

Data Sheet

Variable Displacement Pump H1 60/68 Tandem

For more than 40 years, Danfoss has been developing state-of-the-art components and systems for mobile machinery used in off-highway operations around the world. We have become a preferred supplier by offering the best of what really matters: The hardware inside your vehicle application. H1 - our new generation of servo-controlled hydrostatic pumps - is no exception.

The H1 range is built around an advanced control and available in a wide range of displacements. It is designed for quality and reliability and offers expanded functionality, greater total efficiency, and easy installation.

All H1 control and sensor options are PLUS+1® Compliant. PLUS+1 allows you to rapidly develop and customize electronic machine control. It opens up the future by combining machine controls and diagnostics in an integrated operating network.





Features

Designed for quality and reliability

- One design concept
- Single piece swash plate
- · Integrated auxiliary pad

Installation and packaging benefits

- Length optimized pump
- Minimum one clean side
- Higher corner HP/package size ratio
- Standardized connector interface
- Expanded functionality through PLUS +1[®]
- High strength mounting flange

Control options

- Electro-hydraulic control options include:
 - Electrical Displacement Control
 - Forward-Neutral-Reverse (FNR)
 Non-Feedback Proportional Electric
- Manual displacement control (MDC)
- Common control across entire family

Expanded functionality

- Full compliment of diagnostic ports including case pressure
- PLUS+1 Compliant control and sensor options
- · Control Cut Off (CCO) valve
- Integral brake control valve

Greater total efficiency

- Minimized control losses
- Lower control pressure for less power consumption
- Reduced charge pressure rise rate between idle and high idle

© Danfoss | May 2017 Al00000270en-US0101 | 1



Specifications

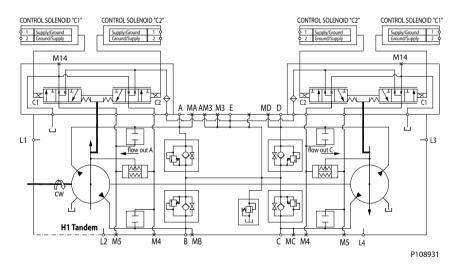
Physical Properties

Features	Unit	060	068
Displacement (maximum)	cm ³ [in ³]	60.4 [3.69]	68 [4.15]
Weight	kg [lb]	96.2 [212]	

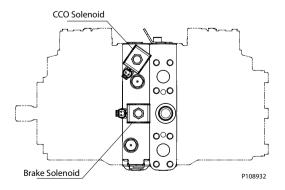
Operating Parameters

Parameter	Measure	Unit	060	068
Input Speed	Minimum	Min ⁻¹ [rpm]	500	
	Rated		3500	
	Maximum		4000	
System pressure	Maximum working pressure	bar [psi]	420 [6090]	380 [5510]
	Maximum pressure		450 [6525]	400 [5800]
	Maximum low loop		10 [150]	
Case pressure	Rated	bar [psi]	2.0 [29]	
	Maximum		5.0 [87]	

Schematic



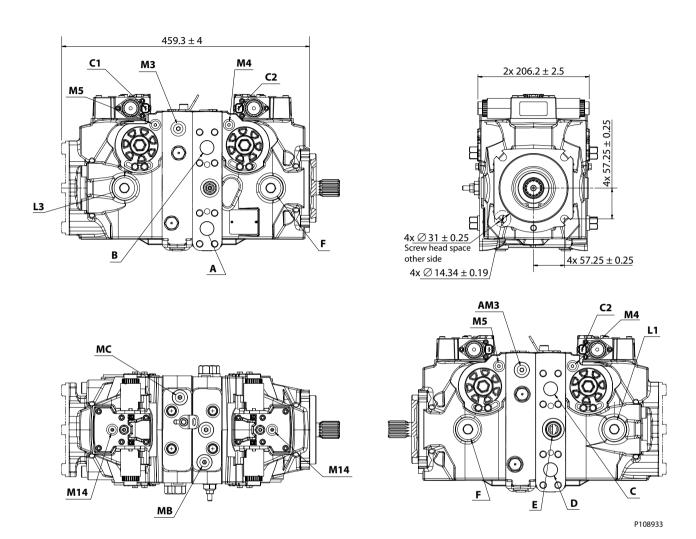
Options: Control Cut Off Valve (CCO), Brake Valve



2 | © Danfoss | May 2017 Al00000270en-US0101



Dimensions and Ports



	Description	Port	
A/B/C/D	System port	Ø 25.4-450 Bar split flange boss per ISO 6162 M12x1.75-6H Thd. 20 full	
		Thd. depth	
E	Charge inlet port	ISO 11926-1 – 1 1/16-12	
F	Case pressure port	ISO 11926-1 – 1 5/16-12	
MB/MC	System gauge port	ISO 11926-1 – 9/16-18	
L1/L3	Case Drain	ISO 11926-1 – 1 5/16-12	
M14	Case gauge port	ISO 11926-1 – 1 7/16-20	
C1/C2	Solenoid connector	DEUTSCH DT04-2P	
M4/M5	Servo gauge port	ISO 11926-1 – 7/16-20	
M3/AM3	Charge gauge port	ISO 11926-1 – 9/16-18	

© Danfoss | May 2017 Al00000270en-US0101 | 3



Danfoss can accept no responsibility for possible errors in catalogues, brochures and other printed material. Danfoss reserves the right to alter its products without notice. This also applies to products already on order provided that such alterations can be made without changes being necessary in specifications already agreed.

All trademarks in this material are property of the respective companies. Danfoss and the Danfoss logotype are trademarks of Danfoss A/S. All rights reserved.

4 | © Danfoss | May 2017 Al00000270en-US0101