

WILDEN
SOUND SHIELD™

Engineering Operation & Maintenance



WILDEN®
A **DOVER** COMPANY

CALL 1-800-577-8111 FOR SALES AND SUPPORT

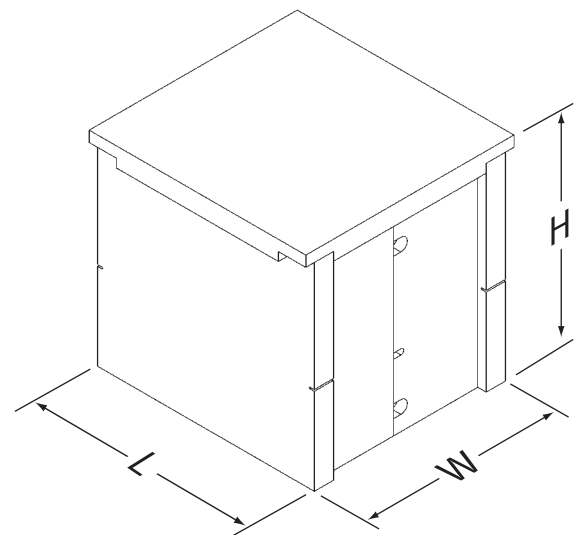
**ALL
SIZES**
**For All
AODD
Pumps**

SECTION 3

WILDEN SOUND SHIELD™ - SIZING MATRIX

PUMP SIZE & MODEL		Sound Shield™ P/N
1/4"	1/4" Original Plastic	99-9080-99
	1/4" Original Metal	99-9080-99
	1/4" Unitec UA Plastic	99-9080-99
3/8"	3/8" Unitec UX Plastic	99-9080-99
	3/8" Unitec UA Plastic	99-9080-99
1/2"	1/2" Original Plastic	99-9081-99
	1/2" Advanced Plastic	99-9081-99
	1/2" Ultra-Pure II Plastic	99-9081-99
	1/2" P.050 PTFE	99-9081-99
	1/2" Original Metal	99-9081-99
	1/2" Saniflo FDA Metal	99-9081-99
	1/2" Unitec UX Plastic	99-9081-99
	1/2" Unitec UA Plastic	99-9081-99
3/4"	1/2" Unitec UH Plastic	99-9082-99
	3/4" Unitec UX Plastic	99-9081-99
	1" Original Plastic	99-9082-99
	1" Advanced Plastic	99-9082-99
1"	1" Original Metal	99-9082-99
	1" Saniflo FDA Metal	99-9082-99
	1" Saniflo 3A Metal	99-9084-99
	1" Unitec UA Plastic	99-9082-99
	1" Unitec UH Plastic	99-9082-99
	1 1/4" Unitec UX Plastic	99-9081-99
1 1/2"	1 1/2" Original Plastic	99-9084-99
	1 1/2" Advanced Plastic	99-9084-99
	1 1/2" Original Metal	99-9083-99
	1 1/2" Advanced Metal (aluminum)	99-9084-99
	1 1/2" Advanced Metal (stainless)	99-9084-99
	1 1/2" Stallion Metal	99-9083-99
	1 1/2" High Pressure Simplex	99-9084-99
	1 1/2" Saniflo FDA Metal	99-9083-99
	1 1/2" Unitec UA Plastic	99-9083-99
	1 1/2" Unitec UH Plastic	99-9084-99
2"	2" Original Plastic	99-9085-99
	2" Advanced Plastic	99-9085-99
	2" Original Metal	99-9084-99
	2" Advanced Metal (aluminum)	99-9085-99
	2" Advanced Metal (stainless)	99-9085-99
	2" Stallion Metal	99-9085-99
	2" High Pressure Duplex	Consult factory for quote
	2" Saniflo FDA Metal	Consult factory for quote
	2" Saniflo USDA Metal	Consult factory for quote
	2" Saniflo LSH Metal (vertical)	Consult factory for quote
2" Saniflo LSH Metal (horiz.)	Consult factory for quote	
3"	2" Unitec UA Plastic	99-9083-99
	3" Original Plastic	99-9085-99
	3" Advanced Plastic	Consult factory for quote
	3" Original Metal	99-9085-99
	3" Advanced Metal (aluminum)	Consult factory for quote
	3" Advanced Metal (stainless)	99-9085-99
	3" Stallion Metal	Consult factory for quote
	3" Saniflo FDA Metal	Consult factory for quote
4"	3" Saniflo LSH Metal (vertical)	Consult factory for quote
	3" Saniflo LSH Metal (horiz.)	Consult factory for quote
4" Original Metal	Consult factory for quote	

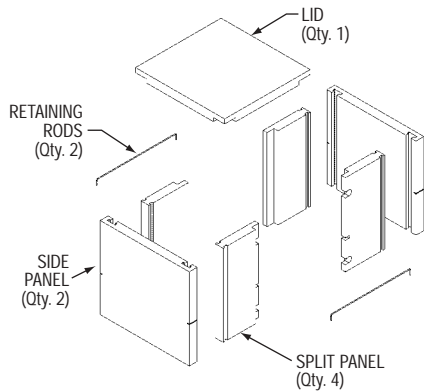
DIMENSIONS	
INTERNAL	EXTERNAL
99-9080-99	
LENGTH: 241 mm (9.5") WIDTH: 216 mm (8.5") HEIGHT 216 mm (8.5")	LENGTH: 404 mm (15.9") WIDTH: 378 mm (14.9") HEIGHT 274 mm (10.8")
99-9081-99	
LENGTH: 343 mm (13.5") WIDTH: 318 mm (12.5") HEIGHT 381 mm (15.0")	LENGTH: 483 mm (19.0") WIDTH: 480 mm (18.9") HEIGHT 439 mm (17.3")
99-9082-99	
LENGTH: 351 mm (13.8") WIDTH: 432 mm (17.0") HEIGHT 445 mm (17.5")	LENGTH: 513 mm (20.2") WIDTH: 594 mm (23.4") HEIGHT 503 mm (19.8")
99-9083-99	
LENGTH: 483 mm (19.0") WIDTH: 457 mm (18.0") HEIGHT 566 mm (22.3")	LENGTH: 645 mm (25.4") WIDTH: 620 mm (24.4") HEIGHT 625 mm (24.6")
99-9084-99	
LENGTH: 572 mm (22.5") WIDTH: 546 mm (21.5") HEIGHT 724 mm (28.5")	LENGTH: 734 mm (28.9") WIDTH: 709 mm (27.9") HEIGHT 782 mm (30.8")
99-9085-99	
LENGTH: 686 mm (27.0") WIDTH: 584 mm (23.0") HEIGHT 914 mm (36.0")	LENGTH: 848 mm (33.4") WIDTH: 747 mm (29.4") HEIGHT 973 mm (38.3")



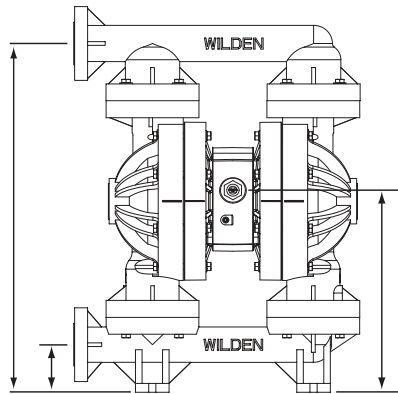
Assembled View of Sound Shield™

SECTION 4

WILDEN SOUND SHIELD™ - INSTALLATION

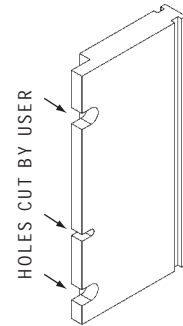


Exploded View of Sound Shield



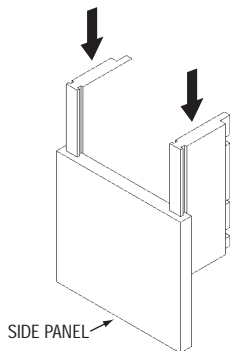
Step 1:

Measure the height and diameter of inlet pipe, discharge pipe, and air inlet hose.



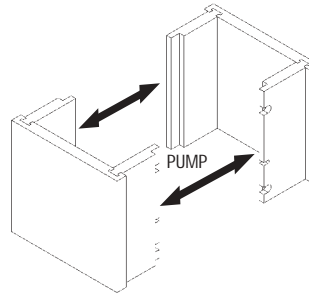
Step 2:

Using the information from Step 1, mark corresponding locations and size of the piping on the appropriate split panels. Depending upon how the pump has been plumbed it may only require one set of split panels to be cut. The piping clearance holes may then be cut. The foam is easily cut with a knife or similar sharp instrument. A template to cut plumbing holes has been supplied and is printed on the product box.



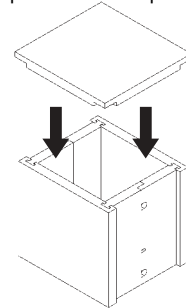
Step 3:

Assemble two of the split panels to each side panel by sliding the "T" tongue of the split panel into the corresponding groove of the side panel. The side panel does not have a specific top or bottom.



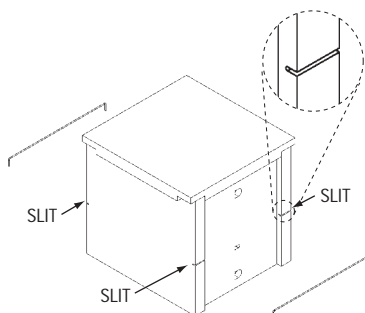
Step 4:

Place the two assemblies around the pump and align the cut-out with piping. Ensure that the Sound Shield sits firmly on the floor to maximize sound reduction.



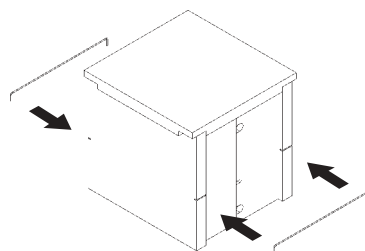
Step 5:

Simply push top onto the sides. This is a press-fit, which in most applications will stay in place. If your application requires additional security, a few self-tapping, coarse screws can be used (user supplied).



Step 6:

Cut two 1/2" deep slits on each side panel as shown. It is best if these are located towards the bottom but still be between the piping.



Step 7:

Push retaining rods into slits. Proper installation of the retaining rods is important to ensure maximum reduction of sound.



Final Assembly:

SECTION 5

WILDEN SOUND SHIELD™ - PERFORMANCE

To illustrate the effectiveness of the Sound Shield™, Wilden® tested a few different pump sizes with and without the Sound Shield™ fitted around a pump. These results are shown in the tables below. The sound levels recorded in these tables were obtained using a sound level meter located one meter from the pump and one meter from the floor. To further ensure accuracy, readings were taken in a sound proof room. Actual results will vary depending upon pump size, materials of construction, application parameters, and site location.

P1/PPPP/TF/TF/KTV 13 mm (½") plastic with Teflon® elastomers

PRESSURE (PSIG) (AIR INLET/DISCHARGE HEAD)	SOUND LEVEL IN dBA WITHOUT SOUND SHIELD™	SOUND LEVEL IN dBA WITH SOUND SHIELD™
100 / 0	96.9	74.2
100 / 50	94.7	72.5
80 / 30	86.5	71.3
40 / 20	81.7	66.2

P2/APPP/BN/BN/ABN 25 mm (1") metal with Buna-N elastomers

PRESSURE (PSIG) (AIR INLET/DISCHARGE HEAD)	SOUND LEVEL IN dBA WITHOUT SOUND SHIELD™	SOUND LEVEL IN dBA WITH SOUND SHIELD™
100 / 0	95.2	81.0
100 / 50	92.9	79.7
80 / 30	90.8	77.9
40 / 20	81.9	70.8

P400/PPPP/TF/TF/KTV 38 mm (1 ½") plastic with Teflon® elastomers

PRESSURE (PSIG) (AIR INLET/DISCHARGE HEAD)	SOUND LEVEL IN dBA WITHOUT SOUND SHIELD™	SOUND LEVEL IN dBA WITH SOUND SHIELD™
100 / 0	97.0	83.5
100 / 50	94.0	83.0
80 / 30	92.0	81.0
40 / 20	88.0	77.0

P15/SAAP/WF/WF/WF 76 mm (3") metal with Wil-Flex™ elastomers

PRESSURE (PSIG) (AIR INLET/DISCHARGE HEAD)	SOUND LEVEL IN dBA WITHOUT SOUND SHIELD™	SOUND LEVEL IN dBA WITH SOUND SHIELD™
100 / 0	87.2	78.5
100 / 50	84.1	73.3
80 / 30	84.0	75.7
40 / 20	78.6	69.0

ADVANCED™ S E R I E S

UNITEC™ S E R I E S

Advance Your Process

- Advanced wetted path designs
- Lower the cost of operation
- Maximize product containment
- Longer MTBF (Mean Time Between Failures)
- Enhanced internal clearance
- The result of advanced thought

Enrich Your Process

- Simplicity of design
- Unique Technology
- Reliable, leak-free & quiet
- Validated & certified
- Intrinsically safe
- The result of unique thought

SANIFLO™ S A N I T A R Y P U M P T E C H N O L O G Y

ULTRAPURE™ T E F L O N P R O C E S S P U M P S

Refine Your Process

- Designed for sanitary applications
- Minimize product degradation
- Improved production yields
- Easy to inspect, clean & assemble
- Minimized water requirements
- The result of progressive thought

Optimize Your Process

- Validated & certified
- Clean room assembled
- Low particle count
- Compact, efficient & quiet
- Runs on clean-dry air
- The result of pure thought

ORIGINAL™ S E R I E S

ACCESSORIES

Simplify Your Process

- Long standing design simplicity
- Portable & submersible
- Variable connection options
- Fewest parts in industry
- Solutions since 1955
- The result of original thought

Maximize Your Process

- Electronic control & monitoring
- Level control & containment
- Pulsation dampening
- Drum unloading systems
- Complete system solutions
- The result of innovative thought

WILDEN®

A DOVER COMPANY



Your Local Authorized Distributor: