

# HOTflow® Heating System CSM



GENERATOR



HEAVY  
EQUIPMENT

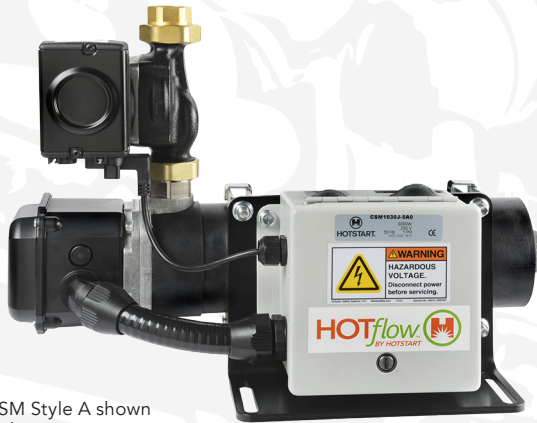


TRUCK  
& BUS



MARINE

HOTSTART's CSM HOTflow® heating system is a coolant preheater, developed to maintain optimal temperatures for diesel and gas engines in stationary land power, marine, construction equipment, and truck applications.



CSM Style A shown with union pump.



CSM Style B shown with flange pump.



## BENEFITS & FEATURES

### HEAVY DUTY EFFICIENCY

The CSM features the most powerful pump (10 gpm flow) and most powerful heating element options (up to 12 kW) in the HOTflow lineup. The CSM's heating power in an energy efficient system is ideal for replacing costly convection-based heaters in large-engine installations up to 100 L displacement.

### MULTIPLE CONFIGURATIONS

The CSM lineup is equipped to meet a wide array of conditions, including power source requirements and agency certifications. Whatever your power or heating needs, there's a CSM to meet your specific heating system application.

### CONTROLS & AUTOMATIC OPERATION

The CSM's control box allows for easy power connections and enables automatic heater operation, eliminating the need for additional customer-supplied control components.

### SINGLE HEATER SOLUTION

The CSM's power and pump-driven forced circulation provides superior heat distribution, making the CSM a viable option to replace paired or multiple convection-based heaters – improving heating performance while reducing maintenance costs.

# HOTflow<sup>®</sup> Heating System

## CSM



GENERATOR



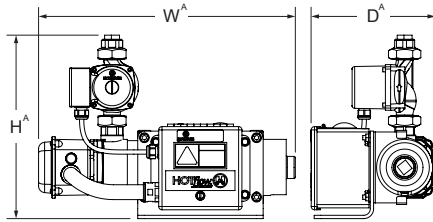
HEAVY EQUIPMENT



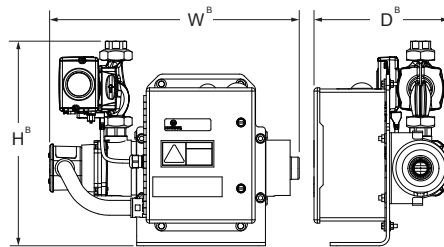
TRUCK & BUS



MARINE



CSM Style A shown with UL-recognized union pump. Dimensions may vary.



CSM Style B shown with CE-compliant union pump. Dimensions may vary.

Style A			
Height* (H <sup>A</sup> )	Width (W <sup>A</sup> )	Depth (D <sup>A</sup> )	Weight
15.0"	19.4"	9.5"	37 lbs
383 mm	493 mm	242 mm	16.8 kg

Style B			
Height* (H <sup>B</sup> )	Width (W <sup>B</sup> )	Depth (D <sup>B</sup> )	Weight
17.0"	19.4"	9.5"	54 lbs
434 mm	493 mm	242 mm	24.5 kg

\* Height values are stated for flange connection pump. If union pump is installed, the model's height will decrease by approximately 1.5" (38 mm).

System		
Phase	single-phase (1 Ø)	three-phase (3 Ø)
Voltage (60Hz)	120V   208V   240V   440V   480V   575V	
Voltage (50Hz)	230V	400V
Control Box Ingress	NEMA 4/IP66	
Motor Ingress	NEMA 2 (UL-listed)/IP44 (CE-compliant)	
Min./Max. Ambient Temp.	-4–104°F (-20–40°C)	
Certification	UL/C-US listed models available (E250789) CE-compliant models available	

Coolant		
Fluid Type	Water	Coolant mix (50% water/50% glycol)
Heat Power	3 kW	6 kW   9 kW   10.5 kW   12 kW
Temp. Control	Fixed, 100–120°F (38–49°C)	
Pump Power	97 W (60 Hz) / 70 W (50 Hz)	
Flow	10 gpm @ 10 ft WC (37.9 L/min @ 3 m WC)	
Max. Pressure	125 psi (860 kPa)	
Pressure Loss	0.2 psi (1.5 kPa)	
Inlet/Outlet	1" NPT	

Options shown represent typical tested or certified configurations. Additional options or configurations may be available. For assistance with your heating system application, contact HOTSTART at 509.600.3700 or [sales@hotstart.com](mailto:sales@hotstart.com).

## ORDERING INFORMATION

### CSM

Engine Displacement	Power Supply			Heating System			
	V	Ø	Hz	kW	Amps	Style	Model Number
1000–2000 CID 15–25 L	120	1	60	3	26.3	A	CSM10301-000
	208	1	60	3	15.1	A	CSM10308-000
	208	3	60	3	8.7	B	CSM30308-000
	230	1	50	3	13.7	A	**CSM1030J-5A0
	240	1	60	3	13.1	A	CSM10302-000
	400	3	50	3	4.9	B	**CSM3030A-5A0
	480	1	60	3	3.8	B	CSM10304-000
	480	3	60	3	4.4	B	CSM30304-000
2000–3000 CID 25–50 L	208	1	60	6	29.6	A	CSM10608-000
	208	3	60	6	17.1	B	CSM30608-000
	230	1	50	6	26.7	A	**CSM1060J-5A0
	240	1	60	6	25.6	A	CSM10602-000
	400	3	50	6	8.9	B	**CSM3060A-5A0
	440	3	60	6	8.1	B	**CSM3060F-5A1
	480	1	60	6	12.8	B	CSM10604-000
	480	3	60	6	7.4	B	CSM30604-000
3000–4500 CID 50–75 L	575	3	60	6	6.2	B	CSM30605-000
	208	1	60	9	44.0	A	CSM10908-000
	208	3	60	9	25.4	B	CSM30908-000
	230	1	50	9	39.8	A	**CSM1090J-5A0
	240	1	60	9	38.1	A	CSM10902-000
	400	3	50	9	13.2	B	**CSM3090A-5A0
	440	3	60	9	12.2	B	**CSM3090F-5A1
	480	1	60	9	19.1	B	CSM10904-000
4500–6000 CID 75–100 L	480	3	60	9	11.0	B	CSM30904-000
	575	3	60	9	9.2	B	CSM30905-000
	208	1	60	10.5	51.2	B	CSM11058-000
	208	3	60	12	33.7	B	CSM31208-000
	230	1	50	12	52.8	B	**CSM1120J-5A0
	240	1	60	12	50.6	B	CSM11202-000
	400	3	50	12	17.5	B	**CSM3120A-5A0
	440	3	60	12	15.9	B	**CSM3120F-5A2
	480	1	60	12	25.3	B	CSM11204-000
	480	3	60	12	14.6	B	CSM31204-000
	575	3	60	12	12.2	B	CSM31205-000

\*\* – CE-compliant/union pump configuration

Other voltages available. Consult the factory.