



Recycler™ Product and Performance Specifications



The *Recycler™* family of specialty water purification systems has two models specifically designed to either provide significant amounts of purified drinking water or to work with Decon shower systems in the following two critical ways:

1. The *Recyclers™* can purify up to either 1200 or 2400 gallons of water per hour to provide cleaner, fresher water for most emergency purposes,
2. The *Recyclers™* can purify used shower water and return clean, fresh water to the showers in a recycled system.

The *Recyclers™* use the same patented technology available from all First Water purification systems, but in a much larger scale. Under normal conditions, the systems reduce harmful chemicals and effectively neutralize biological organisms. If excessive amounts of chemicals are known to be in the water, the system should not be used. Like all available First Water systems, the *Recycler™* will not remove the salt from seawater.

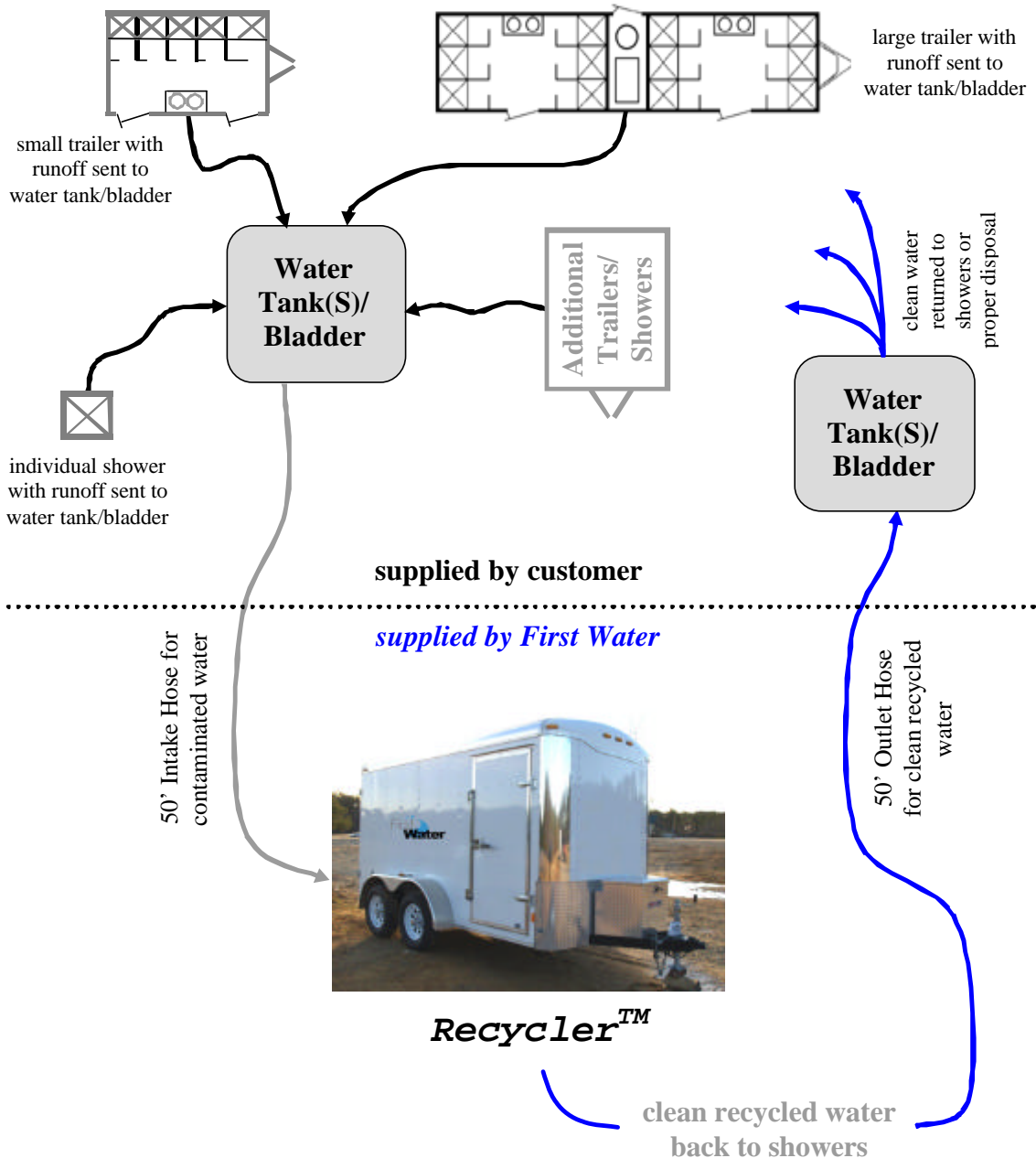
The *Recyclers™* feature standard plumbing to attach to your portable showers, and use their own hose setups and pumps to pull water through a series of washable/reusable filters, sediment filters, carbon block filters and lastly a bank of Ultraviolet (UV) disinfecting lamps. To maximize its effectiveness, the *Recycler™* can connect to a bladder that functions as a holding tank that supplies the *Recycler™* during peak usage hours, and then allows the *Recycler™* to purify the water during slow usage periods or at night.

PERFORMANCE SPECIFICATIONS

<i>Recycler-20™</i> rate of water purification	20 Gallons per minute / 74 Liters per minute
<i>Recycler-40™</i> rate of water purification	40 Gallons per minute / 148 Liters per minute
First Pre-filter (washable)	Easily removed and cleaned 5.0 micron spun filter
Second Pre-filter (not washable)	Sediment filter to remove suspended solids
First Post-filter	1.0 micron Absolute Filter
Second Post-filter	0.5 micron Carbon Block
Ultraviolet Light	Bank of 2 in parallel
Pump	Self Priming, 120 volt, on-board
Inlet and Outlet water lines	1 ½" brass fittings with 50' Inlet and Outlet hoses
System Controller	On / Off Power Center Controller with float switch to automatically provide dry run protection on the inlet side (for when the outside tank is emptied), and an overflow protection for the outlet side (for when the outside tank is full).
Trailer Size	6' X 8', single axel, rear door entry, 1 ¼" hitch ball

Recycler™

Deployment Schematic



Summary Results from Metro Vancouver Municipal Laboratory

Metro Vancouver
 Quality Control Division - Microbiology
 2775 Production Way, Burnaby BC V5A 3G7
 Phone: (604) 444-8490 Fax: (604) 420-2683



Municipal Water Quality Monitoring Program

Project Number: 104358
 Project Date: 11/08/2008
 Project Notes:
 Reported: 18/08/2008
 Reported By: Lab Clerk

Sample Name	Sample Description	Sampled Date	Sample Type	Chlorine Free	Ecoli	Ecoli	Ecoli	Temperature	Total Coliform	Total Coliform	Turbidity
				mg/L	MF/100mLs	MPN/100mLs	MPN/100mLs	°C	MF/100mLs	MPN/100mLs	NTU
UMDSp-01	Minoru Pool Before	11/08/2008 8:00	SPECIAL	1.9	<1		<1	26	<1		0.15
UMDSp-02	Minoru Pool After	11/08/2008 8:10	SPECIAL	0.06	<1		<1	26	<1		0.1
UMDSp-03	Fire Hall #4 Before	11/08/2008 8:40	SPECIAL		CGC		CG				0.84
UMDSp-04	Fire Hall #4 After	11/08/2008 8:40	SPECIAL		<1		<1				0.2
UMDSp-05	Richmond Lakes Before	11/08/2008 9:10	SPECIAL			250				>2100	29
UMDSp-06	Richmond Lakes After	11/08/2008 9:10	SPECIAL		<1		<1				1.4

Summary Results From Independent Laboratory 2



**RESEARCH & ANALYTICAL
LABORATORIES, INC.**

Analytical/Process Consultations



September 28, 2007

Piazza Investment Holdings, LLC
2150 Country Club Road Suite 221
Winston-Salem, NC 27104
Attention: Tom Costello

Re: Bacteriological Testing

Sample Source:	Hondouras
Sample Date:	09/26/07
Sample Time:	0800
Sample Received:	09/27/07
Sample Analyzed:	09/27/07
Sample Number:	600217

<u>Parameter</u>	<u>Method</u>	<u>Results</u>
Total Coliform	Colitag	Absent
Fecal Coliform	Colitag	Absent

Analyst: L.P.

Summary Results From Independent Laboratory 3

367 South Commerce Loop
Orem, Utah 84057
(801) 226-8822

AQUA SUN INC. WATER PURIFICATION SYSTEM, TEST RESULTS

PROTOCOL:

Test was conducted under the direction of Ford Chemical (an EPA approved lab in Salt Lake City, Utah) and samples were sent to Ford Chemicals for analysis. Equipment was sterilized before each test run as recommended by Ford. The water was prepared by drawing water from stagnant ponds in horse pastures and then incubated for 24 or more hours. The goal was to challenge the equipment with unknown bacteria rather than strictly with E coli which is killed with a lower UV dosage than most bacteria require. The challenge water most likely contained with a wide variety of micro-organisms and would be more representative of real life conditions. All analysis was done using standard plate counts (SPC) which will reveal any living micro-organisms.

The samples were sent to Ford in care of the Utah County Health Department to ensure proper handling procedures. All sample bottles were numbered with conditions of each numbered sample recorded. Ford Chemical then returned the results of each numbered sample. The data below represents the results found by Ford and the conditions under which each sample was drawn.

Bacteriological Analyses Results

SAMPLE ID: Single unit (UF/20 I) with dip tube insert.

CERTIFICATE OF ANALYSIS

The unit was tested at flow rates (outlet) of 5 gallons/minute, 8 gallons/minute and 10 gallons/minute using water drawn from a pond in a horse pasture. The unit was sterilized with chlorine between each run to avoid carry-over contamination.

Test Model UVB1 GC: Rated Flow: 1

Bacteria count input: 48000 SPC Date of Test 12/15/88

Actual Flow: 1 GPM Count Out 0.001 Percent Kill 99.9999

Test Model: UVCCL1 CBC-10: Rated Flow: 2

Bacteria count input: 48000 SPC Date of Test 12/15/84

Actual Flow: 1 GPM Count Out 0.001 Percent Kill 99.9999

I verify that the above information is true and accurate to the best of my knowledge.

Elvis Anderson, Chemtech