

THE WORLD'S LARGEST FREE-SWIMMING TRENCHER RANGE

Q-TRENCHER 1600

The Q-Trencher 1600 is a high powered free-swimming jet trencher, with optional track drive for enhanced burial capability and optional tracked skids for bespoke tool deployment. With 1.2MW of total power, the trencher delivers 800kW of variable high pressure jetting power for trenching and up to 300kW of LP water jetting for trench backwash, education or trench collapse. The complete system spread sets a new standard in severe weather deployment operation, up to sea state 6 as standard and able to deploy the ROV in buoyant or heavy mode up to 18Te, allowing deployment of chain cutters and drill systems.

FEATURES

- 1600hp (1200kW) of installed variable power
- 3.0m max jet trenching depth capability to 100KPa
- 300kW rear eductor/backwash/backfill system
- Optional 350kW, 2.0m chain trenching depth capability
- Optional 350kW, 1.2m wheel cutter trenching depth capability
- 3000m maximum water depth
- Up to sea state 5/6



SMD CUSTOMISATION SERVICE

SMD understand that every customer is different and therefore have individual needs from their systems. In order to meet your specific requirements SMD can customise our vehicles using our range of standard components to suit your preference and performance requirements.

SYSTEM SPECIFICATIONS

GENERAL

Depth rating.....	2000msw
Dimensions	
Length	7.8m
Width	5.0m
Height	6.0m
Weight in air (skids)	40te
Submerged weight	Neutral
Max bollard pull.....	1000kg

PERFORMANCE

Vertical	2.0 knots
Fore / aft	3.0 knots
Lateral	2.0 knots
ROV power	1200kW total

THRUSTERS

Vectored / forward	4 x Curveteck HTE500
Vertical	4 x Curveteck HTE500
Pitch and roll capability	10-15°

MECHANICAL

Construction	High strength steel chassis
Buoyancy	Syntactic foam with macrospheres

JETTING SKID

Configuration.....	Twin leg jet tool with constant angle
Swords	2.0 & 3.0m with switchable sections
Trench depth	3.0m
Jetting pressure	Variable 10-15bar
Water pumps.....	2 x 400kW
Water supply	2400m ³ /hr

CHAIN CUTTER SKID

Configuration.....	Central chain cutter with
.....	enclosed depressor
Chain depth	2.3m with 4m MBR
Skid power	400kW HPU
Dredge pump.....	75kW
Cable handling	Cable arms and bellmouth

HYDRAULIC SYSTEM

Installed power	2 x 200kW
Cylinders	Smart heavy duty marine type
Valves.....	Directional and counterbalance
Valve packs	Stainless steel, oil compensated
Manifolds, pipes and fittings	Stainless steel
Hoses	Multi-spiral flexible hoses

SUBSEA ELECTRONICS

Electronics pod	One atmosphere pressure vessel
Depth Rating	3000m
Test pressure	1.25x working pressure
Data transmission	Fibre optic multiplexer

TYPICAL SUBSEA SURVEILLANCE

Cameras.....	Capacity for up to 8 cameras
Lamps	12x LED subsea lamps
Pan and tilt	5x 24V P&T units
Sonar	Kongsberg
Gyro	Fibre optic
Profilers (optional)	Kongsberg

SUBSEA INSTRUMENTATION

Heading	Fibre optic gyro
Altitude	Profiling sonars
Pitch and roll.....	Inclinometer
Load	Shear pin load cell
Displacement.....	In-cylinder transducer
Distance	Rotary encoder
Pressure	Absolute and differential
Position	Proximity sensor
Hydrophone.....	Benthos

OTHER EQUIPMENT

Control system.....	20ft ISO container
Power system	1x 20ft & 1 x 12ft ISO containers
A-frame handling system.....	2-cylinder, narrow angle
.....	40-45te SWL, sea state 5/6
Umbilical system.....	25te SWL winch, sea state 5/6
Deck HPU	460kW
Spares package	Optional packages available