

Cryogenic Equipment

LS Series

The Taylor-Wharton Laboratory Systems (LS) are uniquely designed for large vial capacity in convenient box-type storage racks. They provide maximum holding times. This means lower operating costs per vial and fewer refills.

The new LS6000 with the Auto-Tend controller provides automatic filling and alarm features.



Features

- LS6000 available with AutoTend Controller
- New Rugged Construction – ribbed high strength aluminum body, magniformed necktube design, and more durable paint
- Convenient Storage Systems – rack index location ring and internal location spider, computer compatible box storage is ideal for simple inventory management
- Super vacuum performance with super insulation provides maximum holding times
- Security – Accessory low-level alarm is available for more valuable samples
- Mobility - Roller bases are available

Models	LS750	LS3000	LS4800	LS6000
Static Holding Time -days (1)	130	106	200	194
Working Time - days (2)	80	66	125	120
Evaporation Rate (1) liters/days	0.27	0.76	0.65	0.84
Liquid Nitrogen Capacity - liters	35	81	130	165
Weight Empty -	lbs	39	70	90
	kg	17.7	31.8	40.9
Weight Full (7) -	lbs	103.3	214.2	312.4
	kg	46.0	97.4	146.1
Neck Diameter -	in	4.7	8.5	8.5
	mm	119	216	216
Overall height -	in	28.8	28.8	35.1
	mm	681	731	892
Overall Diameter -	in	18.8	26.9	26.9
	mm	478	683	683
2 ml vial capacity (4)	750 (5)	3000 (5)	4800(6)	6000 (7)
Box Size	Shape	Square	Square	Square
	Size in	3.0 x 3.0	5.0 x 5.0	5.0 x 5.0
	Size mm.	76 x 76	127 x 127	127 x 127
	Vials per box	25	100	100
Roller Base	R033-8C00		R05K-8C00	
Cryo Sentry Alarm	R036-8C30	RS30-8C40	R05K-8C26	RS60-8C40
Auto Tend Controller		N/A		Rs60-8C86

(1) Evaporation rate and static holding time are nominal. Actual rate may be affected by the nature of the contents, atmospheric conditions, container history, and manufacturing tolerances.
 (2) Work time is an arbitrary, reference-only value to estimate container performance under the actual operating conditions. Actual working time may vary widely depending on individual use patterns.
 (3) Without canisters or racks
 (4) 2.0 ml vial size: 12.5 mm O.D. internal thread
 (5) 6-5-2
 (6) 6-8-2
 (7) 6-10-2

Cryogenic Equipment

XT Series

The Extended Time Series (XT) of cryogenic refrigerators are designed for long-term storage of a variety of materials at cryogenic temperatures. This series also offers a low profile model (XTL) for use in more confined workspaces.



Features

- New Rugged Construction – ribbed high strength aluminum body, magnifformed necktube design, and more durable paint
- Versatile Storage System - convenient canister index location ring and
- Superior Vacuum performance with super insulation provides maximum holding times
- Security – Accessory audio/visual low-level alarm is available. Lockable lids
- Mobility – Roller Bases are available

Models		XTL3	XTL8	XT10	XT20	XT34
Static Holding Time -days (1)		27	80	100	230	340
Working Time - days (2)		17	50	62	140	212
Evaporation Rate (1) liters/days		0.11	0.10	0.10	0.09	0.1
Liquid Nitrogen Capacity - liters		3	8	10	20.7	34
Weight Empty -						
	lbs	7.2	19.6	16.5	26	34.75
	kg	3.3	8.9	7.5	11.8	15.8
Weight Full (3) -						
	lbs	12.5	33.8	34.3	62.8	95.3
	kg	5.7	15.4	15.6	28.6	43.3
Neck Diameter -						
	in	2.0	2.0	2.0	2.0	2.0
	mm	51	51	51	51	51
Overall height -						
	in	17.2	19	23.8	25.8	26.3
	mm	437	483	597	655	668
Overall Diameter -						
	in	7.6	15.6	11.4	15.6	18.8
	mm	193	396	290	396	478
Number of Canisters		6	6	6	6	6
Canister Diameter (4) -						
	in	1.5 x 5	1.5 x 5	1.5 x 11	1.5 x 11	1.5 x 11
	mm	38x127	38 x 127	38 x 279	38 x 279	38 x 279
Number of 1.2 ml & 2.0 ml vials (5/cane)		N/A	N/A	150	150	150
Number of 1.2 ml & 2.0 ml vials (6/cane)		N/A	N/A	180	180	180
Number of 1/2 cc straws (10/cane)		N/A	N/A	540	540	540
Number of 1.2 cc straws - Bulk (1 level)		750	750	750	750	750
Number of 1/2 cc straws - Bulk (2 levels)		N/A	N/A	1500	1500	1500
Roller Base		N/A	R018-8C00	N/A	R018-8C15	R033-8C15
Low Level Alarm		N/A	N/A	N/A	R033-8C15	R033-8C15
Number of 1/2 cc straws (10/cane)		N/A	N/A	540	540	540

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 (3) Without canisters or racks.
 (4) Canister also available in 5.0 in (127 mm) height for XT10, XT20 and XT34

Cryogenic Equipment

HC Series

The high capacity (HC) series of refrigerators are designed for storing large quantities of a variety of materials at cryogenic temperatures. Temperatures generally range between -320° F (-196° C) at the liquid surface, and -299° F (-184° C) under the closed necktube core.



Features

- Large storage capacity
- New rugged construction - dependable, magniformed necktube design, ribbed high strength aluminum body, and more durable paint system.
- Versatile storage system - convenient canister index location ring and internal spider.
- Superior vacuum performance with super insulation provides maximum holding times. Security - Optional low-level alarm is available for use with more valuable samples
- Mobility - Roller bases are available for some models

Models	HCL12	HC20	HC34	HC35	VHC35	
Static Holding Time -days (1)	60	87	200	130	130	
Working Time - days (2)	37	54	125	81	81	
Evaporation Rate (1) liters/days	0.20	0.23	0.17	0.27	0.27	
Liquid Nitrogen Capacity - liters	12	20	34	35	35	
Weight Empty -	lbs	21.6	26.4	35.38	39	37.9
	kg	9.8	12.0	16.1	17.7	17.2
Weight Full (3) -	lbs	43.0	62.0	95.9	101.3	100.2
	kg	19.5	28.2	43.6	46.0	45.5
Neck Diameter -	in	3.6	3.6	3.6	4.7	4.7
	mm	91	91	91	119	119
Overall height -	in	19.0	24.25	26.31	26.8	26.8
	mm	482	615	668	681	681
Overall Diameter -	in	15.6	15.6	18.8	18.8	18.8
	mm	396	396	478	478	478
Number of Canisters		6	6	6	10	6 (4)
Canister Diameter -	in	2.75 x 5	2.75 x 11	2.75 x 11	2.64 x 11	3.7 x 11
	mm	70x127	70 x 279	70 x 279	67. x 279	94 x 279
Number of 1.2 ml & 2.0 ml vials (5/cane)	N/A	570	570	850	1050	
Number of 1.2 ml & 2.0 ml vials (6/cane)	N/A	684	684	1020	1260	
Number of 1/2 cc straws - (10 per cane)	N/A	1850	1850	2800	3000	
Number of 1/2 cc straws - Bulk (1 level)	2940	2940	2940	4900	4950	
Number of 1/2 cc straws - Bulk (2 levels)	N/A	5880	5880	9800	9900	
Roller Base	R018-8C00	R018-8C00	R033-8C00	R033-8C00	R033-8C00	
Low Level Alarm	N/A	R034-8C15	R034-8C15	R037-8C15	R036-8C30	

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(2) Work time is an arbitrary, reference-only value to estimate container performance under the actual operating conditions. Actual working time may vary widely depending on individual use patterns

(3) Without canisters or racks.

(4) Optional 7th canister available to increase storage capacity by 23%