

NORTH CENTRAL RAILWAY

Headquarters' office
Engineering Department
Allahabad.

No.355-W/CRS/ WAP4/Trial/MTJ-AGC/155 kmph/ NCR/Bridge,

dated:14.09.2010.

CME, CEE, COM, CSTE &

DRM/AGC.


Sub:- Sanction for conducting detailed oscillation trials of WAP4 class of locomotive consisting with one Oscillograph car with all coil ICF bogies, with IR-20 bogies on MTJ-AGC section of North Central Railway at a maximum test speed of 155 kmph..

Ref.:- CRS/NE Circle sanction letter No.3499 / WDP-4 / NCR / SANC-12 dated 03.09.2010 (copy enclosed).

Based on RDSO speed certificate No. SD.WAP-4.11, dated 26.02.2010. and Railway Joint Safety Certificate No. 52/Trial/WAP4/locomotive/MTJ-AGC/155 kmph/NCR/2010, CRS/NE Circle vide letter under reference has accorded sanction for conducting detailed oscillation trials of WAP4 class of locomotive consisting with one Oscillograph car with all coil ICF bogies, with IR-20 bogies on MTJ-AGC section of North Central Railway at a maximum test speed of 155 kmph..

This is for your information and further action please.

DA: 1. Sanction letter.
2.Rly. Joint Safety Certificate.


(Devendra Singh)
Dy CE/Bridge/HQ
For G.M/Engg


3E/09.

Copy to: Director General (Testing), RDSO, Manak Nagar, Lucknow-226011 along with track, bridge & JSC for information and conducting trial.

टेलीग्राम - 'कागरेल्स' लखनऊ

फैक्स नं० 0522-2234538

Telegram : 'COMRAILS' Lucknow

Fax No. : 0522-2234538



सत्यमेव जयते

भारत सरकार

नागर विमानन मंत्रालय

रेल संरक्षा आयोग, पूर्वोत्तर परिमण्डल

GOVERNMENT OF INDIA

MINISTRY OF CIVIL AVIATION

COMMISSION OF RAILWAY SAFETY, NORTH EASTERN CIRCLE

दूरभाष : 2234515 (P.&T)
Telephone : 23-291 (N.Rly.)
: 31-141 (N.E. F)



हजरतगंज, लखनऊ-226 001

Hazratganj, Lucknow-226

दिनांक : 03.09.2010

सं०.3499/WDP-4/NCR **SANC-12**

मुख्य अभियन्ता, पुल,
उत्तर मध्य रेलवे,
इलाहाबाद ।

विषय : Sanction for conducting detailed oscillation trials of WAP4 class of locomotive consisting with one Oscillograph ear with all coil ICF bogies, or with IR-20 bogies on MTJ-AGC section of North Central Railway at a maximum test speed of 155 kmph.

संदर्भ : आपका आवेदन सं०. 355-W/CRS/WAP4/Trial/MTJ-AGC/155 kmph/ NCR/ Bridge दिनांक 16/19.07.2010.

Sanction is hereby accorded for conducting detailed Oscillation trials of WAP4 class of locomotive consisting with one oscillograph car with all coil ICF bogies or with IR-20 bogies on MTJ-AGC section from 1379.06 to 1343.27 on North Central Railway as per RDSO drawing No. SKDL-3031A (latest alt.) and CSL-3040 (latest alt) fitted with pneumatic suspension at secondary stage on fiat bogies hauled by WAP4 class of locomotive on as proposed in North Central Railway Joint Certificate No. 52/Trial/WAP4/ locomotive/MTJ-AGC/155 kmph/NCR/2010 with a maximum permissible speed of 155 kmph subject to the following observance :-

- (i) Observances of all permanent and temporary speed restrictions in force.
- (ii) Compliance to all the certification as detailed in Joint Safety Certificate No.52/Trial/WAP-4/Locomotive/MIS-AGC/155/kmph/NCR/2010 alongwith concomitant Track certificate & Bridge Certificate submitted.
- (iii) Compliance to conditions as laid down in RDSO's speed certificate for concerning locomotive and coaches alongwith RDSO's letter No.SD.WAP-4.11 dated 26.02.2010.
- (iv) Compliance of the condition as laid down in Director Track (Engineering Railway Board letter No.96/CEDO/SR/10 dated 10.05.1996.
- (iv) Maintenance Schedules of Coaches/Locomotive and all other assets involved in operation of the train are rigidly adhered to laid down norms and guidelines of RDSO/Railway Board.
- (vi) The long confirmatory run should be personally supervised by ED/Testing/RDSO & CELE/NCR.

(P.K. Bajpai)

Commissioner of Railway Safety,
North Eastern Circle, Lucknow.

सं०.3499/WDP-4/NCR/

दिनांक : 03.09.2010

Copy for information to :

Chief Commissioner of Railway Safety, Ashok Marg, Lucknow,
All Commissioner of Railway Safety.

(P.K. Bajpai)

Commissioner of Railway Safety,
North Eastern Circle, Lucknow.

NORTH CENTRAL RAILWAY

Headquarters' office
Engineering Department
Allahabad.

No.355-W/CRS/ WAP4/Trial/MTJ-AGC/155 kmph//NCR/Bridge.

Dated: 16.07.2010
19

To,
The Commissioner of Railway Safety,
North Eastern Circle,
Lucknow.

Dear Sir,

Sub:- Sanction for conducting detailed oscillation trials of WAP4 class of locomotive consisting with one oscillograph car with all coil ICF boges or with IR-20 bogies on MTJ-AGC section of North Central Railway at a maximum test speed of 155 kmph.

Based on RDSO Speed Certificate No.SD.WAP4.11, dated 26.02.2009 and subsequent amendment vide letter of even no. dated 01.06.2010, It is proposed to permit conducting detailed oscillation trials of WAP4 class of locomotive to RDSO Drg. No.SK.DL-3031A (latest alt) and wheel profile of locomotive to RDSO Drg. No.CSL-3040 (latest alt) consisting with one oscillograph car with all coil ICF bogies or with IR-20 bogies on MTJ-AGC section of North Central Railway at a maximum test speed of 155 kmph, subject to observance of all permanent and temporary speed restrictions already in force and/ or those may be imposed from time to time on various accounts.


The following documents are enclosed herewith:

- (i) Joint Safety Certificate No 52/Trial/WAP4 locomotive/MTJ-AGC/155kmph/NCR/2010.
- (ii) Track Certificate along with Annexure.
- (iii) Bridge Engineer's certificate.
- (iv) Form-XVII (Infringement certificate).
- (iv) RDSO speed certificate No: SD.WAP4.11, dated 26.02.2009 and subsequent amendment vide letter of even no. dated 01.06.2010 along with Railway Board condonation letter No.96/CEDO/SR/10, dated 10.05.96.

You are requested to accord your kind sanction to conduct detailed oscillation trials of WAP4 class of locomotive on MTJ-AGC section of North Central Railway at a maximum test speed of 155 kmph.

DA: As above



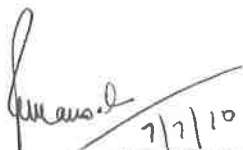

19-07-10
(B. Chowdhary)
Chief Bridge Engineer
For General Manager/Engg

NORTH CENTRAL RAILWAY
JOINT SAFETY CERTIFICATE

No 52/Trial/WAP4 locomotive/MTJ-AGC/155 kmph/NCR/2010.

Based on RDSO speed certificate No. SD.WAP4.11 dated 26.02.2010 and subsequent amendment vide letter of even no. dated 01.06.2010, certified that it is safe to conduct detailed oscillation trials of WAP4 class of locomotive to RDSO Drg. No SKDL-3031 A (latest alt.) and CSL-3040 (latest alt) consisting with one oscillograph car with all coil ICF bogies or with IR-20 bogies on MTJ - AGC section from km1397.06 to km 1343.27 of North Central Railway up to maximum test speed of 155 kmph, subject to observance of all permanent and temporary speed restrictions already in force and /or those that may be imposed from time to time due to track, bridges, overhead equipment and signaling & interlocking etc.

It is certified that all the conditions as stipulated in the RDSO speed Certificate No. SD.WAP4.11 dated 26.02.2010 and subsequent amendment vide letter of even no. dated 01.06.2010 are fulfilled except the trials conditions, which will be fulfilled before starting the trial / during the trial as applicable.



Chief Mechanical Engineer



Chief Electrical Engineer



Chief Signal & Tele. Engineer



Chief Operations Manager



Principal Chief Engineer

etc

No.355-W/CRS/NCR.TP/10-11

NORTH CENTRAL RAILWAY

TRACK CERTIFICATE

Certified that track on the following sections of North Central Railway are maintained to the standards as recommended in RDSO's report no. C&M-1 (Vol-1) and the weakest portion of which as per details given under is to the required strength for "Conducting detailed oscillation trials of WAP4 class of locomotive up to a maximum speed of 155 Km/h" as per RDSO drawing no.SKDL-3031 A indicated against each section as under, subject to observance of all temporary and permanent speed restrictions' (as mentioned in Annexure-'A' & 'B') in force and/ or imposed from time to time on various accounts. All conditions stipulated in RDSO's speed certificate no.SD.WAP4.11 dated 26.02.2010 for tracks are fulfilled.

Line	Section		Kms		Rails		Sleepers		Ballast cushion (in mm)	Max. speed proposed	Max. sectional speed of section (km/h)
	From	To	From	To	Type	% of wear or year of laying	Type	Year of laying			
UP	MTJ	AGC	1397.06	1343.27	52 kg, 90UTS	2002-03	PSC-5	1984-85	M+7	250/100	155
DN	AGC	MTJ	1343.27	1397.06	52 kg, 90UTS	2000	PSC-5	1987	M+7	300/50	155

Countersigned,



Chief Track Engineer

6/17
/Dy. Chief Engineer/TP

PERMANENT SPEED RESTRICTION (MTJ -AGC) UP LINE

SN	Between Stations	Location		Speed (Kmph)	Proposed reason
		From	To		
1	MTJ Passenger Yd	1398/13	1395/07	50	Std. I Interlocking
2	MTJ Yard	1397/11	1397/07	50	Negotiating lin12 thick web switches.
3	MTJ Yard	1398.627	1397.747	105.65	Due to Curve
4	MTJ-BAAD	1395.46	1395.42	139.86	Due to Curve
5	MTJ-BAAD	1395.37	1395.19	139.86	Due to Curve
6	MTJ-BAAD	1394/21	1394/19	130	Main line T/out without thick web switch
7	MTJ-BAAD	1390.774	1389.474	153.63	Due to Curve
8	MTJ-BAAD	1389/09	1387/18	110	lin 12 T/out taking off from reverse curve
9	KXM-RNKA	1365.208	1364.018	151.54	Due to Curve
10	RNKA-BFP	1353.55	1353.22	151.54	Due to Curve
11	RNKA-BFP	1350.896	1350.426	142.87	Due to Curve
12	RNKA-BFP	1349/09	1348/33	120	lin12T/Out taking off from in side/ out side of 0.75° curve.
13	BFP-AGC	1347/49	1345/15	80	2° to 2.5° curves
14	AGC Yard	1344/09	1341/23	50	Std. I Interlocking
15	AGC Yard	1343/37	1343/31	10	Diamond T/out and X-ing on wooden sleepers
16	AGC Yard	1342/39	1342/35	15	1 in 12 T/Out for Main lines trains

Annexure 'B'

PERMANENT SPEED RESTRICTION (AGC-MTJ) DN LINE

S. N.	Between Station	Location		Speed (Kmph)	Proposed reason
		From	To		
1	AGC Yard	1341/12	1344/12	50	Std. I Interlocking
2	AGC Yard	1342/36	1342/40	30	1/16 Turnout on wooden sleepers.
3	AGC Yard	1343/34	1343/42	30	Negotiation of lin 12 T/Out
4	AGC-RKM	1345/14	1346/38	90	Inadequate cant
5	RKM Yard	1347/2	1347/48	70	Sharp Curve of 2.25°, poor visibility in RKM Yard
6	BFP Yard	1348/34	1349/10	120	Similar flexure T/Out on 0.75°
7	BFP-RNKA	1350.426	1350.886	151.54	Due to curve
8	BFP-RNKA	1353.22	1353.55	151.54	Due to curve
9	RNKA-KXM	1364.018	1365.208	151.54	Due to curve
10	BAAD Yard	1386/16	1386/18	130	Main line T/out without thick web switch.
11	BAAD	1388/10	1388/20	130	Main line T/out with out thick web switch
12	BAAD-MTJ	1389.48	1390.77	153.63	Due to curve
13	BAAD-MTJ	1395.18	1395.36	139.86	Due to curve
14	BAAD-MTJ	1395.41	1395.56	139.86	Due to curve
15	MTJ Pass. Yard	1395/08	1398/12	50	Std. I Interlocking
16	MTJ Yard	1397.737	1398.637	105.65	Due to curve
17	MTJ Yard	1397/10	1397/14	50	Negotiation of lin12 thick web switches

gA
CTE

6/10/20
212
/ Dy. CE/TP

S. C. / M. R.

फैक्स संख्या : 915222453916

टेलीफोन/Tele : 915222450123

e-mail : edmp@rds0.railnet.gov.in



भारत सरकार - रेल मंत्रालय
अनुसंधान अभिकल्प और मानक संगठन
लखनऊ - 226 011
Government of India-Ministry of Railways
Research Designs & Standards Organisation
Lucknow - 226 011



An ISO 9001:2000
Organisation

No. SD.WAP4.11

Dated: 01-06-2010

The General Manager (Engg.),
North Central Railway,
Allahabad-211 001.

Fax No. 0532-2330772

Sub: Amendment no. 1 to speed certificate for conducting detailed oscillation trials of WAP4 class of locomotive on track maintained to C & M -1, Vol-1 standard up to a maximum speed of 155 km/h.

Ref: This office speed certificate of even no. dated-26-02-2010.

Para 2.7.5 under 'General Clause' of the speed certificate issued vide this office letter of even no. dated-26-02-2010 may be treated as deleted.

Encl: Nil


(S. Mani)
Exe. Director Standards (Motive Power)

Copy to:

1. The secretary (Mech./Engg./Elec.), Railway Board, Rail Bhawan, New Delhi-110 001.
2. The General Manager (Mech./Elec.), North Central Railway, Allahabad -211 001.

Encl: Nil


(S. Mani)
Exe. Director Standards (Motive Power)



Dated 26-02-2010

No. SD.WAP4.11

The General Manager (Fagg.),
 North Central Railway,
 Allahabad-211 001

Subj: Speed certificate for conducting detailed oscillation trials of WAP4 class of locomotive on track maintained to C & M-1, Vol-I standard upto a maximum speed of 155 km/h.

5000 hp WAP1 locomotive as shown in RDSO Drawing No.SK.DE-3031 A (latest alt) has been cleared up to a maximum speed of 140 km/h on track maintained to C&M-1, Vol I standard vide this office letter of even No. dated 27-09-94. Vide Railway Board's letter No.93/Elect.(TRS) 440/3 dated 19.01.95 this class of locomotive has been redesignated as WAP4 and the same has been advised to Zonal Railways vide this office letter No. SD.WAP1.11 dated 18.04.96. The axle load of locomotive is 19t.

1.1 The wheel of locomotive is having thick profile as per RDSO Drawing No.CSL-3040 (Latest Alt). As per Instruction Bulletin No.MP.1B.BD.02.16.01 on wheel wear management, the service limits for root and flange wear have been recommended as 6mm and 3mm respectively. There is an ambiguity among Zonal Railways in following these service limits for WAP4 locomotives.

2 In order to clarify the service wear limits for root and flange wear of WAP4 locomotives in conformance with MP.1B.BD.02.16.01, detailed oscillation trials are required to be conducted on track maintained to C&M-1, Vol.-I standard. It is proposed to conduct these oscillation trials on Mathura Junction- Agra Cant section of North Central Railway up to a maximum speed of 155 km/h, subject to the following conditions:

2.1 Test train

- 2.1.1 The test train shall consist of one WAP4 locomotive and one oscillograph car with all coil ICF bogies or with IR-20 bogies. The oscillograph car shall be equipped with air brake system. The car shall generally be maintained to the requirements of Technical Pamphlet No. C-8101. Air brake of oscillograph car and coaches shall be maintained as per RDSO's Technical Pamphlet No.C-9702 rev.-I.
- 2.1.2 The oscillation trials shall commence at a speed of 125 km/h and the speed shall be increased in steps not more than 10 km/h at a time up to 155 km/h. The increase in speed will be authorized by the Officer-in-Charge of the trials on the basis of riding observed in the preceding runs and after satisfying himself that from all considerations of safety, the runs at higher speeds can be permitted. The trial shall be conducted with worn wheel profile having root wear and flange wear of 6mm and 3mm respectively.

- 8/2
- 2.1.3 On completion of above oscillation trials, long confirmatory runs may be conducted on about 30 km stretch of Mathura junction-Agra Cant section subject to a maximum speed of 155 km/h. Conditions for carrying out confirmatory runs will be the same as those for above tests except that increase of speeds in steps as stipulated for above tests will not be obligatory and the speeds for the confirmatory runs will be decided by the Officer-in-Charge of the trial on the basis of the data obtained during the detailed tests conducted earlier.
- 2.1.4 The oscillation trials shall be conducted on locations/stretches covering straight track, station yard and curved track having about 2° curves.
- 2.2 Track
- 2.2.1 The track shall be to a minimum standard of 52 kg rails on sleepers to M+7 density and depth of ballast cushion below sleepers of 250 mm, which may consist of at least 100 mm clean and the rest in caked up condition, on compacted and stable formation and maintained to the standards as recommended in RDSO's Report No. C & M-1, Vol-I.
- 2.2.2 For track maintained to lower standard than that mentioned above, the Chief Engineer shall decide the lower maximum permissible speed on the basis of maintenance condition. In this connection, Railway Board's letter no. 65/WDO/SR/26 dated 19/20.10.1966 may be seen. When the Chief Engineer considers that the road bed is not compacted or there is improper drainage, he may suitably restrict the maximum permissible speed depending upon the local conditions.
- 2.2.3 The maximum permissible speed on curves shall be decided on the basis of the existing provision of the Indian Railway Permanent Way Manual Second reprint-2004. The trials on curve shall be done at a speed to simulate 100mm cant deficiency subject to other conditions of IRPWM being fulfilled.
- 2.2.4 Wherever condition warrants on account of corrosion of track/weld collar, wear on rail, cupping in welds, necessary precautions should be taken for fish plating/joggle fish plating before commencement of the trial.
- 2.2.5 Railway may ensure further detailed examination of track as deemed fit based on age and condition of track, over due renewal and condition of formation etc.
- 2.2.6 The first train after completion of trials should be piloted by concerned SSE Permanent Way at a maximum speed of 30 km/h.
- 2.2.7 The track maintenance shall be in accordance with the recommendations contained in RDSO report no. C&M-1, Vol.-1. In this connection, the instructions for the maintenance of track on high-speed routes circulated to the railways under RDSO's DO letter no. CRA/509 dated 07-7-1971 and approved by Railway Board vide their letter's No.71/W6/HS/8 dated 27-8-1971 and 71/W6/HS/1 dated 21-10-1971 should also be followed.
- 2.3 Bridges
- 2.3.1 The clearance refers to bridges with standard design of girders, slabs, pipe culverts, piers and abutments etc. issued by RDSO for BGML, RBG and MBG-1987 standard loadings. However, the bearings of span 76.2m (clear) designed for BGML standard loading as per

RDSO's drawing No. BA-11154 should be strengthened by providing two additional anchor bolts.

2.3.2 Superstructures & bearings of non-standard spans including Arches and sub-structure of all bridges are to be examined under the directions of the Chief Bridge Engineer concerned and certified safe with respect to current Indian Railway sanctioned codes with up-to-date correction slips.

2.3.3 This clearance is subject to following parameters of the locomotive:

- i) Maximum axle load 19t
- ii) Maximum tractive effort 30.8t/loco
- iii) Maximum braking force at rail level 22.3t/loco
- iv) Maximum C.G. height from rail level = Not more than 1830mm

2.3.4 Zonal Railway to certify adequacy of existing bridges for permitting rolling stock based on physical condition of bridges. Bridges shall be kept under observation as considered necessary by the Chief Bridge Engineer of the Railway.

2.3.5 Location of bridges on which speed restrictions are imposed shall be notified by the Railways and incorporated in the working timetable.

2.4 Traction Installation:

2.4.1 The OHE shall have swiveling type of cantilever assembly having the tension in the conductors regulated automatically with a presag of 50/100 mm. The presag is on the contact wire for a maximum span of 72 m, proportionately less for smaller span.

2.4.2 At locations where porcelain section insulators are installed on main line and lie within first 1/10 th and 1/3 rd of the span immediately after the OHE structure and the runners are in trailing direction the maximum speed shall be 120 kmph. At all other locations where porcelain section insulators are installed, the speed shall be limited to 80km/h.

2.4.3 The current collection shall be made through a single pantograph fit for high speed operation.

2.4.4 It shall be ensured that the cantilevers in the trail section have BFB steady arm (RI No.2390) with 25 mm drop bracket assembly (RI No.2360).

2.4.5 The current collecting pantograph should be checked before and after the trails.

2.4.6 The Railway shall ensure through inspection of the trail stretch before conducting the trials to confirm that OHE adjustments are proper.

2.4.7 After every trial, AEE or DEE/TrD of the section will inspect the OHE by traveling in the following loco/OHE inspection car/Tower wagon and if any abnormalities are noticed a through checked by a Tower wagon should be organized before taking up further trial/giving fitness to normal traffic.

2.4.8 In 25 kv a.c.traction area, the CEE of the Railway shall have to ensured that the minimum height of contact wire and electrical clearances as stipulated in provision of Chapter-V and V-A, Electric Traction "Scheduled of Dimension of 1676 mm gauge (BG) revised 2004" is not violated and strictly followed to ensure its safe running.

2.4.9 In addition to above, the Chief Electrical Engineer may impose any temporary speed restriction based on conditions prevailing on a particular section.

2.5 Signalling

2.5.1 Provision of GR, SR, SEM and all extant instructions issued from time to time, shall be complied with.

2.5.2 While running through a station, speed of the test train shall be restricted to the maximum permissible speed as per standard of interlocking provided at the station.

2.5.3 The driver the test train and supervisory official present in the driver's cabin shall so conduct the trial run that the speed is regulated and the test train is able to stop short of a stop signal at danger.

2.5.4 Suitable telephonic or walkie-talkie communication between guard and driver shall be provided.

2.6 Rolling Stock

2.6.1 Before initiating the trials, CME of the railway will certify the track worthiness and safety of the rolling stocks.

2.6.2 Brakes of the locomotive and the trailing coaches shall be in perfect working condition during the trials.

2.7 General

2.7.1 All the permanent and temporary speed restrictions in force and those that may be imposed from time to time due to track, bridges, curves, signaling and interlocking, etc. shall be observed. In this connection, speed on curves shall be in accordance with para 2.2.3 of this speed certificate.

2.7.2 Gatemen at all level crossings occurring within the test stretch which are not connected to the station by phone should be informed in advance of the dates and approximate time of the trial runs over the level crossings.

2.7.3 After every test run at speed in excess of the maximum permissible sectional speed, resumption of public carriage of passengers and freight on that particular portion of the track may be permitted at maximum permissible speed of the section, after the section is inspected and certified fit by an officer, not lower than the rank of AEN, on the footplate of a locomotive or on a motor trolley following the test train. However, wherever rear window inspection facility is available on the test train, the officer concerned can do the rear window inspection on the last run of the test train, in every block of testing for certifying fitness of the section.

2.7.4 Attention is also invited to the note on 'Preparation of electrical equipment of diesel and electric locomotives for high speed operation' circulated with this office letter no. EL/3.3.15/WAM2/GR.CON dated 24-12-70 and the locomotive should be attended accordingly as applicable to this class of locomotive.

2.7.5 While conducting trials at speeds more than 105 km/h, no train shall be permitted to run on the adjoining track in a double line/multiple line section.

2.7.6 The design of WAP4 locomotive infringes item 9(b), 12 and 13 of Chapter IV (C) of the BG Metric Schedule of Dimensions 1973 (Reprint). Railway Board has sanctioned these infringements vide letter No. 96/CEDO/SR/10 dated. 10-5-96.

2.7.7 Concerned Railway will arrange for providing fencing as per their requirement to prevent unauthorized pedestrian/cattle crossings.

3. It is certified that the test special as indicated in para 2.1.1 may be permitted to run upto a maximum speed of 155 km/h on the test section as indicated in para 2 above for trial purposes only subject to the conditions specified above.

4. It is requested that necessary CRS's sanction and Joint Safety Certificate for conducting these trials may be obtained and communicated to the Director General (Testing), RDSO, Lucknow-226011.

Encl: Nil



(S Mani)

Exc. Director Standards (Motive Power)

Copy to:

1. The secretary (Mech./Engg./Elec.), Railway Board, Rail Bhawan, New Delhi-110001.
2. The General Manager (Mech./Elec.), North Central Railway, Allahabad-211 001.

Encl: Nil.



(S. Mani)

Exc. Director Standards (Motive Power)

OT of WAP4 loco on Rajdhani Route at 155 km/h: santosh-HD

No.-07 Date: 15.04.2010

NORTH CENTRAL RAILWAY

FORM NO. XVII

Infringement of maximum and minimum dimensions for: **conducting detailed oscillation trail of WAP4 class of locomotive on track maintained to C & M-1, Vol-I standard on MTJ-AGC section of NCR up to maximum speed of 155 kmph.**

Gauge: **BG**

Section: **MTJ-AGC section**

Railway: **North Central Railway**

Sl No	Location		Name of structure which infringe	Prescribed max. and min. dimensions of 1929 (Reprint 1973) Prescribed max & Min dimensions of revised -2004		Existing actual dimensions as per Drg. No. WD-86013-S-01 Alt.5	Amount of Infringement	Particular of sanction & remarks.
	Division & Section	Kilometer age		Chapter/ item	Max./Min.			
1	MTJ-AGC section of Agra Division			<p>Ch.IV(C) Item 9(b) Max. height above rail level for centers of buffers for empty locomotive (ACB couplers). Item 12 Max. height above rail level for a width of 305 mm on either side of center of empty locomotive Item 13 Max. height above rail level at sides of empty locomotive</p>	1080 4115 3505	1090 4232.50 3894.50	10 117.50 389.50	<p>1.Speed certificate issued by Executive Director Standards (Motive Power) RDSO/LKO vide certificate No SD.WAP4.11 Date: 26.02.2010.</p> <p>2. Infringement condoned by Rly. Board vide letter No.96/CEDO/SR/10 dated 10.05.96.</p>
				<p>Ch. IV(C) Item 9(b) Max. Height above rail level for centers of buffers for empty locomotive (ACB couplers). Item 12 Max. Height above rail level for a width of 760 mm on either side of center of empty locomotive. Item 13 Max. height above rail level at sides of empty locomotive</p>	1105 4265 3735	1090 4232.50 3894.50	Nil Nil 159.50	

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