

# Isco 3700C Compact Portable Sampler

## **Compact Size with Full-scale Durability and Features**

The 3700C is ideal for installation where a full-size sampler won't fit. It will easily pass through an 18-inch diameter or offset manholes without disassembly or awkward maneuvering.

Although smaller and lighter than our full size 3700 Sampler, the 3700C is designed and built with tough field use in mind. Its high-strength, corrosion-resistant material and NEMA 4X, 6 (IP67) controller assure you of long-term durability. The compact 3700C features:

- Powerful, easy-to-use programs
- Accurate sample volume delivery
- Five bottle configurations
- Quick-change bottle cartridge system
- Superior sample preservation with thick foam insulation (R-11) and 16-lb. ice capacity.

## **Easy Programming in all Applications**

The 3700C controller has basic and extended programs for a wide variety of applications, including storm water monitoring. Sampling can be triggered based on time, flow, or pH. Built-in diagnostics, program storage, and program security are also included. And the controller is interchangeable on other 3700 Series samplers.



*It's a snap to change bottles with the 3700C's bottle cartridge.*



## **Accurate, Repeatable Delivery**

The patented LD90 Liquid Detector\* and pump revolution counter gives you accurate repeatable sample volumes every time with:

- Automatic compensation for changes in head heights
- Automatic suction line rinsing to eliminate cross-contamination

The LD90's field proven, non-contacting design is not affected by conductivity, viscosity, temperature, or liquid composition.

## **Versatile Bottle Configurations**

The 3700C has five different bottle options, including glass bottles for priority pollutant analysis of both sequential and composite samples. For general purpose sampling, polyethylene and polypropylene bottles are available.

\*Patent #5,125,801

# Isco 3700C Compact Portable Sampler Specifications

Contact the factory or your Isco representative for additional specifications.

Sampler			Controller		
Height	27¾ in.	70.5 cm	Weight	11 lbs.	5.9 kg
Width	17¾ in.	45 cm	Dimensions	10 x 12.5 x 10 in.	26 x 32 x 25 cm
Weight (dry)	25 lbs.	11.3 kg	Operational Temperature	32° to 120°F	0° to 49°C
Bottle Configurations	24 wedge-shaped 500 ml polyethylene 12 round 500 ml polyethylene 12 round 375 ml glass 1 polyethylene 2.5 gal (9450 ml) bottle 1 glass 2.5 gal (9450 ml) bottle		Enclosure Rating	NEMA 4X, 6	IP67
Insulation	Environmentally safe, non-CFC foam (R-11)		Program Memory	Non-volatile ROM	
Ice Capacity	16 lbs. (7.3 kg) of ice with 24 polyethylene bottles		Flow Meter	5 to 15 volt DC pulse or 25 millisecond isolated contact closure	
Cooling Capacity <i>(with 16 lbs. of ice and 24—500 ml bottles full of 65°F (19°C) water at the start of the test)</i>	After 24 hours: Sample is 35°F (20°C) below ambient. After 48 hours: Sample is 25°F (14°) below ambient.		Signal Requirements	8 pin connector; data output at 2400 baud in ASCII RS-232 format with handshake.	
Power Requirements	12 volts DC <i>(Supplied by battery or AC Power Converter.)</i>		Interface Port	8 pin connector; data output at 2400 baud in ASCII RS-232 format with handshake.	
Standby Current	10 Milliamps maximum		Real Time Clock Accuracy	1 minute per month, typical	
Pump			Software		
Intake Purge	Adjustable air purge before and after each sample.		Sample Frequency Selection	1 minute to 99 hours 59 minutes, in 1 minute increments Non-uniform times in minutes or clock times 1 to 9,999 flow pulses	
Tubing Life Indicator	Provides a warning to change pump tubing.		Sampling Modes	Sample pacing Uniform time, non-uniform time, flow, flow paced/time switched, STORM (time and flow paced sampling during sample collection.) Flow pacing is controlled by external flow pulses.	
Intake Suction Tubing			Multiplexing	Samples per bottle (1 to 20 with 500 ml bottles; 1 to 17 with 350 ml bottles), bottles per sample (1 to 24), multiple bottle compositing.	
Length	3 to 99 ft.	1 to 30 m	Programmable Sample Volumes	10 to 9,990 ml in 1 ml increments	
Material	Vinyl or Teflon® lined		Sample Retries	If no sample is detected, up to 3 attempts; user selectable	
Inside Dimension	¾ in. or ¼ in.	1 cm or 0.6 cm	Rinse Cycles	Automatic rinsing of suction line up to 3 rinses for each sample collection	
Pump Tubing Life	Typically 500,000 pump counts		Program Storage	3 sampling programs	
Maximum Suction Lift	26 ft.	7.9 m	Programming Modes	Basic, extended and STORM	
Typical Repeatability	±10 ml		Sampling Stop/Resume	Up to 24 real time/date sample stop/resume commands.	
Typical Line Transport Velocity at head heights of:			Controller Diagnostics	Tests for RAM, ROM, pump display, and distributor	
3 ft. (0.9 m)	2.9 ft./s	0.88 m/s			
10 ft. (3.1 m)	2.5 ft./s	0.76 m/s			
15 ft. (4.6 m)	1.9 ft./s	0.58 m/s			
Liquid Presence Detector	Non-wetted, nonconductive sensor detects when liquid sample reaches the pump to automatically compensate for changes in head heights.				

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## Ordering Information

Suction line and strainer not included; order separately. Contact the factory or your Isco representative for complete ordering information.

Description	Part Number
<b>3700C Compact Sampler with:</b>	
24 - 500 ml wedge-shaped polyethylene bottles	68-3700-039
12 - 375 ml round glass bottles	68-3700-040
12 - 500 ml round polyethylene bottles	68-3700-041
1 - 2.5 gallon (9.4 liter) round glass bottle	68-3700-042
1 - 2.5 gallon (9.4 liter) round polyethylene bottle	68-3700-043



**Isco, Inc.**  
4700 Superior St.  
Lincoln, NE 68504 USA  
Phone: (402) 464-0231  
USA & Canada: (800) 228-4373  
Fax: (402) 465-3022  
E-Mail: info@isco.com