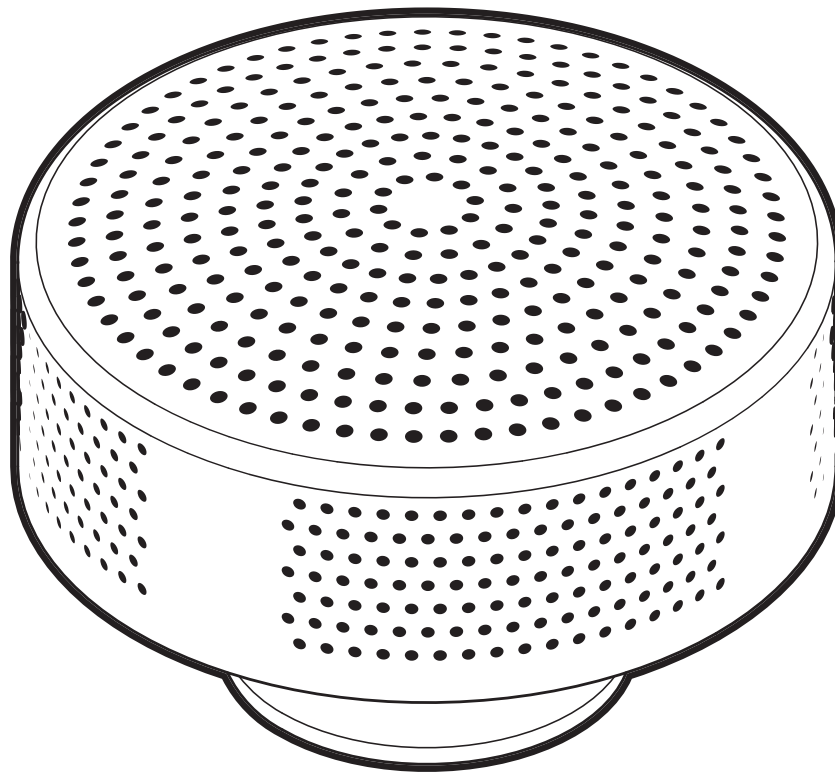




## EQUALIZER POOL SUCTION

25207-7XX-000, 25207-8XX-000



All Custom Molded Products main drains are listed and tested in strict accordance to the requirements of ANSI/APSP - 16 2017, the current standard of reference for the Virginia Graeme Baker Act, and compliant to the latest Consumer Product Safety Commission (CPSC) requirements.

Connect only to a skimmer. Do not use as a pump suction. May be used as a single fitting based on APSP-16 9.4.1.2. | Submerged | Cover Life: 7 Years | Wall Only



IAPMO Listed VGBA Suction: Compliant to ANSI/APSP - 16 2017 & CPSC Requirements

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Please read through the entire manual before installing your new unit. Your pool drain fitting must be installed and operated as specified.

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page 4	SPECIFICATIONS
page 4	HEAD LOSS CHART
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# A. SAFETY INSTRUCTIONS & PRECAUTIONS

When installing and using this equipment, basic safety precautions shall always be followed, including the following:

## IMPORTANT SAFETY INSTRUCTIONS.

### READ, UNDERSTAND AND FOLLOW ALL WARNINGS AND INSTRUCTIONS.

### ALWAYS PLUMB AND INSTALL ALL SUCTION FITTINGS ACCORDING TO ALL BUILDING CODES THAT APPLY IN YOUR AREA.

**WARNING** When using two or more suction fittings on a common suction line, suction must be separated by a minimum of 3 ft or they must be located on two different planes.

**WARNING** WARNING: DO NOT locate suction outlets on seating areas or on backrests for such seating areas.

#### NOTICE

Attention Installer: This manual contains important information about the installation, operation and safe use of this product. Before installing this product, read and follow all warning notices and instructions which are included. This information should be given to the owner and/or operator of this equipment.

**WARNING** To reduce the risk of drowning from hair and body entrapment, install suction fittings with a marked flow rate in gallons per minute that exceeds the flow rate of your system by at least 25%. Always use multiple suction outlets. If the fitting/cover breaks, is damaged, or is missing, shut the system down immediately. Do not use the system until damaged parts have been replaced.

#### NOTICE

Keep hair and clothing a minimum of 12 inches from all suction fittings and drains at all times. Persons with long hair should secure hair to a minimal length or wear swimming cap. Children should never be left unattended at any time in a swimming pool, spa, or bathtub. Be sure the temperature of the water never exceeds the manufacturer's recommendations.

#### NOTICE

To reduce the risk of injury, installation and service should be done by a qualified Service Professional, certified electrician or authorized CMP representative.

#### NOTICE

NOTE: In the event that one suction outlet is completely blocked, the remaining suction outlet(s) serving that system MUST have a flow rating capable of the full flow of the pump(s) for the specific suction system.

**WARNING** Increasing size of the pump may increase flow rate of suction beyond rated safety limits causing entrapment or death.

#### NOTICE

All Suction Outlet Fitting Assemblies (SOFAs) shall be installed in accordance with the manufacturer's installation instructions, or for Registered Design Professional SOFAs, in accordance with the registered design professional's engineering plans. Field modification made to a SOFA not authorized by the manufacturer's installation instructions shall void the SOFA certification.

**WARNING** Hair or body parts blocking the spa or pool suction may become trapped and held against the suction fitting. Entrapment against the suction fittings can result in drowning or other severe injury. Never sit on or lean up against suction fittings. Never exceed the maximum allowable flow rate stated on the suction fitting. The suction fitting and fasteners should be inspected for damage or tampering before use. Missing, broken, or cracked suction fittings shall be replaced. Loose suction fittings shall be reattached or replaced before use of this facility.

#### NOTICE

The maximum hose length difference between any self-contained SOFA and the tee leading to the pump shall not exceed 13 feet (3.96 m).

#### NOTICE

CMP drain covers are only certified for use with CMP sumps and frames. Do not mismatch with parts from other manufacturers.

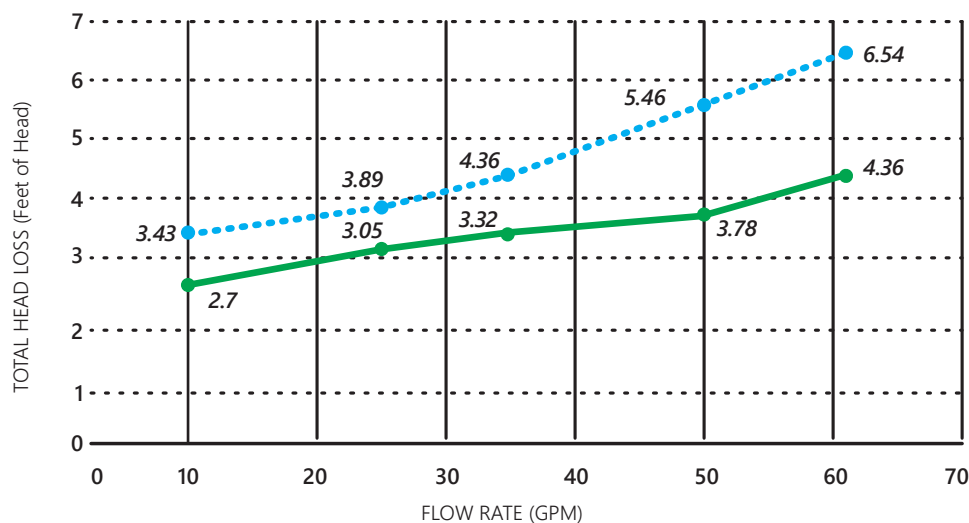
## SAVE THESE INSTRUCTIONS

## B. SIZING & SPECIFICATION REFERENCE

- Suction fitting configuration specific flow ratings MUST NOT be exceeded at any time the pool is open to bathers.
- A system must install a suction fitting, or combination of multiple suctions, such that the resulting individual suction system flow rating is greater than the pumping system's maximum system flow rate.
- To reduce the risk of drowning from hair and body entrapment, install suction fittings with a marked flow rate in gallons per minute that exceeds the flow rate of your system by at least 25%. Increasing size of the pump may increase flow rate of suction beyond rated safety limits causing entrapment or death.
- Any modification that increases the flow rate of the circulation system shall require reevaluation of the cover/grate and sump to ensure that the flow rating of the Suction Outlet Fitting Assembly is not exceeded.
- The flow rating for pools with multiple, blockable SOFAs piped together in one body of water without isolation valves shall be determined by combining the flow rating of all SOFAs, minus the flow rating of one. If the flow ratings of all SOFAs are not equal, subtract the flow rating of the SOFA with the highest flow rating.
- NOTICE: No modification shall be made to a SOFA structure or flow path unless the new configuration has been certified as a new SOFA.

**TABLE 1: SPECIFICATIONS**

WALL FLOW RATE	50 GPM - Flow rate verified to CPSC test protocol
PIPE SIZE	2" Insider (25207-7xx - Gunite Only) 1.5" MIP (25207-8xx - Fiberglass, Vinyl or Gunite)
OPEN AREA	6.82in <sup>2</sup>
SUCTION COVER LIFE	7 Years. Replace cover and screws every seven years.
WALL FITTING BODY LIFE	30 Years



**CHART 1: HEAD LOSS CHARTS**

## C. INSTALLATION & MAINTENANCE

### 1. REQUIRED FOR INSTALLATION

**Your drain/suction includes the following:**

- Wall Fitting
- Suction Cover
- Cover Screw
- Set Screw (MIP only)

### 2. INSTALLATION LOCATION

- This suction fitting is designed for installation on the wall only of vinyl, gunite or fiberglass hot tubs or pools.
- Do not mount directly under seats.
- Connect only to a skimmer. Do not use as a pump suction. May be used as a single fitting based on APSP-16 9.4.1.2.

**SAFETY CHECKLIST:**

- Suction fitting and fasteners should be observed for damage or tampering before each use.
- DO NOT adapt suction fitting to any pipe size smaller than listed in the Specifications (Table 1)
- Missing, broken, or cracked suction fittings shall be replaced before use. Loose suction fittings shall be reattached or replaced before use.

### 3. INSTALLATION PROCEDURE

#### 2 INCH INSIDER INSTALLATION

- Plumb 2" SCH 40 pipe from the pool skimmer to the location of the equalizer fitting. (IMAGE 1)
- Remove cover from body using screwdriver.
- Apply PVC Glue to the insider body and press it into the 2" SCH 40 pipe that is plumbed to the skimmer equalizer line. (IMAGE 2)
- To install the cover, align screw holes on the fitting with those on the lid. Slide cover all the way onto the fitting.
- Attach cover/grate with the supplied screws. Verify that the suction cover is properly tightened with the #8 316 stainless steel screw in brass inserts to 14in-lbs.

#### 1.5 INCH MIP INSTALLATION

- Plumb 2" SCH 40 pipe from the pool skimmer to the location of the equalizer fitting. Install 1.5" MIP threaded fitting at pool wall (not included with equalizer suction). (IMAGE 1)
- Remove cover from body using screwdriver.
- Thread the body into existing 1.5" pool wall fitting that is plumbed to the skimmer equalizer line, until flush with pool wall. The wall fitting is concave to fit over the wall fitting completely. Teflon tape may be used to help seal. (IMAGE 2)
- Tighten set screw into the pool wall fitting using Allen wrench so that the body cannot be removed by hand. Tighten until the set screw contacts the wall fitting surface then tighten additional 1/2 turn. DO NOT OVER-TIGHTEN.
- Attach cover/grate with the supplied screws. Verify that the suction cover is properly tightened with the #8-32 1-1/4" 316 stainless steel screw in brass inserts to 14in-lbs.

## C. INSTALLATION & MAINTENANCE

- NOTE: For plug, use CMP part # 25543-000-000.
- Make sure mounting surface is level/flat. The suction cover and fitting must sit flush with the mounting surface to prevent any gaps between the cover and the wall. Gaps between the cover and the wall may cause hair entrapment. DO NOT over-torque the cover screw. Excessive torque can cause premature failure of threads or damage to suction fitting increasing risk of entrapment. DO NOT USE POWER TOOLS TO INSTALL FASTENERS.
- When any SOFA component is held in place by the interior finish of the pool, that surface shall be free of deterioration and voids.
- SOFA components and fastener receptacles shall be clean and free of debris or obstructions during installation of cover/grate and fasteners. The use of adhesives or other attachment methods that prevent access to suction piping or SOFA components requiring periodic servicing is prohibited. Hand-check cover/grate for snugness to the sump/ frame after installation.

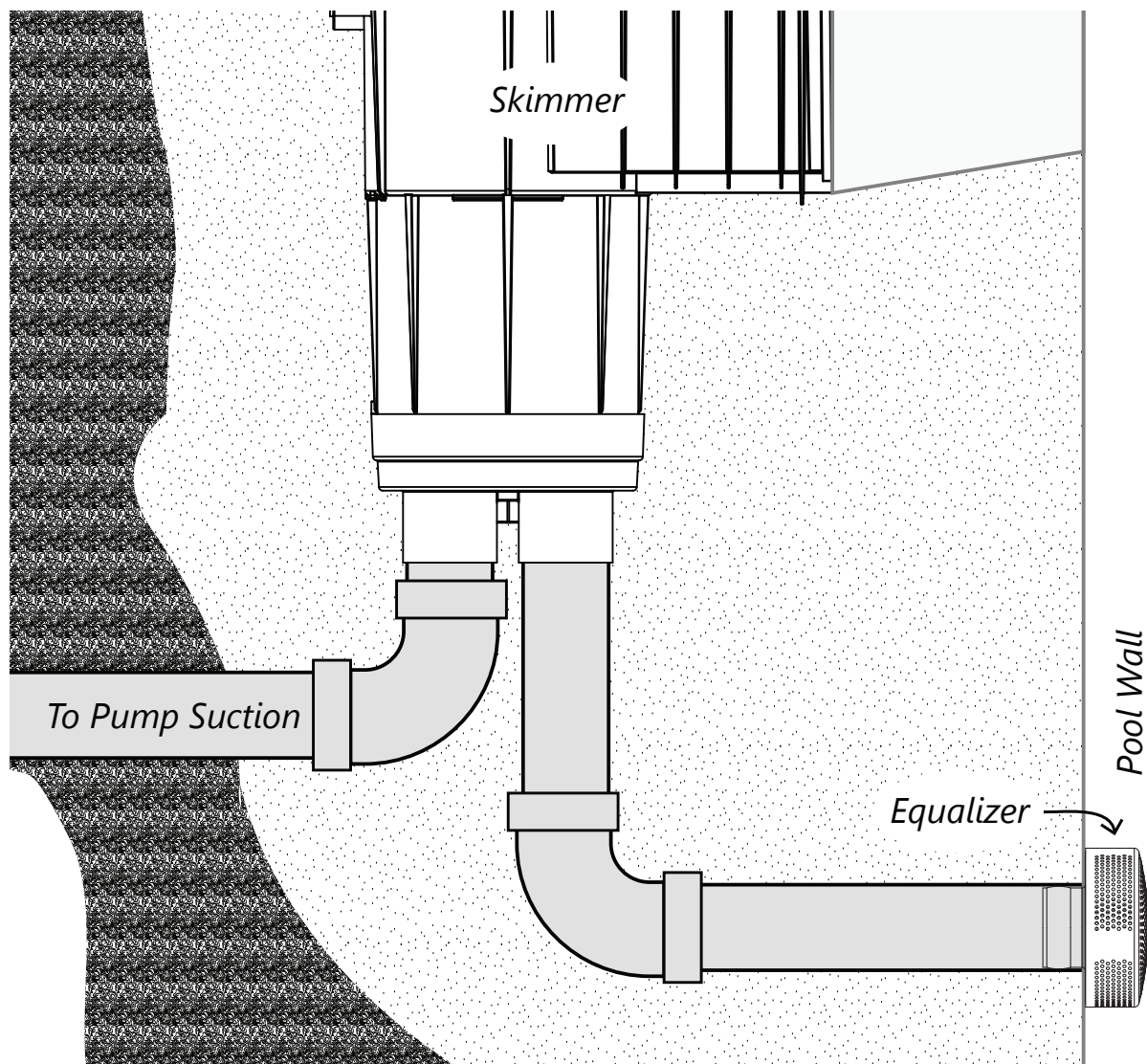


IMAGE 1 - POOL/PLUMBING INSTALLATION

## C. INSTALLATION & MAINTENANCE

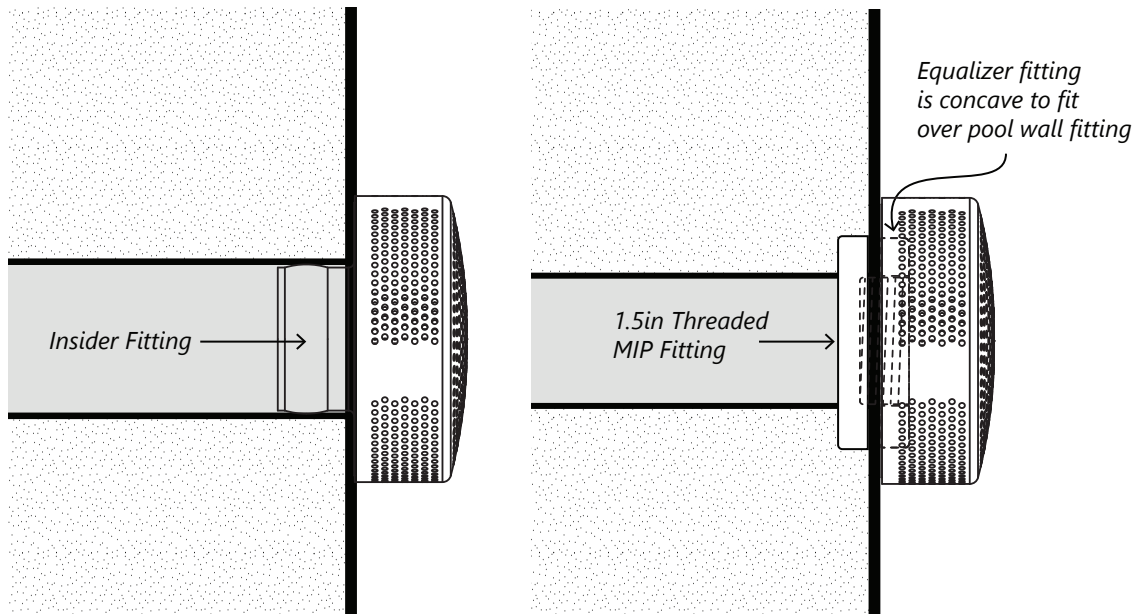


IMAGE 2 - PIPE FITTING OPTIONS

## 2. MAINTENANCE & INSPECTION

- Covers/grates and all other SOFA components shall be replaced before the end of their service life. Service life begins the month and year in which a SOFA component is installed with or without water. The cover/grate and screws should be replaced at least every seven (7) years. Sump and frame service life is 30 years.
- Inspect pool or spa regularly to ensure that the drain cover/grate is in place and secure.
- Missing, broken, or cracked SOFA components shall be replaced before bathers are allowed to use the pool or spa. Loose covers/grates shall be reattached before bathers are allowed to use the pool or spa.
- If the cover is found with color changed, broken, cracked, missing, brittle components with chunks or pieces broken off, it must be replaced. Do not use the pool/spa/facility until a replacement is made.
- If there are stripped screw holes or if the brass insert receptacles are missing/removed, the SOFA must be replaced. Do not use the pool/spa/facility until a repair or replacement is made.
- If a drain cover/grate does not pass inspection:
  - Close the pool or spa immediately
  - Post a closure notice
  - Keep the facility closed until a new drain cover and screws are properly installed.

## 3. WINTERIZING

- Requirements for winter will vary depending on region - follow normal winter and freeze protection practices for your area.
- For areas that require partial drainage and/or clearing lines to prevent freeze damage:
  - Follow skimmer winterization procedures.
  - Blow and cap the suction line, drain water level below equalizer fitting or fill line with foam rope/backer rod to protect from freeze damage.

D. PART DIAGRAMS AND MEASUREMENTS

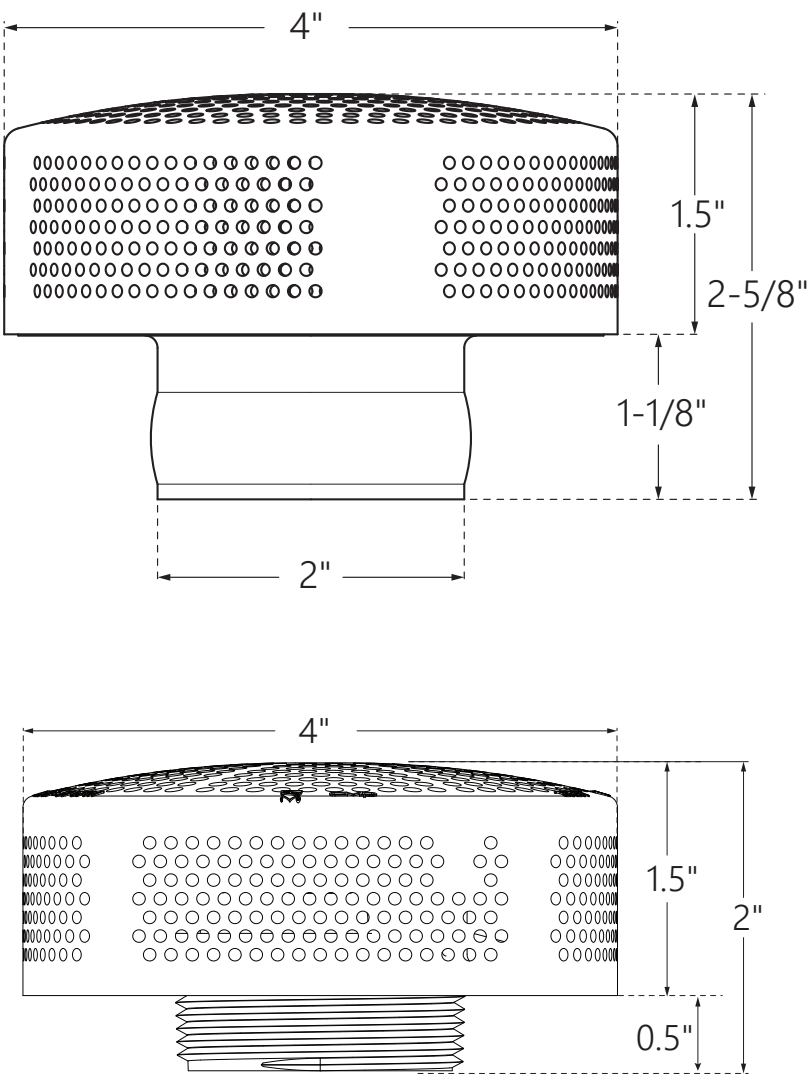
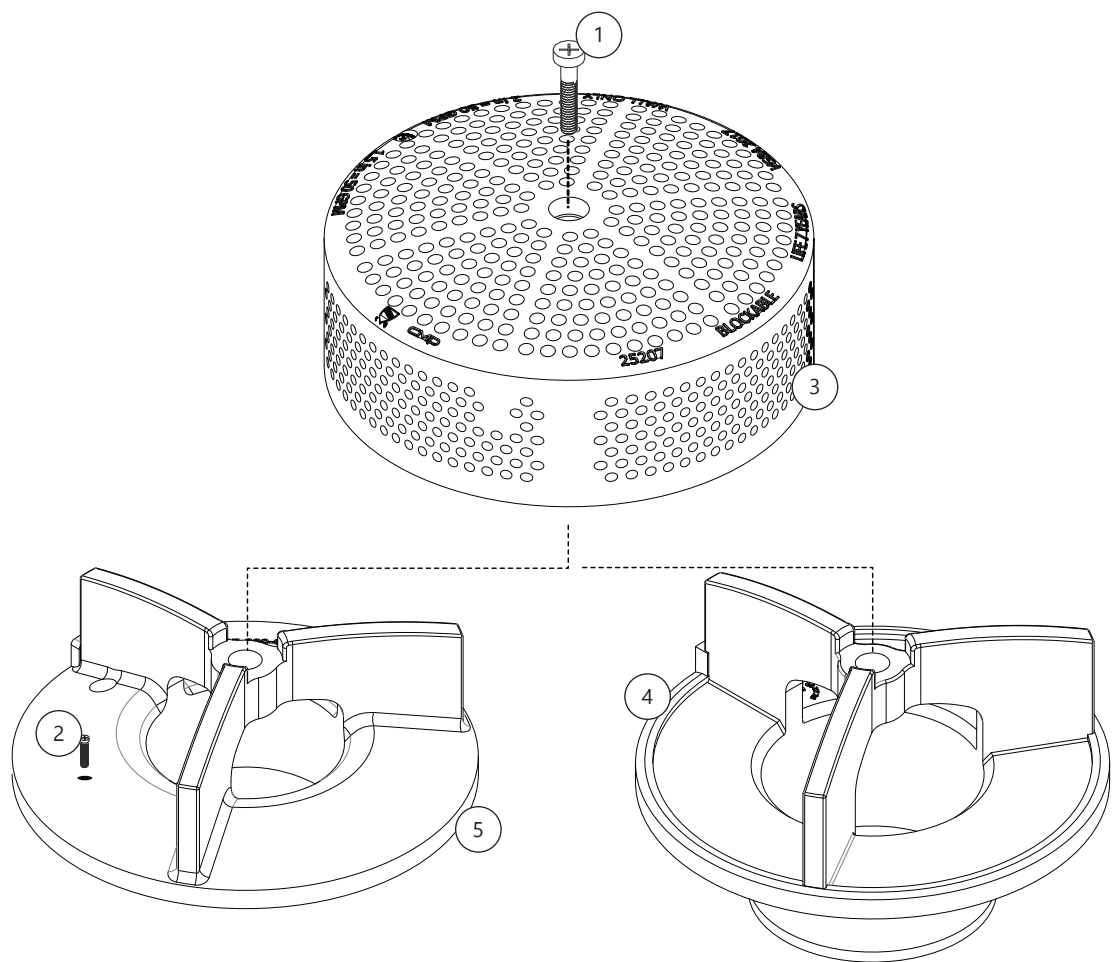


IMAGE 3 - DIMENSIONS



# G. PARTS LIST



	CMP P/N	DESCRIPTION
1	61000-050-012	#8-32 1-1/4" 316 STAINLESS STEEL COVER SCREW
2	61000-100-316	SET SCREW (MIP ONLY)
3	25207-020-000*	COVER
4	25207-700-010	WALL FITTING - 2" INSIDER
5	25207-800-010	WALL FITTING - 1.5" MIP

Parts numbers not listed in product table are only available as part of a complete assembly.  
\*See c-m-p.com or pool products catalog for other color and kit options



**Record Information on this System Below & Keep for Your Records**

Installer \_\_\_\_\_

Purchased From \_\_\_\_\_

Installation Date \_\_\_\_\_

Model Number \_\_\_\_\_

Pool Size in Gallons \_\_\_\_\_

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**Warranty Questions**

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**Support Resource & Videos Online**

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