



Serving the Marine industry for over 50 Years.





# TO OUR CUSTOMERS, TRADING PARTNERS AND FRIENDS,

Raritan customers like to ask questions and they range from the simple to the very complex. The challenge in this catalog is to present enough information to shed light on the simple yet still offer a path to understanding the complex. We show our product line in a simplified fashion and suggest where to seek additional information from our website or customer service personnel. To print a catalog containing 57 years' worth of revisions to the PH manual would have been cumbersome and not of much interest to someone who is just buying their first PH. For those unfamiliar, the PH was the manual Marine head on which Raritan Engineering Company, Inc. was started in 1958.

Whether you are seeing this catalog in booklet format or seeing a virtual copy on our website, it's helpful to know the additional information on products and parts are available on the website. If you cannot find what you want, please call our customer service representatives and they can help you find what you need. As a company we believe you should be able to get the information necessary to use and maintain your Raritan product. We go to great lengths to ensure that you can get that information. Our employees are our greatest asset and they know that outstanding customer service is what keeps customers coming back.

In the past year we have made an effort to update the Marine head and we have designed slow close seats for both Marine size bowls and Household size bowls with special feature of stoppers that prevents seats from sliding sideways. Because the Marine environment is harsh, fasteners tend to corrode. There are no exposed fasteners to corrode on our slow close seats. It may seem like a simple thing but boat owners who have struggled to keep seats functional and clean will recognize the importance of such a simple thing.

We have also made improvements to our PH head, now dubbed the PH SUPERFLUSH. Changes have been made to allow direct and fast replacement of competitors' heads to provide effortless pumping. This is an example of our efforts at continuous improvement that is driven by customer requests.

Don't overlook plumbing fittings and valves from our partner Tru-Design. These fittings are extremely costeffective, durable and can be installed to meet ABYC standards.

We have made a number of improvements to other Raritan products. Our 87 Icemaker for example has several improvements. Fresh head has been improved to make it more reliable and operation more intuitive. PSTEX (Purasan) system now has substantial improvements as a result of the growing number of applications and the feedback users have provided us.

We welcome any suggestions you may have for product improvements and for the support we provide for our products.

Wishing you wonderful boating seasons in coming years,

Arthur J. "Bret" Bretnall, Jr.

President





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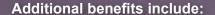


# PH SUPERFLUSH



As a premier manufacturer of marine products, Raritan Engineering Co. Inc, is proud to introduce its latest product offering, the PH SuperFlush. Our latest configuration helps customers easily switch from competitive models and begin taking advantage of the robust and dependable design of our world renowned PHII pump. Every unit is individually assembled and tested by hand in the USA.

- Upgrading to PH SuperFlush is fast and easy! Mounting base configuration matches the bolt pattern used on most competitive toilets.
- Clear the bowl with less strokes! Our robust double-action piston pump is 66% larger than competitive models making its use quick, easy and efficient.
- Trouble free operation! Proprietary full size 1½" joker valve is specially designed to maintain pump performance.



- Effortless Pumping! Powerful telescopic lever style handle makes pumping a breeze, even in the most challenging plumbing installations.
- Superior strength! Our engineered polymer pump construction is the strongest on the market.
- Slow close seats! Prevents annoying seat slamming and includes a unique feature that locks the seat in place while boat is rocking.

All units have a dry flush option and may be mounted above or below the waterline. Reversible pump mounting available for left hand operation.

Available in both Marine and Household bowl sizes.

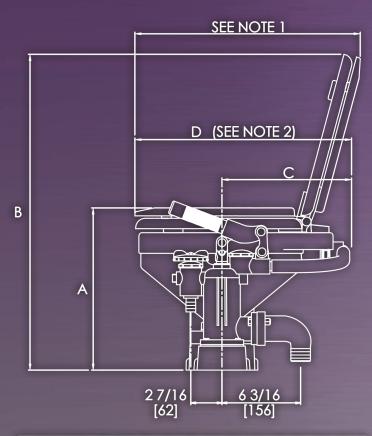
Prefer to use your old bowl and seat? Retrofits are available – see reverse for part# details.

Most items are in stock and available to ship within 24 hours.





# **DRAWINGS:**

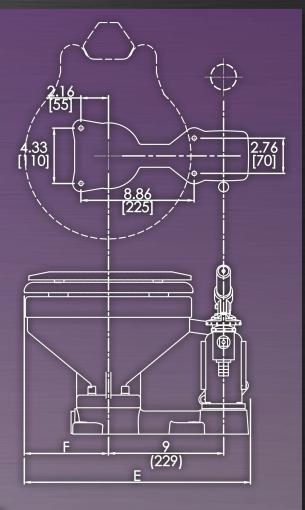


BOWL TYPE	Α	В	С	D	E	F
MARINE	13	24 3/4	10 3/8	17 1/4	17 3/4	6 1/2
	(330)	(629)	(264)	(438)	(451)	(165)
HOUSEHOLD	13 1/8	27 7/8	11 1/2	20	18 1/4	7
	(334)	(708)	(292)	(508)	(464)	(179)

INCHES (MM)

# **PLUMBING:**

Maximum Lift	4' (1.2m)
Max Discharge Loop Height	15' (4.6m)
Inlet Port Size	3/4"
Discharge Port Size	1 1/2"



### NOTE:

1. THE SEAT WILL OPEN WITHIN THE DEPTH OF THE BOWL (D), HOWEVER, IT MAY BE DESIRABLE TO INCREASE THIS ANGLE
BY ALLOWING MORE ROOM AT THE BACK OF THE BOWL FOR
THE SEAT TO OPEN.

2. MARINE STYLE BOWL, D DIMENSION IS 17 3/8 [442MM]
WITH HANDLE EXTENDED.

3. DIMENSIONS ARE FOR REFERENCE AS VITREOUS CHINA

DIMENSIONS MAY VARY +/- 5%.

# **ORDERING INFO:**

P101 = Marine size bowl and slow close seat

P102 = Household size bowl and slow close seat

P103 = Lower base assembly, pump and base ONLY

# **Manual Toilets**

# FRESH HEAD

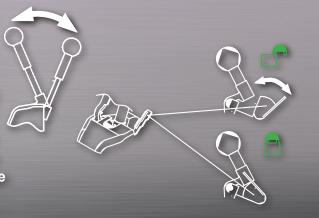
# TIRED OF ROTTEN EGG SMELL OR **USING YOUR SHOWER HEAD TO** FLUSH THE TOILET?

- The first manual marine toilet to utilize pressurized fresh water – eliminates calcium deposits in discharge hose
- Footprint is a direct replacement for competitive models
- No Thru Hulls necessary when installed with a holding tank
- Low water use toilet
- Available as left hand side pump
- PHII toilets can be retrofitted by purchasing the retro-fit pump #2500RFK





With a diaphragm type pump and telescopic handle, flushing is extremely easy. Owners choose how much water to use. A lever allows water into the bowl to pre-wet it for a better flush. A built-in freshwater backflow prevention includes a vacuum break. A lock-out feature stops backflow coming in through the discharge when not in use.

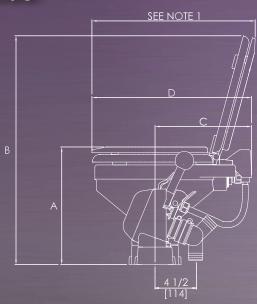




# **PLUMBING:**

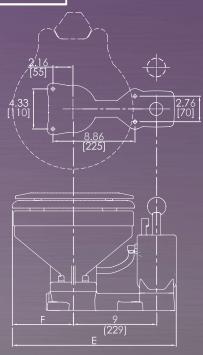
	Pump Model
Max Discharge Loop Height	15' (4.6m)
Minimum Pressure/Flow (inlet water)	3 GPM (11L) @ 10 psi (.69 bar)
Maximum Pressure (inlet water)	15 psi (10.3 bar)
Inlet Port Size	1/2"
Discharge Port Size	1 1/2"

# **DRAWINGS:**



BOWL TYPE	Α	В	С	D	E	F
MARINE	13	24 3/4	10 3/8	17 1/4	17 3/4	6 1/2
	(330)	(629)	(264)	(438)	(451)	(165)
HOUSEHOLD	13 1/8	27 7/8	11 1/2	20	18 1/4	7
	(334)	(708)	(292)	(508)	(464)	(179)

INCHES (MM)



1. THE SEAT WILL OPEN WITHIN THE DEPTH OF THE BOWL (D), HOWEVER, IT MAY BE DESIRABLE TO INCREASE THIS ANGLE BY ALLOWING MORE ROOM AT THE BACK OF THE BOWL FOR THE SEAT TO OPEN.

2. DIMENSIONS ARE FOR REFERENCE AS VITREOUS CHINA DIMENSIONS MAY VARY +/- 5%.

# **ORDERING:**

Sample part #25M00 = Fresh Head with marine size bowl, right hand operation

Model	Bowl Size	Pump Location
25 Fresh Head	M Marine	00 Right Hand Operation
	H Household	00L Left Hand Operation



# **PHII and PHEII**

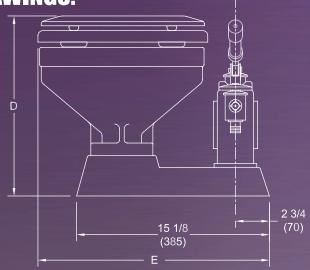
The most recognized and reliable manual toilets in the world. This manual design PHII is also available as our PHEII electric model.

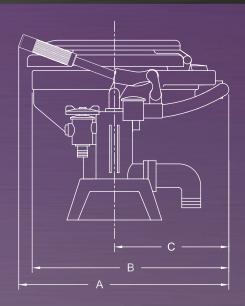
- · Electric model can be switched to manual operation within minutes
- · Available for 12 or 24V DC operation
- Lever handle pumping more efficient, simpler and cleaner than competing vertical piston pumps
- Powerful flushing action 66% larger diameter housing and piston clears bowl in less strokes
- Pump construction engineered polymer offers superior strength and durability over PVC
- Full size joker valve reduces clogs and increases pump performance
- Conserves water simple ¼ turn valve allows boaters to easily utilize dry pump option
- NEW retractable handle





# **DRAWINGS:**





BOWL TYPE	А	В	С	D	Е
MARINE	17 3/8 (442)	17 (432)	10 (254)	14 1/4 (362)	18 (458)
HOUSEHOLD	NA (SEE B)	20 (508)	11 1/2 (292)	14 1/2 (368)	18 1/4 (464)

inch (mm)

# **PLUMBING:**

Maximum Lift	4' (1.2m)
Max Discharge Loop Height	15' (4.6m)
Inlet Port Size	3/4"
Discharge Port Size	1 1/2"

# **ORDERING INFO:**

Sample part # PHII - Manual toilet, marine size bowl, second generation

Model	Operation	Bowl Size	Version	Voltage
PH	Manual	Marine	II Second Generation	12 12 V DC
	E Electric	HB Household		24 24 V DC
		CK Conversion Kit		

# **Electric Toilets**

# MARINE **Elegance**™

The first toilet in its class to offer:

- Quiet operation
- · Unmatched rinsing capabilities
- Low water consumption
- · Built in shredder reduces clogs
- · Can pump 10 ft vertically, or 100 ft horizontally

Our full size vitreous china bowl offers:

- One piece construction
- Full size toilet seat
- Compact installation
- Unique mounting system, simple installation, easy cleaning
- Reduced weight while adding additional support where needed

The Raritan Smart Toilet Control offers:

- Fully programmable, easy to use control
- · Attractive wall mount design
- · Flush using no water, little water, or timed flush
- · Optional lock out feature when tank is full

Marine Elegance bowls are available in four models: standard angled, standard straight, tall angled and tall straight. Each model is available in Bone or White.





# **FLUSH CONTROL:**



Smart Toilet Control and Water Saver modes Momentary operation to wet or empty the bowl.



Multifunction Momentary -Provides 3 momentary operations:

Fill, Empty and Flush.



Momentary Push Button -Simplest and most economical

# **Optional:**



Sea/Fresh Selector-Allows user to select from either on board freshwater or raw water. \*Flush Control required



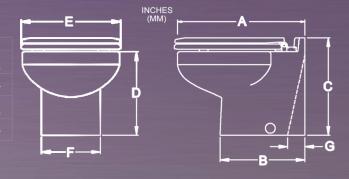


# **PLUMBING:**

	Pump Model	Pressurized Water Model
Maximum Lift (suction)	4' (122 cm)	
Max Discharge Loop Height	10' (3.0 m)	10' (3.0 m)
Minimum Pressure/Flow (inlet water)		3.5 gpm (13.2L) @ 10 psi (.69 bar)
Maximum Pressure (inlet water)		150 psi (10.3 bar)
Inlet Port Size	3/4"	1/2"
Discharge Port Size	1" or 1 1/2"	1" or 1 1/2"

# **DRAWINGS:**

BOWL TYPE	Α	В	С	D	E		
ME	18 3/8	12 1/4	14	12	14	8 1/2	2 1/8
ANGLED BACK	(467)	(311)	(355)	(305)	(355)	(216)	(54)
ME	18 3/8	12 1/4	14	12	14	8 1/2	NA
STRAIGHT BACK	(467)	(311)	(355)	(305)	(355)	(216)	
ME - TALL	18 3/8	12 1/4	17	15	14	8 1/2	2 1/8
ANGLED BACK	(467)	(311)	(432)	(380)	(355)	(216)	(54)
ME - TALL	18 3/8	12 1/4	17	15	14	8 1/2	NA
STRAIGHT BACK	(467)	(311)	(432)	(380)	(355)	(216)	



# **ORDERING:**

Sample Part Number #220HF012 = NOTE: Marine Elegance standard with angled back and pressurized fresh water in 12V with Smart Toilet Control For bidet option, contact Raritan.

Model	Bowl Height	Bowl Type	Color	Bowl Size	Water Source	Voltage	Control
2 - Elegance	2 - Standard	0 - Angled	White (STD)	H - Household	F - Pressurized Fresh Water	012 - 12V	Smart Switch (STD)
	3 - Tall	1 - Straight	A - Bone		R - Remote Intake Pump	024 - 24V	01 - Multifunction
					S - SeaFresh	012T - 120/240V	02 - Push Button
			1				

# **ELECTRICAL:**

	Pump Model	Pressurized Water Model
Amps Draw (12V/24V)	28/15	18/10
Circuit Breaker Size Amps (12V/24V)	30/20	25/15



# Atlantes Freedom Volume With Vortex-Vac

The Atlantes Freedom toilet features:

- Powerful vacuum without remote pumps
- Less water consumption with new fully programmable control
- Solid one piece porcelain bowl in traditional and elongated
- Easily installs above or below waterline on any vessel
- · Sturdy stainless steel handle
- Designed for commercial and recreational vessel applications
- Sea/Fresh model available, allows user to easily choose onboard or outside water
- 01 Models have a four function wall mounted switch including water saver, dry flush and normal flush
- 02 Models have momentary handle operation, no timer, offering flush and dry flush options
- 03 Models have flush handle with timed operation

# Vortex-Vac technology creates vacuum internally so no remote vacuum pump required.



# **FLUSH CONTROL:**



Smart Toilet Control -T and Water Saver modes Momentary operation to wet or empty the bowl.



Multifunction Momentary -Provides 3 momentary operations: Fill, Empty and Flush.



Handle Flush push backwards
to empty.

# **Optional:**



Sea/Fresh Selector-Allows user to select from either on board freshwater or raw water. \*Flush Control required

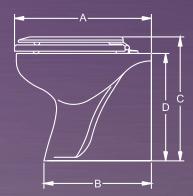




# **DRAWINGS:**

inch (mm)	BOWL TYPE	А	В	С	D	Е	F
	STANDARD	19 1/4 (489)	15 (381)	17 (432)	15 (381)	14 3/8 (365)	14 (355)
	ELONGATED	21 1/2 (545)	18 1/4 (465)	17 (432)	15 (381)	14 1/8 (359)	14 (355)





# **PLUMBING:**

	Pump Model	Pressurized Water Model
Maximum Lift (suction)	4' (122 cm)	
Max Discharge Loop Height	10' (3.0 m)	10' (3.0 m)
Minimum Pressure/Flow (inlet water)		3.5 gpm (13.2L) @ 10 psi (.69 bar)
Maximum Pressure (inlet water)		150 psi (10.3 bar)
Inlet Port Size	3/4"	1/2"
Discharge Port Size	1" or 1 1/2"	1" or 1 1/2"

# **ORDERING INFO:**

Sample Part Number # AVHWF01201= Household, white, Freshwater, thru floor, 12V, Smart Toilet Control

Model	Bowl	Color	Flush Water	Voltage	Control
AV Atlantes Freedom with Vortex Vac	H - Household	W - White	F - Freshwater Solenoid	012 - 12 V DC	01 - Smart Toilet Control (STC)
	L - Elongated	A - Almond	R - Remote Intake Pump	024 - 24 V DC	02 - Handle - Momentary
			S - Sea/Fresh	012T - 120/240 AC	03 - Handle - Timed (STC)
					04 - MultiFunction Momentary

# **ELECTRICAL**:

Units Voltage	Intake Pump Models Amp. Draw	Freshwater Solenoid Model Amp. Draw
12 VDC	20	11
24 VDC	10	5.5

# Electric Toilets 🔎

# SeaEra™

All in one powerful flush design locates the raw water and macerator pumps in a single, convenient location making installations quick and easy.

- Dual shafted motor separates intake and discharge functions providing a clean, reliable flush
- Self priming raw water intake pump can run dry without damage. No rubber impeller to burn out.
- Bowl can be rotated 90 degrees making it ideal for areas with limited space
- Slow close seat eliminates annoying slamming
- Low water usage as little as 1 quart per flush
- Stainless steel macerating blade
- Full size joker valve reduces clogs
- Heavy duty momentary push button switch included
- 90 degree and straight discharge fitting included
- Available in marine and household bowl sizes
- Two year warranty



**Bowl turned 90 degrees** 

# SeaEra™ Conversion Kit

- · An economical way to replace your electric or manual toilet
- Save the toilet bowl and seat just replace the lower base
- Three basic models (all include heavy duty push button)
- Pressurized freshwater includes solenoid valve and vacuum breaker
- Intake pumps can be run dry without damage





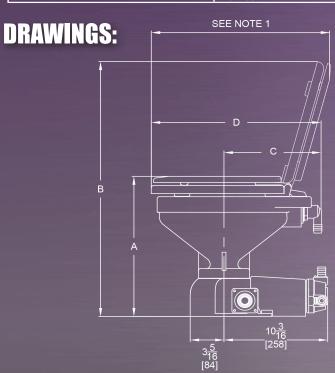


# **PLUMBING:**

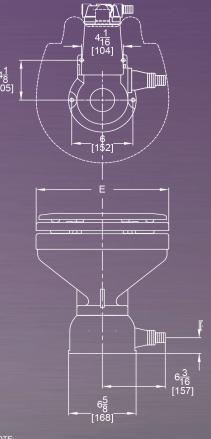
	Pump Model
Maximum Lift (suction)	4' (122 cm)
Max Discharge Loop Height	9' (274 cm) Vert./ 50' (15.2 m) Horiz.
Minimum Pressure/Flow (pressurized water)	
Inlet Port Size	3/4"
Discharge Port Size	1" or 1 1/2" Straight 1 1/2" 90°

# **ELECTRICAL:**

Amps Draw (12/24V)	23/12.5
Circuit Breaker Size Amps (12/24/32 V)	25/15/15
Integral Model Amps (12/24/32 V)	18/10/7.5



BOWL TYPE	А	В	С	D	E
MARINE	14 1/2	26 1/2	10 3/8	17 1/4	13
	(368)	(673)	(264)	(438)	(330)
HOUSEHOLD	14 7/8	29 5/8	11 1/2	20	14 3/8
	(378)	(752)	(292)	(508)	(365)



- NOTE:

  1. THE SEAT WILL OPEN WITHIN THE DEPTH OF THE BOWL (D), HOWEVER, IT MAY BE DESIRABLE TO INCREASE THIS ANGLE BY ALLOWING MORE ROOM AT THE BACK OF THE BOWL FOR THE SEAT TO OPEN.

  2. DIMENSIONS ARE FOR REFERENCE AS VITREOUS CHINA DIMENSIONS MAY VARY +/- 5%.

# INCHES (MM)

# **ORDERING INFO:**

Sample Part Number # 160MF012 = Marine size white bowl, pressurized fresh water, 12V, STC Control

Model	Bowl	Intake Water	Discharge Fitting	Voltage
160 Sea Era	L - Lower Base Conversion	I - Integral Intake Pump	0 - Straight and 90° both included	12 - 12 V DC
	M - Marine Bowl			24 - 24 V DC
	H - Household Bowl			12T - 120/240 AC



# SEA ERA

Straightforward design allows for a simple installation and quiet flush. Flush control options give users precise control over water usage.

# Freshwater Solenoid Model (162MF\* or 162HF\*)

- · Less maintenance & odors than raw water models
- · Connects to vessel's existing pressurized system
- · Built in water valve and vacuum breaker allows for easy installation

# **Remote Seawater Pump Model** (162MR\* or 162HR\*)

- · Self priming diaphragm pump can run dry without damage. No rubber impeller to burn out.
- · Remote seawater pumps allow for easy access and a more flexible installation.

**Fresh Water Model** 



**Remote Raw Water Model** 



**Remote Pump** 



# **Both Models:**

- Designed for quiet operation
- · Slow close seat eliminates annoying slamming
- Low water usage as little as 2 pints per flush
- Bowl can be rotated 90 degrees making it ideal for areas with limited space
- · Stainless steel macerator blade
- · Full size joker valve reduces clogs
- 90 degree and straight discharge fitting included
- · Available in marine and household bowl sizes
- · Available with Smart Toilet Control Maximizes flush efficiency with low water consumption and noise levels
- · Easily adapts to our SeaFresh model allowing the user to select between raw or freshwater
- Two year warranty

# Flush Control:



Smart Toilet Control and Water Saver modes Momentary operation to wet or empty the bowl.



Multifunction Momentary -Provides 3 momentary operations:

Fill, Empty and Flush.



Momentary Push Button -Simplest and most economical

# Optional:



Sea/Fresh Selector-Allows user to select from either on board freshwater or raw water. \*Flush Control required



# **ELECTRICAL:**

Amps Draw (12/24V)	23/12.5	13/7.5
Circuit Breaker Size Amps (12/24V)	25/15	25/15

# **PLUMBING:**

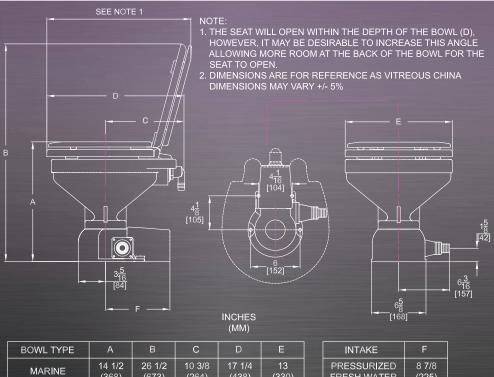
	Pump Model	Pressurized Water Model
Maximum Lift (suction)	4' (122 cm)	
Max Discharge Loop Height	9' (274 cm) Vertical / 50' (15.2 m) Horizontal	9' (274 cm) Vertical/ 50' (15.2 m) Horizontal
Minimum Pressure/Flow (pressurized water)		3.5 gpm @ 10 psi
Inlet Port Size	3/4"	1/2"
Discharge Port Size	1" or 1 1/2" Straight 1 1/2" 90°	1" or 1 1/2" Straight 1 1/2" 90 Degree

# **ORDERING INFO:**

Sample Part Number # 162MF012 = Marine size white bowl, pressurized fresh water, 12V, STC Control

Model	Bowl	Intake Water	Discharge Fitting	Voltage	Control
162 Sea Era	L - Lower Base Conversion	F - Pressurized Fresh Water	0 - Straight and 90° both included	12 - 12 V DC	None - Smart Toilet Control (STC)
- E	M - Marine Bowl	R - Remote Raw Water Pump		24 - 24 V DC	01 - Multifunction Momentary Control
	H - Household Bowl	S - Sea Fresh		12T - 120/240 AC	02 - Push Button Control





BOWL TYPE	Α	В	С	D	E
MARINE	14 1/2	26 1/2	10 3/8	17 1/4	13
	(368)	(673)	(264)	(438)	(330)
HOUSEHOLD	14 7/8	29 5/8	11 1/2	20	14 3/8
	(378)	(752)	(292)	(508)	(365)

INTAKE	F
PRESSURIZED FRESH WATER	8 7/8 (225)
REMOTE PUMP	7 13/16 (199)

# **Maste Treatment Systems**



# Raritan was the first company to develop a flow through system to treat sewage even prior to any legal requirements!

Δ

amount of treated sewage is discharged each time. Large discharges of raw sewage, which includes full holding tanks containing chemicals used to control odor, can be dangerous to the environment. Raritan' through system was simply a bottle of household bleach that was injected into the treatment tank each time the

Raritan far exceeds the Federal standard for waste discharge to help preserve our

through systems work differently but both Type I devices produced by Raritan far exceed the federal standard for discharge which is currently set at fecal coliform levels of less than 1000 per 100ml. Swimming beaches close when coliform levels exceed 200 per 100ml and



exceed 14 per 100 ml.



Both the Purasan and Electroscan discharge at levels lower than 10 per 100ml!



# **Purasanex**

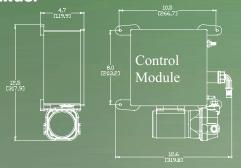
Improved design for all toilets and salt, fresh, or brackish water. Onboard sewage treatment device legal for use in any area not considered a Federal NDZ. Neutralizes waste, making it sanitary and safe for boaters and marine life.

### **Benefits**

- · New Control indicates when tablets are empty
- Dispenser can be mounted at any height
- Solution drains with air pump, lengthening tablet life
- No metering valve to control water, now fully programmable
- New tablet packaging eliminates hazmat fees



# **DRAWINGS:**



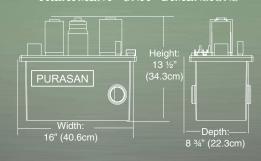
### **CONVERSIONS**

Wire - AWG to mm <sup>2</sup>								
AWG		14	12					2
mm²	1.5	2.5	4.0	6.0	10.0	16.0	25.0	35.0
Feet to Meters								
Feet	10	-1	5 :	20	25	30	40	50
Meter	3.1	4	.6	6.1	7.6	9.2	12.2	15.2

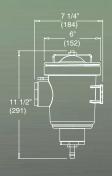
# SWITCH PANEL



### TREATMENT UNIT DIMENSIONS



TABLET DISPENSER DIMENSIONS



# **PLUMBING:**

Inlet / Outlet	1 1/2" / 1 1/2"
Maximum Flush Volume	1 1/2 gallons (5.7 L)

# **ELECTRICAL:**

Amps Draw (12/24V)	10/8
Circuit Breaker Size Amps (12/24 V)	20/15

# **ORDERING INFO:**

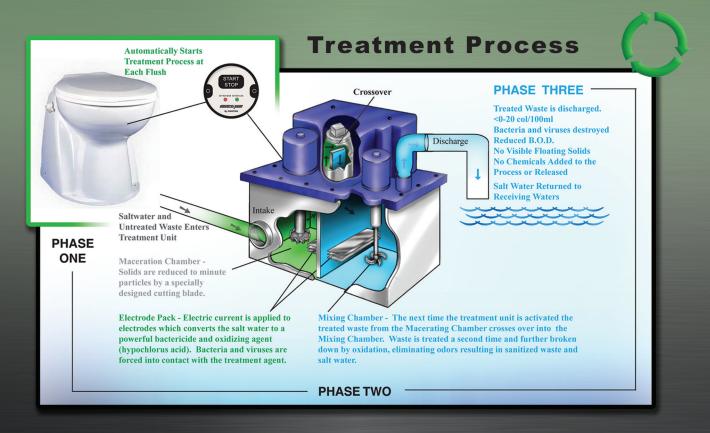
MUDEL	DESCUILLINK
PST12EX	PurasanEX, 12V, Type I MSD
PST24EX	PurasanEX, 24V, Type I MSD
41-135A	Replacement Purasan Tablets
A	40 04 V/ DO

Available in 12 or 24 V DC.



# <u>electro scan</u>

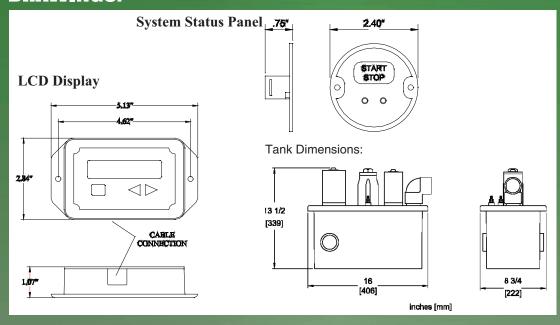
- The most popular USCG certified Type I MSD
- Power requirements have been reduced by 36 % each cycle uses only 1.2 amp hours of power
- Generates its own natural disinfectant from salt water
- Coated electrodes use salt water to kill bacteria and viruses without using harmful chemicals
- Records each treatment cycle and stores key information in non-volatile memory that can be summarized on the LCD display or downloaded to PC
- Single button operation is possible
- · Can be used with both manual and electric toilets
- · Requires sea water salinity or salt feed tank
- Available in 12, 24 or 32V DC
- Sensor for manual toilet available for auto start part# 31-605







# **DRAWINGS:**



# **PLUMBING:**

Inlet / Outlet	1 1/2" / 1 1/2"
Maximum Flush Volume	1 1/2 gallong (5.71)
Minimum Water Temp	50° F (10° C)

Sea water salinity or salt feed system needed.

# **ORDERING INFO:**

MODEL	DESCRIPTION
EST12	Electro Scan, Type I MSD, 12V
ESTDC	Electro Scan Dual Control
31-3005	Four Gallon Salt Feed Unit Complete
32-3005	Four Gallon Salt Feed Tank w/pump, 12V
32-700RFK	Upgrade from Lectra/San to Electro Scan 12V

# **ELECTRICAL**:

Amps Draw (12/24/32 V)	37/27/25
Circuit Breaker Size Amps (12/24/32 V)	60/50/50



# ManaGerm™

Complete onboard biological waste treatment system for up to 12 persons per day. Treats sewage biologically using air, water, and natural occurring bacteria.



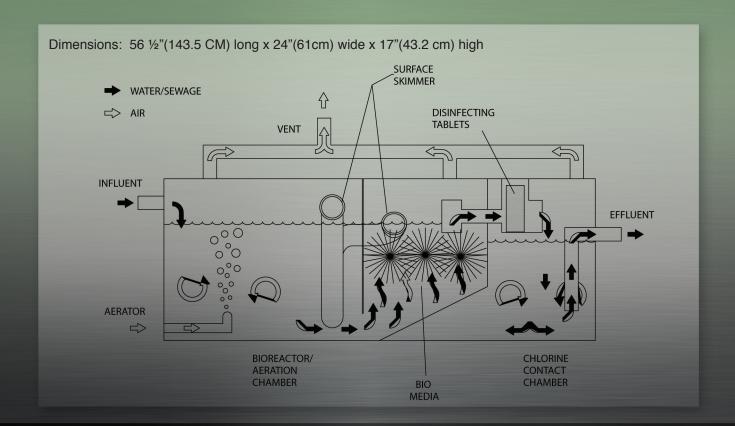
- USCG Certified Type II Marine Sanitation Device
- Tank made of lightweight corrosion resistant polyethylene
- Easy installation simple maintenance
- · No moving parts in contact with sewage
- Quiet, durable 120V AC aeration pump included
- · Uses very little electricity
- Operates with fresh, brackish and salt water
- For use on inspected and uninspected vessels
- Includes Bio-Starter, 10 lbs of tablets and five fittings
- Available with pump up kit for below water line installation
- Available for installation outside USA with nonhazardous (for shipping) P70 tablets, also 220v units

MODEL DESCRIPTION
6400121 Managerm 120V AC

Approximate Shipping weight: 172lbs (45 kg)

**6400121B** Managerm for below water line Installation

**6400122** Managerm 240V AC





# **Hold n' Treat System**

- A complete onboard waste management system
- Utilizes our best Type I & Type III MSD
- Satisfies legal requirements in all U.S. waters
- Complete "drop in place" system
- Ultimate flexibility with deck pump-out or treated sewage
- Operates with fresh, brackish and salt water
- Salt feed system required with Electroscan model when not using salt water to flush
- For use on inspected and uninspected vessels
- Available in 12 and 24 VDC Model

Hold N' Treat Controls are available separately to add to an existing holding tank and/or Type I MSD for ultimate flexibility.

Improved pressure sensor for determining tank level

**MODEL DESCRIPTION** 

21SR1512 Hold N' Treat system complete with Electroscan 21SRP1512 Hold N' Treat system complete with Purasan 12V

# **Semi-Custom Holding Tanks** nd Water Tanks

- The finest quality holding tanks
- Over 300 tanks to choose from, simply add the fittings you want, where you want them
  Our tanks are made of cross-linked polyethylene with 3/8"
- walls for increased protection from odor permeation Call Raritan Technical Service in NJ for assistance with your tank

The most flexible marine grade hose on the market. Odor Free and the lowest permeation level of any rubber or PVC hose.

- Flexible radius for tight bending and easy installation
- Reinforced double steel wire Helix with high strength synthetic textile yarn
- Cover is abrasion, ozone, seawater resistant rubber
- Smooth inside wall surface allows for a greater fit and seal during installation
- 5 year warranty against odor permeation

PART# SFH

SFH1

**DESCRIPTION** (AVAILABLE IN 50' OR 100' ROLLS)









# **MACERATOR PUMP**

# FEATURES OF THE RARITAN MACERATOR THAT SEPARATE IT FROM THE COMPETITION!



Optional Waste Valve Assembly isolates the waste matter from the pump during maintenance. This new feature allows you to remove the pump without disconnecting plumbing.

- · All stainless steel bolts to avoid corrosion problems
- Spring loaded Viton shaft seal is used to prevent premature leaks
- Our proprietary rubber impeller compound allows longer dry running time
- Macerator pump housing can be rotated in increments of 90 degrees to allow for left, right, or top discharge
- Same footprint as most competitive models



# ALSO AVAILABLE SMART MACERATOR CONTROL





# MONITORS MOTOR AND PUMP TO PREVENT DRY RUN AND OVERLOAD

SMC control has following features:

- Control will automatically shut down pump if unit does not prime or runs dry.
- SMC control can be reset by turning off and on switch. Power need not be turned off.
- If power is not turned off to the control, control will jog macerator pump for few milliseconds every seven days to prevent binding of impeller.
- If pump draws more than 20 amps, control will shut down pump.





# **SPECIFICATIONS:**

Pump:: Self priming Flexible rubber

impeller with Stainless steel wear plate

Impeller: Raritan Nitrile compound with wax

Blade: Stainless steel double cut

Seal: Viton Lip with 316 SS spring & case

Motor: Permanent magnet type, fully enclosed,

stainless steel shaft, thermal protection for overload, Powder coated housing

with sealed ball bearing

Ports: Inlet: 1-1/2" hose barb & 1-1/2" NPT Male

Outlet: 3/4" MNPT

Lead wires: 14 GA, Red and black Fuse: See wire size chart Duty Cycle: Intermittent duty only

Dimensions: See drawing

Weight: 5 lbs.

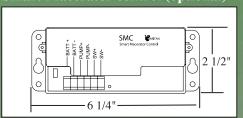
Approvals: Ignition protected, ISO 8846,

CE compliant available

HEAD VS	FLOW RATES		
Head	Flow	Max D0	C Amps
Ft [m]	gpm[lpm]	12V	24V
0 [0]	445403	40.0	<b>5</b> 4
0 [0]	11[42]	10.9	5.4
5 [1.5]	10.1[38]	11.1	5.6
10 [3]	9[34]	11.4	5.8
15 [4.6]	7.7[29]	11.8	5.9
20 [6.1]	6.4 [24]	12.3	6.2

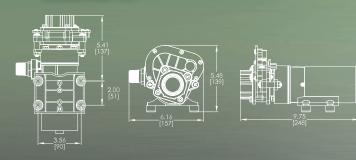
Maximum Operating Head = 30 feet

### **Smart Macerator control (optional)**

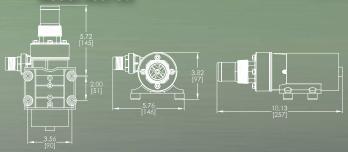


# **DRAWINGS:**

### Model #53101



### Model #53100



# **ORDERING:**

Sample part # 5310112 = Raritan macerator with wastewater valve in 12V DC.

Model	Discharge Adapter	Voltage
53 Raritan Macerator	100 Barb Fitting	12 12 V DC
	101 Wastewater Valve	24 24 V DC





# **MARINE COMPOSITE FITTINGS**

Exclusively distributed in the U.S by RARITAN

The most versatile Y-Valve on the market. Fittings are available in 90 and 120 degree as well as 1" and 1 1/2" hose barbs. Simply changing seals change hose barb orientation.

90314 Y Valve no tail pieces

90941 Y Valve Kit\* - Aquavalve incl 3x Straight 1½" Hose Barbs

90942 Y Valve Kit\* - Aguavalve incl 2x 120° & 1x Straight 1½" Hose Barbs

90541 Y Valve (Aquavalve) Hose Barb 11/2" x 11/2"

90298 Y Valve (Aquavalve) Hose Barb 120° 1 1/2" x 1½" - incl Blue Seal

90299 Y Valve (Aquavalve) Hose Barb 90° 1½" x 1½" - incl Blue Seal



90344 Y Valve (Aquavalve) - Electronic 12V EA015 & CP05 90346 Y Valve (Aquavalve) - Electronic 24V EA015 & CP05

### Y PIECE HOSE BARB ADAPTERS

90792 Y Piece 3/4"

90791 Y Piece 3/4"-3/4"-1"

90617 Y Piece 1"

90618 Y Piece 1"-1"-11/2"

90809 Y Piece 11/4"

90619 Y Piece 11/2"

# BALL VALVES/SEACOCKS

90659 Ball Valve ½" NPS

90660 Ball Valve 3/4" NPS

90661 Ball Valve 1" NPS

90662 Ball Valve 11/4" NPS

90663 Ball Valve 11/2" NPS

90664 Ball Valve 2" NPS

### **VENTED LOOPS**

90319 Vented Loop 19mm (3/4")

90321 Vented Loop 25mm (1")

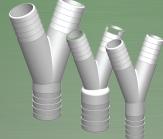
90323 Vented Loop 38mm (1½")

90325 Spare Parts Vented Loop

90467 Solenoid Valve 12V DC

90534 Solenoid Valve 24V DC











Solenoid Valve



### THRU-HULL & SEACOCK ASSY - ABYC H-27 COMPLIANT

90943 Seacock Assembly  $\frac{1}{2}$ " - Incl Thru-hull, Load Bearing Collar, Ball Valve & Straight Hose Barb

90944 Seacock Assembly  $\frac{3}{4}$ " - Incl Thru-hull, Load Bearing Collar, Ball Valve & Straight Hose Barb

90945 Seacock Assembly 1" - Incl Thru-hull, Load Bearing Collar, Ball Valve & Straight Hose Barb

90946 Seacock Assembly 1½" - Incl Thru-hull, Load Bearing Collar, Ball Valve & Straight Hose Barb

90947 Seacock Assembly 2" - Incl Thru-hull, Load Bearing Collar, Ball Valve & Straight Hose Barb

### BALL VALVES / SEACOCKS - POSITION MONITORED

90653	Ball Valve Position Monitored ½" NPS
90654	Ball Valve Position Monitored 3/4" NPS
90655	Ball Valve Position Monitored 1" NPS
90656	Ball Valve Position Monitored 1¼" NPS
90657	Ball Valve Position Monitored 1½" NPS
90658	Ball Valve Position Monitored 2" NPS

90412 Ball Valve Display Panel

# CHECK VALVES

90845	Check Valve	3/4"
90846	Check Valve	1"
90950	Check Valve	11/8'
90847	Check Valve	11/4"
90848	Check Valve	1½"
90849	Check Valve	2"

ADDITIONAL TruDesign PARTS AVAILABLE FROM RARITAN



THRU-HULL WITH HOSE BARB (FOR ABOVE WATERLINE)



HOSE BARB TO HOSE BARB 90° ELBOW ADAPTER



HOSE BARB STRAIGHT MALE THREADED



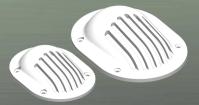
THRU-HULL FITTINGS & ACCESSORIES



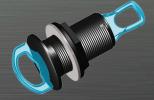
HOSE BARB TO HOSE BARB STRAIGHT ADAPTER



T - PIECE / MANIFOLD



SCOOP STRAINERS



THRU-HULL INSTALLATION TOOL



# **Rudder Master**

Make life easier with our economical steering aid and rudder positioning device. Each unit comes with all necessary components needed, along with calibration box and sending unit.

- Constant monitoring of rudder angle from 0 to 45 degrees
- Repeater units are available for multiple station readouts
- Protects your boat at docking and close maneuvering

# MK2 and MK3 Models

Spray proof (IP64)



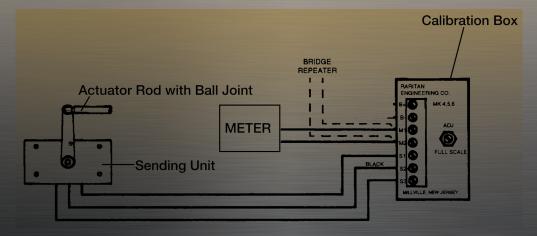




# MK5 and MK6 Models

Easy to read panoramic meter

We ship units with 30 ft. (9.1m) of wire. Any model can be ordered with longer wire, just ask. MK2 and MK3 units are the only units designed as true spray proof (IP64) meters. You will need to place meters away from wash down areas and protect against the elements.



# **Tank Monitors**





# **Tank Monitor**

The finest holding tank monitor. Available with easy-to-read tank level indicators. Monitors up to four tanks from one convenient location.

### EASE OF INSTALLATION:

- All parts are mounted outside of the tanks – eliminates need for special tank fittings
- · No internal probes or floats
- Flush-mounted indicator panel has a smooth surface (no protruding switches or gauge)



### **EASE OF USE:**

- Reliable electronic design perfected for the marine environment
- · Can be used with any polyethylene or fiberglass tank for fresh or waste water
- Easy to use
- No maintenance required
- Gold-plated connectors ensure consistent and trouble-free performance
- Low power consumption
- Available for 12, 24 or 32V DC installations

Width: 4 1/2"(11.4cm) Height: 2 1/4" (5.7cm)

PART # DESCRIPTION

**15100**\* Tank Monitor (\*12, 24 or 32 V)

**15101** Tank Sensor Module Kit

Note: NOT for use with metal tanks or fuel tanks.

Tank Monitor comes with face plate and material to monitor two tanks. Purchase a Tank Sensor Kit for each additional tank up to four tanks. Approximate Shipping Weight: 1 lbs (.45 kg)



RARITAN



# THE ONLY MARINE ICE MAKER SPECIFICALLY DESIGNED AND BUILT FOR THE RIGORS OF THE MARINE ENVIRONMENT.

# **FEATURES INCLUDE:**

- Improved controls for more efficient operation.
- Cabinet and door built to last in harsh marine environments.
- · Removable ice bucket.
- · Corrosion resistant marine grade hardware, fittings and fasteners.
- Positive catch door latch keeps door closed. This allows maximum ice production, while keeping harmful bacteria and molds out.
- · Built in door prop lets you manual defrost or air dry your unit when power is off.
- Produces up to 21 lbs of ice every day using only 2-3/4 gallons of water. Stores up to 11 lbs of crescent ice (1/2" W x 3/4" H x 2-1/2" L).
- · Backed by Raritan's One Year Limited Warranty and legendary technical support
- All units meet CE, 115V units UL and cUL listed.

# **EASY INSTALLATION:**

- No drain required makes it easy and inexpensive to install.
- Only requires a 1/4" outside diameter water line.
- · Does not require additional hinge clearance for door swing.
- Includes flange.
- No additional side space required for ventilation.
- 230 volt model available.











# **SPECIFICATIONS:**

Water Pressure Operating Range 20-120

All ventilation from front, limited vent in back of unit. No additional clearance required around the sides.

Adjustable rubber leveling feet

Water supply inlet size 1/4" OD and requires 3/4" space behind the unit for clearance

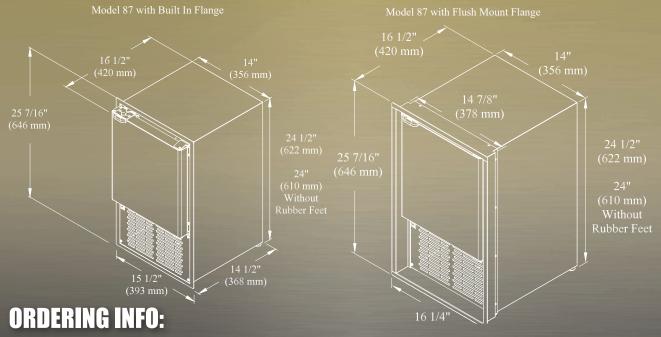
Water supply inlet located in lower right of rear opposite of the power cord

Net Weight 51 lbs / 23 kg

# **ELECTRICAL**:

Electrical Requirements	115V/60Hz with USA plug	230V/50Hz with euro plug	
Volt Range	104V~127V	220V~240V	
Maximum Amp Fuse	15 amps	10 amps	

# **DRAWINGS:**



Sample part # 87B515-1 = Model 87 with built in flange 115V AC

Model	Flange Style	Voltage
87 Raritan Icer-Ette	B515 Built-In Flange	-1 115 V DC
	E515 Flush Mount Flange	-2 220 V AC



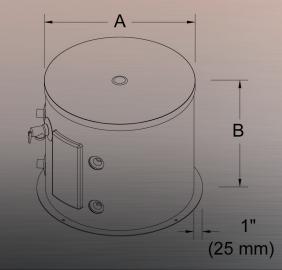
# **1700 Series Water Heater**

World-renowned water heater specially designed for the marine environment. Provides the comfort and convenience of reliable hot water.

- Solid foam insulation means the water stays hot longer than with traditional fiberglass insulation
- Proven long-life design
- · Withstands the rigors of the marine environment
- · Glass-lined tank is more durable than stainless steel
- Attractive polymer jacket resists corrosion from dampness
- Ignition-protected, adjustable thermostat
- Environmentally friendly CFC-free foam insulation
- · Replaceable magnesium anode to protect tank and neutralize acids in the water
- The tank is covered by a five-year Limited Warranty, the entire heater is covered by a two-year Limited Warranty
- · Each unit is assembled by hand, individually tested
- Available in 6, 12 and 20 gallon models with or without engine heat exchangers

• Available for 120V AC or 240V AC

Solid Foam insulation keeps water hotter longer and Steel Glass lined tanks have a longer life span than most traditional tanks.









# **ELECTRICAL:**

Recovery Rate 13 gallons per hour

Amps: 10(120V AC), 5(240V AC) or 18(240V AC) for Model 17200203

Thermostat: Adjustable, factory set to 120°

# **PLUMBING:**

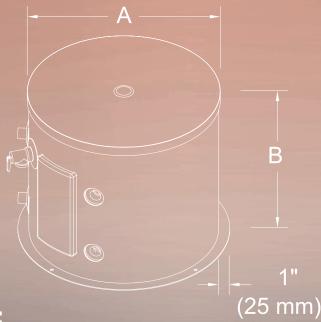
Tank rated at 150psi

Maximum pressure with 75psi temperature and pressure relief valve ---50psi

100psi temperature and pressure relief valve available as option.

Anode: Magnesium - integral with hot water outlet

# **DRAWINGS:**



# **ORDERING INFO:**

Sample part # 17120101 - Water Heater, 12 Gallon, No Heat Exchanger, 115V, GAZ Fittings

Model		Operation	Exchanger	Voltage	Fittings
17 Water H	leater	06 6 Gallon	0 No Heat Exchanger	1 115V	Standard NPT Fittings
-		12 12 Gallon	1 Heat Exchanger	2 220V	01 GAZ Fittings
		20 20 Gallon			02 Metric Fittings

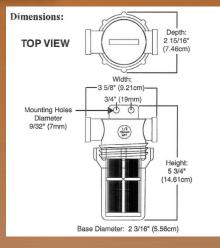


# In-Line Raw Water Strainer

An inexpensive way to protect your equipment from debris, and toilet odors caused by marine life.

- Easy to install and maintain
- Convenient 1/2" female NPT connections
- 20 mesh plastic removable filter for easy cleaning
- · Reduces toilet odors & maintenance

PART# DESCRIPTON
163000 In-Line Strainer
163010 Strainer Filter
163020 Strainer Gasket





# Raw Water Strainer

This is an inexpensive way to protect your engine, generators, AC units, and other components that require outside water. Each unit is individually pressure tested and designed with High Impact clear housing and lid.

- Easy to install and maintain
- Clear housing lets you see debris without opening strainer
- · 16 mesh removable high capacity filter

PART# DESCRIPTION
RWS Raw Water Strainer

**RWS5** Basket **RWS5** O-Ring

**Max. Working Pressure:** 

5 psi (34.5 kPa)

**Dimensions:** 

9 3/4" (24.8cm) high and 7 1/4" (18.4cm)

# 8.4cm)

# In-Line Fresh Water Strainer

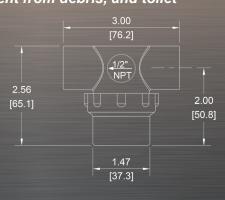
An inexpensive way to protect your equipment from debris, and toilet odors caused by marine life.

3.00

- Easy to install and maintain
- Convenient 1/2" female NPT connections
- 50 mesh plastic removable filter for easy cleaning
- Reduces toilet odors & maintenance

PART# DESCRIPTON

**190601** In-Line Fresh Water Strainer





# AGANTING AND MATURATION





# **Raritan Organics**

# All natural products to help preserve and protect the marine environment

# Kills Odors In Marina R In Mar

### K.O. KILLS ODORS!

K.O. is a holding tank treatment specially formulated for today's marine market. Unlike chemical products, K.O.'s bioactive formula breaks down and neutralizes odor-causing waste materials instantly. Eliminates holding tank odors at their source. K.O. works when nothing else will!

- Odor-killing bacteria digests liquids, solid waste and paper
- Does not require adding "tissue digesters" or other "boosters" to be effective
- A small amount of K.O. can easily keep a boat odor-free between pump outs
- A safe, non-chemical and non-polluting product

PART #
1PK022
1PK0GAL

### **DESCRIPTION**

K.O. Kills Odors! Bioactive treatment 22 oz. (.65 liters) K.O. Kills Odors! Bioactive treatment 1 gal. (3.79 liters)

### **C.P. CLEANS POTTIES!**

C.P. eliminates the worst raw odors from the intake line without brushing. The only toilet bowl cleaner Raritan recommends for Raritan toilets. C.P. is the only bowl cleaner that can be combined with K.O.

- The first bowl cleaner to combine a specialized strain of bacteria with 100% biodegradable cleaning agents
- Specially designed to make the bowl shine like never before and keep the entire system odor-free
- A safe, non-chemical, non-polluting product destroys odors on contact
- Can also be used to clean sinks, showers and basins

PART # **1PCP22** 

### DESCRIPTION

C.P. Cleans Potties! Bioenzymatic 22oz. (.65 liters)

### K.O.2 KNOCK OUT ODORS KIT

Specifically designed to release bio-enzymes with each flush to eliminate odor causing bacteria from outside water sources. Kit treats the entire system from incoming water to the holding tank in eliminating odors.

- No more rotten egg smell
- Non toxic
- Non polluting
- · Eliminates odors at their source

PART # **K02** 

**DESCRIPTION** 

Kills Odor Kit

# Raritan Non-Organics

# **C.H. CLEANS HOSES!**

C.H. is specifically designed to remove uric scale from black water system from the toilet to the tank without having to remove hoses!

- Eliminates clogs which can cause poor flushing performance
- Non-toxic, biodegradable and safe to use with all materials commonly found in black water systems
- Safe and effective replacement to the muriatic acid treatments recommended in Lectra/San and Electroscan waste treatment systems

PART#

DESCRIPTION

**1PCHGAL** Cleans hoses and MSDs

