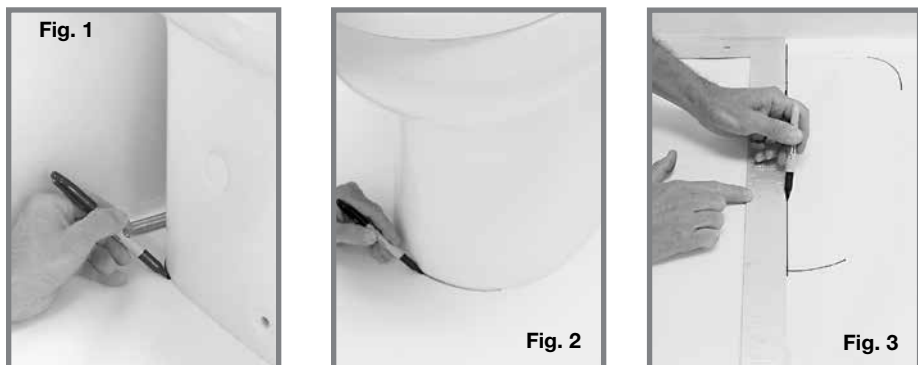


VACUFLUSH® 4809 TOILET INSTALLATION GUIDE

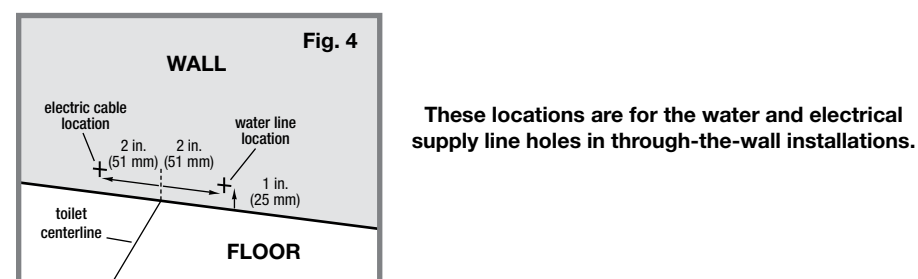
Electrical	Toilet amp draw (average)	2 amps @ 12 V DC; 1 amp at 24 V DC
	Toilet circuit breaker/fuse	5 amp @ 12 or 24 V DC
Water Supply	Fitting	0.5 in. NPT
	Flow rate	2.0 gpm/7.6 lpm minimum required at toilet
Discharge	Size	1.5 in./38 mm ID PVC pipe or sanitation hose
	Horizontal run	50 ft./15 m maximum to vacuum source
	Vertical run	6 ft./1.8 m maximum to vacuum source
Required components	Electric flush switch	Domestic VFS or VFP switch (purchased separately)
	Vacuum source**	VacuFlush vacuum generator or VacuFlush holding tank system (purchased separately)

* Circuit board fuse resets by turning toilet's electrical power off, then back on.
 ** Refer to vacuum source specifications for additional toilet system electrical requirements.
 Refer to installation codes for proper wire sizes.
 Specifications subject to change without notice.

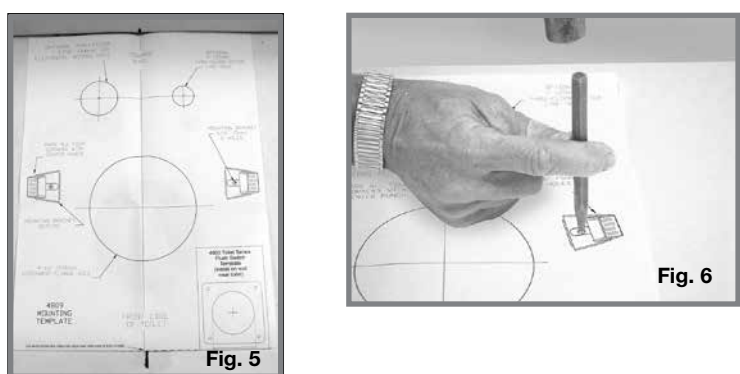
- Carefully unpack toilet and place it in the position intended. Center the toilet in the selected position and assure that adequate clearance is available for opening the seat and lid. Check the front and sides of the toilet to insure that it will set flat against the floor. Determine the best location for the flush switch panel. It is recommended that it be near the toilet but not hidden by the toilet lid in the "up" position. Avoid a location susceptible to direct water spray.
- Mark the floor at the rear corners and the front center of the ceramic bowl. Remove the ceramic bowl and set aside (figs. 1, 2).
- Measure the distance between the rear corner marks on the floor and divide by 2 to find the centerline. Using a carpenter's square, draw a centerline on the floor that intersects the mark for the front center of the bowl (fig. 3).



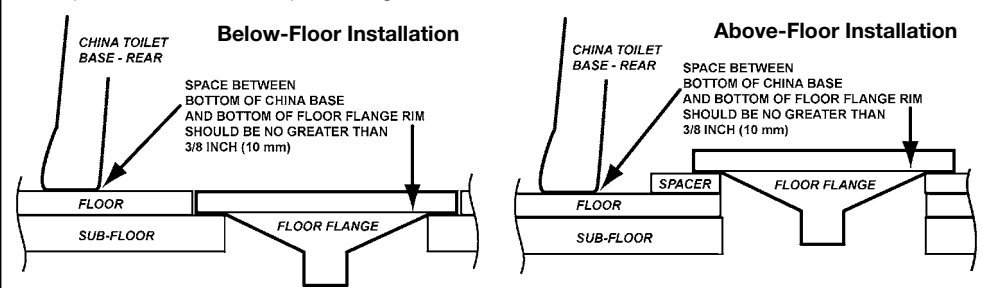
- Choose an inlet configuration for the electrical wiring and water line hole location: (a) through the rear wall, or (b) through the floor.
- For electrical cables/wiring and water line installations **through the rear wall**, measure up a minimum of 1 inch (25 mm) and 2 inches (51 mm) to the right of the centerline (fig. 4) for the electrical cables, and 2 inches (51 mm) to the right of the centerline for the water line. Mark the hole locations.



- Align the 4809 toilet mounting template along the centerline mark with the front edge of the template flush with the mark for the front edge of the toilet bowl (fig. 5). Tape the template to the floor.
- Using a center punch, mark the center locations for the discharge flange hole, mounting bracket holes (fig. 6), the four corners of each mounting bracket, and the center of the water line and electrical wiring holes (if routing these through the floor). Remove the template from the floor.



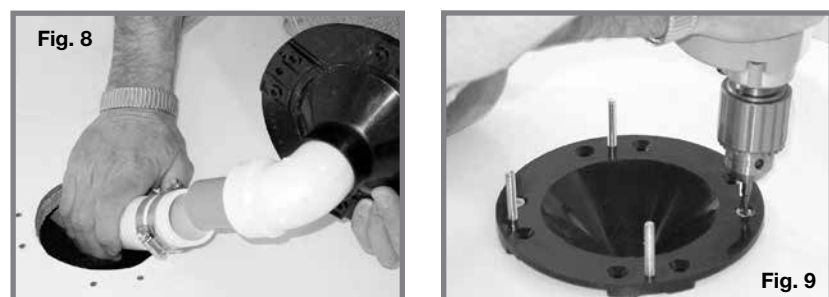
IMPORTANT: The preferred floor flange installation method is to mount the flange directly on the finished floor. However, if the bottom of floor flange and bottom of ceramic toilet must be mounted at different heights, the floor flange must be mounted within 3/8-inch (10 mm) of the bottom of the toilet (see illustrations below) or leakage will result.



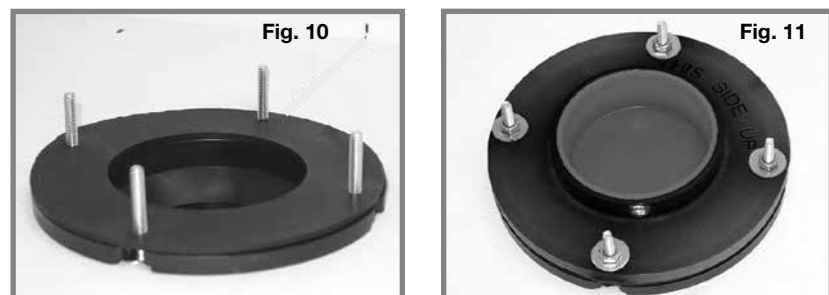
- Cut out the 4-3/4-inch (120 mm) diameter discharge flange hole. Drill the two 3/16-inch (5 mm) holes mounting bracket fastener holes. Where required (floor or wall), drill the 1-inch (25 mm) diameter water line hole and 1 3/4-inch (44 mm) electrical wiring hole.
- VERTICAL DISCHARGE HOSE** – Using PVC primer and solvent cement, attach the hose adapter directly into the discharge flange outlet. Allow to cure before handling. **HORIZONTAL DISCHARGE HOSE** – Using PVC primer and solvent cement, attach the elbow directly to the discharge flange outlet. Then attach the hose adapter into the elbow (fig. 7). Allow to cure before handling.
- Insert the discharge flange into the hole with the elbow pointing in the direction of the discharge plumbing. Mark the floor through the eight countersunk mounting holes. Remove the flange and drill the eight pilot holes with an 11/64-inch (4 mm) drill bit.



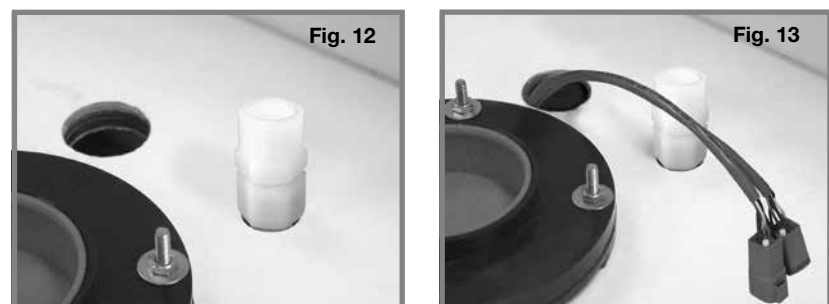
- Route the vacuum hose from the vacuum generator or vacuum tank up through the discharge flange hole. Lubricate the inside of the hose with liquid dishwashing soap and install the hose onto the adapter. Secure the connection with two stainless steel hose clamps (fig. 8).
- Insert four T-bolts into the discharge flange from the underside.
- Insert the discharge flange and connected hose or pipe into the discharge hole and secure to the floor with the eight #12x1-1/2-inch flat head screws provided (fig. 9).



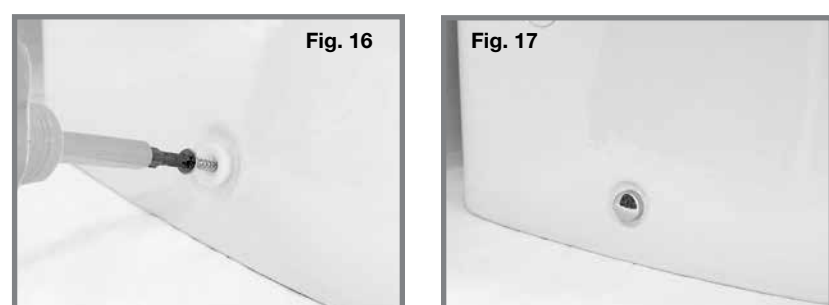
- Install the flange gasket over the T-bolts (fig. 10).
- Install floor flange adapter with words "THIS SIDE UP" facing up. Tighten adapter to floor flange using four flat washers and hex nuts. Tighten in criss-cross pattern (fig. 11).



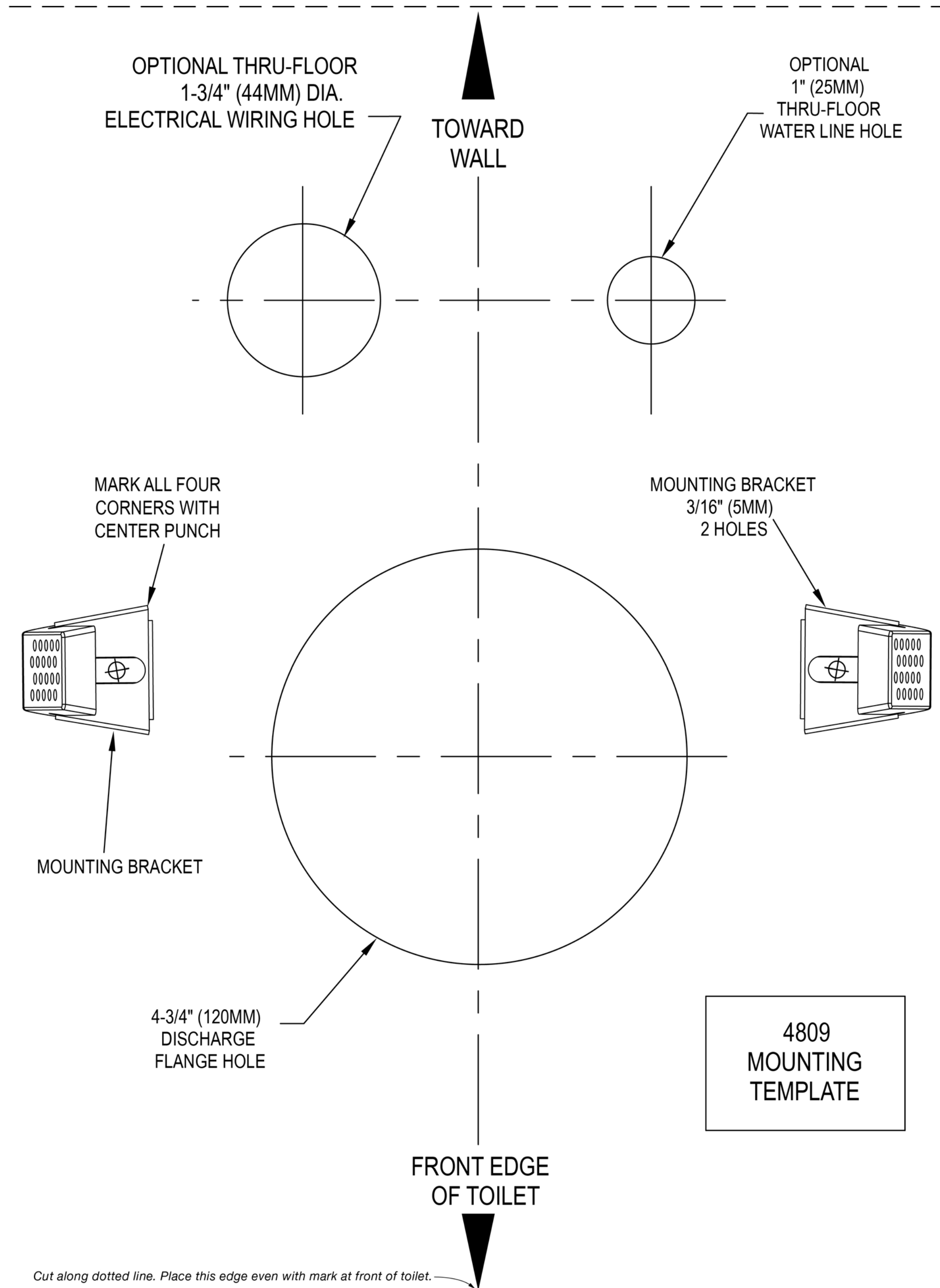
- Route 1/2-inch (13 mm) diameter water line from the fresh water source through the 1-inch (25 mm) hole in the wall or floor and attach a 1/2-inch NPT fitting (fig. 12). **Note:** A shut-off valve should be placed in the water line to the toilet for maintenance or repair.
- Several flush switch options are available. Instructions for installing the flush switch are packed with the flush switch.
- WITH ELECTRICAL POWER OFF**, route electrical cables/wiring from vacuum generator and power source through wiring access hole (fig. 13). (Refer to wiring diagram on toilet model's parts list. If wiring connector shown here is not being used, refer to wiring diagram to make proper connections).
- Install flush switch according to its instructions and route electrical cable through the wiring access hole at the toilet (fig. 13). Leave enough cable to connect to toilet. The cable supplied with the VacuFlush switch should have ethernet cable connectors (not shown here).



- Secure the toilet mounting brackets to the floor using the #14 x 2 1/2-inch (65 mm) hex washer head screws and support plates provided. Be sure to mount the brackets as shown on the template (fig. 14).
- Set the toilet in front of the discharge adapter. Connect the flexible water hose to the 1/2-inch NPT fitting on the inlet water line. Connect the cable/wiring from flush switch to the toilet's flush switch-status panel cable/wiring. Connect the cable/wiring from vacuum generator and power source to the toilet's vacuum generator-power source cables/wiring.
- IMPORTANT – DO NOT ATTEMPT TO SLIDE THE TOILET OVER THE DISCHARGE ADAPTER. THE TOILET MUST BE SET DOWN INTO THE ADAPTER TO PREVENT POSSIBLE DAMAGE.**
- Lubricate the O-ring around the bottom of the toilet base with liquid soap or silicone spray or silicone grease. Pick up the toilet and insert plastic base assembly into discharge adapter. Make sure mounting brackets on floor do not interfere with bottom of ceramic toilet (fig. 15). If the mounting brackets interfere, loosen mounting screws and adjust bracket location accordingly.
- Insert the two plastic flange bushings into the toilet mounting holes and secure the toilet to the mounting brackets with the two flat head wood screws provided (fig. 16). Be sure to drive fasteners into mounting brackets at a downward angle.
- Press the decorative screw covers over the flange bushings (fig. 17).



SEE SEPARATE INSTRUCTIONS FOR WALL-MOUNTED FLUSH SWITCH AND/OR STATUS PANEL INSTALLATION.



Cut along dotted line. Place this edge even with mark at front of toilet.