

भारत सरकार-रेल मंत्रालय
अनुसंधान अभिकल्प और मानक संगठन
लखनऊ- 226011
Tele/Fax : 0522-2452581
E-mail:dirpnloco@gmail.com



Government of India
Ministry of Railways
Research, Designs &
Standards Organization,
LUCKNOW-226011



No. EL/3.2.19/2

Dated 28.06.2018

Principal Chief Electrical Engineer,
Chittaranjan Locomotive Works,
Chittaranjan-713331 (WB)

Sub: Minutes of Meeting to Standardization of Auto Flasher Light (AFL) logic and testing procedure for 3-Phase Electric Locomotives.

Please find attached the Minutes of Meeting regarding the above subject held at RDSO on 27.06.2018 for your kind information and necessary action.

28/06/2018
(Aseem Kumar)
For Director General/Elect.

Encl: MOM

Copy:

- Secretary (Electrical), Railway Board, Rail Bhawan, New Delhi-110001
(Kind attn.: Shri A. K. Goswami, DEE/RS/RB) for kind information please.
- Principal Chief Electrical Engineer, South Eastern Railway, Garden Reach, Kolkata-700 043(WB)
- M/s. BHEL Limited, Electronics Division, PB.No.2606, Mysore Road, Bangalore-560 026
- M/s. Bombardier Transportation India Limited, ERDA Road, Maneja, Vadodara-390 013
- M/s ABB Ltd., Survey No. 88/3 & 4, Basavanahalli, Kasaba Hobli, Nelamangala Taluk Bangalore-562123.4.
- M/s. Crompton Greaves Limited, Drives & Automation Division, Industrial Systems Plot no-9, New Industrial Area Phase-II, Mandideep-462046, Bhopal, (MP)
- C-DAC, P.B.NO:6520, Vellayambalam, Thiruvananthapuram – 695033, Kerala (India)
- M/s. Faiveley Transport Rail Technologies India Limited, P.B. No. 69, Harita, HOSUR, Tamil Nadu- 635 109
- M/s. Knorr-Bremse India Pvt. Ltd., 51/4 KM Stone, Village & P.O. Bhagola, Delhi Mathura Road (NH-2), Palwal-121102 (HARYANA)

28/06/2018
(Aseem Kumar)
For Director General/Elect.

Encl: MOM

Minutes of Meeting held at RDSO on 27.06.2018 to discuss the Standardization of Auto Flasher Light (AFL) logic and testing procedure for 3-Phase Electric Locomotives.

Present Members:

S N	Name (S/Shri)	Designation	S N	Name(S/Shri)	Designation
1	O.P. Kesari	PED/SE/ RDSO	8	P. Choudhary	DGM/Service/FTRTIL
2	Suresh Kumar	DSE/ TPS/RDSO	9	Milind Basle	AGM/Sales/FTRTIL
3	Aseem Kumar	DSE (Pn) RDSO	10	S. Kali	Asst. Manager/Sales/FTRTIL
4	Sunil Singh Yadav	SEE/CLW	11	C.M. Sawakar	Sr. Manager/ KBIL
5	S K Samal	ADEE/TRS/BNDM/SE R	12	Yogesh Kumar	Manger/ KBIL
6	M.N .Lodhi	SSE/RDSO	13	ManojKhetan	System Engg/BT
7	Mahendra Pal	JE/RDSO	14	VPS Chauhan	SSE/TRS/NKJ/WCR

The issues discussed during meeting are as below:

- 1.0 PEDSE addressed the meeting and stressed on the functions of Auto Flasher light (AFL) as safety item and discussed about the Standardization of Auto Flasher Light (AFL) logic and testing procedure for 3-Phase Electric Locomotives.
- 2.0 The issue was discussed in detail among representatives of CLW, ZRs, OEMs of VCU&OEMs of Brake System. M/s Medha submitted the details of logic conditions in propulsion system responsible for function of AFL during the various conditions during train operation.
- 3.0 The proposed scheme of AFL is tabulated below:

S N	BP-ER analog Feedback /Control Reservoir (Wire 3009 & 3010) (XPrAutoBkLn) High (>4.75Kg/cm2, 6.8V)	Emergency. Pressure switch/BP-PS (Wire 3051) (MPrSwEmgBk)	Air Flow Relay Feedback (Wire 3050) (MPrSwAFlow)	AFL Status
1	High	High	Low	Activated (After one second)
2	High	Low	Low	Activated
3	High	Low	High	Activated

- 4.0 Suitable delay period for goods/passenger locos should be provided to keep Auto Flasher "inactive" when A9 is released.
- 5.0 AFL should not be activated during brake application including emergency by loco pilot by DBC (Driver brake controller, E70) and EBV (Electronic Brake valve, CCB).
- 6.0 The proposed logics and signal conditions trials should be conducted by CLW in goods/passenger locos with each make of propulsion system/ Brake system. The above conditions are in line with conventional locos.

1/2
28/06/2018