भारत सरकार GOVERNMENT OF INDIA रेल मंत्रालय MINISTRY OF RAILWAYS रेलवे बोर्ड RAILWAY BOARD

No.2019/M(N)/204/6 (E. No. 3324111)

The Principal Chief Mechanical Engineers All Zonal Railways

Sub: Loading of Steel Coils in BOXNHL wagons upto 30T.

Ref: RDSO's letter no. MW/BOXNHL dated 23.11.2023 (copy enclosed).

Vide letter under reference, RDSO has issued a new sketch **Sketch/WD-II/10** permitting loading of steel coils upto 30 Ton, by increasing number of wooden PU Dunnage from 3 to 6, instead of strengthening of BOXNHL wagons.

Zonal Railways are requested to undertake necessary arrangements for loading of steel coils in BOXNHL wagons duly complying stipulations enumerated in RDSO's letter cited under reference (i) above, which are listed below:

- a. This trial arrangement shall initially be valid for six months only. Post analysis of trial data, further decision on continuation/modification shall be worked out by RDSO.
- b. Placement of wooded/PU dunnage on the wagon should be supported by structural members like cross bar, stringers, bolsters & centre sill of the wagon.
- c. Monitoring of wagons for every loading and unloading cycle.
- d. Proper lashing & securing of steel coil as per sketches in the wagon.
- e. The BOXNHL wagons being used for coils loading shall be flagged in FMM and its performance shall be monitored by Zonal Railways. Format for monitoring and reporting of trial data through FMM by concerned Zonal Railways and Tata Steel is attached as Annexure-I of RDSO's letter.

DA: as above

(Happy Walia)
EDME(Freight)

Dated: 28.11.2023

Railway Board

Email: edmef@rb.railnet.gov.in

Copy to:

1.PED/TT(M): For kind information and necessary action.

- 2. EDS(W), RDSO, Lucknow: For kind information and necessary action.
- 3. GM/CMM & FMM: Please make arrangement in FMM for monitoring of wagons being used for loading of steel coils in BOXNHL wagons by M/s. TATA Steel Ltd.

Room No.312-C, Rail Bhawan, Raisina Road, New Delhi-110001

File No.RDSO-MW0WD(OPEN)/2/2020-O/o PED/SW/RDSO



फैक्स / Fax : 91-0522-2452494 टेलीफोन / Tele: 0522-2456165



भारत सरकार –रेल मंत्रालय अनुसंधान अभिकल्प और मानक संगठन लखनऊ – 226011

Government of India - Ministry of Railways Research Designs & Standards Organisation Lucknow – 226011

As signed

No.MW/BOXNHL

EDME (Freight), Railway Board, Rail Bhawan, New Delhi.

Sub: Loading of steel coil in BOXNHL wagons.

Ref: (i) Railway Board`s letter No. 2019/M(N)/204/6 (E. No. 3324111) dt. 13.11.2023

- (ii) Tata Steel letter No. Chief Logistics/2023/29 dt. 09.11.2023.
- (iii) Tata Steel letter No. Chief Logistics/2023/24 dt.13.10.2023.
- (iv) This office letter even dated 31.08.2023.
- (v) Tata Steel letter No. Chief Logistics/2023/16 dt.09.08.2023.
- (vi) This office letter even dated 23.06.2023, 07.07.2023 & 02.08.2023.
- (vii) SWR Letter No. SWR/M/N/12 Vol. 19.06.2023.
- (viii) Railway Board`s letter No. 2019/M(N)/204/6 dt. 19.06.2023.
- 1. The BOXNHL wagon has primarily been designed for UDL carrying of bulk commodities and design is not conducive for point loading as in case of steel coils etc. As reported by Zonal Railways, there have been several cases in the recent past (more than 400) where the centre sill was found cracked and sagging have also been noticed. Primary reason of these failure has been attributed to point loading due to steel coils.
- 2. In reference to (viii) above, five sketches (SKETCH/WD-II/ 01 to SKETCH/WD-II/05) for steel coil loading in BOXNHL wagon were prepared by this office. Accordingly Railway Board had issued a letter to SWR for loading of steel coils as per sketches on trial basis for 03 months. The trial report from SWR is still awaited.
- 3. Vide letter under reference (v) above M/s Tata Steel has proposed loading of steel coils up to 30t at the bolster area. The proposal has been examined by this office.
- 4. To meet this transportation requirement through BOXNHL wagons, strengthening arrangement of BOXNHL wagon to suit point loading was issued vide this office letter at reference (iv). Three sketches (SKETCH/WD-II/06 to SKETCH/WD-II/08) were issued for loading with strengthening scheme of BOXNHL wagon which essentially involve provision of additional plates of size 1932x1932x4 mm welded at the specified locations to make this wagon fit for proposed point loading.
- 5. Further to this, M/s Tata Steel vide letter under reference (ii) & (iii) above, has submitted a proposal to increase number of wooded/PU dunnage from 3 to 6 instead of strengthening of BOXNHL wagon.
- 6. The loading diagram proposed by M/s Tata Steel has been examined by this office. On the basis of detailed analysis, a new sketch no Sketch/WD-II/10 has been prepared for implementation on trial basis.
- 7. For permitting loading of steel coil in BOXNHL wagon according to sketch no. Sketch/WD-II/10, following shall have to be ensured:
- a) This trial arrangement shall initially be valid for six months only. Post analysis of trial data further decision on continuation/modification shall be worked out by RDSO.
- b) Placement of wooded/PU dunnage on the wagon should be supported by structural members like cross bar, stringers, bolsters & centre sill of the wagon.
- c) Monitoring of wagons for every loading and unloading cycle.
- d) Proper lashing & securing of steel coil as per sketches in the wagon.
- e) The BOXNHL wagons being used for coils loading shall be flagged in FMM and its performance shall be monitored by M/s Tata Steel and Zonal Railways. Format for monitoring and reporting of trial data through FMM by concerned Zonal Railway is attached as Annexure-I.
- 8. Railway Board may consider allowing M/s Tata Steel for loading of steel coils in BOXNHL wagons with the aforesaid stipulations.

9. This has approval of competent authority.

Digitally Signed by Arvind

Kumar (Arvind Kumar) Jt.Daire:ପୁରିମ୍ୟୁଥିରୁ2୨୯୬୭୦୭:27 For Director General/Wagon Reason: Approved

DA: As above

Annexure-I

Format for monitoring of steel coil loading in BOXNHL wagon (Ref: MW/BOXNHL dated 23.11.2023)

Weight of coil in tonnes Any defect noticed in	Wagon		superstructure members	bogie 2	bogie 2	bogie 2	bogie 2
	_	8 2		Above bogie 2	Above bogie 2 bolster	Above bogie 2 bolster	Above bogie 2 bolster
				4000000	ווופ אשמחוו	רוופ אפצטוו	רווב אפלסוו
			Above bogie no1	bolster			
		Wooden/PU					
ممنالموما ترمه لمومن	used for loading	Nos.					
		Whether loading &	securing done as per RDSO sketch no	SVETCH /WD II/10	SAELCH/WD-II/ 10		
			Wagon no.				
			Date or loading	0			
			Loading L				_

