## Domestic Hot Water Tanks Indirect Fired

## **Buderus**





## Clean, Pure, Reliable Hot Water.

- Efficient and Economical
- Excellent Recovery Rates
- Superior Insulation
- Easy Access Cover for Cleaning
- Three Styles with Capacities of 32 to 103 Gallons

### **Indirect Fired Domestic Hot Water Tanks**

#### The Buderus Thermoglaze® Hot Water Advantage



In North America the average household spends around 30% of energy costs on their domestic hot water. With this in mind Buderus designs its hot water tanks to work more economically and efficiently. Buderus pioneered new methods of producing and storing domestic hot water, so you are assured of greater operating efficiencies, lower fuel consumption and consistent hot water, all while saving money.

Buderus' patented Thermoglaze® is a ceramic material which is thermally bonded to the internal components of the tank to provide a glass-like coating. This unique coating

protects against the corrosive affects of minerals that naturally appear in water, maximizing the life of the tank, while minimizing the number of service calls. Constructed of the highest quality materials, including the Thermoglaze® coating on all the interior surfaces, Buderus tanks also have excellent insulation resulting in less than a ¼°F loss of heat per hour. The larger surface area of the heat exchanger in a Buderus tank delivers excellent recovery rates.

#### **Features and Benefits**

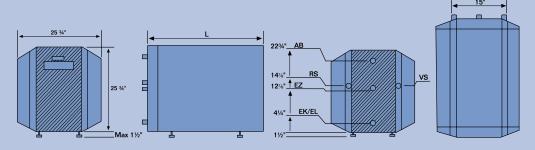
- Economical better insulation. High density fluoro-carbon free bonded-foam insulation for better maintenance of stored hot water temperature.
- Large surface area heat exchanger for excellent recovery rates.
- Corrosion Protection the Buderus Thermoglaze® process protects the interior of the tank from corrosion caused by most types of water.
- Easy access cover for cleaning of coil and tank interior.
- Horizontal tanks for small footprint, vertical tanks for improved recovery rates.
- Standard magnesium anode rod for active corrosion protection.

Horizontal Models		LT-160	LT-200	LT-300		
Performance Data						
Continuous Rating (2nd Hr.) Inlet Temp = 50 °F Outlet Temp = 140 °F	BTU/Hr.	93,000	109,000	161,000		
	Gallons/Hr.3	124	145	215		
Boiler Water Temp. °F		194	194	194		
Boiler Water Flow Rate (GPM)		15.4	17.6	22.1		
Coil Pressure Drop (Feet of Head)		3.1	4.4	8.0		
Physical Dimensions						
Contents (gallons)		42	53	79		
Dimension W		25¾"	25¾"	25¾"		
Dimension H <sup>1</sup>		25¾"	25¾"	25¾"		
Dimension L		361/4"	427/16"	57¾"		
Weight (approx lbs.) <sup>2</sup>		220	246	363		
1.5.1.6.						



- 1 Excluding screw-on feet.
- All weights are 5% higher with packing material.
- 3 Required boiler output to achieve stated continuous ratings. Size the pump in order to get rated tank outputs

#### LT Tanks



	All LT			
Dimensions				
AB	DHW Outlet	1"		
EZ	P&T/Recirculation Return	3/4"		
VS	Boiler Water Supply	1"		
RS	Boiler Water Return	1"		
EK/EL	Cold Water Feed/ DHW Drain	11/4"		

Buderus domestic hot water tanks offer features that provide for ease of installation, simple maintenance and reliable operation. All models are equipped with a magnesium anode rod for protection against corrosion, a P&T valve and drain for quick installation, and use adjustable screw-on feet for leveling. An easy-access cover aids in cleaning and maintaining the coil and tank interior. Standard on the S120, a Honeywell aquastat an be ordered separately for the other tanks.

Buderus domestic hot water tanks are designed with features that allow them to fit all needs. Short on space? The LT horizontal tanks are designed to fit under a Buderus boiler resulting in a smaller footprint. For domestic hot water priority add a Buderus Logamatic control. With this option, even on cold mornings when the boiler is working hard, you will always have plenty of hot water for showers. Equipped with a recirculation option Buderus tanks work more efficiently so that hot water is not wasted.

Buderus water tanks are a reliable and clean way to store hot water. From small residences to large commercial operations, there is a Buderus domestic hot water tank that is just right for your application.



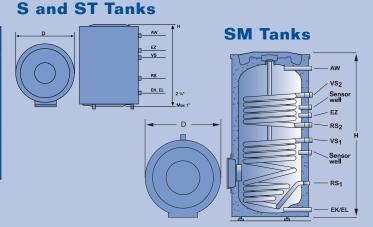
Vertical Models		S-120	ST-150	ST-200		SM-300			SM-400	
Performance Data					Lower/ Coil <sup>1</sup>	Upper/Boiler Coil	High Output Dual Coil <sup>2</sup>	Lower/ Coil <sup>1</sup>	Upper/Boiler Coil	High Output Dual Coil <sup>2</sup>
Inlet Temp = 50°F Outlet Temp = 140°F	BTU/Hr.	116,000	119,000	149,000	140,500	117,100	238,980	141,200	117,100	249,200
	Gal./Hr. <sup>5</sup> (GPM)	155	159	199	267 (4.45)	223 (3.71)	455 (7.58)	268 (4.48)	223 (3.71)	474 (7.91)
Boiler Water Temp. °F		194	194	194		194			194	
Boiler Water Flow Rate (GPM)		9.5	15.9	17.6	22	22	n/a	26	22	n/a
Coil Pressure Drop (Feet of Head)		6.5	3.9	4.3	5.5	6.7	n/a	7.4	6.7	n/a
Physical Dimensions										
Contents (gallons)		32	40	53		77			103	
Dimension D		20"	271/4"	271/4"		27"			34"	
Dimension H <sup>3.6</sup>		37"	34%"	425/16"		59"			62"	
Weight (approx. lbs.) <sup>4</sup>		158	238	286		342			445	

Lower coil continuous rating is based on connection to a boiler not applicable to connection to a solar panel.

Operating Data		
	Boiler Water (coil)	Domestic Hot Water (tank)
Max Pressure (psi)	232	1451
Max Temperature (°F)	312	203
Heating Medium	Hot Water	Hot Water

<sup>&</sup>lt;sup>1</sup> 100PSI in Massachusetts

#### Models S-120 ST-150 ST-200 ST-500 SM 300 **SM 400 Dimensions** AW **DHW Outlet** 11/4" 11/4" P&T/Recirculation 1" F7 3/4" 3/4" 3/4" 1" Return VS **Boiler Water Supply** 11/4" RS Boiler Water Return 3/4" 1" 1" 11/4" 1" 1" Cold Water Feed/ EK/EL 11/4" 11/4" 11/4" 11/4" 11/4" DHW Drain



Dual coil rating are calculated based on the heating surface of the coils tied in series when being used with a boiler only.

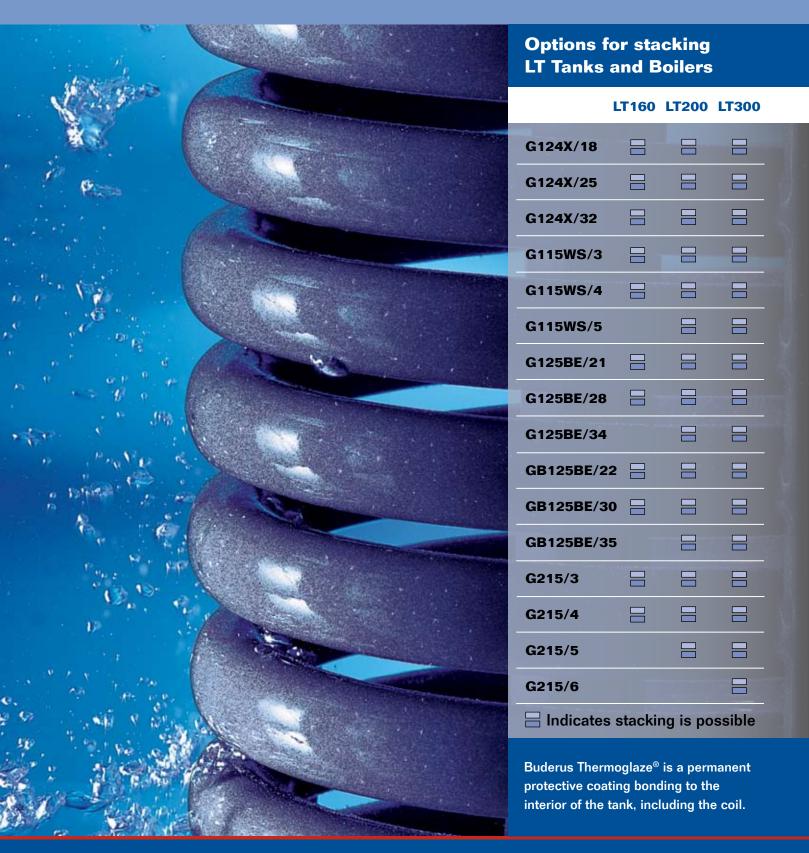
<sup>3</sup> Excluding screw-on feet.

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Required boiler output to achieve stated continuous ratings.
Size the pump in order to get rated tank outputs.

<sup>6</sup> Allow 15" above tank for anode rod removal.

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