

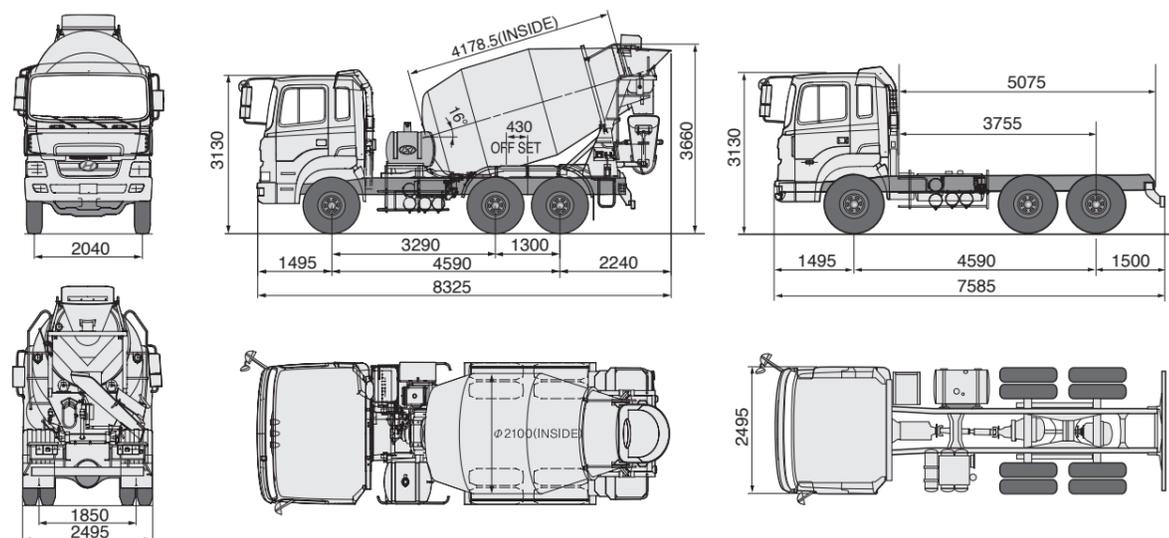
# Hyundai Commercial Vehicle **SPECIFICATIONS**



# HD270 Mixer

Short Wheelbase

HYUNDAI HD Series



Model	HD270
Vehicle Type	Mixer
Cab Type	Sleeper Cab
Deck Height	High
Wheel Base	Short
Drive System	LHD, 6 x 4
Application Engines	D6CA38

## Dimensions (mm)

Wheel Base	4,590	
Overall (Mixer)	Length	8,310
	Width	2,495
	Height	3,660
Wheel Tread	Front / Rear	2,040 / 1,850
Overhang (Mixer)	Front / Rear	1,495 / 2,240
Overhang (Chassis Cab)	Front / Rear	1,495 / 1,320
Drum	Length	4178.5
	Diameter	∅2,100
	Agitating Capacity	7 m <sup>3</sup>
Drum Offset	470	
C.A (Cab to rear Axle)	3,755	
C.E (Cab to end of frame)	5,075	
Min. Ground Clearance	285	
Min. Turning Radius	m	7.5

## Weight (kg)

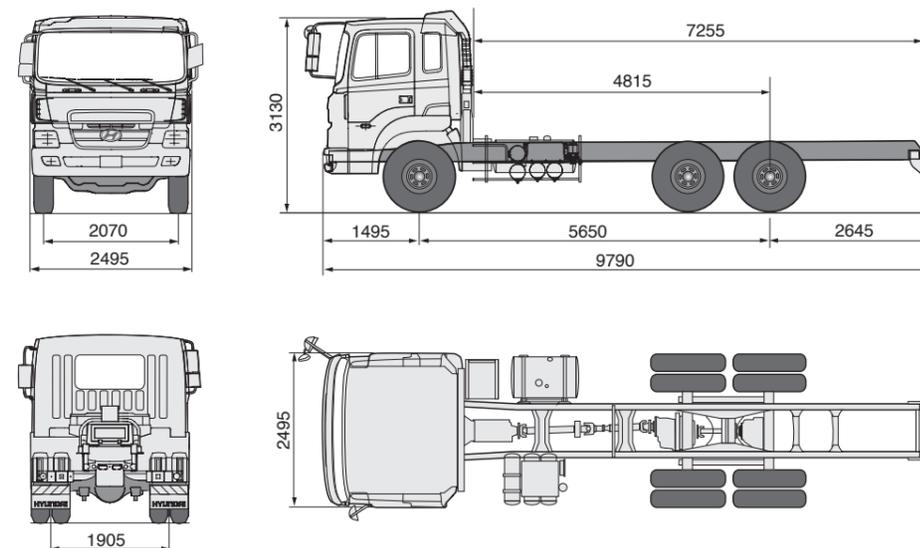
Mixer Weight		11,640
	Front	4,445
	Rear	7,195
** Max Gross Vehicle Weight		32,200
	Front	7,000
	Rear	25,200

\*\* Max. GVW includes the front & rear axle loads based on the permissible tire load.

# HD370S Mixer

Short Wheelbase

HYUNDAI HD Series



Model	HD370S
Vehicle Type	Mixer
Cab Type	Sleeper Cab
Deck Height	High
Wheel Base	Short
Drive System	LHD, 6 x 4
Application Engines	D6CA38

## Dimensions (mm)

Wheel Base	5,650	
Overall	Length	8,115
	Width	2,585
	Height	3,265
Wheel Tread	Front	2,070
	Rear	1,905
Overhang (Chassis Cab)	Front	1,420
	Rear (Frame)	2,440
C.A (Cab to rear Axle)	4,815	
C.E (Cab to end of frame)	7,255	
Min. Ground Clearance	325	
Min. Turning Radius	m	9.6

## Weight (kg)

Chassis Cab Weight		9,630
	Front	4,480
	Rear	5,150
** Max Gross Vehicle Weight		38,000
	Front	8,000
	Rear	30,000

\*\* Max. GVW includes the front & rear axle loads based on the permissible tire load.

### Calculated Performance

Model		HD270	HD370S
Application Engines		D6CA38	
Max. Speed	km/h	101	115 / 99(ZF)
Max. Gradeability	tanθ	0.267	0.339 / 0.657

### Chassis Specifications

#### Engine

Model		HD270	HD370S
Engine		D6CA38	
Type		Turbo Charger Intercooler 4 stroke-cycle, water-cooled, direct-injection diesel engine	
Number of Cylinder		6 in-line	
Piston Displacement (cc)		12,920	
Bore x Stroke (mm)		133 x 155	
Compression Ratio		17 : 1	
Max. Power** (ps/rpm)	Euro II	380 / 1,900	
	Euro III	-	
	Euro IV	-	
Max. Torque ** (kg.m/rpm)	Euro II	148 / 1,500	
	Euro III	-	
	Euro IV	-	
Cooling System	General	Pressure type with thermostat, Forced circulation by centrifugal water pump	
	Radiator	Corrugated fin type with pressure cap and condenser tank	
Electrical System	Battery	12V x 2, 150 AH at 20 Hr rates	
	Alternator	24V-80A	
	Starter	24V-6.0kW	
Fuel System	Injection pump	Delphi EUI system	
	Governor	Electronic Control	
	Fuel filter	Spin-on type	
Oil System	Lubrication	Forced lubrication by gear pump	
	Oil filter	Full flow and bypass type with paper element	
	Oil cooler	Water cooled, plate fin type	
	Oil grade	API service classification CF-4 or above	
Valve System		Single Overhead Valve, Two valves per cylinder	

\*\* Max. Power and Torque of engine may vary according to each country.

#### Clutch

Model		HD270	HD370S
Engine		D6CA38	
Type		Hydraulic control with Air pressure assistance, Diaphragm spring, Single dry plate, Pre-Damper	
Facing Material		Non-Asbestos	
Facing Size (mm) Outside dia x Inside dia		ø430 x ø242	

### Transmission

Model		HD270	HD370S
Application Engines		D6CA38	
T/M Application ●: STD ○: OPT	M12S26	●	●
	H160S 2X5	○	
	ZF16S151		○

Model		M12S6 (Over Drive)	H160S 2x5	ZF16S151
Type		6 forward and 1 reverse speed, 2nd to 6th synchromesh, 1st & reverse constant-mesh gears	10 forward and 2 reverse speed, 2nd to 10th synchromesh, 1st & reverse constant-mesh gears	16 forward and 2 reverse speed, 1nd to 16th synchromesh, reverse constant-mesh gears
Gear Ratio	1st (High / Low)	7.213	9.153 / 7.145	13.8 / 11.54
	2nd (High / Low)	4.178	4.783 / 3.733	9.49 / 7.93
	3rd (High / Low)	2.587	2.765 / 2.158	6.35 / 5.46
	4th (High / Low)	1.621	1.666 / 1.301	4.57 / 3.82
	5th (High / Low)	1.000	1.000 / 0.780	3.02 / 2.53
	6th (High / Low)	0.702	-	2.08 / 1.74
	7th (High / Low)	-	-	1.43 / 1.20
	8th (High / Low)	-	-	1.000 / 0.84
Reverse		7.081	8,105 / 6,327	12.92 / 10.80
Gear Oil		API service classification GL-4 or SAE service classification 80W (90 ; Tropical zones only)		
T.G.S. (Transmission Gear Shift)		Floor shift, Mechanical remote control		

#### Propellershaft

Model		S1810
Type		Tubular, Forged steel ends
Size (Tube diameter x Thickness)		ø114.3 x 6.6 t

#### Rear Axle

Model		D10HT	THR20ST
Type		Full floating type	
Capacity	kg	11,800 x 2	15,000 x 2
Final Reduction Gear	Type	Single Reduction, Hypoid gear	HUB Reduction, Hypoid gear
	G/Ratio	5.571	6.676
Gear Oil		API service classification GL5 and SAE service classification 80W/90 (85W/140 : Tropical zones only)	

#### Front Axle

Type		Reverse Elliot type " I " beam	
Capacity	kg	7,000	8,000

#### Tire & Wheel

Type		Single Front, Dual Rear	
Tire	Front / Rear	12R 22.5 - 16PR	12.00R24-20PR
Wheel	Front / Rear	8.25T x 22.5-165	8.5V x 24-158 / 8.5V x 24-180

#### Steering

Type		2-Spoke, Ball-nut type, Tilt & Telescopic steering column	
Steering Wheel Diameter (mm)		500	
Tilting Angle		9 °	
Telescopic Stroke (mm)		50	
Overall Steering Gear Ratio		20.2	
Turning Angle	Inner	49 °	
	Outer	35 °	

### Service Brake

Model	HD270	HD370S
Engine	D6CA38	
Actuation	Full Air, Dual circuit fixed S cam with spring loaded chambers	
Size (mm)	Front	Drum dia. x Lining width x Lining thickness : $\phi$ 410 x 156 x 19
	Rear	Drum dia. x Lining width x Lining thickness : $\phi$ 410 x 220 x 19
Compressed air reservoir	120 $\ell$	
Total lining area	9,639 $\text{cm}^2$	

### Parking Brake

Actuation	Spring loaded type chamber on the rear wheel
Size (mm)	Drum diameter x Lining width x Lining thickness : $\phi$ 410 x 220 x 19
Total lining area	7,166 $\text{cm}^2$

### Exhaust Brake

Type	Air operated, butterfly valve type
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### Jake brake (Optional)

Type	Injection Cam operated type
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### Suspension

Type	Front	Semi-elliptic, laminated leaf springs	Multi-Leaf
	Rear	Semi-elliptic, laminated leaf springs with shackle link (Multi leaf spring)	
Spring Size (Length x Width x Thickness- Number of leaves)	Front	1,500 x 90 x 13t - 9	1,500 x 90 x 13 t - 11
	Rear	1,480 x 90 x (20 t - 3 & 18t - 8)	1,480 x 90 x 22 t - 12
Shock absorber	Hydraulic double acting telescopic type on the front axle		

### Cooling system

Radiator	Corrugated fin type & condense tank		
	Rows of tubes	3	4
Core size (mm)	Width x Height x Thickness : 730 x 810 x 66		729.5 x 810 x 66
Cooling Fan	Auto clutched type viscos fan		

### Air intake system

General	Snorkel type at the rear of cab (right or left side)
Air cleaner type	Dry Paper type
Air cleaner position	At the rear of cab (right or left side)

### Exhaust system

General	Conventional (horizontal) type muffler
Tail pipe	Droptail type, blowing to chassis rearward

### Fuel tank

Capacity	200 liter	300, 380 liter (OPT)
Material	Steel (STD), Aluminum (OPT)	

### Frame

Type	"H" type frame with channel sectional side rail & cross members, side rail is reinforced with outer stiffeners
Main side rail (mm)	Depth x Flange x Thickness : 302 x 90 x 8t
Outer Stiffener (mm)	Depth x Flange x Thickness : 316 x 97 x 7t

### Electrical system

#### Electrical Equipments

Model	HD270	HD370S
Head lamps	Semi sealed beam (Projection beam : D6CB)	
Front combination lamps	Turn signal / Hazard-Amber, Position-White	
Fog lamps	Yellow, White (D6CB)	
Rear combination lamps	Turn Signal / Hazard-Amber, Tail / Stop- Red	
License plate lamp	White	
Back-up lamp	White	

#### Instruments

Meter Cluster	Fixed type	
Meter	Speedometer with odometer / Air & Oil Pressure / Voltage / Tachometer / Fuel / Water temperature gauges	
Warning lamps & indicators	Turn signals & Hazard / Parking brake / Oil pressure with buzzer / Door opening / Charging / Main Beam / Cab Tilt Lock with buzzer / Seat Belt / Exhaust Brake / Preheating / Overheat, Coolant level with buzzer / Brake air with buzzer	Turn signals & Hazard / Parking brake / Oil Pressure with buzzer / Door opening / Charging / Main Tili Lock with buzzer / Seat belt / Exhaust brake / Preheating Overheat, Coolant level with buzzer / Brake air with buzzer
Horn	Dual, electric flat type	Dual-electric type, Single-air type(opt)

### Body

#### Cab

Type	Manual-Hydraulic type cab tilting, (Electric-Hydraulic type : OPT), all steel welded construction with safety zone design
Mounting	Coil Spring type Full Floating cab (Air Spring type : OPT)
Windshield	One piece type with laminated glass
Windshield Wipers	Dual electric three speed (intermittent / low / fast) wipers & washer
Driver's Seat	Spring & Urethane foam cushioned / reclining, sliding & height adjuster at the front & rear, Vinyl material
Passenger's seat	Spring & Urethane foam cushioned, Vinyl material

#### Body type

General	Direct drive, conical drum with dual spring blades	
Total Volume of drum	11.0 $\text{m}^3$	
Slope angle of drum	16 °	
Rotation speed of drum	Agitating	2 ~ 4 rpm
	Discharging	1 ~ 14 rpm
Power Take Off device	Fly wheel PTO	

### Annotations

- 1) Empty vehicle weight and curb weight shown are to 3.5% variation to allow for production tolerance.
- 2) Empty vehicle weight and curb weight include weight of oil, fuel, coolant and spare tire carrier & bracket, spare tire but exclude standard tool set.
- 3) The vehicle specifications may differ per country.
- 4) For further information please contact the commercial vehicle export teams of HMC.
- 5) In order that product improvement may be introduced at any time, specifications are subject to change without prior notice.