



HSM – High-performance forestry machines for your requirements



The HSM product line includes special forestry tractors, forwarders, harvesters and combination forestry machines that are developed for use in forestry.

HSM has a long tradition of commitment to developing state-of-the-art technology for sustainable care of the soil and

sustainable productivity of forests. With narrow machines and wide tyres, the technical navigability of logging trails is maintained and forestry is supported in a way that is both economically and ecologically sustainable.

#### Tried-and-tested design

HSM forestry machines are available in different performance classes and with many innovative options. HSM offers the ideal forestry machine for all conditions and fields of application from thinning to harvesting.

An attractive range of special accessories meets customer needs down to the smallest detail, providing highly efficient forestry technology. What all machines have in common is production from a single source, direct from the manufacturer and most importantly, without complex modification work from a third party. The diverse needs of our customers can be completely implemented without delay, from sales consultation to delivery.

Today, consistent further development of the products makes HSM the embodiment of high-performance forestry machines that conserve soil and the environment.











From 805 to HSM 904ZL, HSM offers the right 4-wheel crane forwarder for every need. Designed for jobs from thinning to harvesting in deciduous forests under difficult conditions. What they all have in common is their robust design with central torsion and compact dimensions, with tyres as wide as 940 mm at outside dimensions of less than 3 metres.

For every performance class, HSM offers the perfect selection of cranes with internal hoses, attached low on the vehicle. State-of-the-art engine technology, high-performance hydraulics and innovative drive technology, such as the High Speed Drive or Twin Power Drive transmission, round off the range.

Professional technology for cost-effective forwarding

#### ♣ Work area light system all in LED

# Ergonomic panorama comfort cab for an all-round view, automatic climate control, electric swivel seat and plenty of

◆ Cab can be tilted hydraulically for maintenance work

 Different front shields fixed or tiltable, in quick-change system or front-loader (depending

Wide tyres

on model)

with small exterior width e.g.: 28L-26, 2.550 mm wide



in different performance classes suitable for every need from Epsilon or Mesera with interior hoses

♣ Adler cable winches / TCM cable winches from 2 x 8 tonnes to 2 x 16 tonnes tractive force

 Stable straight shields with or without clamping workbench, height-adjustable roller block and

 Shell gripper or two-finger gripper

+ Fold-down, fully closing bottom panels for protection against branches and rocks

 Stable centre joint with hydraulic stabilisation

♣ Strong planetary axles from NAF

 Climbing rung robust and flexible

#### Technical specifications from page 15.

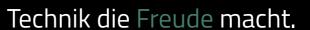
We would be happy to arrange a personal consultation appointment with one of our sales representatives.







THUMAN









# HSM crane forwarder agile – flexible – high-performance





In no other working environment are the requirements as varied as in forestry. Therefore, HSM has devoted its entire innovative ability to finding suitable solutions for the past 50 years. HSM produces crane forwarders with a wide variety of innovative options for your success, thus supporting state-of-the-art and sustainable forestry.



Innovation for productivity

and soil conservation







With the development of a new generation of the 6-tyre crane forwarder 805 6WD, 805HD 6WD and 904 6WD, HSM has again proved itself as the leading innovator for the development of soil-conserving and productive logging technology. Equipped with various options (e.g. harvesting head, quick-change clamping workbench), this machine makes a greater utilisation and more flexible utilisation options possible, thus contributing to more economic success for the operator.



#### + 904 6WD

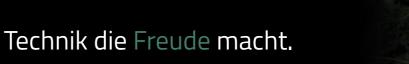
with standard tiltable crane pillar for even more flexibility and conservation in use

- Work area light system all in LED
- Cab can be tilted hydraulically
- for maintenance work
- Ergonomic panorama comfort cab for an all-round view, automatic climate control, electric swivel seat and plenty of storage
- Different front shields

Optionally fixed or tiltable, in the quick-change system or front loader (depending on model)

- Climbing rung robust and flexible
- Fold-down, fully closing bottom panel for protection against branches and rocks
- Strong Epsilon crane
   from S120 X150 and
   Forwarding distance up to max. 10.4 m
- Strong Adler cable winches
   with tractive force of up to 2 x 16 tonnes
   and of a cable take-up of up to 180 m
- Different grips
   Choice of Epsilon,
   Mesera or Hultdins
- Different straight shields
   with a quick-change clamping workbench,
   height-adjustable roller block and much

Technical specifications see pages 18, 19 and 23. We would be happy to arrange a personal consultation appointment with one of our sales





## Custom solutions Ready for all cases

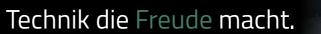








As a forestry contractor, you are often confronted with new challenges. HSM and the HSM dealers therefore offer many custom solutions, such as harvester heads incl. attachment, grapple saws, grapple shells, buckets, branch saws, quick-change systems and much more. So you are always ready for all tasks.



Whether long or short timber, the multi-purpose series from HSM opens all possibilities without compromises.

The one-of-a-kind concept with a quick-change system for clamping workbench and stanchions, height-adjustable roll support, double-drum winches with up to 2 x 16 tonnes tractive force and much more provide ideal utilisation with a machine for long and short timber.

NGGR) EPSILON



Technik die Freude macht.

Comfort, ergonomics, function and overview are priorities in HSM machines and are constantly being adapted to the newest advancements.

This is how drivers can easily reach their full capacity and be productive, even throughout a long workday.

The "Panorama comfort cab" sets standards in this area. Automatic climate control, electric swivelling driver's cab with all of the important functions and the newly revised CMC control system are three of the many new features that contribute to fatigue-free work.

## The focus is on comfort **HSM Panorama comfort cab**









- ♣ Electric swivelling driver's cab
- ♣ Automatic climate control
- ♣ Integrated diagnostic tool
- ♣ Work area light system all in LED
- ♣ Windscreen without A-pillar for an even better front view
- ♣ High-arching rear window for maximum view
- ♣ Hinged and adjustable side and door window
- ♣ State-of-the-art central electrical system with illuminated fuses and relay plate
- + Fold-out table for a relaxing break now and then
- Storage compartment for snacks and drinks
- ♣ LED-lit ascent
- Switchable (using key fob) "going-home" lighting of two work lights
- ♣ 12 volt and 24 volt interior socket
- # Glove dryer

## Your requirements are our drive

HSM offers state-of-the-art, energy-efficient and economical drive technology

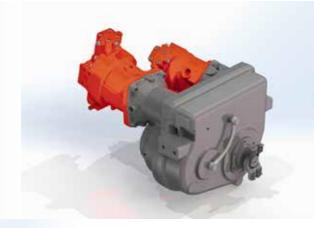


### State-of-the-art engine technology from Volvo Penta

- **★** powerful
- energy-efficient
- economical
- ♣ EU Stage V
- ♣ 4 cyl. up to 175 kW
- ♣ 6 cyl. up to 250 kW

#### **HSM TWIN Power Drive**

- switching under load
- smooth switching and reversing operations
- increased productivity
- best comfort
- efficient repositioning





### **HSM High Speed Drive**

- higher speed in first gear
- optimised efficiency
- high traction forces

### **Proven NAF axles**

- integrated oil-running brakes
- bogie axles as portal or planetary axles
- bogie axles with or without balancing
- bogie lift for many models



## Technical data

#### **Engine:**

VOLVO PENTA

TAD581VE EU Stage V

129 kW (175 HP) at 1700 rpm Power: 800 Nm at 1100 - 1500 rpm Max. revolution: 816 Nm at 1380 rpm Max. torque:

Displacement: 5,13 liters

#### Transmission:

- HSM High Speed Drive (71 series)
- 2-step NAF transfer gearbox

#### Axles:

- Planetary axles
- 100 % separately selectable differential locks, front and rear

#### Brake:

- 2-circuit brake, disk brake running in an oil bath
- Spring-loaded parking brake

#### Steering:

 Articulated steering with 2 cylinders, 45° steering angle

#### Tank capacity:

Diesel: AdBlue: 25 I Hydraulic oil:

#### Hydraulic system:

Load sensing

232 litres/min at 1600 rpm Pump output: Flow rate:

up to 350 bar Pressure: Hydraulic oil: Saturated synthetic ester Panolin HLP SYNTH with Kleenoil

Microfiltration; WGK 1

#### Cabin:

- HSM Panorama comfort cab (see page 12-13)
- ROPS, FOPS, OPS tested safety cab
- Swivel seat device, air-suspended comfort seat
- Heating/air-conditioning

#### **Electrics / Instruments:**

- HSM Ecommand colour-display
- 5 operator programs + factory setting
- Diagnosis-tool and error-indication
- Graphic support at parameter editing
- Generator 110 A (28 V)
- 2 service-free dry batteries á 56 Ah

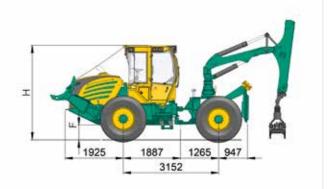
#### Standard equipment:

■ 12 LED work lamps, 24 V - 12 V voltage transformer, Radio with CD player, fire extinguisher, first-aid kit, warning triangle, tool set and much more

#### Special equipment:

- Tiltable front polder shield, front loader, trailer hitch, outer hydraulic connection, remote control for cable winch, wireless driving, auxiliary heating, sun blinds, seat area dampers
- Additional accessories on request

## 805



#### Winches:

Adler HY 16-SG (2 x 80 kN) double-drum winch Max. cable take-up 14 mm, 100 m

• Optional: Adler HY 20-SG (2 x 100 kN) double-drum winch Max. cable take-up 14 mm, 100 m

#### Weight:

12.600 kg (series)

#### Crane:

• Epsilon M80 R59 - R80 (max. range 8 m, 95 kNm lifting moment gross)

• Epsilon M90 R59 - R72

(max. range 7,2 m, 104 kNm lifting moment gross)

Mesera F81 R51 - RT65

(max. range 6,5 m, 93 kNm lifting moment gross)

• Additional cranes on request

#### Tyres:

	Size:	Total width:	H:	F:	
Series:	600/60-30,5	2360 mm	3190	560	
Optional:	650/60-26,5	2460 mm	3160	530	
	750/55-26,5	2700 mm	3160	530	
	18,4-26	2220 mm	3143	513	
	600/60-R28	2360 mm	3136	506	

#### Standard equipment:

- Fixed front polder shield, 2000 mm wide
- Lowerable straight shield
- Epsilon crane M80 R59
- Torsion lock with 2 hydraulic cylinders

#### Special equipment:

- Hydraulically height-adjustable roller block
- Clamping workbench on height-adjustable roller block
- Straight shield with sprag brake
- "Skidder France" version pulley
- Engine bonnet protection and brush guard made from tubing
- Additional accessories on request

## Technical data

#### Engine (4 cylinder):

VOLVO PENTA

TAD581VE EU Stage V

129 kW (175 HP) at 1700 rpm Power: Max. revolution: 800 Nm at 1100 - 1500 rpm Max. torque: 816 Nm at 1380 rpm

5,13 liters Displacement:

#### Optional:

VOLVO PENTA

TAD583VE EU Stage V

Power: 175 kW (238 HP) at 1750 rpm Max. revolution: 947 Nm at 1200 - 1750 rpm Max. torque: 969 Nm at 1380 rpm

5,13 liters Displacement:

#### **Transmission:**

HSM TwinPowerDrive

#### Axles:

- Planetary axles
- 100 % separately selectable differential locks, front and rear

#### Brake:

- 2-circuit brake, disk brake running in an oil bath
- Spring-loaded parking brake

#### Steering:

Articulated steering with 2 cylinders, 45° steering angle

#### Tank capacity:

Diesel: 235 l AdBlue: 25 l 100 l · Hydraulic oil:

#### Hydraulic system:

Load sensing

Pump output: 232 I/min at 1600 rpm Flow rate:

up to 350 bar Pressure: Saturated synthetic ester

• Hydraulic oil: Panolin HLP SYNTH with Kleenoil

Microfiltration; WGK 1

#### Cabin:

- HSM Panorama comfort cab
- ROPS, FOPS, OPS tested safety cab
- Swivel seat device, air-suspended comfort seat
- Heating/air-conditioning

#### Electrics / Instruments:

- HSM Ecommand colour-display
- 5 operator programs + factory setting
- Diagnosis-tool and error-indication
- Graphic support at parameter editing Generator 110 A (28 V)
- 2 service-free dry batteries á 55 Ah

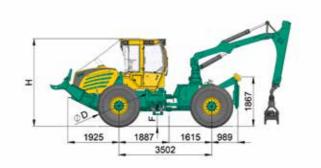
#### Standard equipment:

- 12 LED work lamps, 24 V 12 V voltage transformer, radio with CD player, fire extinguisher, first-aid kit, warning triangle, tool set
- Torsion lock with 2 hydraulic cylinders and much more

#### Special equipment:

- Tiltable front polder shield, trailer hitch, outer hydraulic connection, remote control for cable winch, wireless driving, auxiliary heating, sun blinds, seat area dampers
- Additional accessories on request

## 805HD



#### Winches:

Adler HY 20-SG (2 x 100 kN) double-drum winch Series: Max. cable take-up 14 mm, 100 m

• Optional: Adler HY 24-SG (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 130 m Adler HY 32-SG (2 x 160 kN) double-drum winch Max. cable take-up 14 mm, 130 m Adler HY 32-0 (2 x 160 kN) double-drum winch Max. cable take-up 14 mm, 150 m Adler HY 32-LO (2 x 160 kn) double-drum winch Max. cable take-up 14 mm, 190 m

#### Weight:

• from 13.800 kg

#### Crane:

• Epsilon M80 R59 - R80 (max. range 8 m, 95 kNm lifting moment gross)

• Epsilon M90 R59 - R80 (max. range 8 m, 104 kNm lifting moment gross)

• Epsilon S110 R59 - R80 (max. range 8 m, 126 kNm lifting moment gross)

 Mesera M102 R67 - R73 (max. range 7,3 m, 130 kNm lifting moment gross)

Additional cranes on request

#### Tyres:

	Size:	Total width:	H:	F:
Series:	23.1 x 26	2360 mm	3300	530
<ul><li>Optional:</li></ul>	28L-26	2600 mm	3310	536
	24.5 x 32	2430 mm	3400	630
	30.5 x 32	2730 mm	3410	640
	710/55-34	2620 mm	3330	563
	67x34-25	3000 mm	3290	525

#### Standard equipment:

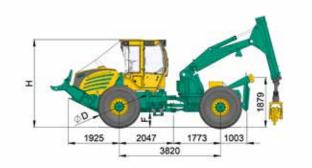
- Fixed front polder shield, 2000 mm wide
- Lowerable straight shield
- Epsilon crane M80 R59

#### Special equipment:

- Hydraulically height-adjustable roller block
- Clamping workbench on height-adjustable roller block
- Straight shield with sprag brake
- "Skidder France" version pulley
- Engine bonnet protection and brush guard made from tubing
- Additional accessories on request

## **805HD ZL**

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#### Winches:

Adler HY 20 (2 x 100 kN) double-drum winch Series: Max. cable take-up 14 mm, 100 m

• Optional: Adler HY 24-0 (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 130 m Adler HY 32-0 (2 x 160 kN) double-drum winch Max. cable take-up 14 mm, 150 m Adler HY 32-LO (2 x 160 kN) double-drum winch Max. cable take-up 14 mm, 190 m TCM 16+ (2 x 160 kN) double-drum winch Max. cable take-up 14 mm, 220 m

#### Weight:

• from 14.600 kg

#### Crane:

• Series:	
Articulated arm with simple telescope:	6,1 m range
Lifting moment gross:	270 kNm
Slewing angle:	210°
Slewing torque:	80 kNm
<ul><li>Optional: HSM S3 - 7.5</li></ul>	7,5 m range
HSM S3 - 8.4	8,4 m range
HSM S3 - 10	10 m range

#### Tyres:

	Size:	Total width:	H:	F:
Series:	23.1 x 26	2360 mm	3300	530
<ul><li>Optional:</li></ul>	28L-26	2600 mm	3310	536
	24.5 x 32	2430 mm	3400	630
	30.5 x 32	2730 mm	3410	640
	710/55-34	2620 mm	3330	563
	67x34-25	3000 mm	3290	525

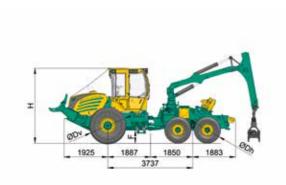
#### Standard equipment:

- Fixed front polder shield, 2000 mm wide
- Straight shield as sprag brake

#### Special equipment:

- Hydraulically height-adjustable roller block
- "Skidder France" version pulley
- Straight shield "France"
- Engine bonnet protection and brush guard made from tubing
- Additional accessories on request

## 805 6WD



#### Winches:

Adler HY 20 (2 x 100 kN) double-drum winch

Max. cable take-up 14 mm, 100 m

• Optional: Adler HY 24 (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 130 m

#### Weight:

• from 14.100 kg

#### Crane:

- Epsilon S120 R80
- (max. range 8 m, 139 kNm lifting moment gross)
- Epsilon S120 R96

(max. range 9,6 m, 139 kNm lifting moment gross)

#### Tyres:

Series: Minimum width: Front: 23,1 x 26 2550 mm 3300 530 710/40x22,5 Rear:

The minimum width changes when using belts (+100). Other tyres on request.

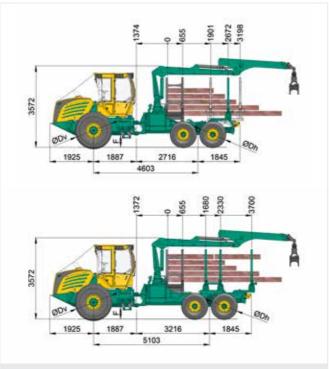
#### Standard equipment:

- Fixed front polder shield, 2000 mm wide
- Lowerable straight shield
- Epsilon crane S120 R80

#### Special equipment:

- Clamping workbench on roll supports
- Engine bonnet protection and brush guard made from tubing
- Bogie lift at the rear
- Additional accessories on request

## 805F Kombi short/long



#### Winches:

Adler HY 16-SG (2 x 80 kN) double-drum winch

Max. cable take-up 14 mm, 100 m

• Optional: Adler HY 20-SG (2 x 100 kN) double-drum winch Max. cable take-up 14 mm, 100 m

#### Weight:

• from 14.600 kg / 14.800 kg

#### Payload:

■ 9 t

#### Crane:

- Epsilon Kran M70 F80 (series)
- For further cranes see crane brochure

#### Tyres:

Series:	Size:	Minimum width:	H:	F:
Front:	23,1 x 26	2550 mm	3540	530
Rear:	710/40x22,5			
<ul><li>Optional:</li></ul>	28L-26	2600 mm		
	620/75-26	2400 mm		
	600/65-34	2360 mm		
	710/55-34	2620 mm		
	67x34-25	3000 mm		

The minimum width changes when using belts (+100). Other tyres on request

#### Standard equipment:

- Headboard grid and first stanchion removable
- Last stanchion can be removed and adjusted to

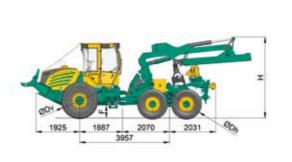
(short) 1,9 m, 2,7 m and 3,2 m (long) 2,4 m, 3,1 m and 3,7 m

- Height-adjustable roller block
- reversing camera with color monitor
- rear headlights

#### Special equipment:

- Front polder shield
- Straight shield
- Clamping workbench with quick-change plate
- Rotating stanchion
- Kombi long: Twin stanchions as 2nd and 3rd stanchion on quick-change plate
- · Additional accessories on request

## 805HD 6WD



#### Winches:

Adler HY 20 (2 x 100 kN) double-drum winch Max. cable take-up 14 mm, 100 m

Max. cable take-up 14 mm, 150 m

• Optional: Adler HY 24 (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 130 m Adler HY 32 (2 x 160 kN) double-drum winch

#### Weight:

• from 15.300 kg

#### Crane:

Tiltable Epsilon X150 R80 Series:

(max. range 8 m, 170 kNm lifting moment gross)

• Optional: Epsilon X150 R104 tiltbar

(max. range 10,4 m, 170 kNm lifting moment gross)

#### Tyres:

Series:	Size:	Minimum width:	H:	F:
Front:	23,1 x 26	2550 mm	3595	530
Poar-	710//.5×26.5			

The minimum width changes when using belts (+100). Other tyres on request.

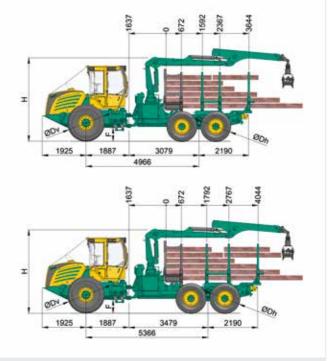
#### Standard equipment:

- Fixed front polder shield, 2000 mm wide
- Straight shield as sprag brake

#### Special equipment:

- Clamping workbench on height-adjustable roller block
- "Skidder France" version pulley
- Engine bonnet protection and brush guard made from tubing
- Bogie lift back
- Additional accessories on request

## 805HDF Kombi short/long



#### Winches:

Adler HY 20-SG (2 x 100 kN) double-drum winch

Max. cable take-up 14 mm, 100 m

• Optional: Adler HY 24-SG (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 130 m Adler HY 32-SG (2 x 160 kN) double-drum winch

Max. cable take-up 14 mm, 130 m

### Weight:

• from 15.300 kg / 15.500 kg

#### Payload:

■ 11 t

#### Crane:

- Epsilon M70 F80 (series)
- For further cranes see crane brochure

#### Tyres:

Series:	Size:	Minimum width:	H:	F:
Front:	23,1 x 26	2550 mm	3670	530
Poar-	710//5×26.5			

The minimum width changes when using belts (+100). Other tyres on request.

#### Standard equipment:

- Headboard grid and first stanchion removable
- Last stanchion can be removed and adjusted to (short) 2,4 m, 3,2 m and 3,8 m (long) 2,8 m, 3,6 m and 4,2 m
- Height-adjustable roller block
- Reversing camera with color monitor
- Rear headlights

#### Special equipment:

- Front polder shield
- Straight shield
- Clamping workbench with quick-change plate
- Twin stanchions as 2nd and 3rd stanchion on quick-change plate
- Rotating stanchion
- Bogie lift at the rear
- Additional accessories on request

## 805H1

#### Engine (4 cylinder):

VOLVO PENTA

TAD583VE EU Stage V

175 kW (238 HP) from 1750 rpm Power: 947 Nm from 1200 - 1750 rpm Max. revolution:

969 Nm at 1380 rpm Max. torque:

Displacement: 5,13 liters

#### **Transmission:**

HSM TwinPowerDrive

#### Axles:

- Planetary axles
- 100 % separately selectable differential locks, front and rear

- 2-circuit brake, disk brake running in an oil bath
- Spring-loaded parking brake

#### Steering:

Articulated steering with 2 cylinders, 45° steering angle

#### Tank capacity:

Diesel: 235 l AdBlue: 25 l Hydraulic oil:

#### Hydraulic system:

Load sensing

• Pump output: Flow rate: 304 l/min at 1600 rpm

Pressure: up to 350 bar • Pump output: Saturated synthetic ester

Panolin HLP SYNTH with Kleenoil

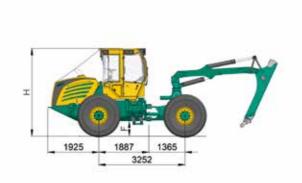
Microfiltration; WGK 1

#### Cabin:

- HSM Panorama comfort cab
- ROPS, FOPS, OPS tested safety cab
- Swivel seat device, air-suspended comfort seat
- Heating/air-conditioning

#### **Electrics / Instruments:**

- HSM Ecommand colour-display
- 5 operator programs + factory setting
- Diagnosis-tool and error-indication
- Graphic support at parameter editing
- Generator 110 A (28 V)
- 2 service-free dry batteries á 55 Ah



#### Standard equipment:

• 12 LED work lamps, 24 V - 12 V voltage transformer, Radio with CD player, fire extinguisher, first-aid kit, warning triangle, tool set

8 m

Torsion lock with 2 hydraulic cylinders and much more

#### Special equipment:

- Auxiliary heating, seat area dampers, vacuum pump, Diesel filling pump
- Other accessories on request

#### Crane:

- Epsilon S110 R80
- Tiltable +15° / -15° (optional)
- Range:
- 126 kNm Lifting moment gross: Slewing torque net: 33 kNm

#### Aggregate:

- Logmax 4000
- Other aggregate on request
- LOG Mate 510

#### Tyres:

<ul><li>Series:</li><li>Optional:</li></ul>	Size:	Minimum width:	H:	F:
	23,1 x 26	2360 mm	3300	530
	28L-26	2600 mm	3310	536
	24.5 x 32	2430 mm	3400	630
	30.5 x 32	2730 mm	3410	640
	710/55-34	2620 mm	3330	563
	67 x 34-25	3000 mm	3330	525

#### Weight:

■ 13.200 kg

## Engine (4 cylinder):

VOLVO PENTA

TAD583VE EU Stage V

175 kW (238 HP) from 1750 rpm Power: 947 Nm from 1200 - 1750 rpm Max. revolution:

969 Nm at 1380 rpm Max. torque:

Displacement: 5,13 liters

#### Transmission:

HSM TwinPowerDrive

#### Axles:

- Planetary axles
- 100 % separately selectable differential locks, front and rear

- 2-circuit brake, disk brake running in an oil bath
- Spring-loaded parking brake

#### Steering:

• Articulated steering with 2 cylinders, 45° steering angle

#### Tank capacity:

Diesel: 235 I AdBlue: 25 I Hydraulic oil: 100 l

#### Hydraulic system:

Load sensing

• Pump output:: Flow rate: 304 l/min at 1600 rpm up to 350 bar

Pressure: Pump output:

Saturated synthetic ester Panolin HLP SYNTH mit Kleenoil

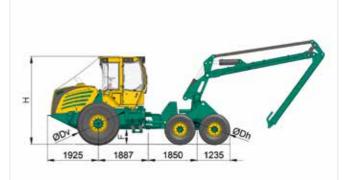
Microfiltration; WGK 1

#### Cabin:

- HSM Panorama comfort cab
- ROPS, FOPS, OPS tested safety cab
- Swivel seat device, air-suspended comfort seat
- Heating/air-conditioning

#### **Electrics / Instruments:**

- HSM Ecommand colour-display
- 5 operator programs + factory setting
- Diagnosis-tool and error-indication
- Graphic support at parameter editing
- Generator 110 A (28 V) • 2 service-free dry batteries á 55 Ah



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#### Standard equipment:

- 12 LED work lamps, 24 V 12 V voltage transformer, Radio with CD player, fire extinguisher, first-aid kit, warning triangle, tool set
- Torsion lock with 2 hydraulic cylinders and much more

#### Special equipment:

- Auxiliary heating, seat area dampers, vacuum pump, Diesel filling pump
- Other accessories on request

#### Crane:

805H16WD

- Mesera L 181 V 100
- Tiltable +15° / -15°

Range: 10 m

138 kNm Lifting moment gross:

Slewing torque net: 38,4 kNm

#### Optional:

■ Epsilon X150 R104

Range: 10,4 m

• Lifting moment gross: 170 kNm 52 kNm Slewing torque net:

#### Aggregate:

- Logmax 4000
- Other aggregate on requestLOG Mate 510

#### Tyres:

Series:	Size:	Minimum width:	H:	F:
front:	23,1 x 26	2550 mm	3300	536
rear:	710/40 x 22,5			

#### Weight:

■ 15.000 kg

## Technical data

#### Engine (6 cylinder):

 VOLVO PENTA TAD881VE EU Stage V

185 kW (252 HP) from1600 rpm Power: 1150 Nm from 1100 - 1500 rpm Max. revolution:

1175 Nm at 1400 rpm Max. torque:

Displacement: 7,7 liters

Optional:

VOLVO PENTA

TAD882VE EU Stage V 210 kW (286 HP) from 1700 rpm Power: Max. revolution: 1225 Nm from 1100 - 1600 rpm

Max. torque: 1255 Nm at 1400 rpm

7,7 liters Displacement:

#### Transmission:

HSM High Speed Drive (71 series); ■ 904H:

speed at 1st gear 0-14 km/h

■ 904ZF: ZF 6WG-190 load switching converter transmission

6 forward gears, 3 reverse gears

#### Axles:

Planetary axles

• 100 % separately selectable differential locks, front and rear

• 2-circuit brake, disk brake running in an oil bath

• Spring-loaded parking brake

#### Steering:

Articulated steering with 2 cylinders, 45° steering angle

#### Tank capacity:

Diesel:	904H: 210 l	904ZF: 225 l
AdBlue:	45	45
<ul> <li>Hydraulic oil:</li> </ul>	110	150 l

#### Hydraulic system:

Load sensing

• Hydraulic oil:

• Variable pump (working pump) 904H:

flow rate: pressure:

304 I/min at 1600 rpm up to max. 350 bar

• Variable pump (working pump) 904ZF:

224 I/min at 1600 rpm flow rate:

up to max. 350 bar pressure:

Saturated synthetic ester Panolin HLP SYNTH with Kleenoil

Microfiltration; WGK 1

#### Cabin:

- HSM Panorama comfort cab (see page 12-13)
- ROPS, FOPS, OPS tested safety cab
- Swivel seat device, air-suspended comfort seat
- Heating/air-conditioning

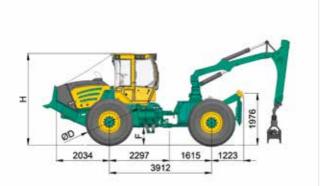
#### **Electrics / Instruments:**

- HSM Ecommand colour-display
- 5 operator programs + factory setting
- Diagnosis-tool and error-indication
- Graphic support at parameter editing
- Generator 110 A (28 V)
- 2 service-free dry batteries á 55 Ah

#### Special equipment:

- Tiltable front polder shield, trailer hitch, outer hydraulic connection, remote control for cable winch, wireless driving, auxiliary heating, sun blinds, seat area dampers
- Other accessories on request

## 904



#### Winches:

Adler HY 20-SG (2 x 100 kN) double-drum winch

Max. cable take-up 14 mm, 100 m

• Optional: Adler HY 24-SG (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 130 m

Adler HY 32-SG (2 x 160 kN) double-drum winch

Max. cable take-up 14 mm, 130 m Adler HY 32-LO (2 x 160 kN) double-drum winch

Max. cable take-up 14 mm, 190 m

#### Weight:

• from 15.200 kg

#### Crane:

Epsilon M80 R59 Series:

(max. range 5,9 m, 95 kNm lifting moment gross) • Cranes up to a lifting moment of 170 kNm and range of up to

10,4 m available. For further cranes see crane brochure.

#### Tyres:

		24,5-32	30,5-32
	D	1831	1857
904H	B*	2430	2730
	Н	3500	3507
	F	672	679
	Н	3550	3557
904ZF	F	545	552

Standard

* B: minimum
machine width (dimensions in mm)

00/75	Н	3550	3557
904ZF	F	545	552

#### Standard equipment:

- Fixed front polder shield, 2000 mm wide
- Straight shield as sprag brake

#### Special equipment:

- Hydraulically height-adjustable roller block
- Clamping workbench on height-adjustable roller block
- Straight shield with sprag brake
- "Skidder France" version pulley
- Engine bonnet protection and brush guard made from tubing
- Remote control, wireless driving
- Other accessories on request

## 904 6WD



#### Winches:

Adler HY 20 (2 x 100 kN) double-drum winch Max. cable take-up 14 mm, 100 m

Max. cable take-up 14 mm, 150 m

• Optional: Adler HY 24-0 (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 130 m Adler HY 32-0 (2 x 160 kN) double-drum winch

#### Weight:

• from 17.000 kg

#### Crane:

Epsilon X150 R80 tiltable Series:

(max. range 8 m, 170 kNm lifting moment gross)

• Optional: Epsilon X150 R104 tiltable

(max. range 10,4 m, 170 kNm lifting moment gross)

#### Tyres:

		24,5-32 710/45-26,5	30,5-32 710/45-26,5
	Dv	1831	1857
	Dh	1465	1485
904H	В*	2430	2730
	Н	3694	3701
	F	672	679
00/75	Н	3694	3701
904ZF	F	545	552

Standard

\* B: minimum machine width (dimensions in mm)

Standard	! -	
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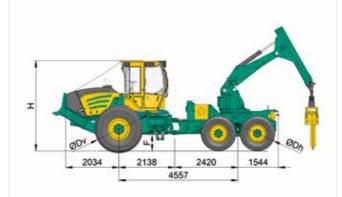
- Fixed front polder shield, 2000 mm wide
- Straight shield as sprag brake

#### Special equipment:

- Clamping workbench on height-adjustable roller block
- "Skidder France" version pulley
- Engine bonnet protection and brush guard made from tubing
- Bogie lift back
- Remote control, wireless driving
- Other accessories on request

## 904Z 6WD

23



#### Winches:

Adler HY 20-SG (2 x 100 kN) double-drum winch Max. cable take-up 14 mm, 100 m

• Optional: Adler HY 24-SG (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 130 m

Adler HY 32-SG (2 x 160 kN) double-drum winch Max. cable take-up 14 mm, 130 m

#### Weight:

■ from 17.300 kg

#### Crane:

Series:

Articulated arm with simple telescope: 6,1 m range 270 kNm Lifting moment gross: Slewing angle: 210° Slewing torque: 80 kNm

Gripper cross-section: 1,2 m<sup>2</sup> (optional 0,9 m<sup>2</sup>) • Optional: HSM S3 - 7.5 7,5 m range HSM S3 - 8.4 8,4 m range HSM S3 - 10 10 m range

#### Tyres:

		Standard 24,5-32 710/45-26,5	30,5-32 710/45-26
	Dv	1831	1857
	Dh	1465	1485
904H	В*	2430	2730
	Н	3500	3507
	F	672	679
	ш	2550	2557

\* B: minimum machine width (dimensions in mm)

	Н	3550	3557
904ZF	F	545	552

#### Standard equipment:

- Fixed front polder shield, 2000 mm wide
- Straight shield as sprag brake

#### Special equipment:

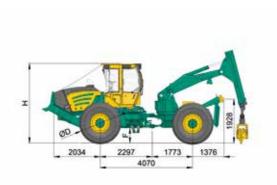
- Hydraulically height-adjustable roller block
- "Skidder France" version pulley
- Straight shield "France"

Bogie lift back

- Engine bonnet protection and brush guard made from tubing
- Remote control, wireless driving • Other accessories on request

24

## 90471



#### Winches:

Adler HY 20 (2 x 100 kn) double-drum winch Series: Max. cable take-up 14 mm, 100 m

• Optional: Adler HY 24-0 (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 130 m Adler HY 32-0 (2 x 160 kN) double-drum winch Max. cable take-up 14 mm, 150 m

Adler HY 32-LO (2 x 160 kN) double-drum winch Max. cable take-up 14 mm, 190 m TCM 16+ (2 x 160 kN) double-drum winch

270 kNm

210°

80 kNm

7,5 m range

8,4 m range

10 m range

B: minimum machine width (dimensions in mm)

1,2 m<sup>2</sup> (optional 0,9 m<sup>2</sup>)

Max. cable take-up 14 mm, 220 m

#### Weight:

• from 14.700 kg

#### Crane:

Series:

Articulated arm with simple telescope: Lifting moment gross:

Slewing angle: Slewing torque:

Gripper cross-section:

• Optional: HSM S3 - 7.5 HSM S3 - 8.4 HSM S3 - 10

#### Tyres:

		Standard 24,5-32	30,5-32
	D	1831	1857
00/11	B*	2430	2730
904H	Н	3500	3507
	F	672	679
	Н	3550	3557
904ZF	F	545	552

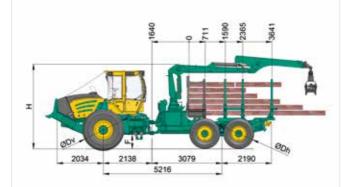
#### Standard equipment:

- Fixed front polder shield, 2000 mm wide
- Straight shield as sprag brake

#### Special equipment:

- Hydraulically height-adjustable roller block
- "Skidder France" version pulley
- Straight shield "France"
- Engine bonnet protection and brush guard made from tubing
- Remote control, wireless driving
- Other accessories on request

## 904F Kombi short



#### Winches:

Adler HY 20-SG (2 x 100 kN) double-drum winch Series:

Max. cable take-up 14 mm, 100 m • Optional: Adler HY 24-SG (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 130 m Adler HY 32-SG (2 x 160 kN) double-drum winch Max. cable take-up 14 mm, 130 m

#### Weight:

• from 17.600 kg

#### Payload:

■ 11 t

#### Crane:

- Epsilon M70 F80 (series)
- For further cranes see crane brochure

#### Tyres:

		Standard 24,5-32 710/45-26,5	30,5-32 710/45-26,5
	Dν	1831	1857
	Dh	1465	1485
904H	B*	2430	2730
	Н	3769	3776
	F	672	679
		i	
904ZF	Н	3769	3776
JU44F	i	I	l

* B: minimum
machine width
(dimensions in mm)

	F	672	679
00/75	Н	3769	3776
904ZF	F	545	552

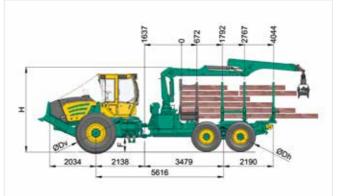
#### Standard equipment:

- Headboard grid and first stanchion removable
- Last stanchion can be removed and adjusted to 2,4 m, 3,2 m
- Height-adjustable roller block
- Torsion lock with hydraulic cylinder
- Reversing camera with color monitor
- LED rear headlights

#### Special equipment:

- Front polder shield
- Straight shield
- Clamping workbench with quick-change plate
- Twin stanchions as 2nd and 3rd stanchion on quick-change plate
- Rotating stanchion
- Bogie lift at the rear
- Tiltable crane
- Remote control, wireless driving
- Other accessories on request

## 904F Kombi long



#### Winches:

Adler HY 20-SG (2 x 100 kN) double-drum winch Series: Max. cable take-up 14 mm, 100 m

• Optional: Adler HY 24-SG (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 130 m Adler HY 32-SG (2 x 160 kN) double-drum winch

Max. cable take-up 14 mm, 130 m

#### Weight:

■ from 17.800 kg

#### Payload:

■ 11 t

#### Crane:

- Epsilon M70 F80 (series)
- For further cranes see crane brochure

#### Tyres:

		Standard 24,5-32 710/45-26,5	30,5-32 710/45-26,5
	Dv	1831	1857
	Dh	1465	1485
904H	В*	2430	2730
	Н	3769	3776
	F	672	679

	п	3/09	3//0
	F	672	679
00/75	Н	3769	3776
904ZF		E/:E	EEO

#### Standard equipment:

- Headboard grid and first stanchion removable
- Last stanchion can be removed and adjusted to 2,4 m, 3,2 m and 4,05 m

\* B: minimum

machine width

(dimensions in mm)

- Height-adjustable roller block
- Torsion lock with hydraulic cylinder
- · Reversing camera with color monitor
- LED rear headlights

#### Special equipment:

- Front polder shield
- Straight shield
- Clamping workbench with quick-change plate
- Twin stanchions as 2nd and 3rd stanchion on quick-change plate
- Rotating stanchion
- Bogie lift at the rear
- Tiltable crane
- Remote control, wireless driving
- Other accessories on request

## The variable rear



Last stanchion variable in "short" position

25



Last stanchion variable in "centre" position



Last stanchion variable in "long" position



Quick-change twin stanchion for 2 x 2 or 2 x 2.5 m wood (not for 805F short version)



Height-adjustable pulleys Up to 2 m



Rope forwarding possible Without reconfiguring the stanchion



Log forwarding with quickchange clamping workbench



Rope forwarding possible without reconfiguring the clamping workbench



## Technical data

#### Engine (6 cylinder):

VOLVO PENTA

TAD882VE EU Stage V

210 kW (286 HP) from 1700 rpm Power: 1225 Nm from 1100 - 1600 rpm Max. revolution: 1255 Nm at 1400 rpm Max. torque:

Displacement: 7,7 liters

#### **Transmission:**

■ 904H: HSM High Speed Drive (series 71) speed at 1st gear 0-14 km/h

#### Axles:

- Planetary axles
- 100 % separately selectable differential locks, front and rear

#### Brake:

- 2-circuit brake, disk brake running in an oil bath
- Spring-loaded parking brake

#### Steering:

- Articulated steering with 2 cylinders
- 45° steering angle

#### Tank capacity:

Diesel: 360 l AdBlue: 45 l • Hydraulic oil: 160 l

#### Hydraulic system:

- Load sensing
- Variable pump (working pump) 904H:

304 l/min bei 1600 rpm flow rate: up to max. 350 bar pressure:

• Hydraulic oil: Saturated synthetic ester Panolin HLP SYNTH with Kleenoil

Microfiltration: WGK 1

#### Cabin:

- HSM Panorama comfort cab (see page 12-13)
- ROPS, FOPS, OPS tested safety cab
- Swivel seat device, air-suspended comfort seat
- Heating/air-conditioning

#### **Electrics / Instruments:**

- HSM Ecommand colour-display
- 5 operator programs + factory setting
- Diagnosis-tool and error-indication
- Graphic support at parameter editing
- Generator 110 A (28 V)
- 2 service-free dry batteries á 55 Ah

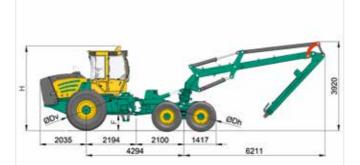
#### Standard equipment:

- 12 LED work lamps
- 24 V 12 V voltage transformer, radio with CD player, fire extinguisher, first-aid kit, warning triangle, tool set
- Torsion lock with 2 hydraulic cylinders

#### Special equipment:

- Tiltable front polder shield, seat area dampers, engine bonnet protection and brush guard made from tubing
- Other accessories on request

## 954H2



#### Crane:

Mesera M221 H100 / H110

Range: 10 m / 11 m Lifting moment gross: 188 kNm 43,6 kNm Slewing torque: Tilt angle: +24°/-30°

#### Optional:

Mesera M240 H103 / M111

Range: 10,3 m / 11,1 m Lifting moment gross: 240 kNm Slewing torque: 54 kNm +22°/-30° Tilt angle:

#### Aggregat:

■ Logmax 6000

Felling diameter: 650 mm Delimbing diameter: 500 mm feed force: 26,9 kN Max. feed force speed: 4.2 m/s Max. operating pressure: 280 bar Weight: 1.330 kg Control: LOG Mate

• Other aggregates on request

#### Weight:

• from 20.000 kg

#### Tyres:

		Standard 24,5-32	30,5-32
	D	1831	1857
05/11	В*	2680	2980
954H	Н	3721	3726
	F	713	715

B: minimum machine width (dimensions in mm)

## Technical data

#### Engine (6 cylinder):

VOLVO PENTA

TAD882VE EU Stage V

210 kW (286 HP) from 1700 rpm Power: 1225 Nm from 1100 - 1600 rpm Max. revolution:

Max. torque: 1255 Nm at 1400 rpm

Displacement: 7,7 liters

#### Transmission:

■ 904H: HSM High Speed Drive (series 71) speed at 1st gear 0-14 km/h

#### Axles:

- Planetary axles
- 100 % separately selectable differential locks, front and rear

#### Brake:

- 2-circuit brake, disk brake running in an oil bath
- Spring-loaded parking brake

#### Steering:

Articulated steering with 2 cylinders, 45° steering angle

#### Tank capacity:

Diesel: 360 I AdBlue: 45 l Hydraulic oil: 160 l

#### Hydraulic system:

- Load sensing
- Variable pump (working pump) 904H:

304 l/min bei 1600 rpm flow rate: up to max. 350 bar pressure:

Hydraulic oil: Saturated synthetic ester

Panolin HLP SYNTH with Kleenoil

Microfiltration; WGK 1

#### Cabin:

- HSM Panorama comfort cab (see page 12-13)
- ROPS, FOPS, OPS tested safety cab
- Swivel seat device, air-suspended comfort seat
- Heating/air-conditioning

#### **Electrics / Instruments:**

- HSM Ecommand colour-display
- 5 operator programs + factory setting
- Diagnosis-tool and error-indication
- Graphic support at parameter editing
- Generator 110 A (28 V)
- 2 service-free dry batteries á 55 Ah

#### Standard equipment:

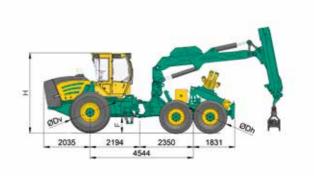
- 12 LED work lamps
- 24 V 12 V voltage transformer, radio with CD player, fire extinguisher, first-aid kit, warning triangle, tool set
- Torsion lock with 2 hydraulic cylinders

#### Special equipment:

- Tiltable front polder shield, trailer hitch, outer hydraulic connection, remote control for cable winch, seat area dampers, clamping bench, fixed front polder shield, 2000 mm wide, Straight shield as sprag
- Other accessories on request

## 954 6WD

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#### Winches:

Series: Adler HY 20 (2 x 100 kN) double-drum winch

Max. cable take-up 14 mm, 100 m

• Optional: Adler HY 24 (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 130 m Adler HY32 (2 x 160 kN) double-drum winch

> Max. cable take-up 14 mm, 150 m Adler HY32-LO (2 x 160 kN) double-drum winch

Max. cable take-up 14 mm, 190 m TCM 16+ (2 x 160 kN) double-drum winch Max. cable take-up 14 mm, 220 m

#### Weight:

■ from 22.800 kg

#### Crane:

Mesera M212 RT 97i Series:

(max. range 9,7 m, 245 kNm lifting moment gross)

#### Tyres:

	-			
			Standard 24,5-32	30,5-32
		D	1831	1857
	05/11	B*	2680	2980
	954H	Н	3525	3530
		F	713	715

\* B: minimum machine width (dimensions in mm)

## Robust – economical – reliable HSM 805S and 904S

With the classic skidder models 805S and 904S HSM offers forestry machines worldwide for the traditional longwood markets.

- Clamping arms on the front shield
- ♣ Stable middle part
- Parallel guided high
- Strong Adler or TCM winches
- Clearly arranged and tested safety cabin
- Large dimensioned NAF planetary axles
- + Easy maintenance due to tilting cabin















8055

#### **Engine:**

■ DOOSAN 4-Zylinder

D34 Stage V

101 kW (135 HP) from 2200 rpm Power:

Max. torque: 500 Nm at 1400 rpm

3,4 liters Displacement:

#### Transmission:

- Hydrostatic transmission, Rexroth
- 2-step NAF transfer gearbox

#### Axles:

- NAF heavy duty planetary axles
- 100 % selectable differential locks

#### **Brake:**

- 2-circuit brake, wet disk brakes
- Spring-loaded parking brake

#### Steering:

44° articulated steering

#### Tyres:

min. total width Size: 2400 mm 23,1 x 26 Series: Optional: 18,4 x 26 2200 mm 28L-26 2600 mm

#### Tank capacity:

■ Diesel: 160 l Hydraulics: 90 I 25 I AdBlue:

#### Hydraulic system:

Hydraulic liquid:

• Pump output: flow rate:

pressure: series:

optional:

152 l/min at 1600 rpm up to 350 bar HLP-46 mineral oil Panolin HLP SYNTH with

Kleenoil

Microfiltration WGK 1

#### Cabin:

- Rubber-mounted, soundproofed
- Tested safety cab
- Mechanically suspended comfort seat
- Hot water heating

#### Elektrics:

- 24 V, 80 A generator
- 2 maintenance-free dry-cell batteries

#### Instruments:

 Tachometer with operating hour counter, coolant temperature, tank gauge, indicator lights

#### Winches:

Adler HY 20-0 (2 x 100 kN) double-drum winch Series: Max. cable take-up 14 mm, 100 m

without cable equipment!

• Optional: Adler HY 24-0 (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 140 m

Adler HY 24-LO (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 190 m

Adler HY 32-0 (2 x 160 kN) double-drum winch Max. cable take-up 14 mm, 150 m

Adler HY 32-LO (2 x 160 kN) double-drum winch Max. cable take-up 14 mm, 190 m

TCM 16+ (2 x 160 kN) double-drum winch Max. cable take-up 14 mm, 220 m

#### Weight:

9.300 kg (series)

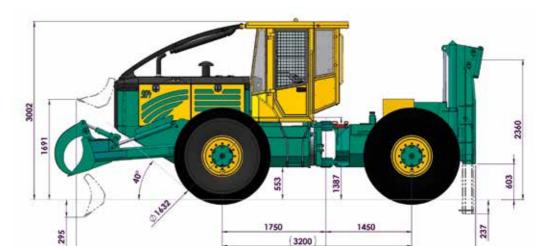
Weight distribution: Front axle: 60 % Rear axle:

#### Standard equipment:

 2200 mm wide front polder shield, lowerable straight shield 2200 mm wide, fire extinguisher, first-aid kit, warning triangle, tool set

#### Special equipment:

• Radio control, cable winch, wireless driving, clamping arms for front shield, steering with joystick, road lighting set



9045

#### Engine:

VOLVO PENTA

TAD581VE EU Stage V

129 kW (175 HP) from 1700 rpm Power: Max. revolution: 800 Nm from 1100 - 1500 rpm

816 Nm at 1380 rpm Max. torque:

Displacement: 5,13 liters

#### Optional:

VOLVO PENTA

TAD583VE EU Stage V Power:

Max. revolution:

175 kW (238 HP) from 1750 rpm 947 Nm from 1200 - 1750 rpm 969 Nm at 1380 rpm

Max. torque: Displacement: 5,13 liters

#### Transmission:

- HSM High Speed Drive (series 71)
- 2-step NAF transfer gearbox

- NAF heavy duty planetary axles
- 100 % selectable differential locks

#### Brake:

- 2-circuit brake, wet disk brakes
- Spring-loaded parking brake

### Steering:

• 44° articulated steering

#### Tyres:

Size: min. total width Series: 23,1 x 26 2550 mm 18,4 x 26 2300 mm • Optional: 28L-26 2750 mm

#### Tank capacity:

185 I Diesel: Hydraulics: 90 I AdBlue: 45 I

#### Hydraulic system:

• Pump output: Flow rate: Pressure:

• Hydraulic liquid: Series:

HLP-46 mineral oil Panolin HLP SYNTH with Optional: Kleenoil

Microfiltration WGK 1

152 l/min at 1600 rpm up to 350 bar

#### Cabin:

- Rubber-mounted, soundproofed
- Tested safety cab
- Mechanically suspended comfort seat

2529

Hot water heating

#### **Electrics:**

- 110 A (28 V) generator
- 2 maintenance-free dry-cell batteries

#### Instruments:

 Tachometer with operating hour counter, coolant temperature, tank gauge, indicator lights

#### Winches:

Series: Adler HY 20-0 (2 x 100 kN) double-drum winch Max. cable take-up 14 mm, 100 m

without cable equipment!

• Optional: Adler HY 24-0 (2 x 120 kN) double-drum winch

Max. cable take-up 14 mm, 140 m

Adler HY 24-LO (2 x 120 kN) double-drum winch Max. cable take-up 14 mm, 190 m

Adler HY 32-0 (2 x 160 kN) double-drum winch

Max. cable take-up 14 mm, 150 m

Adler HY 32-LO (2 x 160 kN) double-drum winch

Max. cable take-up 14 mm, 190 m TCM 16+ (2 x 160 kN) double-drum winch Max. cable take-up 14 mm, 220 m

#### Weight:

10.800 kg (series)

Weight distribution: Front axle: 60 %

Rear axle:

#### Standard equipment:

 2200 mm wide front polder shield, lowerable straight shield 2200 mm wide, fire extinguisher, first-aid kit, warning triangle, tool set

#### Special equipment:

• Radio control, cable winch, wireless driving, clamping arms for front shield, steering with joystick, street lighting set

Soil-conserving short timber technology With the HSM 208F model series, HSM offers forwarders from the 9 to class up to the 20 to class that can be custom-suited to the customer's needs, strong cranes, flexible stanchion systems, tiltable crane pillars, bogie lift, cable winches and much more, directly from the manufacturer. HSM has committed to offering economical, productive and soil-conserving forestry technology for state-of-the-art and sustainable forestry.

Like no other manufacturer, HSM has from the start pursued the goal of developing machines with wide tyres and small outer width to reduce the ground pressure. This has been incredibly successful with the HSM Bigfoot (940 mm wide tyres, outer width 3.0 m), but HSM has also demonstrated its pioneering technology with forestry machines that conserve soil and the environment with the development of steep slope technology.

- **◆** Comfortable, easy-to-use cab with climate control and readily accessible central electrical system
- ♣ Work area light system all in LED integrated and protected in the cab
- State-of-the-art engine technology
- Climbing rung hydraulic, foldable
- Hinged front door for easy cleaning of the
- Optional: Front bulldozer shield
- **+** Tyres up to 940 mm wide with a outer width of under 3 m
- Official approval and homologation for road service (Germany) as selfpropelled work machine

Technical specifications from page 40. We would be happy to arrange a personal consultation appointment with one of our sales representatives.



High-performance – flexible – ground-breaking









Gain critical advantages through a wide variety of custom solutions for your individual needs.

- Soil-conserving traction winch technology
- Tiltable crane pillar
- Installation of felling unit or harvesting head and much more. HSM also offers the most innovative solutions in the area of drive concepts.

With the high speed drive you can drive up to 14 km/h in first gear while lowering operating costs with optimized efficiency. This combination of advanced drive technology with maximum comfort, ergonomics and reliability results in the highest productivity and efficiency.



Technik die Freude macht.







#### Wide tyres with a small outer width

The 208F 10 to to 208F 12 to model series was equipped with extremely wide tyres of up to 940 mm with a small outer width of under 3 m at its market launch many years ago. The HSM 208F  ${\bf BigFoot}$  is the result of consistent further development of this concept - the perfect innovation for soil-conserving foresting technology!

Equipped with special stanchions, the BigFoot can be driven

with 1340 mm wide belts that were developed for this purpose. This leads to productive and economical wood harvesting with little track depth on otherwise unnavigable wet surfaces. An additional efficient and resource-saving solution is using the **BigFoot** without belts. Higher driving speeds and lower fuel consumption – while also conserving the forest paths (due to decreased soil erosion) – are critical advantages for economic success.

Technik die Freude macht.



## **HSM** cab suspension HCS

#### Ergonomics and comfort

With the newly developed HCS cab suspension, HSM once again proves it's outstanding technical experience. HCS significantly reduces vibrations and shocks to the operator. This working and driving comfort results in a fatigue-free working day and an increase in production.

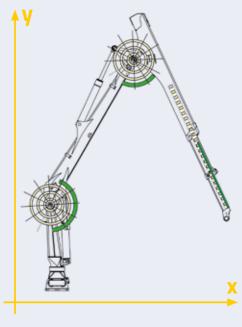
#### How it works

Two arms with independent suspension cylinders are arranged each at the front and rear of the cabin. Each of the 4 cylinders has an integrated and thus protected sensor that serves to monitor and control the cabin suspension. Due to

- Suspension in every direction
- Direct and sensitive response
- Unchanged transportation height
- ♣ Cab lift for good maintenance accessibility remains
- ♣ Integrated control
- ◆ 110 mm suspension travel
- ♣ Internal, contactless sensors integrated into the cylinders

the sophisticated kinematics, the cylinders work without tension, which results in a very direct response. The hydraulic valve block is installed in the vehicle frame, saving space. The functionality of the HSM cab lift is retained, ensuring a high level of accessibility even with cab suspension.







#### Increased production and comfort

The intelligent crane tip control xyControl offers forestry machine operators a new dimension in crane control. Demanding work processes of the crane operator are easier, more comfortable and thus quicker to learn with the newly developed crane tip control xyControl.

Experienced machine operators also appreciate the advantages and conveniences using xyControl daily. Faster work processes and increased productivity in combination with a fatigue-free working day are crucial advantages after a minor training period.

#### How it works

With the HSM crane tip control xyControl, the driver directly controls the movement of the crane tip. The individual hydraulic cylinders are controlled directly by xyControl. With 6 different levels of telescopic share, the driver can individually

adapt xyControl to different harvesting situations and timber assortments. The robust crane sensor system is adapted to the rough working environment. The driver can easily switch between conventional boom control and xyControl by a button.

- Increased productivity
- Increased comfort
- Direct control of the boom tip motion directions
- xyControl controls the individual functions main boom, luffing jib and telescopic boom
- + Crane behaviour can be adapted by the operator to the timber assortment and environment
- + End position damping of all joints
- Reduced vibrations leads to increased operator comfort and durability of the crane
- · Slope adjustment for optimum working
- · Range-dependent speed adjustment
- Available for forwarders and harvesters



HSM crane tip control

## Technical data 208F

#### Brake:

- Brake with 2-circles, oil-cooled multiple-disc power-brake
- Spring accumulator parking brake

#### Steering:

- Articulated frame steering with 2 cylinders
- Steering angle 45°

#### Cabin:

- Raisable to side on parallel linkages
- ROPS, FOPS, OPS tested
- Rotary seat with pedals in front and rear
- Wiper in front and rear, optional on the side
- Air cushioned seat with seat heating
- Hot-water heating
- Air conditioning

#### **Electrics / Instruments:**

- HSM Ecommand colour-display
- 5 operator programs + factory setting
- Diagnosis-tool and error-indication
- Graphic support at parameter editing
- Generator 110 A (28 V)
- 2 service-free dry batteries á 75 Ah

#### Power train:

- NAF 2 speed transfer gearbox
- HSM High Speed Drive (series 71); speed at 1st gear 0-14 km/h

#### Standard equipment:

- 14 LED-working headlight at cabin
- 4 working headlights at crane
- Potential transformer 24 V 12 V
- Radio with CD
- Fire extinguisher
- First aid kit
- Warning triangle
- Tool kit
- Cooling box
- Reversing camera with color monitor
- Rear headlights
- Twist lock with 2 hydraulic cylinders

#### Special equipment:

- Front dozer-blade
- Tandem axle lift (Bogie lift) front
- Turnable rung
- Last rung plugged
- Tiltable crane
- Quick-change system for rungs
- Clambunk
- Auxiliary heating
- Bogie-tracks
- Radio control for winch
- Drive by radio
- Sun blinds
- Pluggable front grid
- Cab suspension HCS
- Crane tip control xyControl (Epsilon crane only)
- Other accessories on request

Specified heights are minimum transport heights for standard equipment.

208F

4 cylinder

208F

6 cylinder

#### **Engine:**

VOLVO PENTA

TAD581VE EU Stage V

Power: 129 kW (175 HP) from 1700 rpm Max. revolution: 800 Nm from 1100 - 1500 rpm

Max. torque:

816 Nm at 1380 rpm

Displacement: 5,13 liters

#### Optional: from 208F 10 t

VOLVO PENTA

TAD583VE EU Stage V

Power: 175 kW (238 HP) from 1750 rpm Max. revolution: 947 Nm from 1200 - 1750 rpm

969 Nm at 1380 rpm Max. torque:

5,13 liters Displacement:

#### Hydraulic system:

Load sensing

Variable pump (working pump):

304 l/min at 1600 rpm flow rate: pressure: up to max. 350 bar

saturated synthetic ester Hydraulic oil: Panolin HLP SYNTH with Kleenoil

microfiltration; WGK 1

#### Tank capacity:

Diesel: 170 l AdBlue: 25 l • Hydraulic oil: 130 l

#### **Engine:**

VOLVO PENTA

TAD881VE EU Stage V

Power:

185 kW (252 HP) from 1600 rpm Max. revolution: 1150 Nm from 1100 - 1500 rpm 1175 Nm at 1400 rpm Max. torque:

7,7 liters Displacement:

#### Optional:

VOLVO PENTA

TAD882VE EU Stage V

Power: 210 kW (286 HP) from 1700 rpm Max. revolution: 1225 Nm from 1100 - 1600 rpm 1255 Nm at 1400 rpm Max. torque:

7,7 liters

Displacement:

#### Hydraulic system:

Load sensing

Variable pump (working pump):

304 l/min from 1600 rpm flow rate: up to max. 350 bar

saturated synthetic ester Hydraulic oil: Panolin HLP SYNTH with Kleenoil

microfiltration; WGK 1

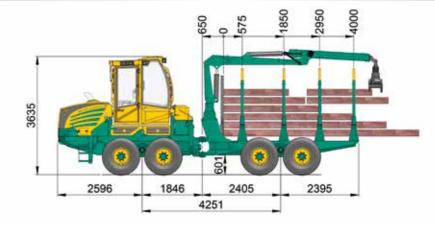
#### Tank capacity:

	11 t / 12 t	14 t
Diesel:	190 l	225 l
AdBlue:	45 l	45 l
Hydraulic oil:	130 l	130 l

## 208F 7 t

### 4 cylinder

41



### Weight:

13.900 kg (series)

Weight distribution: front axle: 60 % 40 % rear axle:

Tyres:

Carias	Width:	Overall width:	Width for tracks:
<ul><li>Series:</li><li>Optional:</li></ul>	600/50-22,5 650/45-22,5	2300 mm 2400 mm	2400 mm 2500 mm
	710/40-22,5	2500 mm	2600 mm

#### Axles:

NAF portal-bogie-axles

switchable differential lock 100 % switchable differential lock 100 % Rear:

Crane:

Series:

Tank capacity: Diesel: 150 l

• For further cranes see crane brochure

 AdBlue: 25 I • Hydraulic oil: 110 |

#### Loading area:

■ 4 rungs Length:

4000 mm

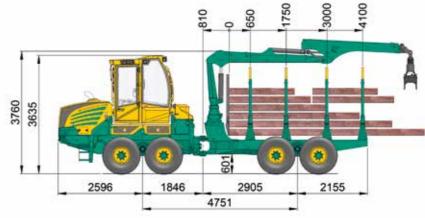
Epsilon C60 F69

2,9 m<sup>2</sup>, optional: 3,3 m<sup>2</sup> Cross section: 7 t

· Load capacity:

## 208F9t

### 4 cylinder



#### Weight:

■ 14.800 kg (series)

Weight distribution: front axle: 60 % rear axle: 40 %

Tyres:

width for overall width: width: tracks: Series: 710/40-22,5 2500 mm 2600 mm Optional: 600/50-22.5 2300 mm 2400 mm 650/45-22,5 2400 mm 2500 mm

#### Axles:

NAF portal-bogie-axles

• Front: switchable differential lock 100 % switchable differential lock 100 %

#### Crane:

• For further cranes see crane brochure

#### Tank capacity:

Diesel: 150 l AdBlue: 25 I Hydraulic oil: 110 |

#### Loading area:

4 rungs

4100 mm

Cross section:

Series: Epsilon M70 F80

Length:

3,6 m<sup>2</sup>, optional: 3,9 m<sup>2</sup>

Load capacity: 9 t 208F 10 t 4 cylinder

3818 5051

#### Weight:

■ from 17.200 kg

Weight distribution: front axle: 60 %, rear axle: 40 %

#### Tyres:

			Width for
	Width:	Overall width:	tracks:
Series:	710/45-26,5	2600 mm	2700 mm
<ul><li>Optional:</li></ul>	600/55-26,5	2400 mm	2500 mm
	800/40-26,5	2700 mm	2800 mm
	870/40-26,5	2900 mm	3000 mm
	54x37-25	2900 mm	3000 mm

#### Axles:

NAF portal-bogie-axlesFront: switchable differential lock 100 % switchable differential lock 100 % Rear:

#### Crane:

Series: Epsilon M70 F80

• For further cranes see crane brochure

#### Loading area:

■ 4 rungs

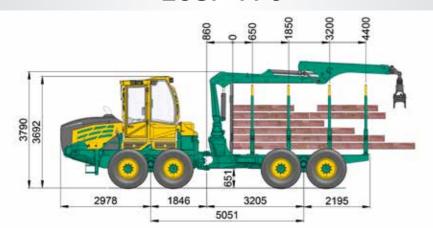
4400 mm Length:

4,0 m<sup>2</sup> / Option 4,3 m<sup>2</sup> Cross section:

Load capacity: 10 t

208F 11 t

6 cylinder



#### Weight:

• from 17.800 kg

Weight distribution: front axle: 60 %, rear axle: 40 %

#### Tyres:

			Width for
	Widht:	Overall Widht:	tracks:
Series:	710/45-26,5	2600 mm	2700 mm
<ul><li>Optional:</li></ul>	600/55-26,5	2400 mm	2500 mm
	800/40-26,5	2700 mm	2800 mm
	870/40-26,5	2900 mm	3000 mm
	54x37-25	2900 mm	3000 mm

#### Axles:

NAF portal-bogie-axles

• Front: switchable differential lock 100 % switchable differential lock 100 % Rear:

#### Crane:

Series:

Epsilon M70 F80

• For further cranes see crane brochure

#### Loading area:

4 rungs Length:

4400 mm

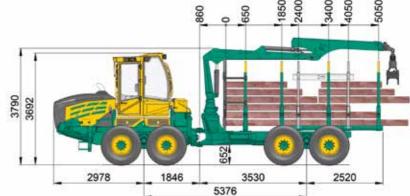
4,0 m<sup>2</sup> / Option 4,3 m<sup>2</sup> Cross section:

Load capacity: 11 t

## 208F 12 t

6 cylinder

43



#### Weight:

■ from 18.200 kg

Weight distribution: front axle: 60 %, rear axle: 40 %

#### Tyres:

VVI	dth for
Width: Overall width: tr	acks:
• Series: 710/45-26,5 2600 mm 27	00 mm
• Optional: 600/55-26,5 2400 mm 25	00 mm
800/40-26,5 2700 mm 28	00 mm
870/40-26,5 2900 mm 30	00 mm
54x37-25 2900 mm 30	00 mm

#### Axles:

NAF portal-bogie-axles

• Front: switchable differential lock 100 % switchable differential lock 100 % Rear:

#### Crane:

Epsilon M70 F80 Series:

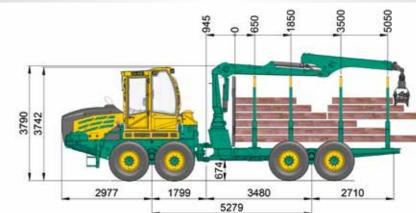
• For further cranes see crane brochure

#### Loading area:

• 4 rungs, last rung extensible

3700 mm - 4650 mm / Option 5050 (2 x 3 m) Length:

4,0 m<sup>2</sup> / Option 4,3 m<sup>2</sup> Cross section: 12 t Load capacity:



#### Weight:

• from 18.500 kg Weight distribution: front axle: 60 %, rear axle: 40 %

#### Tyres:

			Width for
	Width:	Overall Width:	tracks:
Series:	710/45-26,5	2860 mm	2960 mm
<ul><li>Optional:</li></ul>	600/55-26,5	2660 mm	2760 mm
	800/40-26,5	3000 mm	3000 mm

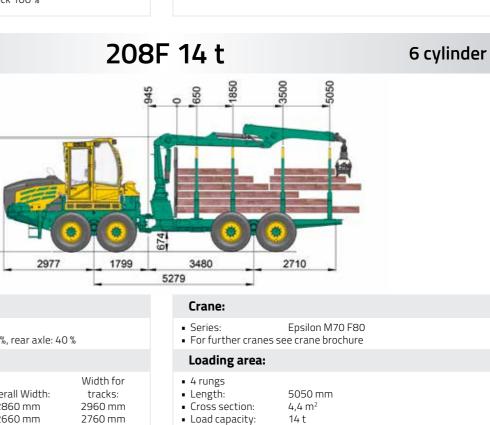
#### Axles:

Balanced NAF portal-bogie-axles

• Front: switchable differential lock 100 %

• Rear: switchable differential lock 100 %

Load capacity:



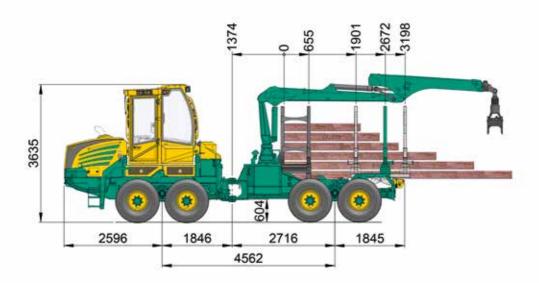
208F 9 t Kombi short

4 cylinder

208F 10 t Kombi short

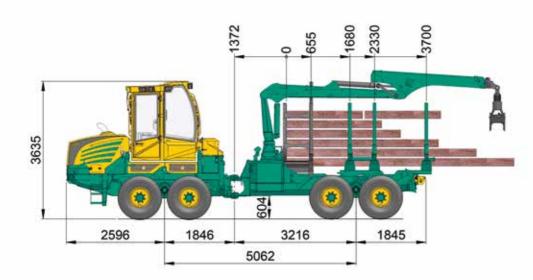
4 cylinder

45



208F 9 t Kombi long

4 cylinder



#### Weight Kombi short / long:

■ 15.300 kg / 15.500 kg

#### Load capacity:

■ 9 t

#### Winches:

Adler HY 16-SG (2x80 kN) double-drum-winch Max. cable take-up 4 mm, 100 m

• Optional: Adler HY 20-SG (2x100 kN) double-drum-winch Max. cable take-up 14 mm, 100 m

#### Crane:

• Series: Epsilon M70 F80

• For further cranes see crane brochure

#### Tyres:

Series: 710/40x22,5

min. width: 2550 mm

By using tracks the min. width will change (+100 mm). Other tyres on request.

#### Standard equipment:

• Grid and first rung demountable

• Last rung demountable and displaceable to loading length: (short) 1,9 m, 2,7 m and 3,2 m (long) 2,4 m, 3,1 m and 3,7 m

• Roller-block, high adjustable

• twist lock with hydraulic cylinder

■ Cross section 3,25 m²

#### Special equipment:

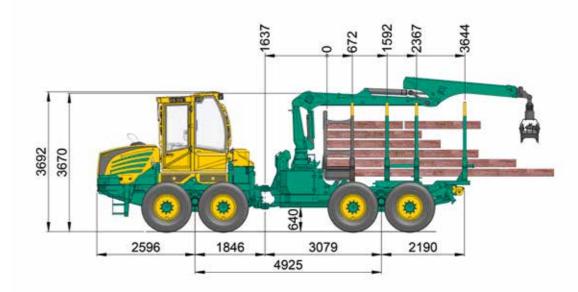
Rear blade

• Clambunk with quick-change system

• Twin-rung as 2nd and 3rd rung on quick-change system (only Kombi long)

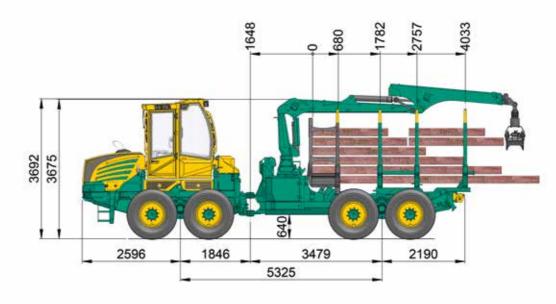
Turnable rung

• Other accessories on request



## 208F 10 t Kombi long

4 cylinder



#### Weight Kombi short / long:

• from 17.700 kg / 17.900 kg

#### Load capacity:

■ 10 t

#### Winches:

Adler HY 20-SG (2x100 kN) double-drum-winch Max. cable take-up 14 mm, 100 m

• Optional: Adler HY 24-SG (2x120 kN) double-drum-winch Max. cable take-up 14 mm, 130 m

> Adler HY 32 L-SG (2x160 kN) double-drum-winch Max. cable take-up 14 mm, 170 m

#### Crane:

■ Series: Epsilon M70 F80

• For further cranes see crane brochure

#### Tyres:

Series: 710/45x26,5

min. width: 2600 mm

By using tracks the min. width will change (+100 mm). Other tyres on request.

#### Standard equipment:

• Grid and first rung demountable

• Last rung demountable and displaceable to loading length: (short) 2,4 m, 3,2 m and 3,65 m (long) 2,8 m, 3,6 m and 4,05 m

• Roller-block, high adjustable

■ Cross section 3,3 m²

#### Special equipment:

• Clambunk with quick-change system

• Twin-rung as 2nd and 3rd rung on quick-change system

Turnable rung

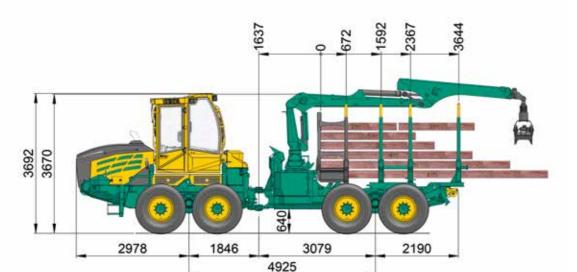
Tiltable crane

• Tandem axle lift (Bogie lift) rear

• Other accessories on request

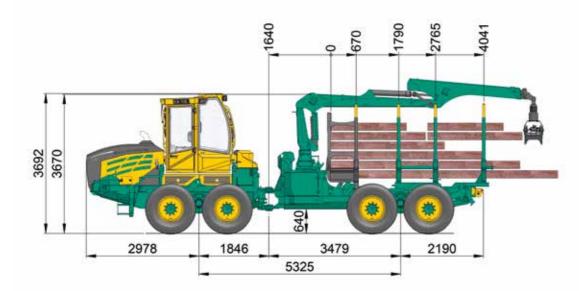
208F 11 t Kombi short

6 cylinder



208F 11 t Kombi long

6 cylinder



#### Weight Kombi short / long:

• from 19.600 kg / 19.800 kg

#### Load capacity:

■ 11 t

#### Winches:

Adler HY 20 (2x100 kN) double-drum-winch Max. cable take-up 14 mm, 100 m • Optional: Adler HY 24-SG (2x120 kN) double-drum-winch Max. cable take-up 14 mm, 130 m

Adler HY 32 L-SG (2x160 kN) double-drum-winch Max. cable take-up 14 mm, 170 m

#### Crane:

• Series: Epsilon M70 F80

• For further cranes see crane brochure

#### Tyres:

Series: 710/45x26,5

min. width: 2600 mm

By using tracks the min. width will change (+100 mm). Other tyres on request.

#### Standard equipment:

• Grid and first rung demountable

• Last rung demountable and displaceable to loading length (short) 2,4 m, 3,2 m and 3,65 m (long) 2,8 m, 3,6 m and 4,05 m

Roller-block, high adjustable

■ Cross section 3,3 m²

#### Special equipment:

• Clambunk with quick-change system

• Twin-rung as 2nd and 3rd rung on quick-change system

Turnable rung

■ Tiltable crane

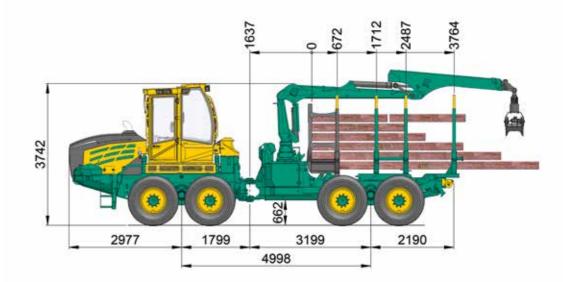
• Tandem axle lift (Bogie lift) rear

Other accessories on request

## 208F 14 t Kombi short

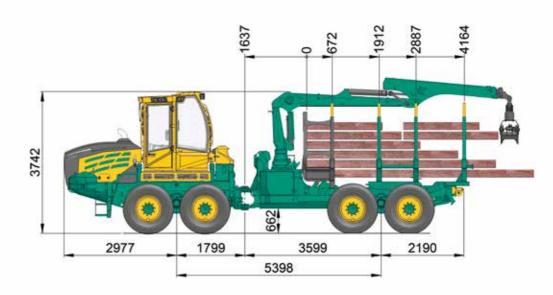
6 cylinder

47



## 208F 14 t Kombi long

6 cylinder



#### Weight Kombi short / long:

■ 20.000 kg / 20.200 kg

#### Load capacity:

■ 14 t

#### Winches:

Adler HY 20 (2x100 kN) double-drum-winch Max. cable take-up 14 mm, 100 m

• Optional: Adler HY 24-SG (2x120 kN) double-drum-winch Max. cable take-up 14 mm, 130 m

> Adler HY 32 L-SG (2x160 kN) double-drum-winch Max. cable take-up 14 mm, 170 m

#### Crane:

■ Series: Epsilon M70 F80

• For further cranes see crane brochure

#### Tyres:

• Series: 710/45x26,5 min. width: 2850 mm

#### Standard equipment:

• Grid and first rung demountable

• Last rung demountable and displaceable to loading length: (short) 2,5 m, 3,3 m and 3,76 m

(long) 2,9 m, 3,7 m and 4,16 m

Height-adjustable roller block

Cross section 3,8 m<sup>2</sup>

#### Special equipment:

• Clambunk with quick-change system

• Twin-rung as 2nd and 3rd rung on quick-change system

Turnable rung

Tiltable crane

• Tandem axle lift (Bogie lift) rear

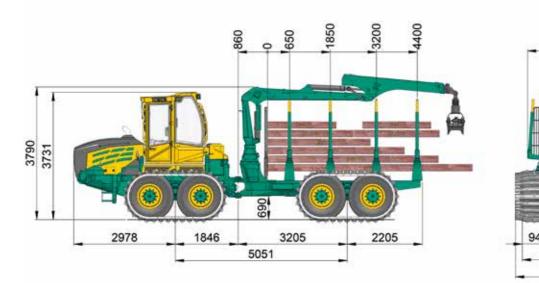
• Other accessories on request

2686

720 1340

3000

3400



#### Engine:

VOLVO PENTA

TAD881VE EU Stage V

185 kW (252 HP) from 1600 rpm Power: 1150 Nm from 1100 - 1500 rpm Max. revolution: 1175 Nm at 1400 rpm

Max. torque: Displacement: 7.7 liters

#### Optional:

VOLVO PENTA

TAD882VE EU Stage V

Power: 210 kW (286 HP) from 1700 rpm 1225 Nm from 1100 - 1600 rpm Max. revolution: Max. torque: 1255 Nm at 1400 rpm

Displacement: 7,7 liters

#### Transmission:

NAF 2-speed transfer gearbox

■ HSM High Speed Drive (71 series), 1st gear 0-14 km/h

#### Axles:

NAF planetary axles

Front: 100 % selectable differential lock 100 % selectable differential lock Rear

#### Brake:

• 2-circuit brake, disk brake running in an oil bath

Spring-loaded parking brake

#### Steering:

• Articulated steering with 2 cylinders

45° steering angle

#### Tyres:

Size: Total width Series: 54 x 37-25 3000 mm

#### Tank capacity:

Diesel: 190 l AdBlue: 45 l 130 l Hydraulic oil:

#### Hydraulic system:

Load sensing

 Variable pump (working pump): flow rate:

304 l/min bei 1600 rpm

up to max. 350 bar pressure:

 Hydraulic oil: saturated synthetic ester Panolin HLP SYNTH with Kleenoil

Microfiltration; WGK 1

#### Cabin:

Parallel pivoting cab

• ROPS, FOPS, OPS tested safety cab

• Swivel seat with pedals in the rear and the front

• Windscreen wipers in the front and the rear, optional side wipers

• Air cushioned seat with seat heating

Hot water heating

Air conditioner

#### **Electrics / Instruments:**

HSM Ecommand colour display

• 5 driving programs + factory setting

• Diagnostics function and error display Graphical support for editing parameters

110 A (28 V) generator

• 2 maintenance-free dry-cell batteries, each with 75 Ah

#### Weight:

18.500 kg (series)

60 % Weight distribution: Front axle: Rear axle: 40 %

#### **Torsion lock:**

• 2 hydraulic cylinders

#### Loading crane:

Series:

Epsilon M70 F80 • For further cranes see crane brochure

#### Loading area:

4 bunks

Length:

3,8 m<sup>2</sup> / Option 4,2 m<sup>2</sup> Cross-section:

Payload: 11 t

#### Standard equipment:

• 4 LED-working headlight at cabin

• 4 working headlights at crane

• Potential transformer, radio with CD, fire extinguisher, first aid kit, warning triangle, tool kit, cooling box

4400 mm

#### Special equipment:

Front dozer-blade

• Tandem axle lift (Bogie lift) front

Single-drum winch 7 t

• Turnable rung, tiltable crane, quick-change system for rungs

#### Engine:

VOLVO PENTA

TAD881VE EU Stage V

185 kW (252 HP) from 1600 rpm Power: 1150 Nm from 1100 - 1500 rpm Max. revolution: 1175 Nm at 1400 rpm

2978

Max. torque: Displacement: 7,7 liters

Optional:

VOLVO PENTA

TAD882VE EU Stage V

Power: 210 kW (286 HP) ab 1700 rpm Max. revolution: 1225 Nm von 1100 - 1600 rpm Max. torque: 1255 Nm bei 1400 rpm

Displacement: 7.7 liters

#### Transmission:

NAF 2-speed transfer gearbox

HSM High Speed Drive (71 series), 1st gear 0-14 km/h

Brake with 2-circles, oil-cooled multiple-disc power-brake

Spring accumulator - parking brake

#### Steering:

• Articulated frame steering with 2 cylinders

■ 45° steering angle

#### Hydraulic system:

Load sensing

Variable pump (working pump):

flow rate:

304 l/min bei 1600 rpm pressure: up to max. 350 bar

saturated synthetic ester

Hydraulic oil: PanolinHLP SYNTH with Kleenoil

Microfiltration; WGK 1

#### Tank capacity:

Diesel: 190 I AdBlue: 45 l 130 l Hydraulic oil:

#### Winches:

Adler HY 20-SG (2 x 100 kN) double-drum-winch Serie: Max. cable take-up 14 mm, 100 m

• Optional: Adler HY 24-SG (2 x 120 kN) double-drum-winch Max. cable take-up 14 mm, 130 m

Adler HY 32-SG (2 x 160 kN) double-drum winch

Max. cable take-up 14 mm, 130 m

• 20.000 kg (series)

Weight:

#### Cabin:

2420

4266

2087

1846

• Raisable to side on parallel linkages

ROPS, FOPS, OPS tested

• Rotary seat with pedals in front and rear

1462

• Wiper in front and rear, optional on the side • Air cushioned seat with seat heating

Hot-water heating

Air conditioning

#### Electrics / Instruments:

 HSM Ecommand colour-display • 5 operator programs + factory setting

• Diagnosis-tool and error-indication

Graphic support at parameter editing

Generator 110 A (28 V)

• 2 service-free dry batteries á 75 Ah

#### Standard equipment:

• 14 LED-working headlight at cabin • 4 working headlights at crane

• Reversing camera with color monitor

Rear headlights

• Potential transformer 24 V - 12 V

• Radio with CD, fire extinguisher, first aid kit, warning triangle,

tool kit, cooling box

Twist lock with 2 hydraulic cylinders

#### Special equipment:

Front dozer-blade

• Straight shield with sprag brake

Hydraulically height-adjustable roller block

• Tandem axle lift (Bogie lift) in front and rear "Skidder France" version pulley

Auxiliary heating

Radio control for winch

Drive by radio

Sun blinds

 Hydraulic oil preheating Cab suspension

• Other accessories on request

#### Crane:

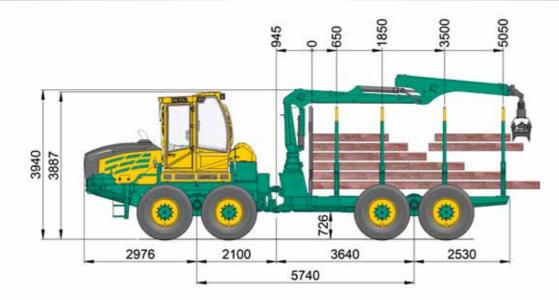
• Articulated arm with double telescope: 7,3 m range • Lifting moment gross: 260 kNm Slewing angle: 255° Slewing torque: 80 kNm Gripper cross-section: 1,2 m<sup>2</sup> • Optional: HSM S3 - 7.5 7,5 m range

HSM S3 - 8.4 HSM S3 - 10

8,4 m range

10 m range

## 208F 20 t



#### **Engine:**

VOLVO PENTA

TAD882VE EU Stage V

210 kW (286 HP) from 1700 rpm Power: 1225 Nm from 1100 - 1600 rpm Max. revolution:

Max. torque 1255 Nm at 1400 rpm Displacement: 7,7 liters

#### Optional:

VOLVO PENTA

TAD884VE EU Stage V

Power: 250 kW (340 HP) from 1800 rpm 1330 Nm from 1200 - 1800 rpm Max. revolution:

Max. torque 1360 Nm at 1400 rpm

Displacement: 7,7 liters

#### Transmission:

NAF 2-speed transfer gearbox

HSM High Speed Drive (71 series), 1st gear 0-14 km/h

#### Axles:

NAF planetary axles

Front: 100 % selectable differential lock 100 % selectable differential lock Rear-

#### Brake:

• 2-circuit brake, disk brake running in an oil bath

Spring-loaded parking brake

#### Steering:

• Articulated steering with 2 cylinders

45° steering angle

#### Tyres:

Size: Total width Series: 750/55-26,5 3000 mm

#### Tank capacity:

Diesel: 220 | + 65 | AdBlue: 45 l Hydraulic oil: 170 l

#### Hydraulic system:

Load sensing

Hydraulic oil:

Variable pump (working pump):

304 l/min at 1600 rpm flow rate: up to max. 350 bar pressure:

saturated synthetic ester

Panolin HLP SYNTH with Kleenoil

Microfiltration; WGK 1

#### Cabin:

Parallel pivoting cab

• ROPS, FOPS, OPS tested safety cab

• Swivel seat with pedals in the rear and the front

• Windscreen wipers in the front and the rear, optional side wipers

Air cushioned seat with seat heating

Hot water heating

Air conditioner

#### **Electrics / Instruments:**

HSM Ecommand colour display

• 5 driving programs + factory setting

• Diagnostics function and error display Graphical support for editing parameters

110 A (28 V) generator

• 2 maintenance-free dry-cell batteries, each with 75 Ah

#### Weight:

21.800 kg (series)

Weight distribution: Front axle: 60 % Rear axle: 40 %

## **Torsion lock:**

• 2 hydraulic cylinders

#### Loading crane:

Series: Epsilon M70 F80

• For further cranes see crane brochure

#### Loading area:

4 bunks

Length:

4400 mm

4,9 m<sup>2</sup> / Option 4,2 m<sup>2</sup> Cross-section:

Payload: 20 t

#### Standard equipment:

• 4 LED-working headlight at cabin

• 4 working headlights at crane

 Potential transformer, radio with CD, fire extinguisher, first aid kit, warning triangle, tool kit, cooling box

2100

#### Engine:

VOLVO PENTA

TAD882VE EU Stage V

210 kW (286 HP) from 1700 rpm Power: 1225 Nm from 1100 - 1600 rpm Max. revolution:

2976

1255 Nm at 1400 rpm Max. torque:

Displacement: 7,7 liters

#### Transmission:

NAF 2-speed transfer gearbox

• HSM High Speed Drive (71 series), 1st gear 0-14 km/h

#### Axles:

NAF planetary axles

100 % selectable differential lock Front: Rear: 100 % selectable differential lock

#### **Brake:**

• 2-circuit brake, disk brake running in an oil bath

• Spring-loaded parking brake

#### Steering:

• Articulated steering with 2 cylinders

45° steering angle

#### Tyres:

Series:

Size: Total width: 710/45-26,5 3000 mm

#### Tank capacity:

220 | + 65 | Diesel: AdRlue. 451 Hydraulic oil 170 l

#### Hydraulic system:

Load sensing

· Variable pump (working pump):

flow rate: 304 l/min at 1600 rpm up to max. 350 bar pressure:

saturated synthetic ester Hydraulic oil: Panolin HLP SYNTH with Kleenoil

Microfiltration; WGK 1

#### Cabin:

Parallel pivoting cab

■ ROPS, FOPS, OPS tested safety cab

• Swivel seat with pedals in the rear and the front

• Windscreen wipers in the front and the rear, optional side wipers

Air cushioned seat with seat heating

Hot water heating

Air conditioner

#### Crane:

Tiltable:

2400

4500

208H2

• Mesera M221 H100 / H110

1417

Range: 10 m / 11 m Lifting moment gross: 188 kNm Slewing torque: 43,6 kNm

+24°/-30°

LOG Mate

Optional:

Mesera M240 H103 / H111

Range: 10,3 m / 11,1 m 240 kNm Lifting moment gross: Slewing torque: 54 kNm +22°/-30° Tiltable:

#### Aggregate:

■ Logmax 6000

Felling diameter: 650 mm Delimbing diameter: 500 mm Max. feed force: 26,9 kN Max. feed force speed: 4,2 m/s Max. operating pressure: 280 bar Weight: 1.330 kg

Control: Other aggregates on request

#### Electrics / Instruments:

HSM Ecommand colour display

• 5 driving programs + factory setting

Diagnostics function and error display

• Graphical support for editing parameters • 110 A (28 V) generator

• 2 maintenance-free dry-cell batteries, each with 75 Ah

#### Weight:

20.800 kg (series)

60 % Weight distribution: Front axle: Rear axle: 40 %

#### Torsion lock:

• 2 hydraulic cylinders

#### Standard equipment:

• 4 LED-working headlight at cabin

4 working headlights at crane

• Potential transformer, radio with CD, fire extinguisher, first aid kit, warning triangle, tool kit, cooling box

From the beginning, HSM has used the established 8WD concept in the 405H harvester series that is now being used in the market. Low-built crane, the strong torsion lock, deep built-in engine and diesel tank ensure maximum stability. An additional feature is the large steering angle of 50°, which ensures manoeuvrability that is often greater than that of comparable 6WD machines.

Cranes with a lifting moment of up to 380 kNm and a reach of up to 15 m leave nothing to be desired. HSM sets standards for hydraulic output and efficiency. In combination with the KWF award-winning storage system, you experience performance and productivity like never before. The HSM 405H is also available as a steep slope version with up to 450 m of cable. Efficiency, reliability and productivity ensure your success.

- ♣ Dynamic stabiliser
- Adjustable rims for even more stability
- Hydraulically foldable engine bonnets for optimal accessibility
- State-of-the-art engine technology
- ♣ Large radiator with standard additional oil cooler
- Optionally with slope winch HSW 15B

- ♣ Cab with 270° rotation for driving out of narrow passageways and when driving on roads
- ♣ Comfortable, easy-to-use cab soundproof and fully air-conditioned
- Work area light system all in LED



## Premium-class harvester technology



- Cranes up to 15 m range and tilt angle of + 30° and - 24°
- ♣ Front bogie lift (series) rear optional
- Harvesting heads from Waratah oder Log Max, additional manufacturers on request
- Storage system built in awarded with the KWF Innovation Award
- Official approval and homologation for road service (Germany) as self-propelled work machine

Technical specifications see page 56-59. We would be happy to arrange a personal consultation appointment with one of our sales representatives.

## Experience creates trust – pioneering harvester technology for your success









## 405H28WD

## oin: 3917) 2782 2338 2700 1417 5038

#### Engine (6 cylinder):

VOLVO PENTA

TAD882VE EU Stage V

210 kW (286 HP) from 1700 rpm Power: Max. revolution: 1225 Nm from 1100 - 1600 rpm

Max. torque 1255 Nm at 1400 rpm Displacement: 7,7 liters

#### **Transmission:**

- Hydrostatic-mechanical
- NAF 2-speed transfer gearbox

#### Axles:

- NAF balanced portal tandem axles
- Front: 100 % selectable differential lock
- Rear: 100 % selectable differential lock

#### Brake:

- 2-circuit brake, disk brakes running in an oil bath
- Spring-loaded parking brake

#### Steering:

- Articulated steering with 2 cylinders
- 2 steering cylinders, 50° steering angle

#### Tyres:

Total width Size:

710/45-26,5 2880 mm tapes and chains Series: Optional: 800/40-26,5 2980 mm only tapes

3060 mm tapes and chains 600/55-26,5 2660 mm tapes and chains

#### Tank capacity:

Diesel: 500 I AdBlue: 45 l Hydraulic oil: 2501

#### Hydraulic system:

- Load sensing
- Variable pump: Crane pump: 190 cm<sup>3</sup> 190 cm<sup>3</sup> (working pump) Head pump:

532 l/min at 1400 rpm flow rate:

up to 380 bar pressure: Hydraulic oil: saturated synthetic ester

Panolin HLP SYNTH with Kleenoil Microfiltration; WGK 1

#### Cabin:

- Height-adjustable at the front / rear +10° / -29°
- Bent Lexan windscreen
- Windscreen wipers in the front and at the side
- ROPS, FOPS, OPS tested safety cab
- Air cushioned seat with seat heating
- Hot water heating
- · Auxiliary heating with cooling water and hydraulic oil preheating
- Air conditioner
- Optional height-adjustable and rotatable (270°), front / rear +10° / -12°, (restricted to -24°) lateral +/- 9°
- Optional: Sun blinds

#### **Electrics / Instruments:**

- HSM Ecommand colour display
- 5 driving programs + factory setting
- Diagnostics function and error display
- Graphical support for editing parameters
- 110 A (28 V) generator
- 2 maintenance-free dry-cell batteries, each with 75 Ah

#### Weight:

■ from 25.400 kg

#### Torsion lock:

2 hydraulic cylinders

#### Crane:

Mesera M221 H100 / H110

10 m / 11 m Range: Lifting moment gross: 188 kNm Slewing torque: 43.6 kNm Slewing angle: 260° Tilt angle: +24°/-30°

Optional: Mesera M240 H103 / H111

Range: 10,3 m / 11 m Lifting moment gross: 240 kNm Slewing torque: 54 kNm Slewing angle: 260° Tilt angle: +24°/-30°

#### Aggregate:

■ Logmax 6000 Felling diameter:

650 mm Delimbing diameter: 500 mm Max. feed force: 26,9 kN Max. feed force speed: 4,2 m/s Max. operating pressure: 280 bar 1.330 kg Weight: LOG Mate

Control: • Other aggregates on request

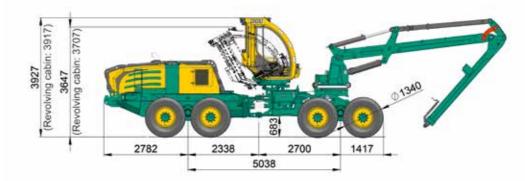
#### Standard equipment:

• 20 LED work lights on the cab, 4 work lights in front of the crane, 2 LED work lights on the crane column, 2 LED work lights on the rear frame, bogie lift front separately switchable, voltage converter on-board voltage 24 V to 12 V, end cushioning for crane and steering cylinder, radio, fire extinguisher, first-aid kit, warning triangle, tool set, bypass filter, Diesel fill pump, hydraulic fill pump, vacuum numn

#### Special equipment:

- GPS system
- Data transfer
- Bogie lift engine carriage
- Attachement steep slope winch,
- traction constant 120 kN, max. 150 kN
- Air compressor 24 V
- Guard bracket bonnet

## 405H3 8WD



#### Engine (6 cylinder):

VOLVO PENTA

TAD882VE EU Stage V

Power: 210 kW (286 HP) from 1700 rpm Max. revolution: 1225 Nm from 1100 - 1600 rpm

Max. torque 1255 Nm at 1400 rpm

Displacement: 7,7 liters

#### Optional:

VOLVO PENTA

TAD884VE EU Stage V

Power: 250 kW (340 HP) from 1800 rpm 1330 Nm from 1200 - 1800 rpm Max. revolution:

1360 Nm at 1400 rpm Max. torque

7,7 liters Displacement:

#### Transmission:

- Hydrostatic-mechanical
- NAF 2-speed transfer gearbox

#### Axles:

- NAF balanced portal tandem axles
- Front: 100 % selectable differential lock Rear: 100 % selectable differential lock

#### Brake:

- 2-circuit brake, disk brakes running in an oil bath
- Spring-loaded parking brake

#### Steering:

- Articulated steering with 2 cylinders
- 2 steering cylinders, 50° steering angle

#### Tyres:

Size: Total width 710/45-26,5 2880 mm tapes and chains Series: Optional: 800/40-26.5 2980 mm only tapes 3060 mm tapes and chains

600/55-26,5

#### Tank capacity:

500 l Diesel: AdBlue: 45 l 250 I Hydraulic oil:

#### Hydraulic system:

Load sensing

Hydraulic oil:

• Variable pump: Crane pump: 190 cm<sup>3</sup> (working pump) Head pump: 190 cm<sup>3</sup>

532 l/min bei 1400 rpm flow rate: pressure: up to max. 380 bar

2660 mm tapes and chains

saturated synthetic ester Panolin HLP SYNTH with Kleenoil

Microfiltration; WGK 1

#### Cabin:

Height-adjustable at the front / rear +10° / -29°

57

- Bent Lexan windscreen
- Windscreen wipers in the front and at the side
- ROPS, FOPS, OPS tested
- Tested safety cab
- Air cushiones seat with seat heating Hot water heating
- Auxiliary heating with cooling water and hydraulic oil preheating Air conditioner
- Optional height-adjustable and rotatable (270°),
- front / rear +10° / -12°, (restricted to -24°) lateral +/- 9°
- Optional: Sun blinds

#### Electrics / Instruments:

- HSM Ecommand colour-display
- 5 operator programs + factory setting
- Diagnosis-tool and error-indication Graphic support at parameter editing
- Generator 110 A (28 A) • 2 service-free dry batteries á 75 Ah

#### Weight:

• from 26.200 kg

#### Torsion lock:

2 hydraulic cylinders

#### Crane:

Mesera M280 V110

Range: 11 m 280 kNm Lifting moment gross: Slewing torque: 65 kNm Slewing angle: 260°

Tilt angle: • Other cranes on request

#### Aggregate:

■ Logmax 6000 Felling diameter

Weight:

650 mm Delimbing diameter: 500 mm Max. feed force: 26,9 kN Max. feed force: 4,2 m/s Max. operating pressure: 280 bar

Control: Other aggregates on request

#### Standard equipment:

• 20 LED work lights on the cab, 4 work lights in front of the crane, 2 LED work lights on the crane column, 2 LED work lights on the rear frame, bogie lift front separately switchable, voltage converter on-board voltage 24 V to 12 V, end cushioning for crane and steering cylinder, radio, fire extinguisher, first-aid kit, warning triangle, tool set, bypass filter, Diesel fill pump, hydraulic fill pump, vacuum pump

+24°/-30°

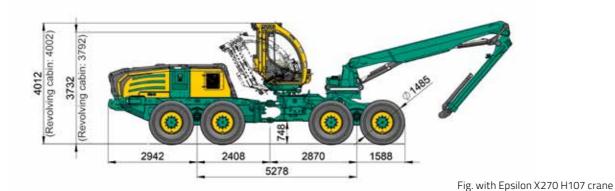
1.330 kg

LOG Mate

#### Special equipment:

• Crane tip control xyControl (Epsilon crane)

## 405H48WD



#### Engine (6 cylinder):

VOLVO PENTA

TAD884VE EU Stage V

Power: 250 kW (340 HP) from 1800 rpm 1330 Nm from 1200 - 1800 rpm Max. revolution: 1360 Nm at 1400 rpm Max. torque

Displacement: 7,7 liters

#### **Transmission:**

- Hydrostatic-mechanical
- NAF 2-speed transfer gearbox

#### Axles:

- NAF balanced portal tandem axles
- 100 % selectable differential lock Front:
- 100 % selectable differential lock Rear:

#### Brake:

- 2-circuit brake, disk brakes running in an oil bath
- Spring-loaded parking brake

#### Steering:

- Articulated steering with 2 cylinders
- 2 steering cylinders, 50° steering angle

#### Tyres:

Total width Size: 750/55-R26,5 Series: at 2900 mm

3000 mm tapes and chains

• Optional: 650/55-R26,5 2900 mm tapes and chains

#### Tank capacity:

• Diesel: 5001 AdBlue: 45 l Hydraulic oil: 250 I

#### Hydraulic system:

Load Sensing

 Variable pump: crane pump: 190 cm<sup>3</sup> (working pump) head pump: 190 cm<sup>3</sup> 532 l/min at 1400 rpm

flow rate: pressure:

up to max. 380 bar saturated synthetic ester Panolin HLP SYNTH with Kleenoil

Microfiltration; WGK 1

#### Cabin:

Hydraulic oil:

- Height-adjustable at the front / rear +10° / -29°
- Bent Lexan windscreen
- Windscreen wipers in the front and at the side
- ROPS, FOPS, OPS tested
- Tested safety cab
- Air cushioned seat with seat heating
- Hot water heating
- Optional height-adjustable and rotatable (270°),
- front / rear +10° / -12°, (restricted to -24°) lateral +/- 9°
- Auxiliary heating with cooling water and hydraulic oil preheating Air conditioner
- Optional: Sun blinds

#### **Electrics / Instruments:**

- HSM Ecommand colour-display
- 5 operator programs + factory setting
- Diagnosis-tool and error-indication
- Graphic support at parameter editing Generator 110 A (28 A)
- 2 service-free dry batteries á 75 Ah

#### Weight:

• from 29.200 kg

#### **Torsion lock:**

2 hydraulic cylinders

#### Crane:

■ Epsilon X270 H107 Range: 10,9 m 360 kNm Lifting moment gross: 92 kNm Slewing torque: Slewing angle: 260° Tilt angle: +24°/-30°

#### Optional:

■ HSM H4-15

Range: 15 m Lifting moment gross: 380 kNm Slewing torque: 92 kNm Slewing angle: 260° Tilt angle: +24°/-30°

#### Aggregate:

■ Logmax 6000 Felling diameter: 650 mm Delimbing diameter: 500 mm Lifting moment gross: 26,9 kN 4,2 m/s Max. feed force speed: Max. operating pressure: 280 bar Weight: 1.330 kg Control: LOG Mate

• Other aggregates on request

#### Standard equipment:

• 20 LED work lights on the cab, 4 work lights in front of the crane, 2 LED work lights on the crane column, 2 LED work lights on the rear frame, bogie lift front separately switchable, voltage converter on-board voltage 24 V to 12 V, end cushioning for crane and steering cylinder, radio, fire extinguisher, first-aid kit, warning triangle, tool set, bypass filter, Diesel fill pump, hydraulic fill pump, vacuum pump

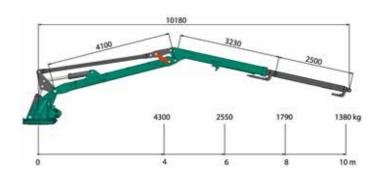
#### Special equipment:

- GPS system
- Data transfer
- Bogie lift engine carriage
- Attachement steep slope winch,
- traction constant 120 kN, max. 150 kN
- Air compressor 24 V
- Guard bracket bonnet

## Crane 405H

#### Crane M221 H100:

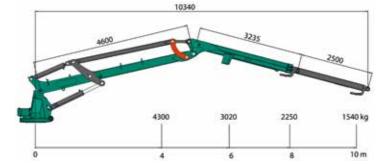
Lifting moment gross 188 kNm Slewing torque 43,6 kNm Slewing angle 260°



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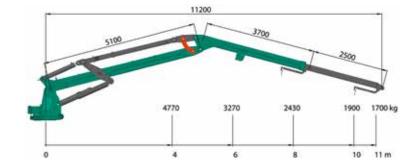
#### Crane M240 H103:

Lifting moment gross	240 kNm
Slewing torque	54 kNm
Slewing angle	260°



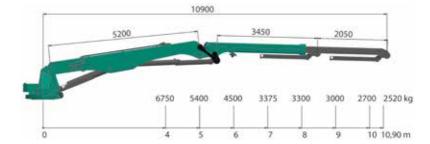
#### Crane M280 V110:

Lifting moment gross	280 kNm
Slewing torque	65 kNm
Slewing angle	260°



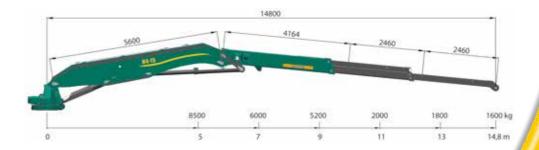
#### Crane X270 H107:

Lifting moment net	270 kNm
Slewing torque	92 kNm
Slewing angle	260°



#### Crane HSM H4-15:

Lifting moment gross	380 kNm
Slewing torque	80 kNm
Slewing angle	260°



## **HSM** steep slope technology

As a technically leading specialist in steep slope technology, HSM offers the right solution for all applications. The HSW15 or HSW9 auxiliary traction winches integrated in the 208F frame with perfect synchronous control enable relaxed,

ground-protecting and productive work on extreme slopes or sensitive soils. The quick-change HSW15B and HSW7 traction winches turn your harvester or crane tractor into an impressive slope specialist.







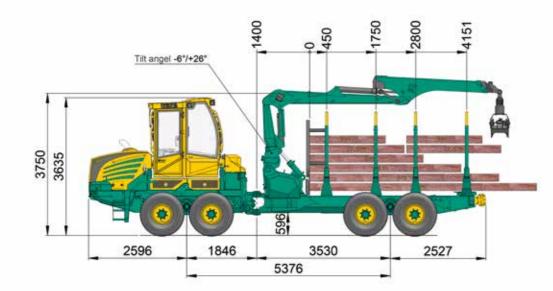




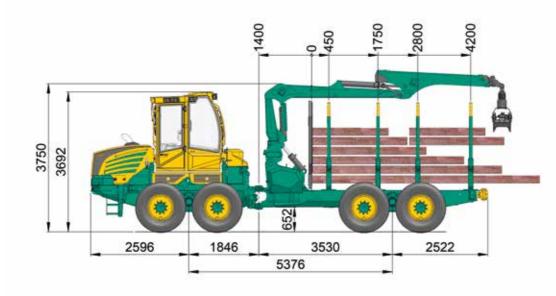




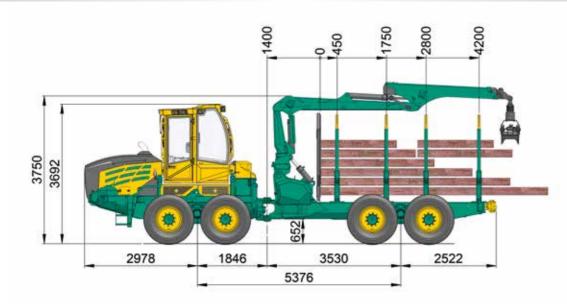
## 208F 9 t with HSW9 auxiliary traction winch and cranetilt



208F 10 t with HSW9 auxiliary traction winch and cranetilt

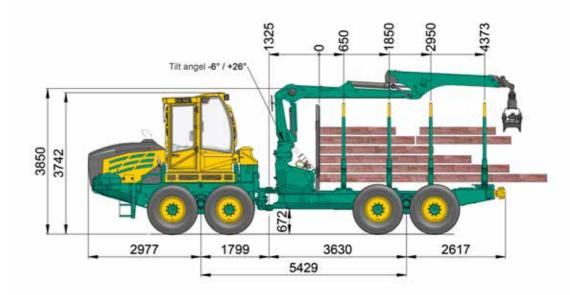


208F 11 t with HSW9 auxiliary traction winch and cranetilt

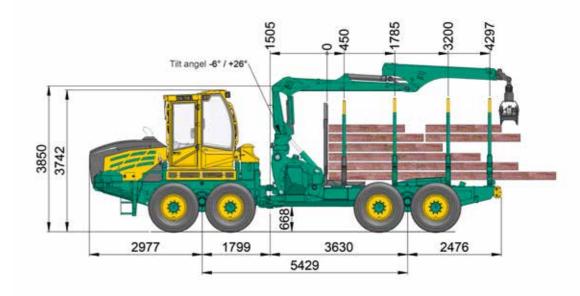


## 208F 14 t with HSW9 auxiliary traction winch and cranetilt

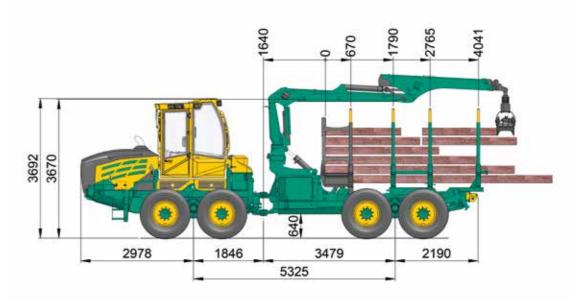
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208F 14 t with HSW15 auxiliary traction winch and cranetilt

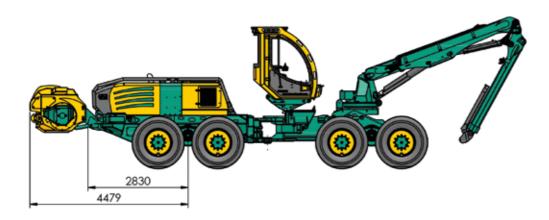


208F 11 t Kombi long with HY 32 L-SG-SP and cranetilt

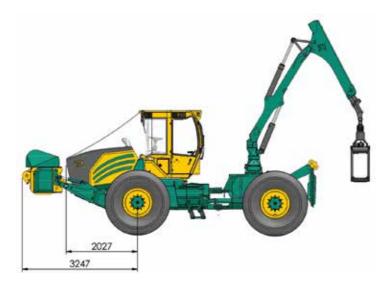


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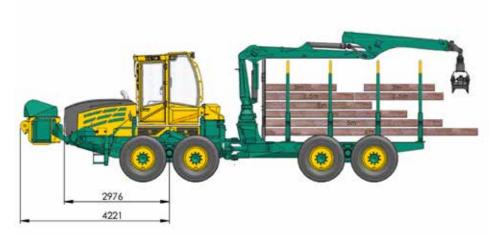
## HSW15B auxiliary traction winch attached to 405H



## HSW7 auxiliary traction winch attached to 904



## HSW7 auxiliary traction winch attached to 208F



Dimensions may vary depending on equipment.

### HSW7

• Tractive force lower layer: Tractive force upper layer: 63 kN • Stepless tension adjustment via potentiometer

• Rope capacity: for rope Ø 14 mm: 1.000 kg Weight without rope:

 Radio remote control: HBC-Patrol-S, Typ-511

- Integrated rope spooling
- Integrated camera and lighting
- Housing with mount for HSM quick release system or adaptable for other manufacturers
- Pressure transfer for winch control via screw couplings, quick-change including electrical transfer plug

## HSW9

• Tractive force lower layer: 45 kN Tractive force upper layer: Stepless tension adjustment via potentiometer ■ Rope capacity: for rope Ø 14 mm:

HBC-Patrol-S, Typ-511 • Radio remote control:

- Integrated rope spooling
- Integrated camera and lighting

### **HSW15 / HSW15B**

• Tractive force constant:

• Stepless tension adjustment via potentiometer

• Rope capacity: for rope Ø 16 mm: Weight without rope: 1.850 kg

HBC-Patrol-S, Typ-511 • Radio remote control:

- Integrated rope spooling
- 2 Cameras and lighting integrated
- Housing with mount for HSM quick release system or adaptable for other manufacturers
- Pressure transfer for winch control via screw couplings, quick-change including electrical transfer plug

## HY 32 L-SG-SP

• Tractive force constant: 70 kN • Stepless tension adjustment via potentiometer

• Rope capacity: for rope Ø 14 mm: Radio remote control: HBC-Patrol-S, Typ-511

Integrated camera and lighting

Integrated rope spooling

Second rope drum for logging:

Tractive force lower layer:

 Tractive force upper layer: 64 kN Rope capacity: for rope Ø 18 mm: 70 m

160 kN

## **HSM** service and quality Expert – reliable – fast





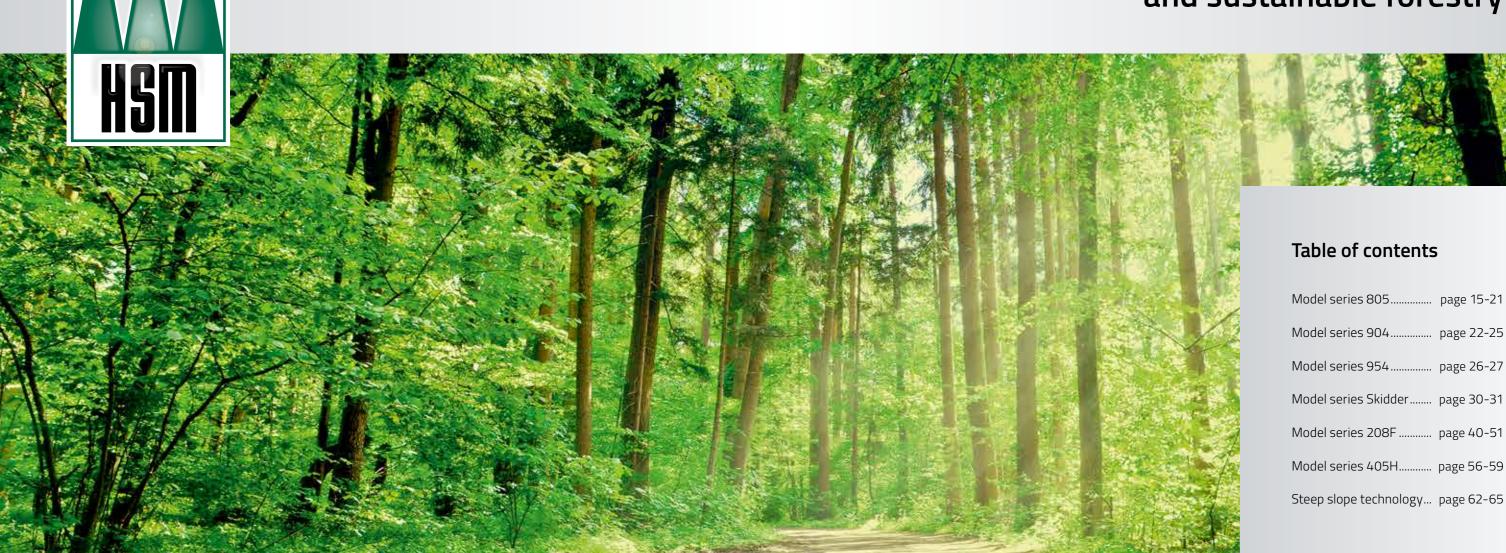
The name HSM is associated with excellent quality and innovation as well as first-class spare parts and other service. Expert technical support and maximum parts availability ensure our customers' competitiveness. Our dealers and partners around the world ensure this also. Ease of access and service are at the forefront in the design of the machine.

For this purpose, HSM offers state-of-the-art tools for optimising and monitoring the important machine data with the Ecommand intelligent control system and a remote diagnostics system.

This makes a critical contribution to the efficiency and productivity of a state-of-the-art forestry business.

Technik die Freude macht.





## Your partner for state-of-the-art and sustainable forestry

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# Shape the future with us...



Technik die Freude macht.





## TECHNIK DIE FREUDE WACHT

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