



सत्यमेव जयते

भारत सरकार  
Government of India  
विद्युत मंत्रालय  
Ministry of Power  
केन्द्रीय विद्युत प्राधिकरण  
Central Electricity Authority  
पावर कम्युनिकेशन डवलपमेंट प्रभाग  
Power Communication Development Division

No. CEA/PCD/PTCC/TN-655/ 293-295

Date: 14/03/2019

Divisional Engineer Telecom (PTCC),  
QA & Inspection (T&D) circle, BSNL,  
1<sup>st</sup> floor, Raj Bhavan Exchange,  
No.26, Sardar Patel Road,  
Guindy, Chennai-600032

**Subject:** PTCC Route Approval for LILO of 400kV NCPTS Stage-II – Alamathy Feeder-II at Manali 400kV GIS

**Reference:**

- i) BSNL letter no. SR-PTCC/STN-1755/4 dated 2/1/18
- ii) Southern Railway letter no. W.384/3/2/1159 dated 22/9/17
- iii) Defense letter no. B/46937/Sig 7(b)/1286 dated 31/1/19

Sir,

The low frequency induction on BSNL and Southern Railway telecommunication circuits as per details furnished vide above cited references (i) and (ii) respectively has been examined. The average soil resistivity value has been taken as 25000 Ohms-cm, as per data submitted by Power Authority. Voltages likely to be induced on paralleling BSNL and Southern Railway telecommunication circuits under SLG (Single Line to Ground) fault condition are enclosed at Annex-I & II respectively. The screening factors as applicable have been considered. Vide ref. (iii) above, Defense Authority have issued No Objection Certificate (NOC), a copy is enclosed at Annex-III.

Taking above into consideration, kindly issue PTCC Route Approval.

Encl: As above

Yours faithfully,

(Naresh Bhandari)  
Chief Engineer

**Copy to:**

- (i) SSTE, Southern Railway, Headquarters Office, S&T Branch, Chennai- 600003  
(with Annexure II only)
- (ii) Superintending Engineer/Transmission-I, TNTRANCO, 6<sup>th</sup> Floor, NPKRR Maaligai, 144, Anna Salai, Chennai - 600002

MIC

CEA Case No. TN-655

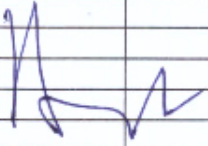
Case No. STN-1755		SSA: ChTD			
Name of the power line		LILO of 400 KV NCPTS II-Alamathy Feeder II at proposed Manali 400 KV GIS SS			
Length:	31.422	Kms			
Average SR value :	25,000	ohm cms			
		Type of BSNL telecom cable : PIJF			
Sl.No.	Name of Telecom line	LOP in KMs	MC in Ohms	FC in Amps	IV in Volts
I	Athipedu Exge UG cables				
3	Exge to P21-P22-Irulipattu village end 1-3				- IV less than 430V
5	Exge to P 26-Periyapalayam Road 1-4-5				
6	Exge to P 26-Janpath chatram Jn 1-4-6				- IV less than 430V
9	Exge to P 23-P24-Tatchoor village 1-7-8-9				
10	Exge to P 23-P24-Kilmeni 1-7-8-10				
II	Kannigapuram Exge UG cables				
3	Exge to Gruruvoyal via Athipattu 1-2-3	1.5	0.0412	15000	G18
6	Exge to Koduvalli via Athipattu 1-2-6				- IV less than 430V
5	Exge to Alamathi via vanichatram 1-4-5				- IV less than 430V
8	Exge to Oilchery via vanichatram 1-4-8				
7	Exge to Athipattu Bazaar 1-7				
III	Kannigaiper Exge UG cables				
4	Exge to Panapakkam 1-2-3-4				- IV less than 430V
5	Exge to Maduravoyal 1-2-3-5				
6	Exge to Alapakkam 1-3-6				
8	Exge to Neyveli 1-7-8				
10	Exge to Athikavanur 1-7-9-10				
11	Exge to Poorlvakkam 1-7-11				

नरेश भंडारी/NARESH BHANDARI  
 मुख्य अभियन्ता/Chief Engineer  
 केन्द्रीय विद्युत प्राधिकरण/C.E.A.  
 विद्युत मंत्रालय/Ministry of Power  
 भारत सरकार/Govt. of India

## ANNEXURE - II

Case No.: TN-655 Name of Power line: LILO of 400kV NCPTS Stage-II – Alamathy Feeder-II at Manali 400kV GIS		Map Scale : 1cm=500mts Total Length : 31.422 Km S.R. Value : 25,000 Ohm-cm			
S. No.	Telecom Details	Length of Parallelism (KM)	Mutual Coupling (Ohm)	Effective Fault Current (Amp)	Induced Voltage (Volt)

SOUTHERN RAILWAY					
Ref. No. W.384/3/2/1159 dated 22/9/17					
1	Basin Bridge-Korukupet		Out of Parallelism		0
2	Korukupet-Triuvettiyur		Out of Parallelism		0
3	Trivettiyur-Attipattu	5	0.00068	12612	8
4	Attipattu-Minjur	2	0.0006	12612	7
5	Minjur-Ponneri	5	0.0012	10228	12

  
 नरेश भंडारी / NARESH BHANDARI  
 मुख्य अभियन्ता / Chief Engineer  
 केन्द्रीय विद्युत प्राधिकरण / C.E.A.  
 विद्युत मंत्रालय / Ministry of Power  
 भारत सरकार / Govt. of India  
 नई दिल्ली / New Delhi-66

Tele : 23019746

ANNEX - III

Directorate General of Signals  
Signals 7  
General Staff Branch  
Integrated HQ of MoD, (Army)  
DHQ PO, New Delhi - 110011

TN 6

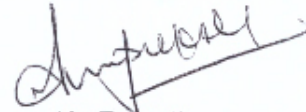
B/46937/Sigs 7(b)/1286/

31 Jan 2019

Superintending Engineer/Transmission-I&Secretary/  
Power, SLPTCC,  
Tamil Nadu Transmission Corporation Limited  
6<sup>th</sup> Floor, No. 144, Annasalai  
Chennai-600 002

**PTCC PROPOSAL-LILO OF 400KV NCTPS STAGE-II-ALAMATHY FEEDER II AT THE  
PROPOSED MANALI 400KV GIS SS-REG.**

1. Ref your letter No Lr. No. SE/TR-I/EM/A1/F.PTCC/D.No 129/17 dt 19 July 2017 (copy att)
2. No Objection Certificate (NOC) is accorded based on inputs provided vide Map sheets received under your letter mentioned above.
3. Documents alongwith map sheets (in original) are returned herewith for your further necessary action.



(A Rawat)  
Maj  
GSO 1 (Comn)  
for SO-in-C

**Enclosures** : (As above)

**Copy to:**

The Director (PTCC), CEA  
Power Communication Development Division  
NRPC Complex, 18-A Shaheed Jeet Singh Marg  
Katwaria Sarai, New Delhi - 110016

for information.