PRONAR TRAILERS











TABLE OF CONTENTS

SINGLE AXLE TRAILERS	
DOUBLE AXLE TRAILERS	
THREE AXLE TRAILER	2
TANDEM AXLE TRAILERS	
LOW-LOADERS	
TRUCK TRAILERS	5
MONOCOQUE TRAILERS	
POWER PUSH TRAILERS	
DUMP TRAILERS	
CATTLE TRAILERS	
HOOK LIFT TRAILERS & CONTAINERS	
MANURE SPREADERS	
BALE TRAILERS	12
CHASER BIN	1
MIXER FEEDERS	1
LOG TRAILER	14
FORAGE WAGON	1:





PRONAR TRAILERS T654, T654/1, T654/2, T655, T671_

6

4 >>>>>> Technique for nature pronar.pl 5 >>>>>>

SINGLE AXLE TRAILERS

PRONAR T654, T654/1, T654/2, T655, T671



PRONAR Trailer **T654** is one of the smallest trailers in the range. Single axle construction is very modern and convenient to use. The three-way tipping system of the loading case provides high level functionality. Beside this, high quality, reliable and durable axles distinguish them from the competition. The small dimensions and load capacity of two and half tons makes them perfect for small sized farms. Thanks to its small dimensions it can be connected to any type of tractor.

PRONAR Trailer **T654/1** is a bigger single axle trailer in comparison to its twin sister **PRONAR T654**. The three-way stable tipping system of the loading case provides high level functionality. Beside this, resistant profiles and high quality, reliable and durable axles distinguish them from the competition. The load capacity of three and half tons makes them perfect for small and medium sized farms. It can be connected to the tractors

PRONAR T654/2 is a single axle trailer with three-way tipping system. It is designed for transporting any materials used in agriculture (corn, silage and root crops), in the municipal sector (waste disposal resulting from cleaning parks, greenbelts and bicycle paths), in fruit growing (transport boxes in orchards between rows of trees and shrubs) and other purposes.

PRONAR T654/2 trailer is a versatile product which is a result of upgrading PRONAR T654/1 trailer. The top and bottom frame has been redesigned which makes trailer curb weight as **T654/1**. Nevertheless **T654/2** has greater capacity remaining the basic parameters such as strength and stability unchanged. The loading case has a universal opening and central locking walls system (rear, left, right). The walls are made from high quality, strong profiles PF500 mm (closed walls profiles protected by laser weld). The forged hinges and locks are used in the case to prevent from case unexpected opening the walls and ensure the tightness of loading box for each type of cargo.

PRONAR T654/2 trailer has central locking walls (rear, left, right), three-way tipping system, drawbar support as straight leg with folded steel wheel, chute grain locked in the rear wall and double line braking system in standard version. The versatile design of the frame gives the opportunity to attach the trailer drawbar on the lower or upper hitch of the tractor. It is also possible to have overrun braking system. Chemically hardened painting materials provide high durability and UV resistance.

PRONAR PRONAR T655 is the smallest single axle trailer offered in a unique orange color. The Three-way tipping system of the loading case provides high level functionality. Beside this, high quality, reliable and durable axles distinguish them from their competition. The small dimensions and load capacity of two and half tons make them perfect for municipality. Thanks to its small dimensions it can be connected to any type of

Modern and convenient **PRONAR** Trailer **T671** is the biggest single axle trailer in our range. The Three-way tipping system of the loading case provides high level functionality. Beside this, high quality, reliable and durable axles distinguish them from the competition. The load capacity of five tons makes them enough efficient for small and medium sized farms. The trailer is equipped with sidewalls central locking system and the grain hatch with a lever facilitating rear unloading.









Three way tipping system with telescopic cylinder

Easier loading thanks to well situated loading case



TECHNICAL DATA OF STANDARD EQUIPMENT	T654	T654/1	T654/2	T655	T671
Technically permissible total weight: [kg]	4300*	5500	6100	3500	7400
Permissible total weight: [kg]	3780	4990	6100	2980	6855
Load capacity: [kg]	2500	3500	4910	2000	5000
Empty weight: [kg]	1280	1490	1190	980	1855
Load volume: [m³]	3.1	6.2	3,2	2.1	8.2
Loading space: [m²]	6.2	6.2	6,4	4.1	8.2
Loading case inside length: [mm]	3310	3310	3500	2910	4010
Loading case inside width: [mm]	1860	1860	1820	1410	"conical:2010 /2060"
Dimensions: length/width/height: [mm]	4950/2045/1430	4825/2045/2060	4960/1990/1430	4420/1595/1390	5630/2240/2080
Sidewall height: [mm]	500	500+500	500	500	500+500
Floor/wall thickness: [mm]	3/2	3/2	3/2	3/2	4/2
Platform height, measured from the ground: [mm]	890	1020	890	850	1045
Wheel track: [mm]	1500	1500	1400	1150	1530
Suspension:	fixed	fixed	fixed	fixed	fixed
Hitch-ring load: [kg]	800	750	1000	480	1100
Tyres: [km/h]	10.0/75-15.3	11.5/80-15.3	11,5/80-15,3	10.0/75-15.3	400/60-15.5
Maximum speed:	40	30	25	30	30
Tipping system:	3-side	3-side	3-side	3-side	3-side
Tipping cylinder (piston stroke/oil requirement/working pressure)	1300mm/8L/160bar	1300mm/8L/160bar	1300mm/8L/160bar	1300mm/8L/160bar	1540mm/8L/200bar
Tractor power requirement: [hp/kW]	26/19	31.2/23	33,6/24,7	20.8/15.3	36.4/26.7
Tipping angle (backwards/sides): [°]	50/46	50/46	50/46	50/46	50/46

^{*} Technically permissible total weight with reduced speed to 30 km/h

6 >>>>>> Technique for nature 7 >>>>> pronar.pl

ADDITIONAL EQUIPMENT (OPTIONAL)

	T654	
Loading case with universal system of sidewalls opening Central locking system Tipping frame: triangular made of open profiles Drawbar: lower transportation hitch with Ø50 fixed towing eye Drawbar support: supporting wheel Braking system: single line pneumatic or double line pneumatic or hydraulic brake with crank 12V lighting system with rear electric socket Tipping system with cut-off valve Three side tipping system Sidewalls made of PRONAR profiles 400 mm Sidewalls fastening string Double-component chemically hardened painting materials	Parking	Drawbar: rigid to couple with upper hitch of the tractor Drawbar towing hitch: fixed towing eye Ø40 Drawbar towing hitch: rotary towing eye Ø50 Sidewall extensions made of profile PP 400mm with ladder Overrun braking system Rear grain chute Rear grain hatch with a lever in a rear wall Parking brake with lever Rear manual hitch, fixed Rear sockets for hydraulic installation and brakes for second trailer Spare wheel (separately) 10.0/75-15.3 Warning triangle Laced canvas cover with frame
Wheel chocks and racks		Non standard colours according to RAL CALSSIC codes

Side walls painting colour: green RAL6010 PRONAR Mechanical support of the loading case	
T654/1	
Loading case with universal system of sidewalls opening Central locking system Tipping frame: triangular made of open profiles Drawbar: lower transportation hitch with Ø50 fixed towing eye Drawbar support: supporting wheel Braking system: single line pneumatic or double line pneumatic or hydraulic Parke with crank 12V lighting system with rear electric socket Tipping system with cut-off valve Three side tipping system Sidewalls and extensions made of PRONAR profiles 500mm + 500mm with rim 70mm with forgethinges and locks	Rear manual hitch, fixed Rear conections to a second trailer Rear grain chute Tyres 12.5/80-15.3 Tyres 14.0/65-16 Spare wheel (separately) 11.5/80-15.3
Sidewalls fastening string	Spare wheel (separately) 12.5-15.3

Sidewalls rastening string	Spare wheel (Separately) 12.5-15.3
Wheel chocks and racks	Spare wheel (separately) 14.0/65-16
Double-component chemically hardened painting materials	Warning triangle
Tipping frame painting colour: red RAL3000 PRONAR	Laced canvas cover with frame
Side walls painting colour: green RAL6010 PRONAR	Non standard colours according to RAL CALSSIC codes
Ladder and side steps facilitating access to the loading case	
Grain hatch with a lever in a rear wall	

Loading case with universal system of sidewalls opening
Central sidewalls locking system (rear, left, right)

Side walls made of 500 mm rainforced profiles with 70 mm edge, with forged hinges and locks

Closed walls profiles protected by laser weld Grain hatch with a lever in a rear wall

Mechanical support of the loading case

Tipping frame: Rectangular made of closed profiles

Tipping frame painting colour: red RAL3000 PRONAR

Drawbar: fixed to couple with lower or upper hitch of the tractor

Drawbar towing hitch: fixed with Ø40 towing eye to couple with upper hitch of the tractor

Drawbar support: straight with folded steel wheel

Braking system: double line pneumatic

Parking brake with crank

12V lighting system with rear electric socket Spiral connecting cable of lighting system Tipping system with cut-off valve

Mechanical support of the loading case Three side tipping system

Mechanical support of the loading case

Wheel chocks and racks (2 pcs)

Double-component chemically hardened painting materials, UV-resistant

Chassis color red RAL3000 PRONAR

Sidewalls color green RAL6010 PRONAR

T655

T654/2

Loading case with universal system of sidewalls opening Central locking system

Tipping frame: triangular made of open profiles

Drawbar: lower transportation hitch with Ø50 fixed towing eye

Drawbar support: supporting wheel

Braking system: single line pneumatic or double line pneumatic or hydraulic

Parking brake with crank

12V lighting system with rear electric socket

Tipping system with cut-off valve

Three side tipping system Sidewalls made of PRONAR profiles 400 mm

Double-component chemically hardened painting materials

Wheel chocks and racks

Tipping frame painting colour: black RAL9005 Side walls painting colour: orange RAL2008 Mechanical support of the loading case

Drawbar: fixed to couple with upper hitch of the tractor Drawbar towing hitch: fixed towing eye Ø40 Drawbar towing hitch: rotary towing eye Ø50

Non standard colours according to RAL CALSSIC codes

Drawbar towing hitch: fixed with Ø40 towing eye to couple with lower hitch of

Overrun brake (for 25 km/h and 6000 kg allowable total weight) Overrun brake (for 40 km/h and 6000 kg allowable total weight)

12V LED lighting system with rear electric socket

Spare wheel (separately) 11.0/80-15.3 Spare wheel (separately) 15.0/55-17

Additional extensions 500 mm rainforced profiles with 70 mm edge

Axles with permissible speed 40 km/h with stronger brakes and Tyres $\,$

Drawbar hitch: rotary with towing eye Ø50mm to couple with lower hitch of the

Sidewall extensions made of profile PP 400mm with ladder

Overrun braking system Parking brake with lever

Parking brake with lever

Tyres 15.0/55-17

Warning triangle

Rear grain chute

Rear manual hitch, fixed

Chassis frame color red RAL 3000 PRONAR Sidewalls color green RAL 6010 PRONAR Spare wheel (separately) 10.0/75-15.3

Excluding braking system: pneumatic

Non standard colours according to RAL CALSSIC codes





T671



service support for loading case

T654/2 - Rigid drawbar to connect to the upper hitch of the tractor

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL)

Loading case with universal system of sidewalls opening	Excluding PF 500mm side extensions
Central locking system	Drawbar towing hitch: rigid to couple v
Tipping frame: triangular made of closed profiles	Drawbar towing hitch: fixed towing ev

Tipping fr

Drawbar: lower transportation hitch with Ø50 fixed towing eye

Drawbar towing hitch: rigid with Ø50 towing eye

Braking system: single line pneumatic or double line pneumatic or hydraulic brake with crank

12V lighting system with rear electric socket

Tipping system with cut-off valve

Three side tipping cylinder

 $Side \ walls \ and \ extensions \ made \ of \ PRONAR \ profiles \ 500mm \ with \ rim \ 70mm \ with \ forged \\ Laced \ canvas \ cover \ with \ frame$

hinges and locks

Three side tipping cylinder

Sidewalls fastening string Grain hatch with a lever in a rear wall

Wheel chocks and racks

Double-component chemically hardened painting materials

A ladder and side steps facilitating access to the loading case

frame painting colour: red RAL3000 PRONAR

Side walls painting colour: green RAL6010 PRONAR

Mechanical support of the loading case

with upper hitch of the tractor

ng eye Ø40

Drawbar towing hitch: rotary towing eye Ø50

Overrun braking system (technical max. Speed 25 kph, along with max permissible total $\,$ weight 6800)

Braking system: hydraulic with mechanical safety valve

Axles for 40km/h

Parking brake with lever

Rear manual hitch, fixed

Rear conections to a second trailer

Rolled canvas cover Grain chute

Tyres 400/60-15.5 Flotation+

Tyres 15.0/70 - 18 (used for 40km/h)

Spare wheel (separately) 400/60-15.5

Spare wheel (separately) 400/60-15.5 Flotation+ Spare wheel (separately) 15.0/70 - 18

Warning triangle
Auger for unloading grain with efficiency of 30 t/h **

Rear grain chute across width of the trailer

Shock absorber for falling potatoes - two sets of rubber belts, 1,8m of length each, mounted

on the sidewall extensions (side extensions necessaary) Non standard colours according to RAL CALSSIC codes

[&]quot; mounted on the rear wall, two-segmented, folded, with mechanical winch, auger driven hydraulically, oil requirement 30L/min



8 >>>>>> Technique for nature 9 >>>>>> pronar.pl

Permissible total weight 6000kg, axle with reinforced brakes, wheels 15.0/70 - 18, Braking system- double line pneumatic



PRONAR TRAILERS T653, T653/1, T653/2	12
PRONAR TRAILERS T672, T672 ECO, 672/1, T672/2	15
PRONAR TRAILERS PT606, PT608, PT610, PT612, PT612L	19
PRONAR TRAILERS T680, T680U, T680P, T680H	24

DOUBLE AXLE TRAILERS

PRONAR T653, T653/1, T653/2



PRONAR T653 is a double axle agriculture trailer with 4000kg load capacity and three side tipping. This type has been developed and manufactured over the years. It has strong and reliable construction with three side tipping system which allows to unload the cargo in preffered

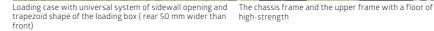
PRONAR T653/1 is a double axle agriculture trailer with 5000kg load capacity and three side tipping. It also the model with durable construction. developed and modernized over the year.

Double axle trailer T653/2 is ideally suited for transporting agricultural materials and municipal waste. Durable sidewall profiles and floor plate made of thick steel provide easy transport of both agricultural products and waste materials. Trailer standard equipment includes in a connections to a second trailer with output for hydraulic and pneumatic; as well the manual hitch which makes it easy makes it easy to aggregate another/second trailer. Rear mudguards and wheel chocks ensuse safe and comfortable usage. The standard window in the rear wall allows to add the mechanism for unloading the grain. Additional equippment allow the trailer to fit your needs, thus providing the opportunity to choose the optimal version of the trailer at the best price.













TECHNICAL DATA OF STANDARD EQUIPMENT	T653	T653/1*	T653/2*
Permissible total weight [kg]	5950	7105	8120
Load capacity [kg]	4000	5000	6000
Empty weight [kg]	1950	2105	2120
Load volume [m³]	4,1	8,2	8,2
Loading space [m²]	8,2	8,2	8,2
Loading case inside length [mm]	4010	4010	4010
Loading case inside width [mm]	trapezoid 2010/2060	trapezoid 2010/2060	trapezoid 2010/2060
Dimensions length/width/height [mm]	6140/2230/1585	6140/2230/2130	6140/2230/2170
Sidewall height [mm]	500	500+500 (option)	500+500 (option)
Floor/wall thickness [mm]	3/2	4/2	4/2
Platform height, measured from the ground [mm]	1070	1120	1120
Wheel track [mm]	1600	1600	1600
Suspension	parabolic springs	parabolic springs	parabolic springs
Tyres	10,0/75-15,3	11,5/80-15,3	11,5/80-15,3
Maximum speed [km/h]	30	30	30
Tipping system	3-side	3-side	3-side
Telescopic cylinder (piston stroke/oil requirement/working pressure)	1300 mm/8L/160bar	1300 mm/8L/160bar	1300 mm/8L/160bar
Minimum tractor power requirement [hp/kW]	36,4/26,7	41,6/30,6	46,8/34,4
Tipping angle (backwards/sides) [°]	42/46	42/46	42/46



13 >>>>>> **12** >>>>>> Technique for nature pronar.pl

PRONAR T653, T653/1, T653/2



STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL)

T653

Loading case with universal system of sidewalls opening Conical shape of loading case (50 mm wider at the back)

Conical snape of loading case (50 mm wider at the back)
Central locking system
Drawbar: V type with Ø40 fixed towing eye
Rotating turntable
Braking system: single line pneumatic or double line pneumatic or hydraulic
Parking brake with crank

Parking brake with Grank
Rear lights with protection cover
12V lighting system with rear electric socket
Coiled connecting cable for the lighting installation
Rear manual hitch, rigid
Rear conections to a second trailer
Tipping system with cut-off valve
Three side tipping cylinder
Side walls made of PRONAR profiles 500mm with rim 70mm with forged hinges and locks
Grain batch with a lever in a rear wall

Side walls made of PRONAR profiles 500mm with rim 70mm Grain hatch with a lever in a rear wall Double-component chemically hardened painting materials Wheel chocks and racks Tipping frame painting colour: red RAL3000 PRONAR Side walls painting colour: green RAL6010 PRONAR Mechanical support of the loading case Sidewalls fastening string Rear mudevlards

Rear mudguards

Ladder and side steps facilitating access to the loading case

Loading case with universal system of sidewalls opening Conical shape of loading case (50 mm wider at the back)

Conical shape of loading case (50 mm wider at the back)
Central locking system
Drawbar: V type with Ø40 fixed towing eye
Rotating turntable
Braking system: single line pneumatic or double line pneumatic or hydraulic
Drake with crank
12V lighting system with rear electric socket
Coiled connecting cable for the lighting installation
Rear lamps with protective grating
Rear manual hitch, rigid
Rear conections to a second trailer
Tipping system with cut-off valve
Three side tipping cylinder
Side walls made of PRONAR profiles 500mm with rim 70mm with forged hinges and locks
Grain hatch with a lever in a rear wall

Grain hatch with a lever in a rear wall

Wheel chocks and racks
Double-component chemically hardened painting materials
Tipping frame painting colour: red RAL3000 PRONAR
Side walls painting colour: green RAL6010 PRONAR
Rear mudguards
Ladder and side steps facilitating access to the loading case

Central locking mechanism

Rear manual hitch, rigid

Rear coupling for second trailer

Wheel chocks + racks (2 pcs) Chassis color red RAL 3000 PRONAR Sidewalls color green RAL 6010 PRONAR

Tipping system with cut-off valve Three side tipping cylinder

Rear grain damper, locked in the rear wall

Crank handbrake

Rear mudguards

Loading box with universal system of sidewalls opening $% \label{eq:loading} % \[\begin{array}{c} \left(\left(\frac{1}{2}\right) - \left(\frac{1}{2}\right) & \left(\frac{$

Braking system single line, double line pneumatic or hydraulic

Side walls made of PRONAR profiles 500 mm with rim 70 mm

Ladder and steps facilitating the access to the loading box

Drawbar V type rigid with Ø40 mm towing eye

Lighting system 12 V with rear electrical socket

Mechanical support of the loading case

Drawbar Y type: fixed with Ø40 towing eye

Drawbar V type: fixed with Ø50 towing eye Parking brake with lever

Laced canvas cover with frame

Rear grain chute

Spare wheel support

Tyres 11.5/80-15.3

Sidewall extensions 1000 mm made of wire netting Ø8

Sidewall extensions 1000 mm made of wire netting Ø30 Spare wheel (separately) 10.0/75-15.3

Spare wheel (separately) 11.5/80-15.3

Warning triangle

Set of wall supports to maintain the walls in a partially open position for bale transportation'

Shock absorber for falling potatoes - two sets of rubber belts, 1,8m of length each,

mounted on the sidewall extensions (side extensions necessaary) Rear grain chute across width of the trailer

Non standard colours according to RAL CALSSIC codes

* for agricultural roads only

T653/1

Drawbar V type: fixed with Ø50 towing eye Side wall extensions made of PRONAR profiles 500mm with rim 70mm Drawbar Y type: fixed with Ø40 towing eye

Parking brake with lever Laced cover with frame Rolled cover with frame

Rear grain chute

Spare wheel support
Tyres 14.0/65-16
Sidewall extensions 1000 mm made of wire netting Ø8

Sidewall extensions 1000 mm made of wire netting Ø30 Spare wheel (separately) 11.5/80-15.3 Spare wheel (separately) 14.0/65-16

Operator's platform

Warning triangle
Auger for unloading grain with efficiency 30 of t/h
Rear grain chute across width of the trailer

Set of wall supports to maintain the walls in a partially open position for bale

Shock absorber for falling potatoes - two sets of rubber belts, 1,8m of length each,

mounted on the sidewall extensions (side extensions necessaary) Non standard colours according to RAL CALSSIC codes
"mounted on the rear wall, two-segmented, folded, with mechanical winch, auger driven hydraulically, oil requirement 30L/min

*** for agricultural roads only

Drawbar: V type with Ø50 fixed towing eye
Side wall extensions made of PRONAR profiles 500mm with rim 70mm
Drawbar: Y type with Ø40 fixed towing eye
Overrun braking system
Parking brake with lever
Laced canvas cover with frame
Rolled canvas cover with frame
Grain chure

Grain chute

Spare wheel hanger

Spare wheel nanger Tyres 14.0/65-16
Sidewall extensions 1000 mm made of wire netting Ø8
Sidewall extensions 1000 mm made of wire netting Ø30
Spare wheel (separately) 11.5/80-15.3
Spare wheel (separately) 14.0/65-16
Operator's platform

Warning triangle
Auger for unloading grain with efficiency of 30 t/h ***
Rear grain chute across width of the trailer
Set of wall supports to maintain the walls in a partially open position for bale

transportation Shock absorber for falling potatoes - two sets of rubber belts, 1,8m of length each,

mounted on the sidewall extensions (side extensions necessaary) Non standard colours according to RAL CALSSIC codes "not available with operator's platform

inc. available with operation's piatrorm ""mounted on the rear wall, two-segmented, folded, with mechanical winch, auger driven hydroulically, oil requirement 30L/min "" for agricultural roads only

Tipping angle (backwards/sides) - 42/46

Mechanical support of the loading box Conical shape of loading box



Ladder facilitating access to the loading box



DOUBLE AXLE TRAILERS PRONAR T672, T672 eco, T672/1, T672/2

PRONAR T672 trailer is designed for transporting agricultural products, construction materials, mineral fertilizers and other materials. The trailer can be loaded with 8 tons of material, In standard equipment it has with a three-way tipping system, rear mudguards, rear hitch and manual grain chute in the rear of the trailer depends on configuratio the trailer may have a pneumatic brake system or hydraulic brake system. Optionally the trailer can be equipped it with a canvas cover, balcony, spare wheel and different sizes of tyres.

PRONAR T672/1 trailer is designed for transporting agricultural products, construction materials, mineral fertilizers and other materials. The trailer can be loaded with 10 tons of material, In standard equipment it has with a three-way tipping system, rear mudguards, rear hitch and manual grain chute in the rear of the trailer. depends on configuratio the trailer may have a pneumatic brake system or hydraulic brake system. Optionally the trailer can be equipped it with a canvas cover, balcony, spare wheel and different sizes of tyres.

PRONAR T672/2 trailer is one of the most popular two-axle trailer with an average load capacity. Extra side walls increase the load capacity of the trailer so with capacity of 11 tons (own weight only 3.6 tonnes) it is a perfect solution for farmers who have larger farms. Opening sides and three way tipping allows easy unloading. Minimal tractor power requirement to aggregate with T672/2 is approx. 70hp.

T672eco is one of the models of T672 range. It is eqquipped with the overrun braking system. Spacing of the tipping system is enlarged in order to minimize the risk of clashing the upper frame with the tyres. At the same time it makes it possible to use wider tyres. T672eco trailer is also eqquipped with the central sidewalls locking system. The sidewalls are made of wear resistant, laser welded profiles.

PRONAR T672

PRONAR T672 eco



PRONAR T672/1



PRONAR T672/2



Braking system double line pneumatic with manual speed

force controller

Three side tipping system with cradle



Manual suspended rear hitch



15 >>>>>>

14 >>>>>> Technique for nature pronar.pl

DOUBLE AXLE TRAILERS

PRONAR T672, T672 eco, T672/1, T672/2



TECHNICAL DATA OF STANDARD EQUIPMENT	T672*	T672 eco*	T672/1**	T672/2**
Permissible total weight [kg]	10990	8000	13160	14000
Load capacity [kg]	8000	5720	10000	10400
Empty weight [kg]	2990	2280	3160	3600
Load volume [m³]	9,8	4,9	11,8	11,8
Loading space [m²]	9,8	9,8	9,8	9,8
Loading box inside length [mm]	4440	4440	4440	4440
Loading box inside width [mm]	trapezoid 2190/2240	2190/2240	trapezoid 2190/2240	trapezoid 2190/2240
Dimensions length/width/height [mm]	6455/2390/2243	6590/2390/2160	6455/2390/2500	6455/2390/2580
Sidewall height [mm]	500+500 (option)	500+500	600+600 (option)	600+600 (option)
Floor/wall thickness [mm]	4/2	4/2	5/2,5	5/2,5
Platform height, measured from the ground [mm]	1215	1130	1320	1345
Wheel track [mm]	1730	1730	1700	1700
Suspension	parabolic springs	parabolic springs	parabolic springs	parabolic springs
Tyres	400/60-15,5	11,5/80-15,3	15,0/70-18	385/65 R22,5 RE
Maximum speed [km/h]	40	40	30	40
Tipping system	3-side	3-side	3-side	3-side
Telescopic cylinder (piston stroke/oil requirement/working pressure)	1700 mm/13L/200bar	1700mm/13L/200bar	1700 mm/13L/200bar	1700 mm/13L/200br
Minimum tractor power requirement [hp/kW]	62,4/45,8	46,8/34,4	72,8/53,5	78/57,3
Tipping angle (backwards/sides) [°]	50/46	50/46	50/46	50/46

^{*} technical data for side walls and extensions 500+500mm

^{**} technical data for side walls and extensions 600+600mm



Three side tipping systen



T672 eco - Plastic mudguards- rear mudguards and rear amps with protective grating



STANDARD EQUIPMENT

Braking system: single line pneumatic or double line pneumatic or hydraulic

Tipping system with cut-off valve Side walls made of PRONAR profiles 500mm with rim 70mm with forged hinges

Loading case with universal system of sidewalls opening

Conical shape of loading case (50 mm wider at the back)
Drawbar: V type with Ø40 fixed towing eye

Sidewalls fastening string
Grain hatch with a lever in a rear wall
Double-component chemically hardened painting materials

Tipping frame painting colour: red RAL3000 PRONAR Side walls painting colour: green RAL6010 PRONAR Ladder and side steps facilitating access to the loading case

Parking brake with crank 12V lighting system with rear electric socket Coiled connecting cable for the lighting installation

Rear lamps with protective grating

Rear conections to a second trailer

Mechanical support of the loading case

Central locking system Chassis frame - rectangular

Rotating turntable

Rear manual hitch

Wheel chocks and racks

and locks

ADDITIONAL EQUIPMENT (OPTIONAL)

T672

Drawbar: V type with Ø50 fixed towing eye Drawbar: Y type with Ø40 fixed towing eye Braking system: double line pneumatic with ALB (automatic braking force control) Rolled canvas cover with frame and foldable central pipe

Operator's platform

Rear grain chute Spare wheel hanger on the wall **

Spare wheel hanger on the wall "
Spare wheel hanger on the drawbar
Tyres 12.5/80-18 (with under-axle spacers needed)
Tyres 15.0/70-18 (with under-axle spacers needed)
Under-axle spacers for a set of optional tyres
Side walls extensions made of PRONAR profiles 500mm with rim 70mm
Middle sidewall extension made of PRONAR profile 500mm
Sidewall extensions 1000 mm made of wire netting 30mm
Sidewall extensions 1000 mm made of wire netting 8mm
Springs supporting of opening side walls

Springs supporting of opening side walls Rear automatic hitch UNIMAR Rear automatic hitch RO*400A4600

Spare wheel (separately) 400/60-15.5 Spare wheel (separately) 12.5/80-18

Spare wheel (separately) 15.0/70-18 16PR

Spare wheel (separately) 15.07/0-18 16PR
Warning triangle
Auger for unloading grain with efficiency 30 of t/h ***
Water tank (30L) with soap dispenser
Rear grain chute across width of the trailer
Side underrun protection

Additional plastic mudguards at the front wheels
Additional plastic mudguards at the rear wheels
Set of wall supports to maintain the walls in a partially open position for bale transportation

transportation****
Shock absorber for falling potatoes - two sets of rubber belts, 1,8m of length each, mounted on the sidewall extensions (side extensions necessaary)

Non standard colours according to RAL CALSSIC codes

T672 eco

Loading case with universal system of sidewalls opening

Tipping system with cut-off valve Three side tipping system

Conical shape of loading case

Central locking system
Side walls made of PRONAR profiles 500mm with rim 70mm with forged hinges and locks

Grain hatch with a lever in a rear wall

Ladder and side steps facilitating access to the loading case

Chassis frame - rectangular

Drawbar: Y type with Ø40 fixed towing eye Rotating turntable Drum brakes ø300x90mm

Braking system: double line pneumatic with ALB (automatic braking force control)

Postojowy hamulec ręczny z korbą Parking brake with crank

To long prime which can't can't all 2V lighting system with rear electric socket. Rear lamps with protective grating Coiled connecting cable for the lighting installation

Three side tipping cylinder Mechanical support of the loading case

Wheel chocks and racks

Rear plastic mudguards Rear bumper

Tipping frame painting colour: red RAL3000 PRONAR Side walls painting colour: green RAL6010 PRONAR

Side walls extensions made of PRONAR profiles 500mm
Drawbar: Y type with Ø40 fixed towing eye
Overrun braking system (Speed 40km/h; allowable total weight: 8000kg)
Braking system: double line pneumatic with ALB (automatic braking force control)
Braking system: "Premium" double line pneumatic with ALB (automatic braking force control)

Rolled canvas cover with frame and foldable central pipe

Operator's platform
Window in the front side wall extension (340x710) with grating and PLEX
Auger for unloading grain with efficiency of 30 t/h

Rear grain chute Rear grain chute across width of the trailer

Spare wheel hanger on the wall Tyres: 14,0/65-16; 400/60-15,5; 355/60R18 Spare wheel Shock absorber for falling potatoes - two sets of rubber belts, 1,8m of length each, mounted on the

sidewall extensions (side extensions necessaary) Set of wall supports to maintain the walls in a partially open position for bale transportation

Sidewall extensions 1000 mm made of wire netting 30mm

Sidewall extensions 1000 mm made of wire netting 8mm Springs supporting of opening side walls

Rear manual hitch: V. Orlandi

Rear automatic hitch V. Orlandi Additional plastic mudguards at the front wheels

Additional plastic mudguards at the rear wheels

Warning triangle
Non standard colours according to RAL CALSSIC codes

^{**}not available with operator's platform
***mounted on the rear wall, two-segmented, folded, with mechanical winch, auger driven hydraulically, oil requirement 30L/min for agricultural roads only



17 >>>>>> **16** >>>>>> Technique for nature pronar.pl

ADDITIONAL EQUIPMENT (OPTIONAL)

Loading case with universal system of sidewalls opening $% \label{eq:case_eq} % \begin{center} \begin{center}$ Central locking system

Conical shape of loading case (50 mm wider at the back)

Drawbar: V type with Ø40 fixed towing eye Rotating turntable

Braking system: single line pneumatic or double line pneumatic or hydraulic Parking brake with crank

12V lighting system with rear electric socket

Coiled connecting cable for the lighting installation

Rear lamps with protective grating Rear manual hitch, amortized

Rear conections to a second trailer

Tipping system with cut-off valve

Three side tipping cylinder

Side walls made of PRONAR profiles 600mm with rim 70mm with forged hinges

and locks

Sidewalls fastening string

Grain hatch with a lever in a rear wall

Wheel chocks and racks

Tipping frame painting colour: red RAL3000 PRONAR Side walls painting colour: green RAL6010 PRONAR

Double-component chemically hardened painting materials

Rear mudguards

Ladder and side steps facilitating access to the loading case

Rear lamps with protective grating

Mechanical support of the loading case

T672/1

Spare wheel hanger on the drawbar Tyres 385/55 R22.5 Tyres 385/55 R22.5 RE Tyres 500/50 - 17

Spare wheel (separately) 500/50 -17 Warning triangle Auger for unloading grain with efficiency of 30 t/h ***

Window in the front extension and in the front of the middle side wall extension (340x710) with

Loading case with universal system of sidewalls opening

Central locking system
Conical shape of loading case (50 mm wider at the back)
Drawbar: V type with Ø40 fixed towing eye

Rotating turntable Braking system: single line pneumatic or double line pneumatic or hydraulic

Parking brake with crank
12V lighting system with rear electric socket
Coiled connecting cable for the lighting installation

Rear lamps with protective grating

Rear manual hitch Rear conections to a second trailer

Tipping system with cut-off valve
Three side tipping cylinder
Side walls made of PRONAR profiles 600mm with rim 70mm with forged hinges

and locks

Sidewalls fastening string Grain hatch with a lever in a rear wall

Wheel chocks and racks

Tipping frame painting colour: red RAL3000 PRONAR Side walls painting colour: green RAL6010 PRONAR

Rear mudguards Double-component chemically hardened painting materials

Ladder and side steps facilitating access to the loading case Rear lamps with protective grating

Mechanical support of the loading case

Drawbar: V type with Ø50 fixed towing eye
Drawbar: Y type with Ø40 fixed towing eye
Braking system: double line pneumatic with ALB (automatic braking force control)
Rolled canvas cover with frame and foldable central pipe
Operator's platform for maintaining the canvas
Sidewalls extension made of profile PF 600mm with rim 70mm

Middle sidewall extension made of PRONAR profile 600mm Sidewall extensions 1000 mm made of wire netting 30mm Sidewall extensions 1000 mm made of wire netting 8mm

Rear grain chute Spare wheel hanger on the wall

Springs supporting of opening side walls Rear automatic hitch UNIMAR Rear automatic hitch RO*400A4600

Spare wheel (separately) 15.0/70-18 16PR Spare wheel (separately) 385/55 R22.5 Spare wheel (separately) 385/55 R22.5 RE

Spare wheel winch under trailer's frame, with crank
Rear grain chute across width of the trailer
Window in the front side wall extension (340x710) with grating and PLEXI

grating and PLEXI Additional plastic mudguards at the front wheels

Additional plastic mudguards at the rear wheels Set of wall supports to maintain the walls in a partially open position for bale transportation***

Side underrun protection

Shock absorber for falling potatoes - two sets of rubber belts, 1,8m of length each, mounted on the sidewall extensions (side extensions necessaary)

Non standard colours according to RAL CALSSIC codes

Drawbar: V type with Ø50 fixed towing eye

Drawbar: Y type with Ø40 fixed towing eye
Braking system: double line pneumatic with ALB (automatic braking force control)
Operator's platform

Operator's platform
Sidewalls extension made of profile PF 600mm with rim 70mm
Middle sidewall extension made of PRONAR profile 600mm
Sidewall extensions 1000 mm made of wire netting 30mm

Sidewall extensions 1000 mm made of wire netting 8mm

Tyres 425/65 R22 5

Springs facilitating opening side walls Rear automatic hitch UNIMAR Rear automatic hitch RO*400A4600

Spare wheel (separately) 385/65 R22.5 (15 R22.5) RE Spare wheel (separately) 385/65 R22.5 (15 R22.5)

Spare wheel (separately) 425/65 R22.5

Spare wheel (separately) 425/03 RZ2.3
Warning triangle
Auger for unloading grain with efficiency 30 t/h **
Rear grain chute across width of the trailer
Window in the front side wall extension (340x710) with grating and PLEXI
Window in the front extension and in the front of the middle side wall extension (340x710) with

grating and PLEXI Rolled canvas cover with frame and foldable central pipe

Additional plastic mudguards at the front wheels Additional plastic mudguards at the rear wheels

Shock absorber for falling potatoes - two sets of rubber belts, 1,8m of length each, mounted on the sidewall extensions (side extensions necessaary)

Non standard colours according to RAL CALSSIC codes





Tarpaulin with frame. Operator's platform to handle tarpaulin





PRONAR PT606 Trailer was constructed to meet the customer's high demands. It is multipurpose and durable. Perfect for both agriculture and municipal use. The universality of the **PRONAR PT606** trailer is due to inner width of the loading case (2.42 m), which allows to transport bulk materials and typical loading euro pallets. Trailer chassis design of the **PRONAR PT606** is based on close sections profiles, which, unlike open profiles are much more durable.

PT608 pallet trailer is a trailer which can fit euro pallets. Tipping system is used to easily transport the boxes from the plantation to the storage, transfer site and transport bales of 1.2m width. Box shape of the loading case makes it excellent for transportation of bulk materials and many other products. The company **PRONAR PT608** during the process of manufacturing uses advanced profiling technology and laser welding of the metal that guarantees precision and accuracy of production. PT608 is a trailer with a total weight 11 600kg with a mechanism of trilateral tipping. In the trailer the user can fit 10 euro pallets. Design trailer speed is 40km/h. The standard trailer is well equipped, with pneumatic, hydraulic and electrical system outputs as well as many more. The buyer has many options available to choose from.

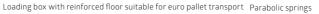
PT610 pallet trailer is a trailer which can fit euro pallets. Tipping system is used to easily transport the boxes from the plantation to the storage, transfer site and transport bales of 1.2m width. Box shape of the loading case makes it excellent for transportation of bulk materials and many other products. The company PRONAR PT608 during the manufacturing process uses advanced profiling technology and laser welding of the metal that guarantees precision and accuracy of production. PT610 is a trailer with a total weight 14 200 kg with a mechanism of trilateral tipping. In the trailer the user can fit 10 euro pallets. Design trailer speed is 40km/h. The standard trailer is well equipped, with pneumatic,

hydraulic and electrical system outputs as well as many more. The buyer has many options available to choose from.

Trailer **PT612** cargo box was made with strong and durable flooring panels, profiled sidewalls are locked central. The trailer is equipped with a tree side tipping system. The damper in the rear sidewalls allows easy unloading of raw materials, agricultural materials or construction materials (eg. Sand). The distance between the platform and the ground (between 1142 mm and 1270 mm), make the loading easier. The construction of the chassis frame is based on hollow sections, which gives the construction durability. Design trailer speed is 40km/h, with pneumatic or hydraulic brakes. The suspension, axles, leaf springs and special lighting has been designed to meet the requirements of higher speeds. For the production of the trailer high-quality materials are used, such as modern two-component coatings. Transport using a two-axle trailer is popular both in agriculture and in the municipal services.

PT612L trailer is longer than PT612. The load capacity is 12t. That model is characterized by enlarged loading case and spacing of the tipping system. Central sidewalls locking system makes it possible to apply side grain chutes, so the unloading can be made outside the wheels area.











TECHNICAL DATA OF STANDARD EQUIPMENT	PT606*	PT608*	PT610**	PT612***	PT612L****
Permissible total weight [kg]	8900	11600	14200	16300	16800
Load capacity [kg]	6000	8460	10290	12000	12000
Empty weight [kg]	2900	3140	3910	4200	4500
Load volume [m³]	10,1	11	13,2	15,4	15,4
Loading space [m²]	10,1	11	11	11	12,8
Loading box inside length [mm]	4190	4545	4545	4545	5300
Loading box inside width [mm]	2420**	2420**	2420**	2420**	2420
Sidewall height [mm]	500+500 (option)	500+500 (option)	600+600 (option)	600+800 (option)	600+600
Dimensions length/width/height [mm]	6390/2550/2200	6720/2550/2300	6720/2550/2520	6720/2550/2720	7420/2550/2450
Floor/wall thickness [mm]	4/2	4/2	5/2,5	5/2,5	4/2,5
Platform height, measured from the ground [mm]	1160	1220	1270	1270	1210
Wheel track [mm]	1900	1900	1900	1900	1960
Suspension	parabolic springs	parabolic springs	parabolic springs	parabolic springs	Resory paraboliczne
Tyres	14.0/65-16	14,0/65-16	385/65 R22,5 RE	385/65 R22,5 RE	445/45R19,5
Maximum speed [km/h]	40	40	40	40	40
Tipping system	3-side	3-side	3-side	3-side	trójstronny
Telescopic cylinder (piston stroke/oil requirement/working pressure)	1540 mm/8L/200bar	1700 mm/13L/200bar	1700 mm/13L/200bar	1980 mm/18L/200bar	1980mm/18L/200bar
Minimum tractor power requirement [hp/kW]	46,8/34,4	62,4/45,8	78/57,3	89/65,7	89/65,7
Tipping angle (backwards/sides) [°]	50/46	50/46	50/46	50/46	50/46

^{*} technical data for side walls and extensions 500+500mm

^{***} width of the loading case suitable for EUROPALET transport



Braking system double line pneumatic with manual braking force controller





Ladder, operator's platform, rolled tarpaulin



DOUBLE AXLE TRAILERS



PRONAR PT606, PT608, PT610, PT612, PT612L

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL)

PT606 Drawbar V type: fixed with Ø50 towing eye Drawbar Y type: fixed with Ø40 towing eye Braking system: double line pneumatic with ALB (automatic braking force control) Overrun braking system Tension bars along the sidewalls extensions (2pcs.) Laced canvas cover with frame Rolled canvas cover with frame with demountable central pipe and lateral supporting pipes Sidewalls extensions made of PRONAR profiles 500mm with rim 60mm Rear grain chute Operator's platform Rear manual, hitch witch shock absorption Rear manual hitch MH31-3 V. Orlandi Rear automatic hitch H181-3 V. Orlandi Tyres 400/60-15.5 Water tank (30L) with soap dispenser Toolbox (-50L) Front mudguards Spare wheel hanger on the sidewall ** Spare wheel hanger winch Spare wheel langer are winch Spare wheel (separately) 14.0/65-16 Spare wheel (separately) 400/60 - 15.5 Warning triangle Auger for unloading grain with efficiency 30 t/h ***

Loading case with universal system of sidewalls opening Reinforced floor pan with walls central locking system

Drawbar V type: rigid with Ø40 towing eye

Rotating turntable

Braking system: single line pneumatic or double line pneumatic or hydraulic

12 V lighting system with rear electric socket

Rear lamps with protective grating

Coiled connecting cable for the lighting installation

Rear manual hitch

Rear conections to second trailer Tipping system with cut-off valve

Three side tipping cylinder

Side walls made of PRONAR profiles 500mm with rim 60mm with forged hinges and Incks

Rear mudguards

Rotating turntable

Rear mudguards

Wheel chocks + racks (2 pcs)

Tension slat of the sidewalls Chassis color red RAL3000 PRONAR Sidewalls color green RAL6010 PRONAR

Rear lamps with protective grating Loading case adapted to transport europallets Mechanical support of the Loading case

Parking brake with crank

Wheel chocks + racks (2 pcs)

Ladder and steps facilitating the access to the Loading case

Loading case with universal system of sidewalls opening Reinforced floor pan with walls central locking system Chassis frame made of rectangular closed profiles Drawbar V type: rigid with Ø40 towing eye

Tension slat of the sidewalls

Chassis color red RAL3000 PRONAR

Double-component chemically hardened painting materials, UV-resistant

Braking system: single line pneumatic or double line pneumatic or hydraulic

Side walls made of PRONAR profiles 500mm with rim 60mm with forged hinges and

Sidewalls color orange RAL 2008 PRONAR Loading case adapted to transport europallets

12 V lighting system with rear electric socket

Rear grain hatch with a lever in a rear wall

Ladder and steps facilitating the access to the Loading case

Double-component chemically hardened painting materials, UV-resistant

Rear lamps with protective grating Coiled connecting cable lighting system Rear manual hitch, amortized Rear coupling for second trailer Tipping system with cut-off valve Three side tipping cylinder

Mechanical support of the loading case Rear grain hatch with a lever in a rear wall

Set or wall supports to maintain the walls in a partially open position for bale transportation**** Shock absorber for falling potatoes - two sets of rubber belts, 1,8m of length each, mounted on the sidewall extensions (side extensions necessaary) Non standard colours according to RAL CALSSIC codes **** not allowed with operator's platform ***** mounted on the rear wall, two-segmented, folded, with mechanical winch, auger driven hydraulically, oil requirement 30L/min ****** for agricultural mode solutions. ** for agricultural roads only PT608

Drawbar V type: fixed with Ø50 towing eye
Drawbar Y type: fixed with Ø40 towing eye
Drawbar Y type: L-2100 with Ø40 towing eye
Drawbar Y type: L-2100 with Ø40 towing eye
Braking system: double line pneumatic with ALB (automatic braking force control)
Rolled canvas cover with frame with demountable central pipe and lateral supporting pipes
Operator's platform
Sidewalls extension made of profile PF 500mm with rim 60mm
Middle sidewall extension made of profile PF 500mm

Warning triangle
Auger for unloading grain with efficiency 30 t/h ***
The chute along the entire width of the trailer
Set of wall supports to maintain the walls in a partially open position for bale

Rear grain chute

Rear grain chute
Springs supporting opening of the sidewalls
Rear automatic hitch UNIMAR
Rear automatic hitch UNIMAR
Rear automatic hitch RO*400A4600
Tension slat of the sidewall extensions 2pcs.
Tyres 15.6/80-18
Tyres 15.0/70-18
Tyres 385/55 R22.5
Tyres 385/55 R22.5
Tyres 385/55 R22.5
Espare wheel (separately) 14.0/65-16
Spare wheel (separately) 15.0/70-18
Spare wheel (separately) 15.0/70-18
Spare wheel (separately) 385/55 R22.5
Spare wheel (separately) 385/55 R22.5
REFront mudguards
Additional rear plastic mudguards
Tool box

Additional rear plastic mudguards
Tool box
Side underrun protections
Warning triangle
Auger for unloading grain with efficiency of 30 t/h ***
Crank operated spare wheel winch situated under the frame of the trailer
Rear grain chute across width of the trailer
Foldable left or right chute along the entire length of the loading case
Foldable left and right chute along the entire length of the loading case
Set of wall supports to maintain the walls in a partially open position for bale
transportation***
Shock absorber for falling potatoes - two sets of rubber belts, 1,8m of length each, mounted on
the sidewall extensions (side extensions necessaary)
Non standard colours according to RAL CALSSIC codes
*** mounted on the rear wall, two-segmented, folded, with mechanical winch, auger driven
hydroulically, oil requirement 30L/min
**** for agricultural roads only

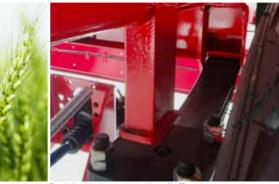




21 >>>>>> **20** >>>>>> Technique for nature pronar.pl

^{**}technical data for side walls and extensions 600+600mm

^{**} technical data for side walls and extensions 600+800mm





Chassis frame made of rectangular closed profiles of high strength steel

PT610

Loading case with universal system of sidewalls opening Reinforced floor pan with walls central locking system Chassis frame made of rectangular closed profiles Drawbar V type: rigid with Ø40 towing eye Braking system: single line pneumatic or double line pneumatic or hydraulic Axles 60 km/h*
Rotating turnable Parking brake with crank
12 V lighting system with rear electric socket Rear lamps with protective grating Coiled connecting cable lighting system Rear manual hitch, amortized Rear connections to a second trailer Tipping system with cut-off valve Three side tipping cylinder Double-component chemically hardened painting materials, UV-resistant Side walls made of PRONAR profiles 600mm with rim 70mm Rear mudguards. Side walls made of PRONAR profiles 600mm with rim 70mm
Rear mudguards
Rear grain hatch with a lever in a rear wall
Wheel chocks + racks (2 pcs)
Ladder and steps facilitating the access to the Loading case
Double-component chemically hardened painting materials, UV-resistant
Tension bar of the sidewalls
Chassis color red RAL3000 PRONAR
Sidewalls color green RAL6010 PRONAR
Mechanical support of the Loading case
Loading case adapted to transport europallets

**Permiscible total weight: 140000a

*Permissible total weight: 14000kg

V or Y type drawbar with Ø40 towing eye

Loading case with universal system of sidewalls opening Reinforced floor pan with walls central locking system Chassis frame made of rectangular closed profiles Drawbar V type: rigid with Ø40 towing eye Rotating Turnable Braking system: single line pneumatic or double line pneumatic or hydraulic Axles 60 km/h Parking brake with crank 12 V lighting system with rear electric socket Coiled connecting cable lighting system Rear lamps with protective grating Rear manual hitch, amortized Rear conections to a second trailer Tipping system with cut-off valve Three side tipping cylinder Side walls made of PRONAR profiles 600mm with rim 60mm Rear mudguards Rear grain hatch with a lever in a rear wall

Wheel chocks + racks (2 pcs)

Ladder and steps facilitating the access to the Loading case Double-component chemically hardened painting materials, UV-resistant

Tension bar of the sidewalls Chassis color red RAL3000 PRONAR Sidewalls color green RAL6010 PRONAR Loading case adapted to transport europallets

Drawbar V type: fixed with Ø50 towing eye Drawbar Y type: fixed with Ø40 towing eye Braking system: double line pneumatic with ALB (automatic braking force control) Operator's platform ewalls extension made of profile PF 600mm with rim 60mm (with tension bar of the extension) Middle sidewall extension made of profile PF 600mm Middle sidewall extension made of profile PI Rear grain chute Tyres 385/55 R22.5 Tyres 385/55 R22.5 RE Tyres 385/65 R22.5 Rear automatic hitch UNIMAR Rear automatic hitch RO'400A4600 Spare wheel (separately) 385/55 R22.5 RE Spare wheel (separately) 385/55 R22.5 Spare wheel (separately) 385/65 R22.5 Front mudguards Additional rear plactic mudguards Tool box Front mudguards
Additional rear plactic mudguards
Tool box
Side underrun protections
Springs facilitating opening the sides
Warning triangle
Auger for unloading grain with efficiency 30 t/h***
Crank operated spare wheel winch under the frame of the trailer
Rear grain chute across width of the trailer
Foldable left or right chute along the entire length of the loading case
Foldable left + right chute along the entire length of the loading case
Rolled canvas cover with frame with demountable central pipe and lateral supporting pipes
Window at the front side wall extension (340x710) with grating and PLEXI
Window at the front extension and in the front of the middle side wall extension (340x710)
with grating and PLEXI
Hydraulic support of unlocking side walls on the left or right side
Hydraulic unlocking side walls on the left and right side
Set of wall supports to maintain the walls in a partially open position for bale
transportation**

Two grain hatches with a lever in a rear wall with locking system
Three grain hatches with a lever in a rear wall with locking system
Shock absorber for falling potatoes - two sets of rubber belts, 1,8m of length each, mounted
on the sidewall extensions (side extensions necessaary)
Non standard colours according to RAL CALSSIC codes

"mounted on the rear wall, two-segmented, folded, with mechanical winch, auger driven
hydroulically, oir requirement 30L/min

""" for agricultural roads only for agricultural roads only

ADDITIONAL EQUIPMENT (OPTIONAL)

Drawbar: V type with Ø50 fixed towing eye Drawbar: Y type with Ø40 fixed towing eye Braking system: double line pneumatic with ALB (automatic braking force control) Operator's platform
Sidewalls extension made of profile PF 800mm with rim 60mm (with tension bar of the Sidewall extension made of profile PF600 mm with rim 60mm (with tension bar of the extension)
Middle sidewall extension made of profile PF 600mm
Rear grain chute
Tyres 385/55 R22.5
Tyres 385/55 R22.5 RE
Tyres 385/65 R22.5 RE
Tyres 385/65 R22.5
Rear automatic hitch UNIMAR
Rear automatic hitch NO '400A4600
Spare wheel (separately) 385/55 R22.5 RE
Spare wheel (separately) 385/55 R22.5
Spare wheel (separately) 385/65 R22.5
Front mudguards
Additional rear plastic mudguards Additional rear plastic mudguards Tool box
Side underrun protections
Springs facilitating opening the sides
Warning triangle
Auger for unloading grain with efficiency of 30 t/h ***
Crank operated spare wheel winch under the frame of the trailer
Rear grain chute across width of the trailer
Foldable left or right chute along the entire length of the loading case
Foldable left and right chute along the entire length of the loading case
Rolled cover with frame with demountable central pipe and lateral supporting pipes
Window in the front side wall extension (340x710) with grating and PLEXI
Window in the front extension and in the front of the middle side wall extension (340x710)
with grating and PLEXI
Two grain hatches with a lever in a rear wall with locking system
Three grain hatches with a lever in a rear wall with locking system Two grain hatches with a lever in a rear wall with locking system
Three grain hatches with a lever in a rear wall with locking system
Hydraulic support of unlocking side walls on the left or right side
Hydraulic unlocking side walls on the left and right side
Set of wall supports to maintain the walls in a partially open position for bale
transportation***
Shock absorber for falling potatoes - two sets of rubber belts, 1,8m of length each, mounted
on the sidewall extensions (side extensions necessaary)
Non standard colours according to RAL CALSSIC codes
***mounted on the rear wall, two-segmented, folded, with mechanical winch, auger driven
hydraulically, oil requirement 30L/min
****for agricultural roads only

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL)

PT612L

Loading case with universal system of sidewalls opening Tipping system with cut-off valve Loading case adapter to transport europallets Walls central locking system Side walls made of PRONAR profiles 600mm with rim 60mm Rear grain hatch with lever in a rear wall

Ladder and steps facilitating the access to the loading case Chassis frame made of rectangular closed profiles Drawbar V type: rigid with ø40 towing eye Rotating turntable

Braking system: double line pneumatic Parkig brake with crank

12V lightning system with rear electric socket Rear lamps with protective grating Coiled connecting cable lightning system Rear connctions to a second trailer

Three side tipping cylinder Tension bar of the sidewalls Wheel chocks+racks Rear mudguards

Doule-componen chemically hardened painting materials, UV-resistant

Sidewalls extensions made of profile PF600mm (with tension bar of the extension) Middle sidewall extension made of profile PF600mm

Drawbar: Y type with 40 fixed towing eye Drawbar: V type with 50 fixed towing eye

Braking system: single line pneumatic

Braking system: hydraulic

Braking system: double line pneumatic with ALB Rolled cover with frame with demountable central pipe and lateral supporting pipes Operator's platform

Window in the front side wall extension (340x710) with grating and PLEXI

Two grain hatches with a lever in a rear wall with locking system Three grain hatches with a lever in a rear wall with locking system

Rear grain chute

Rear grain chute across width of the trailer Auger for unloading grain with efficency of 30t/h

Side underrun protections

Tool box

Front mudguards (additional) Rear mudguards (additional)

Springs facilitating opening the sides

Hydraulic support of unlocking side walls on the left Hydraulic support of unlocking side walls on the right

 $\label{prop:continuous} \mbox{Hydraulic support of unlocking side walls on the left and on the right}$

Tyres: 385/55R22,5; 385/55R22,5_RE; 385/65R22,5; 385/65R22,5_RE

Crank operated spare wheel winch under the frame of the loading case Spare wheel

Shock absorber for falling potatoes- two sets of rubber belts, 1.8 m of length each, mounted on the sidewall

extensions (side estensions necessary) Set of wall supports to maintain the walls in a partially open position for bale transportation

Rear automatic hitch Warning triangle

Non standard colours according to RAL CLASSIC codes



23 >>>>>> **22** >>>>>> Technique for nature pronar.pl

DOUBLE AXLE TRAILERS

PRONAR T680, T680U, T680P, T680H



PRONAR T680 trailer with the most popular in Poland two axle suspension is excellent for agricultural and municipal transport. Durable sidewall profiles 800 mm high with a series-mounted 600 mm superstructures ensures high tightness, the floor plate made of thick steel provides easy transport for both agricultural products and waste materials with weight less than 14 tons. Thanks to use axles projected to 60 km/h speed, the maximum allowable trailer speed 40 km/h helps you aggregate the trailer with the latest agricultural tractors. Safe and comfortable use of the trailer is ensured by rear wheels fenders, wheel chocks and spare wheel placed in a basket under the trailer. Standard rear grain chute allows to fit grain flange or screw conveyor for easy unloading of grain. Additional equipment allow the trailer to fit your needs, and provide the opportunity to choose the optimal version of the trailer at the best price.

One of the most popular trailers is **T680**, called "fourteen" due its load capacity. It is universal trailer designed to transport both bulk cargo and pallets. Following new trends in the market of agricultural trailers **PRONAR** started production **T680U** trailer, with loading box equipped with

a replaceable seals. This trailer is designed to transport bulk cargo with small granulation, such as. rapeseed, soybean. **PRONAR T680U** is an addition to offer of commercial trailers with a total weight of 18 tonnes and meet the increasing demands of domestic and foreign customers. **PRONAR T680P** with total mass of 18t is agricultural trailer designed for transportation of crops and bulk agro products as well as europallets. Three sides tipping allows easy unloading in different places and significantly affect the functionality of the trailer. Tilt – closed sidewall opening system allows convenient loading and unloading. Side walls of loading box in **PRONAR T680P** trailer are made of special and waterproof plywood – durable and lightweight, corrosion resistant material. Seal is mounted in aluminum frame which allows to transport low granulation

PRONAR T680H with total mass of 18t is agricultural trailer designed for transportation of crops and bulk agro products as well as europallets. Three sides tipping allows easy unloading in different places and significantly affect the functionality of the trailer. Tilt – closed sidewall opening system allows convenient loading and unloading. Side walls of loading box in **PRONAR T680P** trailer are made of special and waterproof plywood – durable and lightweight, corrosion resistant material. Seal is mounted in aluminum frame which allows to transport low granulation materials like rapeseed.





PRONAR T680

PRONAR T680U

PRONAR T680H







PRONAR T680P



Telescopic cylinder with cradle









Strong rear bumper with LED lights with bars protecting

Replaceable rubber seals placed in slots on the floor ensure full

Robust wall locking near the floor

against damage

TECHNICAL DATA OF STANDARD EQUIPMENT	T680	T680U	T680P	T680H
Permissible total weight [kg]	18000*	18000*	18000*	18000*
Load capacity [kg]	13100**	13030**	13160**	12980**
Empty weight [kg]	4900	4970	4840	5020
Load volume [m³]	17,2	17,2	19,5	20,3
Loading space [m²]	12,3	12,3	12,7	12,1
Loading box inside length [mm]	5100	5100	5250	5020
Loading box inside width [mm]	2410***	2410***	2410***	2420***
Dimensions length/width/height [mm]	7300/2550/2800	7300/2550/2800	7300/2550/3250	7300/2550/3070
Sidewall height [mm]	800+600	800+600	1540	800+900
Floor/wall thickness [mm]	5/2,5	5/2,5	5/18	5/2,5
Platform height, measured from the ground [mm]	1390	1390	1390	1390
Wheel track [mm]	1900	1900	1900	1900
Suspension	Parabolic springs	Parabolic springs	Parabolic springs	Parabolic springs
Tyres	385/65 R22,5 RE	385/65 R22,5 RE	385/65 R22,5 RE	385/65 R22,5 RE
Maximum speed [km/h]	40	40	40	40
Tipping system	3-side	3-side	3-side	3-side
Telescopic cylinder (piston stroke/oil requirement/working pressure)	1980 mm/18L/200bar	1980 mm/18L/200bar	1980 mm/18L/200bar	1980 mm/18L/200bar
Minimum tractor power requirement [hp/kW]	109,2/80,3	109,2/80,3	109,2/80,3	109,2/80,3
Tipping angle (backwards/sides) [°]	47/47	47/47	47/47	47/47

depends on the road regulations in each country

^{*} width of the loading case suitable for EUROPALET transport



Wheel chocks with racks





Solid axles on parabolic springs





24 >>>>>> Technique for nature 25 >>>>>> pronar.pl

^{*} depends on the road regulations and equipm

DOUBLE AXLE TRAILERS

PRONAR T680, T680U, T680P, T680H



STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T680

Loading case with universal walls openning system Reinforced floor pan with central sidewalls locking system Drawbar: V type withh Ø40 fixed towing eye Rotating turntable Braking system: single line pneumatic or double line pneumatic or hydraulic

Axles for 60 km/h

Parking brake with crank Rear connections to a second trailer Tipping system with cut-off valve Telescopic servo-motor of 3-side tipping system PF800 mm+600 mm profile sidewalls Sidewalls fastening string

Grain hatch with a lever in a rear wall

Wheel chocks and racks

Ladder and side steps facilitating access to the loading case Clearence lights

12V LED lighting system with rear electric socket and clearance lights Coiled connecting cable for the lighting installation

Rear lamps with protective grating

Double-component chemically hardened painting materials

Loading case adapted to transport europallets Mechanical support of the loading case Tipping frame painting colour: red RAL3000 PRONAR Side walls painting colour: green RAL6010 PRONAR

Loading case with universal walls openning system Reinforced floor panel with central sidewalls locking system

Tipping frame made of steel rectangular profiles Drawbar: V type with Ø40 fixed towing eye Steering system: ball turntable rotating frame

12V lighting system with rear electric socket

Rear lamps with protective grating Coiled connecting cable for the lighting installation

Telescopic servo-motor of 3-side tipping system

Tipping frame painting colour: red RAL3000 PRONAR

Double-component chemically hardened painting materials

Ladder and side steps facilitating access to the loading case

Side walls painting colour: green RAL6010 PRONAR

Loading case adapted to transport europallets

Braking system: single line pneumatic or double line pneumatic or hydraulic

ensuring the tightness of the trailer

Rear connections to a second trailer

PF800 mm+600 mm profile sidewalls

Sidewalls fastening string Rear grain hatch with a lever in a rear wall

Tipping system with cut-off valve

Axles for 60 km/h

Parking brake with crank

Wheel chocks and racks

Plastic rear mudguards

Clearence lights

Drawbar: V type with Ø50 fixed towing eye
Drawbar: Y type with Ø40 fixed towing eye
Braking system: double line pneumatic with ALB (automatic braking force control)
Braking system: hydraulic with electric safety valve and braking force control
Operator's platform

Braking system: hydraulic with electric safety valve and braking force control Operator's platform Middle sidewalls made of profiles 600mm Sidewalls made of profiles 600mm Front 600mm sidewall extensions made of perforated steel with 10mm square holes Front 800mm sidewall extension made of perforated steel with 10mm square holes Non-segmented sidewalls and extensions (with no middle posts) Rear grain chute on the width of the chute Two grain hatches with a lever in a rear wall with locking system Three grain hatches with a lever in a rear wall with locking system Tyres 385/65 R22.5 [4] wheels) Tyres 500/60 R22.5 [4] wheels) Tyres 500/60 R22.5 [4] wheels) Tyres 500/60 R22.5 [4] wheels) Side underrun protections Rear automatic hitch UNIMAR Rear automatic hitch UNIMAR Rear automatic hitch Pocking Stable St

Additional front plastic mudguards for rear wheels
Warning triangle
Auger for unloading grain with efficiency 30 t/h****
Rolled canvas cover with frame and foldable central pipe
Rear grain chute across width of the trailer
Foldable left or right chute along the entire length of the loading case
Foldable left and right chute along the entire length of the loading case
Tool hox

Spare wheel winch under trailer's frame, with crank, only with wheels: 385/65 R22,5

Drawbar: V type with Ø50 fixed towing eye
Drawbar: Y type with Ø40 fixed towing eye
Braking system: double line pneumatic with ALB (automatic braking force control) Replaceable rubber seals, placed in slots at the floor plate, with three sides of the floor,

Decrator's platform sidewalls made of profiles 600mm sidewalls made of profiles 600mm sidewalls extensions made of profile PF800 mm instead of 600 mm Tyres 385/65 R22.5 tyres 455/65 R22.5 tyres 550/45 R22.5 tyres 500/60 R22.5 side understance profiles for the side understance and th

Tyres 500/60 R22.5
Side underrun protections
Rear automatic hitch UNIMAR
Rear automatic hitch UNIMAR
Rear automatic hitch RDCKINGER 400A4600
Spare wheel (separately) 425/65 R22.5
Spare wheel (separately) 550/45 R22.5
Spare wheel (separately) 500/60 R22.5
Spare wheel (separately) 385/65 R22.5 RE
Spare wheel (separately) 385/65 R22.5 RE
Spare wheel (separately) 385/65 R22.5 RE
Spare wheel (separately) 385/65 R22.5 Additional rear plastic mudguards for front wheels
Additional front plastic mudguards for rear wheels
Tool box

Warning triangle
Auger for unloading grain with efficiency 30 t/h ****
Rolled canvas cover with frame and foldable central pipe

Rear grain chute
Rear grain chute
Rear grain chute
Rear grain chute across width of the trailer
Foldable left or right chute along the entire length of the loading case
Foldable left and right chute along the entire length of the loading case
Spare wheel winch under trailer's frame, with crank, only with wheels: 385/65 R22,5 and

AZS/GSR22.5:

Axles for 60 km/h agriculture use (according to German STVZO)with double line braking system with ALB and tyres 385/65R22.5 RE for 60km/h

Window at the front sidewall extension (340x710) with grating and PLEXI

Window at the front sidewall extension and in the front of the middle side wall extension

Window at the front sidewall extension and in the front of the middle side wall extension (340x710) with grating and PLEXI Front 600mm sidewall extension made of perforated steel with 10mm square wholes Front 800mm sidewall extension made of perforated steel with 10mm square wholes Hydraulic support of unlocking sidewalls on the left or right side Hydraulic support of unlocking sidewalls on the left and right side Set of wall supports to maintain the walls in a partially open position for bale transportation.

transportation*****
Shock absorber for falling potatoes - two sets of rubber belts, 2,3m of length each, mounted on the sidewall extensions (side extensions necessaary)
Non standard colours according to RAL CALSSIC codes
**** mounted on the rear wall, two-segmented, folded, with mechanical winch, auger driven hydraulically, oil requirement 30L/min
***** for agricultural roads only

Chute over the entire width of the trailer

Loading case with special walls openning system Reinforced floor pan with central sidewalls locking system

Drawbar: V type with Ø40 fixeed towing eye

Telescopic servo-motor of 3-side tipping system

12V LED lighting system with rear electric socket Coiled connecting cable for the lighting installation

Loading case adapted to transport europallets

Mechanical support of the loading case

Spare wheel 385/65 R22,5 Regenerated

Plastic rear mudguards Double-component chemically hardened painting materials

Ladder and side steps facilitating access to the loading case

Tipping frame painting colour: red RAL3000 PRONAR

Rotating turnable

Axles for 60 km/h

Parking brake with crank

Wheel chocks and racks

Frame for the cover

Clearence lights

Rear conections to a second trailer

Tipping system with cut-off valve

Segmented sidewalls with middle posts

Grain hatch with a lever in a rear wall

Rear lamps with protective grating





STANDARD EQUIPMENT

Braking system: single line pneumatic or double line pneumatic or hydraulic

Right-sidewall height 800+740 mm, swing and collapsible opening system Left-sidewall height 1540 mm, door-like opening system Rear wall height 1540mm, swing and collapsible opening system

Beam for spare wheel (only for tyres: 385/65 R22,5 and 425/65 R22,5) Spare wheel 385/65 R22,5 Regenerated

ADDITIONAL EQUIPMENT (OPTIONAL)

T680P

Drawbar: V type with Ø50 fixed towing eye Drawbar: Y type with Ø40 fixed towing eye

Braking system: double line pneumatic with ALB (automatic braking force

Rolled canvas cover with frame and foldable central pipe

Operator's platform

Rear grain chute

Rear grain chute (both sides and rear)

Tyres 385/65 R22.5 (4 wheels without spare wheel)
Tyres 425/65 R22.5 (4 wheels without spare wheel)

Tyres 550/45 R22.5 (4 wheels without spare wheel)

Tyres 500/45 R22.5 (4 wheels without spare wheel)

Side underrun protections

Rear automatic hitch UNIMAR

Rear automatic hitch ROCKINGER 400A4600

Spare wheel 425/65 R22.5 (beam in standard option)

Spare wheel (separately) 550/45 R22.5

Spare wheel (separately) 500/60 R22.5 Spare wheel 385/65 R22.5 for standard beam

Without beam for spare wheel

Without standard spare wheel 385/65 R22.5 RE

Additional front plastic mudguards for rear wheels Additional rear plastic mudguards for front wheels

Three grain hatches with a lever in a rear wall with locking system

Warning triangle
Auger for unloading grain with efficiency 30 t/h****

Removable central pillar

Rear grain chute across width of the trailer Spare wheel winch under trailer's frame, with crank, only with wheels: 385/65 R22,5 and

425/65R22.5: Hydraulic support of unlocking side walls on the left or right side

Hydraulic support of unlocking side walls on the left and right side

Shock absorber for falling potatoes - two sets of rubber belts, 2,3m of length each, mounted on the sidewall extensions (side extensions necessaary)

Drawbar: V type with Ø50 fixed towing eye Drawbar: Y type with Ø40 fixed towing eye Braking system: double line pneumatic with ALB (automatic braking force

Two grain hatches with a lever in a rear wall with locking system

Non standard colours according to RAL CALSSIC codes

Right sidewall extension 500 mm for green forage

Tyres 385/65 R22.5 (4 wheels without spare wheel)

Tyres 425/65 R22 5 (4 wheels without spare wheel)

Tyres 550/45 R22.5 (4 wheels without spare wheel)

Tyres 500/60 R22.5 (4 wheels without spare wheel)

Spare wheel 425/65 R22 5 (with beam mounted in standard)

Spare wheel 385/65 R22.5 (with beam mounted in standard)

Rear automatic hitch ROCKINGER 400A4600

Spare wheel (separately) 550/45 R22.5

Spare wheel (separately) 500/60 R22.5

**** mounted on the rear wall, two-segmented, folded, with mechanical winch, auger driven

hydraulically, oil requirement 30L/min

Rolled canvas cover with frame Operator's platform

Rear grain chute

T680H

Loading case with universal walls openning system Reinforced floor pan with central wall locking mechanism

Drawbar: V type withh Ø40 fixed towing eye

Rotating turnable

Braking system: single line pneumatic or double line pneumatic or hydraulic Parking brake with crank

Rear connections to a second trailer Axles for 60 km/h

Tipping system with cut-off valve

Telescopic servo-motor of 3-side tipping system

Sidewall rubber sealing 12V lighting system with rear electric socket

Rear lamps with protective grating

Coiled connecting cable for the lighting installation Left sidewall height 1700 mm driven hydraulically with automatic locking system Right lower sidewall height 800 mm swing and collapsible system with central wall locking system

Rear lower sidewall height 800 mm swing and collapsible system with central wall locking

. Rear grain hatch with a lever in a rear wall

Wheel chocks and racks

Tipping frame painting colour: red RAL3000 PRONAR Side walls painting colour: green RAL6010 PRONAR

Loading case adapted to transport europallets

Plastic rear mudguards Mechanical support of the loading case

Spare wheel 385/65 R22.5 Regenerated

Beam for spare wheel (only for tyres: 385/65 R22,5 and 425/65 R22,5) Ladder and side steps facilitating access to the loading case

Double-component chemically hardened painting materials

Without spare wheel beam Without standard spare wheel 385/65 R22.5 RE

Side underrun protections

Rear automatic hitch UNIMAR

Plastic front mudguards Additional rear plastic mudguards

Warning triangle

Auger for unloading grain with efficiency 30 t/h ****

Spare wheel winch under trailer's frame, with crank , only with wheels: 385/65 R22,5 i

Non standard colours according to RAL CALSSIC codes

""" mounted on the rear wall, two-segmented, folded, with mechanical winch, auger driven hydraulically, oil requirement 30L/min

27 >>>>>> **26** >>>>>> Technique for nature pronar.pl



THREE AXLE TRAILER PRONAR T780

A specialized three-axle trailer **T780** with heavy duty capacity construction (26 m3) guarantees economical transport and reduce production costs. It is ideal for the transport of both agricultural crops and euro-pallets. Tyres and axles are designed to transport on roads for long distances at a speed of 40 km/h (optionally 60 km/h). There is a possibility to order the trailer with additional grain hatch in the side walls that increases its versatility. The standard springs for easy opening, allow the trailer to be operate efficiently by one person.



TECHNICAL DATA OF STANDARD EQUIPMENT	T780
Permissible total weight [kg]	24000*
Load capacity [kg]	16300**
Empty weight [kg]	7700
Load volume [m³]	26
Loading space [m²]	18,55
Loading case inside length [mm]	7696
Loading case inside width* [mm]	2410**
Dimensions length/width/height [mm]	10087/2548/2800
Sidewall height [mm]	800+600
Floor/wall thickness [mm]	5/2,5
Platform height, measured from the ground [mm]	1390
Wheel track [mm]	1960
Suspension	Parabolic springs
Tyres	385/65 R22,5 RE
Maximum speed [km/h]	40
Tipping system	3-side
Telescopic cylinder (piston stroke/oil requirement/working pressure)	2 cylinders 2990 mm/68L/200bar
Minimum tractor power requirement [hp/kW]	150/110,2
Tipping angle (backwards/sides) [°]	47/45

^{*} depends on the road regulations in each country ** depends on the road regulations and equipmen

width of the loading case suitable for FUROPALET transport







Ladders and operator's platform on the front sidewall for easy access to loading box and rolled canvas cover. Two cylinders for three side tipping system- rear 470, on the





STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL)

Loading case with universal system of sidewall opening

Three side tipping system of the loading case

Drawbar: V type with Ø40 fixed towing eye

Chassis frame of welded closed rectangular profiles made of high strength steel Axles for 60km/h

 $Braking\ system:\ double\ line\ pneumatic\ with\ ALB\ or\ double\ line\ pneumatic\ or\ hydraulic$ Crank hand brake

12 V lighting system with rear electric socket

Hydraulic tipping system with cut-off valve

Two telescopic cylinders of 3-side tipping system

Sidewalls made of profile PF 800+600 with middle post, with rim 60mm with forged hinges and locks

Central locking system Grain hatch with lever in rear wall

Springs facilitating opening the sides (4 pcs)

A set of plastic front and rear mudguards

Double-component chemically hardened painting materials

Ladder and side steps facilitating access to the loading case Wheel chocks and racks

Tipping frame painting colour: red RAL3000 PRONAR

Sidewall painting colour: green RAL6010 PRONAR

T780

Drawbar: Y type with Ø40 fixed towing eye Rear connections to a second trailer Operator's platform

Rolled canvas cover with frame Sidewall extensions 800mm (instead of 600mm)*

Side grain hatch on the left or the right side of the trailer

Tool box

Side underrun protections
Set of chutes: left and right along the entire length of the trailer loading case + rear across

width of the trailer Rear grain chute

Tyres 385/65R22.5 (6 pcs without a spare wheel)
Tyres 425/65 R22.5 ET= -30 (6 pcs without a spare wheel)

Tyres 750/45 R22.5 (6 pcs without a spare wheel)
Spare wheel beam*
Rear automatic hitch UNIMAR
Rear automatic hitch ROCKINGER 400A4600

Spare wheel (separately) 385/65 R22.5 (15 R22.5) RE Spare wheel (separately) 385/65 R22.5 (15 R22.5)

Spare wheel (separately) 425/65 R22.5 Spare wheel (separately) 550/45 R22.5

Warning triangle
Auger for unloading grain with efficiency 30 t/h ****

Crank operated spare wheel winch under the frame of trailer. Only for 385/65 R22,5 and 425/65 R22,5

Rear grain chute across width of the trailer Left or right side removable grain chute across entire length of the trailer loading case Left and right side removable grain chute across entire length of the trailer loading case Hydraulic assisted left or right sideboard opening

Hydraulic assisted left and right sideboard opening Set of wall supports to maintain the walls in a partially open position for bale

transportation**
Shock absorber for falling potatoes - two sets of rubber belts, 2,3m of length each, mounted

on the sidewall extensions (side extensions necessaary) Non standard colours according to RAL CALSSIC codes

*The use of sidewall extensions 800mm possible with 425/65 R22,5 ET=-30 or 550/45 R22,5 Flotation Tyress

**Spare wheel beam available for 385/65 R22,5 and 425/65 R22,5 Tyress

for agricultural roads only

**** mounted on the rear wall, two-segmented, folded, with mechanical winch, auger driven hydraulically, oil requirement 30L/min

31 >>>>>> **30** >>>>>> Technique for nature pronar.pl



PRONAR TRAILERS T663/1, T663/2, T663/3, T663/4	3
PRONAR TRAILERS T683, T683U, T683P, T683H	3
PRONAR TRAILERS PT510, PT512	4

TANDEM AXLE TRAILERS

PRONAR T663/1, T663/2, T663/3, T663/4



More and more customers appreciate usefulness of the trailers with tandem suspension due to its advantage in hard conditions. More pressure on the tractor hitch in tandem trailer makes easy maneuvering in difficult terrain and increases the pulling power of the tractor. Trailer **PRONAR T663/1**, also has a three way tipping system, and at the loading case has low suspension. All this makes the trailer extremely stable and easy to

Trailer PRONAR T663/1 is also available as a silo version with a capacity of 16 m³ load. It stands out with a hydraulically raised rear wall and hydraulic locks that protect against uncontrolled tailgate drop in case of oil pressure decrease.

Trailer PRONAR T663/2 is a three-way tipping trailer that can serve a similar purpose as two-axle trailer. However, due to tandem suspension which not only distributes the load on the wheels of the trailer but also on the tractor hitch, it is perfect to work in hard conditions, when dealing with soft ground, including green areas and work related to municipal services.

PRONAR T663/2 Trailer is available as SILO version "T663/2 SILO", which has sidewalls increased by 500 mm, including the hydraulic tailgate which make it more effective . High quality and multifunctionality will satisfy every demand.

PRONAR trailer T663/3 is a modern trailer type characterized by three way tipping system, central locking system, durable walls and a unloading window in the tailgate. Ideally designed for transporting agricultural products, particularly for corn, grain etc. The trailer is designed as a tandem which makes maneuvering easy. Stable ball tipping system, load-bearing frame profiles of high quality, reliable and durable axles are the factors that distinguishes **PRONAR** products from other products on the market.

T663/3 is produced in SILO version aslo. **PRONAR T663/3** SILO has additional side walls, which together with hydraulic tailgate increasing its functionality

Why would improve something that is good? Because the world is constantly changing, and the technical world even more rapidly. **PRONAR** T663/4 trailer was created as enhanced version of the T663/1. We have improved maneuvering characteristics of the trailer as well as its stability.

A customer who chooses a **PRONAR T663/4** can be sure that in comparison with the model **T663/1** the trailer will have a larger capacity (up to 10420 kg), will be more stable (increased spacing, parabolic springs, extended frame bottom, increased wheelbase), a lower loading height – in standard option, loading height is lowered by 120 mm to 1185 mm)



PRONAR T663/1







Universal rigid drawbar to connect with the lower or the upper hitch of the



Telescopic servo-motor of 3 side tipping system Handbrake





4	- 1	PRO
Carro		
- 17		



Loading box of trapezoid shape (50 mm wider rear) Grain chute with lock

Closed spaces of the sidewalls and extensions protected by laser weld

Wheel chocks + galvanized racks (2 pcs)
Double-component chemically hardened painting materials, UV-resistant



15270 (12000)	3100	13000	14000
10000	7000**	10000	10420
3290	2700***	3660	3580
11,8	9,8	11,8	11,8
9,8	9,8	9,8	9,8
4440	4440	4440	4440
trapezoid 2190/2240	trapezoid 2190/2240	trapezoid 2190/2240	trapezoid 2190/2240
6116/2390/2484	6121/2390/2094	6154/2390/2579	6230/2390/2445
600+600	500+500	600+600	600+600
5/2,5	4/2	5/2,5	5/2,5
1250	1060	1320	1185
1700	1650	1700	1800
leaf springs	parabolic springs	leaf springs	parabolic springs
1860	1465	1880	2000
15,0/70-18	11,5/80-15,3	385/65 R22,5 (15R22,5)	15,0/70-18
30	30	40	30
3-side	3-side	3-side	3-side
1700 mm/13L/200bar	1700 mm/13L/200bar	1700 mm/13L/200bar	1830 mm/15L/200bar
67,6/49,7	57,2/42	72,8/53,5	67,6/49,7
50/46	50/46	50/46	50/45

T663/3

13660

T663/4

14000

Loading case with universal system of opening walls

Drawbar towing hitch: rotary with fixed Ø50 towing eye

Drawbar support: hydraulic supporting leg (scissor)

Braking system: double pneumatic line Parking brake with manual crank

Coiled connecting cable lighting syst Hydraulic tipping system with cut-off valve Telescopic servo-motor of 3-side tipping system

Support service of the tool box Sidewalls fastening string Rear grain hatch with a lever in a rear wall

reinforced floor panel

12 V lighting system with rear electric socket Rear lamps with protective grating

Tipping frame colour: red RAL 3000 PRONAR

Side walls painting colour: green RAL 6010 PRONAR Ladder and steps facilitating the access to the loading case

Minimum tractor power requirement [hp/kW]

Tipping angle (backwards/sides) [°]

TECHNICAL DATA OF STANDARD EQUIPMENT

Allowable total weight [kg]

Loading box inside length [mm] Loading box inside width [mm]

Dimensions length/width/height [mm]

Platform height, measured from the ground [mm]

Load capacity [kg]

Empty weight [kg]

Load volume [m3]

Loading space [m²]

Sidewall height [mm]

Wheel track [mm]

Hitch-ring load [kg]

Tipping systen

optimum spacing

Crank hand brake

Maximum speed [km/h]

Suspension

Tyres

Floor/wall thickness [mm]

Reinforced floor panel with central locking mechanism
Frame: rectangular with closed profiles made of high resistant steel

STANDARD FOUIPMENT

Selection of the direction of tipping by two pins that protects against incorrect handling

Tandem suspension on 4 leaf springs, wheelbase 1160mm, fixed axles equipped with drum

Sidewalls and extensions made of profile PF600mm, 70 mm from the rim, with hinges and

Trapezoidal shape of the loading case (chest expands by 50 mm in the rearward direction),

Universal fixed drawbar to connect with the lower or the upper hitch of the tractor

Telescopic cylinder (piston stroke/oil requirement/working pressure)

ADDITIONAL EQUIPMENT (OPTIONAL):

T663/1

T663/1

13290 (12000)

Axles for 40 km - Gross weight 12000kg $\hbox{3-side tipping system of the loading case with ball joints with the rear shock absorbers of}\\$

Drawbar towing hitch: towing eye Ø40 Additional sidewalls extensions made of profile PF600mm

T663/2

9700

Braking system: double line pneumatic with ALB

Lighting system with clearence lights

Operator's platform at the front wall

Grain chute

Springs facilitating opening the sides Rear manual, hitch witch shock absorption

Rear automatic hitch AH 31H-4

Rear automatic hitch AH 38H-4

Rear couplings for second trailer Spare wheel hanger*

Tvres 385/55 R22.5

Tyres 385/55 R22,5 Regenerated Tyres 500/50-17

Spare wheel (separately) 15.0/70-18

Spare wheel (separately) 500/50-17 Spare wheel (separately) 385/55 R22.

Spare wheel (separately) 385/55 R22.5 RE

ide underrun protections

Additional plastic front mudgards - the wheels of a wheelset tandem

Warning triangle

Auger for unloading grain with efficiency 30 t/h** Chute over the entire width on the back of the traile

Window in the front side wall extension (340x710) with grating and PLEXI

Rolled canvas cover with frame and folded central and sides supporting pipes

Window in the front extension and in the front of the middle side wall extension (340x710) with grating and PLEXI

Set of wall hangers to maintain the walls in a partially open position for bale

Shock absorber for falling potatoes - two sets of rubber belts, 1,8m of length each, mounted

on the sidewall extensions (side extensions necessaary Non standard colours according to RAL CALSSIC codes

not available with operator's platform

" mounted at the back wall, two-segment, folding, mechanical winch, hydraulic-powered auger, the demand for oil 30 L / min

*** for agricultural roads only

Additional plastic front mudgards - the wheels of a wheelset tander



34 >>>>>> Technique for nature 35 >>>>>> pronar.pl

Maximum gross weight depends on the equipment *Load capacity depends on the design and equipment

^{**} Empty weight depends on equipment different than standard



PRONAR T663/1, T663/2, T663/3, T663/4



STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T663/2

Loading case with universal system of opening walls 3-side tipping system of the loading case with ball joints with the rear shock absorbers of optimum spacing Selection of the direction of tipping by two pins that protects against incorrect

nandling Tandem suspension on 4 parabolic springs, wheelbase 1030mm, fixed axles equipped with drum brakes

Reinforced floor panel with central locking mechanism
Type of chassis: retangular with closed profiles with fixed drawbar "made of high resitant steel"

Type of chassis: retangular with closed profiles with fixed drawbar "made of high resistant steel"
Universal fixed drawbar to connet with the lower or the upper hitch of the tractor Drawbar towing hitch: with fixed Ø 50 towing eye
Drawbar support: hydraulic scissor-type with movable leg and security hydraulic lock
Braking system: double line pneumatic
Crank fiand brake
12 Vlighting system with rear electric socket
Rear lamps with protective shades
Coiled connecting cable lighting system
Hydraulic tipping system with Cut-off valve
Tipping servo-motor of 3-side tipping system
Sidewalls and extensions made of profile PF500mm+500mm, 70 mm from the rim, with forged hinges and locks
Closed spaces of the sidewalls and extensions protected by laser weld
Sidewalls fastening stering

Closed spaces of the slotewalls and extensions protected by laser weld Sidewalls fastening string Rear grain hatch with a lever in a rear wall Rear mudguards Wheel chocks + galvanized racks (2 pcs) Double-component chemically hardened painting materials, UV-resistant Tipping frame colour: red RAL 3000 PRONAR Side walls painting colour: green RAL 6010 PRONAR Ladder and steps facilitating the access to the loading case Trapezoid shape of the loading case (chest expands by 50 mm in the rearward direction)

Drawbar hitch: fixed with towing eye Ø40 mm
Silo-type sidewalls extensions with loading case 16m³, sidewall 1600mm, hydraulically driven
tailgate 1900mm (only on 400/60 - 15,5 Tyres)
Additional extensions made of profile PF500mm
Braking system: double line pneumatic with ALB
Over-run brakes (Permissible load capacity: 8000kg, 40 km/h version)
Braking system: pneumatic brake for 40 km/h (Gross weight=10000kg)
Clearence lights
Operator's platform
Grain chute
Grain chute
Grain chute
Grain chute
Braking system: Spening the sides
Rear manual hitch with shock absorption
Rear couplings for second trailer
Base for wheel axles 400/60-15.5 kpl.
Spare wheel hange;

Base for wheel axles 400/60-15.5 kpl.
Spare wheel hanger
Tyres 12,5/80 - 15.3
Tyres 14,0/65 - 16
Tyres 14,0/65 - 16
Tyres 14,0/65 - 16
Tyres 40,0/60-15.5 (Base for wheel axles)
Spare wheel (separately) 11.5/80-15.3
Spare wheel (separately) 12.5/80-15.3
Spare wheel (separately) 14,0/65-16
Spare wheel (separately) 14,0/65-16
Spare wheel (separately) 400/60-15.5
Warning triangle
Auger for unloading grain with efficiency 30 t/h**
Rear chute along the entire width of the trailer
Rolled cover with frame
Drawbar support: mechanical telescopic with fixed leg
Set of wall hangers to maintain the walls in a partially open position for bale transportation
Shock absorber for falling potatoes - two sets of rubber helts 1.9m of locates

transportation """.
Shock absorber for falling potatoes - two sets of rubber belts, 1.8m of length each, mounted on the sidewall extensions (trailer must be equipped with extensions). Non standard colours according to RAL CALSSIC codes "Not available with operator's platform mounted on the redr wall, two-segmented, folded, with mechanical winch, auger driven hydraulically, oil requirement 30L/min

** for agricultural roads only

T663/3

Loading case with universal system of opening walls
3-side tipping system of the loading case with ball joints with the rear shock
absorbers of optimum spacing
Selection of the direction of tipping by two pins protecting against incorrect handling
Trapezoid shape of the loading body (chest expands by 50 mm in the rearward
direction)

direction) Reinforced floor panel with central locking mechanism Type of chassis: rectangular with closed profiles with fixed drawbar made of high resistant steel

Tandem suspension on 4 leaf springs, wheelbase 1160mm, fixed axles equipped with

Universal fixed drawbar to connet with the lower or the upper hitch of the tractor

Äxles 60 km/h
Universal fixed drawbar to connet with the lower or the upper hitch of the tractor
Drawbar towing hitch: rotary with Ø50 towing eye
Drawbar support: hydraulic scissor-type with movable leg and security hydraulic lock
Braking system. double pneumatic line
Crank fiand brake
12 V lighting system with rear electric socket
Rear lamps with protective grating
Coiled connecting cable lighting system
Hydraulic tipping system with cut-off valve
Tipping servo-motor of 3-side tipping system
Service support of the Tool box
Sidewalls and extensions made of profile PF600mm+600mm, 70 mm from the rim,
with forged hinges and locks
Closed spaces of the sidewalls and extensions protected by laser weld
Sidewalls fastening string
Rear grain hatch with a lever in a rear wall
Rear mudguards
Wheel chocks + galvanized racks (2 pcs)
Double-component chemically hardened painting materials, UV-resistant
Tipping frame coulou: red RAL 3000 PRONAR
Sidewalls painting colour: green RAL 6010 PRONAR
Ladder and steps facilitating the access to the loading case

Drawbar hitch: fixed with towing eye Ø40 mm
Additional extensions made of profile PF600mm
Silo-type sidewalls extensions with loading case 16m 3, sidewall 1600mm, hydraulically driven tailgate 1900mm (only with 400/60-15,5 tires)
Braking system: double line pneumatic with ALB
Clearance lights
Operator's platform
Grain chure

Operator Spiratoring
Grain chute
Springs facilitating opening the sides
Rear couplings for second trailer
Rear manual hitch
Rear automatic hitch AH 31H-4

Rear automatic hitch AH 31H-4
Rear automatic hitch AH 38H-4
Tyres 385/65R22,5
Tyres 500/45-22,5
Tyres 500/45-22,5
Spare wheel (separetly) 385/65 R22.5 (15 R22.5)
Spare wheel (separetly) 385/65 R22.5 (15 R22.5) RE
Spare wheel (separetly) 500/45-22,5
Side underrun protections
Additional plastic front mudgards - the wheels of a wheelset tandem
Warning triangle

Warning triangle
Auger for unloading grain with efficiency 30 t/h*
Chute over the entire width on the back of the trailer
Window in the front side wall extension (340x710) with grating and PLEXI
Window in the front extension and in the front of the middle side wall extension (340x710) with grating and PLEXI
Window in the Front extension and in the front of the middle side wall extension (340x710) with grating and PLEXI

Drawbar hitch: fixed with towing eye Ø40 mm Silo-type sidewalls extensions with loading case 16m 3, sidewall 1600mm, hydraulically driven tailgate 1900mm

grating and PLEXI
Rolled cover with frame and side supporting pipes
Drawbar support: mechanical telescopic with fixed leg
Set of wall supports to maintain the walls in a partially open position for bale
transportation
Shock absorber for falling potatoes - two sets of rubber belts, 1.8m of length each, mounted on
the sidewall extensions (side extensions necessaary)
Non standard colours according to RAL CALSSIC codes

Silo - type sidewalls extensions with loading case 16m 3, sidewall 1600 tailgate 1900mm
Additional extensions made of profile PF600mm
Braking system: double line pneumatic with ALB
Clearence lights
Operator's platform
Rear grain chute
Springs facilitating opening the sides
Rear couplings for second trailer
Rear manual hitch with shock absorption
Rear automatic hitch AH 31H-4
Rear automatic hitch AH 38H-4
Spare wheel hanger
Tyres 385/55 R22.5
Tyres 385/55 R22.5 RE
Tyres 500/50-17
Spare wheel (separetly) 15.0/70-18
Spare wheel (separetly) 385/55 R22.5 RE
Spare wheel (separetly) 385/55 R22.5 RE
Spare wheel (separetly) 380/55 R25.5 RE
Spare wheel (separetly) 500/50-17
Side underrun protections
Additional plastic front mudgards - the wheels of a wheelset tandem Warning triangle
Auger for unloading grain with efficiency 30 t/h*

Warning triangle
Auger for unloading grain with efficiency 30 t/h*
Chute over the entire width on the back of the trailer

T663/4

Loading case with universal system of opening walls 3-side tipping system of the loading case with ball joints with the rear shock absorbers of optimum spacing Selection of the direction of tipping by two pins that protects against incorrect

nandling Reinforced floor panel with central locking mechanism Trapezoid shape of the loading body (chest expands by 50 mm in the rearward

direction)
Type of chassis: Rectangular with closed profiles with fixed drawbar
Universal fixed drawbar to connet with the lower or the upper hitch of the tractor
Tandem suspension on 4 parabolic springs, wheelbase 1170mm, fixed axles equipped
with drum brakes
Drawbar towing hitch: with rotary Ø50 towing eye
Drawbar support: hydraulic scissor-type with movable leg and security hydraulic lock
Braking system: double line pneumatic
Crank hand brake

Rear mudguards

Crank fiand brake
12 V lighting system with rear electric socket
Rear lamps with protective grating
Coiled connecting cable lighting system
Tipping system with cut-off valve
Tipping servo-motor of 3-side tipping system
Sidewalls and extensions made of profile PF600mm+600mm, 70 mm from the rim, with forged hinges and locks
Service support of the Tool box
Closed spaces, walls protected by laser weld
Sidewalls fastening string
Rear grain hatch with a lever in a rear wall
Page mediument

Window in the front side wall extension (340x710) with grating and PLEXI Window in the front extension and in the front of the middle side wall extension (340x710) with Wheel chocks + galvanized racks (2 pcs) Double-component chemically hardened painting materials, UV-resistant Chassis color red RAL 3000 PRONAR Sidewalls color green RAL 6010 PRONAR Ladder and steps facilitating the access to the loading case Set of wall supports to maintain the walls in a partially open position for bale transportation**

transportation**
Shock absorber for falling potatoes - two sets of rubber belts, 1,8m of length each, mounted on the sidewall extensions (side extensions necessaary)
Non standard colours according to RAL CALSSIC codes
*mounted on the back wall, two-segment, folding, mechanical winch, hydraulic-powered auger, the demand for oil 30 L / min
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TANDEM AXLE TRAILERS

PRONAR T683, T683U, T683P, T683H



Trailer PRONAR T683 is an excellent solution, perfectly suited for uneven and unstable terrain. This is achieved by using the leaf suspension of the tandem type with two single strong axles and amortized rigid drawbar. Suspension element have been selected so as to make maneuvering with the trailer easy and ensure their high stability. Permissible total weight of 20 tones is the size at which are included in the optimal way both economic aspects (price of the trailer and its low costs of ownership) and utility (optimal load capacity and cargo capacity, functionality, reliability

Used on the trailer **PRONAR T683U** replaceable micro-rubber seals, fixed on the upper, side and the back frame makes it ideal for the transport of the bulk products of small grain size, such as for example rape. Therefore, rubber selas fill the space between sidewalls and the floor the central pillars and the rear connections between the walls and extensions are fitted with EPDM seals, which addictionally increase the tightness of the trailer. Suspension element have been selected so as to make maneuvering with the trailer easy and ensure their high stability. Permissible total weight of 20 tones is the size at which are included in the optimal way both economic aspects (price of the trailer and its low costs of ownership) and utility (optimal load capacity and cargo capacity, functionality, reliability and durability).

Trailer PRONAR T683P is based on chassis of the trailer PRONAR T683. In addition to the basic advantages of the tandem trailer T683, the walls of this one are made of special durable waterproof plywood, embedded in special aluminium profiles, which are also used to embed the rubber seals to ensure the highest degree of integrity. The use of this type of materials reduces the risk of damage of the transported argicultural products because of the low temperature. The loading and unloading of pallets is possible thanks to the portal doors opened like gates. Such a solution makes it easy for loading with forklift without the danger of damaging the sides of the trailer.

Trailer PRONAR T683H is a version of the trailer T683 with hydraulic side wall without a central pillar, which gives a free access to the cargo area. It is very convenient and practical solution for the transport of agricultural products on pallets. The left side wall, as unitary profiled, is lifted and bolted hydraulically (protection system), which prevents the opening and loss of the carriage by unexpected leak of the system.

Trailer PRONAR T683 is an excellent solution, perfectly suited for uneven and unstable terrain. This is achieved by using the leaf suspension of the tandem type with two single strong axles and amortized rigid drawbar. Suspension element have been selected so as to make maneuvering with the trailer easy and ensure their high stability. Permissible total weight of 20 tones is the size at which are included in the optimal way both economic aspects (price of the trailer and its low costs of ownership) and utility (optimal load capacity and cargo capacity, functionality, reliability and durability).







Three side tipping systen

36 >>>>>> Technique for nature 37 >>>>>> pronar.pl

TANDEM AXLE TRAILERS PRONAR T683, T683U, T683P, T683H







Rolled canvas cover with belts Replaceable rubber seals provide perfect seal (T683U)

Loading case with universal system of walls opening (T683, T683U)

TECHNICAL DATA OF STANDARD EQUIPMENT	T683	T683U	T683P	T683H
Permissible total weight [kg]	20000*	20000*	20000*	20000*
Load capacity [kg]	15300**	15230**	15360**	15180**
Empty weight [kg]	4700	4770	4640	4820
Load volume [m³]	17,2	17,3	17,3	20,3
Loading space [m²]	12,3	12,3	12,3	12,1
Loading case inside length [mm]	5100	5100	5100	5020
Loading case inside width [mm]	2420***	2420***	2420***	2420***
Dimensions length/width/height [mm]	6800/2550/3100	6800/2550/2790	6800/2550/2790	7270/2550/3070
Sidewall height [mm]	800+600	800+600	800+600	800+900
Floor/wall thickness [mm]	5/2,5	5/2,5	5/2,5	5/2,5
Platform height, measured from the ground [mm]	1350	1350	1350	1350
Wheel track [mm]	1960	1960	1960	1960
Suspension	Parabolic springs	Parabolic springs	Parabolic springs	Parabolic springs
Hitch-ring load [kg]	2000	2000	2000	2000
Tyres	385/65 R22,5 RE	385/65 R22,5 RE	385/65 R22,5 RE	385/65 R22,5 RE
Maximum speed [km/h]	40	40	40	40
Tipping system	3-side	3-side	3-side	3-side
Telescopic cylinder (piston stroke/oil requirement/working pressure)	1980 mm/18L/200bar	1980 mm/18L/200bar	1980 mm/18L/200bar	1980 mm/18L/200bar
Minimum tractor power requirement [hp/kW]	104/76,4	104/76,4	104/76,4	104/76,4
Tipping angle (backwards/sides) [°]	50/46	50/46	50/46	47/47

depends on the road regulations in each countru



38 >>>>>> Technique for nature

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T683

Loading case with universal system of opening walls Drawbar towing hitch: fixed with towing eye Ø40mm acc, to DIN 11026 to connect with upper hitch of the tractor Drawbar towing hitch: fixed ball-type K80mm Extensions made of profile PF600mm 3-side tipping system of the loading case with ball joints with the rear shock absorbers of optimum spacing Sidewalls extensions made of profile PF800mm instead of standard sidewall extensions PF600mm Front sidewall made of 600mm perforated steel with 10 mm square wholes Selection of the direction of tipping by two pins that protects

against incorrect handling Front sidewall made of 800mm perforated steel with 10 mm square wholes

Loading case suitable for EUROPALLET transport Non shared sidewalls and on extension (without the post side)

Reinforced floor panel with central locking mechanism

The springs supporting opening of the side walls Braking system: double line pneumatic with ALB Frame welded using closed rectangular profiles made of S355

Sidewalls and extensions made of profile PF800mm+600mm. 60 mm from the rim, with forged hinges and locks

Tandem suspension on 4 parabolic springs, wheelbase 1360mm,

fixed axles equipped with drum brakes 406x120 Axles 60km/h

Drawbar support: hydraulic scissor-type with movable leg and security hydraulic lock

Universal fixed drawbar to connet with the lower or the upper

hitch of the tractor

Drawbar towing hitch: with rotaryØ50 towing eye Braking system: double line pneumatic with coupling for the

second trailer

Crank hand brake Rear mudguards

Ladder and steps facilitating the access to the loading case

12 V lighting system with rear electric socket, LED lights Coiled connecting cable lighting system

Hydraulic tipping system with cut-off valve Tipping servo-motor of 3-side tipping system Sidewalls shared with central pillar Service support of teh Tool box

Closed spaces, walls protected by laser weld Sidewalls fastening string

Rear grain hatch with a lever in a rear wall

Foldable rear humner Folding beam lighting with grilles protecting the lamp from

Handle with support hydraulic hoses for fittings of plug to the

tractor Wheel chocks + galvanized racks (2 pcs)

Double-component chemically hardened painting materials,

UV-resistant

Chassis color red RAL 3000 PRONAR

Sidewalls color green RAL 6010 PRONAR

Braking system: hydraulic with electrical safety valve and regulator of braking forces Combined braking system (double line pneumatic + hydraulic with electric hydraulic safety valve and regulator of braking

Operator's platform

Rolled cover with frame with demountable central pipe and lateral supporting pipes

Rear grain chute

Rear automatic hitch UNIMAR Rear automatic hitch RO*400A5100

Side underrun protection Tyres 385/65R22,5

Tyres 425/65R22,5 Tyres 445/65R22,5

Tyres 550/60-22,5 Tyres 500/60R22,5

vres 550/45 R22,5

Tyres 560/60 R22,5

Tyres 560/45 R22,5 Spare wheel (separately) 385/65 R22.5

Spare wheel (separately) 385/65 R22.5 RE Spare wheel (separately) 425/65 R22.5

Spare wheel (separately) 445/65 R22.5 Spare wheel (separately) 550/60-22.5

Spare wheel (separately) 550/45 R22.5 Spare wheel (separately) 500/60R22,5

Spare wheel (separately) 560/60 R22.5 Spare wheel (separately) 560/45 R22,5

Warning triangle
Auger for unloading grain with efficiency 30 t/h*

Chute over the entire width on the back of the trailer Demountable left or right chute along the entire length of the loading case

Demountable left and right chute along the entire length of the loading case
Window in the front side wall extension (340x710) with grating and PLEXI
Window in the front extension (340x710) and in the front of the middle side wall extension (340x710) with grating and PLEXI
Hydraulic support of unlocking side walls on the left or right side

Hydraulic support of unlocking side walls on the left and right side Rear folded support, EC homologated

Set of wall supports to maintain the walls in a partially open position for bale transportation****

Shock absorber for falling potatoes - two sets of rubber belts, 2,3m of length each, mounted on the sidewall extensions (side

extensions necessaary)

Non standard colours according to RAL CALSSIC codes

****mounted on the back wall, two-segment, folding, mechanical winch, hydraulic-powered auger, the demand for oil 30 L / min ***** for agricultural roads only

Loading box with universal system of opening walls Platform equipped with a special sealing system Replaceable rubber seals, placed in slots at the floor plate, with three

sides of the floor, ensuring the tightness of the trailer (especially useful when transporting of rape) and removable adhesive EPDM gaskets for other routes wall, turn and floor plate. Reinforced floor panel with Central locking mechanism

Width of container suitable for EUROPALET transport Type of chassis Rectangular with closed profiles

Drawbar support hydraulic supporting leg (scissor)

Drawbar support hydraulic supporting leg (scissor) Axles on 60 km/h

Universal rigid drawbar to connect to the lower or upper hitch of the

tractor, amortized with the rubber springs Drawbar towing hitch:rotary with towing eye 50 mm
Braking system single or double pneumatic or hydraulic line

Crank handbrake

Lighting system 12 V with rear electrical socket Coiled connecting cable lighting system Tipping system with cut-off valve

Telescopic servo-motor of 3-side tipping system The side walls shared with central pillar

Sidewalls and extensions made of profile PF600 mm+600 mm, 70 mm from the rim, with hinges and locks

Closed spaces, walls protected by laser weld Convertable chute grain, locking in the rear wall

Handle with hanger hydraulic hoses for fittings of plug to the tractor Wheel chocks + racks (2 pcs) Chemically hardened painting materials, UV-resistant

Chassis color red RAL 3000 PRONAR Sidewalls color green RAL 6010 PRONAR

Rear mudguards Ladder and steps facilitating the access to the loading box Side marker lights

Rear lamps with protective grating The rear cover, EC type-approval, folding Drawbar hitch: fixed with towing eye Ø40mm according to DIN 11026 to connect with the upper hitch tractor hitch: fixed ball-type K80mm to connect with the spoon ball hitch of the tractor extensions made of profile PF600mm sidewalls extensions made of profile PF800mm instead of standard sidewall extensions PF600mm front extension made of 600mm perforated steel sheet with 10 mm square wholes front extension made of 800mm perforated steel sheet with 10 mm square wholes Braking system: double line pneumatic with ALB combined Braking system: double line pneumatic with ALB combined Braking system:

Combined Braking system (double line pneumatic + with electric hydraulic safety valve and regulator of braking forces)

Operator's platform
Rolled cover with frame with demountable central pipe and lateral supporting pipes

Rear grain chute

Toolbox Rear automatic hitchUNIMAR Rear automatic hitch RO*400A5100

Side underrun protection Tyres 385/65R22,5 Tyres 425/65R22,5

Tyres 445/65R22,5 Tyres 550/60-22,5 Tyres 500/60R22,5

Tyres 550/45 R22,5 Tyres 560/60 R22,5 Tyres 560/45 R22,5

Spare wheel (separately) 385/65 R22.5 Spare wheel (separately) 385/65 R22.5 RE Spare wheel (separately) 425/65R22.5

Spare wheel (separately) 445/65R22.5 Spare wheel (separately) 550/60-22,5 Spare wheel (separately) 500/60R22.5

Spare wheel (separately) 550/45 R22.5 Spare wheel (separately) 560/60 R22.5 Spare wheel (separately) 560/45 R22.5

Warning triangle

Auger for unloading grain with efficiency 30 t/h***

Chute over the entire width on the back of the trailer

Demountable left or right chute along the entire length of the loading case

Demountable left and right chute along the entire length of the loading case

Window in the front side wall extension (340x710) with grating and PLEXI

Window in the front extension and in the middle front side wall extension (340x710) with grating and PLEXI

Window in the front extension and line the middle front side wall extension (340x710) with grating and PLEXI

Hydraulic

support of unlocking side walls on the left or right side Hydraulic support of unlocking side walls on the left and right side Rear folded support, EC homologated

Set of wall supports to maintain the walls in a partially open position for bale transportation****
Shock absorber for falling potatoes - two sets of rubber belts, 2,3m of length each, mounted on the sidewall extensions (side extensions necessaary)

extensions necessary)

Non standard colours according to RAL CALSSIC codes

""" mounted on the back wall, two-segment, folding, mechanical winch, hydraulic-powered auger, the demand for oil 30 L / min

""" for agricultural roads only

39 >>>>>> pronar.pl

width of the loading case suitable for EUROPALET transport

PRONAR T683, T683U, T683P, T683H

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

Loading case with universal system of opening walls

3-side tipping system of the loading case with ball joints with the rear shock absorbers of optimum spacing

Selection of the direction of tipping by two pins that protects against incorrect

Reinforced floor panel with central locking mechanism

Width of the loading case suitable for EUROPALET transport

Sidewalls made of waterproof plywood on both sides with aluminum edges, rubber

Frame welded using closed rectangular profiles made of S355 steel
Type of chassis: Rectangular with closed profiles
The walls of plywood on both sides foiled gr. 18 mm, with a rim made from aluminum
profiles with bigger and lecker. profiles, with hinges and locks

Left sidewall with central pillars, not divided, 1540mm height, tilt and opening system Right sidewall with central pillars, not divided, 1540mm height, tilt - system Rear wall, 1540mm height, not divided, 1540mm height, tilt system Ladder and steps facilitating the access to the loading case

Rear grain hatch with a lever in a rear wall

Tandem suspension on 4 parabolic springs, wheelbase 1360mm, fixed axles equipped with drum brakes 406x120

Axles for 60 km/h

Drawbar support: hydraulic supporting leg (scissor-type)
Universal fixed drawbar to connet with the lower or the upper hitch of the tractor

Drawbar towing hitch: with rotary Ø50 towing eye Axles on 60 km/h

Braking system: double line pneumatic with connections to a second trailer

Crank hand brake 12 V lighting system with rear electric socket, LED lights Coiled connecting cable lighting system

Rear lamps with protective grating
Tipping system with cut-off valve with wide ropes
Tipping servo-motor of 3-side tipping system

Wheel chocks + galvanized racks (2 pcs)

Loading case support

Rear plastic mudguards Foldable rear protection

Double-component chemically hardened painting materials, UV-resistant Tipping frame colour: red RAL 3000 PRONAR

The colors of the walls - plywood foiled - dark brown

The rear cover, EC type-approval, folding

Rigid drawbar hitch eye Ø40 mm according to DIN 11026 to connect with the upper hitch

Drawbar hitch: rigid ball type K80 mm to connect with the ball hitch of the tractor

Braking system double line pneumatic with ALB Operator's platform

Rolled tarnaulin with frame

Grain chute spout

Three baffles grain chute, locked in the rear wall Rear automatic hitch UNIMAR

Rear automatic hitch RO*400A5100

Rear couplings for second trailer

Side under-ride guards Tyres 385/65R22,5

Tyres 425/65R22 5 Tyres 445/65R22,5

T683P

Tyres 445/65R22,5 (18R22,5) Regenerated

yres 500/60R22,5

Tyres 550/60-22.5

Tyres 550/45 R22,5

Tyres 560/60 R22 9 Tyres 560/45 R22,5

Spare wheel (separately) 385/65 R22.5

Spare wheel (separately) 385/65 R22.5 Regenerated Spare wheel (separately) 425/65 R22.5

Spare wheel (separately) 445/65 R22.5

Spare wheel (separately) 445/65 R22 5 Regenerated

Spare wheel (separately) 500/60R22,5

Spare wheel (separately) 550/60-22.5 Spare wheel (separately) 550/45 R22.5

Spare wheel (separately) 560/60 R22.5

Spare wheel (separately)560/45 R22,5

Warning triangle

A grain unloading auger with 30 t/h output

Chute over the entire width on the back of the trailer

Hydraulic support of unlocking side walls on the left or right side Hydraulic support of unlocking side walls on the left and right side

Shock absorber for falling potatoes – two sets of rubber belts, 2,3m of length each

""mounted on the back wall, two-segment, folding, mechanical winch, hydraulic-powered

auger, the demand for oil 30 L / min









Rear grain chute with locking system

Hydraulic locking and lifting system of the sidewall (T683H)

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T683H

Loading case with universal system of sidewalls opening 3-side tipping system of the loading case with ball joints with the rear shock absorbers of optimum spacing Selection of the direction of tipping by two pins that protects against incorrect handling Reinforced floor panel with central locking mechanism width of the loading case suitable for EUROPALET transport Replaceable rubber seals, placed in floor sockets to ensure the tightness of the trailer (particularly useful for rape transportation) and exchangeable EPDM gaskets glued on other connections with sidewalls, extensions and floor panel Sidewalls and extensions made of profile PF800mm+900mm, 60 mm from the rim, with forged hinges and locks

Greed hinges and locks
Tipping frame welded using closed rectangular profiles made of \$355 steel
Tandem suspension on 4 parabolic springs, wheelbase 1360mm, fixed axles equipped with drum brakes 406x120 Axles 60 km

with drum brakes 4048/20
Axles 60 km
Drawbar support: hydraulic supporting leg (scissor)
Universal fixed drawbar to connet with the lower or the upper hitch of the tractor
Drawbar towing hitch: with rotary Ø50 towing eye
Braking system: double line pneumatic with coupling to a second trailer
Crank hand brake
12 V lighting system with rear electric socket and LED lights
Rear lamps with protective grating
Coiled connecting cable lighting system
Tipping system with cut-off valve
Tipping system with cut-off valve
Tipping servo-motor of 3-side tipping system
The side walls shared with central pillar
Walls with the rubber seal
Closed spaces, walls protected by laser weld
Left wall, 1700mm high, winched hydraulically
Right wall, bottom 800mm-tilt system
Rear grain hatch with a lever in a rear wall

Rear Wall, bottom Boumm-Ittl system
Rear grain hatch with a lever in a rear wall
Wheel chocks + racks (2 pcs)
Double-component chemically hardened painting materials, UV-resistant
Tipping frame colour: red RAL 3000 PRONAR
Side walls painting colour: green RAL 6010 PRONAR
Service support of the case

Ladder and steps facilitating the access to the loading case

Folding beam lighting with grilles protecting the lamp from damage
The rear cover, EC type-approval, folding

Drawbar with rubber shock absorber to connect with upper or lower hitch to a tractors

Drawbar with rubber snock absorber to connect with upper or lower of Drawbar hitch: fixed with towing eye Ø40 mm
Drawbar towing hitch: fixed ball-type K80mm (2 tones)
Braking system: double line pneumatic with ALB
500mm extension for the green forage on the right side of the trailer

Operator's platform Rolled canvas cover with frame

Rear grain chute

Rear automatic hitch UNIMAR

Rear automatic hitch RO*400A5100

Rear hydraulic and brakes couplings for second trailer Side underrun protections Tyres 385/65R22,5

Tyres 425/65R22,5 Tyres 445/65R22,5

Tyres 550/60-22,5 Tyres 550/45 R22,5

Tyres 560/60 R22,5 Tyres 500/60R22,5

Tyres 560/45 R22,5 Spare wheel (Separately) 385/65 R22.5

Spare wheel (Separately) 385/65 R22.5 RE Spare wheel (Separately) 425/65 R22.5

Spare wheel (Separately) 445/65 R22.5 Spare wheel (Separately) 550/60-22.5 Spare wheel (Separately) 550/45 R22.5 Spare wheel (Separately) 560/60 R22.5

Spare wheel (Separately) 500/60R22,5 Spare wheel (Separately) 560/45 R22,5

Warning triangle
Auger for unloading grain with efficiency 30 t/h****

Non standard colours according to RAL CALSSIC codes **** mounted on the back wall, two-segment, folding, mechanical winch, hydraulic-powered auger, the demand for oil 30 L / min



41 >>>>>> **40** >>>>>> Technique for nature pronar.pl

PRONAR trailers **PT510**, **PT512** - excellent equipment for irregular surface areas is well appreciate in agriculture as well as in other industries. This pallet tandem type trailers **PT510**, **PT512** are equipped with resistant chassis frame made of rectangular closed profiles, three side tipping system, reinforced drawbar, hydraulic supporting leg, parabolic springs suspension and solid radial Tyres. The maximum Allowable speed is 40km/h. The buyer has a choice between pneumatic and hydraulic breaking system. The standard option consists of three way tipping system with the cut off (which activates while tipping to the sides) and pneumatic cylinder. For production we use only high quality materials such as chemically hardened paint components.

PRONAR PT512 PRONAR PT510

TECHNICAL DATA OF STANDARD EQUIPMENT	PT510	PT512
Allowable total weight [kg]	14200	16260
Load capacity [kg]	10150	12000
Empty weight [kg]	4050	4260
Load volume [m³]	13,2	15,4
Loading space [m²]	11	11
Loading case inside length [mm]	4545	4545
Loading case inside width [mm]	2420*	2420*
Dimensions length/width/height [mm]	6139/2550/2452	6139/2550/2652
Sidewall height [mm]	600+600	600+800
Floor/wall thickness [mm]	5/2,5	5/2,5
Platform height, measured from the ground [mm]	1250	1252
Wheel track [mm]	1900	1900
Suspension	parabolic springs	parabolic springs
Hitch-ring load [kg]	1700	1950
Tyres	385/65 R22,5 (15R22,5) RE	385/65 R22,5 (15R22,5) RE
Maximum speed [km/h]	40	40
Tipping system	3-side	3-side
Telescopic cylinder (piston stroke/oil requirement/working pressure)	1700 mm/15L/200bar	1700 mm/16L/200bar
Minimum tractor power requirement [KM/kW]	74/54,4	84/61,7
Tipping angle (backwards/sides) [°]	50/46	50/46

* width of container suitable for EUROPALET transport





STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

PT510

Loading case with universal system of opening walls 3-side tipping system of the loading case with ball joints with the rear shock absorbers 3-side tipping system of the loading case with ball joints with the rear shock absorbers of optimum spacing Selection of the direction of tipping by two pins that protects against incorrect handling Loading case width suitable for EUROPALET transport with reinforced floor Reinforced floor panel with central locking mechanism Tipping type: rectangular with closed profiles with fixed drawbar Sidewalls and extensions made of profile PF600mm+600mm, 60 mm from the rim, stable rear pillars with forged hinges and locks Closed spaces, walls protected by laser weld Side walls reinforcement, strips tensioned Side strips tensioned, reinforcement raiser Ladder and stens facilitating the access to the loading case

Side strips tensioned, reinforcement raiser
Ladder and steps facilitating the access to the loading case
Tandem suspension on 4 parabolic springs, wheelbase 1325mm, fixed axles equipped
with drum brakes 400x80
Axles 60 km/h
Universal fixed drawbar to connet with the lower or the upper hitch of the tractor
Drawbar towing hitch: with rotary Ø50 towing eye
Drawbar support: hydraulic supporting leg (scissor)
Brawbar support: hydraulic supporting leg (scissor)
Braking system: double-line pneumatic brake
Crank hand brake
12 V lighting system with rear electric socket, LED lights with airtight connection with
clearance light
Colled connecting cable lighting system
Rear lamps with protective grating

Coiled connecting cable lighting system
Rear lamps with protective grating
Rear couplings for second trailer
Rear grain hatch with a lever in a rear wall
Rear mudguards
Hydraulic tipping system with automatic cut-off valve
Tipping servo-motor of 3-side tipping system
Wheel chocks + galvanized racks (2 pcs)
Support service of the load carrying body
Double-component chemically hardened painting materials, UV-resistant
Tipping frame colour: red RAL 3000 PRONAR
Side walls painting rolour green RAL 6010 PRONAR

Side walls painting colour: green RAL 6010 PRONAR

Drawbar hitch: fixed with towing eye 40 mm Type of drawbar hitch: ball type K80 mm Sidewall extensions made of profile PF 600mm, rim 60 mm Braking system: double line pneumatic with ALB Rolled cover with frame

Operator's platform Rear grain chute Front mudguards

Side underrun protection Springs facilitating opening the side walls Rear manual hitch

Springs facilitating opening the Side walls
Rear manual hitch
Rear automatic hitch
Tyres 385/65 R22.5
Tyres 385/55 R22.5 Regenerated
Tyres 385/55 R22.5
Tyres 500/45-22.5
Tyres 600/45-22.5
Tyre

Rolled cover with frame with demountable central pipe and lateral supporting pipes

Two grain chute sprouts with locking at the rear sidewall
Three grain chute sprouts with locking at the rear sidewall
Three grain chute sprouts with locking at the rear sidewall
Set of wall supports to maintain the walls in a partially open position for bale transportation***
Shock absorber for falling potatoes - two sets of rubber belts, 1,8 m of length each attached to
extractions.

Shock absolved in Tailing potatoes - two sects of Tubber beits, 1,8 in or length each attached to extensions

Non standard colours according to RAL CALSSIC codes

""mounted on the back wall, two-segment, folding, mechanical winch, hydraulic-powered auger, the demand for oil 30 L/ min

""for agricultural roads only

PT512

Loading case with universal system of opening walls 3-side tipping system of the loading case with ball joints with the rear shock absorbers of optimizing caseing.

of optimum spacing Width of the loading case suitable for EUROPALET transport

Reinforced floor panel with central locking mechanism ' Sidewalls and extensions made of profile PF600mm+800mm, 60 mm from the rim, with

Side walls and extensions indeed in prome Pro-hinges and locks Closed spaces, walls protected by laser weld Side walls reinforcement, strips tensioned Side strips tensioned, reinforcement raiser Rear grain hatch with a lever in a rear wall

Rear grain hatch with a lever in a rear wall
Rear mudguards
Wheel chocks + galvanized racks (2 pcs)
Support service the load carrying body
Ladder and steps facilitating the access to the loading case
Tipping type: rectangular with closed profiles with fixed drawbar
Tandem suspension on 4 parabolic springs, wheelbase 1325mm, fixed axles equipped
with drum brakes 400x80
Universal fixed drawbar to connect with the lower or the upper hitch of the tractor
Drawbar towing hitch: rotary with towing eye Ø50mm
Drawbar support: hydraulic leg scissor-type
Braking system: double line pneumatic
Grain chute at the rear sidewall
Axles on 60 km/h'

Axles on 60 km/h* Crank hand brake

Crank hand brake
12 V lighting system with rear electric socket, LED lights
Clearance lights
Rear lamps with protective grating
Coiled connecting cable lighting system
Hydraulic tipping system with cut-off valve
Tipping servo-motor of 3-side tipping system
Rear couplings for second trailer
Support service of the load carrying body
Double-component chemically hardened painting materials, UV-resistant
Tipping frame colour: red RAL 3000 PRONAR
Side walls painting colour: green RAL 6010 PRONAR
*Permisible total weight 16000kg

Drawbar hitch: fixed with towing eye 40 mm Type of drawbar kitch: ball type K80 mm Sidewall extensions made of profile PP 600mm Raiser profile 600mm instead of 800mm extensions profile

Braking system: hydraulic

Braking system: double line pneumatic with ALB Operator's platform

mounted on the back wall, two-segment, folding, mechanical winch, hydraulic-powered auger, the

"mounted on the back wall, two-segment, demand for oil 30 L / min Rear grain chute Springs facilitating opening the side walls Front mudguards Side underrun protection Rear manual hitch MH 31H-4

Rear automatic hitch AH 31H-4 Rear automatic hitch AH 38H-4

Tyres 385/55 R22,5 Tyres 385/55 R22,5 Regenerowane Tyres 385/55 R22,5 Tyres 500/50-22,5

Tyres 500/50-22,5 Spare wheel (Separately) 385/65 R22,5 Regenerated Spare wheel (Separately) 385/65 R22,5 Spare wheel (Separately) 385/55 R22.5 Spare wheel (Separately) 385/55 R22.5 Regenerated Spare wheel (Separately) 500/50-22,5

Warning triangle
Auger for unloading grain with efficiency 30 t/h**
Demountable left or right chute along the entire length of the loading case
Demountable left and right chute along the entire length of the loading case
Window in the front side wall extension (340x710) with grating and PLEXI
Window in the front extension and in the front of the middle side wall extension (340x710) with grating and DLEXI

Window in the front extension and in the front of the middle side wall extension (340x710) with; and PLEXI
Two grain chute sprouts with locking at the rear sidewall
Three grain chute sprouts with locking at the rear sidewall
Set of wall supports to maintain the walls in a partially open position for bale transportation***
Rolled canvas cover with frame with demountable central pipe and lateral supporting pipes
Shock absorber for falling potatoes - two sets of rubber belts, 1.8 m of length each attached to
extensions.

Grain chute over the entire width on the back of the trailer Non standard colours according to RAL CALSSIC codes

** for agricultural roads only







43 >>>>>> **42** >>>>>> Technique for nature pronar.pl



PRZYCZEPA NISKOPODWOZIOWA RC3100 LOW-LOADERS RC2100, RC2100-1, RC2100-2 4

44 >>>>>> Technique for nature pronar.pl 45 >>>>>>



Trailer PRONAR RC3100 is the biggest machine of this type in PRONAR offer.

The low loader with a load capacity of 18.tons will be successfully used in at least several industries, and thanks to the wide range of available options, it will be easy to adapt it to specific work set by its user. The machine is dedicated mainly to work with tractors with a power of at least 104 HP. The design of the low loader was based on a three-axle suspension on parabolic springs. The trailer uses axles with a load of 8t on each, and its total permissible total weight is 24 tons.

When a DMC other than the standard chassis is fitted, the DMC may be increased to a maximum of 30 tonnes. The trailer was adapted to transport at a maximum speed of 40 km / h, but the option of increasing it to 60 km / h was also provided. An undoubted advantage of the machine is the use of twin wheels, which m.in. prevents them from collapsing in very boggy ground. Transport safety and comfort are enhanced by the standard automatic brake force regulator (ALB).



TECHNICAL DATA OF STANDARD EQUIPMENT	RC3100
Allowable total weight (EU): [kg]	24000
Technical allowable total weight (for tyres 215/75R 17,5) 135/133J***: [kg]	27720
Technical allowable total weight (for tyres 235/75R 17,5) 143/141J***: [kg]	30000
Technical allowable total weight (for tyres 245/75R 17,5) 136/134L***: [kg]	28440
Technical allowable total weight (for tyres 235/75R 17,5) 143/141J***: [kg]	30000
Load capacity: [kg]	18540
Empty weight: [kg]	5460
Loading space: [m²]	
Length of the straight part of the platform + enlarging*: [m²]	17,3 (+3,0)
Length of the complete platform + enlarging*: [m²]	21,3 (+3,7)
Length of the straight part of platform: [mm]	6800
Length of the complete platform: [mm]	8340
Length of ramps: [mm]	1900
Width of floor: [mm]	2540
Width of floor with enlargings**: [mm]	3000
Overall dimensions (length/width/height): [mm]	10410/2550/2500
Material of the floor:	wooden planks
Platform height, measured from the ground: [mm]	930
Number of axles:	3
Axle load: [kg]	8000
Drawbar towing hitch load: [kg]	3000
Braking system:	double line pneumatic with ALB
Suspension:	parabolic springs
Tyres:	215/75 R 17,5
Maximum speed: [km/h]	40 (60 optional)
Hydraulic drawbar support:	mechanical straight/ folded
Drawbar hitch:	ball hitch K80
Mechanically lowered ramps:	yes
Load holders:	19 (23)
Side barriers:	yes
Minimum tractor power: Km/kW	104/76,4

^{*} with folder ramps rounded







Mechanically lowered ramps

Tie down eyes for securing loads

2 Spare wheel – optional equipment

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL)

RC3100

Loading platform with wooden floor – 45 mm Braking system Mecanical suspension Mechanically lowered ramps with protection against accidental opening

Tipping support legs mounted at rear of the trailer Drawbar support: hydraulic straight, folded leg Lighting system LED Wheel chocks + racks (2 pcs)

Warning triangle Double-component chemically hardened painting materials, UV-resistant. Paintwork: orange RAL 7021 Tool box (~ 50 l)

hydraulic overrun lifting lowering system hydraulic overrun lifting lowering system with floating valve hydraulic single-wire Drawbar hitch: fixed Ø50 / fixed Ø50 / rotary Ø40

Wooden floor - 45 mm

Spare wheel: 235/75 R17,5; 245/75 R17,5; 265/70 R17,5

Double-sided floor widening + boards (pine/spruce)
Hydraulic winch

Spare wheel: 1 or 2 (for one piece) hanged at the front of the trailer

Water container (- 30 I) with soap dispense

Rear wheel mudflaps Beacon light

Bumper Bin in the front of trailer









at the permissible load of the hitch 3000 kg





PRONAR RC2100, RC2100-1, RC2100-2

PRONAR trailer RC2100 is a perfect solution for those who appreciate functionality and reliability. Low bed trailer with Allowable total weight 19 tons and it's equipped with tandem suspension. Depending on the needs braking system may be pneumatic or hydraulic.

The main purpose of this model is to use it for transport various types of agricultural machinery, tractors, excavators, wheel loaders or other type of trailers. It's possible to order hydraulic ramps which allow very fast loading and unloading of transported machines.

PRONAR trailer RC2100/1 is a longer verion of trailer RC2100 and it is a perfect choice for those who appreciate functionality and reliability. Low bed trailer with Allowable total weight 19 tons and it's equipped with tandem suspension. Depending on the needs braking system may be pneumatic or hydraulic. The main purpose of this model is to use it for transport various types of agricultural machinery, tractors, excavators, wheel loaders or other type of trailers. It's possible to order hydraulic ramps which allows for very fast loading and unloading of transported machines.

PRONAR trailer **RC2100/2** is a perfect solution for those who appreciate functionality and reliability. Low bed trailer with Allowable total weight 19 tons and it's equipped with tandem suspension and a single line hydraulic brake system. This new model is lighter and cheaper version of popular trailer **PRONAR RC2100**. The main purpose of **PRONAR RC2100/2** is to use it for transport various types of agricultural machinery, tractors, excavators, wheel loaders or other type of trailers. It's possible to order hydraulic ramps which allows for very fast loading and unloading of transported machines. In addition, you may choose also a metal insole which makes that the whole floor is flat.



TECHNICAL DATA OF STANDARD EQUIPMENT	RC2100	RC2100-1	RC2100-2
Allowable total weight [kg]	19000	19000	19000
Load capacity [kg]	14700	14500	14900
Empty weight [kg]	4300	4500	4100
Loading space of the straight part of platform + enlarging [m²]	14.0 (+ 2.7)	15,3(+3,0)	14.0
Loading space of the complete platform + enlarging [m²]	17.9 (+ 3.4)	19,2(+3,8)	17.9*
Length of the straight part of the platform [mm]	5500	6000	5500
Length of the complete platform [mm]	7020*	7520*	7020*
Length of ramps [mm]	1900	1900	1900
Width of floor: [mm]	2540	2540	2540
Width of floor with enlargings [mm]	3040**	3040**	(- **)
Overall dimensions (length/width/height) [mm]	9160/2550/2500*	9590/2550/2500*	9450/2550/2460*
Material of the floor [mm]	wooden planks 45 mm	wooden planks 45 mm	wooden planks 45 mm
Platform height, measured from the ground [mm]	935	935	930
Number of axles [pcs]	2	2	2
Axle load [kg]	8000	8000	8000
Drawbar towing hitch load [kg]	3000	3000	3000
Braking system	double line pneumatic with ALB	double line pneumatic	single line hydraulic
Suspension	parabolic springs	parabolic springs	parabolic springs
Tyres	double 215/75 R 17.5	double 215/75 R 17.5	double 215/75 R 17.5
Maximum speed [km/h]	40	40	40
Hydraulic drawbar support	straight/folded	mechanical straight/folded	mechanical straight/folded
Drawbar hitch	ball hitch K80	ball hitch K80	rotary Ø50
Mechanically lowered ramps	yes	yes	yes
Load holders [pcs]	11	11	10
Side barriers	yes	yes	yes
Minimum tractor power requirement [KM/kW]	104/76.4	104/76.4	104/76.4

with folded ramps







system to enlarge loading space



ADDITIONAL EQUIPMENT (OPTIONAL):

Loading platform with wooden floor - front horizontal part
Loading platform with steel anti-skidding floor - rear inclined part
Fastenings handles in the floor, 11 pieces
Spiral connecting cable of lighting system
Mechanically lowered ramps with protection against accidental opening
Tipping support legs mounted at rear of the trailer
Tandem suspenssion with 4 parabolic springs with fixed axles equipped in drum brakes
Drawbar type: fixed to couple with lower hitch of the tractor amortized with steel springs
Drawbar support: hydraulic straight, folded leg
Drawbar hitch: ball type K80
Braking system: double line pneumatic with automatic (ALB) braking power controller
Crank fland brake
Lighting system 12 V with airtight connection, with front and rear LED clearence lights
Rear lamps with protective grating
Side underrun protection
Wheel chocks + racks (2 pcs)

STANDARD EQUIPMENT

Wheel chocks + racks (2 pcs)
Steel case under the floor for storing broadenings
Highly resistant rectanglar chassis frame

Marning triangle
Double-component chemically hardened painting materials, UV-resistant.
Paintwork: orange RAL 2008

Axles for 60 km/h, drum brakes 300x135
Hydraulic ramps
Hydraulic ramps
Hydraulic ramps with floating control
Braking system: double line pneumatic
Braking system: double line pneumatic with ALB Knorr
Braking system: single line pneumatic with ALB – 60 km/h
Braking system: double line pneumatic with ALB – 60 km/h
Braking system: double line pneumatic with ALB – 60 km/h
Braking system: combined braking system (double line pneumatic + hydraulic)
Braking system: combined braking system (double line pneumatic + hydraulic)
Braking system: combined braking system (double line pneumatic + hydraulic with mechanical safety valve)
Braking system: combined braking system (double line pneumatic + hydraulic with mechanical safety valve)
Braking system: combined braking system (double line pneumatic + hydraulic with electric safety valve and braking power controller)
Floor: oak 45mm
Drawbar hitch: fixed Ø40 / fixed Ø50 / rotary Ø50
Double-sided floor widening + boards (pine/spruce)
Hydraulic winch
Spare wheel: 1 or 2 (for one piece) hanged at the front of the trailer.

Double-sided floor widening + boards (pine/spruce)
Hydraulic winch
Spare wheel: 1 or 2 (for one piece) hanged at the front of the trailer
Water container (- 30 I) with soap dispenser
Tool box (- 50 I)
Available other colors according to RAL CALSSIC codes (required RAL CLASSIC name
and 4 digits from the color palette)
Warning triangle

aking system: single line pneumatic with automatic (ALB) braking power

RC2100-1

RC2100

Loading platform with wooden floor - front horizontal part Loading platform with steel anti-skidding floor - rear inclined part Fastenings handles in the floor, 11 pieces Axles for 60 km/h, drum brakes 300x135
Hydraulic ramps
Braking system: single line pneumatic with manual braking power controller
Braking system: double line pneumatic with automatic (ALB) braking power

Fastenings handles in the floor, 11 pieces
Mechanically lowered ramps with protection against accidental opening
Highly resistant rectanglar chassis frame
Tipping support legs mounted at the rear of the trailer
Tandem suspenssion with 4 parabolic springs with fixed axles equipped in drum brakes
Drawbar type: fixed to couple with lower hitch of the tractor amortized with steel springs
Drawbar support: hydraulic straight, folded leg
Drawbar hitch: ball type K80
Braking system: double line pneumatic with manual braking power controller
Crank hand brake

Crank hand brake

Lighting system 12 V with airtight connection, with front and rear LED clearence lights Rear lamps with protective grating Side underrun protection

Wheel chocks + racks (2 pcs)

Spiral connecting cable of lighting system
Steel case at the front of the trailer for storing broadenings

Warning triangle

Double-component chemically hardened painting materials, UV-resistant. Paintwork: orange RAL 2008

ontroller

Braking system: hydraulic with braking power controller

Braking system: single line hydraulic

Braking system: single line hydraulic

Braking system: omblined braking system (double line pneumatic + hydraulic)

Braking system: combined braking system (double line pneumatic + hydraulic)

Braking system: combined braking system (double line pneumatic + hydraulic with

mechanical safety valve

Braking system: Combined braking system (double line pneumatic + hydraulic with

mechanical safety valve and braking system (double line pneumatic + hydraulic with

electric safety valve and braking power controller)

Floor: oak 45mm

Drawbar hitch: fixed 040 / fixed 050 / rotary 050

Double-sided floor widening + boards (pine/spruce):

Hydraulic winch Hydraulic winch
Spare wheel: 1 or 2 (for one piece) hanged at the front of the trailer
Water container (- 30 I) with soap dispenser

Finlarged Tamps
Available other colors according to RAL CALSSIC codes (required RAL CLASSIC name and 4 digits from the color palette) Warning triangle

RC2100-2

Loading platform with wooden floor - front horizontal part
Loading platform with steel anti-skidding floor - rear inclined part
Fastenings handles in the floor, 10 pieces
Mechanically lowered ramps with protection against accidental opening
Fixed support legs mounted under the ramps at the rear of the trailer
Tandem suspenssion with 4 parabolic springs with fixed axles equipped in drum brakes
Drawbar type: fixed to couple with lower hitch of the tractor amortized with steel springs
Drawbar hitch: rotary Ø50
Braking system: single line hydraulic
Highly resistant rectanglar chassis frame
Crank hand brake
Lighting system 12 V with airtight connection, with front and rear LED clearence lights
Rear lamps with protective grating
Side underrun protection
Wheel chocks - racks (2 pcs)
Steel case at the front of the trailer
Warning triangle of lighting system:

Warning triangle - One of the trains Spiral connecting cable of lighting system Double-component chemically hardened painting materials, UV-resistant.

Paintwork: orange RAL 2008

Axles for 60 km/h, drum brakes 300x135

Straight part floor extension Drawbar hitch: fixed Ø40

Drawbar hitch: fixed Ø50

Drawbar hitch: ball type K80

Hydraulic ramps with floating control Hydraulic ramps

Enlarged hydraulic ramps (trailer taken from production line)

Enlarged hydraulic ramps (trailer taken from stock)
Drawbar support: hydraulic straight, folded leg

Braking system: double line pneumatic with automatic (ALB) braking power

Spare wheel: 1 or 2 (for one piece) hanged at the front of the trailer

Available other colors according to RAL CALSSIC codes (required RAL CLASSIC name and 4 digits from the color palette)

Mechanically or hydraulically driven ramps



Tandem suspension on parabolic springs



49 >>>>>> **48** >>>>>> Technique for nature pronar.pl



RUCK TRANSPORTING TRAILERS PB3100, PC2300	52
RUCK TRAILERS PC2100, PC2100/1, PC2200, PB2100	53

TRUCK TRAILERS **PRONAR PB3100, PC2300**



Exceptionally strong and functional low loading trailer **PRONAR PB3100** is designed for transporting agricultural and construction machines and freight which may be correctly secured from any movement during transportation (e.g. loadings in containers or palettes). The structure of the trailer is based on an I-beam profile, densely ribbed with crossbeams, which guarantees high durability and strength. The breaking system has

got the EBS with the RSP as standard, which improves the stability of the vehicle, with emergency brake function and in first axle.

The low-loading Pronar **PC2300** trailer is a perfect solution for transporting any kinds of machines, such as agricultural and construction ones as well as other loads – it is equipped with safety locks preventing the freight from moving. The structure of the trailer is based on an I-beam profile, densely ribbed with crossbeams, which guarantees high durability and strength. The breaking system has got the EBS with the RSP as standard, which improves the stability of the vehicle. which improves the stability of the vehicle.



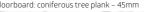
PRONAR PC2300



TECHNICAL DATA OF STANDARD EQUIPMENT	PB3100	PC2300
Allowable total weight (on road): [kg]	24000	18000
Allowable total weight (construction):: [kg]	27000	18000
Load capacity (on road): [kg]	18000	13500
Load capacity (construction): [kg]	21000	13500
Empty weight: [kg]	6000	4500
Loading space of the straight part of platform + enlargings: [m²]	16,5 (+ 3)	14,0 (+ 2,5)
Loading space of the complete platform + enlargings: [m²]	20,5 (+3)	17,9 (+ 3,2)
Length of the straight part of the platform: [mm]	6500	5500
Length of the complete platform: [mm]	8500	7020
Length of ramps: [mm]	2200	1900
Ramps angle: [degrees]	15	11,5
Width of floor: [mm]	2540	2540
Width of floor with enlargings: [mm]	3000	3000
Overall dimensions (length/width/height): [kg]	11500/2550/2750	9500/2550/2500
Floor material:	wooden planks 45 mm	wooden planks 45 mm
Platform height, measured from the ground: [mm]	900	950
Drawbar towing eye height: [mm]	830	1000 (± 110)
Axles:	BPW	ATW
Number of axles: [pcs]	3	2
Axle load (on road): [kg]	8000	9000
Axle load (construction): [kg]	9000	9000
Braking system:	pneumatic with EBS	pneumatic with EBS
Suspension:	mechanical BPW	mechanical
Tyres:	235/75 R17,5 (143/141J)	235/75 R17,5 (143/141J)
Maximum speed: [km/h]	100	100
Hydaulic ramps:	yes	yes
Loading hitches: [pcs]	14	9
Side barriers:	yes	yes
Support legs:	2	3

Hydraulic wind lass: towing power 6500kg (optionally 8000kg)







Supporting front leg, rotary, mechanically controlled



52 >>>>>> Technique for nature





The central axle tandem truck trailer **PRONAR PC2100** is a universal truck trailer. The design makes this trilateral tipper ideally suited to carry many types of cargo – eg. sand, gravel, stone, coal, rubble, feed, grain, sawdust or garbage. Trailer is designed to load 12 euro pallets. Additionally provided mounting brackets on the floor to prevent movement of cargo during transport. Thanks to a special opening system of individual sides. The equipment is very easy to use, allowing for quick and efficient loading with no additional operator intervention.

The central axle tandem truck trailer **PRONAR PC2100/1** is a universal truck trailer. The design makes this trilateral tipper ideally suited to carry many types of cargo – eg. sand, gravel, stone, coal, rubble, feed, grain, sawdust or garbage. Trailer is designed to load 12 euro pallets. Additionally provided mounting brackets on the floor to prevent movement of cargo during transport. Thanks to a special opening system of individual sides. The equipment is very easy to use, allowing for quick and efficient loading with no additional operator intervention.

Trailer **PRONAR PB2100** with a total weight of 10 tons is a vehicle designed for operation with light trucks. The construction of trailer has been adapted to transport any bulk materials (eg. Gravel, sand, debris), but by obtaining inside width 2420 mm there is also the possibility of transporting materials on euro pallets. Placed in the floor holders designed to securely attach cargo straps. Body capacity reaching 10 m³ and load capacity up to 7000 kg allow the use of trailers for transporting materials of various weights. Thanks to a special opening system of individual sides. The equipment is very easy to use, allowing for quick and efficient loading with no additional operator intervention.

Trailer **PRONAR PC2200** is designed for transport companies using vehicles with lighter construction, prepare for the transport pallet or by volume. Customs seals tarpaulins allows for the establishment of seals and hassle-free international transport. The trailer is universal because loading thanks to the opening of an independent system of tarpaulins it is possible to load a trailer with four sides: from both the sides and back of the fork lift truck and from the top using a crane.

PRONAR PC2100

PRONAR PB2100



PRONAR PC2200





TECHNICAL DATA OF STANDARD EQUIPMENT	PC2100	PC2100/1	PB2100	PC2200
Permissible total weight: [kg]	18000	18000	10000	18000
Load capacity: [kg]	12300	12850	7000	13200
Empty weight: [kg]	5700	5150	3100	4800
Load volume: [m³]	12	12	10,1	57
Loading space: [m²]	12,3	12,3	10,1	19,3
Internal length of loading space: [mm]	5100	5100	4190	7800
Internal width of loading space*: [mm]	2410*	2410*	2420	2480*
Sidewall height: [mm]	1000	1000	500+500	2970
Overall dimensions (length/width/height): [mm]	7610/2550/2780	7610/2550/2780	6500/2550/2500**	10210 ± 300/2550/4000
Sides and tailgate height: [mm]	-	-	-	600
Floor/wall thickness: [mm]	5 Hardox / 4 Domex	4 Hardox / 3 Domex	4/2	27 playwood / 25 Al
Platform height, measured from the ground: [mm]	1540	1540	up to 1300 mm	990
Axle brand:	BPW	BPW	-	BPW
Number of axles: [pcs]	2	2	2	2
Axle load: [kg]	9000	9000	-	9000
Breaking system:	pneumatic with EBS	pneumatic with EBS	-	pneumatic with EBS
Suspension:	pneumatic	pneumatic	mechanical	pneumatic
Tyres:	385/65 R 22,5 (160J,K)	385/65 R 22,5 (160J,K)	265/70 R19,5	265/70 R19,5 (160J)
Construction speed: [km/h]	100	100	100	100
Tipping system:	3-side	3-side	-	-
Left sidewall (hydraulic):	-	opened / closed hydraulically	=	-
Loading hitches: [pcs]	-	-	8	=
Telescopic cylinder: (Number of telescopic cylinder sections [pcs] / Piston stroke [mm] / Oil requirement [l] / Working pressure [bar])	6/1875/22/300	6/1875/22/300	-	-

width of the loading case suitable for EUROPALET transportation

53 >>>>>> pronar.pl

height with a cover

ADDITIONAL EQUIPMENT (OPTIONAL):

PB3100

Floor: wooden planks 45 mm Axles: 3 x 9t (BPW) Drum brakes ABS (on 2 axles) ABS (on 2 axies)
Mechanical suspension (BPW)
Pneumatic brakes with EBS: Knorr-Bremse
Pneumatic hand brake
Additional power to the EBS system via "stop" lights
Tyres 235/75 R17.5 - 143/141J (12 pcs)
Drawbar hitch: 2400
Drawbar length: 2400 mm
Electric 24V system in accordance with 48 EKG ONZ
Side underrun protection in accordance with 89/297/EWG
Hydraulic ramp lowering/winching system
Ramps witdth regulated mechanically
Mudlaps accoring with 91/226/EWG
Fastenings handles in the floor, 14 pieces
Wheel chocks + racks
Rear support lees. 2 pcs Rear support legs, 2 pcs Clearence markings Reflection boards

Double-component chemically hardened painting materials, UV-resistant.

Floor: oak 45mm Spare wheel + basket Reflection boards for overdimension loading (with clearence lights)

Reflection boards for overunine sour locating twee receives, Beacon light
Tool box (-501) 1 or 2 (price for one piece)
Double-sided floor widening + boards (pine/spruce)
Steel case at the front of the trailer for storing broadenings (-2401)
Sidewalls at the front of the trailer - height 500mm ver I (front wall)
Sidewalls at the front of the trailer - height 500mm ver II (front wall + closing front Sidewalls at the front of the trailer - height 500mm ver III (front wall +2 sidewalls +

closing rear wall)
Sidewalls at the front of the trailer - height 500mm ver IV (front wall +2 sidewalls + closing front wall + closing rear wall)
Drawbar hitch: Ø50

Hydraulic winch (winch up to 6500 kg (optional: 8000 kg))

PC2300

Floor: wooden planks 45 mm (pine/spruce) Axles: 2x9 t (ATW) Mechanical suspension (ATW) Drum brakes ABS (on 1 axle) winching / lowering valve with automatic return to "drive" position (with pneumatic suspension)
Pneumatic brakes with EBS: Knorr-Bremse Additional power to the EBS system via "stop" lights Tyres 235/75 R17,5 - 143/141J (8 pcs) Drawbar hitch Ø50 Drawbar towing eye height: 1000 ±110 mm Electric 24V system in accordance with 48 EKG ONZ Side underrun protection in accordance with 89/297/EWG Mechanical ramp lowering/winching system Ramps protection against accidental opening Ramps protection against accidental opening
Mudguards
Mudflaps in accordance with 91/226/EWG
Fastenings handles in the floor: 9 pieces
Wheel chocks: 2 pieces
Support leg in front of the trailer - 1 piece: rotated, machanical
Support legs in rear of the trailer - 2 pieces: rotated, machanical
Reflection boards
Clearence markings in accordance with 48 EKG ONZ
Double-Component chemically hardened painting materials, UV-resistant.
Colour: RAL9007 (silver)

Floor: oak 45mm Hydraulic ramps ABS on 2 axles Pneumatic suspension (BPW) Spare wheel for 2 pieces
Reflection boards for overdimension loading (with clearence lights) Reflection boards for overunine island boards. Reflection boards for cycle of 1 pcs.

Water container (- 30 l) with soap dispenser
Double-sided floor widening + boards (pine/spruce):
Steel case for storing broadenings(- 310 l)
Hydraulic winch (winch up to 6500 kg (optional: 8000 kg)

*Valec - 2 vot (RPW)

PC2100

Internal dimensions (length/width/height): 5100x2410x1000 mm Internal dimensions (length/width/height): 5100x2410 Floor: 5 mm Hardox Sidewalls: 4 mm Domex Axles: 2 x 91 (BPW) Drum brakes Pneumatic suspension 2x9 tones (BPW) Braking system: pneumatic with EBS, Knorr-Bremse Additional power to the EBS system via "stop" lights Tyres 385/65 R22.5 (4 pcs) Drawbar hitch: Ø50 Hydraulic tipping system - double line Hydraulic feed coupling: 3/4" Hyva Hydraulic return coupling: 1" Hyva Support leg Hydraulic return coupling: 1* Hyva
Support leg
Electric 24V system in accordance with 48 EKG ONZ
Clearence markings in accordance with 48 EKG ONZ
Sidewalls manually opened with lever on the front side (right side - swinging, left side - swinging and side-opened)
Rear wall swinging (opened automatically when tipping)
Fastenings handles in the floor: 8 pieces
Side underrun protection in accordance with 89/297/EWG
Plastic mudguards: 4x1
Mudflaps in accordance with 91/226/EWG
Bumper in accordance with 2006/20/WE
2 ropes limiting the tipping
Wheel chocks + racks - 2pcs
Mechanical support of the loading case - 2 pcs
Ferry tractive handles -2pcs
Reflection boards Double-component chemically hardened painting materials, UV-resistant Chassis color black RAL9005 PRONAR Sidewalls color orange RAL 2008 PRONAR

Pneumatic brakes with EBS: Haldex Hydraulic couplings feed / return – 1/2* (ISO 7241-1) Platform on the front wall Spare wheel (1 piece) Cover Spare wheel winch Water container (- 30 l) with soap dispenser Chain fastening the middle posts Alluminium ladder (length 2m)

PC2100/1

Internal dimensions (length/width/height): 5100x2410x1000 mm Floor: 4 mm Hardox Sidewalls: 3 mm Domex, Domex Wear Drum brakes Axles: 2 x 9 t (BPW) Pneumatic suspension 2x9 tones (BPW) Braking system: pneumatic with EBS, Knorr-Bremse Additional power to the EBS system via "stop" lights Tyres 385/65 R22.5 (4 pcs) Drawbar hitch: Ø50 Hydraulic tipping system - double line Hydraulic feed coupling: 3/4" Hyva Hydraulic return coupling: 1" Hyva Support leg Hydraulic return coupling: 1" Hyva Support leg Electric 24V system in accordance with 48 EKG ONZ Clearence markings in accordance with 48 EKG ONZ Clearence markings in accordance with 48 EKG ONZ Right sidewalls swinging manually opened with lever located on the front wall Left sidewall – Hydroboard, opened/closed by hydraulic cylinders Rear wall swinging (opened automatically when tipping) Fastenings handles in the floor: 8 pieces Side underrun protection in accordance with 89/297/EWG Plastic mudguards: 4x1 Mudflaps accoring with 91/226/EWG Bumper in accordance with 2006/20/WE 2 ropes limiting the tipping Wheel chocks + racks - 2pcs Mechanical support of the loading case - 2 pcs wheel chocks + racks - 2pcs
Mechanical support of the loading case - 2 pcs
Ferry tractive handles-2pcs
Reflection boards
Double-component chemically hardened painting materials, UV-resistant
Chassis color black RAL9005 PRONAR
Sidewalls color orange RAL 2008 PRONAR

Pneumatic brakes with EBS: Haldex, Wabco Hydraulic couplings feed / return – 1/2" (ISO 7241-1) Platform on the front wall Spare wheel (1 piece) Spare wheel winch Tool box (~ 50 I) Water container (~ 30 l) with soap dispenser Shovel



PB2100

Chassis frame: rectangular made of closed profiles Drawbar type: V- type fixed with regulated supporting spring Internal dimensions (length, width, height mm):4190x2420x(500+500) Drawbar hitch: fixed Ø40 Steering: rotating turntable Braking system: double line pneumatic with EBS (Knorr-Bremse) Crank hand brake 24V lighting system Central locking mechanism of side walls Front and rear mudguards Ladder and sidewall steps facilitating the access to the loading case Bumper

Double-component chemically hardened painting materials, UV-resistant.

Nameplate Wheel chocks (2 pcs) Side underrun protection

Mechanical support of the loading case

Support legs: 3 pcs 3 levels of wooden planks between poles Electric system 24V; accoring with 48 EKG ONZ Side underrun protection in accordance with 89/297/EWG

Plastic mudguards: 4x1/4 Mudflaps in accordance with 91/226/EWG

Bumper in accordance with 2006/20/WE Side and rear rubber bumpers

Fastenings handles in the floor: 18 pieces

Additional canvas cover straining expander

Wheel chocks + racks - 2pcs

Reflection boards

cover with frame Operator's platform Tool box (~ 50 l) Sidewalls fastening string Water container (~ 30 l) with soap dispenser Hydraulic tipping system Sidewalls opening supporting springs Spare wheel winch Spare wheel (with a winch) Grain shute spout Tool set

PC2200

Folding, sliding roof, sliding side curtains Straining cover system
Sliding central poles with possibility of disassembly
Internal dimensions (length/width/height): 7800x2480x2970 mm
Floor: waterproof, antislip playwood - 27 mm Sides and rear tailgate: aluminium - 25 mm
Front side: aluminium - 25 mm, additional internal reinforcement of front side up to 1000 mm height Sides and tailgate height: 600 mm Axles 2x9 tons (BPW) Sides opened manually by levers Stairs on rear tailegate Drum brakes Proum Grakes
Pneumatic suspension 2x9 ton (BPW)
Braking system: pneumatic with EBS, Knorr-Bremse
Additional power to the EBS system via "stop" lights
Tyres 265/70 R19,5 (8 pcs) winching / lowering valve with automatic return to "drive" position Drawbar hitch: Ø50 ±300 mm regulation of drawbar Ferry tractive handles-4pcs

Pneumatic brakes with EBS: Haldex Two-sided steel rear door instead of rear wall and cover Spare wheel: 1 or 2 (price of 1 pcs) Fasten for spare wheel from truck (instead of one spare wheel) Spare wheel winch 1 or 2 (price of 1 pcs) Ladder (in option with two-sided rear door) Tool box (~ 50 l) 1 or 2 (price of 1 pcs) Water container (~ 30 l) with soap dispenser Customs secure fastening rope

T

Double-component chemically hardened painting materials, UV-resistant



54 >>>>>> Technique for nature 55 >>>>>> pronar.pl



PRONAR TRAILERS T669, T669/1, T669XL	58
PRONAR TRAILERS T679, T679M	6
PRONAR TRAILERS T700, T700M, T700M/1, T700XL	63
PRONAR TRAILER T682	68

MONOCOQUE TRAILERS

PRONAR T669, T669/1, T669XL



The monocoque **PRONAR** trailer **T669** is intended to work under hard conditions. Tight, solid construction of the loading case enables to transport even tiny grains without any additional sealing. The grain hatch placed in the rear wall facilitates unloading and connection to the other more precise and efficient unloading equipment which is very important while transporting low density materials. Tandem suspension ensures the increase of pulling force thanks to additional weight placed on the rear axle. High tonnage load capacity will be well appreciated by all users. Features like high load capacity and load volume, make **PRONAR** trailer **T669/1** perfect choice to even most sophisticated customer's

expectations. Trapezoidal shape of the loading case facilitates unloading. Model T669/1 ensures tipping to the back and to the side, what makes it more functional. Furthermore, it is equipped with hydraulically driven tailgate and with ladder and steps inside the loading case. Solid construction and high quality materials ensure durability and resistance.

T669XL is the latest model in **PRONAR's** trailer range. The trailer is characterized by large 15,8 t load capacity and 22.6 m³ load volume. Suspended drawbar, parabolic suspension, 3 t drawbar and strong 406 x 120 brakes ensure safety even in the most difficult mountain areas.







TECHNICAL DATA OF STANDARD EQUIPMENT	T669	T669/1	T669XL*
Allowable total weight [kg]	20000	20000	21000
Load capacity [kg]	14320	14000	15800
Empty weight [kg]	5680	6000	5200
Load volume with extensions 580/without extensions [m³]	22 ,7/15	22,7/15	22,6
Loading space [m²]	12,4	12,4	12,9
Loading box inside length [mm]	5500	5500	5700
Loading box inside width [mm]	trapezoid 2200/2250	trapezoid 2200/2250	2240/2300
Dimensions length/width/height [mm]	7255/2550/3160	7255/2550/3160	7760/2550/2930
Sidewall height [mm]	1200+580	1200+580	1750 + 600
Floor/wall thickness [mm]	5/4	5/4	4/4
Platform height, measured from the ground [mm]	1435	1435	1180
Wheel track [mm]	1960	1960	1960
Suspension	parabolic springs	parabolic springs	parabolic springs
Hitch-ring load [kg]	2000	2000	3000
Tyres	385/65 R22,5 RE	385/65 R22,5 RE	385/65R22.5 RE
Maximum speed [km/h]	40	40	40
Tipping system	1-side	2 or optional 3 sides	1-side
Telescopic cylinder (piston stroke/oil requirement/working pressure)	2400 mm/29L/200bar	2400 mm/29L/200bar	2400 mm/29L/200bar
Minimum tractor power requirement [KM/kW]	104/76,4	104/76,4	104/76,4
Tipping angle (backwards) [°]	50	50/45	50
Tochnical data for trailor without extensions 600 mm			

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

Monocoque loading case with vertical ribs reinforcing the sidewalls Tipping system: one-sided (backward)
Two windows with PLEXI on the front wall of the load case
Chassis frame made of hight strength steel with rectangular closed

Hydraulically lifted tailgate with automatic pressing and locking

Hydraulically lifted tailgate with automatic pressing and locking system
Tandem suspenssion with 4 parabolic springs with 1325 mm wheelbase with fixed axles equipped in drum brakes 406x120
Grain chute, with a locking system in the rear wall
Folded ladder and steps facilitating the access to the loading case Sidewall extensions height 580 mm made of steel 2mm thickness Drawbar type: universal rigid to couple with lower or upper hitch of the tractor with rubber shock absorbers
Drawbar hitch: rotary with Ø50 towing eye
Drawbar support: hydraulic scissor-type with movable leg and hydraulic security lock
Braking system: Double line pneumatic with manual braking force regulator

regulator
Parking brake with crank
Rear foldable underrun protection
Rear mudguards made of plastic
Wheel chocks + galvanized racks (2pcs)
Installation of 12V lighting (bulb)with rear electric socket, hermetic
connections, contour lighting
Spiral connecting cable of the lighting installation
Rear lamps with protective grating

Spiral connecting cable of the lighting installation Rear lamps with protective grating Spiral connecting cable of the lighting installation Telescopic tipping cylinder on articulated suspension Tipping system: hydraulic with automatic cut-off valve and thick safety steel rope Plastic mudguards - behind the rear wheel Mechanical support of the loading case Double-component chemically hardened painting materials, UV-resistant.

resistant

Rear protection folded

Chassis painting colour: red RAL3000 PRONAR
Loading case painting colour: green RAL 6010 PRONAR

Drawbar hitch: rigid with Ø40mm towing eye to couple with upper hitch of the tractor Design with 3t universal, rigid drawbar for connecting to the lower or upper hitch of the tractor, amortised with steel springs and straight hydraulic support. The support of the lower or upper hitch of the tractor, amortised steel springs and hydraulic folding support. Single line pneumatic braking system. Single line pneumatic braking system Rear steering axle passively controlled with hydraulic steering lock system (axles longer than standard) hydraulic system requires a pair of external tractor hydraulic sockets. Braking system: double line pneumatic with automatic (ALB). Rear sockets for hydraulic installation and brakes for second trailer. Rear underrun protection homologated according to directive WE type, foldable. Rear grain chute. Hydraulic brake system. Sidewall extensions height 580mm made of steel 2mm thickness and front wall extansion made of wire mesh 30x30 window, with steel blanking plate, with stabilizing bar Sidewall extensions height 1000mm (instead of \$80mm) increasing load volume up to 27,7m3, made of steel 2mm thickness and folded front wall extansion made of wire mesh 30x30 window, with stabilizing bar Rear automatic hitch. Rolled canvas cover with a frame for walls extensions with height 580mm.

cell automatic interiors of the from the for walls extensions with height 580mm lastic mudguards (additional) - in front of the front wheel ide underrun protection

ool box yres 385/65 R22.5 yres 425/65 R22.5 yres 445/65 R22.5

yres \$50.60 - 2225 yres \$60.60 - 2225 yres \$60.05 - 2225 - the width of the trailer exceeds 2550mn yres \$600/50R22.5 - the width of the trailer exceeds 2550mn yres \$600/55-225 - the width of the trailer exceeds 2550mn yres \$600/R55-225 - the width of the trailer exceeds 2550mn

Tyres 600/RSs-22.5 - the winth of the trailer exceeds 2550mm
Spare wheel (separately)
Wheels with tires: 500/60-22.5; 500/60R22.5; 600/50-22.5; 600/50R22.5; 600/55R22.5 (trailer width exceeds 2550mm - in the version with steering axie)
Triangle for slow moving vehicles
Shock absorber for failing potatoes - two sets of rubber belts, 2,3m of length each, mounted on the sidewall extensions (side extensions necessaary)
Non standard colours according to RAL CALSSIC codes *
*doesn't aply for units on stock

T669/1

Monocoque loading case with vertical ribs reinforcing the sidewalls Monocoque loading case with two flaps (right side) with central

Monocoque loading case with two flaps (right side) with central locking me

Monocoque loading case with the possibility of tipping back and to the right side with two central locking flaps on the right side the tipping system - two-sided (backwards and to the side)

Two windows with PLEXI on the front wall of the load case

Sidewall extensions height 580 mm made of steel 2mm thickness Chassis frame made of hight strength steel with rectangular closed

profiles
Hydraulically lifted tailgate with automatic pressing and locking

ryoti adicasi yin teo tangate with automatic pressing and locking system
Tandem suspenssion with 4 parabolic springs with 1325 mm
wheelbase with fixed axles equipped in drum brakes 406x120
Drawbar type: universal rigid to couple with lower or upper hitch of
the tractor with rubber shock absorbers
Drawbar hitch: rotary with Ø50 towing eye
Drawbar support: hydraulic scissor-type with movable leg and
hydraulic security lock
Braking system: Double line pneumatic with manual braking force
regulator

regulator
Parking brake with crank
Rear foldable underrun protection
Plastic mudguards - behind the rear wheel
Wheel chocks - galvanized racks (2 pcs)
Installation of 12V lighting (bulb)with rear electric socket, hermetic
connections, contour lighting
Rear lamps with protective grating
Telescopic tipping cylinder on articulated suspension
Tipping system: hydrauilc with automatic cut-off valve and thick
safety steel rope
Mechanical support of the loading case
Folded ladder and steps facilitating the access to the loading case
Grain chute, with a locking system in the rear wall
Double-component chemically hardened painting materials, UVresistant

Chassis painting colour: red RAL3000 PRONAR: red RAL3000

Loading case painting colour: green RAL 6010 PRONAR

Drawbar hitch: rigid with Ø40mm towing eye to couple with upper hitch of the tractor Drawbar hitch: ball-type K80mm to couple with lower hitch of the tractor Design and build with 3 tones hitch ring load. fixed to couple with lower or upper hitch of the tractor, amortised with steel spring and with telescopic drawbar support with a gear Single line pneumatic braking system Design and build with 3 tones hitch ring load. fixed to couple with lower or upper hitch of the tractor, amortised with steel spring and with hydraulic drawbar support (folded)

Hydraulic brake system
Design and build with 3 tones hitch ring load, fixed to couple with lower or upper hitch of the tractor, amortised

Design and build with 3 clines interning load, fixed to couple with flower or upper internor the tractor, allord used with steel spring and with hydraulic drawbar support (straight leg)
Rear steering axle passively controlled with hydraulic steering lock system (axles longer than standard) hydraulic system requires a pair of external tractor hydraulic sockets
Braking system: double line pneumatic with automatic (ALB) braking power controller
Rear sockets for hydraulic installation and brakes for second trailer
Rear underrun protection homologated according to directive WE type, foldable
Rear grain futir

Sidewall extensions height 580mm made of steel 2mm thickness and front wall extansion made of wire mesh

Sidewall extensions neight skumm made of steel zmm thickness and front wall extension made of wire mesh 30x30 window, with steel blanking plate, with stabilizing bar Monocoque loading case with two flaps (left side) with central locking mechanism allowing for tipping backward and to the left Monocoque loading case with two flaps (left and right side) with central locking mechanism allowing for tipping backwards, to the left and right side

Rear automatic hitch Plastic mudguards that protect the front wheels

Plastic mudguards (additional) - in front of the front wheel

ide underrun protection

Side underrun protection
Tool box
Operator's platform for side walls extensions with height 580mm
Rolled canvas cover with a frame for walls extensions with height 580mm
Tyres 385/65 R22.5
Tyres 425/65 R22.5

vres 445/65 R22 5

lyres 550/60-22.5 Tyres 550/60-22.5 Tyres 560/60 R22.5 Tyres 600/50-22.5 - the width of the trailer exceeds 2550mm Tyres 600/50R22.5 - the width of the trailer exceeds 2550mm Tyres 600/55-22.5 - the width of the trailer exceeds 2550mm

Tyres 600/55-22.5 - the width of the trailer exceeds 250011111
Spare wheel (separately)
Wheels with tires: 500/60-22.5; 500/60R22.5; 600/50-22.5; 600/50R22.5; 600/55-22.5; 60

Non-standard painting colours* *doesn't aply for units on stock

Sprung drawbar with steel spring



Strong and robust chassis on parabolic springs facilitates transport in rough terrain



Rear lamps with protective grating



59 >>>>>> **58** >>>>>> Technique for nature pronar.pl



T669XL - trailer without extentions

ADDITIONAL EQUIPMENT (OPTIONAL)

Monocoque loading case with profiled sidewalls and reinforced upper edges of the sidewalls
Chassis frame made of rectangular closed profiles made of hight strength steel

STANDARD EQUIPMENT

Tandem suspenssion with 4 parabolic springs, 1360 mm wheelbase with fixed axles equipped with drum brakes 406x120

Universal sprung drawbar with height adjustment to couple with lower and upper hitch of the tractor

Spiral connection cable of the lightning installation Drawbar hitch: rotary with Ø50 towing eye

Drawbar support: telescopic with 2-section gear Braking system: double line pneumatic with manual braking force regulator Parking brake with crank Rear underrun protection, foldable

Metal shields over wheels (without mudguards) Wheel chocks + galvanized racks (2 pcs)

Installation of 12V lighting (bulb) with rear electric socket, hermetic connections, contour lighting

Rear lamps with protective grating Tipping system: hydrauilc with automatic cut-off valve and thick safety steel rope

Telescopic tipping cylinder on the articulated suspention Foldable ladder and steps facilitating the access to the loading case

Service support of the loading case
Hydraulically lifted tailgate with automatic pressing and locking system

Window with a mesh and PLEXI cover on the front wall of the load case Rubber seal for tailgate

Grain hatch with lever in a rear wall

Double-component chemically hardened painting materials, UV-resistant Chassis painting colour: red RAL3000 PRONAR Loading case painting colour: green RAL 6010 PRONAR

T669XL

Extensions: from high quality, strong, laser welded PF600mm profiles, made of profiled steel; the front wall ndow with mesh and a PLEXI cover; hinges enabling folding side extensions; increasing the capacity to

Rigid drawbar with Ø40mm eye for connecting to the upper hitch of the tractor Rigid drawbar with Ø50mm eye for connecting to the lower hitch of the tractor

Rear grain chute

Braking system: double line pneumatic or hydraulic or single line pneumatic

Crank hand brake
Rigid drawbar ball-type K80mm for connecting to the lower hitch of the tractor

Installation of 12V lighting (bulb) with rear electric socket, hermetic connections, contour lighting Single line pneumatic braking system

Rear lamps with protective grating Hydraulic brake system

Double line pneumatic braking system with ALB Hydraulic straight drawbar support with shut-off ball valve

Hydraulic folded drawbar support with shut-off ball valve Rear discharge chute on the width of the chute

Spare wheel (separately)

Tyres: 385/65 R22,5; vres: 445/65 R22,5;

Tyres: 550/60-22,5;

Tvres: 560/60 R22.5

Tyres: 600/50 R22,5-the width of the trailer exceeds 2550mm

Tyres: 600/55-22,5-the width of the trailer exceeds 2550mm Tyres: 60055 R22,5-the width of the trailer exceeds 2550mm

Tyres: 620/50 R22,5-the width of the trailer exceeds 2550mm Tyres: 650/50 R22,5the width of the trailer exceeds 2550mm

riangle for slow moving vehicles-

Non-standard painting colours* doesn't aply fo units on stock

Tandem suspension on parabolic springs





T669XL - Universal drawbar with steel springs and height adjustment. Possibity to connect with the tractor's lower or upper hitch (without approval)









The monogoque **PRONAR** trailer **T679** is relatively widely used. It can be applied for granular materials like grains, corn, green forage and root crops. Internal surface ensure that agricultural materials will not be destroyed during transport. Furthermore, certain equipment elements like extension side walls, hydraulically driven tailgate whether grain hatch make work even more effective and productive. The **T679** is durable construction which can be used in under hard conditions for many years.

PRONAR trailer T679M is the new monocoque trailer in PRONAR's offer. Monocoque PRONAR trailer T679M is an universal product that is a result of upgrading the PRONAR T679 trailer. Loading box, in which the sidewall is made of one steel sheet (no middle rib), gives the trailer a modern look and retains the high strength parameters. Standard trailer is equipped with covers, that protect the loading box against dirt while driving, and protects the lower frame of the trailer during loading and unloading. In the back flap of **T679M** a proven safety lock system on the hydraulic cylinders is used, which prevents unexpected opening of the flap and ensure its correct pressure. Additionally, fitted in the standard a rubber gasket provides a 100% of tightness of the trailer, for every kind of cargo. Thanks to this the trailer **PRONAR T679M** can be wildly use in the agriculture (for the transport of grain, corn, rape, green mass or root crops), but also in the construction (transport of gravel or sand) and to other sectors of the economy. Trailer **T679M** has a rich standard equipment, including front and rear wheels fender/ mudguards, two-wire pneumatic braking system, ladders and steps on board, a large window in the front wall, the side lighting and scissor-like drawbar. In trailer **T679M** the lighting system with LED lamps with high vitality and resistance to moisture and dirt is used. In addition the back lamps are protected from the damage by the metal grills.

PRONAR T679

(Load volume with extensions 15,8m³)

TECHNICAL DATA OF STANDARD FOUIPMENT

PRONAR T679M

T679M

Sidewall made of one sheet of steel (no middle rib) gives a trailer



T679

Allowable total weight [kg]	16000	16200
Load capacity [kg]	12000	12000
Empty weight [kg]	4000	4200
Load volume with extensions 580/without extensions [m³]	15,8/10,3	13,2
Loading space [m²]	10	10,4
Loading box inside length [mm]	4500	4800
Loading box inside width [mm]	trapezoid 2200/2250	trapezoid 2140/2200
Dimensions length/width/height [mm]	6259/2550/2866	6797/2550/2460
Sidewall height [mm]	1000+580	1200
Floor/wall thickness [mm]	5/4	4/4
Platform height, measured from the ground [mm]	1240	1260
Wheel track [mm]	1860	1960
Suspension	Parabolic springs	Parabolic springs
Hitch-ring load [kg]	1950	1950
Tyres	385/65 R22,5 RE	385/65 R22,5 RE
Maximum speed [km/h]	40	40
Tipping system	1-side	1-side
Telescopic cylinder (piston stroke/oil requirement/working pressure)	1980 mm/18L/200bar	1700 mm/13L/200bar
Minimum tractor power requirement [KM/kW]	83,2/61	83,2/61
Tipping angle (backwards) [°]	50	50

60 >>>>>> Technique for nature 61 >>>>>> pronar.pl







Universal drawbar to connect with upper and lower hitch of the

Loading box with profiled walls and reinforced upper rim (T679M)

ADDITIONAL EQUIPMENT (OPTIONAL):

Tipping system - single-sided (backward)
Monocoque loading case with vertical ribs reinforcing the sidewalls
Hydraulically lifted tailgate with automatic pressing and locking system
Rear protection: homologated, rigid
Chassis frame made of hight strength steel with rectangular closed profiles
Tandem suspenssion with 4 parabolic springs with 1325 mm wheelbase with fixed
axles equipped in drum brakes 400x80
Spiral connection cable of the lightning installation
Drawbar type: universal rigid to couple with lower or upper hitch of the tractor
Drawbar hitch: rotary with Ø50 towing eye
Drawbar support: straight hydraulic leg with ball cut-off valve
Braking system: double line pneumatic with manual braking force regulator
Parking brake with crank
Telescopic tipping cylinder on the articulated suspension

Braking system: double line pneumatic with manual braking force regulator Parking brake with crank
Telescopic tipping cylinder on the articulated suspension
Plastic mudguards - behind the rear wheel
Wheel chocks + galvanized racks (2 pcs)
Installation of 12V lighting (bulb)with rear electric socket, hermetic connections, contour lighting
Rear lamps with protective grating
Tipping system: hydraulic with automatic cut-off valve and thick safety steel rope
Mechanical support of the loading case
Folded ladder and steps facilitating the access to the loading case
Grain hatch with lever in a rear wall
Sidewall extensions height 580 mm made of steel 2mm thickness
Double-component chemically hardened painting materials, UV-resistant
Chassis painting colour: red RAL 3000 PRONAR

Loading case painting colour: green RAL 6010 PRONAR

T679

Drawbar hitch: rigid with Ø40mm towing eye to couple with upper hitch of the tractor Plastic mudguards (additional) - in front of the front wheel Drawbar hitch: rigid ball-type K80mm to couple with lower hitch of the tractor Drawbar support: hydraulic scissor - type leg with cut-off valve

Drawbar support: hydraulic scissor - type leg with cut-off valve
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Drawbar support: hydraulic scissor - type leg with manual pump with cut-off valve
Braking system: double line pneumatic with automatic (ALB)
Combined braking system (double line pneumatic + hydraulic with electric hydraulic safety valve
and regulator of braking forces)
Combined braking system (double line pneumatic with ALB + hydraulic)
Rear sockets for hydraulic installation and brakes for second trailer
Axles with drum brakes Ø406x120
Hydraulic hydrae ystem

Hydraulic brake system

Rear grain chute
Sidewall extensions height 580mm made of steel 2mm thickness and wire mesh 30x30 window on the front wall extension
Rear manual hitch, amortized
Rear automatic hitch
Spare wheel (separately)
Rolled canvas cover with frame and foldable central pipe with balkony (only for extension 580mm)

res 500/60 R22.5 res 550/45-22.5 res: 550/45 R22,5

Tyles. 530/45 R22,3 Single line pneumatic braking system Warning triangle for slow moving vehicle Tool box

Tool DOX Shock absorber for falling potatoes - two sets of rubber belts, 2,3m of length each, mounted on the sidewall extensions (side extensions necessaary)

Non standard colours according to RAL CALSSIC codes

Tipping system - single-sided (backward)
Monocoque loading case with profiled walles and reinforced upper sidewalls edge
Hydraulically lifted tailgate with automatic pressing system
Hydraulically lifted tailgate with automatic pressing and locking system
Rübber seal on the tailgate
Window on the front wall of the loading case, made of wire mesh window with
plexiglass cover
Chute grain in the rear wall with a lock
Chassis frame made of hight strength steel with rectangular closed profiles
Tandem suspenssion with 4 parabolic springs with 1325 mm wheelbase with fixed
axles equipped in drum brakes 400x80
Spiral connection cable of the lightning installation
Telescopic tipping cylinder on the articulated suspension
Drawbar type: universal rigid to couple with lower or upper hitch of the tractor
Drawbar hitch: rotary with 050 towing eye
Drawbar support: hydraulic scissor-type with movable leg and hydraulic security
lock
Braking system; double line pneumatic with manual braking force regulator

Braking system: double line pneumatic with manual braking force regulator

Braking system: double line pneumatic with manual braking force regulator Parking brake with crank Rear foldable underrun protection Front and rear mudguards made of plastic and steel mudgards over the wheels Wheel chocks + galvanized rack (2 pcs) Grain hatch with lever in a rear wall Installation of 12V lighting (bulb)with rear electric socket, hermetic connections, contour lighting Rear lamps with protective grating Tipping system: hydraulic with automatic cut-off valve and thick safety steel rope Load platform service support Folded ladder and steps facilitating the access to the loading case Double-component chemically hardened painting materials, UV-resistant Chassis painting colour: red RAL 3000 PRONAR Plastic mudguards (behind the rear wheel, in front of the front wheel) and a metal guard above the wheels Rear protection: homologated, folded Loading case painting colour: green RAL 6010 PRONAR

Drawbar hitch: rigid with Ø40mm towing eye to couple with upper hitch of the tractor Drawbar hitch: rigid with Ø50mm towing eye to couple with lower hitch of the tractor Drawbar hitch: rigid ball-type K80mm to couple with lower hitch of the tractor Braking system: double line pneumatic with manual braking force regulator Rear sockets for hydraulic installation and brakes for second trailer Rear grain chute Rear manual hitch, amortized Rear automatic hitch side underrun protection Tyres 385/65 R22.5

res 385/65 R22.5 res 385/55 R22.5 RE res 385/55 R22.5 res 425/65 R22.5

Tyres 500/60 R22.5

Warning triangle for slow moving vehicle
Extensions: from high-quality, strong, laser-welded profiles PF600mm, made of profiled steel;
with a mesh window on the front wall covered with PLEXI; with hinges enabling folding side
extensions: increasing capacity 19.4 [m³]
Single line pneumatic braking system
Hydraulic brake system
Combined braking system (double line pneumatic with ALB + hydraulic)
Non-standard painting colours*

* doesn't apply to the units on stock

Loading box with vertical reinforced ribs (T679)







MONOCOQUE TRAILER PRONAR T700, T700M, T700M/1, T700XL

PRONAR trailer T700 is an excellent monocoque tandem trailer. Because of the large capacity, it is designed to work in harsh conditions. The distinguishing feature of this trailer is turning axle, which makes maneuver much easier. What is for sure important for users, trailer is equipped with sprung drawbar which increases the comfort of the farmers who work with high loads. Hydraulic lifting tailgate with auto-lock when closing it also improves quality of use. The buyers can easily customize the product to their your needs thanks to a large number of optional equipment. PRONAR trailer T700M is a modernized version of the largest tandem trailer offered by PRONAR. In this issue through the use of a new type of suspension and axles equipped with brakes for high load capacity, it Allowable laden mass increased by 2 tons, up to 23 tons. New side wall design makes that center of gravity of container - in comparison with the previous version of the trailer - is lower. This fact clearly increases the stability of the trailer. The tailgate is equipped with security system with locks on hydraulic cylinders, which guarantees locking without the possibility of an unexpected opening. The use of rubber seal, ensures a tight seal box during transport of various cargoes. With all these innovations this trailer is the best equipped trailer of all trailers in our offer.

Trailer **T700XL** are designed to carry grain, corn, rapeseed, green mass and root crops. The trailer is equipped with a rear hydraulic tailgate which allows for convenient, efficient discharge of transported agricultural products. Trapezoid shape of loading box with smooth sidewalls facilitates unloading and reduces the risk of damage of transported products. Compact and robust design allows operation in harsh field conditions.

The T700M/1 monocoque trailer - with rear and bilateral side tipping - is normally connected to the tractor with a suspended drawbar, which reduces unpleasant jerks while protecting both the driver and the machine.

One of the most important advantages of the trailer is the structure of the load box, which enables the side tipping of the transported materials. This is especially useful in halls where rear tipping is limited by the height of the roof.

PRONAR T700



PRONAR T700M



PRONAR T700M/1



PRONAR T700XL



Loading box with profiled sides, strengthened with ribs



T700 - Universal rigid drawbar suspended with springsteel feather and height adjustment. Possibility to connect withthe lower or and height adjustment. Po



T700 - hydraulic rear tailgate



63 >>>>>> **62** >>>>>> Technique for nature pronar.pl







T700M - Tipping angle (backwards) - 55

T700M - Ladder facilitating the access to the loading case

TECHNICAL DATA OF STANDARD EQUIPMENT	T700	T700M	T700M/1	T700XL
Allowable total weight [kg]	21000	23000	20000	24000
(Construction) allowable total weight [kg]	24000	24000	23000	-
Load capacity [kg]	14430	16090	15740	17700
Empty weight [kg]	6570	6910	7260	6300
Load volume with extensions 830/without extensions [m³]	34,3/23	35/23	35 / 32 / 23	26,6
Loading space [m²]	14,7	14,7	15,2	13,7
Loading box inside length [mm]	6694	6694	6700	6700
Loading box inside width [mm]	2180/2240	2242/2302	2230/2300	2240/2300
Dimensions length/width/height [mm]	8500/2550/3900	8500/2650/3750	8610/2670/3020	8520/2550/3040
Sidewall heigh [mm]	1500+830	1500+800	1500/800 lub 600	1750
Floor/wall thickness [mm]	4/4	4/4	4/4	4/4
Platform height, measured from the ground [mm]	1475	1325	1520	1290
Wheel track [mm]	2000	2100	2100	1960
Suspension	Parabolic springs	Parabolic springs	Parabolic springs	Parabolic springs
Hitch-ring load [kg]	3000	3000	4000	4000
Tyres	550/60-22,5	550/60-22,5	550/60-22,5	385/65R22.5 RE
Maximum speed [km/h]	40	40	40	40
Tipping system	1-side	1-side	2 or optional 3 sides	1-side
Telescopic cylinder (piston stroke/oil requirement/working pressure)	2990 mm/40L/200bar	2990 mm/40L/200bar	2990mm/40L/200bar	2990mm/40L/200bar
Minimum tractor power requirement [KM/kW]	124,8/91,7	136,7/100,5	136,7/100,5	136.7/100,5
Tipping angle (backwards) [°]	55	55	55/35	55

ADDITIONAL EQUIPMENT (OPTIONAL):

T700

Monocoque loading case with profiled walles with vertical ribs reinforcing the sidewalls Tipping system - single-sided (backward)

Hydraulically lifted rear wall with automatic pressing and locking system Chassis frame made of hight strength steel with rectangular closed profiles Tandem suspenssion with 4 parabolic springs with 1500 mm wheelbase with rigid axles equipped in drum brakes 406x140

Drawbar type: universal rigid amortized by steel springs with height adjustment to couple with lower or upper hitch of the tractor

Spiral connection cable of the lightning installation

Drawbar hitch: rotary with Ø50 towing eye Drawbar support: telescopic with 2-section gear

Braking system: Double line pneumatic with manual braking force regulator

Parking brake with crank Rear underrun protection homologated foldable Front and rear mudguards made of plastic

Wheel chocks + galvanized racks (2 pcs)

Installation of 12V lighting (bulb) with rear electric socket, hermetic

connections, contour lighting

Rear lamps with protective grating

Tipping system: hydrauilc with automatic cut-off valve and thick safety steel

Mechanical support of the loading case

Telescopic tipping cylinder on the articulated suspension Folded ladder and steps facilitating the access to the loading case

Window mesh with PLEXI cover on the front wall of the load case $\,$ Grain hatch with lever in a rear wall

Double-component chemically hardened painting materials, UV-resistant

Chassis painting colour: red RAL3000 PRONAR Loading case painting colour: green RAL 6010 PRONAR Drawbar hitch: rigid with Ø40mm towing eye to couple with upper hitch of the tractor Drawbar hitch: rigid with Ø50mm towing eye to couple with lower hitch of the tractor Drawbar hitch: rigid ball-type K80mm to couple with lower hitch of the tractor

Single line pneumatic braking system

Boogie axles with leaf springs and rear axle hydraulic blockade Hydraulic brake system

Drawbar support: hydraulic straight with cut-off valve Drawbar support: hydraulic folded leg with cut-off valve Passively steered rear axle with hydraulic turning blockade

Braking system: double line pneumatic with automatic (ALB)

Rear sockets for hydraulic installation and brakes for second trailer

A set of steel mudguards over the wheels - the width does not exceed 2550mm

Sidewall extensions height 830mm made of steel 2mm thickness and folded front wall extension made of wire mesh 30x30 window

Rear grain chute

Rear manual hitch, amortized Rear automatic hitch

Tyres 560/60R22,5

Tyres 445/65 R22.5

Tyres 600/50 R22.5 - width of the trailer exceeds 2550mm Tyres 600/55-22.5 - width of the trailer exceeds 2550mm

Tyres 600/55R22,5-width of the trailer exceeds 2550mm

Tyres 600/55-26.5 - width of the trailer exceeds 2550mm Tyres 700/50-26.5 - width of the trailer exceeds 2550mm

Tyres 710/45-26.5 - width of the trailer exceeds 2550mm Tyres 710/50R26,5-width of the trailer exceeds 2550mm

Spare wheel (separately)

Warning triangle for slow moving vehicle

Shock absorber for falling potatoes - three sets of rubber belts - 2,3m + 2,3m + 1,8m, mounted on the sidewall extensions (side extensions necessaary)

Non standard colours according to RAL CALSSIC codes ** ** doesn't aply for units on stock

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T700M

Monocoque loading case with profiled walles and reinforced upper sidewalls

Tipping system - single-sided (backward)

Hydraulically lifted rear wall with automatic pressing and locking system Chassis frame made of hight strength steel with rectangular closed profiles Tandem suspenssion with 4 parabolic springs with 1810 mm wheelbase with fixed axles equipped in drum brakes 406x140

Chassis frame made of rectangular closed profiles made of hight strenght

Window mesh with PLEXI cover on the front wall of the load case Drawbar type: universal rigid amortized by steel leaf springs with height

adjustment to couple with lower or upper hitch of the tractor Drawbar hitch: rotary with Ø50 towing eye

Drawbar support: telescopic with 2-section gear Braking system: double line pneumatic with manual braking force regulator

Parking brake with crank Spiral connection cable of the lightning installation

Rear protective bumper homologated ,foldable

Front and rear mudguards made of plastic and steel mudgards over the wheels

Wheel chocks + galvanized racks (2 pcs)

Telescopic tipping cylinder on the articulated suspension Installation of 12V lighting (bulb) with rear electric socket, hermetic

connections, contour lighting Rear lamps with protective grating $\begin{tabular}{ll} Tipping \begin{tabular}{ll} \dot{system} \end{tabular}. \begin{tabular}{ll} \dot{hydrauilc} \begin{tabular}{ll} \dot{with} \begin{tabular}{ll} automatic \cut-off valve and thick safety steel \end{tabular} \label{tabular}$

Mechanical support of the loading case Folded ladder and steps facilitating the access to the loading case Grain hatch with lever in a rear wall

Double-component chemically hardened painting materials, UV-resistant

Chassis painting colour: red RAL3000 PRONAR Rear protective apron over the entire width of the trailer

Loading case painting colour: green RAL 6010 PRONAR

Drawbar hitch: rigid with Ø40mm towing eye to couple with upper hitch of the tractor Drawbar hitch: rigid with Ø50mm towing eye to couple with lower hitch of the tractor Drawbar hitch: rigid ball-type K80mm to couple with lower hitch of the tractor

Drawbar support: hydraulic straight with cut-off valve Drawbar support: hydraulic folded leg with cut-off valve

Extensions: from high-quality, strong, laser-welded profiles PF800mm, made of profiled steel; with a mesh window on the front wall covered with PLEXI; increasing capacity 35 $[m^3]$

Single line pneumatic braking system

Hydraulic brake system

Passively steered rear axle with hydraulic turning blockade Braking system: double line pneumatic with automatic (ALB)

Rear sockets for hydraulic installation and brakes for second trailer

Tool box

Side underrun protection

Rolled canvas cover with frame and operator's platform for walls extensions with height 800

Rear grain chute:

Rear manual hitch, amortized

Rear automatic hitch Tyres 445/65R22.5

Tyres 600/55R22,5 Tyres 710/45-26 5

yres 710/50R26,5

Tyres 800/45R26 5 yres 560/60 R22.5 - width of the trailer exceeds 2550mm

Tyres 600/50 R22.5 - width of the trailer exceeds 2550mm

yres 600/55-22,5 - width of the trailer exceeds 2550mm Tyres 600/55-26.5 - width of the trailer exceeds 2550mm

yres 700/50-26.5 - width of the trailer exceeds 2550mr Tyres 800/45-26.5 - width of the trailer exceeds 2550mm

Spare wheel (separately) Installation of 12V lighting (bulb) with rear electric socket, hermetic connection, contour lighting Warning triangle for slow moving vehicle

Shock absorber for falling potatoes - three sets of rubber belts - 2,3m + 2,3m + 1,8m, mounted on the sidewall extensions (side extensions necessary)

Non standard colours according to RAL CALSSIC codes * *doesn't aply fo units on stock

T700M/1

Load box with a shell structure, with profiled side walls, with a reinforced upper

edge of the walls
Load box with the possibility of tipping to the rear and to the right side with two
hydraulically pressed flaps on the right side
Selection of the tipping direction by means of two pins protected against
improper operation
Box tipping system - two-sided (to the back and to the side)
Window mesh with PLEXI cover on the front wall of the load case
Hydraulically lifted tailgate with automatic clamping and locking
Tailgate rubber seal Táilgate rubber seal

Chassis frame welded from rectangular closed profiles made of high-strength Chassis frame weided from rectangular closed profiles made of nigh-strength structural steel
Tandem suspension on 4 parabolic springs, with equalizing arms, with a wheelbase of 1810mm, with rigid axles equipped with drum brakes, dimensions 0406x140 mm
Universal drawbar, rigid, steel spring amortized, with height adjustment, to be connected with the lower or upper hitch of the tractor
Rotary drawbar hitch with a 050mm eye
Telepropie frowther groupts with the strang gor.

connected with the lower or upper hitch of the tractor Rotary drawbar hitch with a øSDmm eye Telescopic drawbar support with two-stage gear Double line pneumatic braking system with manual braking force regulator Parking brake with crank Installation of 12V (LED) lighting, with a rear electric socket, with hermetic connections, with outline lighting Rear lighting lamps with grilles to prevent damage Connecting cable, spiral, lighting installation Hydraulic system of tipping with an automatic cut-off valve limiting tipping, with thick securing ropes. Telescopic cylinder of the tipping on the articulated sling Folding ladder and side steps facilitating access to the load box Grain chute, with a blockade, in the rear wall Service support of the load box Two wheel chocks placed in galvanized pockets Plastic fenders (behind the rear wheel, in front of the front wheel) and a metal cover over the wheels Rear protection device (bumper) - homologated, foldable Rear spray flap across the entire width of the trailer A paint system with high anti-corrosion resistance with the use of two-component chemically hardened painting materials that provide high durability of paint coatings and resistance to UV Chassis painting color - gray RAL/7021 PRONAR

Chassis painting color - gray RAL7021 PRONAR Wall painting color: green RAL6010 PRONAR

Load box with the possibility of tipping to the rear and to the left side, with two hydraulically pressed flaps on the left side

the left side Rear tipping box, left and right, with two pairs of hydraulically pressed flaps on both sides Extensions: made of high-quality, strong, laser-welded PF600mm profiles, made of profiled sheets; with a grille window and a PLEXI cover on the front extension; increasing the capacity to 32 [m3] Extensions: made of high-quality, strong, laser-welded PF800mm profiles, made of profiled sheets; with a grille window and a PLEXI cover on the front extension; increasing the capacity to 35 [m3] Drawbar hitch: rigid with Ø40 mm eye for connecting with the upper hitch of the tractor (DMC reduced to 23 non ke)

Drawbar hitch: rigid with ø40 mm eye for connecting with the upper hitch of the tractor (DMC re 23000 kg)
Drawbar hitch: fixed ball K80mm to be connected with the lower hitch of the tractor
Hydraulic drawbar support with scissors with movable foot and securing hydraulic lock
Passively steered rear axle with a hydraulic turning lock system
Braking system: single line pneumatic with manual braking force regulator
Braking system: double line pneumatic with automatic (ALB) braking force regulator
Braking system double line pneumatic with automatic (ALB) braking force regulator

Hydraulic braking system Rear outlets for hydraulics, brakes, to the second trailer

Rear discharge chute at the width of the discharge chute Tool box Side protection (covers) Rear manual hitch (V. Orlandi)

Rear automatic hitch (V. Orlandi)
Rear automatic hitch (V. Orlandi)
Rear automatic hitch (Rockinger)
Tarpaulin rolled to the side, with a frame with a central hanging pipe, with a balcony, for extensions with a height of 600 mm

Meels with tires: 445 / 65R22.5 Wheels with tires: 560 / 60R22.5; 600 / 50R22.5; 600 / 55-22.5; 600 / 55R22.5; 600 / 55-26.5; 700 / 50-26.5;

Wheels with tires: 5607 60R42.5; 6007 50R42.5; 6007 55-26.5; 6007 55-26.5; 6007 55-26.5; 7007 50-26.5; 7107 45-26.5; 7107 50-26.

Suspended drawbar with steel springs



Foldable ladde

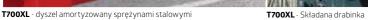


Window with PLEXI on the front wall of the load case and side steps to facilitate access to the load case



65 >>>>>> **64** >>>>>> Technique for nature pronar.pl







T700XL - Okno z przezroczystej PLEXI na przedniej ścianie skrzyni ładunkowej i stopnie burtowe ułatwiające dostęp do skrzyni ładunkowej

T700XL

 $Monocoque\ loading\ case\ with\ profiled\ sidewalls\ and\ reinforced\ upper\ edges\ of\ the\ sidewalls$ Tipping system - single-sided (backward) Hydraulically lifted rear wall with automatic pressing and locking system

Window mesh with PLEXI cover on the front wall of the load case Chassis frame made of rectangular closed profiles made of hight strength steel

Chassis in affecting to the Catalogual closed profiles frade of highest engages access
Rubber seal for tailgate
Spiral connection cable of the lightning installation
Telescopic tipping cylinder on the articulated suspension
Tandem suspension with 4 parabolic springs, 1500 mm wheelbase with fixed axles equipped in drum

Universal sprung drawbar with height adjustment to couple with lower or upper hitch of the tractor Drawbar hitch: rotary with Ø50 towing eye

Drawbar support: telescopic with 2-section gear

Braking system: double line pneumatic with manual braking force regulator Parking brake with crank
Rear underrun protection, foldable
Metal shields over wheels without plastic mudguards
Whend shelds analyzing radia of park

Wheel chocks + galvanized racks (2 pcs)
Installation of 12V lighting (bulb)with rear electric socket, hermetic connections, contour lighting

Rear lamps with protective grating Tipping system: hydrauilc with automatic cut-off valve and thick safety steel rope

Service support of the loading case Foldable ladder and steps facilitating the access to the loading case

Double-component chemically hardened painting materials, UV-resistant Chassis painting colour: red RAL3000 PRONAR Loading case painting colour: green RAL 6010 PRONAR

ADDITIONAL EQUIPMENT (OPTIONAL):

Drawbar hitch: rigid ball-type K80mm to couple with lower hitch of the tractor Single line pneumatic braking system
Drawbar support: hydraulic straight with cut-off valve
Drawbar support: hydraulic folded leg with cut-off valve
Hydraulic brake system
Evtopsions: from high quality, strong laser welded PE600mm profiles, made of

Extensions: from high quality, strong, laser welded PF600mm profiles, made of profiled sheets; with

a mesh window on the front wall covered with PLEXI; with hinges enabling folding side extensions;

side extensions;
increasing the capacity to 34.8 [m3]
Installation of 12V lighting (LED) with rear electric socket, hermetic connection, contour lighting
Braking system: double line pneumatic with automatic (ALB)

Rear grain chute: Tyres 445/65R22.5

Tyres 550/60-22.5 Tyres 560/60R22.5

Tyres 385/65R22,5 Tyres 600/55R22,5

Tyres 600/55R22.5 - width of the trailer exceeds 2550mm Tyres 600/55 22.5 - width of the trailer exceeds 2550mm Tyres 620/50R22.5 - width of the trailer exceeds 2550mm Tyres 650/50R22.5 - width of the trailer exceeds 2550mm

spare wheel (separately)
Warning triangle for slow moving vehicle
Tube for documents

Non-standard painting colours* * doesn't aply fo units on stock





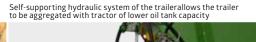


TRIDEM AXLE PRONAR TRAILER T682

PRONAR trailer T682 is one of the largest agricultural trailers on the market today. Load capacity of 21 tons meets the requirements of large farms. The trailer is fully automatic – hydraulic rear wall closing by the usage of clamping hooks ensures trouble-free operation. Hydraulic power system of the trailer allows it to aggregate with tractors of smaller capacity of hydraulic pumps. Self-steered swivel axle system improves handling, increases safety and significantly reduces tire wear. Minimum tractor power requirement is approx. 180 hp. Excellent price-performance ratio.



TECHNICAL DATA OF STANDARD EQUIPMENT	T682
Allowable total weight (technically): [kg]	33000
Permissible total weight: [kg]	30000
Load capacity: [kg]	21000
Empty weight: [kg]	9000
Load volume without extensions: [m³]	22
Loading space: [m²]	17,8
Loading case inside lenght: [mm]	8000
Loading case inside width: [mm]	trapezoid: 2200/2250
Dimensions: lenght/width/height: [mm]	9900/2550/3330
Sidewall height: [mm]	1200
Floor/wall thickness: [mm]	5/4
Platform height, measured from the ground: [mm]	1495
Wheel track: [mm]	2100
Suspension:	parabolic springs
Hitch-ring load: [kg]	3000
Tyres:	385/65 R22.5 RE
Maximum speed: [km/h]	40
Tipping system:	1-side
Hydraulic supply:	seperate tank, pump
Tipping cylinder (piston stroke/oil requirement/working pressure)	2990mm/72L/200bar
Tractor power requirement: [hp/kW]	182/133.8
Tipping angle (backwards): [°]	50





Two tipping cylinders. Tipping angle 50°

The system of self steering axles improves drive ability, increases the safety and significantly reduces tyre wear



STANDARD EQUIPMENT:

ADDITIONAL EQUIPMENT (OPTIONAL):

T682

Monocoque loading case with profiled walles with vertical ribs reinforcing the sidewalls

Tipping system - single-sided (backward)

Hydraulically lifted tailgate controlled from the tractor cab by a switch with automatic pressing and locking system
Chassis frame made of hight strength steel with rectangular closed profiles

Drawbar type: universal fixed amortized by steel leaf springs to couple with lower or upper hitch of the tractor

Spiral connection cable of the lightning installation

Drawbar hitch: rotary with Ø50 towing eye

Drawbar support: telescopic with 2-section gear

Tridem suspenssion with 6 parabolic springs with 1525 mm wheelbase, $\,$ with central fixed axle, front and rear axle pasively steered with hydraulic turning $\,$ blockade, with fixed axles equipped in drum brakes 406x140 $\,$

Parking brake with crank

Braking system: double line pneumatic with manual braking force regulator Rear underrun protection homologated according to directive WE type, foldable Front and rear mudguards made of plastic

Wheel chocks + galvanized racks (2 pcs)

Installation of 12V lighting (bulb) with rear electric socket, hermetic connections, contour lighting

Rear lamps with protective grating

Tipping system: hydraulic with own oil tank, pump and electric distributor with automatic cut-off valve and thick safety steel rope, steered from tractor's cabin by a switch

Telescopic tipping cylinder on the articulated suspension Telescopic PTO shaft

Mechanical support of the loading case Folded ladder and steps facilitating the access to the loading case

Windows on the front wall of the loading case made of plexiglass

Grain hatch with lever in a rear wall

Double-component chemically hardened painting materials, UV-resistant Chassis painting colour: red RAL3000 PRONAR

Loading case painting colour: green RAL 6010 PRONAR

Drawbar towing hitch rigid with Ø40 mm towing eye to couple with upper hitch of the tractor

Drawbar towing hitch rigid with Ø50 mm towing eye to couple with lower hitch of the tractor Drawbar towing hitch rigid ball-type K80 mm to couple with lower hitch of the tractor

Drawbar support- hydraulic straight with cut-off valve Drawbar support- hydraulic folded leg with cut-off valve

Hydraulic brake system

Braking system double line pneumatic with automatic (ALB) braking speed controller

Rear sockets for hydraulic installation and brakes for second trailer

Rear grain chute

Rear automatic hitch

Extensions height 580 mm enlarging load volume to 32m3 made of steel 2 mm

Extensions height 700 mm enlarging load volume to 35m3 made of steel 2 mm

Tyres 385/65R22.5 Tyres 425/65R22 5

Tyres 600/50-22,5 - width of the tariler exceed 2550 mm

Tyres 445/65R22.5

Tyres 600/55R22,5 - width of the tariler exceed 2550 mm Tyres 550/60-22.5 – width of the trailer exceeds 2550 mm

Tyres 600/50 R22.5 - width of the trailer exceed 2550 mm

Tyres 600/55-22.5 – width of the tariler exceed 2550 mm

Spare wheel (separately)

Steel mudgard above 550/60-22, 600/50R22,5, 600/55-22.5 wheels

shock absorber for falling potatoes – three sets of rubber belts, 2,3m of length each, mounted on the

sidewall extensions (trailer must have extensions) Slow-moving vehicle triangle

Non-standard painting colours*

*doesn't aply fo units on stock



69 >>>>>> **68** >>>>>> Technique for nature pronar.pl



PRONAR TRAILER T900XL	72
PRONAR TRAILERS T900 T902	74

71 >>>>>>

POWER PUSH TRAILER PRONAR T900XL

Trailer T900XL its equipped with tridem suspension. It is equipped with a push off wall for free unloading. The advantages of the push system are especially appreciated when using the trailer in low-rise buildings or on slopes. The system consists of a movable part of the floor and a front wall sliding over it. In the first place, the material placed in the rear of the box is pushed out, and the load located on the moving part of the floor is moved with it to the rear.

When the floor is moved to the end, the load on it is pushed against the front wall. Suspension in the trailer **T900XL** is amortised with six parabolic springs with equalisation arms, and the first and third axles are actively steered. The optional equipment also includes hydraulic suspension (increasing the comfort of use) and a vertical spreading adapter for manure. These mechanisms make the trailer extremely functional. A distinctive aspect of the **T900XL** is its huge loading space. With additional 450-mm extensions, it is up to 60 m³ (49 m³ without extensions) Due to the high load capacity (23.5 t), the trailer is very useful in large-area farms.



TECHNICAL DATA OF STANDARD EQUIPMENT	T900XL	T900XL (EU)
Allowable total weight (construction): [kg]	37000	36000
Allowable total weight: [kg]	34000	(EU homologation) 30000
Tecnical load capacity: [kg]	24730	23730
Load capacity: [kg]	21730	(EU homologation) 20730
Tecnical load volume: [kg]	12270	12270
Load volume: [m³]	49	49
Loading space: [m²]	23	23
Loading box inside length: [mm]	9700	9700
Loading box inside width: [mm]	2370	2370
Length/width/height: [mm]	12000/2550/3490	12000/2550/3490
Sidewall height: [mm]	2000	2000
Floor/wall thickness: [mm]	5/4	5/4
Platform height, measured from the ground: [mm]	1440	1440
Wheel track: [mm]	2100	2100

Suspension:	Parabolic springs	Parabolic springs
Hitch ring load: [kg]	4000	3000
Tyres:	445/65R22,5	445/65R22,5 (ECE homologation)
Maximum speed: [km/h]	40	40
Unloading system:	Movable	Movable
Oil requirement: [L]	80	80
Minimum tractor power requirement: [hp/kW]	220	220

Sliding wall provided with elastomeric seals ensuring better sealing



Tridem suspension





Fixed universal hitch hydraulically amortised

Hydraulically driven tailgate with automatic blocking system

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL)

Sealed movable wall

Sliding wall provided with elastomeric seals ensuring better sealing Window PLEXI on the front wall of the loading case

Window PLEXI on the front wall of the loading case
Chassis frame welded from rectangular closed profiles made of high-strength steel
Hydraulically driven tailgate with automatic blocking system
Tridem suspension on 6 parabolic springs with 1810 mm axle track, compensatory swingarms,
fixed middle axle and active steering of front and rear axle
Drawbar: upper/lower universal transportation hitch with steel leaf springs shock absortion
Drawbar towing hitch: ball type K80mm (4000kg) to couple with lower hitch of the tractor
Drawbar support: telescopic with 2-section gear
Hydraulic turning block with manual pump filling system
System of connecting the steering system with the tractor according to ISO 26402 (the trailer is
not equipped with a tractor steering system)

System of colling the steering system with the fractor according to 130 20402 (the trailer not equipped with a tractor steering system)

Axles for 60 km/h, drum brakes Ø406×140

Turning system facilitated by tractor's hitch system according to ISO 26402 (the trailer's not equipped in tractor's turning system)

Pneumatic hand brake

Wheel chocks and racks
A set of plastic mudguards and steel mudguards over the wheels

Aset to plastic indugators of the transparence of the wheels grainst damage Electric system with lateral commercial road lighting Hydraulic pipes marked with colors to better identification of their destiny A ladder and side steps facilitating access to the loading case Double-component chemically hardened painting materials

Frame painting colour: green RAL6010 PRONAR Redefices on State Colors and State Colors

Loading case painting colour: grey RAL7021 PRONAR

T900XL

Drawbar towing hitch: fixed with towing eye Ø50mm (3000kg) to couple with lower hitch of the

Drawbar towing hitch: fixed with towing eye Ø50mm (3000kg) to couple with lower hitch of the tractor (load capacity of trailer was reduced by 1000 kg)
Drawbar towing hitch: fixed with towing eye Ø40mm (3000kg) to couple with upper hitch of the tractor (load capacity of trailer was reduced by 1000 kg)
Drawbar towing hitch: ball with towing eye Ø50mm (3000kg) to couple with lower hitch of the tractor (load capacity of trailer was reduced by 1000 kg)
Drawbar towing hitch: ball with towing eye K80mm (3000kg) to couple with lower hitch of the tractor (load capacity of trailer was reduced by 1000 kg)
Additional Pronar sidewall extansions height 400 mm
Additional Pronar sidewall extansions height 400 mm
Additional Pronar sidewall extansions height 500 mm (divided 400 mm+100 mm)
Hydraulic suspension with 6 parabolic half-springs, wheel track 1810mm, fixed central axle, front and rear axles actively steered with hydraulic stabilization
Braking system: double line pneumatic with automatic braking force regulator (ALB)
Braking system: double line pneumatic with automatic braking force regulator (hydraulic ALB)
for hydraulic suspension

for hydraulic suspension

Steel and plastic mudguards for tyres exceeding 2550 mm of the width of the trailer Hydraulically driven side flap made of 500mm profiles with automatic locking system on the left or right side

Hydraulically driven side flap made of 500mm profiles with automatic locking system on both sides of the trailer

Tyres 445/65 R22,5 – trailer width exceeds 2550mm (without metal mudguard, only with plastic

ones)
Tyres 550/60-22.5 – width of the trailer exceeds 2550mm
Tyres 560/60R-22.5 – width of the trailer exceeds 2550mm
Tyres 600/55-22.5 – width of the trailer exceeds 2550mm
Tyres 620/50R-22.5 – width of the trailer exceeds 2550mm
Tyres 700/50-26.5 – width of the trailer exceeds 2550mm
Tyres 710/45-26.5 – width of the trailer exceeds 2550mm
Tyres 710/45-26.5 – width of the trailer exceeds 2550mm
Tyres 710/45-26.5 – width of the trailer exceeds 2550mm

Spare wheel (separately) 445/65 R22.5 Spare wheel (separately) 600/55-26.5

Spare wheel (separately) 600/55-R22.5 Spare wheel (separately) 600/50-R22.5 Spare wheel (separately) 700/50-26.5 Spare wheel (separately) 710/45-26.5 Rolled canvas cover – Cramaro Plastic tube for documents

Warning triangle

Available other colors according to RAL CALSSIC codes (required RAL CLASSIC name and 4 digits from the color palette)

T900XL

Made in accordance with European type-approval (according to the regulation of the European Parliament and the Council of the European Union nr 167/2013 Sealed movable wall

Sealed movable wall
Sliding wall provided with elastomeric seals ensuring better sealing
Window PLEXI on the front wall of the loading case
Chassis frame welded from rectangular closed profiles made of high-strength steel
Tridem suspension on 6 parabolic springs with 1810 mm axle track, compensatory swingarms,
fixed middle axle and active steering of front and rear axle

Inxed middle axie and active steering or front and rear axie. Hydraulically driven tailgate with automatic blocking system. Drawbar towing hitch: fixed type 50 mm (3000kg) to couple with lower hitch of the tractor. Drawbar support: telescopic with 2-section gear. Drawbar: upper/lower universal transportation hitch with steel leaf springs shock absortion. Hydraulic turning block with manual pump filling system. Axles for 60 km/h, drum brakes Ø406×140. Turning system facilitated by tractor's hitch system according to ISO 26402 (the trailer's not equipped in tractor's turning system.)

equipped in tractor's turning system)
Pneumatic hand brake
Rear underrun protection according to 70/221/EWG (2006/20/WE)

Wheel chocks and racks

Wheel chocks and racks
A set of plastic mudguards and steel mudguards over the wheels
Rear lighting system with side marker lights and bars protecting against damage
Electric system with lateral commercial road lighting
Braking system: double line pneumatic with automatic braking force regulator (ALB)
Hydraulic pipes marked with colors to better identification of their destiny
A ladder and side steps facilitating access to the loading case
Double-component chemically hardened painting materials
Frame painting colour: green RAL6010 PRONAR
Loading case painting colour: grey RAL7021 PRONAR

Drawbar towing hitch: fixed with towing eye Ø40mm (3000kg) to couple with lower hitch of the tractor

Drawbar towing hitch: fixed with towing eye \emptyset 50mm (3000kg) to couple with lower hitch of

the tractor
Drawbar towing hitch: ball with towing eye K80mm (3000kg) to couple with lower hitch of the

Hydraulic folding drawbar support with shut-off ball valve Sidewalls extensions height 400 mm, increasing the capacity to 58.7 (for all wheels the height of the trailer does not exceed 4000mm)

of the trailer does not exceed 4000mm)
Sidewalls extensions height 500 mm (400mm+100mm) increasing the capacity to 61,2 [m3] (for all wheels except 445/65R22,5 the height of the trailer does not exceed 4000mm)
Plastic mudguards for behind the rear wheel, in front of the front wheel and a metal mudguards protecting the wheels from above for non-standard wheels
Wheel with tyres homologation ECE:
Tyres 550/60-22.5 – width of the trailer exceeds 2550mm

Tyres 560/60R-22.5 – width of the trailer exceeds 2550mm
Tyres 600/55-22.5 – width of the trailer exceeds 2550mm
Tyres 620/50R-22.5 – width of the trailer exceeds 2550mm

Tyres 700/50-26.5 – width of the trailer exceeds 2550mm Tyres 710/50R-26.5 – width of the trailer exceeds 2550mm Tyres 710/45-26.5 – width of the trailer exceeds 2550mm

Plastic tube for documents

Warning triangle
Available other colors according to RAL CALSSIC codes (required RAL CLASSIC name and 4 digits from the color palette)

72 >>>>>> Technique for nature 73 >>>>>> pronar.pl

POWER PUSH TRAILERS PRONAR T900, T902

Innovative unloading system! The first polish PRONAR trailer T900, which allows to unload various agricultural materials through moving the front wall of the load box. The design is suited for low-rise buildings, large land slopes or working in strong winds, where standard tipping trailers are not suitable. Monocoque box with capacity of 36m3 and solid construction allows to carry both heavy materials (earth and gravel) and bulk (grain and seed).

For easy and complete emptying the trailer in the last phase of unloading, sliding wall is lifted up by a pair of hydraulic cylinders. **PRONAR T900** is a combination of modern design and versatility.

Innovative unloading system! PRONAR trailer T902 allows unloading goods through moving the front wall of the load box. The design is suited for low-rise buildings, large land slopes or to work in strong winds, where standard tipping trailers are not suitable. Comparing to PRONAR T900, trailer T902 is "shorter" and built on tandem axle. Front axle is fixed and rear axle is equipped with active steering for less tyre wear and

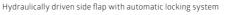


TECHNICAL DATA OF STANDARD EQUIPMENT	Т900	Т902
Allowable total weight (construction) [kg]	35000	24000
Allowable total weight [kg]	33000	23000
Load capacity [kg]	23500	16000
Empty weight [kg]	9500	7000
Load volume [m³]	36.57	30,8
Loading space [m²]	19.7	16.8
Loading box inside length [mm]	8320	7100
Loading box inside width [mm]	2370	2370
Length/Width/Height [mm]	10510/2550/3543	9100/ 2550/3500
Sidewall height [mm]	2000	2000
Floor/wall thickness [mm]	6/4	4/4
Platform height, measured from the ground [mm]	1500	1500
Wheel track [mm]	2100	2100
Suspension	parabolic springs	parabolic springs
Hitch-ring load [kg]	3000	3000
Tyres	445/	/65R22,5
Maximum speed [km/kW]	40	40
Unloading system	movable + tipping	movable + tipping
Oil requirement [I]	40	30
Working pressure [bar]	200	200
Minimum tractor power requirement [hp/kW]	182/133.8	124.8/91.7
Movable wall tipping angle [°]	55	55











Hydraulic tailgate with automatic blocking system



Tridem suspension on 6 parabolic springs

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

Sealed movable wall

Sliding wall provided with elastomeric seals ensuring better sealing Chassis frame welded from rectangular closed profiles made of high-strength

Hydraulically driven tailgate with automatic blocking system Drawbar with rotary towing eye Ø50

Drawbar support: telescopic with 2-section gear

Drawbar: upper/lower universal transportation hitch with steel leaf springs shock absortion

Tridem suspension on 6 parabolic springs with 1810 mm axle track, compensatory swingarms, fixed middle axle and active steering of front and rear axle

Hydraulic turning block with manual pump filling system

Axles equipped with drum brakes Ø406x140
Turning system facilitated by tractor's hitch system according to ISO 26402 (the trailer's not equipped in tractor's turning system)

Braking system: double line pneumatic with mechanical braking force regulator

Pneumatic hand brake

Rear underrun protection , folded Wheel chocks and racks

A set of plastic mudguards

Rear lighting system with side marker lights and bars protecting against damage

Electric system with lateral commercial road lighting

Hydraulic movable front wall with automatic tipping system and tipping angle of 55° in the last phase of unloading

Hydraulic pipes marked with colors to better identification of their destiny

A ladder and side steps facilitating access to the loading case Control windows on a movable wall

Grain hatch with lever in rear wall

Double-component chemically hardened painting materials Frame painting colour: red RAL3000 PRONAR

Loading case painting colour: green RAL6010 PRONAR

T900

Drawbar towing hitch: fixed with towing eye Ø40mm to couple with upper hitch of the tractor Drawbar towing hitch: fixed with towing eye Ø50mm to couple with lower hitch of the tractor Drawbar towing hitch: ball-type K80mm
Drawbar support: hydraulic folded with cut-off ball valve

Additional Pronar sidewall extansions height 400 mm (divided 400 mm+100 mm)

Additional Pronar sidewall extansions height 500 mm (divided 400 mm+100 mm)

Hydraulic suspension with 6 parabolic half-springs, wheel track 1810mm, fixed central axle, front and rear axles actively steered, stabilized and regulated hydraulically, with front axle lifting (width of the

trailer exceeds 2550mm with all written wheel sizes)
Braking system: single line pneumatic or hydraulic braking system

Braking system: double line pneumatic with automatic braking force regulator (ALB) Braking system: double line pneumatic with automatic braking force regulator (hydraulic ALB) for hydraulic suspension

Steel and plastic mudguards for tyres exceeding 2550 mm of the width of the trailer (all wheels other than standard)

Hydraulically driven side flap made of 500mm profiles with automatic locking system on the left or right

Hydraulically driven side flap made of 500mm profiles with automatic locking system on both sides of

the trailer Grain chute

Tyres 550/60-22,5 Tyres 600/50-R22.5

Tyres 600/55-26.5

Tyres 600/55-22.5

Tvres 700/50-26 5

Tyres 710/45-26.5 trailer width exceeds 2550mm for all wheels other than standard. Mechanical or ydraulic suspension)

Drawbar towing hitch: fixed with towing eye Ø40mm to couple with upper hitch of the

Drawbar towing hitch: fixed with towing eye Ø50mm to couple with lower hitch of the

Braking system: double line pneumatic with (ALB)
Braking system: double line pneumatic with (hydraulc ALB) for hydraulic suspension

Steel and plactic mudguards for tyres exceeding 2550 mm of the width of the trailer

Hydraulic suspension with 4 parabolic half-springs with axle base 1810mm, fixed front axle and rear axle

Hydraulically driven side flap made of 500mm profiles with automatic locking system on the left or right

Hydraulically driven side flap made of 500mm profiles with automatic locking system on both sides of

Rolled canvas cover - (front-back)

Plastic tube for documents

Warning triangle

T902

Drawbar towing hitch: ball-type K80mm

activelly steered with hydraulic stabilization.

Drawbar suport: hydraulic folded leg with ball cut-off valve

tractor

Sealed movable wall

Sliding wall provided with elastomeric seals ensuring better sealing Chassis frame welded from rectangular closed profiles made of high-strength

Hydraulically driven tailgate with automatic blocking system Drawbar with rotary towing eye \emptyset 50

Drawbar support: telescopic with 2-section gear Drawbar: upper/lower universal transportation hitch with steel leaf springs

shock absortion Tandem suspension on 4 parabolic springs with 1810 mm axle track

compensatory swingarms, with fixed front axle and active steering of rear Hydraulic turning block with manual pump filling system

Turning system facilitated by tractor's hitch system according to ISO 26402 (the trailer's not equipped in tractor's turning system)

Axles with drum brakes Ø406x140 Braking system: double line pneumatic with mechanical braking force regulator $\hfill \hfill \hfill$

Crank hand brake

Rear underrun protection, folded A set of plastic front and rear mudguards + metal mudguard above wheels

Rear lighting system with side marker lights and bars protecting against damage

Wheel chocks and racks

Hvdraulic movable front wall with automatic tipping system and tipping angle of 55° in the last phase of unloading Electric system with side marker lights

Hydraulic pipes marked with colors for better identification of their A ladder and side steps facilitating access to the loading case

Control windows on a movable wall

Grain hatch with lever in rear wall Double-component chemically hardened painting materials

Frame painting colour: red RAL3000 PRONAR Loading case painting colour: green RAL6010 PRONAR Grain chute Tyres 550/60-22,5

the trailer

Tyres 600/50-R22.5 Tyres 600/55-26.5

Tyres 600/55-22 5

yres 700/50-26.5

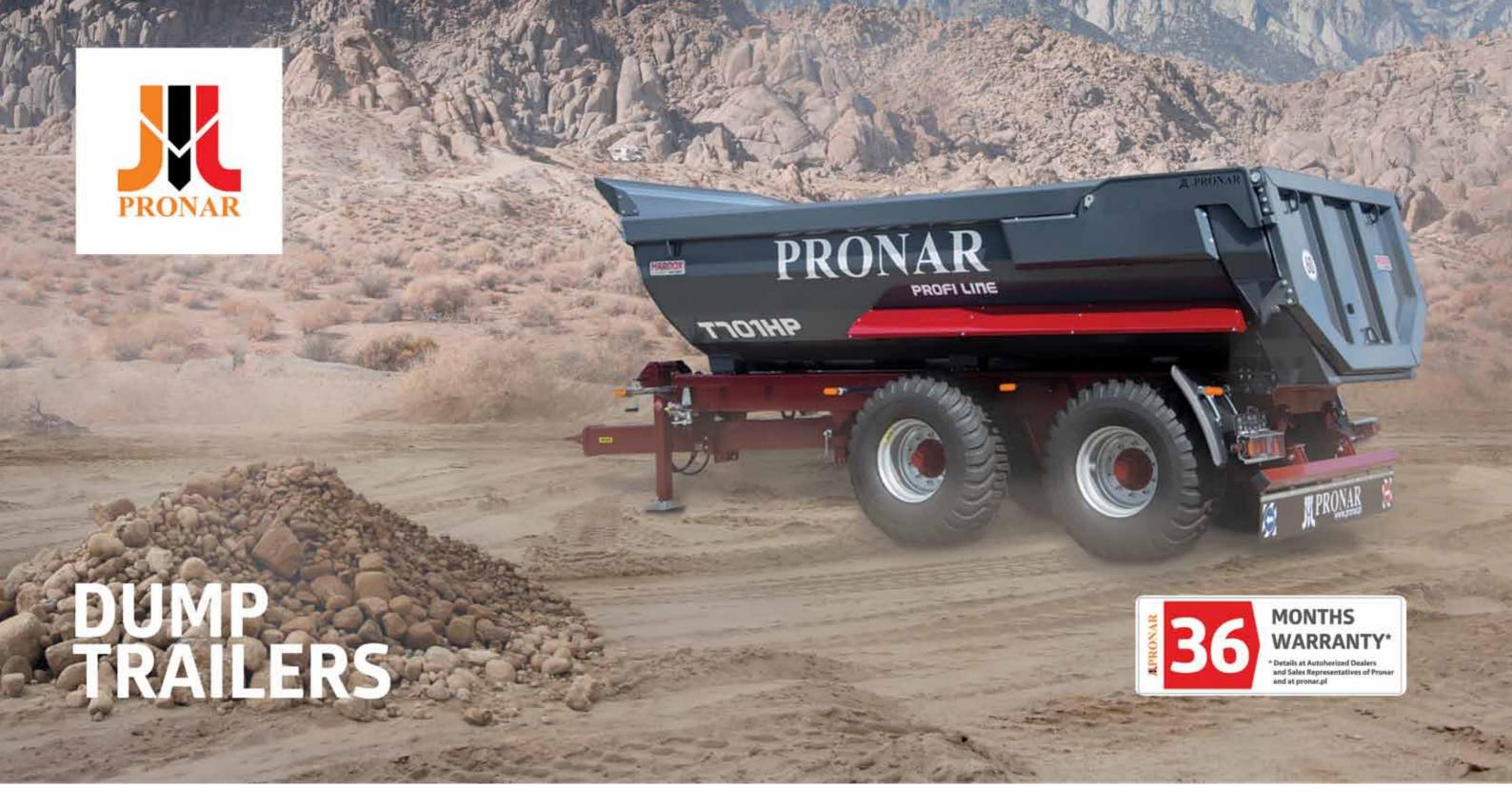
Tyres 710/45-26.5 trailer width exceeds 2550mm for all wheels other than standard. Mechanical or

ydraulic suspension)

Rolled canvas cover - (front-back) Plastic tube for documents

Warning triangle

75 >>>>>> 74 >>>>>> Technique for nature pronar.pl



PRONAR TRAILERS T701, T679/2	78
PRONAR TRAILERS T679/3, T679/4	80
PRONAR T679/4M, T679/5	82
PRONAR TRAILERS T701HP	85

PRONAR T701,T679/2



Trailer **PRONAR T701** works perfectly while debris, stones, gravel and other construction waste materials. It can also be used in the construction and demolition. Loading box enables the use of the trailer in difficult conditions for many years. Optionally can be made from wear-resistant steel, which further extends the life of the trailer. The rear tailgate opens hydraulically to the bottom. Rear lighting lamps are shielded by metal grilles protecting them from accidental damage. Dump trailer can be equipped with a swinging tailgate, what enables evenly unloading the bulk materials which is so useful during the construction of roads. The width of loading case inside is 2410 mm and allows for the carriage of equipment and construction vehicles.

Trailer PRONAR T679/2 works perfectly while transporting debris, stones, gravel and other construction waste materials. It can also be used in the construction. Loading case enables the use of the trailer in difficult conditions for many years. Optionally it can be made from wear-resistant steel, which further extends the life of the trailer. The rear tailgate opens hydraulically to the bottom. Rear lighting lamps are shielded by metal grilles protecting them from accidental damage. Dump trailer can be equipped with a swinging tailgate, what enables evenly unloading the bulk materials which is so useful during the construction of roads. The width of loading case inside what enables evenly unloading the bulk materials which is 2410 mm and allows the carriage of equipment and construction vehicles.

PRONAR T701



PRONAR T679/2



TECHNICAL DATA OF STANDARD EQUIPMENT	T701	T679/2
Allowable total weight [kg]	24000	16350
Load capacity [kg]	14840	12000
Empty weight [kg]	6160	4350
Load volume [m³]	10,6	7.7
Loading space [m²]	13.5	10.9
Loading box inside lenght (upper/bottom side) [mm]	5600	4625/4500
Loading box inside width [mm]	2410	2410
Dimensions Lenght /Width/Height [mm]	7360/2550/2330	6230/2546/2080
Sidewall height [mm]	800	700
Floor/wall thickness [mm]	10/8	10/8
Platform height, measured from the ground [mm]	1475	1240
Wheel track [mm]	2060	1860
Suspension	parabolic springs	parabolic springs
Hitch-ring load [kg]	3000	2000
Tyres	385/65 R22.5RE	385/65 R22.5RE
Maximum speed [km/h]	40	40
Tipping system	2 telescopic cylinders, 1-side typping	1-side
Telescopic cylinder (piston stroke/oil requirement/working pressure) [bar]	1980 mm/36L/200bar	2150 mm/28L/200
Minimum tractor power requirement [hp/kW]	124.8/91.7	83.2/61
Tipping angle (backwards) [°]	60	55

Hydraulically driven rear flap with height 370 mm, opened downwords (T701)



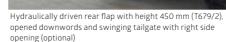
Drawbar type: universal rigid amortized by steel leaf springs (T701)





Rear lamps with protective grating









Tandem suspenssion with 4 parabolic springs (T679/2 and T701) Drawbar support: hydraulic scissor - type leg (T679/2)

STANDARD EQUIPMENT:

ADDITIONAL EQUIPMENT (OPTIONAL):

T701

Very strong construction (monocoque type) of loading case with vertical ribs reinforcing the sidewalls

Front short extension of the laoding box

Hydraulically driven rear flap with height 370 mm, opened downwords (only for laoding box with 2410 mm inner width)

Chassis frame made of hight strength steel with rectangular closed profiles
Tandem suspenssion with 4 parabolic springs with 1500 mm wheelbase with fixed axles equipped in drum brakes 400 x 140

Drawbar type: universal rigid amortized by steel leaf springs to couple with lower or upper hitch of the tractor

Drawbar hitch: rotary with Ø50 towing eye
Drawbar support: straight hydraulic leg with ball cut-off valve
Braking system: double line pneumatic with manual braking force control Crank hand brake

Rear protective bumper homologated according to directive 70/221/EWG (in

accordance to 2006/20/WE)

Front and rear mudguards made of plastic

Wheel chocks + racks (2pcs)

12 V lighting system with rear electric socket, bulbs lamps, with side clearence lights Rear lamps with protective grating
Tipping system: hydrauilc with automatic cut-off valve and thick safety steel cables

Mechanical support of the loading case
Folded ladder and steps facilitating the access to the loading case
Double-component chemically hardened painting materials, UV-resistant

Tipping frame colour: red RAL3000 PRONAR Side walls painting colour: yellow RAL1007

 $\label{thm:construction} \textit{Very strong construction (monocoque type) of loading case with vertical ribs reinforcing}$

Front short extension of the laoding box

Hydraulically driven rear flap with height 450 mm, opened downwords

Chassis frame made of hight strength steel with rectangular closed profiles
Tandem suspenssion with 4 parabolic springs with 1325 mm wheelbase with fixed axles

equipped in drum brakes 400x80 Axles for 60 km/h (permissible total weight 16 000 kg)

Drawbar type: universal rigid to couple with lower or upper hitch of the tractor Drawbar hitch: rotary with Ø50 towing eye

Drawbar support: hydraulic straight type leg with cut-off valve
Braking system: double line pneumatic with manual braking force control

Crank hand brake

Rear mudguards made of plastic

Wheel chocks + racks (2pcs)
12 V lighting system with rear electric socket, bulbs lamps, with airtight connection,

with side clearence lights

Rear lamps with protective grating

Tipping system: hydrauilc with automatic cut-off valve and thick safety steel cables Rear protective bumper: rigid, homologated

Mechanical support of the loading case

Hydraulic cables holder with a support for tractor connectors

Double-component chemically hardened painting materials, UV-resistant

Tipping frame colour: red RAL3000 PRONAR

Side walls painting colour: yellow RAL1007

Drawbar towing hitch rigid with towing eye Ø40 mm/ Ø50 mm to couple with upper and lower hitch of the tractor. Drawbar towing hitch rigid ball-type K80 mm Loading case and hydraulic rear flap made of HARDOX 450HB (8mm floor, 6mm side walls) Addictional swinging tailgate to facilitate setting the thickness of unloading bulk materials for loading box of width 2410 Trapezoidoid loading box 2200 mm/2300 mm made of HARDOX 450HB steel, floor thickness 8mm, 6mm wall thickness Trapezoidoid loading box 2200 mm/2300 mm made of ordinary steel. Hydraulically driven tailgate with gullwing rear door equipped with grain dumper – only for loading box with internal width 2300 mm Drawbar support hydraulic foldable leg with cut-off ball valve Drawbar support telescopic with 2 step gear Bogie axles with leaf springs and rear axle hydraulic blockade Passively steered rear axle with hydraulic turning blockade Rear sockets for hydraulic installation and brakes for second trailer Braking system: single line pneumatic Braking system: single line pneumatic Braking system: dydraulic Braking system: dydraulic Braking system double line pneumatic with automatic (ALB) braking force controller Rear manual hitch, amortized Rear automatic hitch UNIMAR Rear automatic hitch UN

Additional extensions height 800 mm, with swinging tailgate, seal, crossbar, ladder with internal steps, enlarging load volume up to 21,3 m³ made of steel 2,5 mm of thickness Tyres 385/65R2.25

Jyres 445/65 R22.5
Tyres 550/60 R22.5
Tyres 550/60 R22.5
Tyres 560/60 R22.5
Tyres 600/50 R22.5
Tyres 600/50 R22.5
Tyres 600/50 R22.5 - width of the trailer exceeds 2550 mm
Tyres 600/55 R22.5 - width of the trailer exceeds 2550 mm
Tyres 600/55 R22.5 - width of the trailer exceeds 2550 mm
Tyres 700/50 R25.5 - width of the trailer exceeds 2550 mm
Tyres 710/45 R26.5 - width of the trailer exceeds 2550 mm
Tyres 710/50 R26.5 - width of the trailer exceeds 2550 mm
Tyres 710/50 R26.5 - width of the trailer exceeds 2550 mm
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T679/2

Drawbar hitch: fixed with Ø40mm towing eye to couple with upper hitch of the tractor Drawbar hitch: fixed ball-type K80mm to couple with lower hitch of the tractor

Loading case and hydraulic rear flap made of HARDOX 450HB (8mm floor, 6mm side walls) Additional swinging tailgate with right side opening
Tandem suspenssion with 4 parabolic springs with 1325 mm wheelbase with fixed axles equipped in drum brakes 406x120
Drawbar support: scissor hydraulic leg with ball cut-off valve
Braking system: double line pneumatic with ALB (automatic braking force control)

Braking system: double line pneumatic with ALB (automatic braking force control)
Braking system: single line pneumatic
Braking system: single line pneumatic
Braking system: hydraulic
Braking system: combined (double line pneumatic with ALB + hydraulic), with electric safety valve
and braking force control
Braking system: combined (double line pneumatic with ALB + hydraulic)
Braking system: with rear electric socket, LED lamps, with airtight connection, with side
clearence lights
Rear sockets for hydraulic installation and brakes for second trailer
Rear manual hitch, amortized
Rear automatic hitch
Plastic tube for documents
Additional extensions height 800 mm, with swinging tailgate, seal, crossbar, ladder with internal
steps, enlarging load volume to 16,6 m3 made of steel 2,5 mm of thickness
Side underrun protection acc to directive 89/297/WE
Front mudguards made of plastic
Tyres 385/65R22.5
Tyres 425/65R22.5
Tyres \$4500/60-22.5
Tyres \$100/60-22.5
Tyres \$100/60-22.5
Tyres \$2500/60-22.5

Tyres 423/63R22.3 Tyres 500/60-22.5 Tyres 500/60 R22.5 Tyres 550/45-22.5

Iyres 550/45-22.5 Tyres 550/45R22.5 Spare wheel (separately) 385/65 R22.5 (15 R22.5) RE Spare wheel (separately) 385/65 R22.5 (15 R22.5) RE Spare wheel (separately) 425/65 R22.5 Spare wheel (separately) 500/60 R22.5 Spare wheel (separately) 500/60-22.5 Spare wheel (separately) 550/45-22.5 Spare wheel (separately) 550/45-22.5 Warning triangle

Warning triangle
Non standard colours according to RAL CALSSIC codes*
*doesn't aply fo units on stock

78 >>>>>> Technique for nature 79 >>>>>> pronar.pl

PRONAR T679/3 and PRONAR T679/4 are the latest models of dump trailers in PRONAR offer. They are designed for the transportation of agricultural products, rubble, stones, gravel, sand, clay and aggregate. A wide loading box of the trailer and the locking tabs also allow for transportation of construction vehicles, for e.g. excavators. Universal dump trailers PRONAR T679/3 and PRONAR T679/4 have a robust and durable construction, made of high quality materials, which are especially good for farms, gravel pits, stone factories, construction companies or for any work requiring transportation of heavy materials and equipment.

PRONAR T679/4 PRONAR T679/3



TECHNICAL DATA OF STANDARD EQUIPMENT	T679/3	T679/4
Allowable total weight [kg]	13200	11000
Load capacity [kg]	10360	8385
Empty weight [kg]	2840	2615
Load volume [m³]	6.4	6.4
Loading space [m²]	9.7	9.7
Loading box inside lenght (upper/bottom side) [mm]	4000	4000
Loading box inside width [mm]	2416	2420
Dimensions Lenght /Width/Height [mm]	5674/2550/1775	5674/2550/1740
Sidewall height [mm]	648	650
Floor/wall thickness [mm]	6/6	4/4
Front wall/ rear wall thickness [mm]	4/4	4/4
Platform height, measured from the ground [mm]	1085	1050
Wheel track [mm]	1990	1990
Suspension	tandem with trailing arm	tandem with trailing arm
Hitch-ring load [kg]	1800	1500
Tyres	500/50-17	400/60-15.5
Maximum speed [km/h]	40	40
Tipping system	1-side	1-side
Telescopic cylinder (piston stroke/oil requirement/working pressure) [bar]	1700mm/13L/200bar	1700mm/13L/200bar
Minimum tractor power requirement [hp/kW]	69.4/51	62.6/46
Tipping angle (backwards) [°]	50	50

Drawbar support: telescopic supporting leg



Hydraulically driven rear flap with height 325 mm, opened downwords and swinging tailgate with right side opening (optional)



Crank hand brake

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T679/3

Very strong construction (monocoque type) of loading case with vertical ribs reinforcing the sidewalls, side wall and floor made of one piece of steel, 90° angle between floor and wall Fastening hooks inside the loading box for securing the load - 4 hooks Hydraulically driven rear flap with height 325 mm, opened downwords Chassis frame made of hight strength steel with rectangular closed profiles Tandem suspension with 2 trailing arms with 1120 mm wheelbase with fixed axle shafts equipped in drum brakes 300x90 Drawbar hitch: fixed with Ø40mm towing eye to couple with upper hitch of the tractor Drawbar hitch: fixed with K80 mm towing eye

Front short extension of the loading box Plastic tube for documents

Rear automatic hitch

Rear sockets for hydraulic installation and brakes for second trailer
Additional swinging tailgate with right side opening
Loading case made of abrasion resistant steel 450HB HARDOX - 5 mm on floor and side walls Additional extension 800mm with PLEXI window, rear swinging tailgate, with rubber seals, with crossbar, with ladder with internal

Steps, increasing the volume to 14,1 m³ Tyres 520/50-17 Tyres 19.0/45-17

Spare wheel (separately): 500/50-17

Spare wheel (separately): 19.0/45-17
Spare wheel (separately): 520/50-17
Non standard colours according to RAL CALSSIC codes*

* doesn't apply to units in stock

Drawbar type: universal rigid to couple with lower or upper hitch of the tractor, with a ladder and platform Drawbar hitch: rotary with Ø50 towing eye Drawbar support: telescopic supporting leg with fixed parking foot with one step gear Braking system: hydraulic (Crank hand brake)

Wheel chocks + racks (2pcs)
12 V lighting system with rear electric socket, LED lamps, with airtight connection, with side clearence lights

Rear lamps with protective grating
Tipping system: hydrauilc with automatic cut-off valve and thick safety steel cables
Ladder and steps facilitating the access to the loading case

Mechanical support of the loading case

Warning triangle (sticker)
Hydraulic cables holder with a support for tractor connectors

Double-component chemically hardened painting materials, UV-resistant Tipping frame colour: red RAL3000 PRONAR

Side walls painting colour: yellow RAL1007

Very strong construction (monocoque type) of loading case with vertical ribs reinforcing the sidewalls, side wall and floor made of one piece of steel, 90° angle between floor and wall

Fastening hooks inside the loading box for securing the load - 4 hooks Hydraulically driven rear flap with height 325 mm, opened downwords Chassis frame made of hight strength steel with rectangular closed profiles Tandem suspension with 2 trailing arms with 1120 mm wheelbase with fixed axles shafts equipped in drum brakes 300x90

Drawbar type: universal rigid to couple with lower or upper hitch of the tractor, with

Drawbar type: united saming to cooper and a ladder and platform
Drawbar hitch: rotary with Ø50 towing eye
Drawbar support: telescopic supporting leg with fixed parking foot with one step gear

Braking system: hydraulic Crank hand brake Wheel chocks + racks (2pcs)

12 V lighting system with rear electric socket, LED lamps, with airtight connection, with side clearence lights
Rear lamps with protective grating

Tipping system: hydrauilc with automatic cut-off valve and thick safety steel cables Ladder and steps facilitating the access to the loading case Mechanical support of the loading case

Warning triangle (sticker)
Hydraulic cables holder with a support for tractor connectors
Double-component chemically hardened painting materials, UV-resistant
Tipping frame colour: red RAL3000 PRONAR

Side walls painting colour: yellow RAL1007

T679/4

Drawbar hitch: fixed with \emptyset 40mm towing eye to couple with upper hitch of the tractor Drawbar hitch: fixed with K80 mm towing eye Front short extension of the loading box

Plastic tube for documents Rear automatic hitch

Additional swinging tailgate with right side opening Loading case made of abrasion resistant steel 450HB HARDOX - 4 mm on floor and side walls Additional extension 800mm with PLEXI window, rear swinging tailgate, with rubber seals, with crossbar, with ladder with internal

steps, increasing the volume to 14,1 m³ Rear sockets for hydraulic installation and brakes for second trailer Tyres 500/50-17

vres 19.0/45-17

Tyres 19.0/45-17
Spare wheel (separately): 400/60-15.5
Spare wheel (separately): 500/50-17
Spare wheel (separately): 19.0/45-17
Non standard colours according to RAL CALSSIC codes * doesn't apply to units in stock



Hydraulic braking system



Tandem suspension with 2 trailing arms with fixed axles shafts equipped in drum brakes



Rear lamps with protective grating



81 >>>>>> **80** >>>>>> Technique for nature pronar.pl

The PRONAR T679/4M trailer, thanks to its low own weight, has a load capacity of 8.5t. The applied tandem suspension with trailing arms, large range of work and wide tires provide great comfort and safety at work. A characteristic element of the T679/4M dump trailer is the new shape of the load case, made of two bent sheets of 4mm thick steel and framed with a durable, high-strength profile. The front wall of the loading case is rounded to the whole height, which allows you to accurately unload the content of using the volume bucket. The advantage of the trailer is a wide range of optional equipment, such as the load case made of HARDOX steel, swinging tailgate, extensions with a height of 800mm and many more.

The high spec of standard equipment and a number of positive traits, make the trailers easy to operate what increases the comfort of usage. PRONAR T679/5 - the smallest trailer among PRONAR dump trailers. The trailer is equipped with rigid single axle suspension with drum brakes. The trailer is characterized by stable construction and wide tires which provide safe operation of the trailer. It is suitable for all tasks in the toughest conditions.

PRONAR T679/4M



TECHNICAL DATA OF STANDARD EQUIPMENT	T679/4M	T679/5
Permissible total weight: [kg]	10850	10350
Load capacity: [kg]	8500	8100
Empty weight: [kg]	2020	2250
Load volume: [m³]	4,5	6,4
Loading space: [m²]	7,8	9,7
Loading case inside length (at the floor/on top): [mm]	3540/3700	4000
Loading case inside width: [mm]	2210	2420
Dimensions: length/width/height: [mm]	5380/2400/1560	5653/2550/1738
Sidewall height: [mm]	550	650
Floor/wall thickness: [mm]	4/4	4/4
Platform height, measured from the ground: [mm]	1010	1070
Suspension:	tandem with trailing arm	rigid, single axle
Hitch-ring load: [kg]	2000	2000
Tyres:	400/60-15.5	520/50-17
Maximum speed: [km/h]	40	40
Tipping system:	1-side	1-side
Tipping cylinder (piston stroke/oil requirement/working pressure): [mm/L/bar]	1700/ 13/ 200	1700mm/13L/200bar
Tractor power requirement: [KM/kW]	62,6/46	62,6/46
Tipping angle (backwards): [°]	50	50

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T679/4M

Very strong construction (monocoque type) of loading case, side wall and floor made of one piece of steel, 90° angle between floor and wall

Front wall curved facilitating unloading with the use of excavator bucket
Fastening hooks inside the loading box for securing the load - 4 hooks (2 at the front on the floor, 2 at the back on the side wall)

Hydraulically driven rear flap with height 325 mm, opened downwards Chassis frame made of high strength steel with rectangular closed profiles – triangle shape

Tandem suspension with 2 trailing arms with 1100 mm wheelbase with fixed axles shafts equipped in drum

 $brakes\ 300x90-only\ the\ front\ shafts, rear\ shafts\ unbraked\ (Scandinavian\ market)$ $Drawbar\ type:\ universal\ rigid\ to\ couple\ with\ lower\ hitch\ of\ the\ tractor$

Drawbar hitch: rotary with Ø50 towing eye

Drawbar support: telescopic supporting leg with one step gear, with fixed parking foot Braking system: hydraulic

12 V lighting system, LED lamps, with airtight connection

Rear lamps with protective greting
Tipping system: hydraulic with automatic cut-off valve and thick safety steel cables

Mechanical support of the loading case

Warrning triangle (sticker)

Double-component chemically hardened painting materials, UV-resistant

Side walls painting colour: yellow RAL1007

Tipping frame colour: red RAL3000 PRONAR

Cover with a balcony Loading case made of abrasion resistant steel 450HB HARDOX - 4 mm on floor and side walls – "farmers market"

Additional extension 800mm with grating window on the front wall, with PLEXI,

with rear swinging tailgate, with rubber seals, with 2 steel ropes fastening sidewalls,

with ladder with internal steps, increasing the volume to 11 m3, made of steel 2 mm

Loading case made of abrasion resistant steel 450HB HARDOX - 6 mm on floor and front wall – "excavators market", side walls made of S235 steel 4 mm thickness Hydraulically driven rear flap with height 325 mm, made of HARDOX 450 HB 4 mm

(from inside the loading box)

Short manual drawbar support Front and rear shafts equipped with drum brakes 300x90

Braking system: hydraulic (for 4 shafts)

Braking system: double line pneumtaic (for 4 shafts) with manual braking force control

Front short extension of the loading box

Additional swinging tailgate with right side opening Wheel chocks + racks (2pcs)

Crank hand brake

of thickness

Rear bumper Plastic tube for documents

Tires 500/50-17

Tires 19.0/45-17 Tires 520/50-17

Spare wheel (separately): 400/60-15.5

Spare wheel (separately): 500/50-17 Spare wheel (separately): 520/50-17

Non standard colours according to RAL CALSSIC codes *

* doesn't apply to units in stock

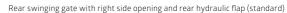
Tandem suspension with 2 trailing arms giving wide range of movement



Wide tires (520/50-17)



T679/4M - front wall curved facilitating unloading with the use of excavator bucket



83 >>>>>>



82 >>>>>> Technique for nature pronar.pl



T679/4M - monocoque type of loading case, side wall and half floor made of one piece of steel, 90° angle between floor and wall

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T679/5

Very strong construction (monocoque type) of loading case with vertical ribs reinforcing the sidewalls, side wall and floor made of one piece of steel, 90° angle between floor and wall Fastening hooks inside the loading box for securing the load - 4 hooks Hydraulically driven rear flap with height of 325 mm, opened downwords Chassis frame made of hight strength steel with rectangular closed profiles Rigid, single axle suspension, with drum brakes 300x135 axle
Drawbar type: universal rigid to couple with lower or upper hitch of the tractor, with a ladder and platform

Drawbar hitch: rotary with Ø50 towing eye
Drawbar support: telescopic supporting leg with fixed parking foot and cotter pin
Braking system: hydraulic
Crank hand brake

12 V lighting system with rear electric socket, LED lamps, with airtight connection, with side clearence

12 V lighting system with real electric society, cookings, and lights Lighting Connecting Spiral cable Rear lamps with protective grating Tipping system: hydraulic with automatic cut-off valve and thick safety steel cables Tipping telescopic cyliner Ladder and steps facilitating the access to the loading case Mechanical support of the loading case Warning triangle (sticker)

Metrianical support of trie loading case
Warning triangle (sticker)
Hydraulic cables holder with a support for tractor connectors
Double-component chemically hardened painting materials, UV-resistant
Tipping frame colour: red RAL3000 PRONAR
Side walls painting colour: yellow RAL1007

Drawbar hitch: fixed with K80 mm towing eye

Drawbar hitch: fixed with Ø40mm towing eye to couple with upper hitch of the

Drawbon interest.

tractor
Front short extension of the loading box
Drawbar support: telescopic supporting leg with fixed parking foot with one

Wheel chocks + racks (2pcs)
Rear automatic hitch
Loading case made of abrasion resistant steel 450HB HARDOX - 4 mm on floor

Loading case made of abrasion resistant steel 450HB HARDOX - 4 mm on floor and side walls
Additional extension 800mm with PLEXI window, rear swinging tailgate, with rubber seals, with crossbar, with ladder with internal -steps, increasing the volume to 14.1 m³
Tyres 500/50-17
Spare wheel (separately): 500/50-17
Spare wheel (separately): 520/50-17
Plastic mudguards
Plastic tube for documents
Non standard colours according to RAL CALSSIC codes *

Non standard colours according to RAL CALSSIC codes * *doesn't apply to units in stock

Hydraulically driven rear flap opened downward



Loading of T679/5 trailer







HALF PIPE DUMP TRAILER PRONAR T701HP



T701 HP is a first Pronar's model from Profi Line series. T701HP is distinguished by a design of half-pipe body enabling year-round operation in various industries not only in agriculture. It performs well on difficult terrain, especially during large road projects, in gravel pits (transport of bulk materials, rocks and stones), or in transporting rubble and asphalt. It is a trailer for the most demanding clients who are looking for a trailer with high performance parameters.

Thanks to a low body weight (5.5 t), **T701HP** construction trailer, with a gross total weight of 22 t., ensures a high load capacity of (16.5t). Thanks to the enormous telescopic front cylinder the trailer can easily empty the body in only 30 seconds.



TECHNICAL DATA OF STANDARD EQUIPMENT	PRONAR 1701 HP Haif pip	DE DUMP I KAILEK
Allowable total weight (technically):	25000	[kg]
Permissible total weight:	22000	[kg]

		-
Load capacity:	19100	[kg]
Empty weight:	5900	[kg]
Load volume:	12,5	[m³]
Loading case	halfpipe	
Loading case inside length:	5300	[mm]
Loading case inside width (front/rear):	2250/2300	[mm]
Dimensions: length/width/height:	7570/2550/2840	[mm]
Load height:	2480	[mm]
Loading case inside height:	1250	[mm]
Floor/wall thickness:	6/6 HARDOX 450HB	[mm]
Wheel track:	1960	[mm]
Suspension:	bogie (24t), paraboli	c springs
Hitch-ring load:	4000	[kg]
Tyres:	550/60-22,5	
Maximum speed:	40	[km/h]
Tipping system:	1-side	
Tipping cylinder (piston stroke/oil requirement/working pressure):	4670mm/41L/20	00bar
Tractor power requirement:	125/92	[hp/kW]



Hydraulic foldable drawbar support with cut off valve

Bogie suspension on parabolic springs with 1600mm wheelbase with fixed axles with cross

Tipping angle (backwards):





STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

PRONAR T701 HP Half pipe DUMP TRAILER

Loading case halfpipe type made of HARDOXsteel 450 HB
Trapezoidal shape of the loading case (rear 50mm wider than a front)
Front short extension of the laoding box
Hydraulically driven rear flap with mechanical blockade and rubber gasket
Bogie suspension on parabolic springs with 1600mm wheelbase with fixed axles
with cross section 150x150 equipped in drum brakes 406x140
Chassis frame made of hight strength steel with rectangular closed profiles
300x200 made of heigh strength steel
Chassis frame adapted for mounting the drawbar with a steel spring or with
hydraulic cylinders

hydraulic cylinders
Universal rigid sprung drawbar to couple with lower or upper hitch of the tractor
Drawbar hitch (4t): rotary with Ø50 towing eye to couple with lower hitch of the tractor
Drawbar support: telescopic with 2-section gear
Crank hand brake
Braking system: double line pneumatic with manual braking force control
Rear underrun protection - homologated
Metal wheel covers
Rear plastic mudguards
Wheel chocks + racks (2pcs)
12 V lighting system, LED lights, side clearence lights
Rear lamps with protective grating
Rear hinged apron
Tipping system: hydrauilc
Double-component chemically hardened painting materials, UV-resistant
Tipping frame colour: red RAL3000 PRONAR
Side walls painting colour: yellow RAL1007

Hydraulically sprung drawbar with height adjustment Toolbox

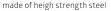
Toolbox
Drawbar hitch (4t): fixed ball-type K80mm to couple with lower hitch of the tractor
Drawbar support: hydraulic foldable with cut off valve
Braking system: single line pneumatic
Braking system: double line pneumatic with ALB (load sense braking system)
Braking system: hydraulic
Plastic tube for documents
Side overrun protection
Tyres 445/65R22.5 (18R22.5)
Tyres 445/65R22.5
Tyres 600/55R22.5
Tyres 600/55R26.5
Tyres 600/55R26.5
Tyres 600/50R22.5 - width of the trailer exceeds 2550 mm

Tyres 600/55R26.5 - width of the trailer exceeds 2550 mm Tyres 650/50R22.5 - width of the trailer exceeds 2550 mm Tyres 700/50-26.5 - width of the trailer exceeds 2550 mm Tyres 710/45-26.5 - width of the trailer exceeds 2550 mm Tyres 710/50R26.5 - width of the trailer exceeds 2550 mm Tyres 710/50R26.5 - width of the trailer exceeds 2550 mm Spare wheels for all sizes (seperately)

Crank hand brake

Warning triangle
Slow moving vehicle sign
Non standard colours according to RAL CALSSIC codes*

Chassis frame made of hight strength steel with rectangular closed profiles 300x200















RONAR TRAILERS T046, T046H	90
RONAR TRAILERS T046/1, T046/2	92



Single axle trailer PRONAR T046 is the smallest cattle trailer in PRONAR's offer. The trailer PRONAR T046 is made of high quality materials, that provide high comfort for transported cattle. A long platform attached on the back of trailer ensure easy cattle loading and unloading. Fixed construction and the proper impregnation of wood elements makes the trailer reliable and failure-free work for many years.

On the T046H model, the body is hydraulically lowered. An extended front hatch is available as an option for the T046, which will take place in the future. The TO46H trailer is equipped with a hydraulically lowered chassis. When loading and unloading the distance from the ground is only 20 cm, and during transport with the raised - 63 cm. Thanks to the lowered system chassis, no ramp is needed



TECHNICAL DATA OF STANDARD EQUIPMENT	T046	T046H
Allowable total weight [kg]	5500	11000
Load capacity [kg]	3700	7850
Empty weight [kg]	1800	3150
Loading space [m²]	9.01*	13,2 *
Loading box inside length [mm]	4160	6290
Loading box inside width [mm]	2360	2240
Dimensions length/width/height [mm]	6100/2515/2780	8320/2550/2860
Sidewall height [mm]	1350	1500
Floor thickness (impregnated wood)/sidewalls (waterproof plywood) [mm]	30/18	4/3
Platform height, measured from the ground [mm]	700	700/200
Wheel track [mm]	2100	2160
Suspension	fixed	hydraulic (single axle)
Hitch-ring load [kg]	600	2000
Tyres	11.5/80 15.3	385/65R22,5
Maximum speed [km/h]	40	40
Minimum tractor power requirement [hp/kW]	28.6/21	41,6/30,6

*surface without inner wheel arches



STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

Platform with screwed walls made of plywood
Sidewalls made of double-side laminated waterproof plywood 18 mm
Rear side manually opened loading platform made of waterproof antisliding plywood
Rigid drawbar integrated with frame to couple with lower
Strings facilitating opening and closing of sliding plywood hitch of the tractor Springs facilitating opening and closing of

Springs facilitating opening and closing or the rear door
Wooden floor impregnated with special deep penetrating waterproof materials
Drawbar towing hitch: rotary with towing eye 50 mm to couple with lower hitch of the tractor
Rectangular chassis frame made of high strength materials

Rectangular chassis frame made of high strength materials Drawbar support: supporting wheel Suspension with fixed axle equiped in drum brake 300x90 Braking system: single or double line pneumatic or hydraulic Crank hand brake 12 V lighting system Loading platform made of waterproof anti-sliding plywood Unfolding side barriers on the loading platform Laced cover frame Wheel choke a galyanized racks

Wheel chocks + galvanized racks
Double-component chemically hardened painting materials, UV-resistant
Platform painting colour: green RAL6010 PRONAR PRONAR

Hydraulically lowered load box for easy loading.
Load box with walls made of profiled steel sheet
Side door (front right) for easy access to transported animals
Rear double-leaf door, swing-open
Tight floor made of a checker plate with exposed drain holes
The chassis frame is welded from rectangular closed steel profiles

Single axle suspension on 2 hydraulic cylinders with semi-axles equipped with drum brakes (406x120)

Hydraulic shock absorber to dampen vibrations while driving

Hydraulic shock absorber to dampen vibrations while driving Universal rigid drawbar for swimming with the bottom or connected to ports Rotary drawbar hitch with 50mm towing eye Drawbar support: telescopic with one-stage gear Braking system: double line pneumatic with manual inertia regulator wan Parking brake with crank 12V lighting installation (combined LED), with clearance lighting Connection equipment spiral, lighting installation Tarpaulin frame with a connecting version. Laced tarpaulin Two wheel chocks placed in galvanized pockets

Two wheel chocks placed in galvanized pockets

The paint system with high corrosion resistance using materials, two-component, chemically hardening painting. providing high durability of coatings,

varnish and UV resistance

Painting color: green RAL6010 PRONAR

T046

awbar towing hitch: fixed upper with 40 mm towing eye (40 km/h version) awbar towing hitch: fixed ball-type K80 mm lequer plate floor (4 mm) with two drainage holes lequer plate floor with two drainage holes covered with 15 mm anti-sliding and damping resin, vered with 15 mm rubber layer.

Interest with Diffinitional layer at the search of the sea

ollywood walls). Loading case with screwed profiled walls made of 2 mm steel. Rear platform made of chequer steel, manually opened with springs that easier opening and closing with additional ledges to protect from sliding. Rear wall - platform made of chequer steel with manually open extension, hydraulically opened with additional ledges protecting against sliding (adopted to a loading case with screwed steel walls). Side door at the front on the right side of the trailer (adopted to a loading case with screwed steel walls).

ver-run brakes (40 km/h version) arking brake with lever

lyres 400/60 15.5 Spare wheel (separately) 11.5/80-15.3 Spare wheel (separately) 14.0/65-16 Spare wheel (separately) 4.00/60-15.5 Warning triangle Warning triangle

The floor is made of checker plate with two drain holes, covered with a safe, non-slip, flexible spout with a thickness of approx. 15 mm
Drawbar hitch: rigid with 40mm towing eye to connect with the upper hitch of the tractor
Drawbar hitch: fixed ball K80 for coupling with the lower hitch of the tractor
Hydraulic scissors drawbar support with cut-off ball valve
Braking system: double line pneumatic with automatic force regulator (ALB)
Hydraulic braking system
Inner partition on the rails (sliding) separating the transported animals

Inner partition on the rails (sliding) separating the transported Fixed internal partition with adjustable position. End gate securing the rear double door Side rails on guides (sliding) to facilitate loading Lighting of the cargo area.

Tube for documents
Spare wheel with bracket and winch on the front wall Wheels with 445 / 45R19.5 tires (trailer width exceeds 2550)
The triangle distinguishing slow, moving valuities.

The triangle distinguishing slow-moving vehicles
Painting colors according to the RAL CLASSIC Color Marking System for industrial applications, by specifying the word: RAL CLASSIC and four numbers from the pattern palette



91 >>>>>> **90** >>>>>> Technique for nature pronar.pl



PRONAR T046/1 is a medium-sized tcattle trailer, that can comfortably heads transport about 10 heads of cattle. It is made of high quality materials, that provide high comfort for transported cattle. A long platform attached on the back of trailer ensure easy loading and unloading of the cattle. Fixed construction and the proper impregnation of wood elements makes the trailer reliable and failure-free work for many years. Perfect for the large livestock farms, trailer **PRONAR TO46/2** is designed for the transportation of cattle.

PRONAR T046/2 is equipped with a hydraulic system of drop-down-system of the body, which allows to lower the rear edge of the floor. Additionally the back wall acts as a bridge with railings. Both of these features make the loading of the cattle or swine easier. The trailer is also equipped with the tilt and turn door at the front of the trailer. Wheel suspension arms propped with cylinders, which are working in system with hydraulic shock-absorber accumulators that are dumping the vibrations of suspension while driving. The trailer is fitted with the devices to prevent the loss of traction drive.

PRONAR T046/1



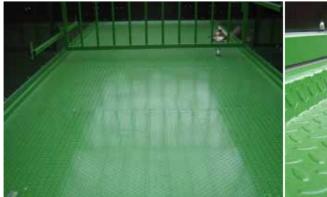


TECHNICAL DATA OF STANDARD EQUIPMENT	T046/1	T046/2
Allowable total weight [kg]	8000	12000
Load capacity [kg]	5360	8500
Empty weight [kg]	2640	3500
Loading space [m²]	14.1	14*
Loading box inside length [mm]	5960	6990
Loading box inside width [mm]	2360	2300
Dimensions length/width/height [mm]	7980/2515/3012	8920/2530/2800
Sidewall height [mm]	1350	1400
Floor thickness (impregnated wood)/sidewalls (waterproof plywood) [mm]	30/18	4/3
Platform height, measured from the ground [mm]	945	660/130
Wheel track [mm]	2100	2200
Suspension	tandem with leaf springs	hydraulic
Hitch-ring load [kg]	1000	1500
Tyres	11.5/80 15.3	14.0/65-16
Maximum speed [km/h]	40	40
Minimum tractor power requirement [hp/kW]	41.6/30.6	65/47.8

To56/1 - Rear wall opened manually, with springs to facilitate opening and closing, with additional wooden edges to prevent slipping











T046/1 checkered steel floor protect against slipping

Tandem suspension on leaf springs

STANDARD EQUIPMENT

T046/1

Platform with screwed plywood walls

Wooden floor pretreated with deep-impregnating agent Sidewalls made of double-side laminated plywood 18 mm

Rear side - platform manually opened made of anti-sliding plywood with springs that easier opening and closing with additional anti-sliding, wooden ledges

Springs facilitating opening and closing of the rear door Rectangular chassis frame made of high strength materials

Rigid drawbar integrated with frame to couple with lower hitch of the tractor

Drawbar towing hitch: rotary with towing eye 50 mm to couple with lower hitch of the tractor

Drawbar support: supporting wheel

Tandem suspension with leaf springs, fixed axles with 1090 mm wheelbase, equiped in drum brakes 300x60

Universal drawbar integrated with frame to couple with upper or lower hitch of the

Drawbar towing hitch: rotary with towing eye 50 mm to couple with lower hitch of

Tandem suspension with 4 hydraulic cylinders fitted with drum brakes Hydraulically lowered loading case facilitating animal (un)loading

Cover frame
Double-component chemically hardened painting materials, UV-resistant.

Braking system: single or double double line pneumatic Crank hand brake $\,$

12 V lighting system Loading platform made of waterproof anti-sliding plywood

Unfolding side barriers on the loading platform

Double-component chemically hardened painting materials, UV-resistant.

Laced cover frame

tractor

Crank hand brake Lighting system

Swinging gull-wing side doors Wide-opening of rear door

Hydraulic vibration shock absorbers

the tractor Drawbar support: mechanic with a winch

Wheel chocks + galvanized racks Platform color: green RAL6010 PRONAR

Sealed chequer plate floor with two drainage holes Braking system: double line pneumatic

Wheel chocks + galvanized racks
Platform painting color: green RAL6010 PRONAR PRONAR

Chassis frame made of steel closed rectangular profiles Sidewalls made of profiles steel 3 mm

Drawbar towing hitch: fixed upper with 40 mm towing eye (40 km/h version)

Drawbar towing hitch: fixed ball-type K80 mm Chequer plate floor (4 mm) with two drainage holes

Chequer plate floor with two drainage holes covered with anti-sliding and damping resin, covered with 15 mm rubber layer

ADDITIONAL EQUIPMENT (OPTIONAL):

Cattle separating inner barrier Rear wall - platform made of anti-sliding plywood with manual extension, hydraulically opened

with additional wooden ledges protecting against sliding Sidewall extension 150mm

Side door at the front on the right side of the trailer (adopted to a loading case with screwed

plywood walls)

Loading case with screwed profiled walls made of 2 mm steel. Rear platform made of chequer steel, manually opened with springs that easier opening and closing with additional ledges to

protect from sliding
Rear wall - platform made of chequer steel with manually open extension, hydraulically opened with additional ledges protecting against sliding (adopted to a loading case with screwed steel

Side door at the front on the right side of the trailer (adopted to a loading case with screwed

Over-run brakes (Permissible Load capacity: 8000kg, 40 km/h version)

Tyres 14.0/65-16

Tyres 400/60 15.5

Spare wheel (separately) 11 5/80-15 3

Spare wheel (separately) 14.0/65-16

Spare wheel (separately) 400/60-15.5

Warning triangle
Non standard colours according to RAL CALSSIC codes

T046/2

Drawbar towing hitch: fixed upper with 40 mm towing eye (40 km/h version)
Drawbar towing hitch: fixed ball-type K80 mm
Drawbar support: hydraulic scissor-type with ball cut-off valve
Side barriers on the loading platform

Chequer plate floor with two drainage holes covered with anti-sliding and damping resin, covered with 15 mm rubber layer

Sidewall extension 150mm

Cattle separating inner barrier

Laced cover

Tyres 400/60 15.5 (trailer width 2605mm)

Spare wheel (separately) 14.0/65-16 Spare wheel (separately) 400/60-15.5

Warning triangle Non standard colours according to RAL CALSSIC codes

T046/1 - The floor of the checkered plate with two drain holes, covered with a safe, non-slip, flexible spout



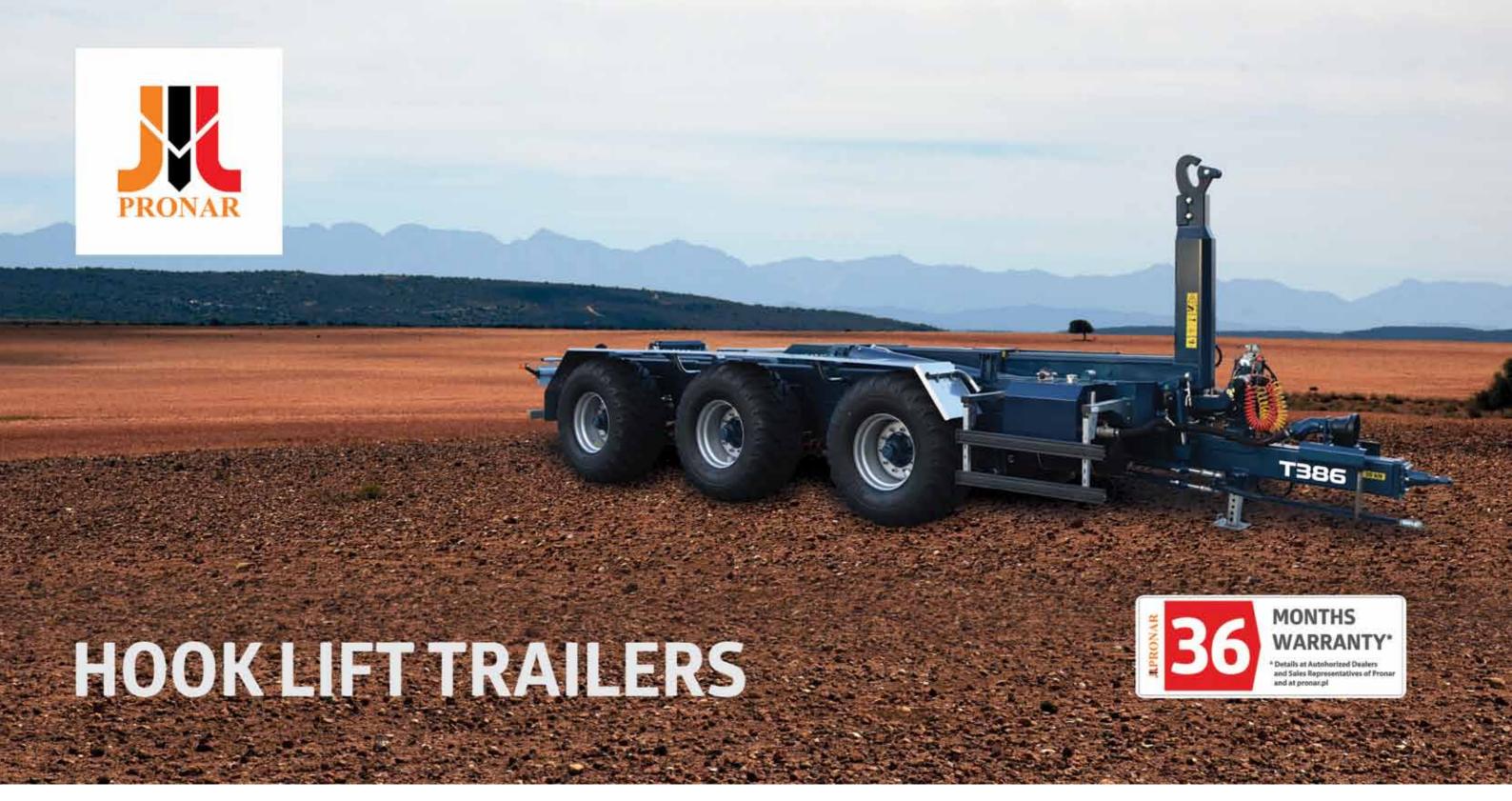
Tandem suspension with 4 leaf springs







92 >>>>>> Technique for nature 93 >>>>>> pronar.pl



RONAR TRAILERS T185, T185/1	90
RONAR TRAILERS T28, T285/1	100
RONAR TRAILER T286	104
RONAR TRAILER T386	10
(001, K002, K003, K004	10

HOOK LIFT TRAILERS & CONTAINERS **PRONAR T185, T185/1**

Universal trailer PRONAR T185, which can be used in agriculture, construction and waste management for the whole year! Perfect solution for the companies and communes that are looking for universal and durable equipment for various tasks related to the maintenance and semi-road works. Trailer PRONAR T185 is designed to handle the agricultural, construction and utilities containers as well as transportation of platforms. High comfort of work provides a mechanism of loading equipped with a hydraulic lock on the suspensions for loading and unloading of the container. The design of the trailer allows you to connect and disconnect the containers and their unloading by tipping backwards which makes this trailer user-friendly and functional.



TECHNICAL DATA OF STANDARD EQUIPMENT	T185 V	/S T185/1
Allowable total weight [kg]	15000	15000
Load capacity [kg]	12130 °	11900 *
Trailer kerb weight [kg]	2870	3100
Lenght without a container [mm]	5940	5940
Lenght with the shortest/longest container [mm]	6415/6782	6180/6780
Width without a container [mm]	2360	2380
Width with a container (min/max) [mm]	2360/2550	2550
Attachement dimensions of the container [mm]		
Hook lenght (min/max) [mm]	1450/1570	1450/1570
Rolls track [mm]	1070	1070
Rolls height [mm]	900	1070
Allowable dimensions of the container		
Lenght (min/max) [mm]	4100 - 4900	4400 - 4900
Width [mm]	max 2550	max 2550
Height [mm]	max 2000	max 2000
Height of the trailer without container [mm]	2512	2770
Container maximum tipping angle/oil requirement/ oil pressure: [°/l/bar]	46/15/200	46/15/200
Wheel track [mm]	1830	1860
Suspension	tandem with trailing arm	tandem with parabolic springs
Hitch-ring load [kg]	2000	2000
Tyres [km/h]	500/50-17 **	500/50-17**
Construction speed [hp/kW]	40	40
Minimum tractor power requirement:	78/57.3	78/57.3

with the weight of the container with recommended lengh, it might be neccesary to move the container backwards while preparing for tipping diagonal tires are destined to standard use in agriculture (not to use on a main roads). For agricultural-indastrial use we recommend radial tires





STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

Iz v ignuing system with side clearence lights
Tool box
Electric steering from tractor's cabin of 3 functions (suspension lock, pivoting frame and hook frame)
Electric steering from tractor's cabin of 4 functions (suspension lock, container lock, pivoting frame and hook frame)
Own hydraulic system with oil container, a pump, transmission and PTO shaft with electric steering of 3 functions from tractor's cabin:
(control of suspension lock, pivoting frame and hook frame)
Own hydraulic system with oil container, a pump, transmission and PTO shaft with electric steering of 4 functions from tractor's cabin:
(control of suspension lock, container lock, pivoting frame and hook frame)
Hydraulic container lock (for the tracotrs with min. 4 hydraulic output pairs) with electrohydraulic safety system
Braking system: hydraulic with mechanical safety valve
Braking system: hydraulic with mechanical safety valve and braking power controller
Braking system: combined (double line pneumatic - hydraulic)
Braking system: combined (double line pneumatic - hydraulic with mechanical safety valve)
Braking system: combined (double line pneumatic - hydraulic with mechanical safety valve)
Braking system: combined (double line pneumatic - hydraulic with mechanical safety valve)
Braking system: combined (double line pneumatic - hydraulic with mechanical safety valve)
Braking system: combined (double line pneumatic - hydraulic with mechanical safety valve)

Drawbar towing hitch: fixed with towing eye Ø40mm to couple with upper tractor transport hitch Drawbar towing hitch: fixed, ball-type K80mm
Drawbar support: telescopic supporting leg with two-step gear
Drawbar support: telescopic supporting leg with a pin
Trailer hook with automatic container lock and regulated hight in 2 positions
Side underrun protection according to 89/297/WE directive
12 V lighting system with side clearence lights
Tool box
Flextric stooring from tractor's cabin of 3 functions (suspension lock pivoting frame and book frame) Tipping frame: rectangular made of closed profiles Tandem suspension with 2 trailing arms and fixed axle shafts equiped in drum brakes 300x135 Drawbar: rigid to couple with lower hitch of the tractor

(transport hitch, piton fix)

(transport hitch, piton fix)
Drawbar towing hitch: rotary towing eye Ø50 (hitch, piton fix)
Drawbar towing hitch: rotary towing eye Ø50 (hitch, piton fix)
Drawbar support: hydraulic straight leg with cut-off valve (it needs permanent or occasional connection with the tractor by single hydraulic line)
Crank hand brake
Hydraulic blocking system of the trailing arm (suspension)
Braking system: double or single line pneumatic or hydraulic
Dear hympac with manual catting in 2 nexitions (donand on

Rear bumper with manual setting in 2 positions (depends on length of the container)

Lighting system 12 V without side clearence lights Rear lamps with protective grating Steel mudguards over the wheels Wheel chocks + racks

Hydraulic reloading system with manual switch winch / tipper Trailer requires a tractor with three pairs of hydraulic outputs (control of suspension lock, pivoting frame and hook frame) Chemically hardened two-component painting materials , UV-

Tipping frame colour: red RAL3000 PRONAR

Tyres 385/55 R22.5 Spare wheel 500/50-17 (separately) Spare wheel 520/50-17 (separately) Spare wheel 385/55 R22,5 (separately)

Spare wheel 385/55 R22.5 RE (separately)

Spare wheel 385/55 R22.5 RE (separately)
Warning triangle
Additional pair of hydraulic outlets at the back (to supply hydraulic backwall of the container) and additional pair of hydraulic outlets located on the hook
Non standard colours according to RAL CALSSIC codes *
*doesn't aply fo units on stock

T185/1

Tandem suspension with 4 parabolic springs, axle base 1325mm. with fixed axles), drum brakes 300x135mm

Tassamm, with Tixed axies), drum brakes 300x135mm Drawbar, rigid to couple with lower hitch of the tractor (transport hitch, piton fix) Drawbar towing hitch: rotary towing eye Ø50 (hitch, piton fix) Drawbar support: hydraulic straight leg with cut-off valve (it needs permanent or occasional connection with the tractor by circle by depails (inc.) single hydraulic line)

Braking system: double line air with manual braking power

control
Crank hand brake
Trailer hook regulated hight in 2 positions (1450mm/1570mm)
with automatic container lock
Hydraulic reloading system with manual switch winch / tipper
Hydraulic instalation of the hook frame - tilt cylinder
Trailer requires a tractory with three pairs of bydraulic outputs.

Hydraulic instalation of the nook frame - Lit Cylinder
Trailler requires a tractor with three pairs of hydraulic outputs
(control of suspension lock, pivoting frame and hook frame)
Lighting system 12 V (LED) with airtight connection, with side
clearence lights
Rear lamps with protective grating
Wheel chocks - racks
Steel mudguster ever the wheels

Steel mudguards over the wheels

Steel mugguards over the wheels Rear bumper (homologated) with manual setting in 2 positions (depends on length of the container) Chemically hardened two-component painting materials, UV-resistant Tipping frame colour BLACK RAL 9005 PRONAR

Drawbar towing hitch: fixed with towing eye Ø 40mm to couple with upper tractor transport hitch
Drawbar towing hitch: fixed, ball-type k80mm
Drawbar support: telescopic supporting leg with two-step gear
Drawbar support: telescopic supporting leg with a pin
Hydraulic switching between hook/tipper integrated with hydraulic container lock, with electro-hydraulic safety system, for containers
made acc. to norm DIN 30722 - controlled independently - for the tracotrs with min. 4 hydraulic output pairs)
Electric steering from tractor's cabin of 5 functions (suspension lock, switching between hook/tipper integrated with container lock,
pivoting frame and hook frame)
Own hydraulic system with oil container, a pump, transmission and PTO shaft with electric steering of of 5 functions (suspension lock,
switching between hook/tipper integrated with container lock, pivoting frame and hook frame)
Additional pair of hydraulic outlets at the back (to supply hydraulic backwall of the container) - it needs additional pair of hydraulic outlets at the tractor
Additional pair of hydraulic outlets at the back (to supply hydraulic backwall of the container) and additional pair of hydraulic outlets
Braking system: double line air with ALB (automatic braking power control)
Braking system: hydraulic

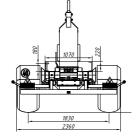
Braking system: hydraulic

Rear outlets of braking system for second trailer Two flashing lights at the back Tube for documents

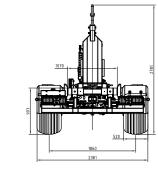
Tool hox

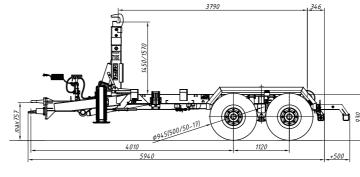
Tool box
Side underrun protection according to 89/297/WE directive
Plastic mudguards (behind the rear wheel and in front of the front wheel)
Aluminium mudgards
Rear manual hitch
Rear hitch, amortized
Tyres 500/508-17
Tyres 520/50-17
Tyres 385/55 R22.5 RE
Tyres 385/55 R22.5 RE
Tyres 385/55 R22.5 RE
Tyres wheel 500/50-17 (separately)
Spare wheel 500/5017 (separately)
Spare wheel 520/50-17 (separately)
Spare wheel 320/50-17 (separately)
Spare wheel 385/55 R22.5 (separately)
Spare wheel 385/55 R22.5 (separately)
Warning triangle Warning triangle
Non standard colours according to RAL CALSSIC codes *

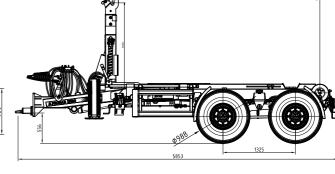
PRONAR T185



PRONAR T185/1







97 >>>>>> 96 >>>>>> Technique for nature pronar.pl

Main differences between PRONAR T185/1 and PRONAR T185



Common features of PRONAR T185/1 and PRONAR T185





Hydraulic container lock

Air tank for pneumatic braking system





ditional pair of hydraulic outlets located on the hook

Hook-tipper switching actuator







Side clearence lights



Drawbar support: hydraulic straight leg with cut-off valve

Hook frame with actuator

Tool box

98 >>>>>> Technique for nature pronar.pl 99 >>>>>>

HOOK LIFT TRAILERS & CONTAINERS

PRONAR T285, T285/1



Universal **PRONAR T285** trailer, which can work for the whole year in agriculture, construction and waste management! The ideal solution for companies and municipalities that seek universal and durable equipment for various tasks associated with maintaining cleanliness and for road works. Hook lift trailer PRONAR T285 which can be used all year round in agricultural, construction waste disposal industry. That's an ideal solution for firms and communes which are looking for a universal and long-lasting equipment to handle various activities amid at keeping the surrounding neat and clean as well as road-ground actions.

Universal **PRONAR** trailer **T285/1**, which can be used throughout whole year in agriculture, construction and waste management. The perfect solution for companies and municipalities, that are looking for universal and durable equipment for various tasks.

Trailer **PRONAR T285/1** has greater load capacity (increased about 2 tons) which was achieved by introducing a wider axle system, which is 1810 mm. Trailer is made of closed steel profiles to provide excellent durability. Rear steered axle in tandem suspension additionally has a positive influence on reducing turf's destruction as well as reduced tyres wear and fuel consumption.





TECHNICAL DATA OF STANDARD EQUIPMENT	T285 VS	T285/1
Allowable total weight [kg]	21000	23000
Load capacity [kg]	16360 °	17760*
Trailer kerb weight [kg]	4640	5240
Lenght without a container [mm]	7313	7313
Lenght with the shortest/longest container [mm]	7413/8413	7413/8413
Width without a container [mm]	2550	2550
Width with a container (min/max) [mm]	2550	2550
Attachement dimensions of the container [mm]		
Hook lenght (min/max) [mm]	1450/1570	1450/1570
Rolls track [mm]	1070	1070
Rolls height [mm]	1150	1180
Allowable dimensions of the container		
Lenght (min/max) [mm]	5400/6400	5400/6400
Width [mm]	max 2550	max 2550
Height [mm]	max 2500	max 2500
Height of the trailer (without/with) container [mm]	2981/3650**	2981/3650**
Container maximum tipping angle/oil requirement/ oil pressure: [°/l/bar]	53/18/200	53/18/200
Wheel track [mm]	1990	2000
Suspension	tandem with trailing arm	parabolic springs
Hitch-ring load [kg]	3000	3000
Tyres [km/h]	385/65 R22.5 RE	445/65 R22,5 RE
Construction speed [hp/kW]	40	40
Minimum tractor power requirement:	110/80.8	125/92

with the weight of the container with recommended length, it might be neccesary to move the container backwards while preparing for tipping with container height 2500 mm







100 >>>>>> Technique for nature

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

Tipping frame: rectangular made of closed profiles Tandem suspension with 2 trailing arms and fixed axle shafts equiped in drum brakes 406x140mm

Drawbar: rigid, to couple with lower hitch of the tractor

(transport hitch, piton fix)
Drawbar towing hitch: rotary towing eye Ø50 (hitch, piton fix)
Drawbar support: hydraulic straight leg with cut-off valve (it needs permanent or occasional connection with the tractor by single hydraulic line)
Hydraulic blocking system of the trailing arm (suspension)
Braking system: double line pneumatic or single line pneumatic or hydraulic
Crank hand brake
Rear humper with manual setting in 3 positions (depends on the strain of the strain of

Crain Nand Drake
Rear bumper with manual setting in 3 positions (depends on length of the container)
12 V lightening system with side clearence lights
Rear lamps with protective grating
Steel mudguards over the wheels
Wheel chocks + racks
Machanical containers look for containers made in acc. to DIN.

Mechanical container lock (for containers made in acc. to DIN

30722) with possibllity to change the position depending on length of the container

lengtn of the container
Hydraulic reloading system with manual switch winch / tipper
Trailer requires a tractor with three pairs of hydraulic outputs
(control of suspension lock, pivoting frame and hook frame)
Trailer hook with automatic container lock and regulated
height in 2 positions (adaptation for containers acc. to DIN
30722 and acc. to SS 3021)

Chemically hardened two-component painting materials, UV-

Tipping frame colour: red RAL3000 PRONAR

Drawbar towing hitch: fixed with towing eye Ø40mm
Drawbar towing hitch: ball-type K80mm
Drawbar towing hitch: fixed with towing eye Ø50mm (hitch, piton fix)
Drawbar support: telescopic supporting leg with two-step gear
Drawbar support: telescopic supporting leg with a pin
Side underrun protection
Plastic mudguards

Plastic mudguards
Hydraulic container lock connected to suspension lock (for the tracotrs with min. 3 hydraulic output pairs), with electrohydraulic safety hydraulic container lock controlled independently (for the tracotrs with min. 4 hydraulic output pairs), with electrohydraulic safety

Electric steering from tractor's cabin of 4 functions: container lock, suspension lock, pivoting frame and hook frame)
Separate hydraulic system with oil container, a pump, transmission and PTO shaft with electric steering from tractors cabin of 4 functions: suspension blockage, container lock, pivoting frame and hook frame)
Mechanical container lock for containers acc. to \$5 3021
Braking system: combined (double line pneumatic + hydraulic)
Additional pair of hydraulic outlets at the back (to supply hydraulic backwall of the container)
Rear outlets of braking system for second trailer
Rear annual hitch, amortized
Rear automatic hitch R0°400A4600
Tool box
Tyres 385/65R22.5
Tyres 425/65R22.5
Tyres 425/65R22.5 ectric steering from tractor's cabin of 4 functions: container lock, suspension lock, pivoting frame and hook frame)

yres 445/65R22.

Tyres 445/65R22.5
Tyres 500/60R22.5
Tyres 500/50-22.5 - Trailer width over 2550mm
Tyres 600/50R22.5 - Trailer width over 2550mm
Tyres 620/50R22.5 (trailer width over 2550mm)
Spare wheel (separately) 385/65 R22.5 RE
Spare wheel (separately) 385/65 R22.5
Spare wheel (separately) 425/65 R22.5
Spare wheel (separately) 45/65 R22.5
Spare wheel (separately) 500/60 R22.5
Spare wheel (separately) 500/60 R22.5
Spare wheel (separately) 600/50-22.5
Spare wheel (separately) 600/50-22.5
Spare wheel (separately) 600/50-22.5
Spare wheel (separately) 600/50-22.5
Warning triangle

Warning triangle

Additional pair of hydraulic outlets at the back (to supply hydraulic backwall of the container) and additional pair of hydraulic outlets

Non standard colours according to RAL CALSSIC codes * * doesn't aply fo units on stock

T285/1

Tipping frame: rectangular made of closed profiles Tandem suspension with 4 parabolic springs, axle base 1810mm, with fixed front axle and passively steered rear axle, drum brakes 406x140mm, with hydraulic turning angle lock (it needs permanent connection with the tractor by one pair

hydraulic outputs) Axles for 60 km/h

Axles for 60 km/h
Drawbar: fixed to couple with lower hitch of the tractor
(transport hitch, piton fix)
Drawbar towing hitch: rotary towing eye Ø50 (hitch, piton fix)
Drawbar support: hydraulic straight leg with cut-off valve (it
needs permanent or occasional connection with the tractor by single hydraulic line)

single hydraulic line)
Braking system: double line pneumatic or hydraulic
Crank hand brake
Rear bumper with manual setting in 3 positions (depends on
length of the container)
Lighting system 12 V with side clearence lights
Rear lamps with protective grating
Plastic mudguards
Wheel chocks + racks

wheel chocks - racks
Central hydraulic system with electro-hydraulic safety system
controlled by tractor's hydraulic divider (for tractors with 3
pairs of hydraulic outputs). Functions - suspension blockage,
hydraulic container lock, hydraulic tipping with hydraulic
switch winch/tipper with light signal, hydraulic hook arm
Trailer hook, with autpmatic container lock and regulated

Trailer hook with automatic container lock and regulated height in 2 positions (adaptation for containers acc. to DIN 30722 and acc to SS 3021)

Chemically hardened two-component painting materials , UV-

Tipping frame colour: red RAL3000 PRONAR

Drawbar towing hitch: rotary with towing eye Ø40mm
Drawbar towing hitch: ball-type K80mm
Drawbar towing hitch: fixed with towing eye Ø50mm (hitch, piton fix)
Drawbar support: telescopic supporting leg with two-step gear
Drawbar support: telescopic supporting leg with a pin

Side underrun protection

Braking system: double line pneumatic with ALB (automatic braking power control)

Braking system: combined (double line pneumatic + hydraulic)
Braking system: combined (double line pneumatic + hydraulic)
Braking system: combined (double line pneumatic + hydraulic with electrical safety valve and braking power controller)
Rear couplings of braking system for second trailer
Rear manual hitch, amortized
Rear automatic hitch RO*400A4600

Electric steering from tractor's cabin of Central Hydraulic System (hydraulic system needs 1 pair of hydraulic couplings)
Electric steering from tractor's cabin of Central Hydraulic System and rear couplings (hydraulic system needs 1 pair of hydraulic

couplings)
Additional pair of hydraulic outlets at the back (to supply hydraulic backwall of the container)

Additional pair of hydraulic outlets at the back (to supply hydraulic backwall of the container)
Suspension stabilizer (set for one axle)
Steel mudguards
Own hydraulic system with oil container, a pump, transmission and PTO shaft with electric steering of 3 functions from tractor's cabin: suspension blockage, pivoting frame and hook frame)
Own hydraulic system with oil container, a pump, transmission and PTO shaft with electric steering of 3 functions from tractor's cabin: suspension blockage, pivoting frame and hook frame) and rear outlets for second trailer

Tyres 500/60R22.5

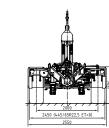
Гyres 560/60R22,5 Tyres 600/55-22.5 − Trailer width over 2550mm

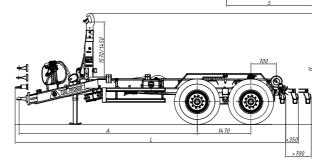
Tyres 600/50R22,5 - Trailer width over 2550mm Tyres 620/50R22,5 - Trailer width over 2550mm

Tyres 620/50R22.5 - Trailer width over 2550mm
Spare wheel (separately) 445/65 R22.5
Spare wheel (separately) 500/60 R22.5
Spare wheel (separately) 550/60-22.5
Spare wheel (separately) 560/60-R22.5
Spare wheel (separately) 600/55-22.5
Spare wheel (separately) 600/55-22.5
Spare wheel (separately) 600/55-22.5
Spare wheel (separately) 600/55-22.5
Spare wheel (separately) 600/50 R22.5
Spare wheel (separately) 600/50 R22.5 located on the hook

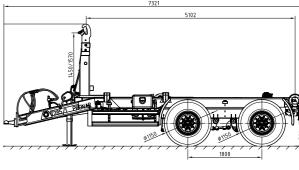
Non standard colours according to RAL CALSSIC codes * *doesn't aply fo units on stock







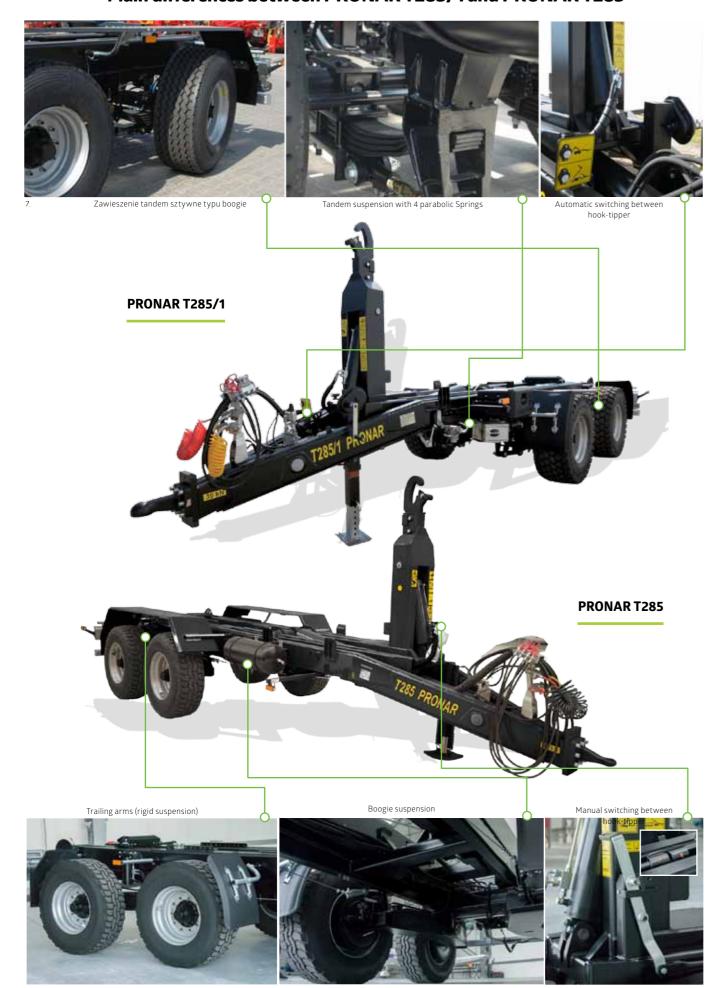
PRONAR T285



PRONAR T285/1

101 >>>>>>

Main differences between PRONAR T285/1 and PRONAR T285



Common features of PRONAR T285/1 and PRONAR T285







Drawbar support: telescopic supporting leg with two-step Hydraulic blocking system of the trailing arm (suspension)









Drawbar support: hydraulic straight leg with cut-off valve







Side underrun protection

Pairs of hydraulic and pneumatic outlets at the back



Rear bumper with manual setting in different positions (depends on length of the container)

102 >>>>> Technique for nature 103 >>>>>> pronar.pl

HOOK LIFT TRAILERS & CONTAINERS

PRONAR T286



Hook lift trailer Pronar T286 is a versatile product that can be applied to various works in agricultural, construction, municipal, forestry or horticulture. Purchasing this trailer is a great saving for a farmer which is gained from the single chassis which is used and multiple bodies which are made based on hook container's frame. PRONAR T286 has the features that greatly enhance its functionality and range of use.



TECHNICAL DATA OF STANDARD EQUIPMENT	T286
Permissible total weight (technically) [kg]	23000
Permissible total weight [kg]	23000
Load capacity [kg]	17100
Weight [kg]	5900
Lenght without a container [mm]	7870
Lenght with the shortest/longest container DIN30722-1 [mm]	7870 / 8940
Width w-ithout a container [mm]	2550
Width with a container (min/max) [mm]	2550
Attachement dimensions of the container: Hook lenght: (min/max) [mm] Rolls track [mm]	1450/1570 1070
Permissible dimensions of the container: Lenght (min/max) [mm] Lenght inside (min/max) [mm] Width [mm] Height [mm] Space under floor [mm]	5400/6900 5000/6500 max. 2550 max. 2000 min. 150
Height of the trailer without the container [mm]	3080
Rolls height [mm]	1230
Container maximum tipping angle/oil requirement [°/l]	50/25
Wheel track [mm]	2000
Suspension	parabolic springs
Hitch-ring load [kg]	3000
Tyres	445/65R22.5
Construction speed [km/h]	40
Minimum tractor power requirement [KM/kW]	125/92



STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T286

Chassis frame: rectangular made of closed profiles
Tandem suspension with 4 parabolic springs, axle base 1810mm, with fixed front axle and passively steered rear axle, drum brakes 406x140mm, with hydraulic turning angle lock (it needs permanent connection with the tractor by one pair of hydraulic outputs)
Axles for 60 km/h
Drawbar with hydraulic amortization and fluent height adjustment to couple with hitch, piton fix, transport hitch, ball-type
Drawbar: fixed to couple with lower hitch of the tractor (transport hitch, piton fix)
Drawbar towing hitch: rotary towing eye Ø50 (hitch, piton fix)
Drawbar support: hydraulic straight leg
Hydraulic rear bumper
Lighting system 12 V with side clearence lights, rear electric socket, LED lamps, hermetic conections
Rear lamps with protective grating
Steel mudguards over the wheels
Braking system: double/single line pneumatic or hydraulic
Central hydraulic system with electro-hydraulic safety system electrically controlled (system needs permanent connection with the tractor by one pair of hydraulic outputs). Functions - suspension blockage, hydraulic container lock, hydraulic tipping (2 cylinders), automatic switching hook/tipper with light signal, telescopic hook arm hydraulically controlled, rear bumper hydraulically controlled, control of the one pair of hydraulic outputs at the back of the trailer (fee. to connect hydraulic backwall of the container or hydraulic tupping system of the second trailer), software with safeguard which do not allow to start incorrect function
Trailer hook with automatic container lock and regulated height in 2 positions (adaptation for containers acc. to DIN 30722-1 and acc. to SS 3021)
Wheel chocks + racks
Crank hand brake
Chemically hardened two-component painting materials, UV-resistant

Chemically hardened two-component painting materials . UV-resistant

Tipping frame colour red RAL3000 PRONAR

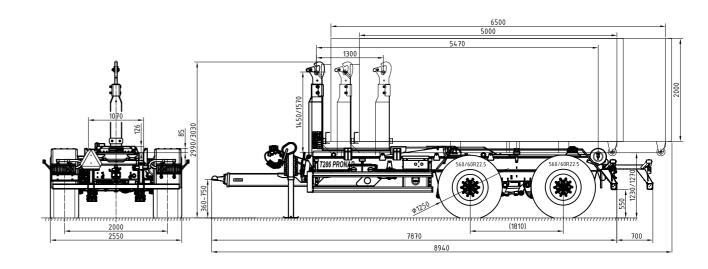
Drawbar towing hitch: fixed with towing eye Ø40mm
Drawbar towing hitch: ball-type K80mm
Drawbar towing hitch: fixed with towing eye Ø50mm (hitch, piton fix)
Drawbar support: hydraulic folded leg
Drawbar support: telescopic supporting leg with two-step gear
Side undergun protection

Side underrun protection

Tool box
Braking system: double line pneumatic with ALB (automatic braking power control)
Rear couplings of braking system for second trailer
Additional pair of hydraulic outlets located on the hook
Rear manual hitch, amortized
Rear automatic hitch R0*400A4600

Rear automatic nitch RO 400A4600 Plastic mudguards Tyres 500/60R22.5 Tyres 560/60-22.5 Tyres 560/60R22.5 Tyres 600/552.25 - Trailer width over 2550mm Tyres 620/50R22.5 - Trailer width over 2550mm Tyres 620/50R22.5 - Trailer width over 2550mm

Tyres 620/50R22,5 - Trailer width over 2550mm
Spare wheel 445/65 R22.5 (separately)
Spare wheel 500/60 R22.5 (separately)
Spare wheel 550/60-72.55 (separately)
Spare wheel 550/60-72.55 (separately)
Spare wheel 560/60-782.5 (separately)
Spare wheel 600/55-22.5 (separately)
Spare wheel 600/50 R22.5 (separately)
Spare wheel 600/50 R22.5 (separately)
Warning triangle
Air suspension
Non standard colours according to RAL CALSSIC codes *
Aluminium riffled mudguards
Rubber mudflap at the back over the entire width of the trailer
Braking system: combined (double line pneumatic with ALB + hydraulic)



104 >>>>>> Technique for nature 105 >>>>>> pronar.pl

HOOK LIFT & CONTAINERS

PRONAR T386



Hook trailer PRONAR T386 can be used for many different tasks in many areas of the economy like agriculture, construction, municipal or orchards. It can be used throughout the year and regardless of weather conditions. It is a practical way to collect, transport, and emptying various types of containers with a length from 5 to 7.5 m -both box containers, tanks, platforms, tippers and many others. Multifunctional trailer has hundreds of applications and the direct effect is higher productivity, lower investment and operating costs.



TECHNICAL DATA OF STANDARD EQUIPMENT	T386
Allowable total weight (technically) [kg]	34000
Allowable total weight [kg]	33000
Loading capacity (including container weight) [kg]	25000
Empty weight [kg]	8000
Lenght without a container [kg]	8590
Width without a container [mm]	2550
Width with a container [mm]	2550
Allowable dimensions of the container - hook lenght (min/max) [mm] - rolls track [mm] -internal lenght [mm] - external lenght [mm] - internal lenght [mm]	1450/1570 1060 5000/7500 max. 2550 max. 2500
Height of the trailer (without container) [mm]	3030
Container maximum tipping angle [°]	52
Wheel track [mm]	2100
Suspension	Tridem, parabolic springs (1810 mm axle base)
Hitch-ring load [kg]	3000
Tyres	445/65R22,5
Construction speed [km/h]	40
Minimum tractor power requirement [HP/kW]	182/133,8



entral hydraulic system with own oil tank



Pair of hydraulic sockets, electric socket and rear hitch at the back

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL)

T386

Chassis frame: rectangular made of closed profiles

Drawbar with hydraulic shock absorption cylinder with stepless height adjustment Drawbar towing hitch: rigid K80mm to couple with ball type hitch of the tractor

Drawbar support: telescopic supporting leg with two-step gear

Tridem suspension with 1810 mm axle base with fixed middle axle and active steering of front and rear

axles, drum brakes 400x140. Braking system: double line pneumatic with automatic regulation of braking force (ALB) or hydraulic Rear bumper with hydraulic control

Lighting system LED with clearence lights Plastic or steel mudguards

Central hydraulic system with own hydraulic tank, hydraulic pump driven by PTO shaft, with electrohydraulic security system powered by wires.

It controls functions:

- hydraulic tipping with 2 cylinders - hydraulic switch tipper / hook trailer - hydraulic telescopic hook's frame

hydraulic suspension lock

 hydraulic lock of the container
 control of the one pair of hydraulic outputs at the back of the trailer (f.e. to connect hydraulic backwall of the container or hydraulic tipping system of the second traile - hydraulic rear bumper

Light indicator on the control panel indicating the on-line features of the central hydraulic system
Trailer hook with automatic container lock and regulated height in 2 positions (adaptation for containers

acc. to DIN 30722-1) Wheel chocks + racks (2 pcs)

Chemically hardened painting materials, UV-resistant Chassis color red RAL3000 PRONAR

Drawbar towing hitch: rotary with towing eye Ø50mm (hitch, piton

Drawbar support: hydraulic folded leg Braking system: double line pneumatic with manual braking force

Rear automatic hitch Rockinger RO*400B4600

Rear hitch manual Spare wheel (separately) 445/65 R22,5

Spare wheel (separately) 500/60 R22,5 Spare wheel (separately) 550/60-22,5

Spare wheel (separately) 560/60 R22,5 Spare wheel (separately) 600/55-22,5

Spare wheel (separately) 600/50 R22,5 Spare wheel (separately) 620/50 R22,5 Tyres 500/60 R22,5 Tyres 550/60-22,5

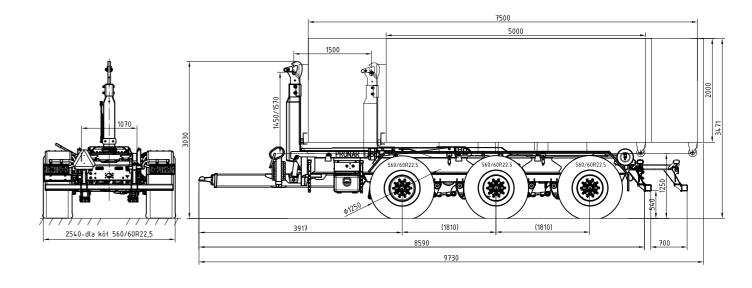
Tyres 550/60-22.5 Tyres 560/60 R22,5 Tyres 600/55-22,5 Trailer width over 2550mm Tyres 600/50 R22,5 Trailer width over 2550mm Tyres 620/50 R22,5 Trailer width over 2550mm

Aluminium riffled mudguards
Additional pair of hydraulic outlets located on the hook

Rubber mudflap at the back over the entire width of the trailer

Side underrun protection

Non standard colours according to RAL CALSSIC codes *



107 >>>>>> **106** >>>>>> Technique for nature pronar.pl



K001, K002, K003, K004



PRONAR container **KO01** offers more than 15m³ of load volume and is designed for agricultural use. Construction of this container is additionally reinforced by steel C profiles. Functionality is increased by using of rear double-door with central lock. In combination with hook trailer this container is an excellent tool which offers versatility and high quality workmanship.

PRONAR container **KOO2** offers 7,4m³ of load volume and it is one of the four proposals. In combination with hook trailer this container is an excellent tool for work in construction, transport, agriculture and municipal services. Special reinforcements of walls have been adapted to work in hard conditions. Thanks to the increased thickness of components is very robust and is ideal for transporting rubble. **PRONAR** container **KOO3** is designed to work with hook trailers. It can be used to transport heavy materials, debris, stone, gravel. Opened construction with increased thickness allows to use this container by construction companies, especially thanks to wear-resistant steel used in

PRONAR container **K004** offers more than 26m3 of load volume and it is the largest container in PRONAR offer. Thanks to reinforcements it is very robust, capacious and is ideal for transporting grain, leafs and wood chips. Functionality is increased by using of rear double-door with central lock. In combination with hook trailer this container is an excellent tool to work in agriculture, construction, transport and municipal services.

PRONAR KO 01

PRONAR KO 02

PRONAR KO 04







TECHNISCHE DATEN	Container K001	Container K002/K003	K004
Allowable total weight [kg]	12000	12000	16000
Load capacity [kg]	10450	10560	13500
Empty weight [kg]	1550	1440	2500
Load volume [m³]	15.1	7.4	26,45
Loading space [m²]	10.92	10.92	13,22
Internal container lenght [mm]	4560	4560	5750
Internal container width [mm]	2395	2392	2300
Internal container height [mm]	1405	700	2000
Dimensions: length/width/height [mm]	5017/2506/1762	5004/2550/1562	6198/2512/2341
Floor/wall thickness [mm]	4/3	6/4	5/3
Platform height, measured from the ground [mm]	294	296	295
Wheel track [mm]	2058	2058	2160
Stringer's track [mm]	1060	1060	1065
Distance of the container blockade to the hook handle [mm]	3540	3540	3515
Hook handle height [mm]	1450	1450	1570

STANDARD EQUIPMENT

	·
	K001
	Sidewalls made of C-profiles Double-wing tailgate with central locking mechanism Chemically hardened painting materials , UV-resistant.
	K002
•	Sidewalls made of C-profiles One-wing tailgate opened downwards or to the right and swinging upwards Chemically hardened painting materials , UV-resistant.
	K003
	Sidewalls, floor and tailgate made of abrasion-resistent steel Sidewalls made of C-profiles One wing tailgate opened downwards or to the right and swinging upwards Chemically hardened painting materials , UV-resistant.

K004

- Sidewalls made of C-profiles
- Central opening of a double-wing tailgate
- Addictional locking system of the tailgate
- Chemically hardened painting materials, UV-resistant.
- Paintwork: green RAL 6010 PRONAR





MANURE SPREADERS PRONAR N161, N162/2, N262 , N262/1, N262/2	112
MANURE SPREADERS PRONAR NV161/1, NV161/2, NV161/3, NV161/4, NV161/5	118

PRONAR N161, N162/2, N262, N262/1, N262/2

Excellent choice for small farms. One axle PRONAR manure spreader N161 with 6 tons of loading capacity is the smallest in our offer. Screwed spreading blades making them easily changed. Construction of loading box allows fast opening of side walls. Unloading system consist four chains made of wear-resistant steel connected to crossbars.

PRONAR manure spreader **N162/2** with 10 tons of load capacity is perfectly suited for medium and big farms. As an option you may choose adapter with 2 vertical beaters. Movable parts are covered by tiltable cover. Tandem suspension with Tyres 550/50-22.5 reduce pressure on the

PRONAR manure spreader N262 with 12 tons of load capacity is perfectly suited for medium and big farms. Adapter's efficiency is 4m³/min and its spreading width is from 12 up to 25m. Stiff and reliable construction allows to spread all kinds of manure, lime, peat, compost, sewage sludge and pasty materials. Amortized tandem suspension with wide tyres reduce pressure on the soil.

PRONAR manure spreader N262/1 is the biggest in our offer. Stiff and reliable construction allows to spread all kinds of manure, lime, peat, compost, sewage sludge and pasty materials. Loading box with side walls 1265 mm of height has 14m3 of load volume. Conveyor has been reinforced and it consists of 4 chains, chain link 14 mm of thickness. Adapter's efficiency is 4m³/min and its spreading width is from 12 up to 25m.

The **PRONAR N262/2** manure spreader allows spreading of manure, peat, compost and lime with a capacity of 4 m3 / min. Achieving optimal performance requires the use of a 170HP trailer. The N262/2 load box is made in the form of a shell permanently welded to the backrest frame, which is a very reliable and reliable structure. The whole rests on a tandem suspension with parabolic springs. On request, the N262 / 2 spreader can also be made with passively steered rear steering axle and hydraulic turning lock system, with electronic smooth control of the floor conveyor directly from the cabin and with extensions increasing the capacity of the load box.







Horizontal spreading adapte PRONAR N161

PRONAR N262/1 - Adapter AH20 with two wide spreading, balanced plates

TECHNICAL DATA OF STANDARD EQUIPMENT	N161	N162/2	N262	N262/1	N262/2
Allowable total weight [kg]	8200	15100	18660*	21200*	22000*
Load capacity [kg]	6000	10140*	12000**	14000*	14800**
Empty weight [kg]	2200	4960**	6660	7200**	7600
Load volume [m³]	4.1	9	11.3	14	18
Loading space [m²]	7.6	8.5	8.9	11,1	11,1
Internal lenght of Loading space [mm]	4000	4400	4500	5600	5600
Internal width of Loading space [mm]	1900	1930	trapezoid 1955/1995	trapezoid 1955/1995	1955/1995
Length [mm]	5780	7455	8000	9000	8780
Width [mm]	2230	2440	2510	2550	2540
Height [mm]	2750	3285	3740	3740	3450
Sidewall height [mm]	600	1040	1265	1265	1200/ nadstawa 300
Floor/wall thickness [mm]	3/2,5	3/3	4/3	4/3	4/3
loading height [mm]	1750	2350	2800	2800	2800
Wheel track	1660	1820	1900	1940	1940
Suspension	Single axle, fixed	tandem – parabolic springs	tandem – parabolic springs	tandem – parabolic springs	tandem – parabolic springs
Hitch-ring load [kg]	1500	2100	2200	2200	4000
Tyres	500/50-17	500/50-17	550/60-22.5	600/50-22.5	600/55-22,5
Construction speed [km/h]	25	25	40	40	40
PTO range [rpm]	540	1000	1000	1000	1000
Minimum tractor power requirement/adaptor type [hp/kW]	68/50	105/77,2	127.3/93.6	147.4/108.3	170/125
Adapter type/max spreading width [-/m]	AH21/2.4	AV40/6	AH20/25	AH20/25	AV20(20183)

construction parameters allowable, homologation parameters may be different from those given

emptu weight is different in the case of non-standard implementation



113 >>>>>> **112** >>>>>> Technique for nature

PRONAR N161, N162/2, N262, N262/1, N262/2



STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

Rigid drawbar for connecting to the upper tractor hitch
Drawbar towing hitch: fixed with towing eye Ø40mm
PTO shaft standard Z21 with overload clutch
PTO shaft wide-angle 6x21 with overload clutch
PTO shaft wide-angle 6x6 with overload clutch
PTO shaft wide-angle 6x6 with overload clutch
Spare wheel (separately)
Triangle for slow moving vehicles
Axles 40 km/h (Permissible total weight 8200 kg, only with double line pneumatic brakes)
Non standard colours according to RAL CALSSIC codes*
Single line pneumatic braking system

N161

Walls: made of high quality, strong, laser welded profiles PF600mm, made of profiled sheets, with forged hinges and locks
Load box with swinging opening system of side wall (walls open downwards)
Suspension: fixed single axle
AH21 adapter with 2 horizontal beaters
Chain conveyor with two 11mm chains of high quality steel, with hydraulic drive and stepless speed regulation
Rigid drawbar for connecting to the tractor's lower hitch
Drawbar towing hitch: rotary with towing eye ø50mm
Drawbar towing hitch: rotary with towing eye ø50mm
Drawbar support: straight with folded steel wheel
Hydraulic control from the tractor distributor (smooth regulation shift of conveyor)
Double line pneumatic braking system with manual braking force regulator
Support weel for the drawbar
Braking system: double line pneumatic or hydraulic
Lighting system 12V (light builb)
Parking brake with crank
Wheel clocks - galvanteed racks (2pcs)

Parking brake with crank
Wheel chocks + galvanized racks (2pcs)
Rear lighting lamp with protection grates
Spiral connection cable of the lightning installation
Front protective mesh
PTO shaft- standard Z6 with an overload clutch
Chemically hardened two-component painting materials , UV-resistant
Coloring of the frame and wall painting, green RAL6010 PRONAR

Colour for spreading adapter red RAL3000 PRONAR

N162/2

Tandem suspension on 4 parabolic springs, compensatory control arm, with rigid

axles
Monocoque loading case
Holes in the front wall of the load box
AV40 adapter with 4 vertical beaters
Wooden protective strip on the upper edge of the load box
Chain conveyor with four 14mm chains of high quality steel, with hydraulic drive and

Chain conveyor with four 14fm chains of high quality steel, with high auticulive stepless speed regulation
Drawbar type: universal fixed to couple with lower or upper hitch of the tractor
Drawbar towing hitch: rotary with towing eye ø50mm
Drawbar support: telescopic mechanical straight leg
Single-line lubrication system for sliding bearings of the front wheels of the

conveyor Hydraulically lifted rear cover , the system requires a pair of external tractor

hydraulic socket
Telescopic drawbar support with single-stage gearbox
Hydraulic control from the tractor distributor (smooth regulation shift of conveyor)
Double line pneumatic braking system with manual braking force regulator
Control from tractor hydraulic distributor
Parking brake with crank
Single line greasing system of the adapter's bearing
Lighting system 12V (light bulb)
Mudguards
Wheel chocks + galvanized racks (2 pcs.)
Spiral connection cable of the lightning installation
Rear bumper, folded
Front protective mesh
Folded ladder and access steps to loading case

Floded ladder and access steps to loading case Chemically hardened two-component painting materials , UV-resistant. Sidewalls, drawbar, axles and conveyor mechanizm colour: green RAL6010 PRONAR

Adapter, mudguards and front mesh colour: red RAL3000 PRONAR

ngle line pneumatic braking system

AV20 adapter with 2 vertical beaters
40 km/h version (only with double line pneumatic brake system)
Hydraulically driven rear sliding wall with indicator
Drawbar towing hitch rigid with towing eye Ø40 mm to couple with upper hitch of the tractor
Drawbar towing hitch rigid ball type K80 mm to couple with lower hitch of the tractor
PTO shaft – standard
PTO shaft - wide angle
Paintwork RAL CLASSIC for industrial uses
Triangle for slow moving vehicles

Paintwork RAL CLASSIC for industrial uses
Triangle for slow moving vehicles
Spare wheel (separately)
Single line pneumatic braking system
Double line pneumatic with automatic (ALB) braking power controller
Hydraulically lifted rear cover, the system requires a pair of external tractor hydraulic socket
Non standard colours according to RAL CALSSIC codes *





STANDARD EQUIPMENT

Holes in the front Wall of the load box.

Tandem suspension with 4 parabolic springs, compensatory control arm, wheel base 1360mm fixed axles equipped with drum brakes 406x120mm

AH20 adapter with 2 horizontal auger beaters with screwed vanes and 2 spreading discs with four screwed vanes on each disc.

Wooden protective strip on the upper edge of the load box

Hydraulic control from the tractor distributor (smooth regulation shift of conveyor), the system requires a pair of external tractor hydraulic socket Chain conveyor with four 14mm chains of high quality steel, with hydraulic drive and stepless speed regulation

Hydraulically lifted reinforced rear wall with elevation height indicator, the system

Hydraulic straight drawbar support with shut-off ball valve (support supply system

Folded ladder and access steps to the loading case
Mudguards
Lighting system 12V (light bulb)
Rubber lining of the tailgate
Single line greasing system of the adapter's bearing
Height indicator of the rear slurry gate
Chemically hardened two-component painting materials , UV-resistant
Sidewalls, drawbar, axles and conveyor mechanizm color: green RAL6010 PRONAR
Pages cliding well adapter, mydguards and frost more folger gray PAL7021

Double line pneumatic braking system with manual braking force regulato Parking brake with crank
Hydraulically lifted rear cover, the system requires a pair of external tractor hydraulic

requires a pair of external tractor hydraulic socket Drawbar hitch: rotary with eye ø50mm Wheel chocks + galvanized racks (2pcs)

requires constant or occasional use of one hydraulic socket from the tractor)

Spiral connection cable of the lightning installation

Folded ladder and access steps to the loading case

ADDITIONAL EQUIPMENT (OPTIONAL):

Double line pneumatic with automatic (ALB) braking power controller Drawbar type rigid to couple with upper hitch of the tractor

Drawbar towing hitch rigid with towing eye Ø40 mm to couple with upper hitch of the tractor Drawbar towing hitch rigid ball type K80 mm to couple with lower hitch of the tractor Rear protection: homologated, folded

PTO shaft - standard

PTO shaft - wide angle

Tyres 600/55-22,5 Tyres 600/50R22,5

Spare wheel (separately)
Slow moving vehicle triangle
Single line pneumatic braking system

Hydraulic brake system
Control of the manure spreader hydraulic distributor (conveyor feed, gate valve, damper, support), the system requires a pair of external tractor hydraulic socket
Holes in the back wall with PLEXI board

Non standard colours according to RAL CALSSIC codes*

Front protective mesh

Rear sliding wall, adapter, mudguards and front mesh color: gray RAL7021

Monocoque loading case
Tandem suspension with 4 parabolic springs, compensatory control arm
wheel base 1360mm fixed axles equipped with drum brakes 406x120mm
Hydraulically lifted rear cover, the system requires a pair of external tractor hydraulic

Hydraulically lifted reinforced rear wall with elevation height indicator, the system requires a pair of external tractor hydraulic socket

AH20 adapter with 2 horizontal auger beaters with screwed vanes and 2 spreading discs with four screwed vanes on each disc

olses with four screwed vales of each olse.
Chain conveyor with four 14mm chains of high quality steel, with hydraulic drive and stepless speed regulation
Drawbar type: fixed to couple with lower hitch of the tractor
Drawbar hitch: rotary with eye ø50mm
Holes in the front wall of the load box

Hydraulic control from the tractor distributor (smooth regulation shift of conveyor), the system requires a pair of external tractor hydraulic slots

Double line pneumatic braking system with manual braking force regulator

Parking brake with crank Wooden protective strip on the upper edge of the load box
Wheel chocks + galvanized racks (2pcs)
Hydraulic straight drawbar support with shut-off ball valve (support supply system requires constant or occasional

use of one hydraulic socket from the tractor)
Spiral connection cable of the lightning installation
Rubber lining of the tailgate

Front protective mesh

A ledder and side steps facilitating access to the loading case

Lighting system 12V (light bulb)

Single line greasing system of the adapter's bearing
Chemically hardened two-component painting materials , UV-resistant
Sidewalls , drawbar, axles and conveyor mechanizm colour: green RAL6010 PRONAR
Rear sliding wall, adapter, mudguards and front mesh colour: gray RAL7021PRONAR

Double line pneumatic with automatic (ALB) braking power controller

Drawbar type rigid to couple with upper hitch of the tractor
Drawbar towing hitch rigid with towing eye Ø40 mm to couple with upper hitch of the tractor
Drawbar towing hitch rigid ball type K80 mm to couple with lower hitch of the tractor Rear protection: homologated, folded

PTO shaft - standard PTO shaft - wide angle Tyres 600/55-22.5

Tyres 600/50-R22,5 Spare wheel (separately)

Triangle for slow moving vehicles
The rear steering axle is passively controlled with hydraulic steering lock system (axles longer than standard) hydraulic system requires a pair of external tractor hydraulic socket Single line pneumatic braking system

Hydraulic brake system
Control of the manure spreader hydraulic distributor (conveyor feed, gate valve, damper,

support), the system requires a pair of external tractor hydraulic socket Holes in the back wall with PLEXI board Wheels with tires: 600 / 50-22.5 (standard), 600 / 50R22.5; 600 / 55-22.5 (the width of the manure spreader exceeds 2550mm - in the version with torsion axle) Wheels with tires: 700 / 40-22.5 (only with suspension on rigid axles, axles longer than standard - width of the manure spreader exceeds 2550mm) Non standard colours according to RAL CALSSIC codes*

115 >>>>>> **114** >>>>>> Technique for nature pronar.pl





Vertical spreding adapter

Spreader N262/1- hydraulic conveyor drive

STANDARD EQUIPMENT

Monocoque load box with 300mm high extensions Openings in the front wall of the load box Wooden protective strip for the upper edge of the load box

Tande'n suspension with 4 parabolic springs, with equalizing arms, with a wheelbase of 1500 mm, with rigid axles equipped with drum brakes, dimensions \emptyset 406x140 mm

2-roller vertical spreading adapter AV20
Chain conveyor with four chains, 14 mm thick, made of high-quality steel, with a hydraulic drive, with stepless regulation of the travel speed,
Hydraulic control from the tractor's manifold (smooth adjustment of the conveyor's

advance), the system requires a pair of external hydraulic outputs of the tractor Hydraulically lifted shutter, the system requires a pair of external hydraulic outputs of the tractor

Steel spring amortized drawbar to connect with the tractor's lower hitch Drawbar hitch, rotating with ø50mm eye Drawbar support: telescopic with two-stage gear

Braking system: double line pneumatic with manual braking force regulator
Parking brake with crank
Installation of 12V lighting (LED), with hermetic connections, with marker lighting
Connecting cable, spiral, lighting installation
Folding ladder and side steps for easy access to the load box
Metal fenders (ahove the wheels)

Metal fenders (above the wheels)

Two wheel chocks placed in galvanized pockets
A paint system with high anti-corrosion resistance using chemically hardened twocomponent paint materials that provide high durability of paint coatings and resistance to

Frame and box painting colours, green RAL6010 PRONAR The colour of the spreading adapter, gray RAL7021 PRONAR

N262/2

Extensions for transporting green forage, 500 mm high, increasing the capacity to 22.4 [m3]: (mounted on a load box with 300mm side extensions, the removal of the adapter is necessary to

ADDITIONAL EQUIPMENT (OPTIONAL):

Character of the green forage)

Drawbar hitch: rigid with a K80mm eye, to be connected to the lower hitch of the tractor
Hydraulically opened, two-wing rear guard - deflector limiting the spread, selection of the spreading
limitation side by means of manual valves on the spreader, the system requires a pair of external hydraulic outputs of the tractor

hydraulic outputs of the tractor
Hydraulic, articulated drawbar support with a cut-off ball valve
Passively steered rear axle (both axles are rigid and torsional, 2100mm long) with a hydraulic turning
lock, the hydraulic system requires a pair of external tractor hydraulic outputs (the spreader width
exceeds 2550mm for all types of wheels)
Braking system: double line pneumatic with ALB
Hydraulic braking system
PTO shaft - standard
Articulated telescopic shaft - wide angle

Articulated telescopic shaft - wide angle Wheels with tires: 600 / 55-22.5; 600 / 50R22,5 (with suspension on rigid axles (2000mm longer than standard axles) or on a steering axle (2100mm longer than standard axles - the spreader width exceeds 2550mm)

Wheels with tires: 620 / 50R22.5; 600 / 55-26.5; 600 / 55R26.5; (spreader width exceeds 2550mm)

Wheels with tires: 700 / 50-26.5; 710 / 45-26.5; 710 / 50R26.5 (only with suspension on rigid axless (2000mm longer than standard axles) or on a steering axle (2100mm longer than standard axles spreader width exceeds 2550mm)

Spare wheel loose

Triangle distinguishing slow-moving vehicles
Colours according to the RAL CLASSIC colour marking system for industrial applications, by providing the word RAL CLASSIC and four numbers from the pattern palette











PRONAR NV161/1, NV161/2, NV161/3, NV161/4, NV161/5



Spreaders of series **PRONAR NV161** are designed for precise and uniform spreading of manure, peat or compost. **NV** spreaders are efficient, solid and durable machines, the use of them ensures perfect and effective fertilization.

They have optimum capacity from 9,1 m³ to 14,9 m³ thereby **NV161** spreaders are best solution for both small and big farms.







STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL)

NV161

nocoque loading case
olden on the from wall of loading case
oden protection bar on the top edge of loading case.
sle rigid suspension with rigid axle
sleding adapter with 2 vertical beaters of 1800 mm height
in conveyor with two 14mm chains of high quality steel, with hydraulic drive and stepless
of regulation.

guiation type: suspended to couple with lower hitch of the tractor (models NV161/1, NV161/2,

wbar type: suspended (with springs) to couple with lower hitch of the tractor (NV161/4, 161/5)

Braking system: single line pneumatic (excluding NV161/5) Braking system: hydraulic Hydraulic rear shields Hydraulic millotina i

ydraulic guillotine slurry gate Fawbar fowng hitch: fixed with towing eye ø40mm (excluding NV161/4, NV161/5) Fawbar towing hitch: fixed ball type K80mm 10 shaft – wide angle Feel mudguards

Steel mudguards The Steel mudguards The Steel mudguards Tront protective mesh Tyres 750/68786 (28.1R26) – width exceeds 2550mm (NV161/4) Tyres 650/75 R32,5- width exceeds 2550mm (NV161/5) FD lightning

TECHNICAL DATA OF STANDARD EQUIPMENT	NV161/1	NV161/2	NV161/3	NV161/4	NV161/5
Permissible total weight [kg]	10500*	12300*	14200*	17200*	19900*
Load capacity [kg]	6750*	8490*	10240*	12290*	14650*
Empty weight [kg]	3750**	3810**	3960**	4910**	5250**
Load volume [m³]	9,1	10,7	11,8	13,1	14,9
Loading space [m²]	6,7	6,7	6,7	7,5	8,5
Loading height [mm]	2250	2500	2430	2370	2610
Dimensions: length/width/height [mm]	7250/2540/2560	7250/2540/2610	7330/2760/2700	7970/2970/2740	8580/2950/2730
Dimensions of the loading case: length/width/height [mm]	4500/2000-1500 /1160	4500/2000-1500 /1360	4500/2000-1500 /1500	5000/2000-1500 /1250	5680/2000-1500 /1500
Floor thickness [mm]	4	4	4	4	4
Wall thickness [mm]	4	4	4	4	4
Wheel track [mm]	2050	2050	2170	2300	2300
Suspension	Single axle, fixed				
Hitch ring load	2000	2500	3000	3000	4000
Tyres	18.4-34	18.4-38	23.1-26	650/65-30.5	650/65-30.5
Construction speed	30	30	30	30	30
Minimum tractor power requirement	70-80	75-90	80-100	100-115	120-130
PTO range	540	540	1000	1000	1000
Adapter type	vertical 2-beaters	vertical 2-beaters	vertical 2-beaters	vertical 2-beaters	vertical 2-beater
Max. spreading width:	8-12	8-12	8-12	8-12	8-12

^{*} construction parameters allowable, homologation parameters may be different from those given ** empty weight is different in the case of non-standard implementation

Chain conveyor with two 14mm chains of high quality steel, with hydraulic drive and stepless speed regulation









118 >>>>>> Technique for nature 119 >>>>>> pronar.pl



PRONAR TRAILERS T022, T022M, T025, T025M, T025KM. T027M	122
PRONAR TRAILERS T023, T023M, T026, T026M, T026KM	125
PRONAR TRAILERS T024, T024M	128
PRONAR TRAILERS T028KM, T28ML	130
SELF LOADING PRONAR TRAILER TB-4	132
BALE TRAILER TO24G	133

PRONAR TO22 /TO22M PRONAR T025/T025M/T025KM/T027M

PRONAR among many machines offers also bale trailers which are very popular.

Bale transportation trailers have flat, steel loading floor with side edges and folded ladders at the fornt and at the back. They are used mainly to transport bales of straw, hay, silage. Due to the maximum design speed of 40km/h, the trailer is perfectly suited for long-distance transport. They are durable, reliable and stand the test also in difficult terrain - on the field and meadow.

In upgraded version of trailers PRONAR TO22 and TO25 - PRONAR TO22M and TO25M with reinforced floor plates have 4 mm of thickness. Platforms are made with only one central weld which has significant influence on the elimination of corrosion. Stanchions added to the model **T025M** created new model **PRONAR T025KM** adapted to timber transport. It can be equipped with 8 side stanchions or/and 4 stanchions at the front and 4 at the back

PRONAR TO27M



ROBUST - lightweight, stable construction and optimal floor thickness

EFFICIENT - Height of the ladders adapted to transport bales in two layers, low platform for easy

UNIVERSAL - the width of the loading space adapted to transport of euro-pallets and euro-

MADE ACCORDING TO EUROPEAN STANDARDS

- built-in rear overrun protection according to EU directives, approved drawbars with atractive spring

MANOEUVRABLE - optimal distance between wheels and axles, also wide Tyres are designed to work in meadow and field

TECHNICAL DATA OF STANDARD EQUIPMENT	T022	T022M	T025	T025M	T025KM	T027M
Allowable total weight (technically) [kg]	11	000		13000		-
Allowable total weight [kg]	10	0000		12000		18000
Load capacity [kg]	7360	7300	9040	8980	8890	13200
Empty weight [kg]	2640	2700	2960	3020	3110*	4800
Loading surface [m²]	15,6	6/17,8	15,8/18	15,6	/17,8	20,4(23
Loading platform length [mm]			6495/7395			
Loading surface length [mm]	6740	(7270*)	6740	(7270*)	6740 (7270**)	8500(9600
Loading surface width ** [mm]	2435**	2517/2410**	2435**	2517/2410*	2517/2410***	2470/2400
Dimensions length***/ width/height [mm]	9135-1003	5/2500/2830	9	135-10035/2550/28	880	10600-11700/2530/2900
Ladders height measured from the platform [mm]			1700			1790
Floor thickness [mm]	3	4	3		4	3
Platform height measured from the ground [mm]	1130	1130		1180		1110
Wheel track [mm]	1	730		1820		1960
Suspension			pai	rabolic springs		
Tyres	400/	60-15,5		500/50-17		445/45R19.5
Maximum speed [km/h]	40					
Minimum tractor power requirement [KM/kW]	67,6	5/49,7		72,8/53,5		109,2/80,3

* With pulled out rear frame exending the platform length

STANDARD EQUIPMENT

** EURO pallets transportation width *** Standard platform length

ADDITIONAL EQUIPMENT (OPTIONAL):

plastic fenders: in front of the front wheels

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

Braking system: overrun type brake (8t total weight with maximum speed of 25

Drawbar: Y type withø40 mm towing eye

Tyres 360/65-16 Spare wheel (separately) 400/60-15.5

Spare wheel (separately) 360/65-16

Lashing belts are not in the equipmen

Rear connections to a second trailer Rear manual hitch, fixed (D=44kN)***

Tyres 445/45R19 ; 520/50R17 Spare wheel (separately) 500/50-17

Spare wheel (separately) 520/50-17

Lashing belts are not in the equipmen

Drawbar: Y type with ø40 fixed towing eye

Side underrun protections acc.to 89/297/EWG

Front and rear plastic mudguards with galvanized supports

Spare wheel support with winch mounted under the trailer

Braking system: combined (double pneumatic line + hydraulic) Braking system: double pneumatic line with automatic (ALB)

documentation

Tool box

Side underrun protections acc.to 89/297/EWG

Two belt-rolling devices with trigger
Side ladders made of rounded profiles and fixed with 4 bolts each

Rear manual hitch, fixed (D=44kN)****
Front and rear plastic mudguards with galvanized supports

Spare wheel support with winch mounted under the trailer Braking system: double pneumatic line with automatic (ALB) Braking system: combined (double pneumatic + hydraulic)

Warning triangle Non standard colours according to RAL CALSSIC codes

Braking system: combined (double pneumatic + hydraulic) with (ALB)

*** trailer is not designed for towing seocnd trailer according to homologation

Braking system: combined (double pneumatic line + hydraulic) automatic (ALB)

**** trailer is not designed for towing seocnd trailer according to homologation

T022M

km/h)

Rounded profiles on the floor edges

Reinforced platform

Frame: ractangular made of closed profiles*
Drawbar type: V type with ø40 towing eye

Steering: rotating turntable

Side ladders with rounded profiles* Regulated rear frame**

Holes for belt tightening

Holes for belt tightening on the side ladders
Braking system: single line or double line pneumatic or hydraulic***

Double-component chemically hardened painting materials, UV-resistant

12V lightning system with rear electric socket

Rear underrun protection with integrated commercial road lighting system (according to 70/221/ FW)

Wheel chocks and racks

Platform colour: green RAL6010 PRONAR

- rectangular closed profiles made of high quality steel fixed by two screws and two renforcing cables
- *** to be used on the filed only. When rear frame is pulled, no possibility to connect anoher trailer

**** manual braking force regulator

T025

T025M

Flat profiles on the floor edges

Frame: rectangular made of closed profiles of high quality steel Drawbar: V type with ø40 mm fixed towing eye

Steering: rotating turntable *Side ladders: front and rear

*Regulated rear frame

***Braking system: single or double line pneumatic or hydraulic

Crank hand brake

12V lightning system with clearance lights and rear electric socket

Rear underrun protection with integrated commercial road lighting system (according to 70/221/

Double-component chemically hardened painting materials

Frame: rectangular made of closed profiles of high quality steel Drawbar: V type with ø40 mm fixed towing eye

***Braking system: single or double line pneumatic or hydraulic

12V lightning system with clearance ights and rear electric socket

Double-component chemically hardened painting materials, UV-resistant

Wheel chocks and racks

Wheel chocks hidden in galvanized pockets Platform colour: green RAL6010 PRONAR

fixed by two screws and two renforcing cables
 to be used on the filed only. When rear frame is pulled, no possibility to connect another trailer
 manual braking force regulator

Reinforced rear underrun protection with integrated commercial road lighting system (according to

Wheel chocks + racks (2 pcs.)

fixed by two screws and two renforcing cables

to be used on the filed only. When rear frame is pulled, no possibility to connect another trailer

Steering: rotating turntable

*Regulated rear frame

Holes for belt tightening

Crank hand brake

Rear electric socket

70/221/EW)

Reinforced platform

Rounded profiles on the floor edges

*Side ladders with rounded profiles

Holes for belt tightening on the side ladders

Platform colour: green RAL6010 PRONAR

*** manual braking force regulator

Drawbar: Y type with ø40 fixed towing eye

Tool box

documentation

Side underrun protections acc.to 89/297/EWG

Two belt-rolling devices with trigger

Rounded edges of side ladders mounted with four screws

Warning triangle Non standard colours according to RAL CALSSIC codes

Rear connections to a second trailer

Rear manual hitch, fixed (D=44kN)**** Front and rear plastic mudguards with galvanized supports

Spare wheel support with winch mounted under the trailer

Braking system: combined (double pneumatic line + hydraulic)

Braking system: double pneumatic line with automatic (ALB)

Braking system: combined (doule pneumatic line + hydraulic) with automatic (ALB)

Tyres 445/45R19,5 ; 520/50R17

Spare wheel (separately) 500/50-17

Spare wheel (separately) 520/50-17

Warning triangle

Non standard colours according to RAL CALSSIC codes

Lashing belts are not in the equipment

Trailer T025M









123 >>>>>> pronar.pl

122 Technique for nature

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T025KM

Rounded profiles on the floor edges

Reinforced platform floor equipped with holes for posts assembled at the front, rear and sides of the trailer

*Frame: rectangular made of closed profiles

Drawbar: V type with ø40 mm fixed towing eye

Steering: rotating turntable

**Side ladders with rounded profiles

**Regulated rear frame

Holes for belt tightening

 $\hbox{Holes for belt tightening on the side ladders}\\$

****Braking system: single or double line pneumatic or hydraulic

Crank hand brake

12V lightning system with clearance lights and rear electric socket

Reinforced rear underrun protection with integrated commercial road lighting system (according to 70/221/EW)

Double-component chemically hardened painting materials, UV-resistant

Platform colour: green RAL6010 PRONAR

Wheel chocks and racks

* rectangular closed profiles made of high quality steel

**fixed by two screws and two renforcing cables

*** to be used on the filed only. When rear frame is pulled, no possibility to connect another trailer, rear frame is adjustable with clampling screws

Chassis frame with variable cross-section made of I-beam, open and closed profiles

Rear underrun protection according to 70/221/EC integrated with commercial road

Reinforced rear underrun protection with integrated commercial road lighting system

**** manual braking force regulator

Rounded profiles on the floor edges

Chassis frame adjusted for rear hitch Chassis frame adjusted for hydraulic sidewalls

Steering: rotating turntable

Holes for belt tightening

(according to 70/221/EW)

Wheel chocks + racks (2 pcs.)

Rear electric socket

Drum brakes 400x120

lighting system

Drawbar: V type with ø40 mm fixed towing eye

Regulated rear frame with 5 positions possible

12V lightning system with clearance lights

Side ladders adjusted for transporting round and square bales

Braking system: single line pneumatic manual braking force regulator

 $\label{lem:component} Double-component\ chemically\ hardened\ painting\ materials,\ UV-resistant$

Front and rear posts (4 pcs on each side) + side posts (4 pcs on each side) for timber transportation, together with front and rear ladders for bale transportation

Front and rear posts (4 pcs on each side) for timber transportation, instead of front and rear ladders for bale transportation *

Front and rear posts (4 pcs on each side) + side posts (4 pcs on each side) for timber transportation, instead of front and rear ladders for bale transportation *

Front and rear posts (4 pcs on each side) for timber transportation, together with front and rear ladders for bale transportation

Drawbar : Y type with ø40 fixed towing eye

Tool box

Side underrun protections acc.to 89/297/EWG

Two belt-rolling devices with trigger

Rounded edges of side ladders mounted with four bolts

Rear connections to a second trailer, double line pneumatic

Rear manual hitch, fixed (D=44kN)**

Front and rear plastic mudguards with galvanized supports Spare wheel support with winch mounted under the trailer

Braking system: double line pneumatic with automatic (ALB)

Braking system: combined (double line pneumatic + hydraulic)

Braking system: combined (doule pneumatic line + hydraulic with electric protection system)

and automatic (ALB)

Tyres: 445/45R19,5; 520/50R17 Spare wheel (separately) 500/50-17

Warning triangle

Non standard colours according to RAL CALSSIC codes

Lashing belts are not in the equipment * posts equipped with hooks for transport belts, post height: 1200 mm, loading space width

between posts: 2324 mm

** trailer is not designed for towing seocnd trailer according to homologation documentation

T027M

Drawbar: Y type with ø40 fixed towing eye

Tool box

Side underrun protections acc.to 89/297/EWG

Braking system: double line pneumatic with automatic (ALB) Braking system: hydraulic

Braking system: combined (double line pneumatic + hydraulic with electrical safety valve and

braking power controller)

Rear connections to a second trailer, double line pneumatic

12V lightning system with side clearance lights (LED) Front and rear plastic mudguards with galvanized supports Tyres 385/65R 22,5 REG

Tyres 385/65R 22,5 vres 500/60R 22 5

Tyres 560/45R 22,5

Spare wheel (separately)

Warning triangle Another colors from the RAL chart

Lateral protections

Automatic rear connection Manual rear connection

Platform colour: green RAL6010 PRONAR Wheel chocks and racks

Plastic fenders: behind rear wheels

T025KM - Two belt-rolling devices with trigge

T027M - Wheel chocks with racks







 $Reliable, trouble-free \ and \ very \ versatile \ three-axle \ platform \ trailers. \ Trailers \ \textbf{PRONARTO23} \ and \ \textbf{PRONARTO26} \ perfectly \ suitable \ for \ transport \ of \ and \ very \ versatile \ three-axle \ platform \ trailers.$ cargo volume, requiring large loading surface, for the transportation bales of straw, haylage, pallets and EURO-pallets. The length of the platform can be regulated to adjust the platform length to the parameters of the cargo. Appropriate, high quality, chemically hardened painting materials are robust to corrosion. Stable and strong suspension based on the parabolic springs provides a long-term use of the trailer. Foldable ladders at the front and at the back protect cargo and ensure proper position during transport.

In the upgraded version of trailers PRONAR TO23 and TO26 - PRONAR TO23M and TO26M 4 mm thick reinforced plates were used. Platforms are made with only one central weld which has significant influence on the elimination of corrosion. Stanchions added to the model TO26M created new model PRONAR TO26KM adapted to timber transport. It can be equipped with 14 side stanchions or/and 4 stanchions at the

ROBUST - lightweight, stable construction and optimal floor thickness

front and 4 at the back.

EFFICIENT - Height of the ladders adapted to bales transport in two layers, low platrofm for easy loading

UNIVERSAL - the width of the loading space adapted to transport of euro-pallets and euro-boxes

MADE ACCORDING TO EUROPEAN STANDARDS - built-in rear overrun protection according to EU directives, approved drawbars with a tractive spring



TECHNICAL DATA OF STANDARD EQUIPMENT	T023	T023M	T026	T026M	T026KM
Allowable total weight (technically) [kg]	160	00		19000	
Allowable total weight [kg]	150	00		18000	
Load capacity [kg]	11300	11170	13720	13580	13470
Empty weight [kg]	3700	3830	4280	4420	4530
Loading surface [m²]			24 (26,2*)		
Loading platform length [mm]			9695		
Loading surface length [mm]		9980	/10780		9880 (10770*)
Loading surface width ** [mm]	2450/2435**	2517/2410**	2450/2435**	2517	7/2410
Dimensions length***/ width/height [mm]	12000-12900	/2500/2830		1200-12900/2500/288	0
Ladders height measured from the platform [mm]			1700		
Floor thickness [mm]	3	4	3		4
Platform height measured from the ground [mm]	1130	1130		1180	
Wheel track [mm]	173	30		1820	
Suspension			parabolic springs		
Tyres	400/60	0-15,5		500/50-17	
Maximum speed [km/h]			40		
Minimum tractor power requirement [KM/kW]	83,2	/61-		93,6/68,8	
With nulled out roar frame evending the platform length					

h pulled out rear frame exending the platform length ** EURO pallets transportation widht

124 >>>>>> Technique for nature 125 >>>>>> pronar.pl

^{***} Standard platform length



STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T023

Flat profiles on the floor edges Frame: rectangular closed profiles made of high quality steel

Drawbar: V type with ø40 mm fixed towing eye Steering: rotating turntable

Side ladders: front and rear fixed by two screws and two renforcing cables

Regulated rear frame

Braking system: single or double line pneumatic or hydraulic with manual braking force regulator

Crank hand brake

Double-component chemically hardened painting materials

12V lightning system with clearance lights and rear electric socket
Rear underrun protection with integrated commercial road lighting system (according to 70/221/EW)

Wheel chocks and racks Platform colour: green RAL6010 PRONAR

Rear electric socket

rear frame is adjustable with clampling screws to be used on the filed only. When rear frame is pulled, no possibility to connect another trailer

Drawbar: Y type with ø40 fixed towing eye Rear manual hitch, fixed (D=44kN)**** Side underrun protections acc.to 89/297/EWG

Front and rear plastic mudguards with galvanized supports Spare wheel support with winch mounted under the trailer

Braking system: combined (double pneumatic line + hydraulic)
Braking system: double pneumatic line with automatic (ALB)
Braking system: combined (double pneumatic line + hydraulic) with automatic

Tyres 360/65-16

Spare wheel (separately) 400/60-15.5

Spare wheel (separately) 360/65-16

Warning triangle
Non standard colours according to RAL CALSSIC codes

** trailer is not designed for towing second trailer according to homologation

Rounded profiles on the floor edges

Reinforced platform floor - 4mm
Frame made of open and closed rectangular profiles made of high quality steel

Frame adjusted to the rear hitch mounting

prawbar type: V- type fixed with towing eye ø40 mm Steering: rotating turntable Rounded edges of side ladders (front and rear) "Platform extension

Platform extension
Holes for belt tightening on the platform side
Holes for belt tightening on the side ladders
Braking system: single line, double line pneumatic or hydraulic
Crank hand brake
Double-component chemically hardened painting materials, UV-resistant

12V lightning system with clearance light and rear electric socket Rear underrun protection according to 70/221/EC Rear electric socket

Wheel chocks + racks (2 pcs.)

Platform color: green RAL6010 PRONAR Wheel chocks hidden in galvanized pockets

* to be used on the filed only. When rear frame is pulled, no possibility to connect another

Drawbar: Y type with ø40 fixed towing eye Tool box
Side underrun protection acc.to 89/297/EWG

Two belt-rolling devices with trigger
Side ladders with rounded profiles mounted with four screws
Rear manual hitch, fixed (D=44kN)****

Front and rear plastic mudguards with galvanized supports

Spare wheel winch unit
Braking system: combined (double pneumatic line + hydraulic)
Braking system: double pneumatic line with automatic (ALB)

Braking system: combined (double pneumatic line + hydraulic) with automatic

(ALB) Tyres 360/65-16

Spare wheel (separately) 400/60-15,5 Spare wheel (separately) 360/65-16

Warning triangle Non standard colours according to RAL CALSSIC codes

Lashing belts are not in the equipment

Loading platform with flat floor edges Frame made of open rectangular closed profiles of high quality steel Drawbar type: V- type rigid with towing eye ø40 mm

Steering: rotating turntable Side ladders with rounded profiles

*Platform extension

*Braking system: single line, double line pneumatic or hydraulic

Crank hand hrake

Talk light brake

12V lightning system with rear electric socket with clearance lights

Double-component chemically hardened painting materials, UV-resistant

Rear underrun protection according to 70/221/EC integrated with commercial road lighting system

Rear electric socket
Wheel chocks + racks (2 pcs.)
Wheel chocks hidden in galvanized pockets
Platform color: green RAL6010 PRONAR
*to be used on the filed only. When rear frame is pulled, no possibility to connect another trailer

** with manual braking force regulator

Drawbar: Y type with ø40 fixed towing eye Rear manual hitch, fixed (D=44kN)** Side underrun protection acc.to 89/297/EWG Tool box

Front and rear plastic mudguards with galvanized supports

Spare wheel winch unit Braking system: combined (double pneumatic line + hydraulic)

Braking system: combined (double pneumatic line + hydraulic) with automatic

Braking system: double pneumatic line with automatic (ALB) Tyres 385/55R22,5; 445/45R19,5; 500/50R17; 520/50R17

Spare wheel (separately) 500/50-17 Spare wheel (separately) 520/50-17

Warning triangle
Non standard colours according to RAL CALSSIC codes

BALE TRAILERS

PRONAR TO23, TO23M **PRONAR T026, T026M, T026KM**

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T026M

Rounded profiles on the floor edges

Rounded profiles on the floor edges
Reinforced platform floor - 4mm
Frame made of open and closed rectangular profiles made of high quality steel
Frame adjusted to the hydraulic walls mounting
Frame adjusted to the rear hitch mounting
Drawbar type: V- type rigid with towing eye ø40 mm
Steering: rotating turntable
Rounded edges of side ladders (front and rear)
*Platform extension
*Platform extension

Holes for belt tightening on the platform side
Holes for belt tightening on the side ladders
Braking system: single line, double line pneumatic or hydraulic with manual braking force

Frank hand brake

Crânk hand brake
Double- component chemically hardened painting materials, UV-resistant
12V lightning system with rear electric socket and clearance lights
Rear underrun protection according to 70/221/EC
Rear electric socket
Wheel chocks + racks (2 pcs.)
Platform color: green RAL6010 PRONAR
Wheel chocks hidden in galvanized pockets
'to be used on the filed only. When rear frame is pulled, no possibility to connect another trailer

Drawbar: Y type with ø40 fixed towing eye Tool box

Side underrun protection acc.to 89/297/EWG

Two belt-rolling devices with trigger

Side ladders with rounded profiles mounted with four screws Rear manual hitch, fixed**** Front and rear plastic mudguards with galvanized supports
Spare wheel winch unit

Braking system: combined (double pneumatic line + hydraulic)

Braking system: double pneumatic line with automatic (ALB) Braking system: combined (double pneumatic line + hydraulic) with automatic (ALB) Tyres 385/55R22,5; 445/45R19,5; 500/50R17; 520/50R17

Spare wheel (separately) 500/50-17 14PR Spare wheel (separately) 520/50-17

Warning triangle Non standard colours according to RAL CALSSIC codes

Lashing belts are not in the equipment

Rounded profiles on the floor edges Reinforced platform floor equipped with holes for posts assembly at the front, rear and side of the

Frame made of open and closed rectangular profiles made of high quality stee

Frame adjusted to the hydraulic walls mounting Frame adjusted to the rear hitch mounting

Drawbar type: V- type rigid with towing eye ø40 mm Steering: rotating turntable

Side ladders with rounded profiles *Platform extension

Holes for belt tightening on the platform side
Holes for belt tightening on the side ladders
Braking system: single line, double line pneumatic or hydraulic

Crank hand brake Claffix flating prake 12V lightning system with rear electric socket and clearance lights Rear underrun protection according to 70/221/EWG with lights and space for number plate

Rear electric socket

Double-component chemically hardened painting materials, UV-resistant Platform color: green RAL6010 PRONAR

Wheel chocks in galvanized pockets

'to be used on the filed only. When rear frame is pulled, no possibility to connect another trailer

Hydraulic sidewalls with vertical ladders at the front and rear (loading length

9900mm)*
Front and rear posts (4 pcs on each side) for timber transportation, instead of front and rear ladders for bale transportation **
Front and rear posts (4 pcs on each side) + side posts (7 pcs on each side) for timber transportation, instead of front and rear ladders for bale transportation **
Front and rear posts (4 pcs on each side) for timber transportation **
Front and rear ladders for bale transportation **
Front and rear posts (4 pcs on each side) **
Front and rear posts (4 pcs on each side) **
Front and rear posts (4 pcs on each side) **
Side posts (7 pcs on each side) for timber transportation, together with front and rear ladders for bale transportation **
Drawbar: Y type with ø40 fixed towing eye
Tool box

Two belt-rolling devices with trigger
Side ladders with rounded profiles mounted with four screws
Rear manual hitch, fixed (D=44kN)**

Front and rear plastic mudguards with galvanized supports
Spare wheel winch unit
Braking system: double line pneumatic with automatic (ALB)
Braking system: combined (double line pneumatic + hydraulic)
Braking system: combined (double line pneumatic ine + hydraulic with electric protection system) and automatic (ALB)
Tyres 385/55R22,5; 445/45R19,5; 500/50R17; 520/50R17

Tyres 385/55R22,5; 445/45R19.5; 500/50R17; 520/50R17 Spare wheel (separately) 500/50-17 Spare wheel (separately) 520/50-17 Warning triangle Non standard colours according to RAL CALSSIC codes Lashing belts are not in the equipment * trailer is not designed for towing second trailer according to homologation documentation aocumentation * posts equipped with hooks for transport belts, post height: 1200 mm, loading * space width between posts: 2324 mm



126 >>>>>> Technique for nature 127 >>>>>> pronar.pl

Reliable, failure-free and very universal platform trailers. **PRONAR T024** on the tandem suspension is perfect for transportation of volume cargo in hard conditions, mainly for hay bales, palettes and europalettes. The low platform with flat edges allows to prevent the bales being damaged during transport, maximizing the functionality of the trailer. The length of the platform can be regulated to adjust the platform length to the parameters of the cargo. Appropriate, high quality, chemically hardened painting materials are robust to corrosion. Stable and strong suspension based on the parabolic springs provides a long-term use of the trailer.

In the upgraded version of the trailer **PRONAR TO24M** a special 4 mm thick rainforced plates were used. Single central weld in the platform has a significant impact on preventing the rust.

T024	T024M	
1300	00	
1200	00	
8900	8700	
3100	3300	
17,4	4	
717	0	
2450/2435	2517/2410*	
9290/2550/2740		
104	0	
4		
182	0	
tandem, parab	oolic springs	
192	5	
15,0/70-18TL	15,0/70-18	
40)	
62,5/4	45,9	
	1300 8900 3100 17. 717 2450/2435 9290/255 104 4 182 tandem, parat	

SOLID - easy, stable construction and optimal thickness of the platform

EFFICIENT - the height of the ladders is adapted to the transportation of two layers of bales, the lowered construction simplifies loading

UNIVERSAL - the width of the loading platform is adapted to the loading of euro palettes and euro boxes

MADE ACCORDING TO THE EU $\textbf{STANDARDS} \cdot \text{rear under under-ride guard}$ according to European Standards. Approved drawbar with spring maintance

EASY TO MANEUVER - tandem suspension ensures an easy navigation through rough terrain and muddy fields. Wide Tyres are adapted to work both in the meadow and

PRONAR TO24M









STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T024

Tool box

Flat profiles on the floor edges Frame: rectangular made of closed profiles made of high quality steel Drawbar towing hitch rigid with towing eye 40 mm Braking system double line pneumatic with ALB

Tandem suspenssion on 4 parabolic springs with 1215 mm axle track with fixed Braking system combined (pneumatic + hydraulic) with electric protection system

axles with drum brakes 300/90 Braking system combined (pneumatic + hydraulic) Rear manual hitch, rigid*

Drawbar: fixed upper/lower universal transportation hitch Overrun side protections acc.to 89/297/EWG

Drawbar: rotary towing eye ø 50 mm

Drawbar support: hydraulic supporting leg (scissor) Side ladders: front and rear

Braking system: single line pneumatic or double line pneumatic or hydraulic

Crank hand brake

12V lighting system with rear electric socket Commercial road lighting system with side lights

Rear underrun protection with integrated commercial road lighting system (according to 70/221/EW)

Double-component chemically hardened painting materials

Wheel chocks and racks
Painting colour: green RAL6010 PRONAR

Tyres 385/55 R22,5 Spare wheel (separately) 15.0/70-18TL

Spare wheel (separately) 500/50-17 Spare wheel (separately) 385/55 R22,5 RE

Spare wheel (separately) 385/55 R22,5

Tyres 500/50-175 20/50R17

Tyres 385/55 R22,5 RE

Slow moving vehicle triangle Non standard colours according to RAL CALSSIC codes

Rounded profiles on the floor edges

Reinforced platform - 4mm

Frame: rectangular made of closed profiles made of high quality steel

Tandem suspenssion on 4 parabolic springs with 1215 mm axle track with fixed axles with drum brakes 300/90

Chassis frame adjusted to the rear hitch mounting

Drawbar type: uniwersal rigid to couple with lower or upper hitch of the tractor

Drawbar towing hitch: rotary with towing eye ø50 mm

Drawbar support: hydraulic supporting leg (scissor)

Side ladders with rounded profiles Holes for belt tightening

Holes for belt tightening on the side ladders

Braking system: single or double line pneumatic or hydraulic*

Crank hand brake

12V lightning system with rear electric socket

Commercial road lighting system with side lights Rear underrun protection with integrated commercial road lighting system

(according to 70/221/EW)

Double-component chemically hardened painting materials

Wheel chocks and racks

Platform colour: green RAL6010 PRONAR

*manual braking force regulator

Front and rear plastic mudguards with galvanized supports

Drawbar towing hitch rigid with towing eye ø40 mm

Drawbar towing hitch rigid ball type K80 mm Braking system combined (pneumatic + hydraulic)

Braking system combined (pneumatic + hydraulic) with electric protection system

Braking system double line pneumatic with ALB

Tool box

Overrun side protections acc.to 89/297/EWG Rear manual hitch, rigid*

Two belt-rolling devices with trigger

Rounded edges of side ladders mounted with four screws Front and rear plastic mudguards with galvanized supports

Tyres 500/50-17 Tyres 520/50-17

Tyres 385/55 R22.5 regenerowane Tyres 385/55 R22.5

Spare wheel (separately) 15.0/70-18TL

Spare wheel (separately) 500/50-17 Spare wheel (separately) 385/55 R22.5 RE

Spare wheel (separately) 385/55 R22.5

Spare wheel (separately) 520/50-17

Slow moving vehicle triangle

hook does not fulfill required traction force of normal transportation of second trailer, trailer is not designed to tow seocnd trailer according with homologation documentati



129 >>>>>> **128** >>>>>> Technique for nature pronar.pl

TO28KM is a versatile product designed primarily for transporting bales, bales of straw or hay and also for transporting cargo on pallets. The most important innovation in the design of the bale trailer, unlike in previous models, are hydraulically lifted side walls to protect the transported cargo. Additionally, thanks to the possibility of fitting special stanchions on all sides of the trailer, a stable and secure transportation of logs, timber wood and other long materials is guaranteed. The large loading surface of the trailer and its optimal load capacity makes it possible to transport a wide range of different materials and to use the trailer not only in agriculture.

TO28ML is a unniversal three-axle trailer with a very large capacity and loading platform. It is designed mainly for transporting bales or straw or hay blocks and loads on pallets or euro pallets. An important innovation in this construction is the adaptation and the possibility of using hydraulically raised side walls securing the transported cargo.

The large loading surface of the trailer and its optimal load capacity give the opportunity to transport a wide range of different materials and use of the trailer not only in agriculture.

PRONAR TO28 KM PRONAR TO28 ML

	T028k	T028KM		T028ML		
TECHNICAL DATA	Version WITHOUT hydr. Side walls	Version WITH hydr. Side walls	Version WITHOUT hydr. Side walls	Version WITH hydr. Side walls		
Permissible total weight: [kg]	24000		2400	24000		
Load capacity: [kg]	18500	16900	17420	15870		
Empty weight: [kg]	5500	7100	6580	8130		
Loading space (rear frame folded/extended): [m²]	23,8/26,4	23,8 (folded only)	28,8/31,4	28,8 (folded only)		
Loading platform length (rear frame folded/extended): [mm]	9900/1100	9900 (folded only)	12000/13100	12000 (folded only)		
Loading platform width: [mm]	2470	2470		2470		
Dimensions: length/width/height: [mm]	12000/2525/2900 *	12000/2545/3715 ***	14100/2525/2900*	14100/2545/3715 ***		
	13100/2525/2900 **	12000/2945/4585 ****	15200/2525/2900**	14100/2945/4585 ****		
Ladders height measured from the platform: [mm]	1790	2605	1790	2605		
Hydraulic side walls heigh: [mm]	-	2425	-	2425		
Platform height, measured from the ground: [mm]	1110		1110			
Platform thickness: [mm]	3		3			
Wheel track: [mm]	1960)	1960			
Suspension:	parabolic	prings	parabolic springs			
Tyres:	445/45F	119,5	445/45R19,5			
Maximum speed: [km/h]	40	40		40		
Tractor power requirement: [HP/kW]	124,8/9	124,8/91,8		124,8/91,8		

^{*} rear frame folded with rear ladder 14°, ** rear frame extended with rear ladder 14

^{***} side walls with transport position, **** side walls with working position lifted to height 3000 mm above the floor



130 >>>>>> Technique for nature

STANDARD EQUIPMENT

T028KM

Platform with profiles on the floor edges Reinforced platform floor equipped with sockets for stanchions

Frame made of I-beams, open and closed rectangular profiles Frame adjusted to the rear hitch mounting

Frame adjusted for mounting hydraulic sidewalls Drawbar type: V- type rigid with towing eye ø40 mm

Steering: rotating turntable
Side ladders with adjustment of angle inclination suitable for transportaion round and square bales
*Extendable rear frame with ladder increasing the loading space
Extendable rear frame supported by pin retainer

Holes for belt tightening on the platform side Braking system: single line pneumatic or hydraulic with manual braking force regulator

Crank hand brake

12V lightning system with rear electric socket and clearance lights

Rear underrun protection according to 70/221/EWG with lights and space for number plate Rear electric socket

Wheel chocks and racks
Double-component chemically hardened painting materials, UV-resistant
Platform color: green RAL6010 PRONAR
Wheel chocks in galvanized pockets

Lashing belts are not in the equipment *to be used on the filed only. When rear frame is pulled, no possibility to connect another trailer

Hydraulic sidewalls with vertical ladders at the front and rear (loading length

Front and rear posts (4 pcs on each side) for timber transportation, instead of front and rear ladders for bale transportation *

ADDITIONAL EQUIPMENT (OPTIONAL):

Front and rear posts (4 pcs on each side) + side posts (7 pcs on each side) for timber transportation, instead of front and rear ladders for bale transportation

Front and rear posts (4 pcs on each side) for timber transportation, together with front and rear ladders for bale transportation * Front and rear posts (4 pcs on each side) + side posts (7 pcs on each side) for timber transportation, together with front and rear ladders for bale

transportation *
Drawbar : Y type with ø40 fixed towing eye

Tool box Side underrun protection acc.to 89/297/EWG

Braking system: double line pneumatic with automatic (ALB) Front and rear plastic mudguards with galvanized supports

Tyres 385/65R22,5 Reg Tyres 385/65R22,5

Tvres 500/60R22 5

Tyres 560/45R22,5

Spare wheel 445/45R19.5 (seperately) Spare wheel 385/65R22,5 REG. (seperately)

Spare wheel 385/65R22.5 (seperately) Spare wheel 500/60R22,5 (seperately)

Spare wheel 560/45R22,5 (seperately)

Spare wheel winch unit

Warning triangle Non standard colours according to RAL CALSSIC codes

Lashing belts are not in the equipment

T028ML

Platform with profiles on the floor edges
Frame made of I-beams, open and closed rectangular profiles made of high quality steel
Frame adjusted to the rear hitch mounting
Frame adjusted for mounting hydraulic sidewalls
Drawbar type. V- type rigid with towing eye ø40 mm
Steering; rotating turntable
Side ladders with adjustment of angle inclination suitable for transportaion round and square bales
Extendable rear frame with ladder increasing the loading space
Extendable rear frame supported by pin retainer
Holes for belt tightening on the platform side
Braking system: single line pneumatic or hydraulic
Crank hand brake
12V lightning system with rear electric socket and clearance lights
Rear underrun protection according to 70/221/EWG with lights and space for number plate
Rear electric socket

Wheel chocks and racks
Double-component chemically hardened painting materials, UV-resistant
Platform color: green RAL6010 PRONAR
Wheel chocks in galvanized pockets

Hydraulic sidewalls with vertical ladders at the front and rear (loading length

Drawbar: Y type with ø40 fixed towing eye or 50mm

Rearmanual fixed hitch

Side underrun protection acc.to 89/297/EWG

Braking system: double line pneumatic with automatic (ALB) Front and rear plastic mudguards with galvanized supports

Tyres 385/65R22,5 Reg Tyres 385/65R22,5

Tyres 500/60R22 5

Tyres 560/45R22,5

Spare wheel 445/45R19.5 (seperately)

Spare wheel 385/65R22,5 REG. (seperately)

Spare wheel 385/65R22.5 (seperately)

Spare wheel 500/60R22,5 (seperately)

Spare wheel 560/45R22,5 (seperately)

Warning triangle Non standard colours according to RAL CALSSIC codes

Extended platform to 12,5m (+extended hydraulic walls possible)

Net 2,5x2,5cm

* no possibility to adjust the trailer with rear frame extension with ladders

131 >>>>>>



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The self loading bale transportation trailer **PRONAR TB-4** on the tandem suspension provides effective loading and transportation bales of straw and haylage. The trailer is equipped with hydraulic loading platform with a hydraulically steered frontal picking device. The TB-4 allows the fluent and easy loading of bales without usage of any external devices such as lifters or loaders. Rigid drawbar with hydraulic steering of TB-4 trailer provides an easy approach to the bale without unnecessary maneuvering. By tilting the platform to the rear, the trailer unloading system reduces the time of hauling the bales to minimum.

TECHNICAL DATA OF STANDARD EQUIPMENT	TB-4
Allowable total weight [kg]	10500
Load capacity [kg]	7000
Empty weight [kg]	3500
Loading surface [m²]	17,5
Capacity [mm]	12 beles of dimensions 1200×1200
Loading surface width [mm]	6910
Loading platform width [mm]	2550
Dimensions length/width/height [mm]	8970/2830*/1980
Ladders height measured from the platform [mm]	1030
Floor thickness	4
Platform height measured from the ground	950
Wheel track	2000
Suspension	parabolic springs
Towing-eye hitch	1350
Tyres	400/60-15.5
Maximum speed [km/h]	30
Minimum tractor power requirement [KM/kW]	100/73

SOLID - rigid and resistant to overload construction

SAFE - side barriers provide a secure grip of the bale during transport what increases the safety of the operated trailer

EASY TO USE - complete steering from the tractor's cab

COMFORTABLE - low gravity center of the loaded trailer substantially increases its stability while driving

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

Loading platform: hydraulically lifted
Unloading made by tipping the loading platform to the back
Tipping frame: rectangular made of closed profiles
Tandem suspenssion on 4 parabolic springs with 1030 mm axle track with fixed axles with

drum brakes
Drawbar: fixed lower universal transportation hitch

Drawbar: rotary with ø50 mm towing eye Drawbar: fixed with hydraulic steering Hydraulic self loading system at the front

ryon and Sen loading system at the mont Side rants Hydraulically operated rear unloading device Hydraulic distributor steering from the operator's cabin Braking system: single or double line pneumatic or hydraulic Double-component chemically hardened painting materials Crank hand brake

12V lightning system Wheel chocks and racks Frame painting colour: red RAL3000 PRONAR Platform painting colour: green RAL6010 PRONAR

Drawbar towing hitch: fixed with towing eye Ø40 mm Drawbar towing hitch: fixed ball type K80 mm Spare wheel (separately) 400/60-15,5 Waning triangle Non standard colours according to RAL CALSSIC codes Spare wheel (separately)
Braking system: single line











BALE TRANSPORTATION TRAILER **PRONAR T024G**



As the only manufacturer, **PRONAR** offers a professional equipment designed for wetlands and moors. The **T024G** is available with an innovative solution which uses caterpillar suspension with extended swingarm and spring half axles what guarantees easy maneuvering on the swampy and uneven terrain. The trailer is adapted to cooperate with a caterpillar tractor type **RATRAK.**



TECHNICAL DATA	T024G
Allowable total weight [kg]	13000
Load capacity [kg]	8000
Empty weight* [kg]	ok. 5000*
Loading surface [m²]	17,4
Loading platform length [mm]	7170
Loading surface width [mm]	2435
Dimensions length/width/height [mm]	9290/3680/2955
Ladders height measured from the platform [mm]	1680
Floor thickness [mm]	3
Platform height measured from the ground [mm]	1310
Caterpillars track [mm]	2270
Caterpillars width [mm]	1400
Caterpillars length	4040
Suspension	rigid swingarm
Towing-eye hitch [kg]	1925

* total weight depends on the type of caterpillars and additional equipment

INNOVATIVE AND PROFESSIONAL - thanks to the caterpillars

SOLID - light, stable construction and optimal thickness of the platform

EFFICIENT - the height of ladders allows the transportation of two levels of bales, lowered construction facilitates loading









132 >>>>>> Technique for nature 133 >>>>>> pronar.pl



CHASER BIN

PRONAR T740, T743



Efficient, economic and durable, chaser bin enables save time and Money. Not only on farms focused on the production of grain. Chaser bin PRONAR T740 is a versatile machine, used to transport grain and corn, receiving cargo from harvesters, and handling it for trucks and for loading seed drills. It can be used everywhere where tracks are not allowed to enter the field, and harvesters have to ride a long distances to empty their containers. Reduces losses related to the downtime in the harvest season. Electronic weighing system allows to record the weight of reloaded cargo. T740 chassis is suspended on a tandem with parabolic spring suspension with a wheelbase of 1810 mm. A steered rear axle makes it easy to maneuver and significantly decreases tire wear.

Efficient, economic and durable, will save time and money. Necessary not only on farms focused on the production of grain. Chaser bin PRONAR T743 is suspended on the tridem with parabolic springs with active steering system with a 1810 mm wheelbase. Central axle is fixed, outer can be steered.





TECHNICAL DATA OF STANDARD EQUIPMENT	T740	T743
Allowable total weight (construction) [kg]	25000	36000
Allowable total weight [kg]	23000	33000
Load capacity [kg]	15300	22700
Empty weight [kg]	7700	10300*
Load volume [m³]	28	34
Unloading capacity [t/h]	200-400	200-400
Loading box inside lenght [mm]	6015	7265
Loading box inside width [mm]	2492	2492
Dimensions (Lenght/Width/Height) [mm]	9142/2900/3645	10392/2900/3660
Sidewall height [mm]	1440+340	1440+340
Thickness of floor/sidewalls/extensions [mm]	4/4/3	4/4/3
Distance from base to the platform [mm]	3400	3415
Wheel track [mm]	2200	2200
Suspension	Tandem type with passive steering axle on parabolic springs	Tridem type on parabolic springs with active steering
Hitch-ring load [kg]	3000	3000
Tyres	700/50-26,5	700/50-26,5
Maximum speed [km/h]	40	40
Minimum tractor power requirement [hp/kW]	165/121,3	220/161,7
Hydraulically folded coveyor	-	-
Diameter [mm]	430	430
Lenght [mm]	5170	5170
PTO shaft speed [rpm]	1000	1000
Height of the edge of unloading port [mm]	4550-4850	4565-4865











STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T740

Monocoques loading case with additional vertical stiffeners and screwed sidewall extensions Monocoques loading case with additional vertical stiffeners and screwed sidewall extensions with double - auger grain carts
Two-segment front conveyor hydraulically folded with hydraulic safety lock
Double segmented hydraulically folded auger
Double floor conveyor with two-stage controller of floor conveyor speed
Three windows to control the level of loaded material
Hydraulically driven revision hole for load-carrying body cleaning
Canvas frame
Operator's platform on rear side
A ladders facilitating access to the loading case
Tandem type suspension with 4 parabolic springs and wheel track 1810mm, rear axle passively steered
Hydraulic blocking system when driving backwards
Braking system: single or double line pneumatic or hydraulic
Axles for 60 km/h with drum brakes Ø406x140
Crank hand brake
Drawbar: fixed integrated with frame to connect with upper o lower hitch to a tractor
Drawbar support: telescopic supporting leg with 2-sectional gearing mechanism

Drawbar: fixed integrated with frame to connect with upper o lower hitch to a tri
Drawbar support: telescopic supporting leg with 2-sectional gearing mechanism
Drawbar towing hitch: rotary towing eye Ø50mm
Sidewalls profiles with addictional supports and extensions 340mm
PTO shaft with overload clutch with tractor 13/4" Z=20 ending
A set of steel mudguards
Double-component chemically hardened painting materials
Wheel chocks and racks
12V LED lighting system
Frame painting colour: red RAL3000 PRONAR

Loading case painting colour: green RAL6010 PRONAR

Monocoques loading case with additional vertical stiffeners and screwed side Floor with double - auger grain carts

Double segmented hydraulically folded auger

Two-segment front conveyor hydraulically folded with hydraulic safety lock

Double floor conveyor

Two-stage regulation of floor conveyor velocity

Four revision holes for load-carrying body cleaning

Hydraulically driven front revision hole for load-carrying body cleaning

Three windows to control the level of loaded material

Frame of cover with a rope grate part of loaded material Frame of cover with a rope grate perator's platform on rear side Bridge with non-slip grating inside the case along the entire length Chassis with 8-point tipper mounting bolt to support the loading body Tridem suspension on 6 parabolic springs with wheel track 1810mm. Rigid central axle, front and rear axles actively streams.

Loading case painting colour: green RAL6010 PRONAR

Rolled canvas cover Braking system: double line pneumatic with automatic

(ALB)

Braking system: combined (double line pneumatic + hydraulic with electrical safety valve)
6-point weighing system with LCD
Printer
Flexible unloading pipe
Drawbar towing hitch: fixed ball-type K80mm
Spare wheel (separately) 700/50-26.5
Spare wheel (separately) 600/55-26.5
Tyres: 600/55-26.5
Warning triangle

T743

Monocoques loading case with additional vertical stiffeners and screwed sidewall extensions

steered Axles for 60 km/h with drum brakes Ø406x140

Axles for 60 km/h with drum brakes Ø406x140
Drawbar: rigid integrated with frame to connect with upper r lower hitch to a tractor
Drawbar towing hitch: fixed ball-type K80mm
Drawbar support: telescopic supporting leg with 2-section gearing mechanism
Sidewalls profiles with addictional supports and extensions 340mm
Hydraulic steering with manual pump filling system
Steering connection system consistent with ISO 26402 (trailer is not equiped with tractor steering system)
Braking system: single or double line pneumatic or hydraulic
Pneumatic parking brake
12V LED lighting system
A set of steel mudguards
Wheel chocks and racks
Double-component chemically hardened painting materials
Loading case painting colour: green RAL6010 PRONAR

Braking system: double line pneumatic with (ALB) Braking system: combined (double line pneumatic + hydraulic with electrical safety valve) 8-point weighing system with LCD Printer Flexible unloading pipe Rolled canvas cover Spare wheel (separately) 700/50-26.5 Spare wheel (separately) 600/55-26,5 Tyres: 600/55-26,5

Warning triangle



Two-segment front conveyor hydraulically folded with hydraulic safety lock





136 >>>>>> Technique for nature 137 >>>>>> pronar.pl



MIXER FEEDERS PRONAR VMP- 5S, VMP- 5ST, VMP-6S, VMP- 6ST	140
MIXER FEEDERS PRONAR VMP- 8/1-T, VMP- 10/1-T	142
MIXER FEEDERS PRONAR VMP-10,VMP-10S	143
MIXER FEEDERS PRONAR DVMP-12, DVMP-14, DVMP-16, DVMP-18	140

PRONAR Trailers pronar.pl 139 >>>>>>

Series of small mixer feeders **PRONAR** with tank capacity form 5m³ to 6m³ with vertical auger of high efficiency is an ideal solution for breeders who have small cowsheds. Machines are solid and reliable thanks to thier construction. Strong mixer augers with hardened, high quality divided cutting blades which are used in these series are characterized by low power requirement. They provide efficient preparing feed and optimal crumbling. Mixers are based on profiled, rigid tanks, with stable floors, what guarantee quick and effective mixing of feed. **PRONAR** mixer feeders are available in two versions of feed dosage system. In "S" versions discharging window is mounted at the front on the right side while in "ST" version there are two discharge windows arranged one at the rear and one on the side. In standard version mixer feeders are equipped with three point weighting system and LCD display.

SOLID - profiled mixer-feeder tank is characterized by high rigidity and resistance to abrasion or deformation

PRECISE - equipped with 3-point weighting system

EFFICIENT - use of a mixer auger of the optimum shape reduces cutting time and mixing feed and also reduces the cost of

COMFORTABLE - the ability to choose the most suitable variant of the dump for the operator



Auger with optimal shape increases efficiency of mixing







TECHNICAL DATA OF STANDARD EQUIPMENT	VMP-5S	VMP-5ST	VMP-6S	VMP-6ST	
Allowable total weight	3650	3850	4300	4500	[kg]
Load capacity	1950	1950	2350	2350	[kg]
Empty weight	1700	1900	1950	2150	[kg]
Tank capacity	5	5	6**	6**	$[m^3]$
Maximum tank length	2990	2990	2990	2990	[mm]
Maximum tank width	2190	2190	2190	2190	[mm]
Tank height	1430	1430	1680***	1680***	[mm]
Tank floor diameter	1700	1700	1700	1700	[mm]
Dimensions (Length/Width/Height)	3880/2190/2130	3880/2190/2130	3880/2190/2380	3880/2190/2380	[mm]
Tank floor/sidewall/extensions thickness	12/6	12/6	12/6	12/6	[mm]
Platform height, measured from the ground	695	695	695	695	[mm]
Wheel track	1500	1500	1500	1500	[mm]
Suspension	rigid	rigid	rigid	rigid	
Towing-eye hitch	800	845	945	990	[kg]
Tyres	10.0/75 -15.3	10.0/75 -15.3	10.0/75 -15.3	10.0/75 -15.3	
Construction speed	15	15	15	15	[km/h]
Weighting system	3-points	3-points	3-points	3-points	
Feed discharge system	lateral with window on the right hand side	two windows: rear side and right side at the front	lateral with window on the right hand side	two windows: back side and right side at the front	
Number of mixer rotations (PTO ratio 540 RPM)	33	33	33	33	[rpm]
Minimum tractor power requirement	55/40.5*	55/40.5*	60/44*	60/44*	[hp/kW

Minimum tractor power requirement depends on the type of the mixing fodder Tank capacity with side extension 250 mm

PRONAR VMP-5ST - Two discharge windows: rear side and right side at the front



140 >>>>>> Technique for nature 141 >>>>>>

[&]quot;" Internal tank height with extension

The new mixer feeder models that are part of the **VMP /1T** series are based on an entirely new tank design. Its shape was optimized (taller and narrower), which, combined with the auger also used in **DVMP** series, allowed for significant improvement of the mixing process. The 8 m³ tank (model **VMP -8 / 1T**) can be equipped with a additional wall with the capacity of 2 m³. This allows the modular expansion and thus creation of another model - VMP -10/1T.

TECHNICAL DATA OF STANDARD EQUIPMENT	VMP- 8/1-T	VMP- 10/1-T
Permissible total weight: [kg]	7340	8440
Empty weight: [kg]	3740	3940
Volume of container: [m³]	8	10
Maximum width of container: [mm]	2425	2425
Internal height of container: [mm]	1708	1958
Width of container floor: [mm]	2000	2000
Dimensions: length/width/height: [mm]	4820/2425/2658	4820/2425/2908
Floor/wall thickness: [mm]	20/8	20/8
Platform height, measured from the ground: [mm]	816	816
Wheel track: [mm]	1700	1700
Suspension:	rigid	rigid
Hitch-ring load: [kg]	1300	1300
Tyres:	30x11,5-14.5 RE	30x11,5-14.5 RE
Construction speed: [km/h]	25	25
Weighting system:	4-points	4-points
Dosage system:	frontal, conveyor belt discharge to the left or right	frontal, conveyor belt discharge to the left or right
Number of mixers: [szt.]	1	1
Number of mixer rotations (PTO ratio 540 RPM): [obr/min]	18/33	18/33
Tractor power requirement: [kW/KM]	44/60*	48/65*

^{*}the minimum power requirement of a tractor is the indicative, lowest power requirement for a tractor PTO. Value dependent on physical properties used mixingredients





Mixer feeder with discharge conveyor belt VMP-10/1T

Discharge conveyor belt

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

seria VMP /1T

Chassis frame type: rectangular with closed profiles High rigidity profiled tank Drawbar type: bolted drawbar, lower and upper hitch Drawbar type: Rotary with 50 mm eye Type of drawbar support: mechanical Unbraked driving axle Anti dump protection Stirrer type: one modernized screw stirrer 8 very high abrasion resistance cutting knives Interchangeable cutting knife blades Ability to set cutting knives in two positions Two counterweights in the tank box manually adjustable Central front dispensing window, conveyor belt dump, left or right side dump Hydraulic window opening controlled by levers placed in the tractor Weight system with LCD display Power transmission shaft for connecting to tractor

Rear dump placed centrally Side elevation (conveyor belt) on the right side Rear light beam Preview window in the front wall Magnet for small metal components Counterweight manual assistance levers Hydraulic controlled counterweights Hydraulic drawbar support

Parking handbrake with crank Single line pneumatic braking system Double line pneumatic braking system

Hydraulic braking system

Control of the two-speed gearbox (control lever) from the tractor

PRONAR VMP-10, VMP-10S

Mixer feeders **PRONAR VMP10 and VMP-10S** with tank capacity 10m³ is a perfect solution for livestock breeders with 50-60 cows. Mixing mechanism is characterized by low power requirement. Removable and adjustable cutting blades and two mechanically operated counter blades. Shape of mixing chamber guarantees proper chopping and mixing of the fodder . 4-point weighing system with LCD display allows to dispense accurately the ingredients and portions for individual cattle.

Mixer **VMP10** has two discharge windows symmetrically arranged on the sides of a tank. In **VMP-10S** two unbalanced discharge windows are used, which ensure an even and fast discharging the tank. Nine cutting blades in the auger guarantee long and failure-free work of the mixer auger.

TECHNICAL DATA OF STANDARD EQUIPMENT	VMP-10	VMP-10S
Allowable total weight [kg]	7700	7700
Load capacity [kg]	4000	4000
Empty weight [m³]	3700	3700
Tank capacity* [mm]	10*	10*
Maximum tank length [mm]	3530	3530
Maximum tank width [mm]	2490	2490
Tank height** [mm]	1588**	1588**
Tank floor diameter [mm]	1960	1960
Dimensions (Length/Width/Height) [mm]	4860/2550/2670	4860/2490/2700
Tank floor/sidewall/extensions thickness [mm]	20/8/8	20/8/8
Tank height, measured from the ground [mm]	820	820
Wheel track [mm]	1700	1700
Suspension [kg]	rigid	rigid
Towing-eye load [kg]	1300	1300
Tyres [km/h]	30x11.5-14.5 RE	30x11.5-14.5
Construction speed [km/h]	25	25
Weighting system	4-points	4-points
Feed discharge	lateral with windows on sidewalls	lateral with windows on sidewalls
Number of mixer rotations (PTO ratio 540 RPM) [rpm]	33	33
Minimum tractor power requirement	65/47,8***	65/47,8***

- * Tank capacity with side extension 250 mm
- "* Internal tank height with extension
- Minimum tractor power requirement depends on the type of the mixing fodder



142 >>>>>> Technique for nature pronar.pl 143 >>>>>>





LCD display follows the weight of fodder and time of work

VMP-10S - discharge windows with gutters and covers

Mixer feeders PRONAR VMP-10 and VMP-10S

FUNCTIONAL - reduces the operating time of the tractor, saves time and fuel

SOLID - profiled mixer-feeder tank is characterized by high rigidity and resistance to abrasion or deformation

RELIABLE - Italian gear Comer

PRECISE - equipped with 4-point weighing system

EFFICIENT - use of a mixer auger of the optimum shape reduces cutting time and mixing feed and also reduces the cost of preparing doses

UNIVERSAL - by removing or adding a wall extension we can reduce or enlarge the volume by 2m³



STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL)

Chassis frame: rectangular made of closed profiles

Profiled container of high stiffness
Drawbar: fixed to couple with lower hitch of the tractor

Drawbar towing hitch: rotary with Ø50 towing eye Drawbar support: mechanical telescopic leg

Mixer type: 1 vertical auger 9 abrasion-resisitant knives

Changeble cutting knives on the vertical mixer

Cutting knives adjustable in 2 positions

Two counter-knives manually regulated Two discharge windows hydraulically driven

Mixer drive 540min-1, with gearcase, number of mixer rotations 25,6min-1

Adjustable chutes under the windows

Rubber protections in discharge windows

Weighting system with LCD to control the mixer and the loading weight Operator's platform with stairs on the both sides of the mixer feeder $% \left(1\right) =\left(1\right) \left(1$

Upper protection rim Wheel chocks + racks

Double-component chemically hardened painting materials, UV-resistant

Chute and platform color: red RAL3000 PRONAR Chassis and container color: green RAL6010 PRONAR

VMP-10

Drawbar: fixed with towing eye for upper hitch of the tractor mieszadła $\,$ 33 min-1 Drawbar towing hitch: fixed with towing eye Ø40 $\,$

PTO shaft

Additional angular knife mounted on the top of the agitator $% \left(1\right) =\left(1\right) \left(1\right)$ Special auger drive, 540min-1, $\,$ with II-gear gearcase, auger rpms 33min-1 - on I gear,

17min-1 - on II gear

Without extensions 250mm (decreasing capacity to 8m³)

Additional two levers for easier manual operation of counter knives

Spare wheel (separately)

Lighting system

Braking system: hydraulic

Braking system: pneumatic single or double line Crank hand brake

Warning triangle

Hydraulic instalation of counter knives with divider and steering levers

STANDARD EQUIPMENT

Chassis frame: rectangular made of closed profiles
Profiled container of high stiffness
Drawbar: fixed to couple with lower hitch of the tractor
Drawbar towing hitch: rotary with Ø50 towing eye
Drawbar support: mechanical telescopic leg
Mixer type: 1 modernized vertical auger
9 abrasion-resisitant knives
Changeable cutting knives on the vertical mixer

the discharge Weight system with LCD to control the mixer and the loading weight

Operator's platform with stairs on the both sides of the vehicle

Double-component chemically hardened painting materials, UV-resistant

Changeable cutting knives on the vertical mixer

Chute and platform color: red RAL3000 PRONAR Chassis and container color: green RAL6010 PRONAR

Cutting knives adjustable in 2 positio

Wheel chocks + racks

Upper protection rim

ADDITIONAL EQUIPMENT (OPTIONAL)

VMP-10S

Special auger drive, 540min-1, with II-gear gearcase, auger rpms 33min-1 - on I gear, 17min-1 on II gear Number of knives up to 11 pieces

Drawbar towing hitch fixed with towing eye for upper hitch of tracotr

Drawbar towing hitch: fixed with towing eye Ø40

Without extensions 250mm (decreasing capacity to 8m³)

PTO shaft

Spare wheel (separately)

Warning triangle

Two counter-knives manually regulated
Mixer drive 540min-1, with gearcase, number of mixer rotations 25,6min-1
Two discharge windows hydraulically driven, asymmetrically located
Adjustable metal chutes under the windows
Curtains made of tarpaulin material in the light of the dosing windows to regulate and limit Two additional levers for easier manual operation of counter knives

Lighting system

Braking system: hydraulic Braking system: pneumatic single or double line

Crank hand brake Hydraulic system of counter knives with a distributor and control levers

Additional angular knife mounted on the top of the agitator

Anti-dumping rim (fixed)







Mixer auger with nine serrated blades



144 >>>>>> Technique for nature 145 >>>>>> pronar.pl

PRONAR DVMP-12, DVMP-14, DVMP-16, DVMP-18



The main task of the DVMP series of twin-auger mixer feeders is mixing and feeding. Spiral construction of mixing augers ensures faster and more efficient mixing of the forage. A characteristic feature of every model is the modular structure of the tank. Proper mixing of the feed is ensured by the scraper welded to the screw. Magnets mounted directly to the scraper catch metal pieces what increases cattle safety. An electronic weighing system with very high accuracy which is based on four sensors, guarantees an effective and proper feeding. Thanks to the weighing system, it is possible to precisely control the loading of feed and calculate its amount for the needs of the herd.

TECHNICAL DATA OF STANDARD EQUIPMENT	DVMP-12	DVMP-14	DVMP-16	DVMP-18	
Permissible total weight (technically):	11500	12500	13500	13500	[kg]
Permissible total weight:	10450	11350	11350	11350	[kg]
Empty weight:	5650	5930	6180	6350	[kg]
Volume of container:	12	14	16	18	[m3]
Maximum width of container:	2370	2370	2460	2460	[mm]
Internal height of container:	1460	1660	1810	2010	[mm]
Width of container floor:	2000	2000	2000	2000	[mm]
Dimensions: length/width/height:	6280/2370/2600	6280/2370/2600	6380/2460/2730	6380/2460/2940	[mm]
Floor/wall thickness:	20/8	20/8	20/8	20/8	[mm]
Platform height, measured from the ground:		830			[mm]
Wheel track:		1475			[mm]
Suspension:			rigid		
Hitch-ring load:		1400			[kg]
Tyres:		215/	/75 R17.5 (twins)		
Construction speed:		25			[km/h]
Weighting system:			4-points-		
Dosage system:	windows on sides asymmetrically located				
Number of mixers		2			pcs.
Number of mixer rotations (PTO ratio 540 RPM):		17 or 33			[rpm]
Tractor power requirement:	55/75*	60/82*	65/88*	70/95*	[KW/HP]

PRONAR DVMP-12 **PRONAR DVMP-18**













STANDARD EQUIPMENT

Chassis frame: rectangular made of closed profiles Profiled container of high stiffness Drawbar: fixed to couple with lower hitch of the tractor Drawbar towing hitch: rotary with Ø50 towing eye

Changeble cutting knives made of abrasion-resisitant steel - 7 pcs

Discharge windows hydraulically driven by handles from tractor cabin Weighting system with LCD to control the mixer and the loading weight

Two counter-knives manually regulated
Two discharge windows asymmetrically located on sides

Drawbar support: mechanical telescopic leg

Protecting rim on top of container ${\it Mixer type: 2 modernized vertical augers}$

Cutting knives adjustable in 2 positions

ADDITIONAL EQUIPMENT (OPTIONAL)

DVMP-12 ,14,16,18

Lighting system with light bar Window at the front of container Magnets catching small metal elements (located at the base of augers)
Counter-knives hydraulically regulated Tires 435/50R19.5



146 >>>>>> Technique for nature 147 >>>>>> pronar.pl



PRONAR T644/1

Log transportation trailer PRONAR T644/1 is equipped with hydraulically steered drawbar that makes it easier to manoeuvre around trees. The distance between side posts allows to transport long logs or thin branches. Crane is controlled by using Bowden's cords connected to the hydraulic distributor. Maximum reach is 6900 mm and its maximum lifting capacity with that reach is 450 kg. Lever set mounted inside the tractor and their proper length allow to work with tractor of any brand.



TECHNICAL DATA OF STANDARD EQUIPMENT	T644/1
Allowable total weight (construction) [kg]	13000
Allowable total weight [kg]	12200
Load capacity [kg]	8000
Empty weight [kg]	4200
Load volume [m3]	10.5*
Side posts number [pcs.]	10
Loading box inside length [mm]	3470 (4310°)
Loading box inside width [mm]	1810
Dimensions length/width/height [mm]	6440*/2100/3300**
Height of Loading space [mm]	1440
Crane working diameter [mm]	6900
Crane load capacity in maximum working diameter [kg]	450
Rotation angle of the crane [°]	200(left)+200(right)
Wheel track [mm]	1670
Suspension	tandem type on trailing arm with bearing
Drawbar rotation angle – to the left/to the right	24º/24º
Hitch-ring load [kg]	2000
Tyres	400/60-15,5 145A8 Flot+
Construction speed [km/h]	30
Minimum tractor power requirement [hp/kW]	65/47.8
Maximum working pressure of the hydraulic system	180
Minimum external tractor hydraulic system requirements	oil cooling system with min. 40l with pomp oil flow rate min. 40l/min



Crane with telescopic support legs and rotary grapple





Tandem type suspension with 2 trailing arms and fixed axle Drawbar support: straight, mechanic shafts equipped with drum brakes







Strong stanchions and front protective barrier

Hydraulic telescopic loader support

STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T644/1

Frame: rectangular frame with additional protective steel sheet over axels. Tandem type suspension with 2 trailing arms and fixed axle shafts equipped with drum brakes

Drawbar support: straight, mechanic
Front barrier separating loading space
Hydraulically extendable rear frame with side posts
Hydraulically controlled drawbar with fixed towing eye 40 mm, DIN11026

Drawbar blockade for driving straight
Crane with telescopic support legs and rotary grapple.
Power supply from tractor's hydraulic distributor
Hydraulic distributor operated by strings from the tractor

Braking system: double line pneumatic

Wheel chocks + racks (2pcs)
Chemically hardened two-component painting materials , UV-resistant.
Frame painting colour: green RAL 6010 PRONAR
Crane painting colour: red RAL 3000 PRONAR
Front barrier and side posts painting colour: black RAL 9005

Drawbar towing hitch rotary with towing eye Ø50 Drawbar towing hitch:ball -type K80 Self hydraulic system PTO shaft 6×6

PTO shaft 21×6 Two additional side posts on the frame Wheels 400/60-15,5 156A8 Flot

Slow-moving vehicle triangle



150 >>>>>> Technique for nature 151 >>>>>> pronar.pl



PRONAR TRAILER T400	15
PRONAR TRAILER TAGOR	15



PRONAR T400 - trailer is ideal for biomass transportation. It gives huge savings in the process of delivering the biomass to the storing or processing points. The body of the trailer is made of twisted frame that secures the boards made of zincked trapezoidal profile. The platform has a trapezoidal profile where the front side of the platform is shorter than the back side what guarantees fast and easy unloading. The trailer **T400** with tandem suspension is eqquipped with passive steering rear axle which means that the trailer does not damage to the sward during

TECHNICAL DATA OF STANDARD EQUIPMENT	T400
Permissible total weight (technically) [kg]	23000
Permissible total weight [kg]	22000
Load capacity [kg]	14550
Empty weight [kg]	7450
Loading capacity [m³]	40
Loading surface [m²]	16,84
Loading case inside length [mm]	8000
Loading case inside width [mm]	trapezoid 2080/2130
Dimensions (length/width/height) [mm]	10100/2900/3950
Sidewall [mm]	2260
Sides thickness [mm]	0,75
Platform height measured from the ground [mm]	1690
Wheel track [mm]	2200
Wheelbase [mm]	1810
Suspension	tandem on parabolic springs with steered axle
Towing-eye hitch [kg]	2000
Tyres	700/50-26,5
Maximum speed [km/h]	40
Minimum tractor power requirement [HP/kW]	160/118

LARGE CAPACITY - 40 m³ of the load volume puts PRONAR T400 among top trailers of its kind available on the market

 $\textbf{SUSPENSION} \cdot tandem \ suspension \ with \ passive \ steered$ axles reduces damage done to the Tyres and allows aggregation with a tractor of lower HP

EVEN BIOMASS UNLOADING - dosage cylinders available in additional equipment allow unloading the biomass from the box evenly

EASY AND DURABLE CONSTRUCTION - uncomplecated but well thought and durable construction that provides long term and failure free usage

Drawbar towing hitch: fixed ball-type K80mm Steel floor board with thickness 3mm with metal rails for conveyor

Green fodder chaff dosing rollers powered with sha clutch with standard PTO shaft Braking system: single line pneumatic or hydraulic Braking system: double line pneumatic with ALB Spare wheel separately 700/50-26.5

Paintwork RAL CLASSIC for industrial uses Rear manual hitch amortized

Corn chaff dosing rollers powered with shaft equiped in automatic clutch with standard PTO shaft
Green fodder chaff dosing rollers powered with shaft equiped in automatic

Front wall tilted forward (needs to change elastomeric shock absorbers on

STANDARD EQUIPMENT ADDITIONAL EQUIPMENT (OPTIONAL):

T400 Loading box with bolted walls, adapted to mounting additional dosing rollers, drivetrain of metering rollers and PTO shaft Walls with trapezoidal profiles and ALUCYNK coating Wooden floor board with metal rails for conveyor chains Rear wall winched hydraulically with manual locking system Openwork front wall Hydraulically folded openwork front wall Sidewalls fastening strings Chassis frame made of rectangular closed profiles. Tandem on 4 parabolic springs with axle base 1810mm, compensatory swingarms, fixed front axle and passively steered rear axle. Drum brakes 406x140mm. Axles for 60 km/h. Rigid drawbar with elastomeric shock absorber, adapted to couple with lower hitch of the tractor

Axies for 60 km/n.

Rigid drawbar with elastomeric shock absorber, adapted to couple with lower hitch of the tractor Drawbar towing hitch-rotary with Ø50 towing eye Drawbar support: telescopic mechanical straight leg Hydraulic steering from tractor distributor Hydraulically driven floor conveyor of 4 chains, drivetrain of the conveyor on both sides Braking system: double line pneumatic Crank hand brake

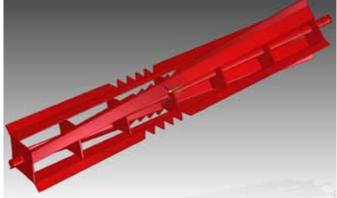
Whool Professor Staffs (2 per)

Wooden floor board with metal rails of conveyor's chains

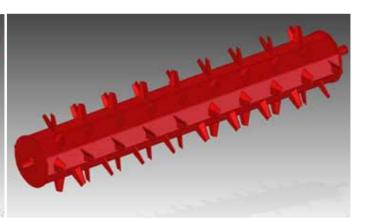
Crank hand brake
Wheel chocks + racks (2 pcs).
12V lighting system with rear electric socket
Rear lamps with protective grating
Mudguards
Rear fouldable underrun protection
Chemically hardened two-component painting materials , UV-resistant
Sidewall color: natural ALUCYNK
Chassis (rawbar ayes; rear har and mudguards color; red RAL 3000 PS Chassis, drawbar, axles, rear bar and mudguards color: red RAL 3000 PRONAR Loading box color: green RAL 6010 PRONAR the drawbar) Rear automatic hitch Warning triangle Tyres710/50R26,5

Drawbar support telescopic mechanical straight leg





Spreading rollers for chopped corn with power transmission mechanism and connection shaft



Spreading rollers for green forage with power transmission mechanism and connection shaft



Tandem suspension equipped with passive steering rear axle reduces wear on the tyres and



40m³ loading volume reducing transport cost, making it easy to manoeuvre and prevents damage to the sward during cornering and reduces tyre wear on the road





155 >>>>>> **154** >>>>>> Technique for nature pronar.pl

PRONAR T400R

Forage wagon **PRONAR T400**R is a multi-purpose wagon suitable for each farm, where high performance is desired. Due to the high capacity and throughput rate, the wagon provides fast harvesting of green fodder as well as transportation of corn or silage. The use of forage wagons gives huge savings in the process of delivery, harvesting and transportation to the points of the storage or processing. **T400R** is a very good investment for farms with large areas of grassland. The wagon simplifies the work because there is no need of using the additional equipment for the transportation of forage. **T400R** also reduces the physical workload and the fuel consumption.



TECHNICAL DATA OF STANDARD EQUIPMENT	T400R
Permissible total weight(technically) [kg]	28000
Permissible total weight [kg]	24000
Load capacity [kg]	12500
Empty weight [kg]	11500
Load volume [m ³]	41
Load volume with medium compression [m ³]	72
Loading case inside lenght [mm]	7840
Loading case inside width [mm]	2300
Sidewall height [mm]	2280
Dimensions: length/width/height [mm]	10750/2850/3990
Loading case thickness (sides) [mm]	0,75
Distance from base to the platform [mm]	1700
Pick up width [mm]	2000
Number of rotor tines [pcs.]	"240 (120 double tines)"
Rotor diameter [mm]	800
Number of knives (on rotor) [pcs.]	45
Theoretical chopped length [mm]	34
Wheel track [mm]	2200
Axle base [mm]	1810
Suspension	hydraulic-tandem
Hitch-ring load [kg]	4000
Tyres	700/50-26.5
Maximum speed [km/h]	40
Tractor power requirement [hp/kW]	182/133,8
Requirement for external hydraulic system of the tractor	
max. pressure [bar]	200
max. efficiency [ltr/min]	130

Pick-cam with eight rows of tines receiving roller and torsion aligning wheels





STANDARD EQUIPMENT

ADDITIONAL EQUIPMENT (OPTIONAL):

T400R

Loading box with bolted walls, adapted to mounting additional dosing rollers with drivetrain. Walls with trapezoidal profiles and ALUCYNK coating

Wooden floor board with metal rails for conveyor chains.

Openwork front wall. Rear wall - hydraulically lifetd.
Central hydraulic system controlled from tractor's cabin by electric panel
Hydraulically folded openwork front wall

Sidewalls fastening strings
Chassis frame made of rectangular closed profiles.
Hydraulically amortized drawbar with fluent height regulation (hitch, piton fix, ball-type K80)

Drawbar towing hitch- rotary with Ø50 towing eye (piton, piton-fix)
Hydraulic tandem suspension with 4 parabolic half-springs, axle base 1810mm, rigid front axle and passively steered rear axle. Suspension is stabilized and regulated hydraulically.

Pick-up with ground following wheel and roller. Rotor made of wear-resistant steel. Cutting beam equipped with 45 independent knives, each protected by spring. Drawbar support: telescopic with 2-section gear.

Chain conveyor with 6 chains and 2-stage hydraulic drive.

Braking system: double line pneumatic with manual braking force regulator 12V lighting system with side marker lights, rear lamps with bars protecting against damage.

Wheel chocks and racks

Wide-angle PTO shaft Metal mudguards

Double-component chemically hardened painting materials Red RAL3000 PRONAR- frame, drawbar, axles, mudguards, rear beam. Green RAL6010 PRONAR- loading box

Drawbar towing hitch rigid ball-type K80 mm Drawbar towing hitch rigid with towing eye \emptyset 50 mm to couple with hitch of

the tractor – hitch or piton fix

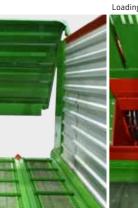
Braking system double line pneumatic with ALB

Braking system: hydraulic Tyres 800/45R26,5

The rear wall lifted hydraulically, loading case adapted to be assembled with metering rollers.



6- chains conveyor



Loading rotor made of wear-resistant steel



156 >>>>>> Technique for nature 157 >>>>>> pronar.pl



PRONAR Sp. z o.o. makes it possible to contact a technical and sales consultant directly.

Kevin Kiersnowski – France

Mobile: +48 502 782 749, kevin.kiersnowski@pronar.pl

Sylwia Nazarko – France

Mobile: +48 510 925 615, sylwia.nazarko@pronar.pl

Katarzyna Prusinowska – France

Mobile: +48 515 278 107, katarzyna.prusinowska@pronar.pl

Jan Włodarczyk – Africa

Mobile: +48 506 137 284, jan.wlodarczyk@pronar.pl

Daniel Veres - Argentina, Uruguay, Chile, Greece

Mobile: +48 507 107 234, daniel.veres@pronar.pl

Aleksnadra Jankowska - Italy, Spain, Portugal, Australia, New Zealand

Mobile: +48 510 925 666, aleksandra.jankowska@pronar.pl

Justyna Ostaszewska – Colombia, Venezuela, Ecuador, Peru, Bolivia, Brazil, Paraguay, Mexico, Panama, Cuba

Mobile: +48 690 299 659, justyna.ostaszewska@pronar.pl

Katarzyna Zajko – Belgium, Netherlands, Luxemburg

Mobile: + 48 504 197 468, katarzyna.zajko@pronar.pl

David Roberts - Great Britain, Ireland

Mobile: +48 502 861 716, david.roberts@pronar.pl

Łukasz Gryncewicz – Sweden

Mobile: + 48 507 923 859, lukasz.gryncewicz@pronar.pl

Łukasz Krawczuk - Norway, Canada, USA

Mobile: +48 515 068 475, lukasz.krawczuk@pronar.pl

Wojciech Parfieniuk – Denmark, Finland, Iceland, Greenland

Mobile: +48 506 048 839, wojciech.parfieniuk@pronar.pl

Dorota Nowik -Lithuania, Russia, Uzbekistan

Mobile: +48 515 278 105, dorota.nowik@pronar.pl

Michał Bobkowski – Slovakia, Croatia, Bosnia&Herzegovina

Mobile: +48 506 142 470, michal.bobkowski@pronar.pl

Siarhei Semakovich – Belarus, Kazakhstan, Ukraine, Armenia, Azerbaijan, Georgia, Kyrgyzstan, Tajikistan

Mobile: + 48 510 925 664, siergiej.siemakowicz@pronar.pl

Kamila Iwaniuk - Hungary, Slovenia

Mobile: +48 500 097 357, kamila.iwaniuk@pronar.pl

Joanna Jessa – Estonia, Latvia, Israel, Turkmenistan

Mobile: +48 505 699 377, joanna.jessa@pronar.pl

Maciej Jabłokow – Romania

Mobile: +48 510 925 715, maciej.jablokow@pronar.pl

Lenka Kruszewska – Hoborova – Czech Republik

Mobile: +48 502 861 668, lenka.kruszewska@pronar.pl

Andrzej Czerniakiewicz - Bulgaria, Moldova, Serbia

Mobile: +48 501 095 589, andrzej.czerniakiewicz@pronar.pl

Karol Tołoczko - South Romania, Albania, North Macedonia

Mobile: +48 500 121 984, karol.toloczko@pronar.pl







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 PRONAR Sp. z o.o.
 tel.:
 +48 85 681 63 29

 17-210 Narew
 +48 85 681 64 29

 ul. Mickiewicza 101A
 fax:
 +48 85 681 63 83

pronar.pl