

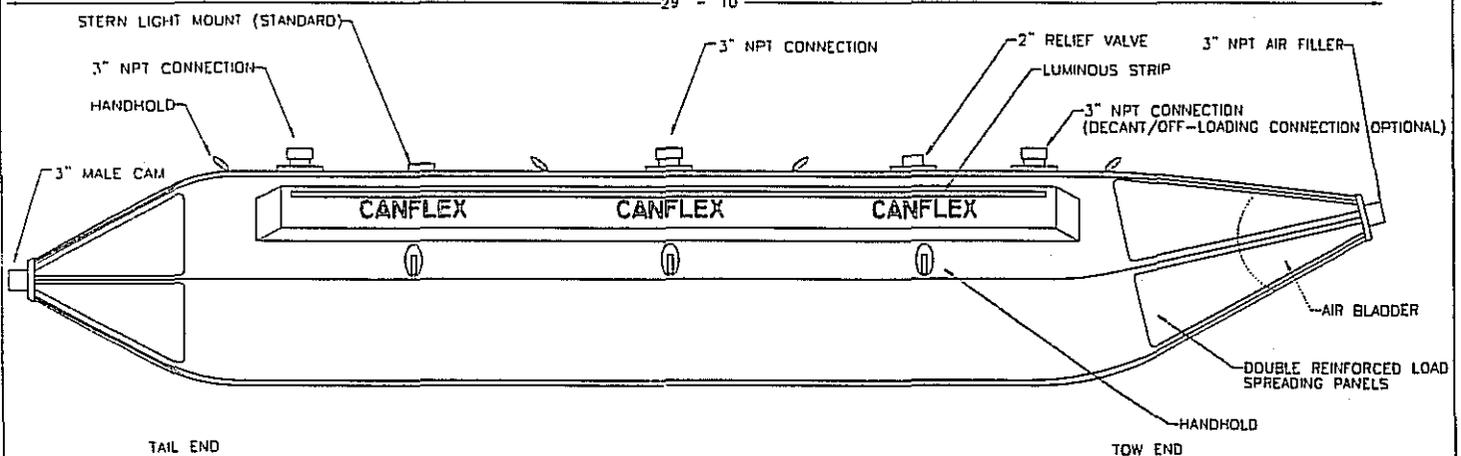
"SEA SLUG" OPERATIONAL GUIDELINES"

Canflex USA Sea Slug Model FCB-43E

UNITS OF MEASURE	US GALLONS	IMP GALLONS	CUBIC METERS	CUBIC FEET	METRIC TONNE
CAPACITY	4,300	3,582	16	575	16

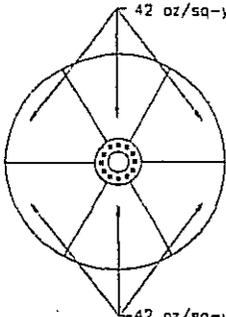
CANFLEX "SEA SLUG" MODEL FCB43E

29' - 10"



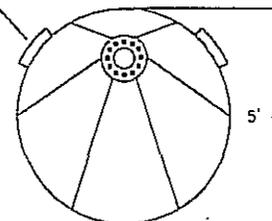
TAIL END

42 oz/sq-yd PVC coated polyester



42 oz/sq-yd PVC coated polyester

CLOSED CELL FOAM FLOATATION
AUXILIARY FLOATATION = 828 LBS.



CANFLEX USA INC.
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CANFLEX
[USA], INC.

FCB-43E PACKING LIST
SERIAL NO. A05279704

GENERAL

- /• Sea Slug pressure tested at 3 PSI and held for 30 minutes
- /• Pressure relief valve set at 1 PSI
- /• Internal nose cone air bladder tested at 1 PSI

ATTACHED COMPONENTS

- /• All standard fittings as per FCB-43E GENERAL ARRANGEMENT drawing
- /• 5/8" x 50' rope with 5" soft eyes attached to towing bridal via 1" screw pin shackle
- /• Drogue and float (Jim Buoy #1502) with 3/8" x 25' rope with 3/8" swivel and 3" soft eye attached to stern eye bolt via 3/8" quick link
- /• 12" float (Jim Buoy #8000) attached to stern eye bolt
- /• 3" x 12' suction hose and float (West Marine #SF1)

NON-ATTACHED COMPONENTS

- /1 - Patch kit containing: 16 oz of PVC CEMENT, 1-30" x 30" piece, 2-10" circles, and 4-7" circles of Sea Slug parent material (42 oz PVC yellow) and 4-7" circles of float cover material (18 oz PVC white)
- /1 - 3" ball valve with 3" female camlock attached
- /1 - 3" ball valve with 3" male camlock attached
- /1 - Manual

LABELING

- /• All top aluminum fittings on both sides
- /• Nav. light mount as such on both sides
- /• Nav. light anchor points as such on both sides
- /• Each float cover three "CANFLEX" or appropriate customer logo
- /• All handles with "MAX SWL 500 LBS"
- /• Nose cone with "MAX SWL 2500 LBS LIFT HARNESS"
- /• Tail cone with "NOT A LIFT POINT"

Signature _____

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A) Canflex FCB-43E Sea Slug Data Sheet

Working Capacity	16 m ³ (4,300 USA Gallons)
Length Overall	9.1 meters (29.8 feet)
Filled Diameter	1.7 meters (5.6 feet)
Closed Cell Foam Floatation	380 kgs floatation (828 lb)
Material & Strength	42 oz/sqyd Oil Grade PVC Coated Polyester Tensile: 800 lb/inch width
Total weight of Sea Slug,	~ 163 kgs (360 lbs)

Fittings/Valves on the FCB-43E Sea Slug:

[Note: fittings may vary slightly based on customer preference or contract agreement]

(All flanges are cast marine grade anodized aluminum with stainless steel trim)

Two: 4" NPT fill/off load flange connection, (optional 6" for top center)

Two: 3" NPT flange

One: 2" pressure relief valve

One: 4" PVC ball valve for connection to an NPT flange

One: 3" PVC ball valve

One: Internal nose cone air bladder to add floatation to the bow (filled via bow air fill check valve)

Standard Accessories for the FCB-43E Sea Slug:

[Note: accessories may vary slightly based on customer preference or contract agreement]

1. Towing bridle and stainless steel towing connections
2. Towing line
3. PVC Carry Satchel
4. Repair Kit
5. Flexible PVC drogue w/ drogue line and float
6. Float w/ lanyard to connect to the stern
7. Non collapsible hose section for connection to the stern-cone flange

B) Mobilization/Deployment

The bladder can be transported to a spill site via air or land craft, or it can be deployed at the dock and towed to the spill site.

When deploying the Sea Slugs at least two people should be available to help. Any sharp or jagged objects on or near the deployment deck should be removed or safeguarded. If there is a tarp available it should be laid on the deployment deck for the Sea Slug to lie on.

Attach Vales and Hoses:

Remove the Sea Slug from it's storage container and roll it out flat onto the deployment deck. Attach a PVC ball valve to fill/offload flang. Attach the non collapsible hose to the stern-cone flange, and attach a ball valve to the aft end of the non collapsible hose. Leave the PVC caps on any unused connections with the exception of the 2" relief valve. **Leave the 2" pressure relief valves uncovered.**

Attach a short section of filling hose the one of the top flange connections. Cap the end of the filling hose. When it is time to fill the Sea Slug this hose can be "snagged" and attached to your skimmer, or other fluid transfer device. [Note the decant hose (if available) or the stern off load hose can also be used as a filling hose].

Attach the non collapsible decant hose (if applicable) to the decant hose fitting. This hose has an ID of 2", or 2.5", please check your packing list to determine the size. The decant fitting is labeled in black stenciled letters on the Sea Slug. The decant hose can also be used for filling and/or off loading given that the proper connections are prepared ahead of time.

Prepare Bow and Stern Floatation:

Inflate the internal bow air bladder (using a standard leave blower or other air blower) via the bow air fitting. If necessary use tape to make an air tight connection between your air blower and the Sea Slug air fill valve.

Connect a float (provided) to the stern end cone to keep it near the water surface. Replace the PVC cap over the bow air filling connection to prevent loss of air.

[Note that the closed cell foam panels welded to each side of the Sea Slug provide more than enough flotation for this unit. The bow air chamber and the stern float are added to: allow access to the Sea Slug end sections when the unit is empty in the water, and to improve the towing performance].

Connect Tether Lines:

Connect a tether line to a handle near the Sea Slug longitudinal center, and to some attachment near the stern (lifting bridal, hand hold strap, or an eye bolt on the end cone or top fitting). The towing line can be used as a bow tether if needed. **Note that the handles have a maximum pull of 500 lbs.**

knots. Variable sea conditions will require adjustment of the towing speed to obtain the optimum towing performance.

E) Off loading the Sea Slug/Decanting

Off loading via The Decanting Connection (if available):

Some Sea Slugs are purchased with a 2" or a 2.5" cam lock decanting fitting on the top panel of the Sea Slug. An internal non collapsible extension hose connected to this fitting (check your packing list to determine availability and size of your decant connection). To off load fluid simply attach a suction pump to the cam lock on the decant hose and begin pumping.

Decanting water and off loading oil from the Sea Slug are basically the same operation. The only difference is, when decanting, the intake of the decanting hose should reach the bottom layer of fluid within the Sea Slug.

Off loading via an NPT Flange:

The FCB-43E has threaded connections on it's top panel and on the stern end cone. Connection sizes vary from 2" to 6" depending on user requirements. The stern end cone is provided with a non-collapsible suction hose which trails from the end of the Sea Slug (See the Deployment Section of this Manual). Attach a suction pump to any of the flanges or ball valves provided and begin pumping out the fluid. The suction end of the off loading hose should have a tight connection (i.e. cam lock with an o-ring) for effective suction. **Prepare the proper hose connections ahead of time.**

A crane can be used to incrementally lift one end of the bladder to assist the flow of fluid to an off loading point. **The bladder should not be lifted fully out of the water when it is loaded with fluid; instead, use incremental lifts of the crane to assist flow toward the suction pump off loading point.**

F) Cleaning the Sea Slug

The Sea Slug can be cleaned by partially filling the bladder with water, air, and detergent and agitating the mixture by rolling the bladder back and forth on a non abrasive deck. Empty the Sea Slug and repeat the process if necessary.

Standard decontamination precautions to prevent runoff of oily fluid should be followed. Portable wash down stations are available from Canflex USA upon request.

G) Repackaging the Sea Slug

The Sea Slug should be clean and dry before long term storage. Lay the Sea Slug on a non abrasive deck, remove ball valves and place the PVC end caps onto the NPT flanges. Remove any residual air in the bladder by using the suction end of a vacuum or blower (optional), then roll the bladder from one end to the other. If a vacuum is not available to

H) Maintenance

Inspect and Clean after each use, store dry. When in long term storage, break out annually and inspect.

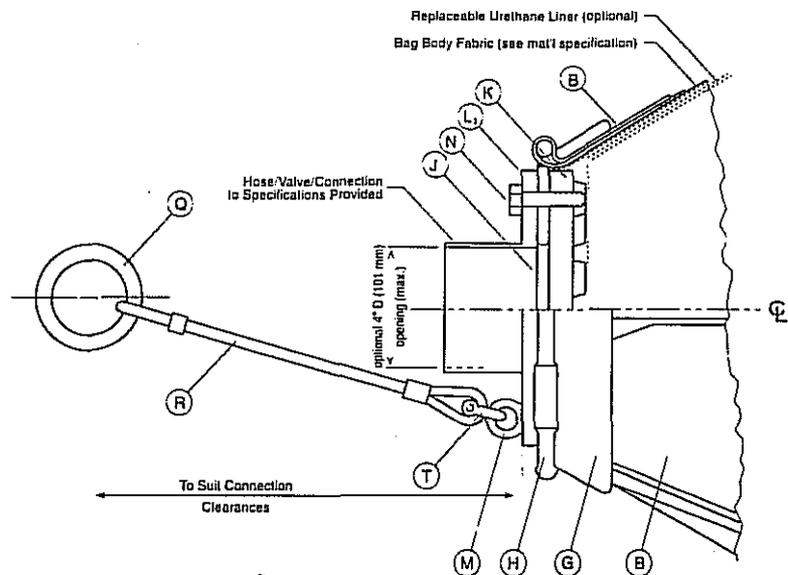
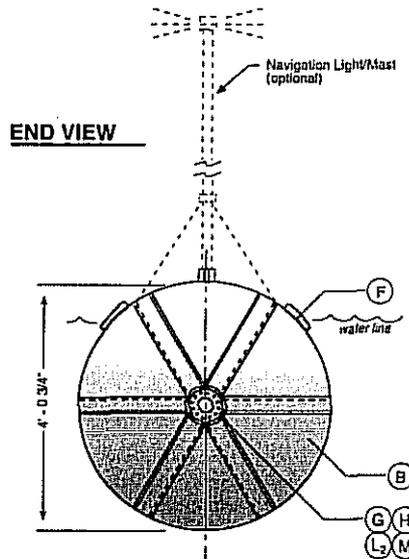
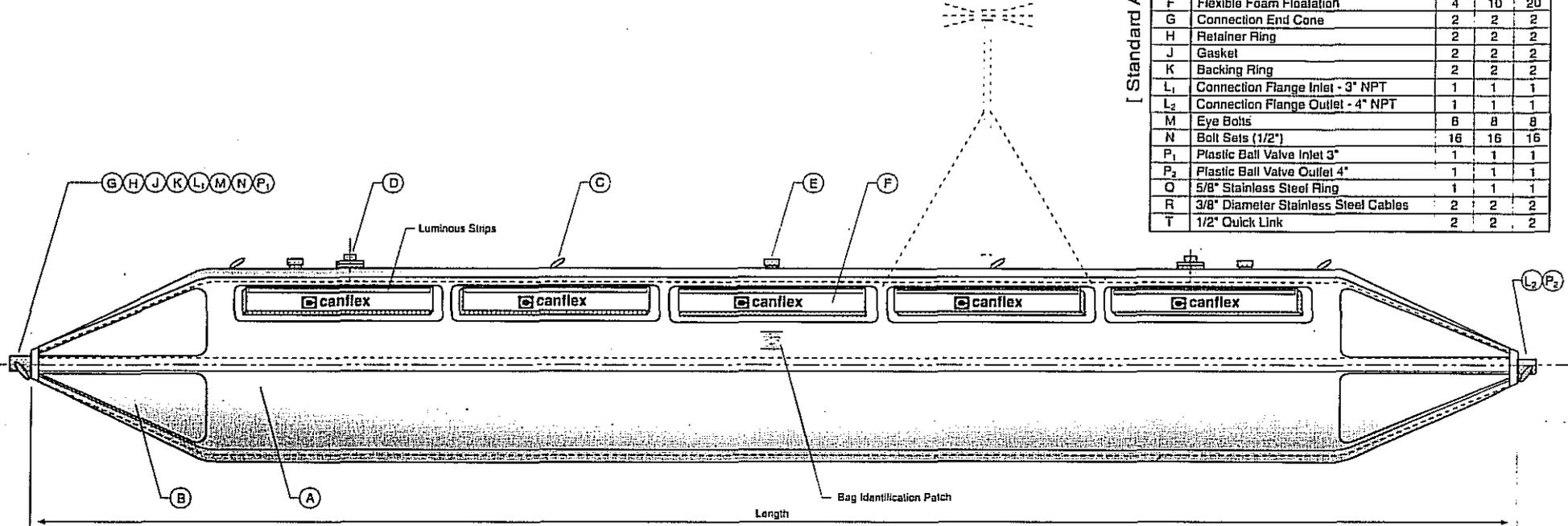
Canflex "Sea Slug" — Floating Fluid Containment Bag

SERIES I

Model FCB - 12 (1250 USG) — shown

[Standard Arrangement]

PART	DESCRIPTION	CAPACITY (US Gals)		
		1250	2500	5000
A	Panels	6	6	6
B	Reinforcing Panels	6	6	6
C	Handholds	4	8	10
D	2" Overfill Relief Valve	2	2	4
E	3" NPT Conn ⁿ with Cap & 9" Backing Plate	3	3	5
F	Flexible Foam Floatation	4	10	20
G	Connection End Cone	2	2	2
H	Retainer Ring	2	2	2
J	Gasket	2	2	2
K	Backing Ring	2	2	2
L ₁	Connection Flange Inlet - 3" NPT	1	1	1
L ₂	Connection Flange Outlet - 4" NPT	1	1	1
M	Eye Bolts	8	8	8
N	Bolt Sets (1/2")	16	16	16
P ₁	Plastic Ball Valve Inlet 3"	1	1	1
P ₂	Plastic Ball Valve Outlet 4"	1	1	1
O	5/8" Stainless Steel Ring	1	1	1
R	3/8" Diameter Stainless Steel Cables	2	2	2
T	1/2" Quick Link	2	2	2



"SEA SLUG" — SERIES I

MODEL	CAPACITY (US Gals)	DIAMETER	LENGTH	AUXILIARY FLOATATION	SHIPPING WEIGHT
FCB 12	1250	4' - 3/4" (48 3/4")	16' - 8"	240 lbs	350 lbs
FCB 25	2500	4' - 3/4" (48 3/4")	29' - 2"	600 lbs	480 lbs
FCB 50	5000	4' - 3/4" (48 3/4")	55' - 3"	1200 lbs	750 lbs

MATERIAL SPECIFICATIONS

- Body Fabric**
- PVC Coated (with PU Top Coat)
 - Polyester Fabric - 54 oz/sq yd
 - 1100 lbs/in width - tensile
 - 350 lbs tear strength
 - International Orange
- Floatation Cover Fabric**
- PVC Coated Polyester Fabric - 40 oz/sq yd
 - 700 lbs/in width tensile
 - International Orange/Yellow
- Floatation**
- Flexible Closed Cell Foam - 2.5 lbs/sq ft
 - All Float Dimensions are 4" x 9" x 48"
- End Connections**
- Cast Marine Grade Aluminum
 - Stainless Steel Trim
- Assembly**
- R/F Heat Sealed