# **Wheel Loader**

Wheel loader is a construction machinery of earth and stone extensively used in the building of roads, railways, architecture, hydroelectricity, ports and mines. It is mainly used for shoveling soil, ores, limes charcoals and other loose materials. It can also be used for a light shoveling of ores and pan soil. With different auxiliary devices, it can bulldoze, lift, and load and unload other materials like lumber. Wheel loader is used to dig and fill roadbeds, aggregate and load asphalt mixture and cement concrete soil stock ground in the construction of roads, especially high-caliber roads. Besides, it can bulldoze soil, slick the ground, and tow other machinery. Thanks to its rapid operational speed, high efficiency, fine mobility and handy movement, it had become one of the major machinery in the earth and stone construction.



#### W136 Wheel Loader

- 1. Energy-saving, ecomonical, with a much lower consumption of oil per hour than other products of the same kind.
- 2. A good overall structural strength, solid and durable, low cost of operation, easy maintenance.
- 3. Fully exemplifying human-oriented concept of design and make the operators more comfortable when using it.
- 4. A harmonious overall layout, an advanced design allocation, an excellent capacity, a strong mobility and high efficiency.

### W156 Wheel Loader

1. Great brand engine, high power, low oil-consumption, low noise and reliable performance.

- 2. Double turbo hydraulic torque converter, planet power shifting transmission and higher transmission efficiency.
- 3. Fortified axles by optimization of European technology has stronger loading competence, stronger driving power and higher reliability.
- 4. Integral instrument platform -- pretty and elegant, reliable quality, durability and long service life.
- 5. Rear frame with box structure, hinged panels with low stress and high strength steel -- sturdy and durable;
- 6. Hydraulic parts and components such as cylinders, pumps, valves are all adapt domestic and international famous brands -- stable and reliable.

## Main Specification of W136 Wheel Loader

IVIC	Ivialit Specification of vv 130 vvileer Loader					
Ma	ain standard Con	figuration	on		Y.	
1	Bucket Capacity			1.8M³		
2	Rated Load	d Load			3200kg	
	Travelling Speed					
3	Forward 1st				0-10.8km/h	
	Forward 2nd				0-32.5km/h	
	Reverse 1st				0-14.5km/h	
4	Max. Traction				97±5kN	
5	Max.Break Out	Force			100±5kN	
6	Min. Turning Radius (outside tires)			5376±50mm		
7	Max. Dumping Height			3060±50mm		
8	Max. Dumping Reach			1008±50mm		
9	Total Hydraulic Cycle Time			≤10.3s		
10	Full Bucket Lifting Time			≤5.6s		
11	Wheel Base			2750±30mm		
12	2 Tread Width			1800±10mm		
13	Dimensions (L×W×H)			6970±100×2245±50×3286±50mm		
14	Min. Clearance Over Ground				360±20mm	
15	Operating Weigl	ht			10000±100kg	
Die	esel Engine					
1	Model	YuCha	Chai Duetz		Cummins 6BT5.9-C130	
2	Туре	Direct injection, water cooling,			4 strokes,	
3	Rated Output	92kW	92kW		97kW	
4	Rated Speed	2200rp	om			
5	Max. Torque	460N.r	n	500N.m	560N.m	
Tra	Transmission					
1	Model		self made			
=						

Transmission Type	2	Rated Input Speed 2200rpm						
1   Gear	3	Transmission Type	two for	<u>'</u>				
2   Gear II	Me							
1.8846   Hydraulic Oil Pressure   1.10-1.40Mpa	1	Gear I			2.576			
Hydraulic Oil Pressure	2	Gear II		0.691				
	3	Reverse			1.8846			
6 Outlet Oil Pressure Of Torque Convertor	4	Hydraulic Oil Pressure			1.10-1.40Мра			
Table   Tab	5	Inlet Oil Pressure Of Tore	que Co	nvertor	0.33-0.5Mpa			
Max. Permissible Temp & Outlet Of Torque   120°C	6	Outlet Oil Pressure Of To	orque C	Convertor	0.1-0.20Mpa			
Transaxle & Tyre	7	Lubricating Oil Pressure			0.1-0.20Mpa			
Transaxle Type	8		p & (	Outlet Of Torque	<b>120</b> ℃			
2   Drive System	Tr	ansaxle & Tyre						
Rear Axle Oscillation Center oscillation    Oscillating Angle of Rear Axle	1	Transaxle Type			Fenyi			
Oscillating Angle of Rear Axle   12°	2	Drive System			4 wheel drive			
5 Carrier Assembly Reduction Ratio 4.375 6 Wheel End Reduction Assembly Reduction Ratio 4.75 7 Tire 17.5-25 8 Pressure Of Tire 0.28-0.32MPa Working Hydraulic System 1 Working Pump Type Gear Pump 2 System Working Pressure 16MPa 3 Lifting Cylinder Bore × Stroke 125×816mm 4 Tilting Cylinder Bore × Stroke 140×553 mm Steering System 1 Type full hydraulic power steering system 2 Steering Pump Type CBY2050 (reverse) 3 Max. Working Pressure 10MPa 4 Steering Cylinder Bore × 80×340mm 5 Max. Steering Angle ±36° Brake System 1 Type Air over hydraulic disc on four wheels brakes Oil Injection Capacity 1 Fuel Tank 150L	3	Rear Axle Oscillation			Center oscillation			
Wheel End Reduction Assembly Reduction Ratio 7 Tire 17.5-25 8 Pressure Of Tire 0.28-0.32MPa Working Hydraulic System 1 Working Pump Type Gear Pump 2 System Working Pressure 16MPa 3 Lifting Cylinder Bore × Stroke 125×816mm 4 Tilting Cylinder Bore × Stroke 140×553 mm Steering System 1 Type full hydraulic power steering system 2 Steering Pump Type CBY2050 (reverse) 3 Max. Working Pressure 10MPa 4 Steering Cylinder Bore × Stroke 80×340mm 5 Steering Cylinder Bore × Stroke 10MPa 5 Steering Cylinder Bore × Stroke 10MPa 6 Tilting Cylinder Bore × Stroke 10MPa 7 Steering Cylinder Bore × Stroke 10MPa 8 Steering Cylinder Bore × Stroke 10MPa	4	Oscillating Angle of Rear	Axle	12°				
Tire 17.5-25  8 Pressure Of Tire 0.28-0.32MPa  Working Hydraulic System  1 Working Pump Type Gear Pump  2 System Working Pressure 16MPa  3 Lifting Cylinder Bore × Stroke 125×816mm  4 Tilting Cylinder Bore × Stroke 140×553 mm  Steering System  1 Type full hydraulic power steering system  2 Steering Pump Type CBY2050 (reverse)  3 Max. Working Pressure 10MPa  4 Steering Cylinder Bore × 80×340mm  5 Max. Steering Angle ±36°  Brake System  1 Type Air over hydraulic disc on four wheels brakes  Oil Injection Capacity  1 Fuel Tank 150L	5	Carrier Assembly Reduc	tion Ra	4.375				
Pressure Of Tire	6	Wheel End Reduction As	ssembl	y Reduction Ratio	4.75			
Working Hydraulic System  1 Working Pump Type Gear Pump  2 System Working Pressure 16MPa  3 Lifting Cylinder Bore × Stroke 125×816mm  4 Tilting Cylinder Bore × Stroke 140×553 mm  Steering System  1 Type full hydraulic power steering system  2 Steering Pump Type CBY2050 (reverse)  3 Max. Working Pressure 10MPa  4 Steering Cylinder Bore × Stroke 80×340mm  Stroke 80×340mm  5 Max. Steering Angle ±36°  Brake System  1 Type Air over hydraulic disc on four wheels brakes  Oil Injection Capacity  1 Fuel Tank 150L	7	Tire		17.5-25				
Working Pump Type   Gear Pump	8	Pressure Of Tire		0.28-0.32MPa				
2 System Working Pressure 3 Lifting Cylinder Bore × Stroke 4 Tilting Cylinder Bore × Stroke 5 Steering System 1 Type 2 Steering Pump Type 5 CBY2050 (reverse) 3 Max. Working Pressure 4 Steering Cylinder Bore × Stroke 5 Max. Steering Angle 6 Lifting Cylinder Bore × Box 340mm  2 Steering Cylinder Bore × Box 340mm  5 Max. Steering Angle 7 Lifting Cylinder Box 4 Box 340mm  5 Max. Steering Angle 7 Lifting Cylinder Box 4 Box 340mm  5 Max. Steering Angle 7 Lifting Cylinder Box 4 Box 340mm  5 Max. Steering Angle 7 Lifting Cylinder Box 4 Box 340mm  5 Max. Steering Angle 7 Lifting Cylinder Box 5 Box 340mm  5 Max. Steering Angle 7 Lifting Cylinder Box 5 Box 340mm  1 Type Air over hydraulic disc on four wheels brakes  Oil Injection Capacity 1 Fuel Tank 150L	W	orking Hydraulic System						
Lifting Cylinder Bore × Stroke  125×816mm  14 Tilting Cylinder Bore × Stroke  140×553 mm  Steering System  1 Type  1 Type  1 Steering Pump Type  2 Steering Pump Type  3 Max. Working Pressure  4 Steering Cylinder Bore × 80×340mm  Stroke  5 Max. Steering Angle  1 Type  Air over hydraulic disc on four wheels brakes  Oil Injection Capacity  1 Fuel Tank  1 Type Tank	1	Working Pump Type		Gear Pump				
4 Tilting Cylinder Bore × Stroke  Steering System  1 Type	2	System Working Pressul	re		16MPa			
Steering System  1 Type	3	Lifting Cylinder Bore × S	troke		125×816mm			
full hydraulic power steering system  2 Steering Pump Type CBY2050 (reverse)  3 Max. Working Pressure 10MPa  4 Steering Cylinder Bore × 80×340mm  5 Max. Steering Angle ±36°  Brake System  1 Type Air over hydraulic disc on four wheels brakes  Oil Injection Capacity  1 Fuel Tank 150L	4	Tilting Cylinder Bore × S	troke		140×553 mm			
2 Steering Pump Type CBY2050 (reverse)  3 Max. Working Pressure 10MPa  4 Steering Cylinder Bore × Stroke 80×340mm  5 Max. Steering Angle ±36°  Brake System  1 Type Air over hydraulic disc on four wheels brakes  Oil Injection Capacity  1 Fuel Tank 150L	St	eering System						
3 Max. Working Pressure 10MPa  4 Steering Cylinder Bore × 80×340mm  5 Max. Steering Angle ±36°  Brake System  1 Type Air over hydraulic disc on four wheels brakes  Oil Injection Capacity  1 Fuel Tank 150L	1	Туре		full hydraulic pow	er steering system			
4 Steering Cylinder Bore × 80×340mm  5 Max. Steering Angle ±36°  Brake System  1 Type Air over hydraulic disc on four wheels brakes  Oil Injection Capacity  1 Fuel Tank 150L	2	Steering Pump Type CBY2050 (reve			se)			
Stroke  Stroke  80×340mm  5 Max. Steering Angle ±36°  Brake System  1 Type Air over hydraulic disc on four wheels brakes  Oil Injection Capacity  1 Fuel Tank  150L	3	Max. Working Pressure 10MPa						
Brake System  1 Type Air over hydraulic disc on four wheels brakes  Oil Injection Capacity  1 Fuel Tank  150L	4		ore ×	80×340mm				
1 Type Air over hydraulic disc on four wheels brakes Oil Injection Capacity 1 Fuel Tank 150L	5	Max. Steering Angle ±36°						
Oil Injection Capacity  1 Fuel Tank  150L	Br	Brake System						
1 Fuel Tank 150L	1	1 Type Air over hydraulic disc on four wheels brakes						
	Oi	Oil Injection Capacity						
2 Engine Oil 15L	1	Fuel Tank			150L			
	2	Engine Oil		15L				

3	Transmission	27L
4	Hydraulic Oil Tank	140L
5	Transaxle	30L

## Main Specification of W156 Wheel Loader

	Main Specification of W156 Wheel Loader						
Ma	ain standard		uration				
1	Bucket Capacity				3.0M³		
2	Rated Load	t			5000kg		
	Travelling Speed						
3	Forward 1s	t		0-11.5km/h			
	Forward 2nd				0-37.5km/h		
	Reverse 1s	t		0-17km/h			
4	Max. Tracti	on			165±5kN		
5	Max.Break	Out Fo	rce		150±5kN		
6	Min. Turnin	g Radiı	us (outside tir	es)	6700±50mm		
7	Max. Dump	ing He	ight		2970±50mm		
8	Max. Dump	ing Re	ach		1200±50mm		
9	Total Hydra	ulic Cy	cle Time	≤11.1s			
10	Full Bucket	Lifting	Time	≤5.76s			
11	Wheel Base				3427±30mm		
12	Tread Width				2300±10mm		
13	Dimensions	s (L×W	×H)	L:8075×W:2960×H:3500mm			
14	Min. Cleara	nce O	er Ground		380±20mm		
15	Operating Weight				16200±200kg		
Die	Diesel Engine						
1	Model	WEICH WD61		CATERPILLAR C6 <sup>2</sup> C6121	121 CUMMINS6CTA8.3-C215 666CTA8.3-C215		
2	Туре	Direct	injection, turb	ocharged, water cooli	ng, 4 strokes, 6 cylinders		
<b>∥</b> 3 ∥	Rated Output	162kW	I	162kW	160kW		
<b> 4</b>	Rated Speed	2200rp	m				
5	Max. Torque	855N.r	m	860N.m	908N.m		
Tra	Transmission						
1	Model		ZL50 Hangzhou Advance Gearbox Group Co., Ltd				
2	Rated Speed	Input	2200rpm				
3	Transmissic Type	on	two forward a	wo forward and one reverse gears/power shift, planet type			

Me	Mechanical Gear Ratios							
1	Gear I		2.4346					
2	Gear II		0.6532					
3	Reverse		1	1.7814				
4	Hydraulic Oil Pressure			1.10-1.40Mpa				
5	Inlet Oil Pressure Of Toro	que Convertor		0.30-0.45Mpa				
6	Outlet Oil Pressure Of To	rque Convertor		0.20-0.30Mpa				
7	Lubricating Oil Pressure			0.10-0.20Mpa				
8	Max. Permissible Temp 8	Outlet Of Torque	Convertor	120℃				
Tra	Transaxle & Tyre							
1	Transaxle Type		self-made b	by Meritor technology				
2	Drive System		4 wheel driv	ve				
3	Rear Axle Oscillation		Center osci	llation				
4	Oscillating Angle of Rear	Axle	13°					
5	Carrier Assembly Reduct	ion Ratio	4.625					
6	Wheel End Reduc Reduction Ratio	tion Assembly	4.94					
7	Tire		23.5-25					
8	Pressure Of Tire		0.28-0.32MPa					
W	orking Hydraulic System							
1	Working Pump Type			Gear Pump				
2	System Working Pressur	е		17MPa				
3	Lifting Cylinder Bore × St	roke		165×757mm				
4	Tilting Cylinder Bore × St	roke		200×540 mm				
Ste	eering System							
1	Туре	Articulation, full hydraulic power steering system with flow-amplified system						
2	Steering Pump Type	CBGJ2080						
3	Max. Working Pressure	12MPa						
4	Steering Cylinder Bore x Stroke	100×342mm						
5	Max. Steering Angle							
Br	Brake System							
1	Type Air over hydraulic disc on four wheels brakes							
Oi	Oil Injection Capacity							
1	Fuel Tank			300L				
2	Engine Oil			30L				
3	Transmission			45L				

4	Hydraulic Oil Tank	200L
5	Transaxle	30L

Points for attention when using wheel loader.

- 1. Before using **wheel loader**, the driver and other people concerned must carefully read maintenance instructions or operation maintenance brochure attached to the machine and conduct the machine as required. Otherwise, serious consequences and unnecessary loss will be caused.
- 2. The driver must get dressed as is prescribed by the safety requirements, and wear necessary protection devices.
- 3. There must be a warning sign within the area or on the dangerous point if the operational range is small or it is a dangerous zone.
- 4. The driver is absolutely forbidden from operating the machine under influence or when he feels extremely tired.
- 5. When maintained or checked in the central hinge zone, the machine should be fixed with a shaft which prevents it from rotation so as to avoid the relative rotation between the front and back frames.
- 6. Climb up or down the **wheel loader** where there is ladder and handrails when is has come to a steady stop. Don not jump up or down when it is still moving.
- 7. The swing arm must be padded with a firm foundation when it is lifted for the machine's maintenance. Guarantee that under no circumstances will the arm fall.

World Equipment is a professional Chinese manufacturer and supplier of **wheel loader**. We prove clients with two popular produces, W136 **wheel loader**, W156 **wheel loader**. In our over 10 years experience of export, we have accumulated abundant clients and product experience. We have clients in Congo, Tanzania, Russia, Algeria, Philippines, Kazakhstan, Iran, Saudi Arabia, Nigeria, Singapore, Indonesia, Malaysia, The United Arab Emirates, South Africa, Australia, Brazil, Sudan.