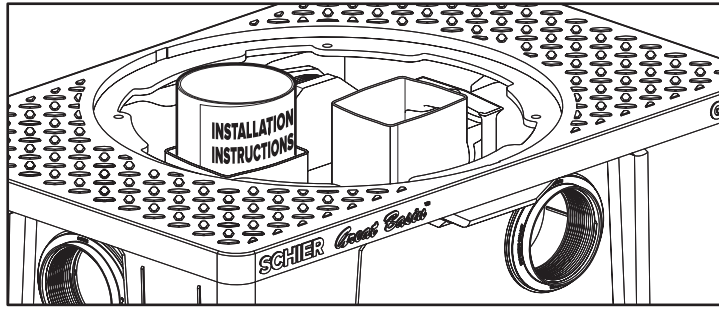


# SPECIAL PRECAUTIONS

For All Schier Grease Interceptor Installations

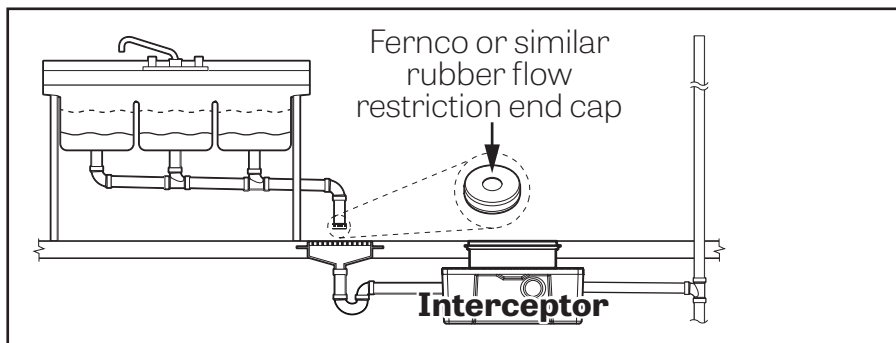
## Installation Instructions

Installation instructions and additional components are located inside the interceptor. Read all instructions prior to installation. This interceptor is intended to be installed by a licensed plumber in conformance with all local codes.



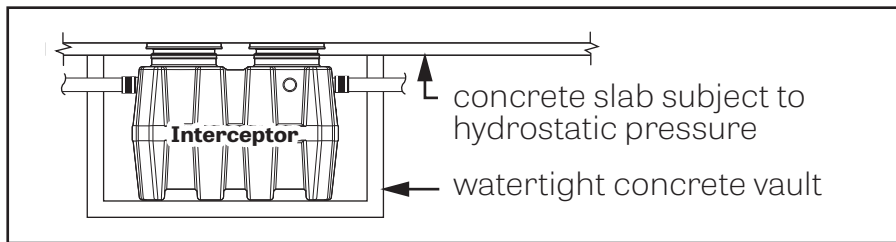
## When Installing Interceptor Inside

If your dishwashing sink(s) discharges into a floor drain/sink (drain), you must regulate the flow into the drain to avoid an overflow of water onto the kitchen floor. This can be done by installing a valve or flow restriction cap on the sink piping that discharges into the drain. See drawing below for guidance. For detailed guidance on indirect connections, go to: [http://webtools.schierproducts.com/Technical\\_Data/Indirect\\_Connections.pdf](http://webtools.schierproducts.com/Technical_Data/Indirect_Connections.pdf)



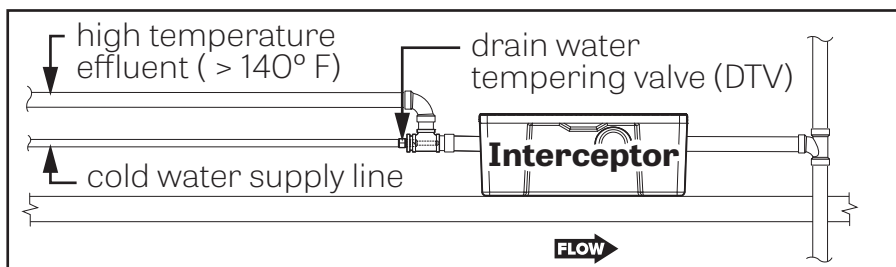
## Hydrostatic Slabs (or Pressure Slabs)

When installed under a hydrostatic slab (slab designed to withstand upward lift, usually caused by hydrostatic pressure) interceptor must be enclosed in a watertight concrete vault. Failure to follow this guidance voids your warranty.



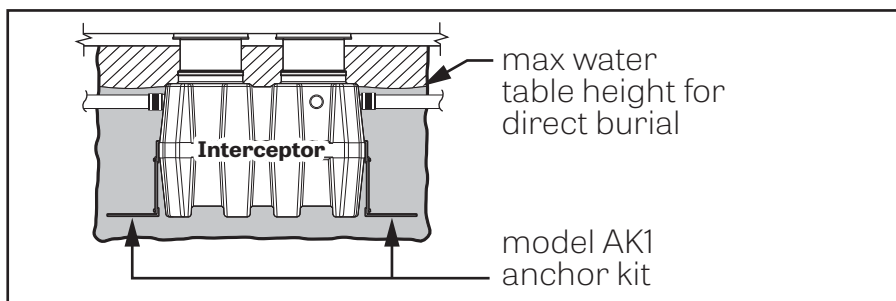
## High Temperature Kitchen Water

If water is entering the interceptor at excessive temperature (over 140° F), a drain water tempering valve (DTV) must be installed. Most state and local plumbing codes prohibit water above 140° F being discharged into the sanitary sewer. Water above 140° F will weaken or deform PVC Schedule 40 pipe, poly drainage fixtures like interceptors and erode the coating of cast iron (leading to eventual failure). Failure to follow this guidance voids your warranty.



## High Water Table Installations

Interceptors and risers are not designed to withstand water table height in excess of the top of the unit when buried (see figure). If it is possible for this to occur, install the interceptor and risers in a water-tight concrete vault or backfill with concrete or flowable fill (wet concrete and flowable backfill should be poured in stages to avoid crushing the interceptor). At risk areas include but are not limited to tidal surge areas, floodplains and areas that receive storm water. Failure to follow this guidance voids your warranty. Models GB-50, GB-75, and GB-250 that are direct buried in high water table scenarios must be installed with model AK1 anchor kit or warranty is void.



# SPECIFICATIONS

## NOTES

- 4" plain end inlet/outlet
- Unit weight - w/composite covers: 230 lbs.; w/cast iron covers: 340 lbs. (For wet weight add 2,290 lbs.)
- Maximum operating temperature: 140° F continuous
- Capacities - Liquid: 275 gal.; Grease: 1,076 lbs. (147.4 gal.); Solids: 105 gal.
- Built-in Flow Control.
- For gravity drainage applications only.
- Do not use for pressure applications.
- Cover placement allows full access to tank for proper maintenance.
- Vent not required unless per local code.
- Engineered inlet and outlet diffusers are removable to inspect/clean piping.
- Integral air relief / Anti-siphon / Sampling access.

## DIFFUSION FLOW TECHNOLOGY

The inlet diffuser splits influent into three paths, creating laminar flow and utilizing the entire liquid volume of the tank for efficient grease separation. The calibrated openings greatly reduce effluent turbulence. The effluent enters the main chamber without disturbing the existing grease or sediment layers. The integral air relief / anti-siphon in the top of the outlet diffuser allows pressure stabilization within the unit during operation. The bottom of the outlet diffuser allows only effluent which is free of grease to exit the tank. It can easily be attached to any of the three outlets provided to ease job site piping layouts.

# INSTALLATION INSTRUCTIONS

**WARNING DO NOT AIR TEST UNIT OR TELEGLIDE RISER SYSTEM! Doing so may result in property damage, personal injury or death.**

## LEAK/SEAL TESTING

Cap/plug all base unit plumbing connections and remove covers. For base unit testing, fill with water to just above the highest connection. For riser system testing (if required) fill with water to finished grade level. **CAUTION: Risers must be supported before filling with water to prevent tipping.** Inspect unit, connections and all gaskets and clamps (if applicable) for leaks. Check water level at specific time intervals per local code.

## GENERAL INSTALLATION INSTRUCTIONS

Schier grease interceptors do not require an external flow control system or air intake vent. Schier grease interceptors are not to be installed in any other manner except as shown. Consult local codes for separate trapping requirements, cleanout locations and additional installation instructions.

- Set unit on level solid surface as close as possible to fixtures.
- Connect outlet diffuser to the desired outlet (A,B,C). Unit is shipped with the outlet diffuser in location B and sealing caps on locations A and C.
- Connect inlet and outlet drainage lines to unit. Mechanically couple pipes to unit. **Do not solvent weld.**
- For units with cast iron covers, remove retainer clips prior to burial.

**NOTE:** Do not install below a hydrostatic slab.

## BELOW GRADE INSTALLATION INSTRUCTIONS

### EXCAVATION

- Surrounding soil must be undisturbed soil or well compacted engineering fill.
- Width and length of excavation shall be a minimum of 12" greater than the tank on all sides and depth shall be 6" deeper than tank bottom.
- Set the tank level on a 6" deep layer of well-packed crushed aggregate material and connect waste piping per General Installation Instructions.

## ENGINEER SPECIFICATION GUIDE

Schier Great Basin™ grease interceptor model # GB-250 shall be lifetime guaranteed and made in USA of seamless, rotationally-molded polyethylene. Interceptor shall be furnished for above or below grade installation. Interceptor shall be certified to ASME A112.14.3 (type C) and CSA B481.1, with field adjustable riser system, built-in flow control, built-in test caps and three outlet options. Interceptor flow rate shall be 100 GPM. Interceptor grease capacity shall be 1,076 lbs. Cover shall provide water/gas-tight seal and have minimum 16,000 lbs. load capacity.

## CERTIFIED PERFORMANCE

Great Basin hydromechanical grease interceptors are third party performance-tested and listed by IAPMO to ASME #A112.14.3 and CSA B481.1 grease interceptor standards and greatly exceed requirements for grease separation and storage. They are compliant to the Uniform Plumbing Code and the International Plumbing Code.

## OPTIONS:

- 4" Male Thread Inlet/Outlet
- H2O Load Rated Pickable Cast Iron Covers
- Integral Membrane Clamping Collar Kit
- Pumpout Port (Large)
- High Water Anchor Kit

## TeleGlide Field Adjustable Riser System

- SR24 (x2) 5" - 23"
- LR24 (x2) >23" - 38"
- SR24 (x4) >38" - 43"
- SR24 (x2) + LR24 (x2) >43" - 58"
- LR24 (x4) >58" - 72"

## BACKFILL

- Preparation of sub grade per geotech recommendations.
- Stabilize and compact sub grade to 95% proctor.
- Fill unit with water before backfilling to stabilize unit and prevent float-out during backfilling. Secure covers and risers (if necessary) to the unit.
- Backfill evenly around tank using crushed aggregate (approximately 3/4" size rock or sand, with no fines), or flowable fill. **Do not compact backfill around unit.**

## FINISHED CONCRETE SLAB

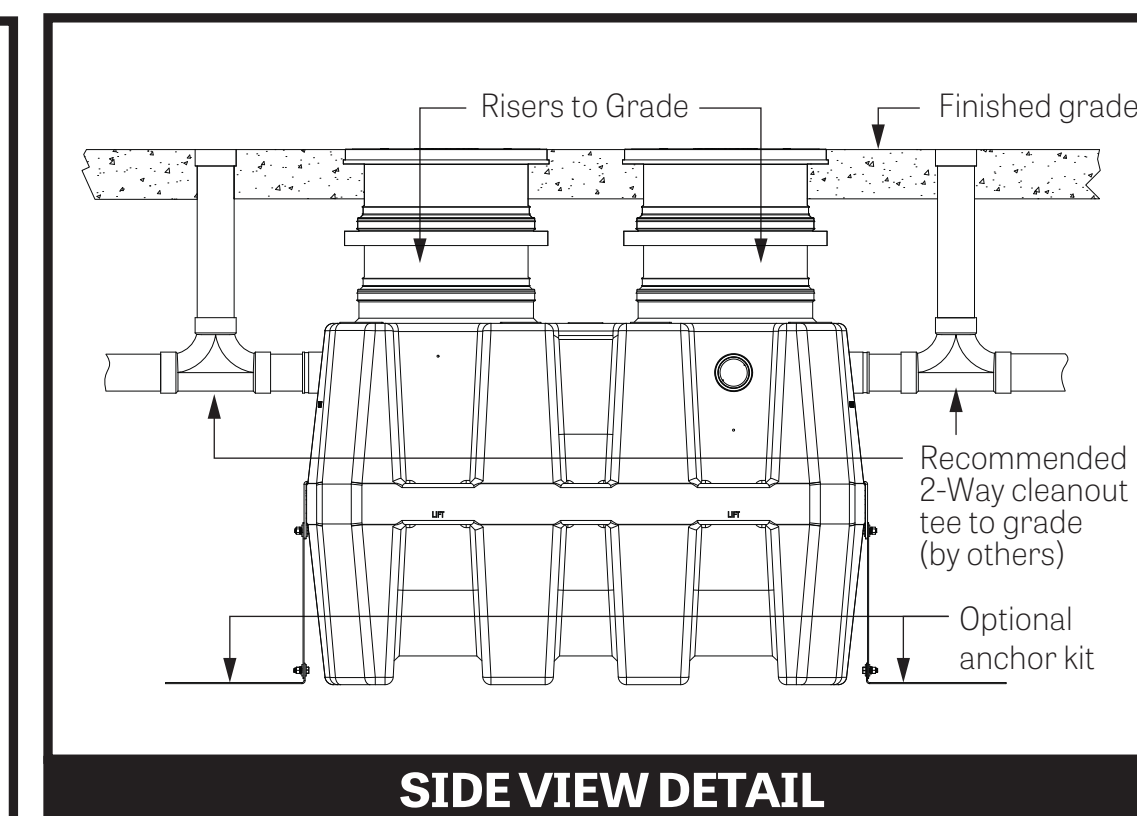
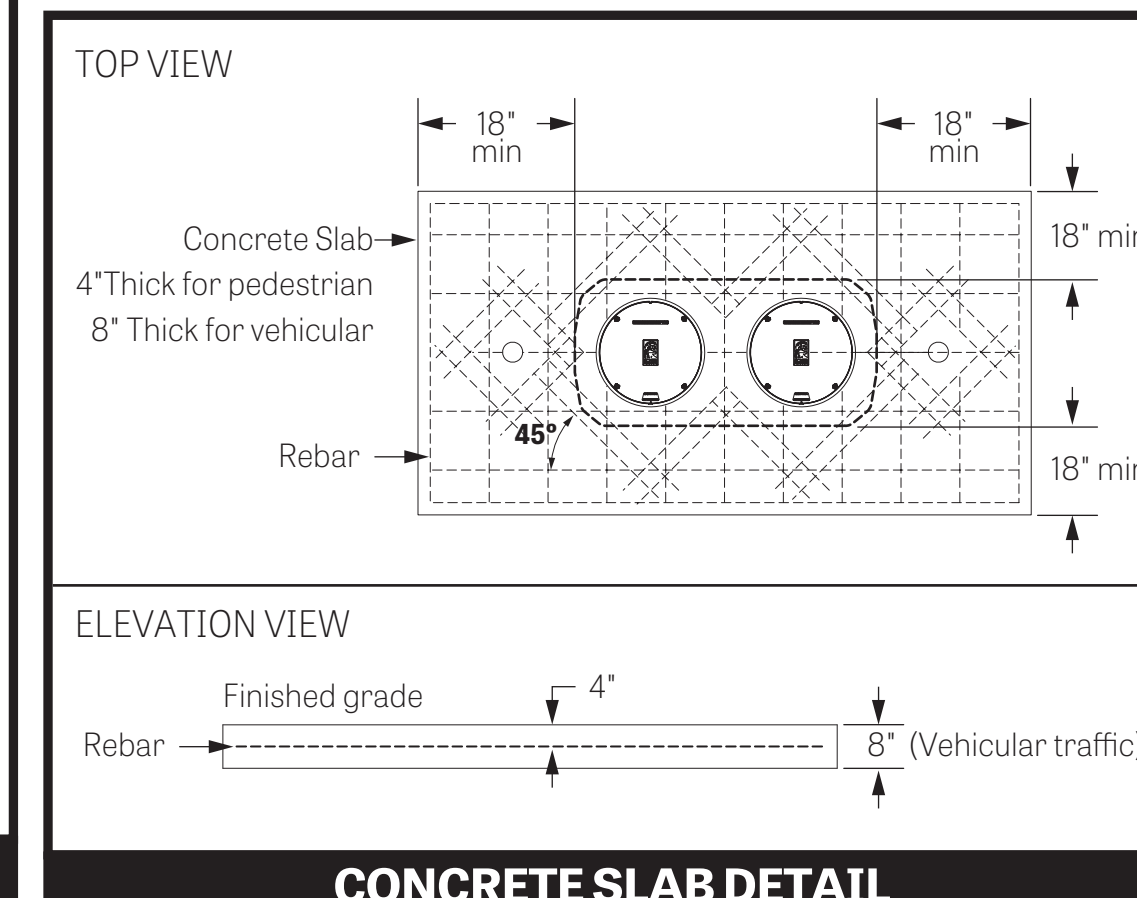
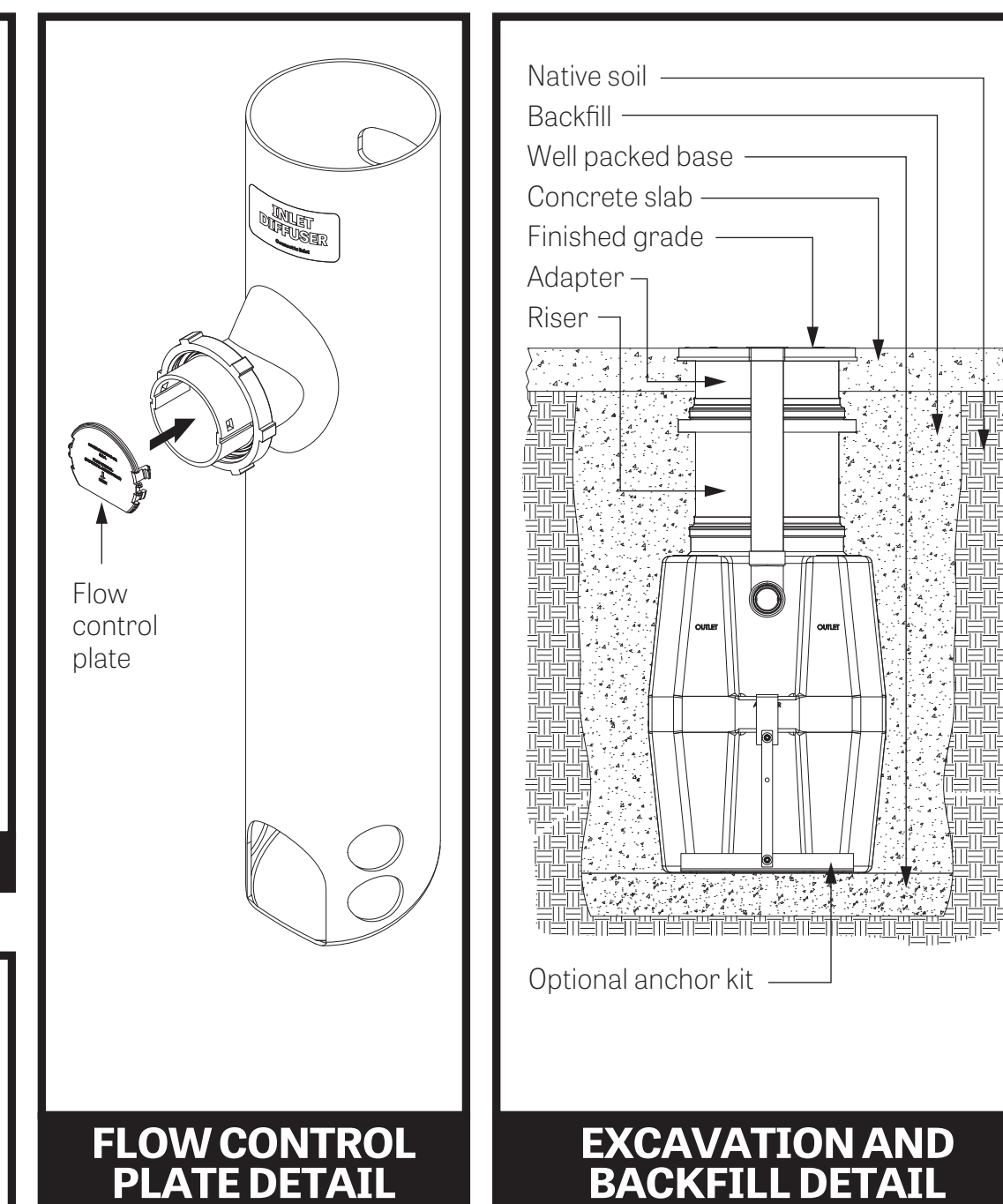
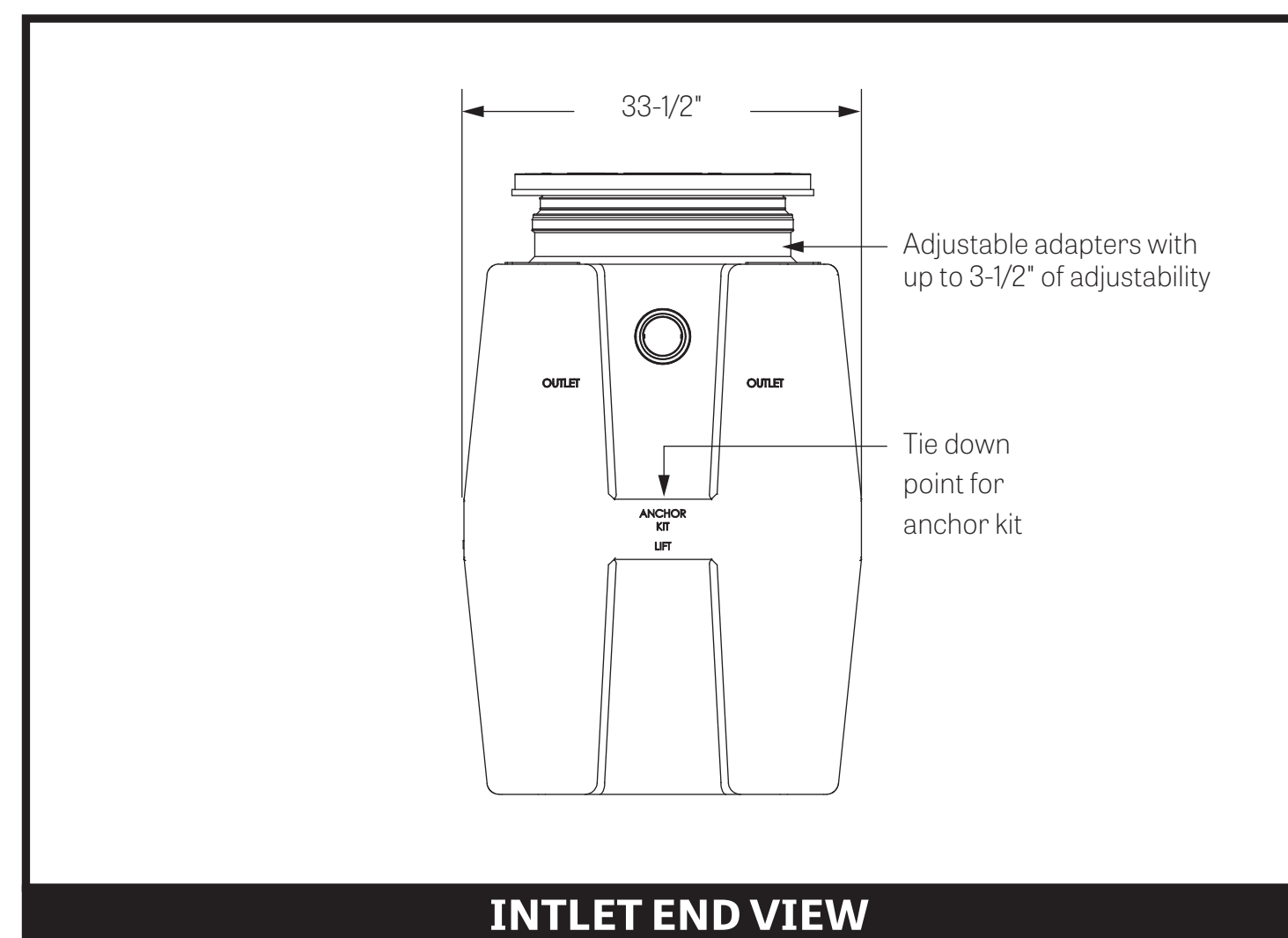
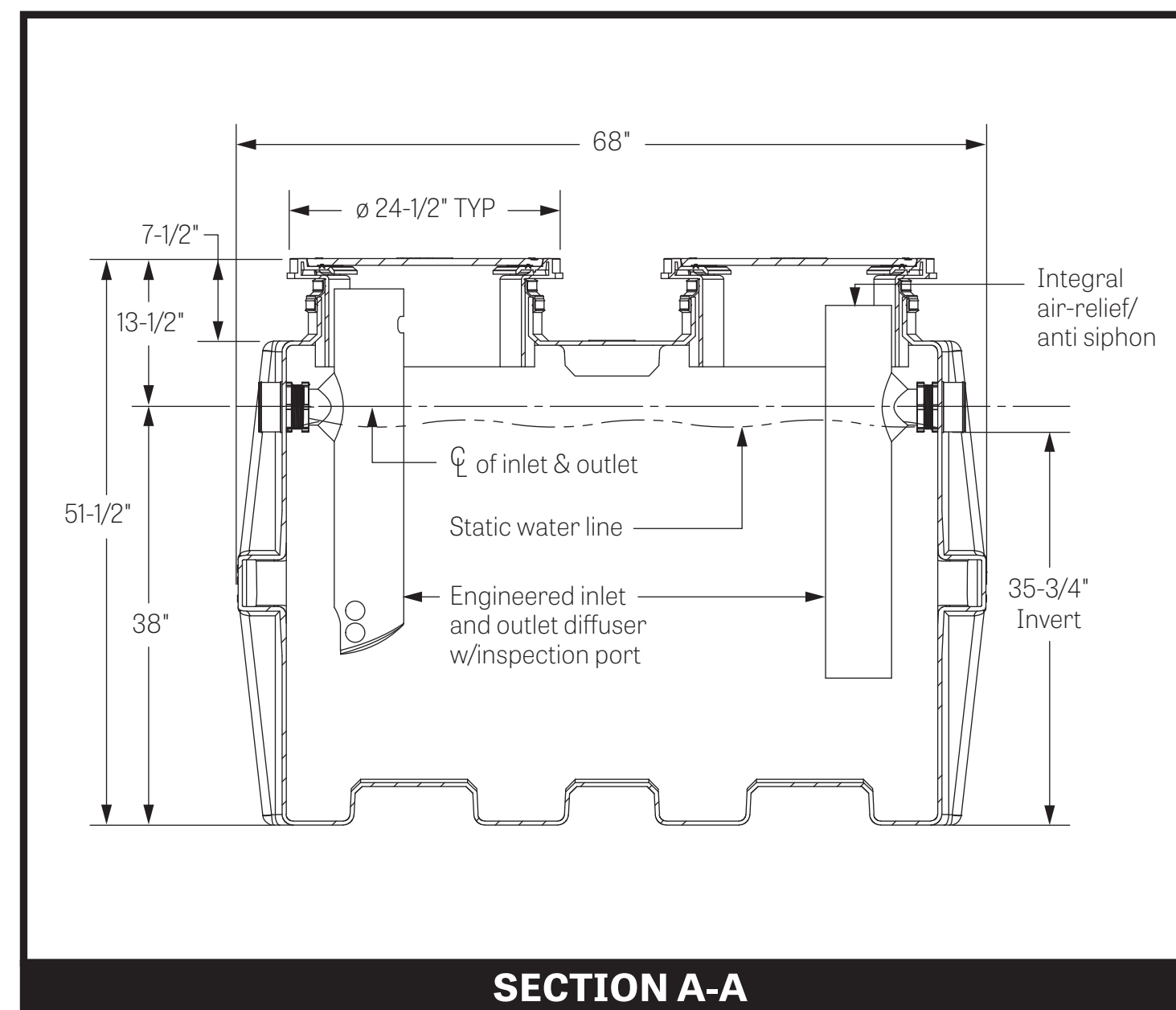
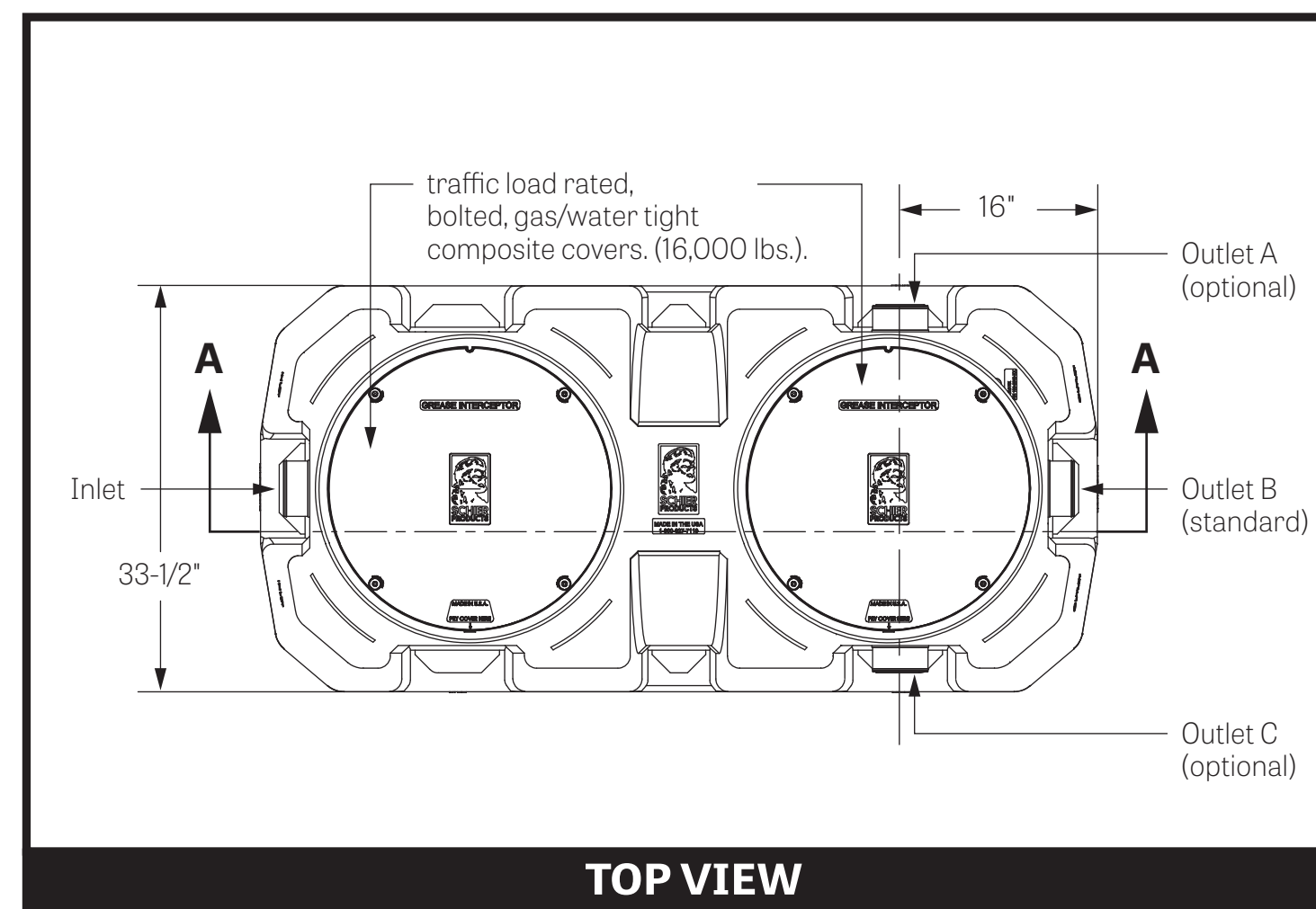
Slab must extend 18" minimum outside the unit footprint.

**Pedestrian traffic or greenspace areas:** 4" Thick reinforced concrete slab required.

**Vehicular traffic areas:** Minimum 8" Thick concrete slab with rebar required; final thickness of concrete around cover to be determined by specifying engineer. If traffic loading is required the concrete slab dimensions shown are for guideline purposes only. Concrete to be 28 day compressive strength to 4,000 PSI. Use NO. 4 rebar (ø 1/2") grade 60 steel per ASTM A615; connected with tie wire. Rebar to be 2-1/2" from edge of concrete and spaced in a 12" grid with 4" spacing around access openings.

## FOX METRO WATER RECLAMATION DISTRICT NOTES:

- Retrofit installations: A minimum of 42" of cover and a minimum of 1.00% slope is required for all exterior 4" and 6" piping.
- All pipe connections to the unit shall be made with non-shear couplers.
- Pipe type(s) installed upstream and downstream of unit as per the approved plan.
- Only CA-7 Class 1A stone shall be used 0'-6" under and 1'-0" over upstream and downstream sewers.
- Installation of Great Basin units indoors allowed only with written consent of Fox Metro Water Reclamation District. Great Basin models with 4" connections may be installed outside if the unit lies entirely within the 10-foot perimeter of building. If installed outside, and beyond 10-foot perimeter of building, Great Basin model must have approved 6" connections.



9500 Woodend Road  
Edwardsville, KS 66111  
Tel: 913-951-3300  
Fax: 913-951-3399  
[www.schierproducts.com](http://www.schierproducts.com)

MODEL NUMBER:  
**GB-250-FM4**

PART #: 4055-XXX-XX

DESCRIPTION:  
Polyethylene High Capacity Grease Interceptor  
100 GPM - 275 gallon capacity

DWG BY: B. Karrer

DATE: 10/13/2017

REV: 3

ECO:

© Copyright 2017 Schier, All Rights Reserved