

ROAD & CONSTRUCTION RAIL & INFRASTRUCTURES FOUNDRY & STEEL MILL MINING & FORESTRY





Multi-purpose telescopic excavator

is self-propelled multi-purpose landscaping machine mounted on automobile chassis TATRA 158 Phoenix (alternatively other type- MAN, IVECO, KAMAZ,KRAZ,MERCEDES,RENAULT). The machine is designed for finishing earthworks and excavation work, with the use of a suitable tool, it is also suitable for other work, such as dredging of base grooves and channels, building and maintenance of engineering networks, repairs of oil and gas pipelines.

Application:

- » Building and maintenance of infrastustucture
- » Excavating and finishing earthworks
- » Cleaning of banks, rivers and streams
- » Road maintenance and drainage channels
- » Building of engineering networks
- » In unrestrained disasters and natural catastrophes

The great advantage of the machine UDS on the automobile chassis is:

- » fast deployment and movement also under extreme conditions
- » excellent machine passage even on heavy terrain
- » wide reach of the work tool
- >> To operate and control the vehicle directly from the superstructure cabin (with microtravel mode for works where frequent movement to the short distance is required)



Main advantages

- > Mobility
- > Working range
- > Microtravel
- > Rotating head

Mobility

Telescopic excavator on automotive chassis, large working radius with fast moving between positions. Excellent passability in difficult terrain, thanks to the automobile chassis.

> Working range

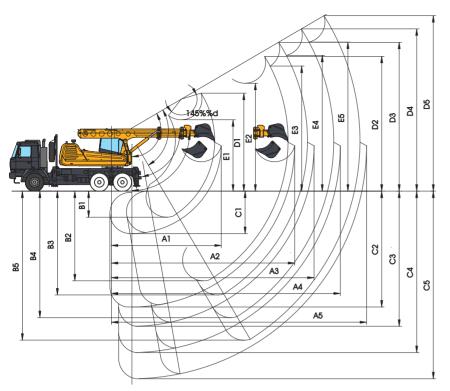
The unique construction of the telescopic boom with a sophisticated extension arms system allows to reach a horizontal range up to 14.6m

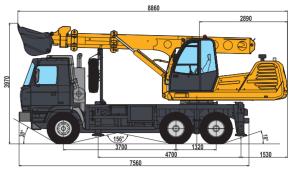
> Microtravel

The ability to control the chassis from the excavator cabin increases work productivity and UDS operability at the workplace. The movement, turning and stabilization of the machine is controlled by the operator without getting into the chassis cabin.

> Rotating head

The ability of rotating the tool in the full range n x 360 degrees increases machine variability during excavation works or with the use of additional attachments, e.g. hydraulic hammer, mulcher, nippersetc.







Technical specifications

Working range

A Horizontal reach		D Dumping height	
A1 with retracted telescope	6,3m	D1 with retracted telescope	3,4m
A2 with extended telescope	10,5m	D2 with extended telescope	5,5m
A3 with 1,5 m extension arm	11,6m	D3 with 1,5 m extension arm	6,6m
A4 with 3,0 m extension arm	13,1m	D4 with 3,0 m extension arm	7,4m
A5 with 4,5 m extension arm	14,6m	D5 with 4,5 m extension arm	8,2m
B Depth reach		E Height reach	
(at telescopic arm range 0°, - 90°)		E1 with retracted telescope	5m
B1 with retracted telescope	2,9m	E2 with extended telescope	7m
B2 with extended telescope	7m	E3 with 1,5 m extension arm	8m
B3 with 1,5 m extension arm	8,2m	E4 with 3,0 m extension arm	8,7m
B4 with 3,0 m extension arm	9,7m	E5 with 4,5 m extension arm	9,5m
B5 with 4,5 m extension arm	11,2m		
C Depth reach			
(at telescopic arm range 30°, -60°)			
C1 with retracted telescope	2,1m		
C2 with extended telescope	5,7m		
C3 with 1,5 m extension arm	6,6m		
C4 with 3,0 m extension arm	7,9m		
C5 with 4,5 m extension arm	9,2m		

Dimnensions

Machine length: 10200 mm
 Machine width: 2550 mm
 Machine height: 3900 mm
 Height of chassis above ground: 285 mm

Working parameters

Output at shovelling (excavating):
 retracted telescope:
 extended telescope:
 Maximum total excavating force

from thrust and retraction of the boom: 85KN

» Load capacity on the tilting point of the telescope (without the use of extension arms)

Superstructure revolutions:
 Tool revolutions:
 Maximum travel speed:
 Climbing ability on a hard surface:
 Overall machine weight:
 Superstructure revolutions:
 20 ot.min-1
 100 km.h-1
 50,7 %
 24 800 kg

TATRA 815 chassis

» Three axles, with permanent drive of both rear axles, with possibility to engage the front axle drive and differential closures. 6x6 drive, chassis engine output:

230 kW

Superstructure engine

» Engine: 93 - 104kW pri 2200 ot.min-1

» General description: compression ignition, four-stroke with direct

fuel injection, in-line, vertical

Cooling: liquid-type with forced
circulation and thermo regulator

Lubrication: engine oil circulation under pressure

» Number/ volume of cylinders:» Hydraulic system:A / 4,5 dm3REXROTH

Working equipment

A telescopic boom - basic working range: + 30°, -60°, when readjusted positioning arm: 0°, - 90° from the

horizontal plane.

The range of tool tilting: 145°, 145°, both directional 360° rotation of the tool

Additional hydraulics: for hydraulically controlled attachments is mounted in the working tool rotation circuit (as a standard for modification 41 and on request for

rotation circuit (as a standard for modification 41 and on reques modification 42) and enables the use of hydraulically driven

attachments.

Operation modes of UDS 214 modification 41

The UDS 214 modification 41 machine can operate in two modes:

- » "WORK"mode working with the superstructure
- » "DRIVE"mode enables control of the auxiliary drive microtravel

(to cover short distance on site), as well as the stabilizing supports directly from the superstructure cabin, without the need to start the undercarriage engine.

The UDS 214 modification 42 is without microtravel function (auxiliary drive).

Hydraulic power units

» double hydro-generator A8 VO 107

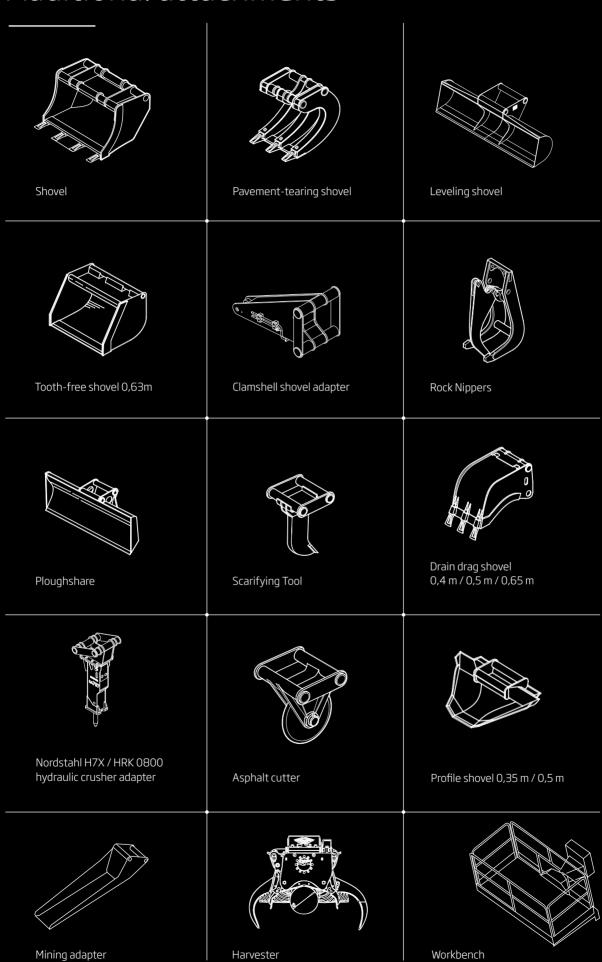
» gear hydro-generator 1PF 2G2 - 016:

Distributors:

non-regulatory

seven-circuit monoblock 7M8-22

Additional attachments



UDS in the world



