VSMS2/VMDL for Subterranean LHD

Specifications

Size	Pattern	Star rating	TRA code number	Туре	Recommended rim/	Approximate inflated dimensions [mm/inch]				OTD [mm]	
					flange height	OD	OW	SLR	SLW		
26.5R25	VSMS2	**	LHD5S	T/L	22.00/3.0	1775 69.9	704 27.7	786 30.9	789 31.1	95.0	
26.5R25	VMDL	**	LHD5	T/L	22.00/3.0	1785 70.3	685 27.0	780 30.7	778 30.6	95.0	
29.5R29	VSMS2	**	LHD5S	T/L	25.00/3.5	2006 79.0	793 31.2	892 35.1	870 34.3	104.5	
29.5R29	VMDL	**	LHD5	T/L	25.00/3.5	2006 79.0	770 30.3	883 34.8	873 34.4	104.5	

T/L: Tubeless, OD: Overall Diameter, OW: Overall Width, SLR: Static Loaded Radius, SLW: Static Loaded Width, OTD: Original Tread Depth

		TRA code	Star rating	*						**
Size	Pattern		Inflation	500 kPa	525 kPa	550 kPa	575 kPa	600 kPa	625 kPa	650 kPa
			pressure	73 psi	76 psi	80 psi	83 psi	87 psi	91 psi	94 psi
26.5R25	VSMS2	LHD5S	Subterranean	17,500kg	18,500kg	19,000kg	19,500kg	20,000kg	20,600kg	21,200kg
	VMDL	LHD5	LHD	38,600lbs	40,800lbs	41,900lbs	43,000lbs	44,100lbs	45,400lbs	46,700lbs
29.5R29	VSMS2	LHD5S	Subterranean	22,400kg	23,600kg	24,300kg	25,000kg	25,750kg	26,500kg	27,250kg
	VMDL	LHD5	LHD	49,400lbs	52,000lbs	53,600lbs	55,100lbs	56,800lbs	58,400lbs	60,000lbs

- · Based on cold inflation pressure
- · Subterranean LHD stands for the Subterranean Load-Haul-Dump service standard registered in the JATMA-Annex3 and the TRA-EDI

Pattern images



VSMS2

For Subterranean LHD (LHD5S)

- Smooth pattern
- Ensured sidewall cut resistance



VMDL

For Subterranean LHD (LHD5)

- Lug pattern
- Offering traction

Tire markings



SUBTERRANEAN
LHD LOADER

® TYPE 2-A
CUT RESISTANT

For Subterranean LHD Subterranean LHD products show specifications on sidewall.

USE OF THIS PRODUCT OTHER THAN FOR INTENDED PURPOSES IS STRICTLY PROHIBITED

BRIDGESTONESolutions for your journey



15% more load capacity at the same 94 psi compared to Loader & Dozer★★ product

Efficiency and Extension Bridgestone's new Subterranean LHD standard VSMS2 and VMDL tires offer +15% load capacity, while maintaining a lower inflation pressure of Loader & Dozer★★. Designed with strengthened belt and bead structures, they deliver enhanced protection, optimized tire life, efficiency and extension of operation in rough environments of underground mining.

Features

- +15% load capacity vs.
 Loader & Dozer★★
 without increasing inflation pressure²
- Applicable to LHDs, including higher-load models (e.g., hybrid/electric/ electric battery vehicles)
- Higher productivity (handles heavier loads)
- Less downtime (reduced tire damage severity and shortened air filling time)
- 2. Subterranean LHD★★ products which comply with the TRA-EDI standard have 15% more load capacity at the same 94 psi compared to Loader & Dozer★★ products.



E.g.) 26.5R25 Load and Inflation Table

• Comparison based on Loader & Dozer★★ products, Subterranean LHD★★ products will enable users to gain +15% load capacity which is the same load capacity as Loader & Dozer★★★ at 94 psi.

95

Inflation pressure [psi]

100

105

110

Tire size	Star rating	*						**					***
	ze Inflation	500 kPa	525 kPa	550 kPa	575 kPa	600 kPa	625 kPa	650 kPa	675 kPa	700 kPa	725 kPa	750 kPa	800 kPa
	pressure	73 psi	76 psi	80 psi	83 psi	87 psi	91 psi	94 psi	98 psi	102 psi	105 psi	109 psi	115 psi
26.5R25	Loader & Dozer (Conventional)	15,000kg	15,500kg	16,000kg	16,500kg	17,000kg	18,000kg	18,500kg	19,000kg	19,500kg	20,000kg	20,600kg	21,200kg
	Subterranean LHD	17,500kg	18,500kg	19,000kg	19,500kg	20,000kg	20,600kg	21,200kg)				
29.5R29	Loader & Dozer (Conventional)	19,500kg	20,000kg	20,600kg	21,200kg	22,400kg	23,000kg	23,600kg	24,300kg	25,000kg	25,750kg	26,500kg	27,250kg
	Subterranean LHD	22,400kg	23,600kg	24,300kg	25,000kg	25,750kg	26,500kg	27,250kg)				

- Notes: Based on cold inflation pressure
 - Loader & Dozer (Conventional) refers to the Loader & Dozer standard registered in the TRA
 - Subterranean LHD stands for the Subterranean Load-Haul-Dump service standard registered in the JATMA-Annex3 and the TRA-EDI

Benefits of lower inflation pressure

- Strengthened grip with a large ground contact area
- Reduced cut risk due to easy enveloping rocks and stones



 Improved riding comfort and less vibration by absorbing shocks on rough roads



Higher inflation pressure 21,200kg / 116psi High Lower +8% contact area pressure 21,200kg / 94psi

- Result of FEM analysis for 26.5R25 VSMS2
- At a lower inflation pressure, the ground contact area expands and the applied load is dispersed, resulting in various benefits such as reduced cut risk and strengthened grip.

Enhanced sidewall cut resistance (Smooth pattern only)



Sidewall cuts tend to occur during loading. The more vertical shape reduces the chance of damage and leads to an extension of the total lifespan.



Cross-sectional view • Previous model • Vertical shape

Technology of Subterranean LHD products

