



IP55



HD2IP

AC Variable Speed Inverters
380/440V: 4kW-110kW (5.5HP-148HP)

IMO

HD2IP

High protection, multi-function torque vector inverters for AC Motors 380/440V: 4kW-110kW (5.5HP-148HP)

The HD2IP series of IP55 rated inverters is our latest high protection, multi function torque vector inverter for AC motors. The IP55 protection rating provides the best protection experience, making it ideal for most harsh outdoor applications. The HD2IP also incorporates features such as ease of use, excellent performance, high scalability and wide application usage.

An integrated AC isolator provides convenience and security for machine control and debugging.



- IP55 Protection Rating
- AC Isolator for Safe Control
- Isolated Air Duct
- Sectional cover design makes wiring simple
- Strong scalability: supports up to 3 extension cards at the same time



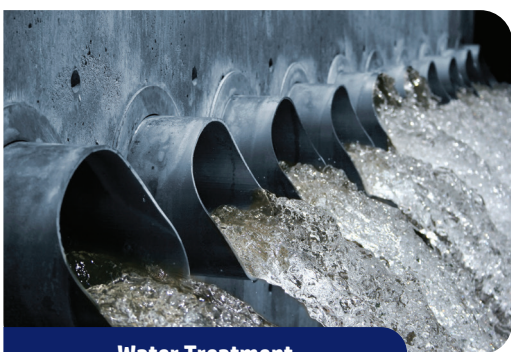
Application Examples



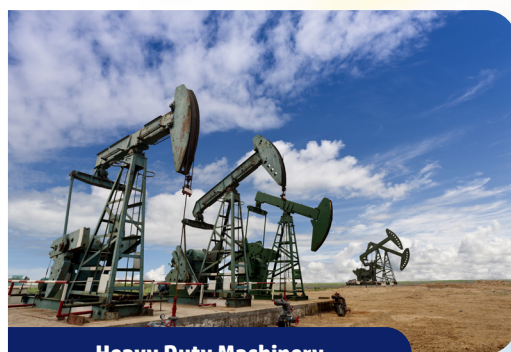
Fan Applications



Pump Applications



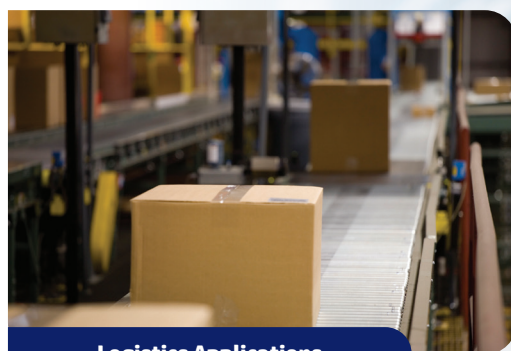
Water Treatment



Heavy Duty Machinery



Food Processing



Logistics Applications



Hoist Applications



Agricultural Applications

Options & Ordering Information

Series		HD2IP		-		75A		-		43	
HD2IP Inverter Drive (IP55 Rated)		HD2IP								Input 380/440V Three Phase	
Output Power kW											
4kW		9.5A				30kW		60A			
5.5kW		14A				37kW		75A			
7.5kW		18.5A				45kW		92A			
11kW		25A				55kW		115A			
15kW		32A				75kW		150A			
18.5kW		38A				90kW		180A			
22kW		45A				110kW		215A			

HD2IP Ratings & Specifications

Model	Constant Torque				Variable Torque				Frame Size
	Power (kW)	Input Current (A)	Output Current (A)	Carrier (kHz)	Power (kW)	Input Current (A)	Output Current (A)	Carrier (kHz)	
HD2IP-9.5A-43	4	13.5	9.5	8	5.5	19.5	12.5	4	1
HD2IP-14A-43	5.5	19.5	14	8	7.5	23	17	4	
HD2IP-18.5A-43	7.5	25	18.5	8	11	30	23	4	
HD2IP-25A-43	11	32	25	8	15	40	32	4	2
HD2IP-32A-43	15	40	32	4	18.5	45	38	2	
HD2IP-38A-43	18.5	45	38	4	22	51	45	2	3
HD2IP-45A-43	22	51	45	4	30	64	60	2	
HD2IP-60A-43	30	64	60	4	37	80	75	2	4
HD2IP-75A-43	37	80	75	4	45	98	92	2	
HD2IP-92A-43	45	98	92	4	55	128	115	2	5
HD2IP-115A-43	55	128	115	4	75	139	150	2	
HD2IP-150A-43	75	139	150	2	90	168	170	2	6
HD2IP-180A-43	90	168	180	2	110	201	215	2	
HD2IP-215A-43	110	201	215	2	-	-	-	-	

HD2IP Weight & Dimensions

Frame Size	Power (kW)	Net Weight (kg)	Gross Weight (kg)	Dimensions (mm)
1	4 - 5.5	7	8.5	196 x 403 x 260.5
2	7.5 - 15	13	15.4	223 x 475 x 289.4
3	18.5 - 22	21	23.6	274 x 522 x 279.5
4	30 - 37	26.5	29.5	318 x 587 x 290
5	45 - 55	48.2	52	338 x 800 x 336.7
6	75 - 110	64	82.8	370 x 788 x 380



Technical Specifications

	Function Description	Specification
Power Input	Input Voltage (V)	3PH 380V (-15%) - 440V (+10%)
	Input Current (A)	50Hz/60Hz, allowable range: 47-63Hz
Power Output	Output Voltage (V)	0-Input voltage
	Output Frequency (Hz)	0-400Hz
Technical Control Performance	Control Mode	SVPWM control, SVC, VC
	Motor Type	Asynchronous motor, permanent-magnet synchronous motor
	Speed Regulation Ratio	Asynchronous motor 1:200 (SVC); Synchronous motor 1:20 (SVC); 1:1000 (VC)
	Speed Control Precision	±0.2% (SVC), ±0.02% (VC)
	Speed Fluctuation	±0.3 (SVC)
	Torque Response	<20ms (SVC), <10ms (VC)
	Torque Control Precision	10% (SVC), 5% (VC)
	Starting Torque	Asynchronous motor: 0.25Hz / 150% (SVC) Synchronous motor: 2.5Hz / 150% (SVC) 0Hz / 200% (VC)
	Overload Capacity	Constant Torque: 150%: 1 min; 180%:10s; 200%: 1s Variable Torque: 120%: 1 min
Running Control Performance	Frequency Setup Mode	Digital, analog, pulse frequency, multi-step speed running, simple PLC, PID, Modbus communication, PROFIBUS communication, etc. Realize switch-over between the set combination and the set channel
	Automatic Voltage Regulation Function	Keep the output voltage constant when grid voltage changes
	Fault Protection Function	Provide over 30 kinds of fault protection functions: overcurrent, overvoltage, undervoltage, over-temperature, phase loss and overload, etc.
	Speed Tracking Restart	Realise impact-free starting of the motor in rotating
Peripheral Interface	Analog Input	2
	Analog Output	1
	Digital Input	4x DI, 2x High Speed Inputs
	Digital Output	1x DO, 1x Pulse Output
	Relay Output	2x programmable relay output, NO/NC contact
	Communication Interface	1x RS485 (non-isolated), 1x USB
	STO Input	2x redundant input
Optional Cards	Expansion Interface	Maximum 3 expansion interfaces: SLOT1, SLOT2, SLOT3
	Expansion I/O Card	4x DI, 1x AI, 1x AO, 1x DO, 2x RO
	Communication Card	Optional Profibus-DP, CANopen, Profinet, EtherCAT, Ethernet/IP, Modbus TCP etc.
	PG Card	5V Differential Incremental (H2)
		E Resolver type PG card (D1)
		5V/12V Multifunctional Incremental (H1)
		24V Incremental PG card
		SIN/COS PG card
		Multifunction Incremental PG card
	Programmable Card	PLC card, 1x AI, 6x DI, 1x AO, 2x Relay, 1x RS485
	Wireless Communication	Bluetooth, WiFi: to realise wireless communication
Other	Installation Mode	Wall mounting, Flange mounting
	Temperature	-10°C to +50°C (Derating is required if the ambient temperature exceeds 40°C)
	Protection Level	IP55
	Cooling Mode	Forced air cooling
	Braking Unit	37kW or below: standard built-in
	STO Level	SIL2
	EMC Filter	380V models fulfill the requirements of IEC61800-3 C3, up to 30m cable length shielded



IMO Worldwide Offices

IMO Precision Controls Limited

The Interchange
Frobisher Way
Hatfield, Herts AL10 9TG
United Kingdom

Tel: 01707 414 444

Email: imo@imopc.com
Web: www.imopc.com

IMO Jeambrun Automation SAS

Parc de la Broye
14 rue du Chauffour
59710 ENNEVELIN
France

Tel: 0800 912 712 (n° gratuit)

Email: imo-fr@imopc.com
Web: www.imojeambrun.fr

IMO Automazione

Via Belfiore 10,
50144 Firenze (FI)
Italia

Tel: 800 930 872 (toll free)

Email: imo-it@imopc.com
Web: www.imopc.it

IMO Canada

1B-701 Rossland Road East
Suite #608
Whitby, Ontario L1N 9K3
Canada

Tel: 416 639 0709

Email: sales-ca@imopc.com
Web: www.imopc.com

IMO Automation LLC

Steeplechase Industrial Park
Suite E, 5845 Steeplechase Blvd
Cumming, GA 30040
USA

Tel: 404 476 8810

Email: sales-na@imopc.com
Web: www.imoautomation.com

IMO South Africa (Pty) Ltd

Unit 2, Trio Park
Prime Park, Printers Way
Cape Town 7441
South Africa

Tel: 021 551 1787

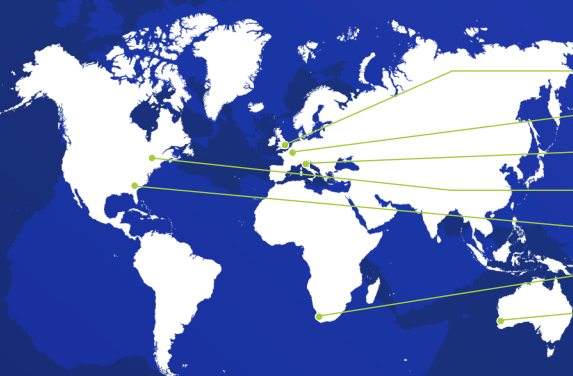
Email: info@imopc.co.za
Web: www.imopc.co.za

IMO Pacific Pty Ltd

Unit 9, Dillington Pass
Landsdale
Perth WA 6065
Australia

Tel: 1300 34 21 31

Email: sales@imopacific.com.au
Web: www.imopacific.com.au



 IMO UK

 IMO Jeambrun

 IMO Automazione

 IMO Canada

 IMO Automation

 IMO South Africa

 IMO Pacific



LinkedIn

Connect with us and follow
IMO Precision Controls for the
latest news, views and reviews



Errors and omissions excepted. Subject to change
without notice. Information correct at time of print.