



भारत सरकार Government of India
रेल मंत्रालय Ministry of Railways
रेलवे बोर्ड Railway Board



(E- File No.-3433309)

No. 2023/M(C)/142/4ptVI

New Delhi, Date: 24.08.2023

PCMEs

All Zonal Railways

Sub: Work for up gradation of Fire Suppression System as per revised RDSO Spec No. RDSO/2013/CG-06 (Rev.2) with Amndt.1 or latest.

- Ref: i. Railways Board letter No. 76/M(C)/137/31 Vol. V dated 01.04.21
ii. RDSO Specification Letter MC/ACF/Fire supprn/PC dated 22.07.2021
iii. WR Letter No. M/337/RSP/W dated 01.08.2023.
iv. Railway Board letter No 2023/M(C)/142/4ptVI dated 22.08.2023.

In continuation of the letter under reference iv above, with the approval of competent authority, it is further clarified that the work for Up gradation of fire detection and suppression system as per RDSO specification RDSO/2013/CG-06(Rev-02) or latest, may be executed through OEMs only, to ensure holistic functionality of the system including generation of related alerts and automatic working of suppression system.

Zonal Railways are further advised to ensure rate reasonability strictly while execution of the work.

DA: As above

(सुमन कुमार ताती)
निदेशक / यांत्रिक इंजी. को.
रेलवे बोर्ड

C/- PED/RS/RDSO and ED/Carr./RDSO for kind information and necessary action please.



भारत सरकार Government of India
रेल मंत्रालय Ministry of Railways
रेलवे बोर्ड Railway Board



No. 2023/M(C)/142/4ptVI

(E- File No.-3433309)
New Delhi, Date: 22.08.2023

PCMEs
All Zonal Railways

Sub: Provision of linear heat detection cable in luggage portion as per
RDSO specification No. RDSO/2013/CG-06 or latest.

Ref: i. Railways Board letter No. 76/M(C)/137/31 Vol. V dated 01.04.21
ii. RDSO Specification Letter MC/ACF/Fire supprn/PC dated 22.07.2021
iii. WR Letter No. M/337/RSP/W dated 01.08.2023.

In context of letters under references above, it is clarified that the subject works may be executed through OEMs only, to ensure full functionality of the system including generation of related alerts and automatic working of suppression system.

Zonal Railways are further advised to ensure rate reasonability strictly while execution of the work.

DA: As above.

(Signature)
(सुमन कुमार ताती)
निदेशक / यांत्रिक इंजी. को.
रेलवे बोर्ड



पश्चिम रेलवे
WESTERN RAILWAY

प्रधान कार्यालय :
महर्षि कर्वे रोड, चर्चगेट, मुम्बई - 400 020.
Headquarters Office :
Maharshi Karve Road,
Churchgate, Mumbai - 400 020.
Tel. : 22150 (Rly.)
22015963 (MTNL)
Fax : 22093226 (MTNL)

No. M/337/RSP/W

Date: 01.08.2023

EDME (Coaching),
Railway Board,
New Delhi.

Sub: RSP work for Upgradation of Manual Fire Suppression System to Automatic Suppression System.
Ref: RSP for WR PB 2023-24 above 2.5 Cr.

The subject itemised work for 224 coaches has been sanctioned by Railway Board and appeared in Western Railway Pink book 2023-24 under works above 2.5 Cr category. There are 228 coaches over Western Railway having manual fire suppression System of different makes. For upgrading these coaches from manual to automatic fire suppression system, PAC Non stock demands were processed, as OEM firms had earlier quoted that they can upgrade only their own system.

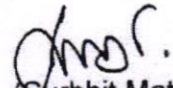
Tenders were floated-181 nos. TOD 18/07/2023(M/s Sanrok) and 43 nos. TOD 22/07/2023 (M/s Chaitanya) and it is observed that:

- M/s Sanrok Enterprises, Faridabad quoted against both tenders for upgradation of fire system of M/s Sanrok as well as M/s Chaitanya Elect.Pvt. Ltd., Jalgaon.
- M/s Tri Parulex Fire protection Systems also quoted in both the tenders and they have claimed that:
 - 1) They have executed 03 coach sets fitment of Automatic Fire Detection and Suppression System over NCR.
 - 2) They have got another PO for 06 coach's upgradation of Sanrok Make Automatic Fire Detection and Manual Suppression System over NCR.

It is requested to guide whether the above RSP is to be got executed through OEMs on proprietary basis OR through open tender allowing all firms to participate.

The tenders have been put on hold till such time the above issue is clarified/decided.

The matter is MOST URGENT.


(Surbhit Mathur)

Principal Chief Mechanical Engineer/WR

C/-_ED(Chg.)-RDSO for issuing necessary clarification.



MC/ACF/Fire Supprn/PC

Date- 22.07.2021

Principal Chief Mechanical Engineers

1. मध्य रेलवे, छत्रपति शिवाजी टर्मिनस, मुम्बई - 400 001.	12. उत्तर मध्य रेलवे, हास्टिंग रोड, इलाहाबाद - 211 001.
2. पूर्व रेलवे, फेयरली प्लेस, कोलकाता - 700 001.	13. उत्तर पश्चिम रेलवे, जयपुर - 302 006.
3. उत्तर रेलवे, बडौदा हाउस, नई दिल्ली - 110 001.	14. दक्षिण पश्चिम रेलवे, हुबली - 580 023.
4. दक्षिण रेलवे, पार्क टाउन, चेन्नई - 600 003.	15. पश्चिम मध्य रेलवे, जबलपुर - 482 001.
5. दक्षिण मध्य रेलवे, रेल निलायम, सिकन्दराबाद - 500 071.	16. दक्षिण पूर्व मध्य रेलवे, आर ई आफिस काम्प्लेक्स, बिलासपुर - 495 004.
6. दक्षिण पूर्व रेलवे, गार्डन रीच, कोलकाता - 700 043.	17. इन्टीगरल कोच फैक्ट्री, चेन्नई - 600 030.
7. पूर्वोत्तर रेलवे, गोरखपुर - 273 012.	18. रेल कोच फैक्ट्री, हुसैनपुर, कपूरथला - 144 602.
8. पूर्वोत्तर सीमान्त रेलवे, मालीगाँव, गुवाहाटी - 781 011.	19. बी.ई.एम.एल., बेंगलूर काम्प्लेक्स, न्यू थिप्पासान्द्रा, पोस्ट बाक्स न. 7501, बेंगलूर - 560 075.
9. पश्चिम रेलवे, चर्चगेट, मुम्बई - 400 020.	20. कोंकण रेलवे कार्पोरेशन लि., कार्पोरेट आफिस, बेलापुर भवन, नवी मुम्बई - 400 614.
10. पूर्व मध्य रेलवे, हाजीपुर - 844 101.	21. मार्टन कोच फैक्ट्री रायबरेली - 229206
11. पूर्व राष्ट्रीय रेलवे, बीडीए रेंटल कालोनी, रेलवे काम्प्लेक्स, चन्द्रशेखरपुरा, भुवनेश्वर, उड़ीसा - 751 016.	

Sub:- Coach Alteration Instruction (CAI) to upgrade the installed Automatic Fire detection-cum-Suppression system in all the Generator-cum-Brake Van of IR coaches to RDSO spec no. RDSO/2013/CG-06(Rev-2) with amend-1.

Ref: Railway Board's letter No. 76/M(C)/137/31 Vol. V dated 01.04.2021.

Description:

To upgrade the installed Automatic Fire detection-cum-Suppression system in all the Generator-cum-Brake Van of IR coaches to RDSO spec no. RDSO/2013/CG-06(Rev-2) with amend-1.

Reason of Alteration:

Due to two recent fire cases at NR while working vide Railway Board letter reference above, instructed "to upgrade the installed Fire suppression system in all the power cars for provision of Linear Heat Detection (LHD) cable in luggage portion as per latest RDSO specification no. RDSO/2013/CG-06".

Alteration:

In this regard Zonal Railways/PUs may include the following requirements as per Para 4.3.4 (ix) of RDSO specification no. RDSO/2013/CG-06(Rev-2), in the power cars having fitted with Automatic Fire detection-cum-Suppression system which is re-produced below:

"The luggage compartment of power car will be protected with Linear Heat Detector (LHD) cable (UL or EN approved, 105-110 deg C, approx. 20 meters). The system should be so designed that on receiving a fire signal from luggage compartment, the buzzer should sound and DG set(s) should shutdown. Activation of suppression system should not take place automatically. Sensor installation/protection should be robust enough to prevent damage during luggage loading/unloading".

Zonal Railways/PUs are advised to upgrade the system as mentioned above in consultation with the Supplier/OEM of the system and ensure the compliance of the system as per RDSO spec no. RDSO/2013/CG-06(Rev-2) with amend-1 or latest.

22-7-21

Procedure for providing Linear Heat Detection (LHD) cable in luggage portion as per latest RDSO specification no. RDSO/2013/CG-06" in consultation with Supplier/OEM

1. Provide the Linear Heat Detector (LHD) cable (UL or EN approved, 105-110 deg C, approx. 20 meters).
2. The system should be so designed that on receiving a fire signal from luggage compartment, the buzzer should sound and DG set(s) should shutdown.
3. Activation of suppression system should not take place automatically. Sensor installation/protection should be robust enough to prevent damage during luggage loading/unloading.
4. Ensure the functionality of the system as per Proforma specified at Para 11.0 of RDSO specification no. RDSO/2013/CG-06(Rev.-2) Amend-1 or latest.

Coach Type:

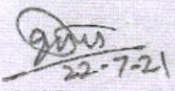
Generator cum Brake Van fitted with automatic fire detection cum suppression system as per RDSO specification no. RDSO/2013/CG-06.

Railways/PUs are requested to submit the details of Power cars upgraded as per RDSO specification no. RDSO/2013/CG-06(Rev.-2) Amend-1 or latest in the following format at interval of 3 months:

S. No.	Total nos. of power cars fitted with spec no. RDSO/2013/CG-06(rev-1) (1)	Nos. of power car fitted with spec no. RDSO/2013/CG-06 (rev-2) (2)	No. of power cars upgraded to RDSO specification no. RDSO/2013/CG-06 Rev-2) (undertaken as per above CAI) (3)	All power cars fitted with LHD cables in Luggage compartment (4) = (2+3)
1.				
2.				

Above has the approval Competent Authority.

DA: As above


 (Brijesh Kumar Pandey)
 Director/SS/Carriage

Copy to:

Chief Workshop Engineer

1. Central Railway Matunga, Mumbai	10. Southern Railway, Ashokapuram, Mysore
2. Central Railway, Bhopal	11. S. C. Railway Lallagudda, Secunderabad
3. Eastern Railway, Lilluah, Hawrah	12. S. C. Railway, Hubli
4. Northern Railway Alambagh Lucknow	13. S. C. Railway, Tirupati
5. Northern Railway, Jagadhari	14. S. E. Railway, Mancheswar, Bhubaneswar.
6. N. E. Railway Gorakhpur	15. S. E. Railway, Kharagpur
7. N. F. Railway, New Bongaigaon	16. Western Railway, Lower Parel, Mumbai
8. Southern Railway, Chennai	17. Western Railway, Ajmer, Rajasthan
9. Southern Railway, Golden Rock, Trichy	18. Eastern Railway, Kanchrupara, West bengal

DME/Chg. Railway Board, Rail Bhawan, New Delhi - for kind information please

भारत सरकार Government of India
रेल मंत्रालय Ministry of Railways
रेलवे बोर्ड Railway Board

No. 76/M(C)/137/31 Vol. V

(E-file no. - 3322416)
New Delhi, Dated- 01.04.2021

General Managers
All Zonal Railways &
ICF, MCF and RCF

Director General
RDSO / Lucknow

Sub: Guidelines for Fire detection and suppression system.

Ref: (i) RDSO specification No. RDSO/2008/CG-04 (Rev-05).

(ii) RDSO specification No. RDSO/2013/CG-06 (Rev-02).

In view of the two recent fire cases related to Coach No. 199400 LWSCZAC NR while working in the train No. 02017 on dated 13.03.2021 and to coach no. 199393 LWLRRM NR while working in train No. 02004 on dated 20.03.2021, following has been approved by Board (MTRS):

- RDSO will examine and revise the RDSO spec No RDSO/2008/CG-04 (Rev-05) for provision of aspiration type smoke detectors in lavatory area in place of HASPs stipulated at present and will issue revised specifications/works instruction further for retro fitment/fitment into AC coaches accordingly.
- RDSO will issue detailed works instruction to upgrade the installed Fire suppression system in all the power cars for provision of linear heat detection cable in luggage portion as per latest RDSO specification no. RDSO/2013/CG-06.
- Zonal Railways and Production Units are advised to execute the above fitment/retro fitment works as per latest RDSO specifications and work instructions issued.
- In Non AC coaches HASPs (Heat Activated Sampling Points) in door way area and aspiration type smoke detectors in lavatory area will be provided. RDSO will accordingly examine and issue specification for Non-AC coaches along with detailed work instruction for retro-fitment/fitment in Non-AC coaches.
- As Fire detection and suppression system and fire/smoke detection and alarm system are critical passenger safety item, RDSO is advised to issue a vendor list and also to inspect the related supply/works.

RDSO and Zonal Railways are further advised to submit action plan accordingly latest by 15th Apr 2021.

For further necessary action please.

(सुमन कुमार तीली)

निदेशक / यांत्रिक इंजी. को.

रेलवे बोर्ड

CI-DG/Safety/Railway Board for kind information please.

-PCMEs/Zonal Railways & PUs for kind information and necessary action please

-ED/Carriage/RDSO for kind information and necessary action please.

2020/M(C)/142/4ptVI

(E-file No.-3318291)
New Delhi, Date: 24.08.2023

The General Managers,
All Zonal Railways,
& ICF, RCF and MCF

Sub: Work of Replacement of existing HASPs with Aspiration type sampling points in Lavatory area of AC coaches.

- Ref: i. WR Letter No. M/337/RSP/W Dated 18.08.2023.
ii. RB Letter No. 2020/M(C)/142/4ptVI Dated 14.08.2023.
iii. Railway Board Letter No. 76/M(C)/137/31 Dated 01.04.2021.
iv. NR Letter No. 802-M/10/RSP/pt.-II/MC-I Dated 10.08.2023.
v. RB Letter No. 2020/M(C)/142/4 pt. VI Dated 03.12.2021.
vi. RB Letter No. 2020/M(C)/142/4ptVI Dated 08.06.2023
vii. RDSO Coach Alteration Instruction (CAI) No. MC/ACF/Fire Detection/AC Dated 22.07.2021

In reference to the letter i above, it is clarified that the date of issue of RDSO's CAI was indicated wrongly due to the typographical error. Accordingly, in supersession of the RB Letter No. 2020/M(C)/142/4ptVI Dated 14.08.2023, Zonal Railways are advised that the work for provision of Smoke/Fire detection cum alarm system against respective RSPs sanctions and allotment issued should be executed as per RDSO specification No RDSO/2008/CG-04 (Rev. 6) or latest only.

It is further clarified that the expenditure for the work of replacement of HASPs with aspiration type sampling points in lavatory area, as per CAI issued vide letter No RDSO letter MC/ACF/Fire detection/AC Dated 22.07.2021, may be charged to the respective sanctioned RSPs only, against which the previous work of the provision of Smoke/fire detection cum alarm system was executed in the same coach.

For further necessary action please.

(Signature) 24/08/23
(सुमन कुमार तीर्ती)
निदेशक / यांत्रिक इंजी. को.
रेलवे बोर्ड

C/ -PCMES/ /All Zonal Railways – for kind information and necessary action please.

1556715

भारतसरकार **GOVERNMENT OF INDIA**
रेलमंत्रालय **MINISTRY OF RAILWAYS**
(रेलवे बोर्ड **RAILWAY BOARD**)

No.2016/M(C)/137/2

New Delhi, dated: 19.01.17

The General Managers,
RCF/Kapurthala.
ICF/Chennai.
MCF/Raebareli.

Director General/RDSO.

Sub: Design features on coaches announced in Budget 2016-17.

Design features on coaches announced in Budget 2016-17 as proposed by a committee of EDME/Chg and ED(T&C) vide OSD/MR's order dated 04.04.2016 were examined by Railway Board and decided as under:

I.) Deen Dayalu Coaches: Following features to be essentially provided:-

- i. Provision of cushioned luggage racks which can serve as seat during rush. Moulded PUF foam seats can be explored.
- ii. Provision additional hand hold in doorway area.
- iii. Provision of J hooks near longitudinal luggage racks.
- iv. Toilets with polymerised floor coating.
- v. Provision of bio-toilets.
- vi. Water level indicator.
- vii. Toilet occupation indication display board.
- viii. Enhanced mobile charging facility.
- ix. Fire extinguishers with anti-theft arrangement.
- x. Pleasing interior and exterior colour scheme with anti graffiti measures.
- xi. Potable Water similar to Aquaguard type water filtration system

No separate colour scheme is prescribed for Deen Dayalu Coaches however, esthetically pleasing vinyl sticker border on the exterior can be provided for differentiation from existing GS coaches.

II.) Antyodaya Express Coaches: Following features to be essentially provided:-

- i. Provision of cushioned luggage racks which can serve as seat during rush. Moulded PUF foam seats can be explored.
- ii. Provision of additional hand hold in doorway area.
- iii. Provision of J-hooks near longitudinal luggage racks.
- ✓ iv. Provision of MU cable in each coach for running train service with loco at both ends.