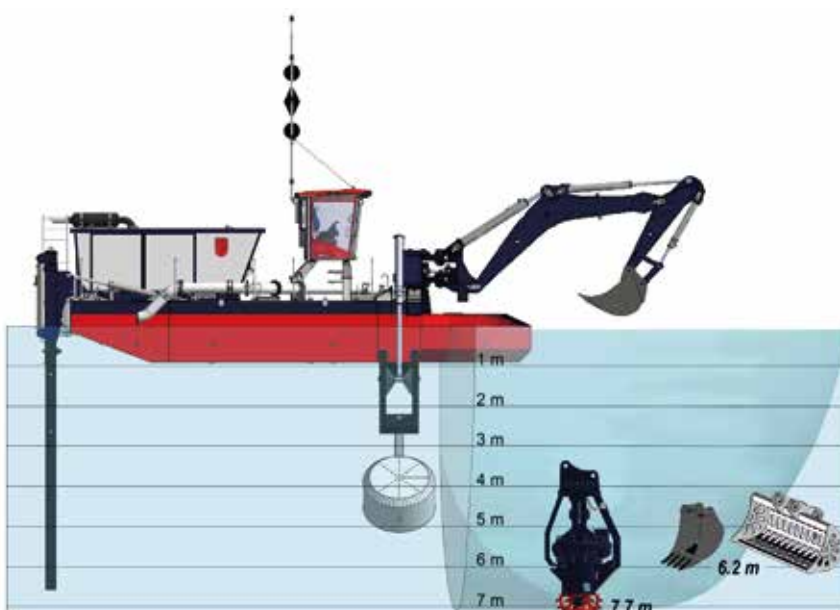


# Multifunctional Amphibious Dredger

## Octopus 10



Italdraghe, based on the pluriannual experience of cutter suction dredger production, has developed the multifunctional amphibious dredger in order to perform all shallow water work from dry ground to water and marshy/muddy soils. This dredger is specifically designed for multi purposes work with only one machine – water work, for working from the land side, suction dredging, excavating, raking and pile-driving.



### VERSATILITY

Italdraghe differentiates from other players in the market for its flexibility given by custom made dredgers designed in order to satisfy specific customer needs.

### QUALITY

Italdraghe masters the production of high-quality dredgers thanks to a deep know-how and expertise of the dredging industry developed over a more than 60 years' experience in the sector.

### EFFICIENCY

Thanks to its exceptional pumping rate, low maintenance costs and low cost per cubic meter, Italdraghe can offer its clients highly efficient dredgers.

## HULL

Mono hull divided into watertight compartments	
Waterline length	11,50 m
Width at transport without side pontoons	3,50 m
Transport height	3,30 m
Average draught full load	0,65 m
Effective Dredging depth with dredging pump	7,00 m
Effective Dredging depth in backhoe dredging	6,00 m
Corrosion resistant marine painting (inside and outside the hull)	
Manhole to enter watertight spaces	

## CABIN

Engine and hydraulic system control instruments panel	
Seat with arms joystick control	
360 - degree visibility	
Interior and external working lights	24 Volts
Air conditioning	
Radio	

## DIESEL ENGINE

FPT C9 turbo charged (or equivalent brand) 6-L cylinders 4 strokes	
Displacement	8.7 liters
Power	230 kW
Fuel capacity	1500 liters
Water-cooled by radiator	
Electric starting	24 Volts

## HYDRAULIC SYSTEM

Variable capacity pump for dredging and propulsion	
Piston pump for stabilizers and excavator arm	
Maximum working pressure	350 bar

## STABILIZERS

Two liftable stabilizers at the bow Maximum depth	6 m
Two liftable stabilizers at the stern Maximum depth	7 m

## EXCAVATOR

Swinging angle	175° / 180°
Bucket cylinder breakout force	85 kN
Arm cylinder digging force	50 kN
Digging depth	7,0 m
Lifting force at maximum boom radius	25 kN

## PROPULSION

Azimuthal rotation 40°+40° by hydraulic jack	
Power	75 kW
Hydraulic depth regulation for raising of the propeller and operating in shallow water	

Model	Unit	BD1	BD2
Mixture capacity max*	[m <sup>3</sup> /h]	600	900
Impeller speed max	[rpm]	1700	1300
Max power at shaft*	[kW]	90	110
Discharge diameter	[mm]	250	250
Spherical passage	[mm]	60	90
Impeller size	[mm]	360	460
Total head	[m]	56	60
Weight (without cutter head)	[kg]	450	900
Total weight (with cutter head)	[kg]	750	1200
Max hydraulic pressure*	[bar]	340	350
Max hydraulic pump flow*	[L/min]	198	200

## CUTTER MODEL

Cutter power	[kW]	14	16
Oil capacity	[L/min]	30	30
Oil pressure	[bar]	340	350

## WATER JET MODEL

Water capacity	[m <sup>3</sup> /h]	130	150
Water pressure	[bar]	6	6

\*Maximum values that might be subject to partial reduction depending on specific working conditions

## MAIN CHARACTERISTICS

- Available custom made in order to satisfy the specific customer requests
- Dredging head with submergible pump -octopus 10 can be equipped either by BD1 or BD2
- Dismountable and transportable by road or sea
- Easy and fast assembly and dismounting
- Moved by diesel energy
- Environmental friendly dredger
- Low maintenance costs
- Highly efficient in terms of fuel consumption
- Self launching and mobilizing without crane
- Easy to operate by a single person from the control cabin
- Self propelled by hydraulic rudder propeller
- Multiple interchangeable tools
- Spare parts available from stock
- Quality certificate ISO 9001:2015

## ADDITIONAL FEATURES

- RINA or BV Class ✳ HULL DREDGER
  - Right and left rainbow lance
  - Positioning system
  - In loco operators' training
- Multiple quickly interchangeable tools to be applied on such as:
- ✓ Cutter dredging rake for cutting and harvesting vegetation (i.e. water hyacinths) width, mm. 2750-height mm.-900
  - ✓ Grab bucket clamshell 600 Liters
  - ✓ Beckhoe dredging bucket with teeth 600 Liters