

High Power 3kW Pinless Subsea Connector

"Bigger is Better" – but how big is best? The spec for Torden 3kW has been driven by focused industry dialogue over several years. A broad spectrum of stakeholders has weighed-in, from AUV & ROV operators to systems designer-builders and oil & gas operators seeking the benefits of automation that pinless connection provides. WiSub listened; Torden™ 3kW is our reply.

Safe and reliable transfer of power and data underwater. Patented high-speed data transfer. These award-winning technologies combine to deliver 3000 Watts of power transfer with high-speed data.

Unlimited mate/de-mate cycles, immunity to contamination and loose mating tolerances offer a reliability advantage and a world of new possibilities. No Pins, No Pain™

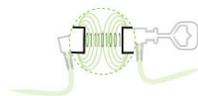


TORDEN™ 3kW

/tordən/ 1NR11t



Alignment freedom
Gap tolerance
360° continuous rotate
Infinite mating cycles



Data + Power
From 100 Mbps
Ethernet + serial



Standardized interface
No pin-count
Latching & packaging options

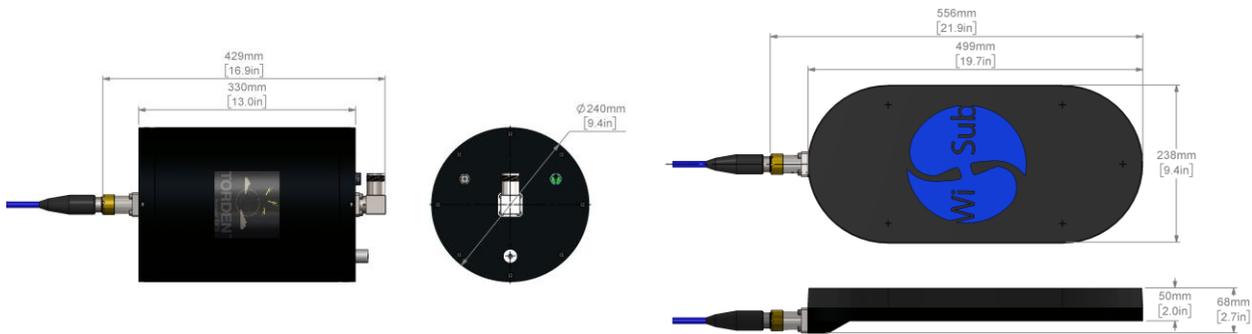
DATA TRANSFER (bi-directional, via microwave link)

Data – Ethernet	100 Mbps: IEEE 802.3, IEEE 802.3u ¹
Data – Serial Protocol	RS232, RS485 Half-duplex, RS485 Full-duplex
Data – Serial Baud Rates	4800, 9600, 19200, 38400, 57600, 115200, 230400

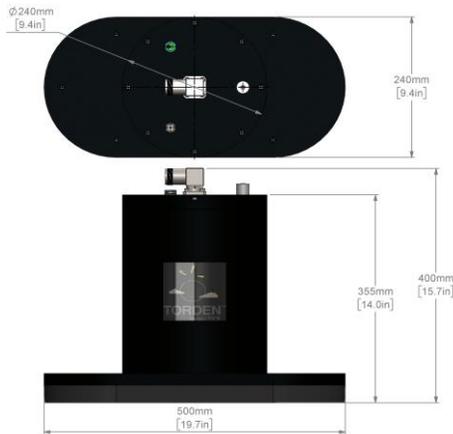
POWER TRANSFER (one-way, via inductive link)

Voltage Input (VDC)	200 - 400
Voltage Input (VAC)	90-130, 200 – 250
Output Power	0 – 3000 ² Watt
Output Voltage	325 VDC ³
Output regulation	± 5% from 20% to Full Load

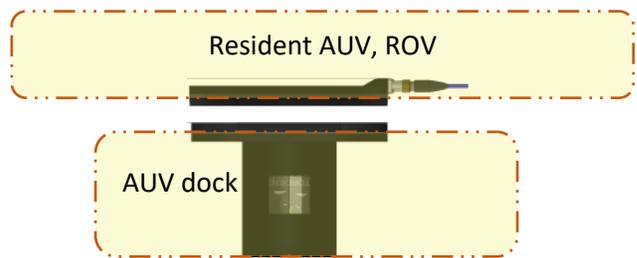
Disco-rectangular Coil Configuration



Remote Head Option, Disco-rectangular Coil



Integrated Head Option, Disco-rectangular Coil

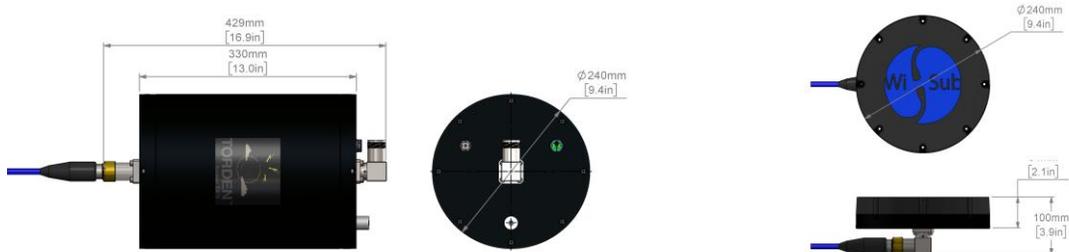


Application Example

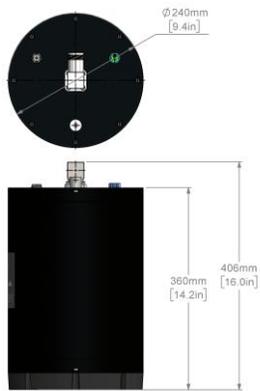
¹ Higher data rates are available
² Max power output is delivered with 400 VDC input
³ Other output voltages are available

TOLERANCES	DISCO-RECTANGULAR COIL	CIRCULAR COIL
Gap:	0 – 30mm	0 – 15mm
Main Axis	±70mm	±5mm
Cross Axis	±5mm	±5mm
Rotational	±5°	360°
Main Axis Angular	±3°	±3°
Cross Axis Angular	±3°	±3°
Remote Head Cable Length	0-2m	0-2m

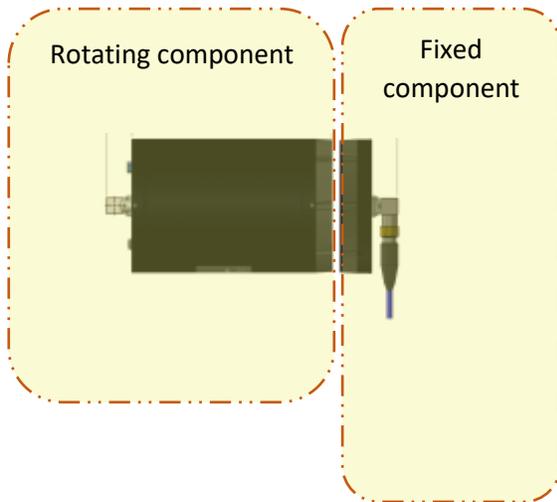
Circular Coil Configuration



Remote Head Option, Circular Coil



Integrated Head Option, Circular Coil



Application Example: rotational applications
e.g. slip ring replacement



TORDEN™

/tordən/ ᚠᚱᚦᚢ

As the secret of the runes unlocked insight and ability in Norse mythology, WiSub is on the journey to unlock the secret of pinless underwater connection by delivering relevant product and co-developing innovative applications with our customers.

WiSub's pinless subsea connection systems are delivered through different products which have been named after powerful weather phenomenon mentioned in the old Norse sagas.

The word Torden means "thunder", both word and product receiving their name from Thor, the hammer-wielding god that the Vikings believed caused thunder and lightning.

