

Summary of DPS Regulatory Requirements

Subsystem or Component		Minimum Requirements in Group Designation				
		DPS-0	No Equivalent	DPS-1	DPS-2	DPS-3
ABS		<i>DPS-0</i>	<i>No Equivalent</i>	<i>DPS-1</i>	<i>DPS-2</i>	<i>DPS-3</i>
DNV		<i>T</i>	<i>AUTS</i>	<i>AUT</i>	<i>AUTR</i>	<i>AUTRO</i>
Lloyds		<i>DP(CM)</i>	<i>No Equivalent</i>	<i>DP(AM)</i>	<i>DP(AA)</i>	<i>DP(AAA)</i>
IMO MSC/Cr645		<i>Not Recognized</i>	<i>No Equivalent</i>	<i>Class 1</i>	<i>Class 2</i>	<i>Class 3</i>
Power Systems	Gen and Prime Movers	Non-Redundant	Non-Redundant	Non-Redundant	Redundant	Redundant separate compts
	Main Switchboard	1	1	1	1 with bustie	2 with n/o bustie in separate compts
	Bus-Tie Breaker	0	0	0	1	2
	Distribution System	Non-Redundant	Non-Redundant	Non-Redundant	Redundant	Redundant through separate compts
	Power Management	No	No	No Optional - IMO	Yes Optional - IMO	Yes Optional - IMO
Thrusters	Arrangement of Thrusters	Non-Redundant	Non-Redundant	Non-Redundant	Redundant	Redundant in separate compts
	Hold station with single thruster failure	No	No	No - ABS, IMO, DNV Yes - Lloyds	Yes	Yes
Control	Auto Control – No. of Computer Sys	0	1	1	2	2 + 1 in alternate control station
	Manual Control – Joystick with auto heading	Yes	No	Yes	Yes	Yes
	Single Levers for each Thruster	Yes	Yes	Yes	Yes	Yes
Sensors	Pos. Reference Sys.	0 - DNV 1 - Lloyds, ABS	1	1 - IMO, 2-ABS, DNV, Lloyds	3	3 with 1 in alt control station
	Ext. Wind Sensors	0 - DNV 1 - Lloyds, ABS	1	1 - DNV, IMO; 2 - Lloyds, ABS	2 - ABS, DNV, Lloyds 3 - IMO	2 with 1 in alt control station; 3+1 for IMO
	VRS/MRU	0 - DNV 1 - Lloyds, ABS	1	1 - DNV, ABS 2 - Lloyds IMO not addressed	2 IMO not addressed	2 with 1 in alt control station; IMO not addressed
	Gyrocompass	1	1	1 - DNV, IMO 2 - Lloyds, ABS	2 - ABS, DNV, Lloyds; 3 - IMO	3 with 1 in alt control station
Misc	UPS	0	0	1	1 per computer	2 in separate compts
	Alt Control Station for backup Unit	No	No	No	No	Yes
	FMEA	Yes for DNV; No for Lloyds, ABS	Yes	Yes for ABS, DNV; No for Lloyds	Yes	Yes
	Consequence Analyzer	No	No	No	Yes	Yes
	Performance Capability Rating (PCR)	Lloyds Only - Factor that gauges the percentage of time the ship can remain on station when subjected to a set of standard environmental conditions with (1) all thrusters and then (2) with most effective thruster inoperative				
	Environmental Regularity Number (ERN)	DNV Only: Factor used to indicate the position keeping ability of the vessel with (1) all thrusters operating, (2) minimum effect of single thruster failure and (3) maximum effect of single thruster failure				