Procurement Projection - Department Wise Indicative list of Items/Services/Works to be Procured for Next 3-5 Years(2020-2025)

	DEDARTMENT		BOLLING STOCK	
1	DEPARTMENT		ROLLING STOCK	
S.NO	DESCRIPTION OF ITEMS	QUANTITY	TECHNICAL SPECIFICATIONS	
			Year of 2021 to 2023 - 42 Train sets & 2024 to 2025 - 52	
1	Grease LGEP2 (If aggressive area) in Kgs	1164	SELA000712236	
2	Thinner in Ltr	1164	SELA000712236	
3	Contactual HPG in Kgs	93	SELA000713306	
4	Aeroshell Grease 6 in Kgs	233	SELA000713306	
5	DC-HT 300 DCS Roller Chain in ml Ethyl Alcohol in ml	46548 465476	SELA000713408	
6 7	Air leak spray in ml	46548	SELA000715101 SELA000715101	
8	GD 265 ROBSil (Insulator protector) in ml	93095	SELA000715101 SELA000715101	
9	Grease KP2K (Servo GEM EP2) in Kgs	233	SELA000713101 SELA000725627	
10	Delothen NK1 (Tuf kote cleanser 7225) in Ltr	233	SELA000725627 SELA000725627	
11	DINITROL 77B (Efcoat WH 3852) in Ltr	47	SELA000725627	
12	DINITROL 4010 in Ltr	93	SELA000725627 SELA000725627	
13	Silicon grease type molykote 55M in Kgs	12	SELA000713130	
14	Grease(MOBIL ref. Mobilith SHC 100) in Kgs	23	SELA000713774	
15	Spirax AEX 75W-90 oil in Ltr	11171	SP23980004/SELA000723191	
16	glycerine-spiritus-mixture (1:10)(IPA) in Ltr	233	SELA000723196	
17	Chemical Cleaning Agent(Acetone) in Ltr	233	SELA000723196	
18	Paint Coating RAL 9005 in Ltr	23	SELA000723196	
19	Molykote PG54 in gram	11637	3000.00.355	
20	Distilled water or de-ionised water (C2) in Ltr	2327	SELA000712840	
21	Molykote longterm 2+ in Kgs	93	SELA000762267	
22	Loctite 243 thread locker in Ltr	6	SELA000762267	
23	Loctite 5366 in ml	5818	SELA000762267	
24	Wheel flange lubricant in Nos	67029		
25	Mix Return Air Filter in Nos	7448	D3100003/SELA000713586	
26	AOH KIT in Nos	465	SELA000713130	
27	Air Dryer Cartridge.PANTOGRAPH COMPRESSOR	ACE	2/545246	
27	UNIT (08.01) in Nos	465	2/515216	
28	O-ring .PANTOGRAPH COMPRESSOR UNIT (08.01) in Nos	465	FT0021110-000	
29	Filter PRESSURE REGULATOR 5.0 BAR SET(01.25) in Nos	931	AB578-37A	
30	O ring in Nos	931	0015/11A	
31	O ring in Nos	931	003703500A	
32	O-ring in Nos	931	1/160408	
33	O-ring in Nos	931	2/517597	
34	AIR FILTER 3/8" AIR LINE SIEVE 3/4"(01.19) in Nos	465	029 0090 00	
35	Locking wire in Mtrs	1862		
36	Air intake filter catridge in Nos	465	4046380008	
37	Air dryer colesent filter in Nos	465	FT0026528-K01	
38	AIR SEPARTOR FILTER CARTRIDGE in Nos	931	1/139185,2/514398	
39	Waste cloth in Kgs	9310		
	ROLLING STOCK MISCELLANE		REMENT in the Year of 2020	
40	Procurement of manipulator for forklift shunter in no	1	Specification will be decide While Tendering	
41	Hot water spray jet in no	1	Specification will be decide While Tendering	
42	Paint booth in WSL 2 in no	1	Specification will be decide While Tendering	
43	Calibration of tools and measuring device in no	1	Specification will be decide While Tendering	
44	Gantry in no	1	Specification will be decide While Tendering	
45	Sunscreen film (for 10 train sets) in no	1	Specification will be decide While Tendering	
46	Industrial oven in no	1	Specification will be decide While Tendering	
47	PU coating of wash plant in no	1	Specification will be decide While Tendering	

ROI	LING STOCK OVERHAULING ACTIVITY SPARES REQUI	REMENT in the Year	r of 2020 - 7 Trains, 2021 - 13 Trains, 2022 - 11 Trains,
48	Conical spring in No's	2688	Specification will be decide While Tendering
49	HVAC heater in No's	2016	Specification will be decide While Tendering
	BEARING FOR IOH MAINTENANCE Auxilary		
	convertor motor bearing		
50	Make - SKF	84	
	Model - 6205-2RSH/C3WT in No's		
	BEARING FOR IOH MAINTENANCE Auxilary		
	convertor motor bearing		
51	Make - SKF	84	
	Model - SKF 6206-2RS1/C3WT in No's		
	BEARING FOR IOH MAINTENANCETraction		
	convertor motor fan bearing		
52	Make - NSK	168	
	Model - 6205DU in No's		
	BEARING FOR IOH MAINTENANCE Condensor fan		0 10 11 11 1 11 11 11 7
53	motor bearing in No's	1344	Specification will be decide While Tendering
	BEARING FOR IOH MAINTENANCEEvaporator Fan		
54	motor bearing in No's	1344	Specification will be decide While Tendering
	BEARING FOR IOH MAINTENANCEMain	225	Constitution all head of the second
55	transformer fan motor in No's	336	Specification will be decide While Tendering
56	O rings for Battery in No's	7140	Specification will be decide While Tendering
57	Bellow - Panto in No's	84	Specification will be decide While Tendering
58	Safety Valve 10.6 bar in No's	84	
59	Safety Valve 8 bar in No's	84	
60	Overhaul of Caliper and actuator in No's	336	Specification will be decide While Tendering
61	Overhaul of pantograph in No's	252	Specification will be decide While Tendering
	OVERHAUL OF PANTOGRAPHLower arm end	0.4	
62	stop in No's	84	Specification will be decide While Tendering
	OVERHAUL OF PANTOGRAPHUpper arm end	0.4	0 10 11 11 1 11 11 11 7
63	stop in No's	84	Specification will be decide While Tendering
	OVERHAUL OF PANTOGRAPHPneumatic bellows	0.4	Constitution of the deside Mileton Tenderica
64	in No's	84	Specification will be decide While Tendering
CF	OVERHAUL OF PANTOGRAPH Damper assembly	0.4	Consideration will be decide M/bile Tenderine
65	in No's	84	Specification will be decide While Tendering
66	OVERHAUL OF PANTOGRAPHMED valve in No's	84	Specification will be decide While Tendering
00	OVERHADE OF PAINTOGRAPH WIED VAIVE III NO S	04	Specification will be decide While Tendering
67	OVERHAUL OF PANTOGRAPHPipe assembly in	0.4	Specification will be decide While Tendering
07	No's	84 Specification will be decide While Tenderi	
68	OVERHAUL OF PANTOGRAPHAir filter in No's	84	Specification will be decide While Tendering
69	OVERHAUL OF PANTOGRAPHManpower Charges	84	
03	for overhaul in No's	04	
70	OVERHAUL OF TBUBOH Kit in No's	1344	Specification will be decide While Tendering
71	OVERHAUL OF TBUEOH Kit in No's	672	Specification will be decide While Tendering
72	OVERHAUL OF TBUCOH Kit in No's	168	Specification will be decide While Tendering
73	OVERHAUL OF TBUBOH kit for F-unit in No's	672	Specification will be decide While Tendering
74	OVERHAUL OF TBUEH kit for F-unit in No's	336	Specification will be decide While Tendering
75	HVAC U rubber strip in No's	5040	Specification will be decide While Tendering
76	Panto rubber end stop in No's	126	Specification will be decide While Tendering
77	VCB POH KIT in No's	84	Specification will be decide While Tendering
	WIMCO NAGAR DEPOT	•	
78	Mobile lifting Jacks in No's	18	Specification will be decide While Tendering
79	EOT crane - (3 t/10t) in No	1	
80	Automatic Train Wash Plant in No	1	Specification will be decide While Tendering
81	Self propelled battery operated scissor lift in No	1	Specification will be decide While Tendering
31	Sen properties success operated sessor int in No		Specification will be active writte reflacting
82	Car body stand in No's	16	Specification will be decide While Tendering
83	Manual Pallet truck+B12 in No's	4	Specification will be decide While Tendering
84	HVLS fan in No's	8	Specification will be decide While Tendering
85	Portable air compressor in No	1	Specification will be decide While Tendering
86	Conical spring tester in No	1	Specification will be decide While Tendering

	POONAMALLE (2023), MADAVARAM (2025), SIRUSEF	RI/ SHOLINGANALL	UR(2024) DEPOTS (ROLLING STOCK) LIST OF ITEMS
	UNDERFLOOR WHEEL LATHE FOR WHEEL		
87	REPROFILING in No	1	Specification will be decide While Tendering
88	BATTERY SHUNTER in No's	3	Specification will be decide While Tendering
89	RAIL CUMROAD RESCUE VEHICLE in No	1	Specification will be decide While Tendering
90	AUTOMATIC TRAIN WASH PLANT in No's	4	Specification will be decide While Tendering
91	RETRACTABLE OHE SYSTEM in No's	8	Specification will be decide While Tendering
92	BOGIE WASH PLANT in No	1	Specification will be decide While Tendering
93	SYNCHRONISED MOBILE LIFTING JACKS(SET OF 12) - 16T in No's	4	·
94	Pit Jacks (Set of 12) in No's	4	Specification will be decide While Tendering
95	PALLET TRUCK (MANUAL) in No's	8	Specification will be decide While Tendering
96	STEEL TRESTLE SET OF 12 in No's	4	Specification will be decide While Tendering
97	MOBILE BATTERY CHARGER in No's	4	Specification will be decide While Tendering
98	PEDESTAL GRINDER in No's	3	Specification will be decide While Tendering
99	STORAGE BIN 515X330X200 in No's	90	
100	STORAGE BIN 350X250X125 in No's	60	
101	STORAGE BIN 2100X1000X250 in No's	60	
102	STORAGE CABINET 915X6100X1525mm in No's	110	
103	METAL LOCKER FOR STAFF in No's	200	Specification will be decide While Tendering
104	FORK LIFT in No's	4	Specification will be decide While Tendering
105	PLATFORM TRUCK in No's	6	Specification will be decide While Tendering
106	ULTRASONIC FLAW DETECTOR in No's	6	Specification will be decide While Tendering
107	RE-RAILING EQUIPMENT (SET) in No	1	Specification will be decide While Tendering
108	EOT CRANE (30KN) in No's	4	
109	EOT CRANE (200KN/50KN) in No's	4	
	EOT CRANE (50KN)WITH 4-LEGGED SLINGS in No's	4	
111	EOT(2T) in No's	3	
112	MONO RAIL MANUAL HOIST WITH SLINGS (2T) in	3	
112	No's	2	Consideration will be decide While Tanderine
113 114	BOGIE MANIPULATOR in No's BOGIE TURN TABLE in No's	<u>3</u> 8	Specification will be decide While Tendering Specification will be decide While Tendering
	BOGIE TESTING UNIT in No's	3	Specification will be decide While Tendering Specification will be decide While Tendering
116	BOGIE PUSHER in No's	3	Specification will be decide While Tendering Specification will be decide While Tendering
117	HOT WATER JET SPRAY in No's	4	Specification will be decide While Tendering
117	STATIONARY AIR COMPRESSOR WITH ACCESSORIES		Specification will be decide writte rendering
118	in No's	2	Specification will be decide While Tendering
119	PORTABLE AIR COMPRESSOR in No's	7	Specification will be decide While Tendering
120	BATTERY OPERATED SCISSORS LIFT in No's	7	Specification will be decide While Tendering
	REQUIREMENTS OF NEW PROCUREMENT F	OR ROLLING STOC	
121	3 Car Rolling stock for Priority corridor section of Corridor 3 and Corridor 5	210 cars	3 coach trains with 67% traction were proposed in DPR for operation in elevated and UG sections of all three cordiors of CMRL phase 2 and operated with 25 KV power supply. These coaches shall be procured with
122	3 Car Rolling stock for Corridor 4	78 cars	JICA tied loan. 3 coach trains with 67% traction were proposed in DPR for operation in elevated and UG sections of all three cordiors of CMRL phase 2 and operated with 25 KV power supply. These coaches shall be procured in Internaltional Competitive Bidding
123	3 Car Rolling stock for balance section of Corridor 5 and corridor 3	126 cars	3 coach trains with 67% traction were proposed in DPR for operation in elevated and UG sections of all three cordiors of CMRL phase 2 and operated with 25 KV power supply. These coaches shall be procured with leasing option for this section.

2	DEPARTMENT		INFORMATION TECHNOLOGY
S.NO	DESCRIPTION OF ITEMS	QUANTITY	TECHNICAL SPECIFICATIONS
1	Desktop /Laptop	300	i7, 1TB HDD, 8GB RAM, Win10 Pro etc
2	MFP Floor Printers A3	10	45ppm, A3, Network Printer cum Scanners
3	Small Printers A4	20	A4, Network printer cum scanners or
4			desktop printer
5	Email/Teams subscriptions	300	Microsoft Office 365
6	Bandwidth	1 unit	100Mbps Internet Leased Line
7	Servers	10	2U/4U rack server along with accessories and storage. 2.4 Ghz or higher 8core or 4x intel xeon processors, 8x 8 GB RAM, min 8HDD 10K 2.5" supported
8	Video Conferencing	1 set for office	SIP, H.323 multi call conferencing (min 8), with encryption & security, boundary microphones, HD 1080:50p, 12x zoom camers, codec with HDMI connections, 65~75 inch display

3	DEPARTMENT		HUMAN RESOURCE
S.NO	DESCRIPTION OF ITEMS	QUANTITY	TECHNICAL SPECIFICATIONS
1	Uniball Blue	3000	Uniball Blue
2	Butter flow Blue	40000	Butter flow Blue
3	Butter Flow Black	30000	Butter Flow Black
4	Butter Flow Red	25000	Butter Flow Red
5	Trimax Pen Blue	7000	Trimax Pen Blue
6	Trimax Pen Black	5000	Trimax Pen Black
7 8	Trimax Pen Red Trimax Pen Green	4000 4000	Trimax Pen Red Trimax Pen Green
9	Gel pen Blue	3000	Gel pen Blue
10	Gel pen Black	2500	Gel pen Black
11	V5 Pilot pen	1000	V5 Pilot pen
12	Ordinary pen	5000	Ordinary pen
13	White Board Marker (each colour)	8000	White Board Marker (each colour)
14	Permanent Marker (each colour)	8000	Permanent Marker (each colour)
15	CD Marker (each Colour)	6000	CD Marker (each Colour)
16	Highlighter(each Colour)	7000	Highlighter(each Colour)
	Whitener Pen	4000	Whitener Pen
	Sketch pen	500	Sketch pen
	Color Pencil	500	Color Pencil Apsara Pencil (Box)
	Apsara Pencil (Box)	1000 1000	Steadler Pencil (Box)
22	Steadler Pencil (Box) Micro tip pencil (.7) (Box)	20	Micro tip pencil (.7) (Box)
23	Micro tip pencil lead (.7) (Box)	20	Micro tip pencil (-7) (Box)
24	Paper cutter (Box)	120	Paper cutter (Box)
25	Fevistick (Box)	450	Fevistick (Box)
	Eraser (Box)	500	Eraser (Box)
27	Sharpener(Box)	500	Sharpener(Box)
28	Color Flag	250	Color Flag
29	Yellow Flag	250	Yellow Flag
30	Scale Steel (Box)	400	Scale Steel (Box)
31	Scale Plastic (Box)	400	Scale Plastic (Box)
	Punching Machine Single	1000	Punching Machine Single
33	Punching Machine Double	1500	Punching Machine Double
34 35	Punching Machine big DP 800 Per unit Calculator	500 500	Punching Machine big DP 800 Per unit Calculator
36	Scientific calculator	500	Scientific calculator
37	Tag	1000	Tag
38	Board Pin (Box)	400	Board Pin (Box)
	Stapler small (Box)	200	Stapler small (Box)
	Stapler big (Box)	200	Stapler big (Box)
41	Stapler 23/15 H pin (Box)	400	Stapler 23/15 H pin (Box)
42	Gem Clip (Box)	200	Gem Clip (Box)
43	Binder Clip 15 mm	1000	Binder Clip 15 mm
44	Binder Clip 25 mm	1000	Binder Clip 25 mm
	Binder Clip 35 mm	1000	Binder Clip 35 mm
	Binder Clip 52 mm	1000	Binder Clip 52 mm
47	Brown tape – 2" size per pice	2000	Brown tape – 2" size per pice
48 49	Brown tape – 1" size per pice Cello tape – 2" size per pice	2000	Brown tape – 1" size per pice Cello tape – 2" size per pice
50	Cello 1.5" per pice	2000	Cello 1.5" per pice
51	Cello 1" per pice	2000	Cello 1" per pice
52	Cello 1/2"per pice	2000	Cello 1/2"per pice
53	A4 Cloth Cover (packet)	150	A4 Cloth Cover (packet)
54	A3 Cloth Cover (packet)	150	A3 Cloth Cover (packet)
55	Scissor Big (Box)	200	Scissor Big (Box)
56	Scissor Small (Box)	200	Scissor Small (Box)
57	Duster (Box)	200	Duster (Box)
58	Legal Paper Green	500	Legal Paper Green
59	Legal Paper white	1000	Legal Paper white
60	A3 Executive Pond Paper (Packet)	200	A3 Executive Pond Paper (Packet)
61	File Pad (per No.)	20000	File Pad (per No.)
62	Box File (Per No.)	8000	Box File (Per No.)

63	Box file small (Per No.)	2000	Box file small (Per No.)
64	Short Note 192 pages (Pack)	2000	Short Note 192 pages (Pack)
65	A4 Stick file	7000	A4 Stick file
66	Spring File (Per No.)	20000	Spring File (Per No.)
67	Button file (Pack)	200	Button file (Pack)
	, ,		· · · · · · · · · · · · · · · · · · ·
68	L Folder (each)	20000	L Folder (each)
69	100 Leaf file (each)	250	100 Leaf file (each) Lever file
70 71	Lever file 2D Ring file	150 1500	2D Ring file
72	A4 Sticker sheet (pack)	200	A4 Sticker sheet (pack)
73	A4 Transparent Leaf (pack)	1000	A4 Transparent Leaf (pack)
74	File Separator (Bunch)	100	File Separator (Bunch)
75	Color Index (Bunch)	100	Color Index (Bunch)
76	Index sheet (Bunch)	100	Index sheet (Bunch)
77	Color Box file Per Unit	800	Color Box file Per Unit
78	Flip chart Per Unit	25	Flip chart Per Unit
79	Ink bottle 30 ml Per Unit	200	Ink bottle 30 ml Per Unit
80	Magnet button (Pack)	100	Magnet button (Pack)
81	Certificate sheet (No.)	7000	Certificate sheet (No.)
82	Stamp Pad small Per Unit	1500	Stamp Pad small Per Unit
83	Stamp Pad big Per Unit	1500	Stamp Pad big Per Unit
84	Paper Weight (Nos.)	400	Paper Weight (Nos.)
85	Gum Bottle 150 ml (Nos.)	600	Gum Bottle 150 ml (Nos.)
86	A4 Spiral Sheet (Packs)	1000	A4 Spiral Sheet (Packs)
87	A4 Spiral Chart (Packs)	1000	A4 Spiral Chart (Packs)
88	A3 Spiral Sheet (Packs)	1000	A3 Spiral Sheet (Packs)
89	A3 Spiral Chart (Packs)	1000	A3 Spiral Chart (Packs)
90	Spiral Ring all size (Per KG)	30	Spiral Ring all size (Per KG)
91	Visiting Card Folder (Nos.)	150	Visiting Card Folder (Nos.)
92	Brown sheet	20000	Brown sheet
93	Key holder per packet	300	Key holder per packet
94	Long size Register 400 Pages (Packs)	800	Long size Register 400 Pages (Packs)
95	Long size Register 160 Pages (Packs)	1000	Long size Register 160 Pages (Packs)
96	Short hand note (Pack)	200	Short hand note (Pack)
97	Writing Table Pad	1000	Writing Table Pad
98	Carbon Paper blue (Pack)	200	Carbon Paper blue (Pack)
99	Rubber band big (Box)	2000	Rubber band big (Box)
100	Rubber band small (Box)	1500	Rubber band small (Box)
101	Damper edge round (Box)	50	Damper edge round (Box)
102	Paper Tray	250	Paper Tray
103	Foam Tape Double (Per Unit)	2000	Foam Tape Double (Per Unit)
104	CD RW (Per unit)	1000	CD RW (Per unit) CD R (Per unit)
105	CD R (Per unit) DVD RW (Per unit)	3000	
	DVD RW (Per unit) DVD R (Per unit)	1000 3000	DVD RW (Per unit) DVD R (Per unit)
	Pen stand wood (Per unit)	450	Pen stand wood (Per unit)
	Pen stand Wood (Fer unit)	200	Pen stand Plastic (Per unit)
	AAA Battery (Per unit)	4500	AAA Battery (Per unit)
	AA Battery (Per unit)	6000	AA Battery (Per unit)
	Air Freshener (Per unit)	700	Air Freshener (Per unit)
113	•	50	Floor mat (Per unit)
114	Calling bell (Per unit)	400	Calling bell (Per unit)
115	Calling bell battery small (Per unit)	250	Calling bell battery small (Per unit)
116	Hand Cloth (Nos.)	3500	Hand Cloth (Nos.)
117	Yellow cloth(Nos.)	650	Yellow cloth(Nos.)
118	Needle (Big)	600	Needle (Big)
119	Needle (Small)	500	Needle (Small)
120	Thread	1500	Thread
121	Tissue Paper (Pack)	7000	Tissue Paper (Pack)
122	Paper Plate big (Pack)	3000	Paper Plate big (Pack)
123	Paper Plate small (Pack)	7000	Paper Plate small (Pack)
124	CMRL Scribbling Pad (Nos.)	18000	CMRL Scribbling Pad (Nos.)
125	CMRL Letter Head (Per No.)	300000	CMRL Letter Head (Per No.)

126	CMRL Envelope (Box)	150	CMRL Envelope (Box)
127	Plain Envelope (Nos.)	4000	Plain Envelope (Nos.)
128	A4 Envelope (Nos.)	7000	A4 Envelope (Nos.)
	Chart all colour	150	Chart all colour
	A4 Paper	25000	Copier - A4 80 gsm (A4 shrink wrap)
131	A3 Paper	1500	Copier - A3 80 gsm (A3 shrink wrap)
		Printing Items	Joseph Community
	ID Card		ID card with printing and lamination
132		3000	ID rope with Blue and White colour printing
			ID card Holder
		100000	Visiting Card with White & Blue single side colour
		100000	printing
133	Visiting Card	3000	Visiting Card with White & Blue double side colour
			printing
		2000	Visiting Card with Multi colour double side printing
		30	Self ink seal of size - 59mm x 19mm
		30	Self ink seal of size - 70mm x 19mm
		40	Self ink seal of size - 62mm x 29mm
		30	Self ink seal of size - 26mm x 26mm
		30	Self ink seal of size - 99mm x 72mm
		30	Self ink seal of size - 125mm x 40mm
		40	Self ink seal of size - 85mm x 40mm (Box type seal)
134	Rubber Stamp	30	Rubber seal of size - 85mm x 40mm (Box type seal) Self ink seal of size - 55mm x 32mm ((Box type with
134	Rubbei Stailip	30	
			dated) Self ink seal of size - 49mm x 29mm ((Box type with
		30	dated)
			uateu)
		30	Self ink seal of size - 36mm (Round type with dated)
		300	28mm (Round type with dated)
		30	Automatic Number Stamp
		40	Self-ink Stamp 26mm Dia
			No of pages per book: 50 pages
			Size: 5w x 7h cms
125	Top/Courses Book /F Voors)	20000	Paper GSM:70 GSM
135	Tea/Coupon Book (5 Years)	20000	Paper colour: White, Yellow, Green & Pink
			Serial number prining, finishing with perforation and
			center prining
126	Office Diany	3500	Priniting & Supply of Official Diary with Enclosures
136	Office Diary	3300	(SOP, Tender Procedure Manual etc)
137	Guest Diary	5000	Without Enclosures
138	Pocket Diary	3500	Priniting & Supply of Pocket Diary
139	Wall Calendar	3000	Priniting & Supply of Wall Calendar
140	Desktop Calendar	2000	Priniting & Supply of Desktop Calendar
141	Greeting Card	15000	Priniting & Supply of Greeting Card (only HOD's and
		F	above)
		Furniture	Take and the second
142	Stand Alasinah	200	Making 4 shelves with 5 compartments
142	Steel Almirah	200	78"Hx36"Wx19"D
		DDE	Thickness 18/20 gauge
		PPE	The Safety helmet should conform to ISI & DGMS
143	Safety Helmet	300	norms
144	Safety Jacket	600	Green Colour - 2" PVC white tape - Mesh type - 310
144	Jainery Jacker		S.T - Upper Buff Barton Leather - PU D.D, D.C. Sole - LA
		30	Size 6" - Ac 1284
			S.T - Upper Buff Barton Leather - PU D.D, D.C. Sole - LA -
		30	Size 7" - Ac 1284
			S.T - Upper Buff Barton Leather - PU D.D, D.C. Sole - LA -
145	Safety Shoe	30	Size 8" - Ac 1284
			S.T - Upper Buff Barton Leather - PU D.D, D.C. Sole - LA -
		30	Size 9" - Ac 1284
			S.T - Upper Buff Barton Leather - PU D.D, D.C. Sole - LA -
		30	Size10" - Ac 1284
			•

	Electronic Accessories				
146	Pen Drive	300	16 GB Sandisk Pendrive - USB 3.0		
140	Peli Drive	300	32 GB Sandisk Pendrive - USB 3.0		
		60	1 TB		
147	External Hard Disk	40	2 TB		
		30	4 TB		
148	Digital Camera	60	DSC W810 Black		
149	Induction Stove	30	Preethi CM-210 CAFÉ ZEST (Black)		
150	Airtel Dongle	150	Airtel Dongle Wifi		
		Uniform Accessories			
151	Pant	5725			
152	Shirt	6325			
153	T Shirt	3830			
154	Saree	500			
155	Belt	2265			
156	Socks	7545			
157	Bag	2515			
158	Blazer	310			
159	Tie	310			
160	Tie Pin	310			
161	Cufflink	310			

4	DEPARTMENT		REVENUE & TRAIN OPERATIONS	
S.NO	DESCRIPTION OF ITEMS	QUANTITY	TECHNICAL SPECIFICATIONS	
1	Contactless smart card	33 Lakhs	Material PVC Weight 5g Size Rectangular Shape: 53.98 mm X 85.6 mm Thickness As per ISO 7810 Base Color White(Card Material) Engraved mark Serial No: 10digit number Print Photograph Warpage Less than 1.5mm	
2	TVM paper rolls	75000	Paper type - Thermal Paper Roll Size Width - 56 mm Length – 15 mtrs Print Color Black Thickness Minimum 55 GSM Pattern - Plain	
3	Parking Paper rolls	2.8 lakhs	Paper type - Thermal Paper Roll Size Width - 79 mm Length – 50 mtrs Print Color Black Thickness Minimum 55 GSM Pattern - Plain	
4	Safe Case	38	Type: Storage Locker Material: Mild Steel Weight: 475 kg Volume: 45 ltr External Dimension: 662x531x567mm Finish: Powder Coating Internal Dimension: 462x331x295 mm	
5	Fake note detection machine at cash counters	38	Frequency: 50-60 Hz Hopper Capacity: Above 500 Notes Usage/Application: Banks, Office. Dimensions: 215 x 271 x 264 mm Thickness: 0.075 - 0.15 mm	
6	Token /Coin counting Machine	38	Token Thickness: 1 - 3.5mm Token Diameter: 14 - 34 mm Hopper Capacity: 4000 coins Dimension: 400(L)*230 (W)*360 (H) mm Counting Speed: 2000 Coins/min	
7	Fake note detectornote counting & sorting Machine	38	Automatic fake note detector with battery backup machine. Type - Single note feeder. LCD display with back lit. Speed – Upto 0.5 seconds per note Weight - Less than 1kg. Detects Rs. 500/ 1000 super fake notes Adds up, to give total value passed. Bank note acceptance Future notes and new notes issued by RBI can be programmed.	
8	External Storage Device	3	64GB	
9	Docment /Stationery Storage Racks for Revenue cell & Training	10	As per our earlier design avaliable at RC	
10	Printer with scanner for Revenue cell & Train Operation Monitoring	2	Paper Size: A3, A5, A4 Display: 8.0-in (20.3 cm) touchscreen, SVGA Color Graphic Display (CGD) Network Capabilities: Standard (built-in Gigabit 10/100/1000T Ethernet) Voltage: 200 to 240V Functions: Print scan and copy	

11	Portable Hard disk/ Drive for backup i) RRSCM back up ii) Earnings and ticket stock, Tender and other data back up iii) TCMS data backup for Train Hours iv) Train Operation Audit Data Backup	9	Each 4 TB (1 nos. for each financial year)
12	Lap top for Training , Audit & Data processing	5	8GB RAM with 250GB or 500 GB Harddrive and latest core processor
13	Alchohol Breath Analyzer Machine	10	Fuel Cell Sensor, Working temperature 5° C to 50° C, Size 145x67x35 mm, weight < 600gm, Battery - Li-on, Capacity 1200 mAHDetection Range- 0 -0400 mg/100 ml, BAC: gm%/mg/ml/100ml, Memory- 10,000 Test Records, Touch screen Guided, Screen calibration facility, Auto switch off, Conforms to RDSO Specification No. RDSO/2015/EL/SPEC/0119 (Rev '0') dated 17.09.2015

5	DEPARTMENT		TVS, LIFT & ESCALATORS
S.NO	DESCRIPTION OF ITEMS	QUANTITY IN APPROXIMATELY - (Assuming 50% of Phase 2)	TECHNICAL SPECIFICATIONS
			a) Capacity: 13pax, 16pax, 26pax b) Speed: 1m/s
			c) Rise : In range of Minimum 3m to Maximum 22m
1	Elevators/Lifts	300 units	d) Type: Heavy Duty Lifts e) Lift Car: SS car body with Glass Doors f) Load capacity: 1000kgs Considering avg of 5 lifts per station and procurement for 60 stations approx.
			a) Type : Heavy Duty Escalators b) Speed : 0.5/ 0.65 (m/s)
			c) Rise : In range of Minimum 3m to Maximum 12.5m
			d) Capacity(P/H) : 11700 P/H
			e) Balustrade : SS for Street to concourse escalators;
2	Escalators	360 units	Glass for Concourse to Platform
			escalators
			f) Step Width : 1000mm
			g) No. of horizontal steps : 4
			h) Inclination: 30°
			Considering avg of 6 escalators per station and
			procurement for 60 stations approx. High temperature tunnel ventilation fans of 80-120 cms
3	Tunnel Ventilation (TVS) Fans + Motors	50 units	capacity
4	TVS dampers	100 units	Heavy duty SS 316 fire rated dampers of 4mx5m size
5	TVS transition ducts	100 units	Heavy duty fabricated GI/MS
6	TVS sound attenuators	100 units	Heavy duty fabricated 306 SS. 4mx5m size with rockwool filling
7	TVS & VAC MCC/Control panels	140 units	Electrical & SCADA panels
8	TVS & Electrical/Control cables	10,000 m	Fire rated Copper and fiber cables of various sizes
9	TVS/VAC Variable Speed drives	200 units	Variable speed drive 150-250kW capacity
10	VAC Air Handling Units (AHU)	50 units	200 tons per station
11	VRF out-door unit Indoor units	400 units 150 units	20HP per unit 6 hp per unit
13	Air curtains	200 units	600 LPS per unit
14	VAC fans	50 units	20 cms per unit
	Stair case pressurization fans	50 units	10 cms per unit
16	Fresh air fans	50 units	2 cms per unit
17	VAC ducting	1,00,000 SQM	GI ducting of 125 GSM
18	Fire painting	50,000 sqm	250 deg for 1 hour rated fire paint
19	Copper tubing	50,000 m	Various sizes
20	Cables Trays	10,000 m	MS galvanized perforated or ladder type

6	DEPARTMENT - OVERHEAD EQU	IPMENTS
S.NO	DESCRIPTION OF ITEMS	QUANTITY
	FOCS MATERIALS REQUIRED FOR OHE	
1	FOCS Bracket set	65
2	catenary splice	100
3	contact wire splice	60
4	AEC splice	100
5	Catenary Ending cone	60
6	Contact Ending cone	60
7	Bi metallic strip	250
8	AEC pg clamp	250
9	Universal PG clamp	150
10	Universal Dropper clip	300
11	AEC suspension clamp	50
12	70mm insulator	60
13	55mm insulator	60
14	9 ton insulator	50 50
15 16	ACC PG clamp	25
17	ACSR anchor clamp Double strap	25
18	Equilising plate	25
19	Jumper clamp	60
20	Wedge type dead end clamp	100
21	Section insulator FOCS	20
22	Section insulator ROCS	20
23	Section insulator NOCS Section isulators Depot	10
24	Section Insulators (ASNS)	4
25	Section Insulators (SNS)	4
26	Ball socket(ATD)	30
27	Adjuster	30
28	SPS fittings	50
29	Bolts and Nuts	2000
30	3Pulley	10
31	Guy Rod with sps	10
32	Al.lugs for ACSR	200
33	Cu. lugs for BEC	100
	FOCS MATERIALS REQUIRED FOR OHE	
34	150sq.mm contact wire in mtr	4000
35	65sq.mm catenary wire in mtr	4000
36	12sq.mm Dropper wire in mtr	2500
37	93.3sq.mm ACSR in mtr	5000
38	35sq.mm BEC in mtr	5000
39	35sq.mm Bridle wire in mtr	1500
40	95sqmm Jumper wire in mtr	1000
41	SS wire for RD in mtr	500
42	GI wire for Back stay in mtr	500
43	55mm Al.tube in mtr	100
44	70mm Al.tube in mtr	100
	ROCS MATERIALS REQUIRED FOR OHE	
45	Counter sunk screw	1000
46	Expansion Joint	15
47	AL.Rail	100
48	Gliding Clamp	75
49	Fixed Clamp	50
50	Jumper Clamp	50
51	Rail Joint Plate(Internal)	500
52	Rail JointPlate(external)	500
53	Rocs Insulator	100
54	Ramp Rail	10
55	Transition Element	10

7	DEPARTMENT - SIGNALLING & TELECOM		
S.NO	DESCRIPTION OF ITEMS	QUANTITY IN APPROXIMATELY	
1	Design, Manufacture, Supply, Install, Testing & commissioning of signalling (CBTC) system with Automatic Train protection, Automatic train operation, Automatic Train supervision and Computer based interlocking system for Chennai Metro Rail Project-Phase 2-consisting of 3 corridors (Corridor 3: Madhavaram to SIPCOT, Corridor4: Poonamallee to Light House and Corridor 5: Madhavaram to Sholinganallur) - This includes three depots (1. Madhavaram 2. Poonamalee & 3. SIPCOT)	119 Kilo Meter / 128 Stations	
2	Design, Manufacture, Supply, Install, Testing & commissioning of Various Telecom systems for Chennai Metro Rail Project-Phase-2 for Corridor 3: Madhavaram to SIPCOT-This includes two depots (1. Madhavaram 2. SIPCOT)	46 Kilo Meter / 50 Stations	
3	Design, Manufacture, Supply, Install, Testing & commissioning of Various Telecom systems for Chennai Metro Rail Project Phase-2 for Corridor 4: Poonamallee to Light House - This includes a depot at Poonamalee.	26 Kilo Meter / 30 Stations	
4	Design, Manufacture, Supply, Install, Testing & commissioning of Various Telecom systems for Chennai Metro Rail Project-Phase-2 for Corridor 5: Madhavaram to Sholinganallur	47 Kilo Meter / 48 Stations	
5	Design,Manufacture,Supply,Install,Testing & commissioning of Full Height Platform Screen Door systems for Chennai Metro Rail Project Phase-2 Corridor 3:Madhavaram to Indira Road	30 Stations	
6	Design, Manufacture, Supply, Install, Testing & commissioning of Half Height Platform Screen Door systems for Chennai Metro Rail Project Phase-2 Corridor 3: Thiruvanmiyur to SIPCOT.	20 Stations	
7	Design,Manufacture,Supply,Install,Testing & commissioning of Full Height Platform Screen Door systems for Chennai Metro Rail Project Phase-2 Corridor 4: Light House-Meenashi College	12 Stations	
8	Design,Manufacture,Supply,Install,Testing & commissioning of Half Height Platform Screen Door systems for Chennai Metro Rail Project Phase-2 Corridor 4:Poonamalee to Power House	18 Stations	
9	Design, Manufacture, Supply, Install, Testing & commissioning of Full Height Platform Screen Door systems for Chennai Metro Rail Project-Phae-2 Corridor 5: Nathamuni-Kolathur & Venugopal Nagar	6 Stations	
10	Design, Manufacture, Supply, Install, Testing & commissioning of Half Height Platform Screen Door systems for Chennai Metro Rail Project - Phase-2 Corridor 5: Madhavaram, Assissi Nagar-Retteri Jn & AnnaNagar Depot-Sholinganallur	42 Stations	