®
Windex® With Vinegar

Lysol® Disinfectant
White Cap®

Ajax® Cleanser
Ajax® Liquid

Locking Your Swivel Properly



To Lock:

1. **Make sure the set screw is NOT tightened, it should rotate counterclockwise freely (5-139-4) and lock (60605) is in the unlocked position [lock pin out].**
2. Rotate board gently into desired position.
3. With your thumb, press the lock pin (in).
You should hear a "Click" sound.
- *Troubleshoot a bad lock:*
 - If at first it doesn't lock completely, try gently wiggling the board to find the center.
 - You can also check and make sure nothing is holding the board down or up.
 - Turn slightly and make sure nothing is interfering with the lock pin.
4. After locking the board; Tighten set screw securely against the inside cylinder.
(The set screw should not completely disappear.)

Please Note: Forcing board rotation via kicking, jerking, etc. will result in damage to the board rotation mechanism.

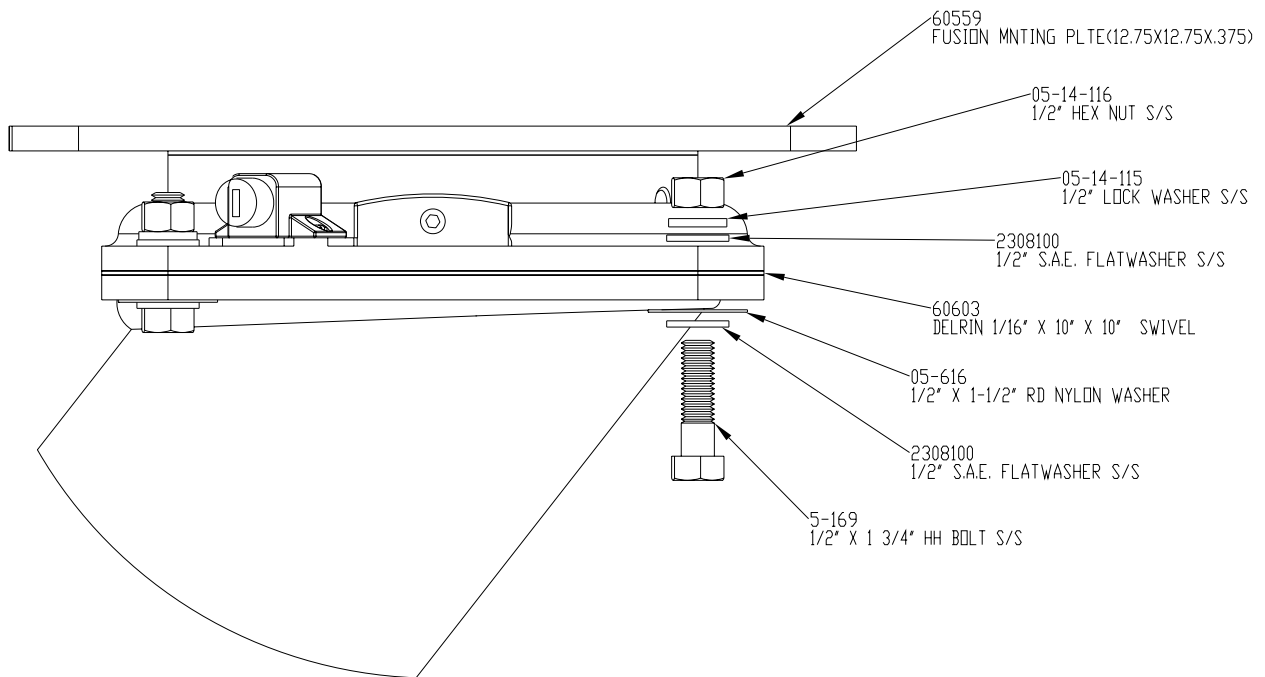
To Unlock:

1. **Be sure to loosen the set screw (5-139-4) first!**
2. With the set screw loose, unlock using the key.
 - Some kinks might prevent the key from popping out.
 - Wiggle the board gently to free up the lock pin.
 - Try pulling lightly on the key while it is turned in the lock.

CHANGING YOUR LOCK

Step 1. Remove the Fusion board from the stand.

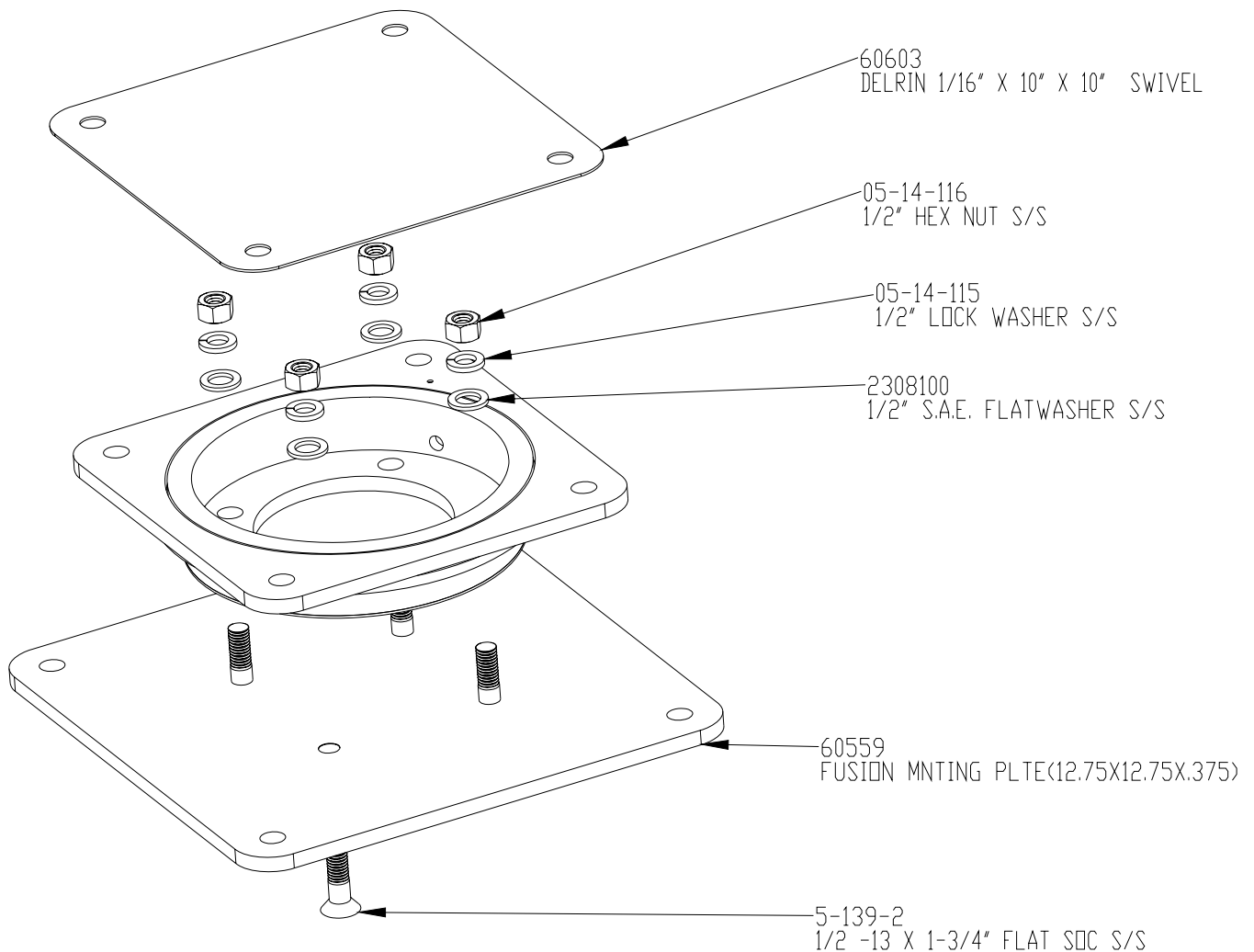
1. Remove the Fusion Board from the mounting plate (60559) using a 5/16" Allen and a 3/4" wrench. With help, lift the board gently up and place somewhere the finish will not be damaged.
2. Make sure to unlock the Fusion Swivel according to "Locking Your Swivel Properly" instructions on the previous page.
3. Using 3/4" wrench or Socket, you will remove the four hex head bolts (5-169) mounting the Bronze swivel to the mounted Stand.



Changing the Lock cont.

Step 2. Remove Mount Plate (60559) from Swivel.

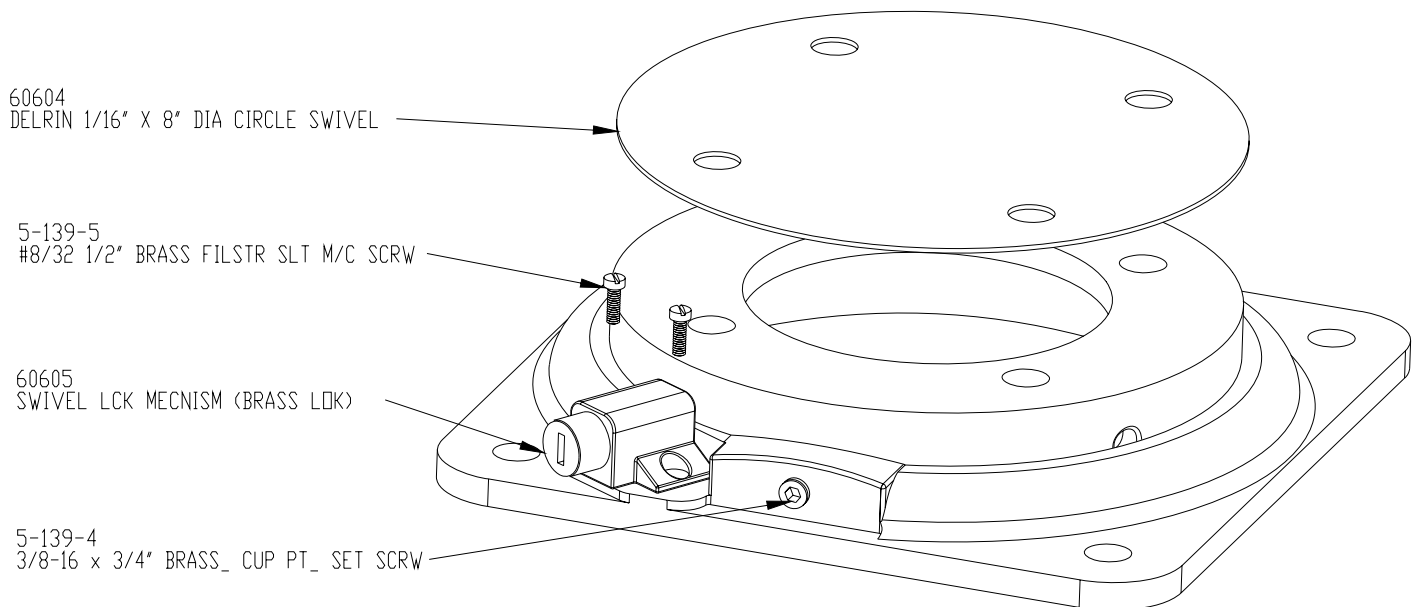
4. Remove the Mount Plate (60559) from the Swivel using a 5/16" Allen and a 3/4" wrench on the inside bolts.
5. Place the Mount Plate (60559) somewhere it will not be damaged by chipping or scratching.



Changing the Lock cont.

Step 3. Remove Lock (60605) from Swivel.

6. With a flat head screw driver, remove the two Brass screws (5-139-5) mounting the Lock.
7. Replace the Lock (60605) with setting and screwing it into position. Check function and fit before continuing to re-assemble. It is not necessary to over-tighten the Lock into position.



Step 4. Re- Assembling the Swivel.

8. Follow the Steps to replace your lock, in reverse, be sure to use all hardware and replacing all components in the correct order according to the outlined drawings.
9. Tighten the Plate 60559 to the swivel upwards of 30ft-lbs. Or as tight as possible.

ARTICLE 5 - POOL DIMENSIONS AND TOLERANCES
EXTRACTED FROM ANSI/NSPI-5 2003
AMERICAN NATIONAL STANDARD FOR RESIDENTIAL INGROUND SWIMMING POOLS

5.1 General requirements. Design dimensions shall comply with specifications in this standard. The pool shall be constructed to these design dimensions within the tolerances listed in 5.1.1.

5.1.1 Construction tolerances. There shall be construction tolerances allowed on dimensional designs. The overall length, width and depth shall be limited to a tolerance of plus or minus 3 inches (± 7.6 cm). All other dimensions shall be limited to a tolerance of plus or minus 2 inches (± 5.1 cm), unless otherwise specified.

5.2 Perimeter shape. No limits are specified for shape of pools except that consideration shall be given to shape from the standpoint of circulation of the swimming pool water and safety to the user.

5.3 Walls - requirements

5.3.1 Walls in the shallow area and deep area of the pool shall not slope greater than 11° (1:5 slope ratio) to a transition point. The transition point shall not be less than 2 feet and 9 inches (83.8 cm) below the waterline. See figure 1.

5.3.2 As shown in figure 2, at the depths of (a) and (b), the walls are permitted to join the floor.

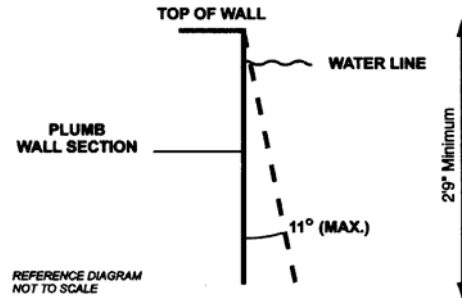


Figure 1- Maximum allowable wall slope

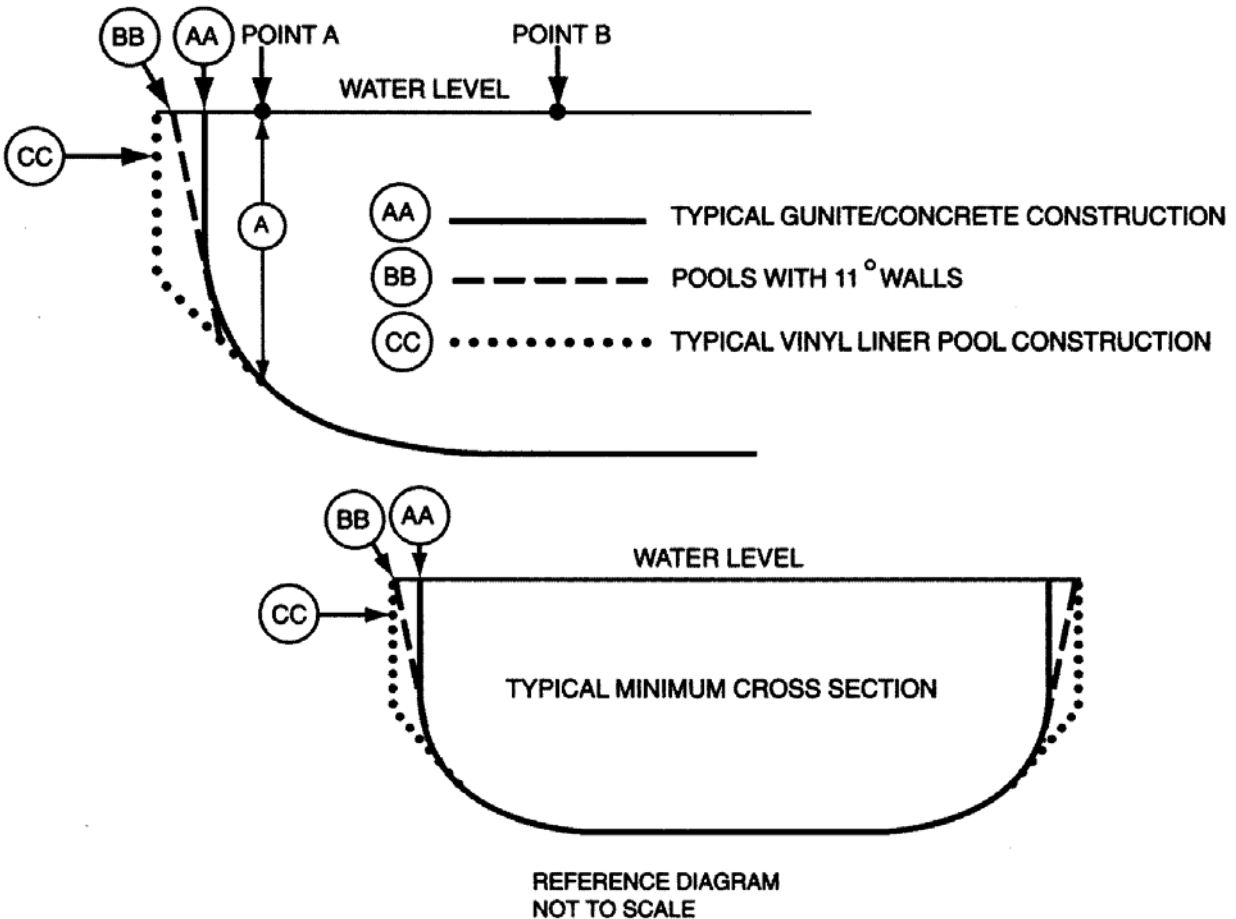


Figure 2- Typical pool design configurations

5.3.3 The walls of Type I pool, when defining the minimum diving water envelope, shall be plumb or outside of Type 1 water geometry. (See figure 3, table 1.)

5.4 Maximum allowable wall slope

5.4.1 Maximum allowable wall slope shall not slope greater than 11° from plumb.

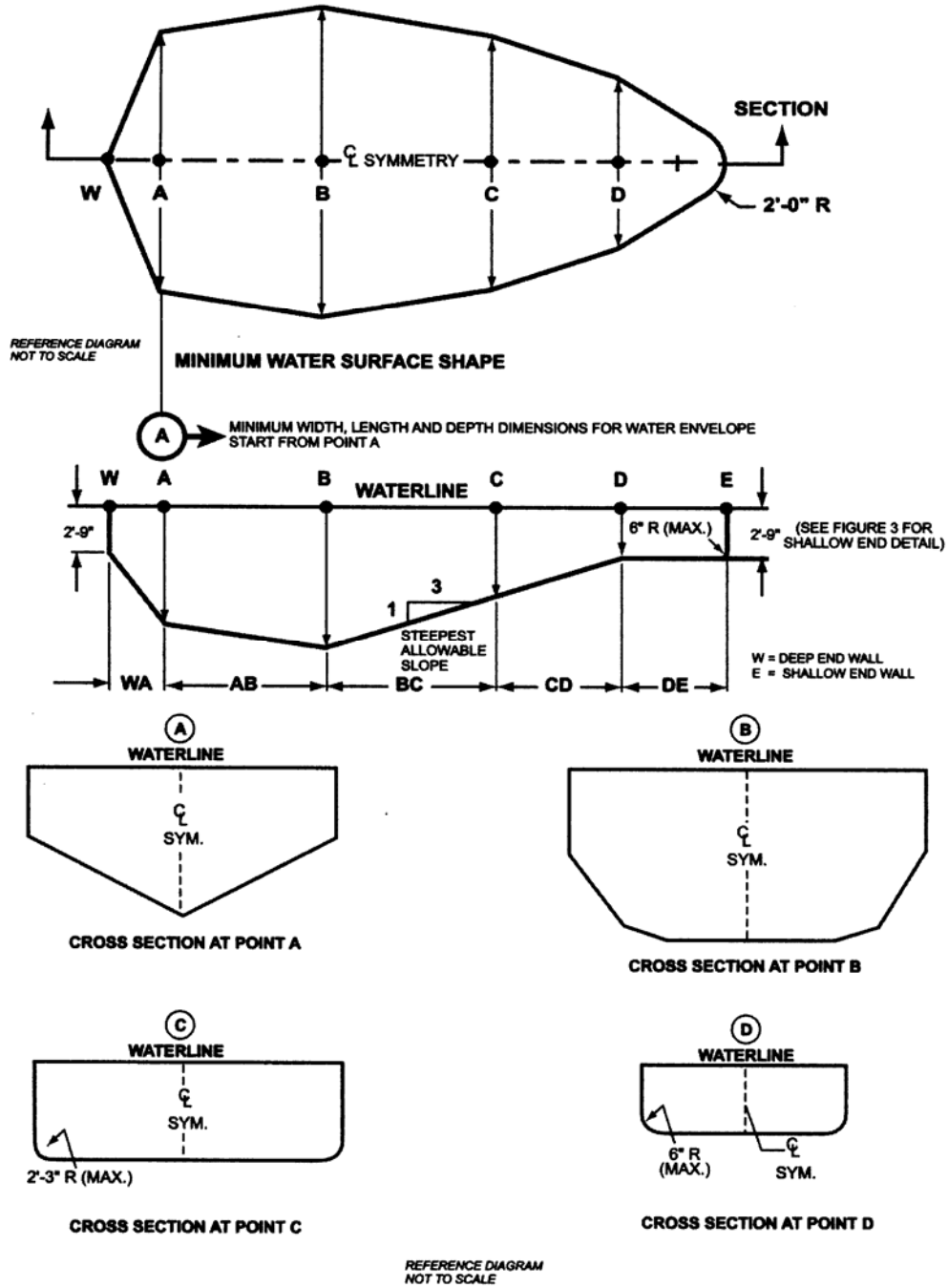


Figure 3- Minimum water envelope

Table 1- Minimum water envelope

Pool type	Minimum depths at point				Minimum widths at point				Minimum lengths between points					
	A	B	C	D	A	B	C	D	WA	AB	BC	CD*	DE	WE
O	Manufactured diving equipment is prohibited													
I	6'-0"	7'-6"	5'-0"	2'-9"	10'-0"	12'-0"	10'-0"	8'-0"	1'-6"	7'-0"	7'-6"	Varies	6'-0"	28'-9"
II	6'-0"	7'-6"	5'-0"	2'-9"	12'-0"	15'-0"	12'-0"	8'-0"	1'-6"	7'-0"	7'-6"	Varies	6'-0"	28'-9"
III	6'-10"	8'-0"	5'-0"	2'-9"	12'-0"	15'-0"	12'-0"	8'-0"	2'-0"	7'-6"	9'-0"	Varies	6'-0"	31'-3"
IV	7'-8"	8'-6"	5'-0"	2'-9"	15'-0"	18'-0"	15'-0"	9'-0"	2'-6"	8'-0"	10'-6"	Varies	6'-0"	33'-9"
V	8'-6"	9'-0"	5'-0"	2'-9"	15'-0"	18'-0"	15'-0"	9'-0"	3'-0"	9'-0"	12'-0"	Varies	6'-0"	36'-9"

NOTE:

- *Minimum length between points CD may vary based upon water depth at point D and the slope between points C & D.
- Figure 3 drawings are not to scale. (For pool types, see Glossary.)

5.5 Offset ledges

5.5.1 Offset ledges shall be a maximum of 8 inches (20.3 cm) wide.

5.5.1.1 Offset ledges, located less than 42 inches (1067 mm) below waterline shall be proportionately less than 8 inches (20.3 cm) wide and fall within 11° from plumb, measured from the top of the waterline. See figure 4.

5.6 Floor slopes. Floor slopes shall be reasonably uniform and comply with 5.6.1 through 5.6.3.

5.6.1 The slope of the floor from the shallow end wall towards the deep area shall not exceed 1 foot in 7 feet (30 cm: 213 cm) to the point of the first slope change as shown in figure 5.

5.6.2 Changes in slope between shallow and deep areas shall be at a minimum water depth of 2 feet 9 inches (83.8 cm) and be at least six feet (182.9 cm) from the shallow end, except as specified in 6.3.

5.6.3 The slope of the floor from the point of the first slope change toward the deep end shall not exceed 1 foot in 3 feet (30 cm: 91 cm).

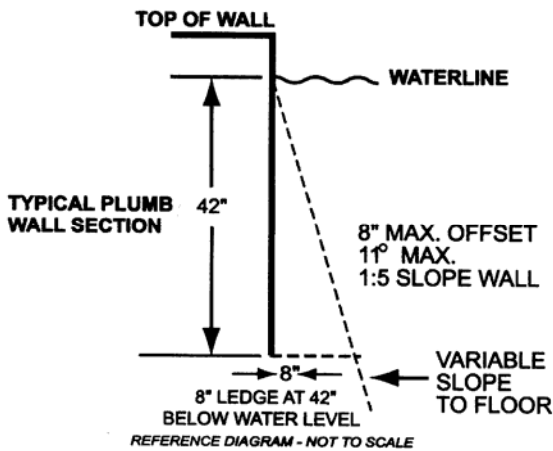


Figure 4- Offset ledges

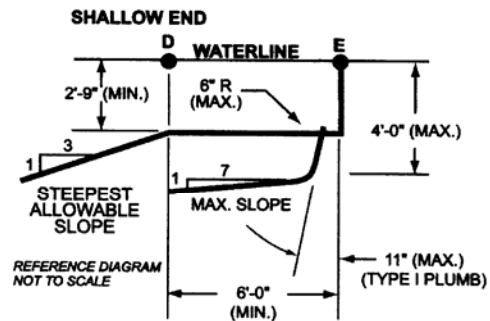


Figure 5- Shallow end depths

5.7 Shallow end water depths. Water depth in the shallow area shall be a minimum of 2 feet 9 inches (83.8 cm) except for those locations specified in 6.3 "Shallow End Detail for Beach and Sloping Entries." The water depth at the shallowest point shall not exceed four feet (121.9 cm) as shown in figure 5.

5.8 Manufactured diving equipment for in-ground swimming pools (diving board/stand combination or manufactured platform)

NOTE — For consumer safety information, warnings and education programs, See appendices D, E, and F.

5.8.1 When manufactured diving equipment is installed, it shall conform to the specifications set forth in 5.8 through 5.9 and shall be located in the deep area of the pool so as to provide the minimum, dimensions as shown in 5.9.

5.8.1.1 Manufactured diving equipment shall not be installed on Type 0 pools.

5.8.2 Diving equipment. Diving equipment shall be designed for swimming pool use and shall be installed in accordance with the manufacturer's specifications.

5.8.2.1 Diving equipment installation and use instructions shall be provided by the diving equipment manufacturer and shall specify the minimum water dimensions required for each diving board and diving stand combination. They may refer to the water envelopes type of their choice by dimensionally relating their products to Point A on the water envelopes as shown in figure 3 and table 1, 5.9.1 through 5.9.3.

5.8.2.2 Diving equipment shall be permanently labeled and affixed to the diving equipment or jump boards and shall include but not be limited to:

- manufacturer's name and address;
- date of manufacture;
- minimum water envelope required for each diving board and diving stand combination; and
- maximum weight limitations of the user as specified by the board manufacturer.

5.8.2.3 Diving equipment shall have slip-resisting tread surfaces.

5.9 Figure 3 contains suggested drawings and diagrams for minimum water envelope for swimming

pools designated type I - V. Individual pool types are shown in figure 3 and table 1.

5.9.1 Location of point A. Point A shall be defined as a point located on the minimum water envelopes.

5.9.1.1 Point A. Point A is a construction location nearest the deep end wall where the minimum water depth is satisfied.

5.9.1.2 Point A as shown in figure 3 and table 1 shall be the reference point of origin for all dimensions defining the minimum water envelope.

5.9.2 Type 0 pool (where diving is prohibited) shall not be limited in width, length, or water depth except as specifically provided for in this standard.

5.9.3 Location of equipment and pool features in the minimum water envelope. If the pool is designed for use with diving equipment, steps, pool stairs, ladders, underwater benches, special features and other accessory items shall be located outside the minimum water envelope. (See figure 6)

5.9.4 Typical pool design configurations. Vinyl liner, shotcrete, fiberglass and concrete constructions shall conform to, but are not limited to, the typical pool configurations shown in figure 2.

5.10 Stationary diving platform(s) and diving rock(s). Stationary diving platform(s) and diving rock(s) built on site shall be allowed to be flush with the wall and located in the diving area of the pool. Point A shall be in front of the wall at the platform or diving rock centerline.

NOTE — For consumer safety information, warnings and education programs, See appendices D, E, and F.

5.10.1 The maximum height of the stationary diving platform or diving rock above the waterline shall be as follows:

- Pool Type I 42 inches (106.7 cm);
- Pool Type II 42 inches (106.7 cm);
- Pool Type III 50 inches (127.0 cm);
- Pool Type IV 60 inches (152.4 cm); or
- Pool Type V 69 inches (175.3 cm)

5.10.2 Stationary diving platform(s) and diving rock(s) shall not be permitted on Pool Type 0.

5.10.3 The diving equipment manufacturer shall specify minimum headroom above water.

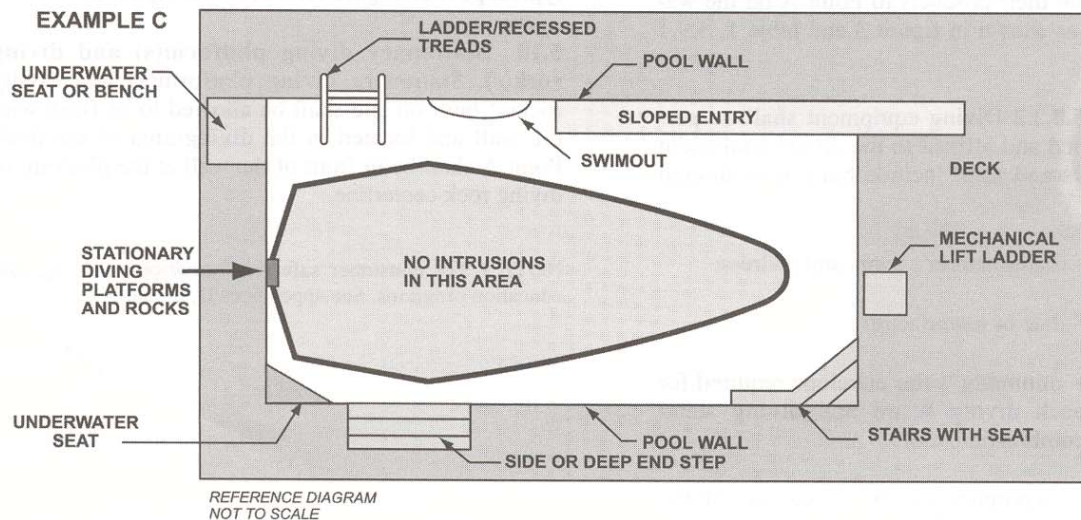
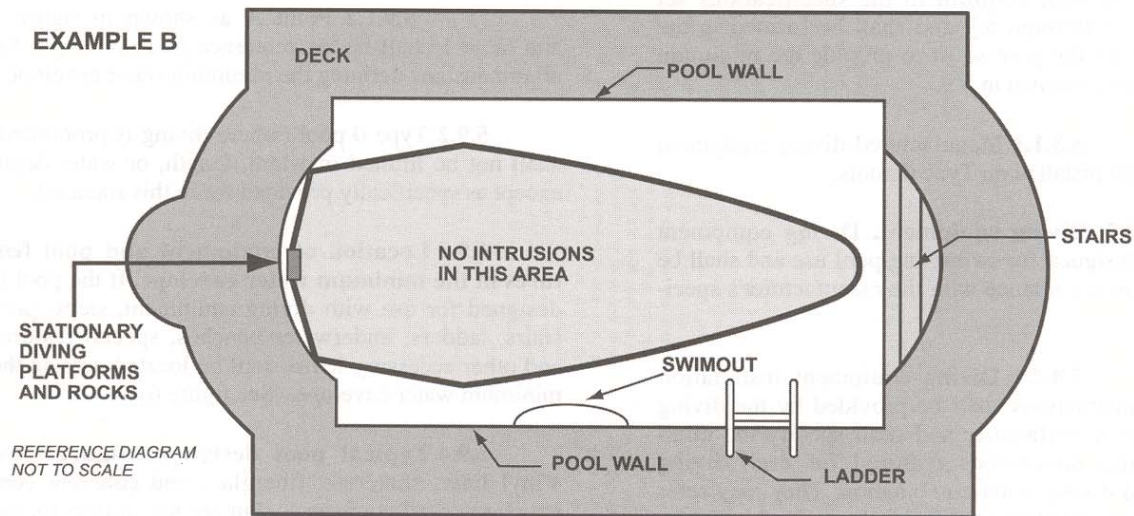
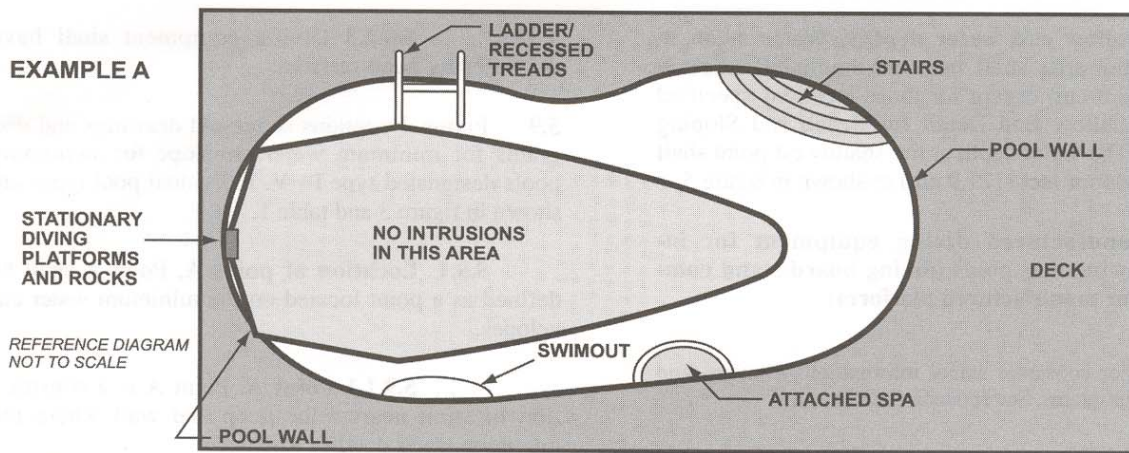


Figure 6- Top view examples of accessory equipment and pool features prohibited in the water envelope

For a copy of the complete ANSI/NSPI-5 2003 American National Standard for Residential Inground Swimming Pools contact:

National Spa and Pool Institute
 2111 Eisenhower Avenue
 Alexandria, VA 22314
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www.nspi.org